Seco

Catalog & technical guide

Turning 2026.1



At Seco, we make tools, tech, and solutions for the most advanced manufacturing challenges on Earth. From our founding in Fagersta Sweden, to today's global company, our business has always been made to measure, and built on trust.

Combining cutting-edge, precision tools with lasting, personal partnerships, we're a true people company helping our partners discover the future of the manufacturing industry.

We're proud to make for makers, invent for inventors, and partner with pioneers. Driving the future forward with our focus on innovation. In short - if the right tool for the job exists, we'll deliver it. If it doesn't, we'll create it.

We're proud to put sustainability at the heart of everything we do, challenging perceptions of our industry, changing the process of manufacturing, and playing our own small part in shaping a brighter looking future.

Made for Makers

Turning Product Guidance

Code keys 12
Choose Product – First steps 33
Choose Product – Application overview 40
Choose Product – Chipbreaker application areas 61
Choose Product – Searching Turning Tools 64
Choose Product – Exploring cutting data recommendations 66
Choose Product – Component based product recommendations 67
Choose Product – Insert grades 68
Trouble Shooting – Turning problems & recommended solutions 72
Trouble Shooting – Carbide grades 73
Trouble Shooting – PCBN 79
Trouble Shooting – PCD 80
Trouble Shooting – Ceramic 81
Product detail – ISO attribute list 82
Product detail – Toolholder clamping 84
Product detail – Jetstream Tooling® 85
Product detail – Seco-Capto™ 88
Product detail – Steadyline® 90
Product detail – Toolholder QC Modular 95
Product detail – Toolholder tables 97
Product detail – Small diameter 99
Product detail – Inserts Carbide Cutting data 100
Cutting data, ISO Inserts 104
Cutting data, Railway wheels 109
Product detail – Inserts packaging 110
Product detail – Inserts Carbide chipbreakers 111
Product detail – Inserts Carbide High Feed Wiper 116
Product detail – Inserts Carbide grades 119
Product detail – Cartridges 123
Product detail – Railway wheels 124
Product detail – PCBN 127
Secomax – PCBN, Cutting data 140
Product detail – PCD 144
Secomax – PCD, Cutting data 146
Product detail – Ceramics 147
Secomax – Ceramics, Cutting data 149

General ISO Turning

General information – ISO Turning holders 150
QC Toolholders, modular, external Jetstream Tooling® 151
Toolholders, external Seco-Capto™, Jetstream Tooling® 163
Toolholders, external Seco-Capto™ 189

Toolholders, external Seco-Capto™, cassettes 235
Toolholders for MTM, Seco-Capto™, Jetstream Tooling® 238
Toolholders for MTM, Seco-Capto™ 245
Toolholders, external, Jetstream Tooling® 252
Toolholders, external 285
Toolholders, internal Seco-Capto™ 433
Toolholders, internal 453
Toolholders for boring 524
Toolholders, Cartridges 527
Cassettes for Railway wheel re-turning (RWRT) 540
General information – Turning inserts 543
Inserts 544
Inserts PCBN, PCD, Ceramics 591
Inserts PCBN 592
Inserts PCBN with chipbreaker 616
Inserts PCD 618
Inserts Ceramic 622

Steadyline®

General information 625
Steadyline®, damping holders for GL-heads 626
Holders for GL-heads 642
Steadyline®, GL-heads, internal Jetstream Tooling® 644
Steadyline®, GL-heads, internal 651
Steadyline®, GL-heads, MDT Jetstream Tooling® 672

MDT – Multi Directional Turning

General information 676
Application overview 678
Code keys 695
Product guidance – Toolholders 702
Product guidance – Inserts 705
Product guidance – Application technique 711
Trouble Shooting – Turning problems & recommended solutions 720
Cutting data 723
Toolholders, external, Jetstream Tooling®, Seco-Capto™ 733
Toolholders, external axial, Jetstream Tooling®, Seco-Capto™ 741
Toolholders, external, Jetstream Tooling® 755
Toolholders, external axial, Jetstream Tooling® 768
Toolholders, external Seco-Capto™ 785
Toolholders, external 787
Toolholders, external axial 804
Toolholders, internal Seco-Capto™ 811
Toolholders, internal 818

Toolholders for MTM, Jetstream Tooling®, Seco-Capto™ 826
Holders, external for modular blades, Seco-Capto™ 828
Holders, external for modular blades 829
Holders, internal for modular blades, Seco-Capto™ 831
Holders, internal for modular blades 832
Blades, modular 834
Blades, modular axial 835
Reinforced blades, radial, Jetstream Tooling® 839
Reinforced blades, radial 840
Holder and blades 841
Inserts 842
Inserts PCBN 860

Mini-Shaft™

General information 863
Code keys 865
Product guidance 868
Cutting data 869
Holders 870
Inserts 872

Grooving

General information 884
Code keys 885
Product guidance 887
Cutting data 891
Toolholders for MTM, Seco-Capto™ 893
Toolholders, external 894
Toolholders, internal 899
Toolholders MDT, ext. for Secomax ceramic inserts 905
Inserts 906
Inserts Ceramic 917

Parting-off – 150.10

General information 918
Code keys 919
Product guidance 920
Cutting data 926
Toolholders and blades, Jetstream Tooling® 931
HSS- blades 939
Adapters, Seco-Capto™, Jetstream Tooling® 942
Adapters, HSK-T, Jetstream Tooling® 944

Adapters, VDI Jetstream Tooling® 945
Inserts 947

X2

General information 949
Code keys 952
Cutting data 954
Toolholders, external 955
Inserts 957

X4

General information 965
Code keys 967
Product guidance 970
Cutting data 972
Toolholders, external – Jetstream Tooling® Duo, Seco-Capto™ 975
Toolholders, external – Jetstream Tooling® Duo 976
Toolholders, external 979
Blades 981
Inserts 982
Inserts PCBN 987

Adapters

General information 988
Adapters for shank tools, Jetstream Tooling®, Seco-Capto™ 989
Adapters for shank tools, Jetstream Tooling®, HSK-T 996
Adapters for shank tools, Jetstream Tooling®, VDI 999
Adapters for shank tools, Seco-Capto™ 1001
Mini-turret for shank tools, Seco-Capto™ 1006
Adapters for solid boring bars, Seco-Capto™ 1008
Adapters for solid boring bars 1011
Adapters for boring tools 1012

Seco-Capto™, Clamping units

General information 1013
Selection of clamping unit 1014
Type 2085 1018
Type 2000/3000 1019
Type VDI, angled 1021
Type VDI, straight 1022
Type 2090 1023

Spare parts

Seco-Capto™, Clamping units 1024

Accessories

Jetstream Tooling® 1029
Seco-Capto™ 1031

Screw torque keys

Torque values 1032
Torque key range 1033

Workpiece materials

Classification, SMG 1034

1
131- ... 1012
132N ... 1011
150.10 ... 939,941
150.10-..JETI ... 937-938
150.10A-..JETI ... 931,935-936

A
A..-CGER/L ... 818-819
A..-CGFR/L ... 818-821
A..-CGGR/L ... 820-823
A..-CGHR/L ... 818-819,824-825
A..-CGIR/L ... 820-821
A..-CGJR/L ... 818-819,824-825
A..-DDUNR/L..-C ... 523
A..-DWLNR/L..-C ... 453
A..-FR/L ... 832-833
A..-MCLNR/L ... 501
A..-MDUNR/L ... 503
A..-MTFNR/L ... 507
A..-MVLNR/L ... 511
A..-MVPNR/L ... 511
A..-MVUNR/L ... 512
A..-MWLNR/L ... 515
A..-PCLNR/L ... 454-455
A..-PDQNR/L ... 479-480
A..-PDUNR/L ... 457-458
A..-PDYNR/L ... 487
A..-PTFNR/L ... 461-462
A..-PVLNR/L ... 463-464
A..-PVPNR/L ... 463-464
A..-PWLNR/L ... 465-466
A..SCFCR/L ... 470-471
A..-SCFCR/L ... 467-468
A..-SCFCR/L..-R ... 467
A..-SCFDR/L ... 475
A..-SCLCR/L ... 470,472-473
A..-SCLCR/L..-R ... 472-473
A..-SCLDR/L ... 475
A..-SDQCR/L ... 477,484
A..-SDQCR/L..-R ... 477
A..-SDQNR/L ... 479-480
A..-SDUCR/L ... 481-482,484
A..-SDUCR/L..-R ... 481
A..-SDUNR/L ... 483,485
A..-SDXCR/L ... 486
A..-SDYNR/L ... 487
A..-SGXN ... 870-871
A..-SGXN..-R ... 870
A..-SRXCR/L ... 488
A..-STFCR/L ... 489-491
A..-STFDR/L ... 493
A..-STLDR/L ... 493
A..-STUCR/L ... 491
A..-SVBUR/L ... 497
A..-SVQBR/L ... 495-497
A..-SVUBR/L ... 495
A..-SWLCR/L ... 498
ASHA-R/L..-JETI ... 999-1000

B
BA..-C ... 640
BA..-GL ... 638-639
BA..-SQ ... 641

C
C.-131 ... 1008-1010
C.-150.10...JETI ... 943
C.-ASHA ... 1002
C.-ASHA..-M ... 1001
C.-ASHA...JETI ... 989-990
C.-ASHR/L ... 1003,1005-1007
C.-ASHR/L...JETI ... 991-992,994-995
C.-ASHS ... 1004
C.-ASHS...JETI ... 993
C.-CCLNR/L ... 229
C.-CDIR/L...JETI ... 826-827
C.-CER/L ... 893
C.-CER/L-..HD ... 893
C.-CFIR/L ... 785-786
C.-CFIR/L...JETI ... 733-734
C.-CFIR/L...JET ... 741-744
C.-CFMR/L...JETI ... 735-736
C.-CFOR/L...JETI ... 737-738
C.-CFOR/L...JET ... 745-754
C.-CFXN...JETI ... 740
C.-CFZN...JETI ... 740
C.-CFZR/L...JETI ... 739
C.-CGER/L ... 811-812
C.-CGFR/L ... 811-814
C.-CGGR/L ... 813-814,816-817
C.-CGHR/L ... 811-812,815
C.-CGIR/L ... 813-814
C.-CGJR/L ... 811-812,815
C.-CRSNR/L ... 230-231
C.-CRSNR/L-.C ... 234
C.-CSDNN ... 232
C.-CTJNR/L ... 233
C.-CTUNR/L ... 452
C.-CXXXR/L-CT10 ... 235
C.-D..-BA ... 631
C.-D..-GL ... 629-630
C.-DCKNR/L..-M ... 189-190
C.-DCLCR/L...JETI2 ... 163
C.-DCLNR/L ... 191
C.-DCLNR/L..-M ... 191-192
C.-DCLNR/L...JETI2 ... 164-165
C.-DCMCN...JETI ... 238
C.-DCMNN...JETI ... 239
C.-DCMNN..-M ... 245
C.-DCRNR/L ... 193
C.-DCRNR/L..-M ... 193-194
C.-DCRNR/L...JETI2 ... 166
C.-DDJCR/L...JETI2 ... 167
C.-DDJNR/L ... 195-196
C.-DDJNR/L..-M ... 195-196
C.-DDJNR/L...JETI2 ... 168-169
C.-DDMNR/L...JETI ... 240-241
C.-DDMNR/L..-M ... 246
C.-DDNNN..-M ... 197
C.-DDUNR/L ... 198-199
C.-DDUNR/L..-M ... 198-199
C.-DDUNR/L...JETI2 ... 170
C.-DMNR/L...JETI ... 240-241
C.-DRDCN...JETI ... 171,242
C.-DRSCR/L...JETI ... 172-173
C.-DRSNR/L..-M ... 200
C.-DSDNN..-M ... 201
C.-DSKNR/L ... 202
C.-DSKNR/L..-M ... 202
C.-DSRNR/L ... 203
C.-DSRNR/L..-M ... 203
C.-DSSNR/L ... 204-205
C.-DSSNR/L..-M ... 204-205
C.-DSSNR/L...JETI2 ... 174
C.-DTFNR/L..-M ... 206
C.-DTGNR/L..-M ... 207
C.-DTJNR/L..-M ... 208
C.-DTJNR/L...JETI2 ... 175
C.-DVHBR/L...JETI2 ... 176
C.-DVJBR/L...JETI2 ... 177
C.-DVJNR/L ... 209
C.-DVJNR/L...JETI2 ... 178
C.-DVMBR/L...JETI ... 243
C.-DVMNL..-M ... 247
C.-DVMNR/L...JETI ... 244
C.-DVVBN...JETI2 ... 179
C.-DWLNR/L ... 210-211
C.-DWLNR/L...JETI2 ... 180

C.-FL-V21 828,831
C.-FR-V21 828,831
C.-GL-V21 828
C.-GR-V21 828
C.-LC2030..-M 1021-1022
C.-LC2040 1021-1022
C.-LC2050 1021-1022
C.-LC2060 1021-1022
C.-LC2085 1018
C.-LC2085..-M 1018
C.-LC2090 1023
C.-LC2090..-M 1023
C.-MCLNR/L 181-182
C.-MDJNR/L 184
C.-MRDCN 186
C.-MRSCR/L 185
C.-MSDNN 183
C.-MSRNR/L 187
C.-MSSNR/L 188
C.-MVUNR/L 437-438
C.-NC2000 1019-1020
C.-NC3000 1019-1020
C.-PCLNR/L 212,433-434
C.-PDQNR/L 443
C.-PDUNR/L 435,447-448
C.-PSKNR/L 213
C.-PSRNR/L 214
C.-PTFNR/L..-W 436
C.-PVUNR/L 437-438
C.-PWLNN 248
C.-PWLNR/L 215-216,439-440
C.-R/L150.10...JETI 942
C.-R/LC2030..-M 1021-1022
C.-R/LC2040 1021-1022
C.-R/LC2050 1021-1022
C.-R/LC2060 1021-1022
C.-R/LC2085 1018
C.-R/LC2085..-M 1018
C.-R/LC2090 1023
C.-R/LC2090..-M 1023
C.-SCLCR/L 217-218,441-442
C.-SCMCN 249
C.-SDJCR/L 219
C.-SDNCN 220
C.-SDQNR/L 443
C.-SDUCR/L 444-445
C.-SDUCR/L-..X 446
C.-SDUNR/L 447-448
C.-SR/L-V21 828
C.-SRDCN 250
C.-SRDCN-..A 221-222
C.-SRSCR/L 223-224
C.-SR-V21 828
C.-STFCR/L 449
C.-SVHBR/L 225
C.-SVJBR/L 226-227
C.-SVMBR/L 251
C.-SVQBR/L 450-451
C.-SVVBN 228
C.-X4FR/L...JET 975
CCBNR/L 413
CCLNR/L 413-414
CCLNR/L..-C 415
CDJNR/L 416
CDNNN 416
CEAR/L 898
CEAR/L...D 897
CEAR/L...HD 897
CEAR/L...QHD 897
CEAR/L...QHD 897
CER/L...D 894-895
CER/L...QHD 894-895
CER/L..Q 896
CER/L..QHD 896
CFHN 841
CFIN 841
CFIR/L 787-790,804-807
CFIR/L...JET 756,769,772,774
CFIR/L...JETI 755,768,770-771
CFIR/L..JET 757-758,773-774
CFJN 841
CFKN 841
CFKR/L..M-..C 905
CFLN 841
CFLR/L..M-..C 905
CFMR/L 791-794
CFMR/L...JET 759
CFMR/L...JETI 761
CFMR/L..JET 760
CFNN 841
CFOR/L 795,798-799
CFOR/L...JET 762,777,782
CFOR/L...JETI 775-776,780-781
CFOR/L-..C 905
CFOR/L..JET 763,778-779,783-784
CFOR/L.ITX...JET 839
CFPR/L 795-796
CFQR/L.ITX...JET 839
CFSR/L 798-801
CFSR/L...JETI 764
CFSR/L..JET 765
CFTR/L 795-796
CFTR/L.ITX 840
CFTR/L.ITX...JET 839
CFXR/L.ITX 840
CFZR/L 802-803
CFZR/L...JETI 766
CFZR/L..JET 767
CFZR/L.ITX 840
CGIR/L 808-810
CIIR/L 797
CNR/L 903-904
CNR/L...A 901-902
CNR/L...DA 901-902
CNR/L..AHD 903-904
CNR/L..H 903-904
CNR/L...AHD 901-902
CRDCN..C 417
CRDNN 418,420
CRDNN..C 422
CRSNR/L 420-421
CRSNR/L..C 422
CSBNR/L 423
CSDNN 424-425
CSKNR/L 424
CSSNR/L 426
CT..-CCLNX 236
CT..-CRSNX 237
CTFNR/L 428-429
CTGNR/L 419
CTGNR/L..-PL 427
CTJNR/L 428-429
CT-PLANR/L 540
CT-PLFNR/L 542
CVVNN 430

D
D..-BA 636,643
D..-GL 632-633,642
DA..-BA 637
DA..-GL 634-635
DCBNR/L..JETI 252
DCBNR/L..-M 285-286
DCKNR/L 289
DCKNR/L..-M 287-288
DCLCR/L..JETI 253
DCLCR/L..XJETI 254-255
DCLNR/L 292-293

DCLNR/L..JETI 256
DCLNR/L..-M 290-291
DCLNR/L..XJETI 257
DDHNR/L 294
DDJCR/L...JETI 258
DDJCR/L..XJETI 259
DDJNR/L 295-297
DDJNR/L...JETI 260-261
DDJNR/L..-M 295-296
DDJNR/L..XJETI 262
DDNNN..-C 298
DDPNN 299
DDQNR/L 300
DRDCN..JETI 263-264
DRGNR/L 301
DRSCR/L..JETI 265-266
DRSNR/L..-M 302
DSBNR/L..-M 303
DSDNN 305
DSDNN..-M 304
DSKNR/L 307
DSKNR/L..-M 306
DSSNR/L 310
DSSNR/L..-C 431
DSSNR/L..JETI 267
DSSNR/L..-M 308-309
DSSNR/L..XJETI 268
DTFNR/L 313
DTFNR/L..-M 311-312
DTGNR/L 315
DTGNR/L..-M 314
DTJNR/L 316
DTJNR/L..JETI 269
DTJNR/L..XJETI 270
DVJBR/L...JETI 271
DVJBR/L..XJETI 272
DVJNR/L 317-319
DVJNR/L..JETI 273
DVJNR/L..XJETI 274
DVPNR/L 320-321
DWLNR/L 322-325
DWLNR/L...JETI 275
DWLNR/L..-C 432
DWLNR/L..XJETI 276

E
E..-SCFCR/L..-R 469
E..-SCLCR/L 474
E..-SGXN 870-871
E..-SGXN..-R 870
E..-STFCR/L 492
E9364-ASHA-..JETI 996-997
E9364-ASHR/L-..JETI 998
E9364-R/L150.10-..JETI 944
E9374-D..-GL 626-627
E9376-D..-BA 628
E9376-D..-GL 626

F
FR/L 829-830

G
GL..-CCLNR/L 669
GL..-CGGR/L-..JET 674
GL..-CGHR/L-..JET 675
GL..-CGIR/L-..JET 672,675
GL..-CGJR/L-..JET 673
GL..-CRSNR/L 670
GL..-CTUNR/L 671
GL..-DCLCR/L-..JET 644
GL..-DCLNR/L 651
GL..-DCLNR/L-..JET 645
GL..-DDUCR/L-..JET 646
GL..-DDUNR/L 652
GL..-DDUNR/L-..JET 647-648
GL..-DVUBR/L-..JET 649
GL..-DWLNR/L 653
GL..-DWLNR/L-..JET 650
GL..-SCLCR/L 654-656
GL..-SDUCR/L 657-658
GL..-SDUCR/L-..X 659-660
GL..-SDUNR/L 661
GL..-SDXCR/L 662-663
GL..-STFCR/L 664-665
GL..-SVUBR/L 666-667
GL..-SVUNR/L 668
GR/L 829-830

H
H..-SCLDR/L 476
H..-STLDR/L 494
HSKTA..-GL 626-627

M
MCFNR/L..CA 535
MCKNR/L 387
MCLNR/L 388
MCLNR/L..CA 535
MCLNR/L..JETI 277,279
MCMNN 389
MCRNR/L 390
MDJNR/L 391
MRDCN..JETI 282-283
MRGNR/L 392
MRGOR/L 393
MSBNR/L 394
MSBNR/L..JETI 280
MSDNN 395-396
MSDNN..JETI 281,284
MSKNR/L..CA 536
MSRNR 397
MSRNR/L 398
MSRNR/L..JETI 278
MSSNR/L..CA 536-537
MSTNR/L..CA 537
MTCNN 399
MTENNS 400
MTFNR/L 401
MTFNR/L..CA 538-539
MTGNR/L 402
MTJNR/L 403
MTLNR/L 404
MVJNR/L 405
MVLNR/L 406
MVTNR/L 407
MWLNR/L 408-409

N
N..F-QC 151-153

P
PCBNR/L 326
PCLNR/L 327-328
PDJNR/L 329-330
PDNNR/L 331
PRDCN 332
PROON 333
PSBNR/L 334-335
PSDNN 336
PSKNR/L 336
PSSNR/L 337
PTBNR/L 338
PTGNR/L 340-341
PTGNR/L-..A 340-341
PTJNR/L 342-343
PTNNR/L 339,344
PWLNR/L 345-346

Q
QC..-CFOR/L...JET 159
QC..-PER/L-..HDJET 162

QC..-R/L150.10...JETI ... 160
QC..-SCLCR/L...JET ... 154
QC..-SDJCR/L...JET ... 155
QC..-SDJNR/L...JET ... 156
QC..-SVJBR/L...JET ... 157
QC..-SVJCR/L...JET ... 158
QC..-X2...JETI ... 161

R
R/L150.10 ... 939-941
R/L150.10-..JETI ... 932-933
R/L150.10A-..JETI ... 931
R/L150.10-VDI..JETI ... 945-946
R/L150.10X-..JETI ... 934
R/L175.32 ... 541

S
S..-CCLNR/L ... 518
S..-CRSNR/L ... 519
S..-CSKNR/L ... 520
S..-CTFPR/L ... 521
S..-CTUNR/L ... 522
S..-MCLNR/L ... 499-500,502
S..-MDUNR/L ... 504
S..-MSKNR/L ... 505
S..-MTFNR/L ... 506,508
S..-MTUNR/L ... 509
S..-MVLNR/L ... 510
S..-MVPNR/L ... 510
S..-MVYNR/L ... 513
S..-MWLNR/L ... 514,516-517
S..-PCLNR/L ... 456
S..-PDUNR/L ... 459
S..-PSKNR/L ... 460
S..-SCACR/L ... 525
S..-SCDCR/L ... 526
S..-SCECR/L ... 525
S..-SCLDR/L ... 476
S..-SDQCR/L ... 478
S..-STFDR/L ... 494
S..-STLDR/L ... 494
SCACR/L ... 347,524
SCBCR/L ... 348
SCDCR/L ... 349
SCECL ... 524
SCFCR/L ... 349
SCFCR/L..CA ... 527
SCGCR/L ... 350-351
SCGCR/L..CA ... 528
SCLCR/L ... 352-355
SCLCR/L..CA ... 527
SCMCN ... 356
SCRCR/L ... 357
SCRCR/L..CA ... 529
SCSCR/L..CA ... 528
SCTCR/L..CA ... 529
SDACR/L ... 358
SDHCR/L ... 359-360
SDJCR/L ... 361-363
SDNCN ... 364
SDPCN ... 365
SFN ... 841
SL16 ... 1012
SNR/L ... 899-900
SR/L ... 830
SR/L..-V21 ... 829
SRDCN ... 366-367
SRGCR/L ... 368-369
SRSCR/L ... 370-371
SSBCR/L ... 374
SSDCN ... 372-373
SSKCR/L..CA ... 530
STFCR/L ... 375
STFCR/L..CA ... 531-532
STGCR/L ... 375-377
STGCR/L..CA ... 533-534
STJCR/L ... 378
STRCR/L..CA ... 533
STSCR/L..CA ... 531-532
STTCR/L..CA ... 533
SVABR/L ... 381
SVJBR/L ... 379-380
SVJCR/L ... 381
SVLBR/L ... 382-383
SVVBN ... 383-385
SWLCR/L ... 386

T
TRAOR/L ... 410-411
TRDON ... 410
TRGOR/L ... 412
TROON ... 411

V
V21-CHR/L ... 835-838
V21-CIR/L ... 834-838
V21-CJR/L ... 835,837
V21-CKR/L ... 835,837
V21-CMR/L ... 834-838
V21-COR/L ... 835,837

X
X2-FR/L ... 955-956
X4FR/L ... 979-980
X4FR/L...JET ... 977
X4FR/L...JETI ... 976
X4FR/L..JET ... 978
X4FR/L.ITX ... 981

1
10EAR/L / ..FA ... 909
10ER / ..D76 ... 912
10ER / ..FD ... 910
10ER / ..FG ... 907
10ER / ..R ... 913
10FG ... 907
10NR / ..D76 ... 912
10NR / ..FD ... 911
10NR / ..FG ... 908
10NR / ..R ... 913
12EAR/L / ..FD ... 909
12ER / ..FD ... 910
12NR / ..FD ... 911
14EAR/L / ..AX ... 915
14EAR/L / ..FA ... 909
14EAR / ..AX ... 915
14ER / ..D76 ... 912
14ER / ..DY ... 916
14ER / ..FG ... 907
14ER / ..R ... 913
14ER / ..ST ... 914
14NR / ..D76 ... 912
14NR / ..DY ... 916
14NR / ..FG ... 908
14NR / ..R ... 913
14NR / ..ST ... 914
150.10 ... 947-948

2
20EAR/L / ..FA ... 909
20EAR / ..AX ... 915
20ER / ..D76 ... 912
20ER / ..DY ... 916
20ER / ..FG ... 907
20ER / ..R ... 913
20ER / ..ST ... 914
20NR / ..D76 ... 912
20NR / ..FG ... 908
20NR / ..R ... 913
20NR / ..ST ... 914
26ER / ..FG ... 907
26ER / ..R ... 913
26ER / ..ST ... 914
26NR / ..FG ... 908
26NR / ..R ... 913
26NR / ..ST ... 914

9
9NR/L / ..FG ... 906

C
CCGT ... 544-546,616
CCGW ... 592-593
CCGX ... 544
CCMT ... 544-546
CCMW ... 618
CDCB ... 547
CNGA ... 594-595
CNGG ... 548-550
CNGM ... 616
CNGN ... 622
CNMA ... 548-552
CNMG ... 548-553
CNMM ... 548,550-553
CNMN ... 596
CPMT ... 553-554

D
DCGT ... 555-557
DCGW ... 597
DCMT ... 555-557
DCMW ... 619
DCMX ... 555-556
DNGA ... 598
DNGG ... 558-561
DNGM ... 558-559,617
DNGN ... 599
DNMA ... 558-561,599
DNMG ... 558-561
DNMM ... 558,561
DNMN ... 600
DNMU ... 558-559
DNMX ... 558-559,561

L
LCEX ... 872-883
LCGA ... 844
LCGF ... 843,852-854
LCGN ... 854-862
LCMF ... 842-843,845-849
LCMR ... 842-843,848,850-851
LNMX ... 562-563
LPGN ... 917

R
RCGN ... 619
RCGS ... 563,600
RCGT ... 564-565
RCGX ... 622
RCMM ... 564-565
RCMT ... 564-565
RCMX ... 564-565
RNGN ... 601,620,623
RNMA ... 566
RNMF ... 566
RNMG ... 566
RNMN ... 602
RPGN ... 623
RPGX ... 624

S
SCGW ... 603
SCMN ... 603
SCMT ... 567-568
SNGA ... 604
SNGF ... 604
SNGN ... 605
SNMA ... 569-571
SNMG ... 569-572
SNMM ... 569-572
SNMN ... 606
SPGW ... 607

T
TCGN ... 607
TCGT ... 573
TCGW ... 608
TCMT ... 573-574
TCMW ... 620
TCMX ... 573-574
TDAB ... 574
TDCH ... 574
TNGA ... 609
TNGN ... 610
TNGX ... 611
TNMA ... 575-577
TNMG ... 575-578
TNMM ... 575-578
TNMN ... 611
TNMX ... 575-576,612
TPGN ... 579,612,621
TPMM ... 580
TPMR ... 581
TPUN ... 582

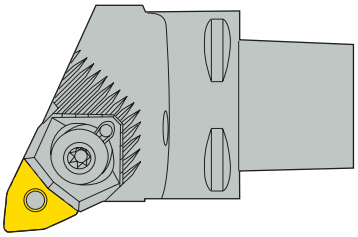
V
VBGT ... 583-584
VBGW ... 613
VBMT ... 583-584
VBMW ... 621
VCGT ... 584

VNGA 614
VNGG 585-586
VNGM 585
VNMA 585-586,614
VNMG 585-586
VNMU 585

W
WCMT 586
WNGA 615
WNGG 587-588
WNMA 587-589,615
WNMG 587-590
WNMM 587,589

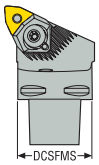
X
X2GA 957-964
X4G 987
X4GK 982-986

Seco-Capto™ – External toolholders – Metric

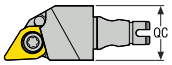


C4	-	P	W	L	N	R	-	27	050	-	06	-	
1		2	3	4	5	6		7	8		9		10

1. Seco-Capto™ and QC size



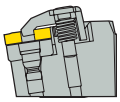
C3 = 32 mm / *1.260 inch*
C4 = 40 mm / *1.575 inch*
C5 = 50 mm / *1.969 inch*
C6 = 63 mm / *2.480 inch*
C8 = 80 mm / *3.150 inch*
C10 = 100 mm / *3.937 inch*



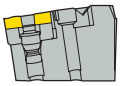
QC12 = 12 mm / *0.472 inch*
QC16 = 16 mm / *0.630 inch*

2. Insert clamping

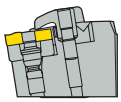
D Clamp/inserts with center hole



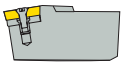
P Pin/Wedge or Lever



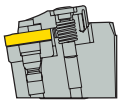
M Pin/Clamp



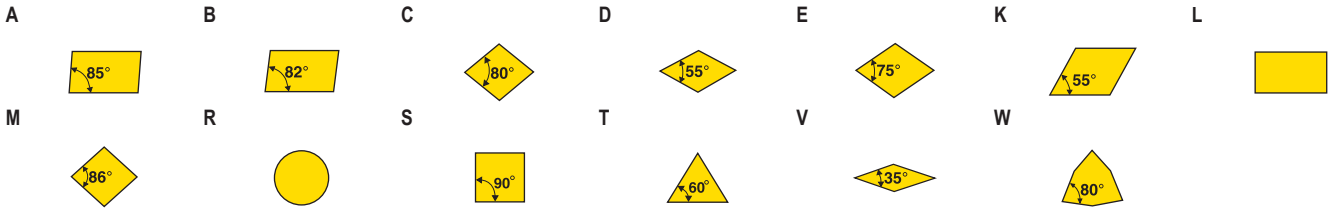
S Screw



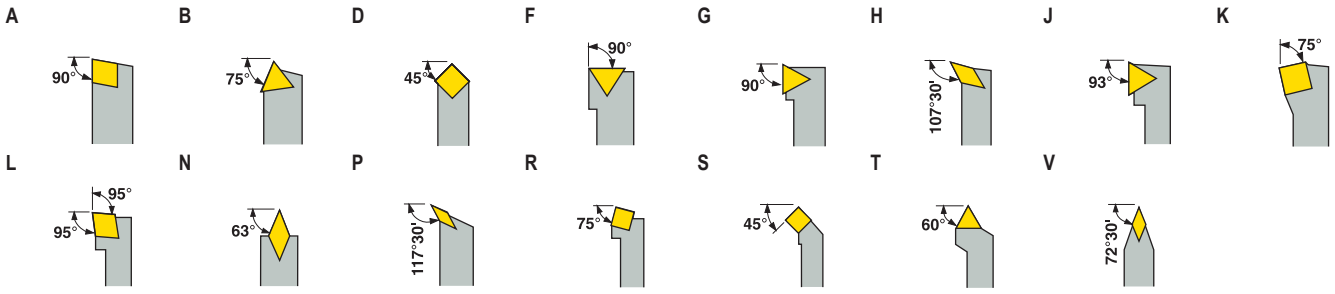
C Clamp



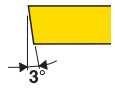
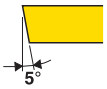
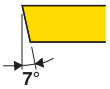
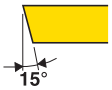
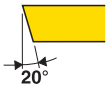
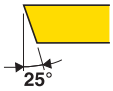
3. Insert shape

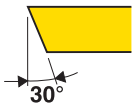
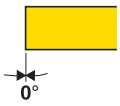
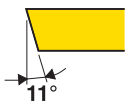


4. Tool type



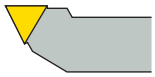
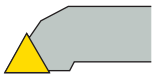
5. Insert side clearance angle

A	B	C	D	E	F
					
3°	5°	7°	15°	20°	25°

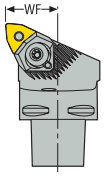
G	N	P
		
30°	0°	11°

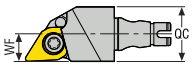
O = Special

6. Cutting direction

L	N	R
		

7. WF-dimension

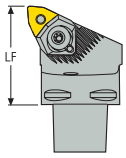




22 = 22 mm / *0.866 inch*
27 = 27 mm / *1.063 inch*
35 = 35 mm / *1.378 inch*
45 = 45 mm / *1.772 inch*
etc.

QC12 = WF 6 mm / *0.240 inch*
QC16 = WF 8 mm / *0.315 inch*

8. LF-dimension



040 = 40 mm / *1.575 inch*
042 = 42 mm / *1.654 inch*
044 = 44 mm / *1.732 inch*
050 = 50 mm / *1.969 inch*
060 = 60 mm / *2.362 inch*
etc.

N/A for QC toolholder

9. Cutting edge length

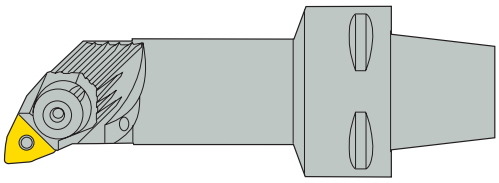
A, B, K	C, D, E, M, V	L	R	S	T	W
						
L	L	L	INSD	L	L	L

10. Internal designation

JET = Jetstream Tooling®
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet
JETL = Jetstream Tooling® with P-lever clamp

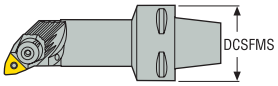
-PL = Plunging
X = Back boring

Seco-Capto™ – Internal toolholders and modular GL-turning heads – Metric

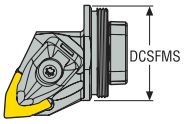


C4	P	W	L	N	R	-	13	080	-	06	-	
1	2	3	4	5	6		7	8		9		10

1. Seco-Capto™ and GL size



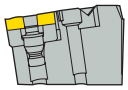
C3 = 32 mm / *1.260 inch*
C4 = 40 mm / *1.575 inch*
C5 = 50 mm / *1.969 inch*
C6 = 63 mm / *2.480 inch*
C8 = 80 mm / *3.150 inch*



GL25 = 25 mm / *0.984 inch*
GL32 = 32 mm / *1.260 inch*
GL40 = 40 mm / *1.575 inch*
GL50 = 50 mm / *1.969 inch*

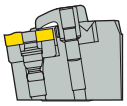
2. Insert clamping

P



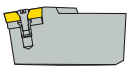
Pin/Wedge or Lever

M



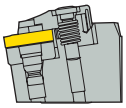
Pin/Clamp

S



Screw

C



Clamp

3. Insert shape

A



B



C



D



E



K



L



M



R



S



T



V

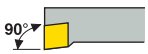


W



4. Tool type

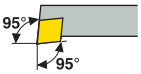
F



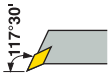
K



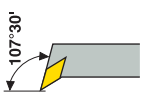
L



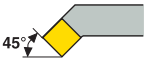
P



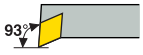
Q



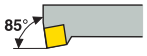
S



U

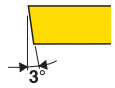
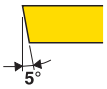
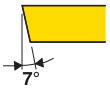
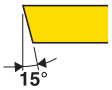
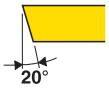
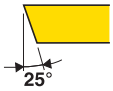


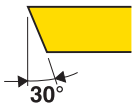
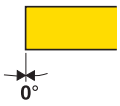
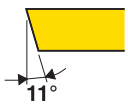
Y



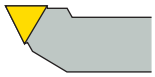
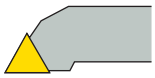
X = Special

5. Insert side clearance angle

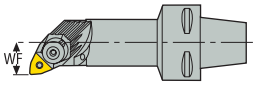
A	B	C	D	E	F
					
3°	5°	7°	15°	20°	25°

G	N	P	
			O = Special
30°	0°	11°	

6. Cutting direction

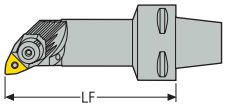
L	R
	

7. WF-dimension



11 = 11 mm / *0.433 inch*
13 = 13 mm / *0.512 inch*
17 = 17 mm / *0.669 inch*
22 = 22 mm / *0.866 inch*
etc.

8. LF-dimension



064 = 64 mm / *2.520 inch*
065 = 65 mm / *2.559 inch*
070 = 70 mm / *2.756 inch*
075 = 75 mm / *2.953 inch*
etc.

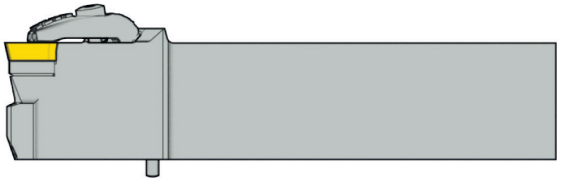
9. Cutting edge length

A, B, K	C, D, E, M, V	L	R	S	T	W
						
L	L	L	INSD	L	L	L

10. Internal designation

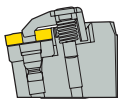
PL = Plunging
X = Back boring
JET = Jetstream Tooling®
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet

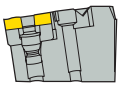
External toolholders – Metric (ISO)

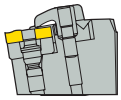


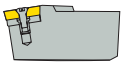
D	W	L	N	R	25	25	X	06	JETI
1	2	3	4	5	6	7	8	9	10

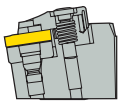
1. Insert clamping

D 
Clamp/inserts with center hole

P 
Pin/Wedge or Lever

M 
Pin/Clamp

S 
Screw

C 
Clamp

2. Insert shape

A 

B 

C 

D 

E 

K 

L 

M 

R 

S 

T 

V 

W 

3. Tool type

A 

B 

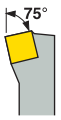
D 

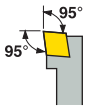
F 

G 

H 

J 

K 

L 

N 

P 

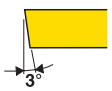
R 

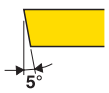
S 

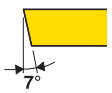
T 

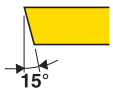
V 

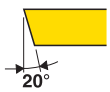
4. Insert side clearance angle

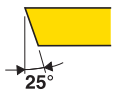
A 

B 

C 

D 

E 

F 

G

N

P

O = Special

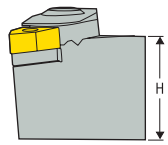
5. Cutting direction

L

N

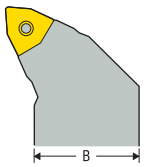
R

6. Shank height



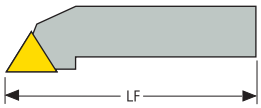
12 = 12 mm / *0.470 inch*
25 = 25 mm / *0.984 inch*
32 = 32 mm / *1.260 inch*
etc.

7. Shank width



12 = 12 mm / *0.470 inch*
25 = 25 mm / *0.984 inch*
32 = 32 mm / *1.260 inch*
etc.

8. Tool length



A = 32 mm / *1.260 inch*
C = 50 mm / *1.969 inch*
D = 60 mm / *2.362 inch*
E = 70 mm / *2.756 inch*
F = 80 mm / *3.150 inch*

H = 100 mm / *3.937 inch*
K = 125 mm / *4.921 inch*
M = 150 mm / *5.906 inch*
P = 170 mm / *6.693 inch*
R = 200 mm / *7.874 inch*

S = 250 mm / *9.843 inch*
T = 300 mm / *11.811 inch*
V = 400 mm / *15.748 inch*
X = Special

Standard length as above

9. Cutting edge length

A, B, K



C, D, E, M, V



L



R



S



T



W



10. Internal designation

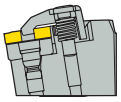
JET = Jetstream Tooling®
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet
JETL = Jetstream Tooling® with P-lever clamp
-PL = Plunging

External toolholders – Inch (ANSI)

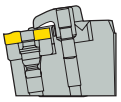


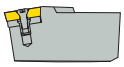
D	W	L	N	R		-	16	-	3	C	-	
1	2	3	4	5	6		7		8	9		10

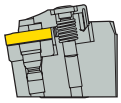
1. Insert clamping

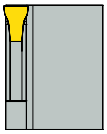
D 
Clamp/inserts with center hole

P 
Pin/Wedge or Lever

M 
Pin/Clamp

S 
Screw

C 
Clamp

T 
Tapered stem (Tee-lock)

2. Insert shape

A 

B 

C 

D 

E 

K 

L 

M 

R 

S 

T 

V 

W 

3. Tool type

A 

ANSI lead = 0°

B 

ANSI lead = 15°

D 

ANSI lead = 45°

F 

ANSI lead = 0°

G 

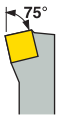
ANSI lead = 0°

H 

ANSI lead = -17°30'

J 

ANSI lead = -3°

K 

ANSI lead = 15°

L 

ANSI lead = -5°

N 

ANSI lead = 27°30'

P 

ANSI lead = -27°30'

R 

ANSI lead = 15°

S 

ANSI lead = 45°

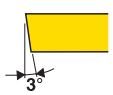
T 

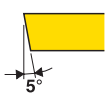
ANSI lead = 30°

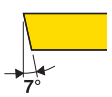
V 

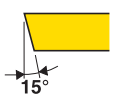
ANSI lead = 17°30'

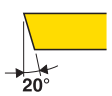
4. Insert side clearance angle

A 

B 

C 

D 

E 

F

G

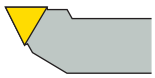
N

P

O = Special

5. Cutting direction

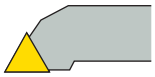
L



N



R



6. Pocket style

S = Single wall pocket construction
Full pocket construction when letter position is vacant

7. Toolholder shank size

For square shanks, the number represents the number of sixteenths of width and height. For rectangular shanks, the first digit represents the number of eighths of width and the second digit represents the number of quarters of height.

8. Insert size I.C.

Number of eights of I.C.

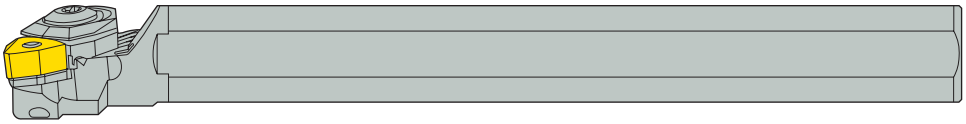
9. Qualified surface & length

A = Qualified back and end. 4” long
B = Qualified back and end. 4.5” long
C = Qualified back and end. 5” long
D = Qualified back and end. 6” long
E = Qualified back and end. 7” long
F = Qualified back and end. 8” long
J = Qualified back and end. 3.5” long
M = Qualified front and end. 4” long
N = Qualified front and end. 4.5” long
P = Qualified front and end. 5” long
R = Qualified front and end. 6” long
S = Qualified front and end. 7” long
T = Qualified front and end. 8” long
X = Special length

10. Internal designation

JET = Jetstream Tooling®
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet
JETL = Jetstream Tooling® with P-lever clamp
-PL = Plunging

Internal toolholders – Metric (ISO)



A	20	Q	-	P	W	L	N	R	06	R
1	2	3		4	5	6	7	8	9	10

1. Toolholder type

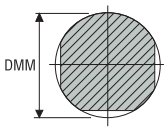
A = Steel with coolant passage

S = Solid steel

E = Solid carbide with brazed* cutting head and coolant passage

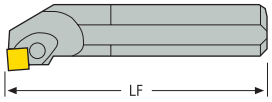
* Brazed or equivalent

2. Shank diameter



12 = 12 mm / *0.470 inch*
20 = 20 mm / *0.787 inch*
25 = 25 mm / *0.984 inch*
etc.

3. Tool length



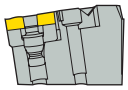
K = 125 mm / *4.921 inch*
L = 140 mm / *5.512 inch*
M = 150 mm / *5.906 inch*
N = 160 mm / *6.299 inch*
P = 170 mm / *6.693 inch*
Q = 180 mm / *7.087 inch*

Standard length as above

R = 200 mm / *7.874 inch*
S = 250 mm / *9.843 inch*
T = 300 mm / *11.811 inch*
U = 350 mm / *13.780 inch*
V = 400 mm / *15.748 inch*
X = 230 mm / *9.055 inch*

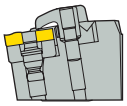
4. Insert clamping

P



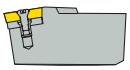
Pin/Wedge or Lever

M



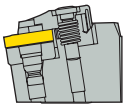
Pin/Clamp

S



Screw

C



Clamp

5. Insert shape

A



B



C



D



E



K



L



M



R



S



T



V

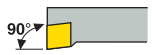


W

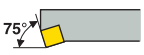


6. Tool type

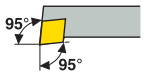
F



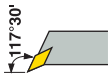
K



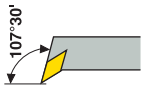
L



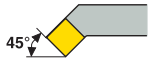
P



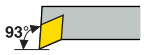
Q



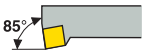
S



U



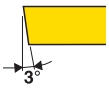
Y



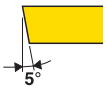
O = Special

7. Insert side clearance angle

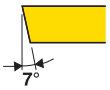
A



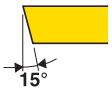
B



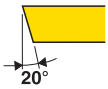
C



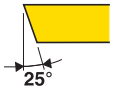
D



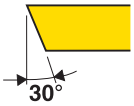
E



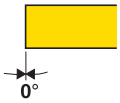
F



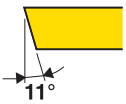
G



N



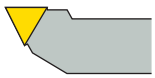
P



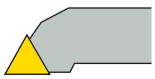
O = Special

8. Cutting direction

L



R



9. Cutting edge length

A, B, K



C, D, E, M, V



L



R



S



T



W



10. Internal designation

R = Round
W = Wedge clamping
PL = Plunging
X = Back boring

Internal toolholders – Inch (ANSI)



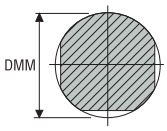
S	16		-	M	W	L	N	R	-	3
1	2	3		4	5	6	7	8		9

1. Toolholder type

A = Steel with coolant passage
C = Carbide
E = Solid carbide with brazed* cutting head and coolant passage
H = Heavy metal
J = Heavy metal with coolant hole
S = Solid steel

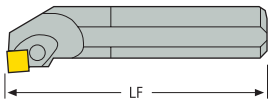
* Brazed or equivalent

2. Shank diameter



Indicates bar diameter in sixteenths of an inch
Stepped bar shows smallest diameter first

3. Tool length



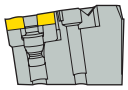
K = 125 mm / *4.921 inch*
L = 140 mm / *5.512 inch*
M = 150 mm / *5.906 inch*
N = 160 mm / *6.299 inch*
P = 170 mm / *6.693 inch*
Q = 180 mm / *7.087 inch*

R = 200 mm / *7.874 inch*
S = 250 mm / *9.843 inch*
T = 300 mm / *11.811 inch*
U = 350 mm / *13.780 inch*
V = 400 mm / *15.748 inch*
X = 230 mm / *9.055 inch*

Standard length as above

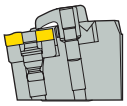
4. Insert clamping

P



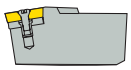
Pin/Wedge or Lever

M



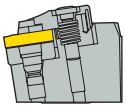
Pin/Clamp

S



Screw

C



Clamp

5. Insert shape

A



B



C



D



E



K



L



M



R



S



T



V

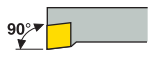


W



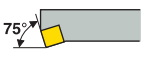
6. Tool type

F



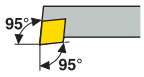
ANSI lead = 0°

K



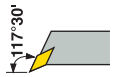
ANSI lead = 15°

L



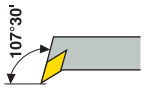
ANSI lead = -5°

P



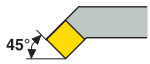
ANSI lead = -27°30'

Q



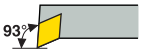
ANSI lead = -17°30'

S



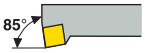
ANSI lead = 45°

U



ANSI lead = -3°

Y

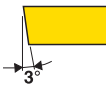


ANSI lead = 5°

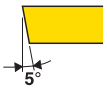
O = Special

7. Insert side clearance angle

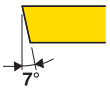
A



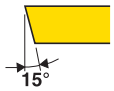
B



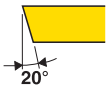
C



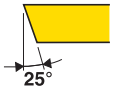
D



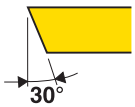
E



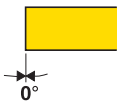
F



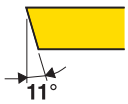
G



N



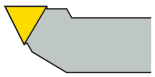
P



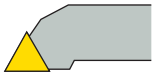
O = Special

8. Cutting direction

L



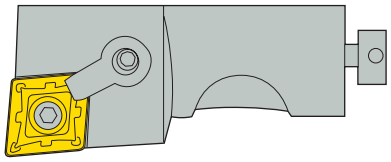
R



9. Insert size I.C.

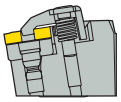
Number of eights of I.C.

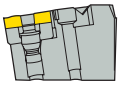
Cartridges – Inch (ANSI)

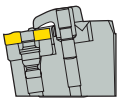


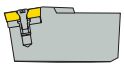
M	C	L	N	R	-	16	C	A	-	12
1	2	3	4	5		6	7	8		9

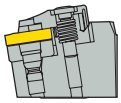
1. Insert clamping

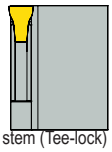
D 
Clamp/inserts with center hole

P 
Pin/Wedge or Lever

M 
Pin/Clamp

S 
Screw

C 
Clamp

T 
Tapered stem (Tee-lock)

2. Insert shape

A 

B 

C 

D 

E 

K 

L 

M 

R 

S 

T 

V 

W 

3. Tool type

A 

ANSI lead = 0°

B 

ANSI lead = 15°

D 

ANSI lead = 45°

F 

ANSI lead = 0°

G 

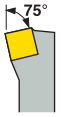
ANSI lead = 0°

H 

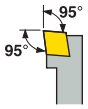
ANSI lead = -17°30'

J 

ANSI lead = -3°

K 

ANSI lead = 15°

L 

ANSI lead = -5°

N 

ANSI lead = 27°30'

P 

ANSI lead = -27°30'

R 

ANSI lead = 15°

S 

ANSI lead = 45°

T 

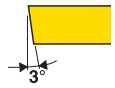
ANSI lead = 30°

V 

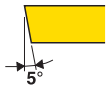
ANSI lead = 17°30'

4. Insert side clearance angle

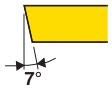
A



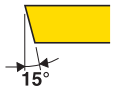
B



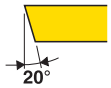
C



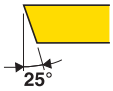
D



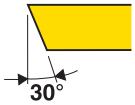
E



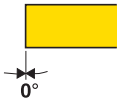
F



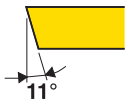
G



N



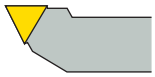
P



O = Special

5. Cutting direction

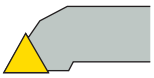
L



N



R



6. Cartridge cutting height

A Type = Length of cutting edge in millimeters
W, X & Z Type = Height in thousandths of an inch rounded (2) places

7. Thickness

C = Indicates cartridge

8. Cartridge type

A = Metric cartridge/metric components-metric hex wrench

W = Metric cartridge/metric components-Inch hex wrench

X = 90° mount cartridge

Z = Mini-cartridge

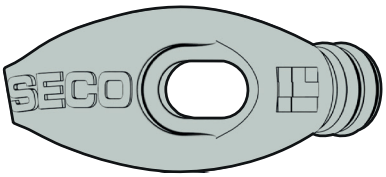
9. Insert type

A Type = Length of cutting edge in millimeters

W, X & Z Type = Insert I.C. in eighths of an inch

...JET = Jetstream Tooling®

Coolant clamps for toolholders and modular turning heads

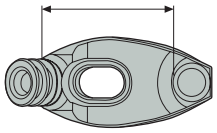


CP	14	U	20	S	-	2	R
1	2	3	4	5		6	7

1. Coolant clamp type

CN = Coolant clamp for negative inserts
CP = Coolant clamp for screw clamped inserts
CPL = Coolant clamp for screw clamped inserts, long pin
CX = Coolant clamp for custom clamping

2. Clamping length

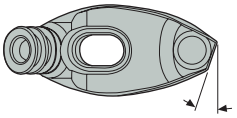


14 = 14 mm / *0.550 inch*
17 = 17 mm / *0.669 inch*
21 = 21 mm / *0.827 inch*

3. Hole diameter

U = 1,6 mm / *0.063 inch*
L = 2,2 mm / *0.085 inch*
X = Custom

4. Outlet angle



00 = 0°
10 = 10°
20 = 20°

5. Coolant clamp application type

S = Standard
R = Roughing
X = Custom

6. Number of holes

1, 2, 3 etc.

7. Orientation of outlet face

R = Right

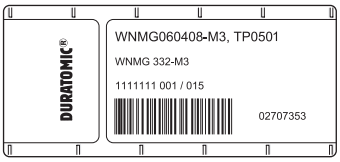


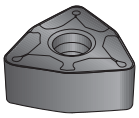
L = Left



Otherwise neutral

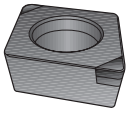
Insert series, Extract from ISO 1832 – Metric (ISO)





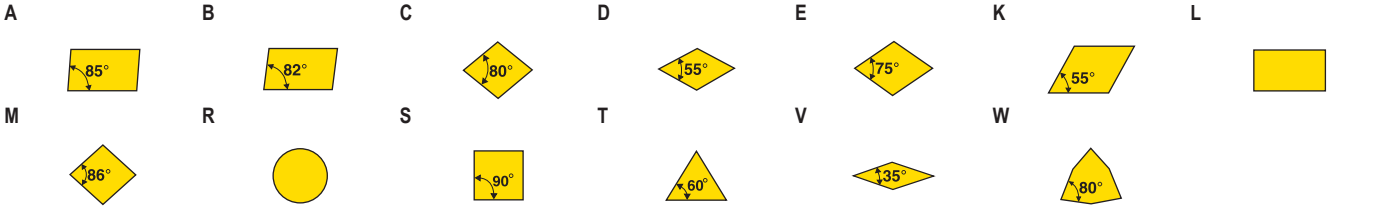
W	N	M	G	06	04	08	W	-	M3
1	2	3	4	5	6	7	8		12



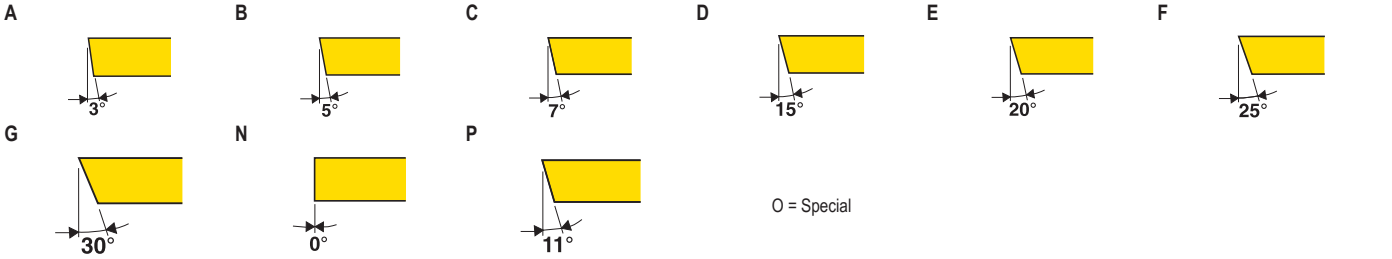


C	C	G	W	09	T3	08	S	-		-	02020	-	L1	-		-	B
1	2	3	4	5	6	7	8		9		10		11		12		13

1. Insert shape



2. Insert side clearance angle



O = Special

3. Tolerances

Tolerance class	Tolerances: +/- mm/*In* S mm	IC mm	S inch	IC inch	For IC, dimension in mm/In 3,175* 0.125	3,969	4,064	4,760 0.187	6,350 0.250	9,525 0.375	12,700 0.500	15,875 0.625	19,050 0.750	20,000	25,400 1.000	31,750 1.250	38,100 1.500
A	0,025	0,025	0.0010	0.0010	•			•	•	•	•	•	•	•	•	•	•
C	0,025	0,025	0.0010	0.0010	•	•	•	•	•	•	•	•	•	•	•	•	•
E	0,025	0,025	0.0010	0.0010	•			•	•	•	•	•	•	•	•	•	•
F	0,025	0,013	0.0010	0.0005	•			•	•	•	•	•	•	•	•	•	•
G	0,050*	0,025	0.0020	0.0010	•			•	•								
G	0,130	0,025	0.0051	0.0010						•	•	•	•	•	•	•	•
H	0,025	0,013	0.0010	0.0005	•			•	•	•	•	•	•	•	•	•	•
J	0,025	0,050	0.0010	0.0020	•			•	•	•							
J	0,025	0,080	0.0010	0.0031							•						
J	0,025	0,100	0.0010	0.0039								•	•	•			
J	0,025	0,130	0.0010	0.0051											•		
J	0,025	0,150	0.0010	0.0059												•	•
K	0,025	0,050	0.0010	0.0020	•			•	•	•							
K	0,025	0,080	0.0010	0.0031							•						
K	0,025	0,100	0.0010	0.0039								•	•	•			
K	0,025	0,130	0.0010	0.0051											•		
K	0,025	0,150	0.0010	0.0059												•	•
M	0,050*	0,050	0.0020	0.0020	•			•	•								
M	0,130	0,050	0.0051	0.0020						•							
M	0,130	0,080	0.0051	0.0031							•						
M	0,130	0,100	0.0051	0.0039								•	•	•			
M	0,130	0,130	0.0051	0.0051											•		
M	0,130	0,150	0.0051	0.0059												•	•
U	0,050*	0,080	0.0020	0.0031	•			•	•								
U	0,130	0,080	0.0051	0.0031						•							
U	0,130	0,130	0.0051	0.0051							•						
U	0,130	0,180	0.0051	0.0071								•	•	•			
U	0,130	0,250	0.0051	0.0098											•	•	•

* Not ISO

4. Fixing and/or chipbreaker

A



B



G



M



N



R



T



U



W



X = Special

5. Cutting edge length

A, B, K



C, D, E, M, V



L



R



S



T



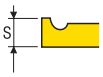
W



6. Thickness







01 = 1,59 mm / *0.063 inch*
T1 = 1,98 mm / *0.078 inch*
02 = 2,38 mm / *0.094 inch*
03 = 3,18 mm / *0.125 inch*
T3 = 3,97 mm / *0.156 inch*
04 = 4,76 mm / *0.187 inch*
05 = 5,56 mm / *0.219 inch*
06 = 6,35 mm / *0.250 inch*
07 = 7,94 mm / *0.313 inch*
08 = 8,00 mm / *0.315 inch*
09 = 9,52 mm / *0.375 inch*

7. Corner configuration



nose radius	ISO Code No.	Decimal value	ANSI Code No.	Decimal value	Fractional value
	M0	Round	00	Round	Round
	00	0,04 mm	X0	0.0015"	1/(64x10)
	01	0,1 mm	0 (0.25)	0.004"	1/(64x4)
	02	0,2 mm	0.5	0.008"	1/(64x2)
	04	0,4 mm	1	0.016"	1/64
	06	0,6 mm	1.5	0.020"	1/48
	08	0,8 mm	2	0.031"	1/32
	10	1,0 mm	2.5	0.040"	1/24
	12	1,2 mm	3	0.047"	3/64
	16	1,6 mm	4	0.062"	1/16
	20	0,8 mm	5	0.078"	5/64
	24	2,4 mm	6	0.094"	3/32
	28	2,8 mm	7	0.109"	7/64
	32	3,2 mm	8	0.125"	1/8
	40	4,0 mm	10	0.156"	5/32

8. Cutting edge condition

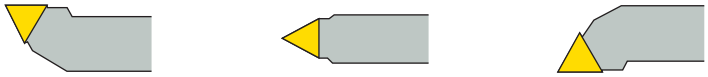
F **E** **T** **S**



W = High feed inserts
Not mandatory information

9. Cutting direction

L **N** **R**



Not mandatory information

10. Internal designation

e.g. chipbreaker designation
F = Finishing
M = Medium
R = Roughing

Not mandatory information

e.g. edge designation
e.g. 01020 = 0,1 mm x 20°

11. Manufacturers option

Tip sizes:
L0
L1
L2
LF = full-face insert (sintered layer)

Not mandatory information

12. Internal designation

Turning
e.g. chipbreaker designation
F = Finishing
M = Medium
R = Roughing
WZ = Wiper (PCBN)
etc.

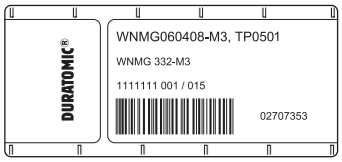
Not mandatory information

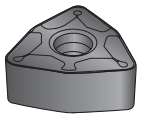
13. No. of tips

B = 2
C = 3
D = 4
U = 4 (double sided)
V = 6 (double sided)

Not mandatory information

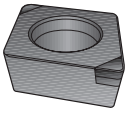
Insert series, Extract from ANSI B212 – Inch (ANSI)





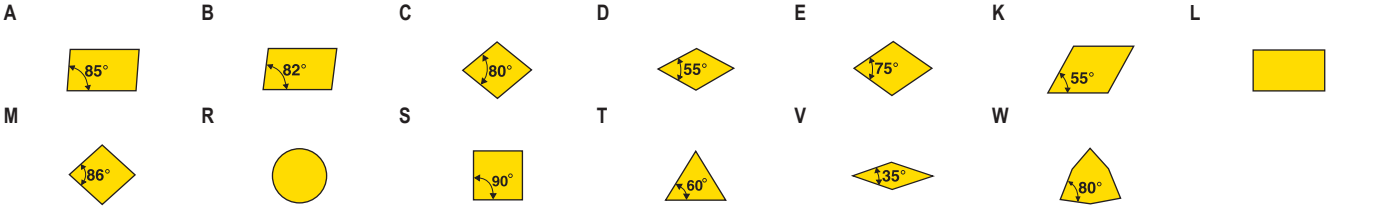
W	N	M	G	3	3	2		-	M3
1	2	3	4	5	6	7	8		9



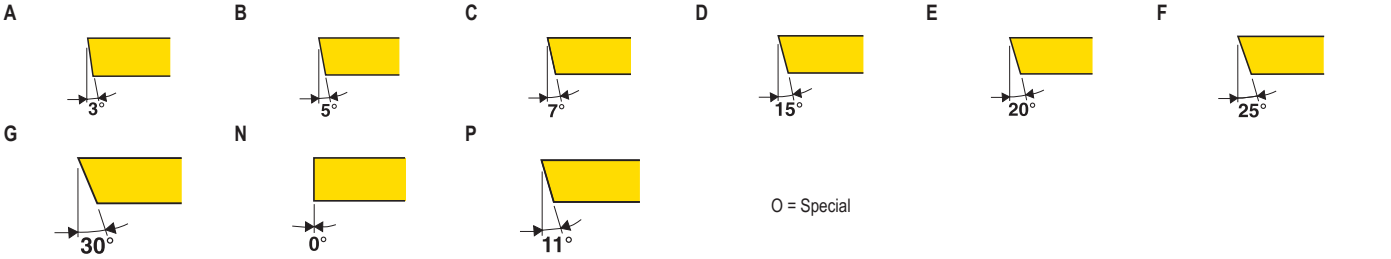


C	C	G	W	3	2.5	2	S	-		-	00820	-	L1	-		-	B
1	2	3	4	5	6	7	8		9		10		11		12		13

1. Insert shape



2. Insert side clearance angle



O = Special

3. Tolerances

Tolerance class	Tolerances: +/- mm/*In*				For IC, dimension in mm/In												
	S mm	IC mm	S inch	IC inch	0.125 3,175*	3,969	4,064	0.187 4,760	0.250 6,350	0.375 9,525	0.500 12,700	0.625 15,875	0.750 19,050	20,000	1.000 25,400	1.250 31,750	1.500 38,100
A	0,025	0,025	0.0010	0.0010	•			•	•	•	•	•	•	•	•	•	•
C	0,025	0,025	0.0010	0.0010	•	•	•	•	•	•	•	•	•	•	•	•	•
E	0,025	0,025	0.0010	0.0010	•			•	•	•	•	•	•	•	•	•	•
F	0,025	0,013	0.0010	0.0005	•			•	•	•	•	•	•	•	•	•	•
G	0,050*	0,025	0.0020	0.0010	•			•	•								
G	0,130	0,025	0.0051	0.0010						•	•	•	•	•	•	•	•
H	0,025	0,013	0.0010	0.0005	•			•	•	•	•	•	•	•	•	•	•
J	0,025	0,050	0.0010	0.0020	•			•	•	•							
J	0,025	0,080	0.0010	0.0031							•						
J	0,025	0,100	0.0010	0.0039								•	•	•			
J	0,025	0,130	0.0010	0.0051											•		
J	0,025	0,150	0.0010	0.0059												•	•
K	0,025	0,050	0.0010	0.0020	•			•	•	•							
K	0,025	0,080	0.0010	0.0031							•						
K	0,025	0,100	0.0010	0.0039								•	•	•			
K	0,025	0,130	0.0010	0.0051											•		
K	0,025	0,150	0.0010	0.0059												•	•
M	0,050*	0,050	0.0020	0.0020	•			•	•								
M	0,130	0,050	0.0051	0.0020						•							
M	0,130	0,080	0.0051	0.0031							•						
M	0,130	0,100	0.0051	0.0039								•	•	•			
M	0,130	0,130	0.0051	0.0051											•		
M	0,130	0,150	0.0051	0.0059												•	•
U	0,050*	0,080	0.0020	0.0031	•			•	•								
U	0,130	0,080	0.0051	0.0031						•							
U	0,130	0,130	0.0051	0.0051							•						
U	0,130	0,180	0.0051	0.0071								•	•	•			
U	0,130	0,250	0.0051	0.0098											•	•	•

* Not ISO

4. Fixing and/or chipbreaker

A



B



G



M



N



R



T



U



W



X = Special

5. Size

For equal sided inserts I.C. in 1/8 ths of an inch

1/8	=	1	1/2	=	4
5/32	=	1.2	5/8	=	5
3/16	=	1.5	3/4	=	6
7/32	=	1.8	7/8	=	7
1/4	=	2	1	=	8
5/16	=	2.5	1 1/4	=	10
3/8	=	3			

Rectangle and parallelogram inserts require two digits:

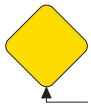
1st Digit – Number of 1/8ths in width
2nd Digit – Number of 1/4ths in length

6. Thickness

Number of 1/32nds on inserts less than 1/4" I.C.
Number of 1/16ths on inserts 1/4" I.C. and over.

7. Corner configuration

nose radius



ANSI Code No.	Decimal value	Fractional value	ISO Code No.	Decimal value
00	Round	Round	M0	Round
X0	0.0015"	1/(64x10)	00	0,04 mm
0 (0.25)	0.004"	1/(64x4)	01	0,1 mm
0.5	0.008"	1/(64x2)	02	0,2 mm
1	0.016"	1/64	04	0,4 mm
1.5	0.020"	1/48	06	0,6 mm
2	0.031"	1/32	08	0,8 mm
2.5	0.040"	1/24	10	1,0 mm
3	0.047"	3/64	12	1,2 mm
4	0.062"	1/16	16	1,6 mm
5	0.078"	5/64	20	0,8 mm
6	0.094"	3/32	24	2,4 mm
7	0.109"	7/64	28	2,8 mm
8	0.125"	1/8	32	3,2 mm
10	0.156"	5/32	40	4,0 mm

8. Cutting edge condition

F **E** **T** **S**



W = High feed inserts
Not mandatory information

9. Manufacturers option

e.g. chipbreaker designation
F = Finishing
M = Medium
R = Roughing
1 = For low feed rates and easy conditions
2 = For high feed rates and rough conditions

Introduction to choose product

To choose turning products can be quite a comprehensive task if every single detail should be taken into account. Since we have chosen turning the sought shape is basically well-turned or using the technical term a rotational symmetric component.

The present section will focus on coated cemented carbide applications and there is a separate section for advanced materials applications such as PCBN, PCD and Ceramics, but there are of course topics general for turning.

First steps – the Secolor® principle

Seco has a long tradition to work in accordance with the principle attributed to Albert Einsten in the 1950´s: "Everything should be made as simple as possible, but not simpler". However, it should always be easy to be successful, but the more detailed the requirements, the more details need to be considered.

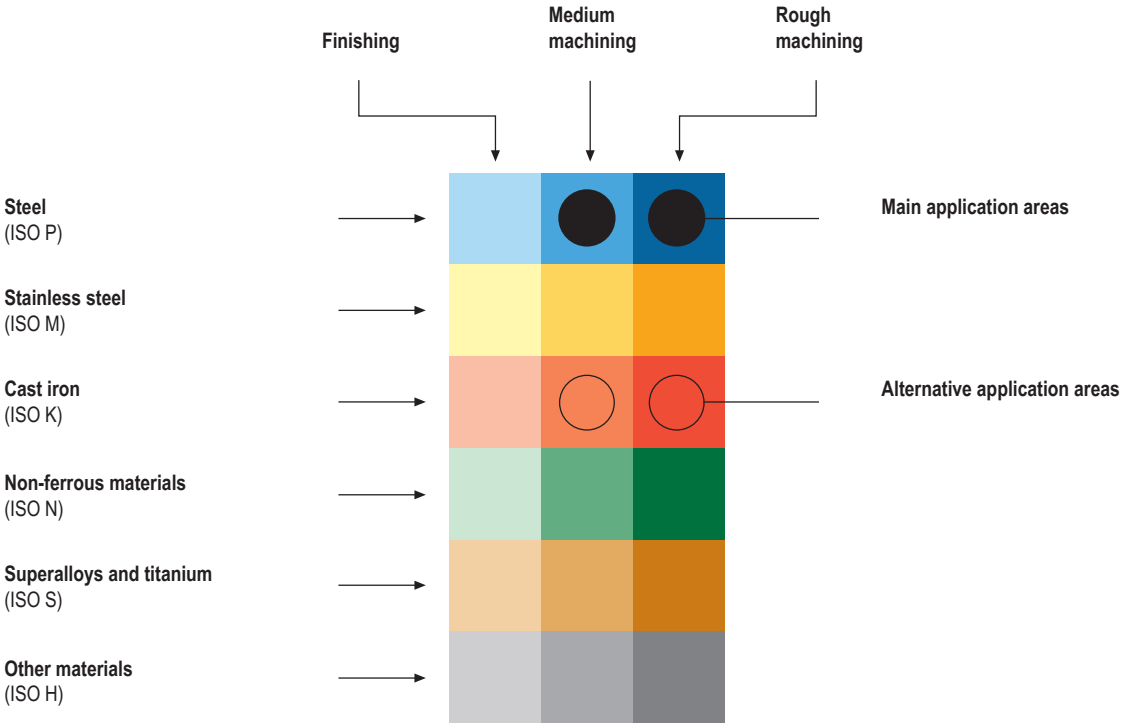
The intention of this "Choose Product" section is to show how easy the choice of a product can be and the starting point is how Seco always intends to make turning easy. However, depending on your insight and your actual conditions it is recommended you jump in the process to fit your specific needs.

One first point is considering the purpose of the turning operation, and that most often starts with considering the turning insert, which can be studied in a lot of detail, or as simple as possible to ensure a successful outcome.

Secolor® is a simple system used to present recommended application areas of a specific turning insert. It is based on a matrix with eighteen squares symbolizing workpiece materials under different states of machining, indicating the main application areas by black dots and alternative application areas as circles. It should also only be understood as a starting point as most skilled professional in machining in general and turning in particular do.

In the example below, the product is recommended for medium and rough turning of steel workpieces as it's main application area, and in machining of cast iron components as an alternative solution.

The objective is to eliminate waste, and this will become clearer as we go forward.



First steps – the insert shape & size

To choose turning products, one also needs to consider the purpose of the turning operation with its conditions, requirements and the degrees of freedom.

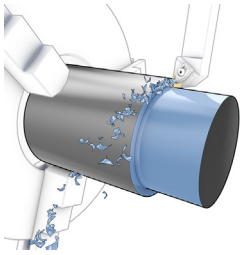
Now, the key points are

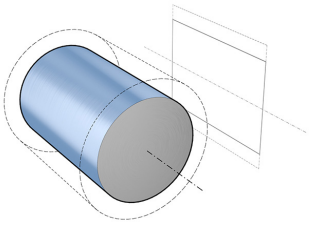
– How much stock is to be taken away?

– What does the pre-machined component look like?

– What does the drawing specify about the finished component?

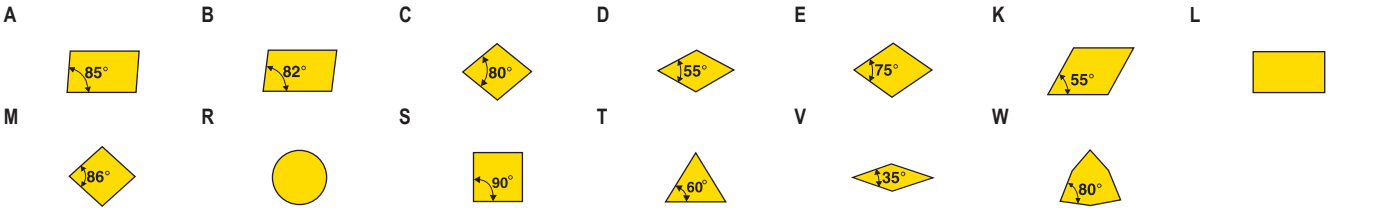
– And, last but not the least – What else needs to be taken into account?





Standards created in the 70's define the insert by using the first letter of its shape as the first letter of the nomenclature, see the first letter of the code key below. Note that not all shapes are commonly used for machining applications such as turning.

2. Insert shape



When choosing a common shape, for example a "C" shape with the 80° corner, the stock on a component (see the illustrations above) possible to remove is then depending on the size of the insert and its maximum depth of cut according to the table below.

Insert shape	Insert size	Maximum depth of cut a_p (mm)													
		2	4	6	8	10	12	14	16	18	20	22	24	26	28
C	04														
	06														
	09														
	12														
	16														
	19														
	25														

In the above table the size of the inserts is indicated. If for example the stock is 4 mm and the idea is to cut it away in one (1) pass, it is recommended to use a "12" size "C" insert or bigger. On the next page a more complete set of relevant turning inserts are shown with their respective recommended ranges for depths of cut.

Insert shape and size

Insert shape	Insert size	Maximum depth of cut a_p (mm)
C	04, 06, 09, 12, 16, 19, 25	
D	07, 11, 15	
R	06, 08, 10, 12, 15, 16, 19, 20, 25, 32	
S	09, 12, 15, 19, 25, 31, 38	
T	06, 11, 16, 22, 27, 33	
V	11, 16, 22	
W	06, 08	

First steps – from insert to toolholder

It is obvious from the earlier table that for the same stock removal, there are several insert options based on their shapes and sizes.

Just briefly, look at the insert sketches below.

An "R" shape insert has no corner however has big strong radius, an "S" shape insert has strong and equal corners, a "C" shape insert has a corner that can make 90° shoulders, and a "V" shape insert has a weaker corner but deep reach for deep profiles.

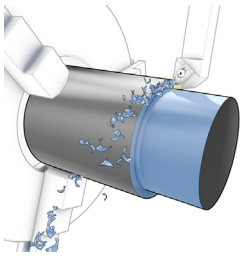
Now, the key points are

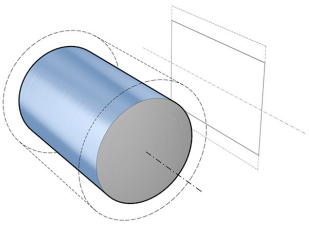
– How much stock is to be taken away?

– What does the pre-machined component look like?

– What does the drawing specify about the finished component?

– And, last but not the least – What else needs to be considered?





Look at the application sketches below, considering the two questions where to start and where to end. A rough first conclusion starting from below,

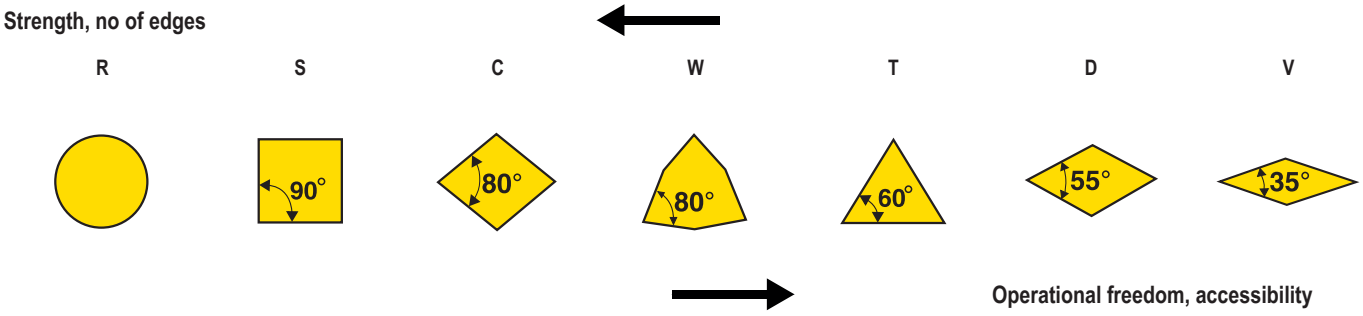
the"R" shape insert is perfect for slope profiles,

the"S" shape insert is perfect for straight feature surfaces,

the"C" shape insert is perfect for varying feature surfaces and

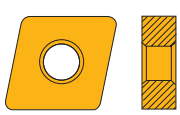
the"V"shape insert has a weaker corner but deep reach for deep features & profiles

The chart below explains the different insert shapes with their relative strength, number of edges, operational freedom, and accessibility.



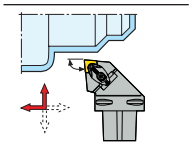
A second conclusion indicates the toolholder's importance to achieve the needed final part. The toolholder enables an insert to achieve a specific surface or profile. After focusing on the aspects of the toolholder there will be a comprehensive list of application toolholder guidance.

Inserts CN..

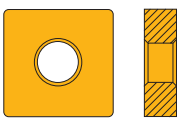


C.-DCLNR/L..JETI

95 °

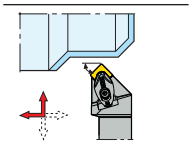


Inserts SN..



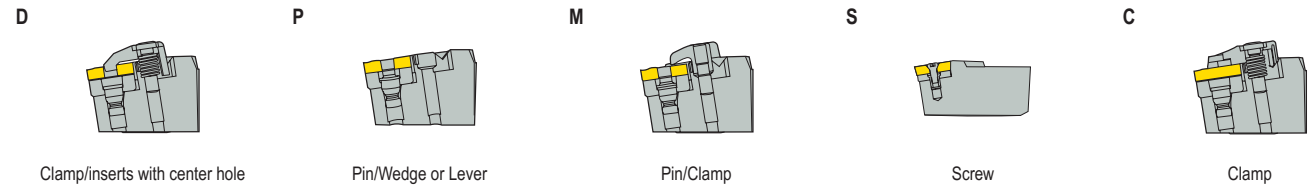
DSSNR/L..JETI

45 °



First steps – the toolholder

2. Insert clamping



In the pictures above a range of common toolholder solutions for insert clamping where Seco has chosen to mainly offer "C", "D" and "S", but there are a number of options. On this page there will however be brief suggestions how to handle options with brief "pros" and "cons" on each, but it will be fully covered later in the Product Detail Guidance sections in the catalogue.

These letters denote the clamping style on a toolholder, and should not be mixed up with the earlier mentioned letters for the insert nomenclature.

Seco clamping designs can be summarized (see page 84 for more details on clamping) as follows

"C" clamping
– extremely rigid top clamp with pressure plate suited especially for advanced material inserts but also a number of cemented carbide inserts.

"D" clamping
– stable and rigid top clamp also re-appearing in the form of the Jetstream Tooling® JETI coolant clamp for for most applications with double sided inserts with a through hole.

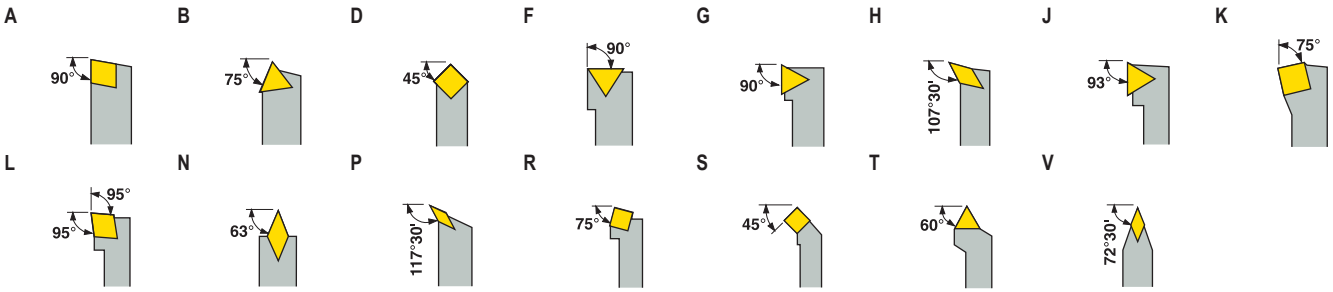
"M" clamping
– classic double security clamping with eccentric pin locking in hole, and complimented by a top clamp, still common in some areas for double sided inserts.

"P" clamping
– a group of several clamping designs avoiding interference in the chip space above double sided inserts with hole in different ways. It consists of, for example, toggle lever-clamping, wedge-clamping and excenter-pin clamping.

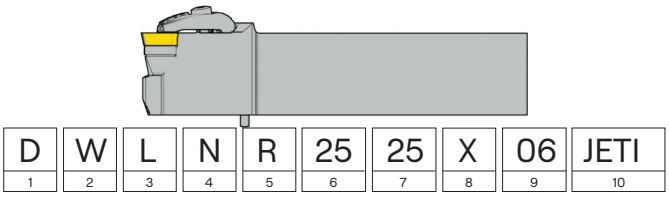
"S" clamping
– the most straight forward proven solution for screw-hole, often single sided inserts without interference in the chip space above the insert where the screw needs to be removed to exchange the insert.

First steps – code for toolholder application

4. Tool type



Now as seen earlier there are several demands and requirements on the generation of surfaces in turning. The above sketches on the codes for tool types give hint on the options connected to the position "3" in the below code key for toolholders.



The options so far actually connect to the code keys of toolholders where

"Position 1" corresponds to the "Clamping design"

"Position 2" corresponds to the "Insert shape"

"Position 3" corresponds to the "Tool type"

Please go back to the earlier comprehensive Code Key pages for detailed descriptions.

First steps – toolholder to machine

There are several connections to a standardized machine connection and this will be covered briefly here to connect to the code keys.

Please refer back to the earlier comprehensive Code Keys pages for detailed descriptions.

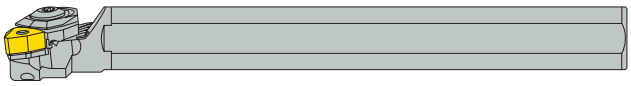
The most common classic toolholder connection for external application is a square connection and most often fixed with a set of screws. In the code key to the right that connection size is indicated with ”2525” in ”position 6” and” position 7”. In position 8, the length code “X” indiactes a non-standard length, and this will be found in the product pages.



D	W	L	N	R	25	25	X	06	JETI
1	2	3	4	5	6	7	8	9	10

Note ANSI shank code relates to how many 16th of an inch, further detailed in the ANSI [inch] Code Key.

Going to internal applications the toolholder connections are similar and fixed with screws but in the standard the connection size is indicated in ”position 2” where ”20” in the example to the right means 20 mm. The length is represented in “position 3” in the letter “Q” corresponding to 180 mm (see the Code Key).



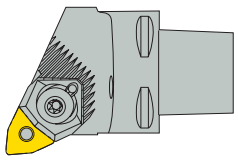
A	20	Q	-	P	W	L	N	R	06	R
1	2	3		4	5	6	7	8	9	10

Note that a ANSI shank code A20-... corresponds to the number of 16th of an inch i.e. significantly bigger shank than the metric version. 20 on an ANSI description would represent 1.250” i.e. just about 32 mm in diameter..

However more modern machine connection standards such as Seco-Capto™ to the right, Seco-Capto™ uses the logic to start with the connections size i.e. the connection size ”C4” in ”position 1” in the code key to the right. The functional width and length are found in that order in “position 7” and “position 8” always measured in mm.

There are a number of interesting modular solutions available such as the GL-connection especially for stabilized internal applications and QC-connection for external applications in small part machining, but those are connected to machines with a back-end according to above e.g. Seco-Capto™ or square shank.

Please go back to the earlier comprehensive Code Keys pages 12-23 for detailed descriptions.



C4	-	P	W	L	N	R	-	27	050	-	06	-	
1		2	3	4	5	6		7	8		9		10

Seco-Capto™ – brief description

This, now standardized system, as per ISO26623 is a modular system for machines such as lathes introduced from the 1990´s for fast and efficient change of holders and inserts summarized as “quick-change”.

The main benefits are

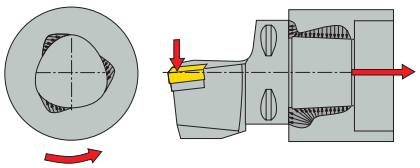
– Increased total productivity from the faster tools changes

– High precision, rigid, self-centering connection due to the strong conical polygon giving repeatability within microns

– Increased productivity since no need for cutting data adjustments due to the stable connection

– Reduced inventory of holders in a workshop due to same precise standardized machine side connection

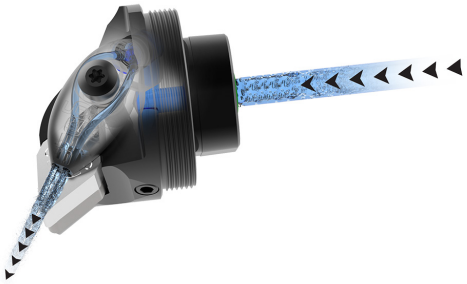
– Through-coolant means no separate coolant handling, which goes extremely well with Seco Jetstream Tooling solutions



Seco Jetstream Tooling® – brief introduction

This revolutionary innovation delivers high pressure coolant jet precisely to cutting zone – available in all Seco turning product areas.

The General ISO Turning Jetstream Tooling® toolholder to the right indicates yet another revolution using the leading JETI-coolant clamp designs.



The main benefits with Seco Jetstream Tooling® are

– Tool life improvement due to the high-pressure jet lifting chips away from the rake face

– Improved chip control in many applications especially when finishing

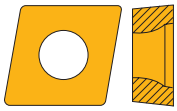
– Increased tool life due to the precise and undisturbed coolant delivery even at low pressures in nearly all component materials

Application overview

The following Application overview pages will provide a good insight of the usage of toolholders and inserts from an application perspective. It should also be said and recommended to look into the Seco Suggest or explore the opportunities directly on www.secotools.com/suggest at any webbrowser.

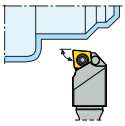
QC Toolholders

Inserts CC..



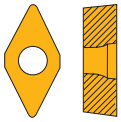
QC..-SCLCR/L..JET

95 °



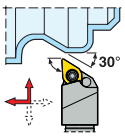
page(s) 154

Inserts DC..



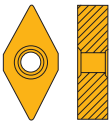
QC..-SDJCR/L..JET

93 °



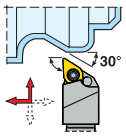
page(s) 155

Inserts DN..



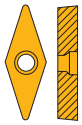
QC..-SDJNR/L..JET

93 °



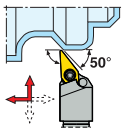
page(s) 156

Inserts VB../VC..



QC..-SVJBR/L..JET

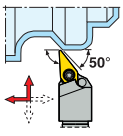
93 °



page(s) 157

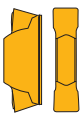
QC..-SVJCR/L..JET

93 °



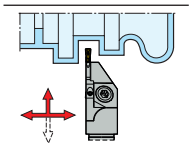
page(s) 158

Inserts LC..



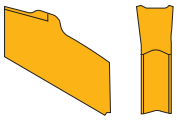
QC..-CFOR/L..RBJET

90 °

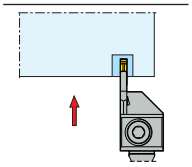


page(s) 159

Inserts 150.10..

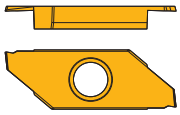


QC..-R/L150.10..JETI



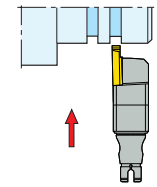
page(s) 160

Inserts X2..



QC..-X2FR/L..JETI

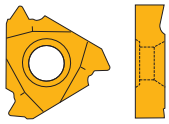
95 °



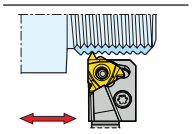
page(s) 161

Inserts ....

SnapTap threading



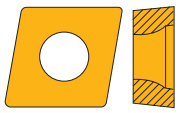
QC..-PER/L..HDJET



page(s) 162

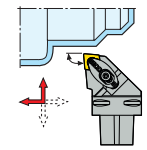
Toolholders external, Seco-Capto™

Inserts CC..



C.-DCLCR/L..JETI2

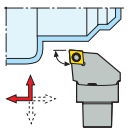
95 °



page(s) 163

C.-SCLCR/L

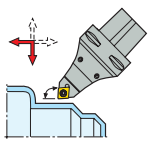
95 °



page(s) 217, 218

C.-SCMCN

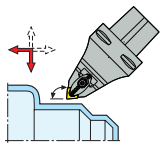
95 °



page(s) 249

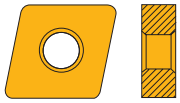
C.-DCMCN..JETI

95 °



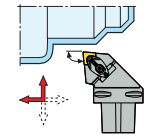
page(s) 238

Inserts CN..



C.-DCLNR/L..JETI2

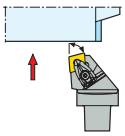
95 °



page(s) 164, 165

C.-DCKNR/L

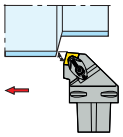
75 °



page(s) 189, 190

C.-DCRNR/L..JETI2

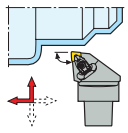
75 °



page(s) 166

C.-DCLNR/L

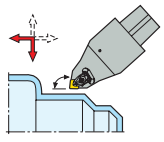
95 °



page(s) 191, 192

C.-DCMNN

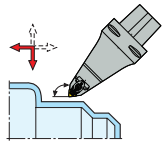
95 °



page(s) 245

C.-DCMNN..JETI

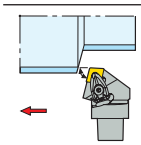
95 °



page(s) 239

C.-DCRNR/L

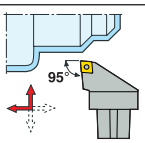
75 °



page(s) 193, 194

C.-PCLNR/L

95 °



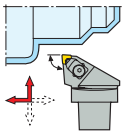
page(s) 212

Inserts CN.N



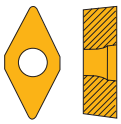
C.-CCLNR/L

95 °



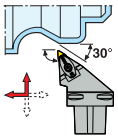
page(s) 229

Inserts DC..



C.-DDJCR/L..JETI2

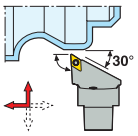
93 °



page(s) 167

C.-SDJCR/L

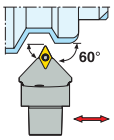
93 °



page(s) 219

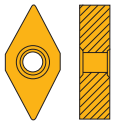
C.-SDNCN

62,5 °



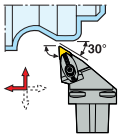
page(s) 220

Inserts DN..



C.-DDJNR/L..JETI2

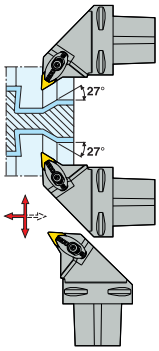
93 °



page(s) 168, 169

C.-DDUNR/L..JETI2

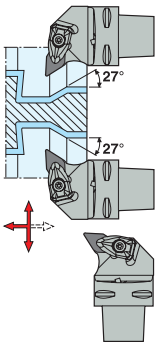
93 °



page(s) 170

C.-DDUNR/L

93 °



page(s) 198, 199

C.-DDJNR/L

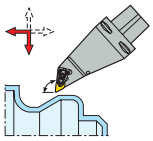
93 °



page(s) 195, 196

C.-DDMNL

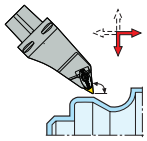
93 °



page(s) 246

C.-DDMNR/L..JETI

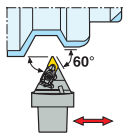
95 °



page(s) 240, 241

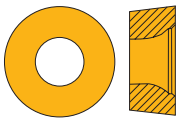
C.-DDNNN

62,5 °



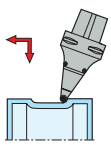
page(s) 197

Inserts RC..



C.-SRDCN

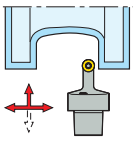
45 °



page(s) 250

C.-SRDCN-..A

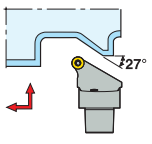
45 °



page(s) 221, 222

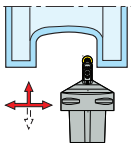
C.-SRSCR/L

45 °



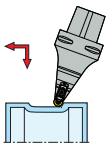
page(s) 223, 224

C.-DRDCN...JETI



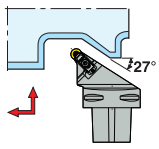
page(s) 171

C.-DRDCN...JETI_MTM



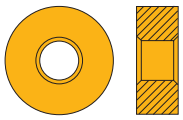
page(s) 242

C.-DRSCR/L..JETI



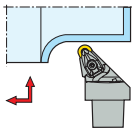
page(s) 172, 173

Inserts RN..



C.-DRSNR/L

45 °



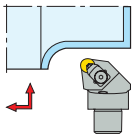
page(s) 200

Inserts RN.N



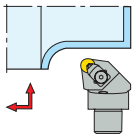
C.-CRSNR/L

45 °



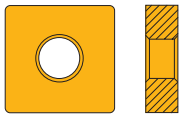
page(s) 230, 231

C.-CRSNR/L-..C



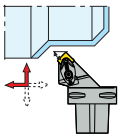
page(s) 234

Inserts SN..



C.-DSSNR/L..JETI2

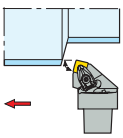
45 °



page(s) 174

C.-DSRNR/L

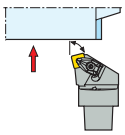
75 °



page(s) 203

C.-DSKNR/L

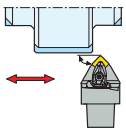
75 °



page(s) 202

C.-DSDNN

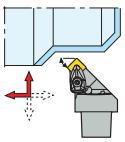
45 °



page(s) 201

C.-DSSNR/L

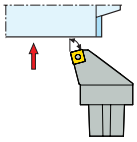
45 °



page(s) 204, 205

C.-PSKNR/L

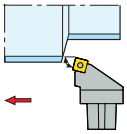
75 °



page(s) 213

C.-PSRNR/L

75 °



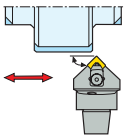
page(s) 214

Inserts SN.N



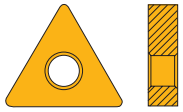
C.-CSDNN

45 °



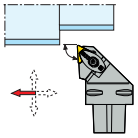
page(s) 232

Inserts TN..



C.-DTJNR/L..JETI2

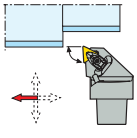
93 °



page(s) 175

C.-DTJNR/L

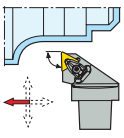
93 °



page(s) 208

C.-DTGNR/L

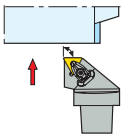
90 °



page(s) 207

C.-DTFNR/L

91 °



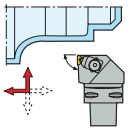
page(s) 206

Inserts TN.N



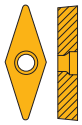
C.-CTJNR/L

93 °



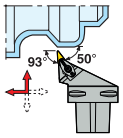
page(s) 233

Inserts VB../VC..



C.-DVJBR/L..JETI2

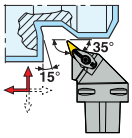
93 °



page(s) 177

C.-DVHBR/L..JETI2

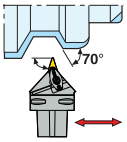
107,5 °



page(s) 176

C.-DVVBN..JETI2

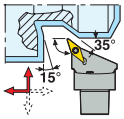
72,5 °



page(s) 179

C.-SVHBR/L

107,5 °



page(s) 225

C.-SVJBR/L

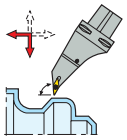
93 °



page(s) 226, 227

C.-SVMBL

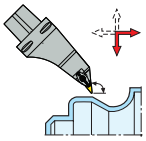
95 °



page(s) 251

C.-DVMBR/L..JETI

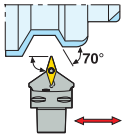
95 °



page(s) 243

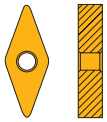
C.-SVVBN

72,5 °



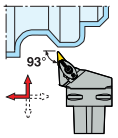
page(s) 228

Inserts VN..



C.-DVJNR/L..JETI2

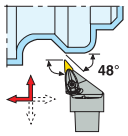
93 °



page(s) 178

C.-DVJNR/L

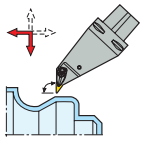
93 °



page(s) 209

C.-DVMNL

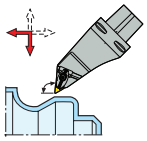
93 °



page(s) 247

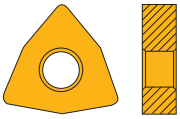
C.-DVMNL..JETI

95 °



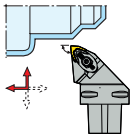
page(s) 244

Inserts WN..



C.-DWLNR/L..JETI2

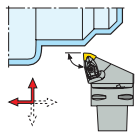
95 °



page(s) 180

C.-DWLNR/L

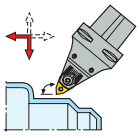
95 °



page(s) 210, 211

C.-PWLNN

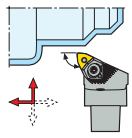
95 °



page(s) 248

C.-PWLNR/L

95 °



page(s) 215, 216

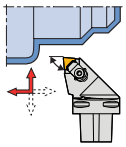
Toolholders external, Seco-Capto™, cassettes

Inserts CN.N



CT..-CCLNX

95 °



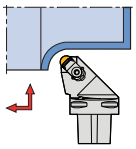
page(s) 236

Inserts RN.N



CT..-CRSNX

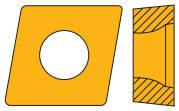
45 °



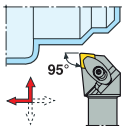
page(s) 237

Toolholders external

Inserts CC..

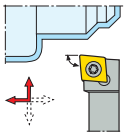


DCLCR/L..JETI **95 °**



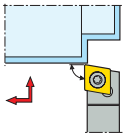
page(s) 253, 254, 255

SCLCR/L **95 °**



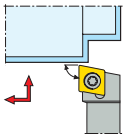
page(s) 352, 353, 354, 355

SCACR/L **90 °**



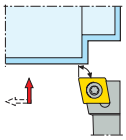
page(s) 347

SCGCR/L **90 °**



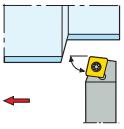
page(s) 350, 351

SCFCR/L **90 °**



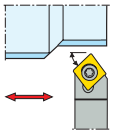
page(s) 349

SCBCR/L **75 °**



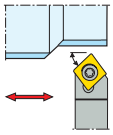
page(s) 348

SCDCR/L **45 °**



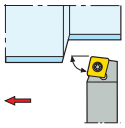
page(s) 349

SCMCN **90 °**



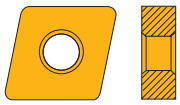
page(s) 356

SCRCR/L **90 °**

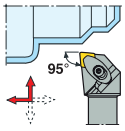


page(s) 357

Inserts CN..

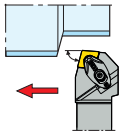


DCLNR/L..JETI **95 °**



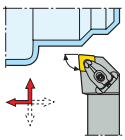
page(s) 256, 257

DCBNR/L..JETI **75 °**



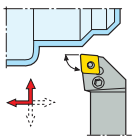
page(s) 252

DCLNR/L **95 °**



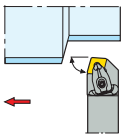
page(s) 290, 291, 292, 293

PCLNR/L **95 °**



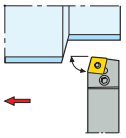
page(s) 327, 328

DCBNR/L **75 °**



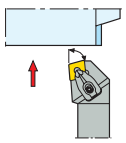
page(s) 285, 286

PCBNR/L **75 °**



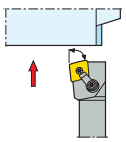
page(s) 326

DCKNR/L **75 °**



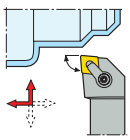
page(s) 287, 288, 289

MCKNR/L **90 °**



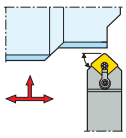
page(s) 387

MCLNR/L **90 °**



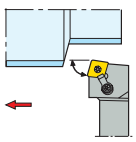
page(s) 388

MCMNN **90 °**



page(s) 389

MCRNR/L **90 °**

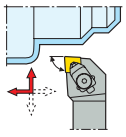


page(s) 390

Inserts CN.N

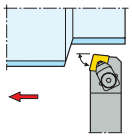


CCLNR/L **95 °**



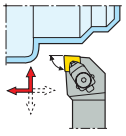
page(s) 413, 414

CCBNR/L **75 °**



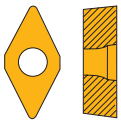
page(s) 413, 414

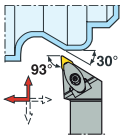
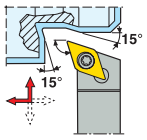
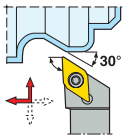
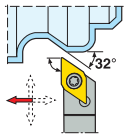
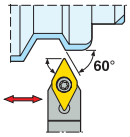
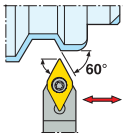
CCLNR/L-.C **95 °**



page(s) 415

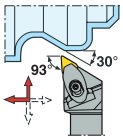
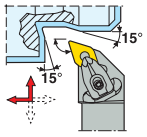
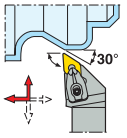
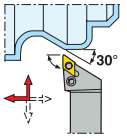
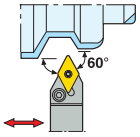
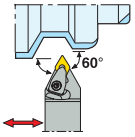
Inserts DC..

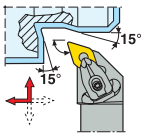
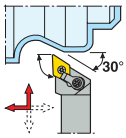


DDJCR/L..JETI	SDHCR/L	SDJCR/L	SDACR/L	SDNCN	SDPCN
93 °	107,5 °	93 °	90 °	62,5 °	90 °
					
page(s) 258, 259	page(s) 359, 360	page(s) 361, 362, 363	page(s) 358	page(s) 364	page(s) 365

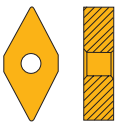
Inserts DN..

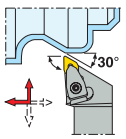
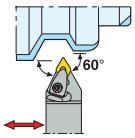


DDJNR/L..JETI	DDHNR/L	DDJNR/L	PDJNR/L	PDNNR/L	DDPNN
93 °	107,5 °	93 °	93 °	63 °	90 °
					
page(s) 260, 261, 262	page(s) 294	page(s) 295, 296, 297	page(s) 329, 330	page(s) 331	page(s) 299

DDQNR/L	MDJNR/L
90 °	90 °
	
page(s) 300	page(s) 391

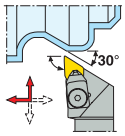
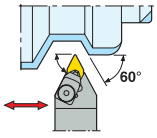
Inserts DN.A



DDJNR/L..-C	DDNNN..-C
93 °	62,5 °
	
page(s) 298	page(s) 298

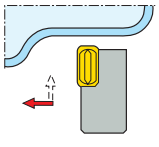
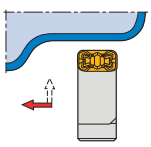
Inserts DN.N



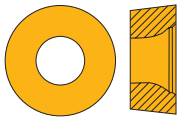
CDJNR/L	CDNNN
93 °	62,5 °
	
page(s) 416	page(s) 416

Inserts LNMX19/30

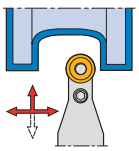


CT-PLANR/L (175.32)	CT-PLFNR/L
90 °	90 °
	
page(s) 540, 541	page(s) 542

Inserts RC..

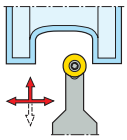


PRDCN 45 °



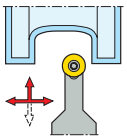
page(s) 332

SRDCN 45 °



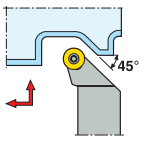
page(s) 366

SRDCN 90 °



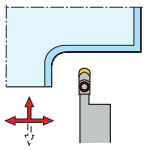
page(s) 367

SRSCR/L 45 °



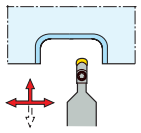
page(s) 370, 371

CRDCR/L..C



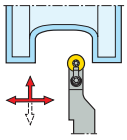
page(s) 417

CRDCN...C



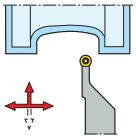
page(s) 417

MRGOR/L 90 °



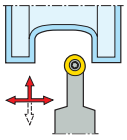
page(s) 393

SRGCR/L 90 °



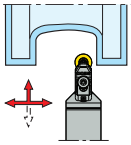
page(s) 368, 369

PROON 90 °



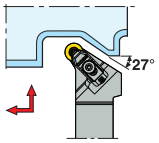
page(s) 333

DRDCN..JETI



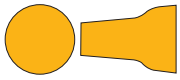
page(s) 263

DRDCR/L..JETI

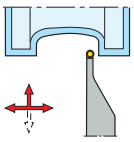


page(s) 265

Inserts RCG.

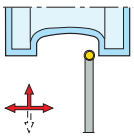


TRAOR/L 90 °



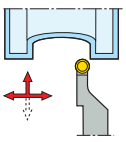
page(s) 410, 411

TRDON 45 °



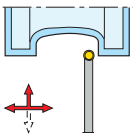
page(s) 410

TRGOR/L 90 °



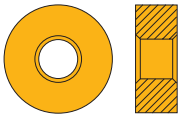
page(s) 412

TROON 90 °

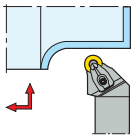


page(s) 411

Inserts RN..

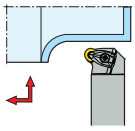


DRSNR/L 45 °



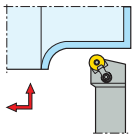
page(s) 302

DRGNR/L 90 °



page(s) 301

MRGNR/L 90 °

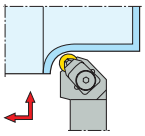


page(s) 392

Inserts RN.N

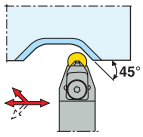


CRSNR/L 45 °



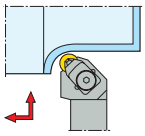
page(s) 420, 421

CRDNN 45 °



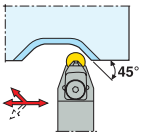
page(s) 418, 420, 421

CRSNR/L..C



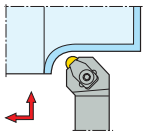
page(s) 422

CRDNN..C



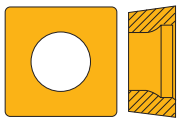
page(s) 422

CRGNR/L 90 °

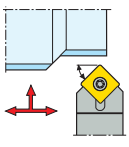


page(s) 419

Inserts SC..

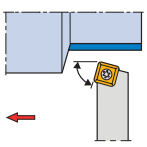


SSDCN 45 °



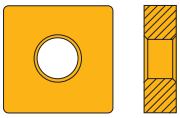
page(s) 372, 373

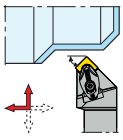
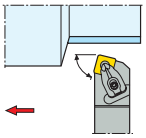
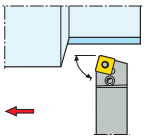
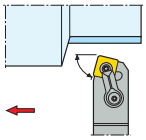
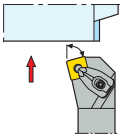
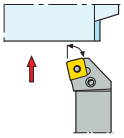
SSBCR/L 75 °

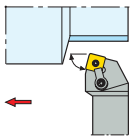
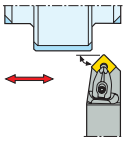
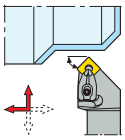
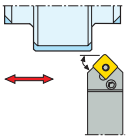
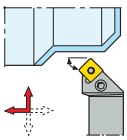
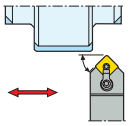


page(s) 374

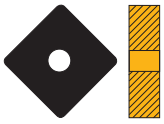
Inserts SN..

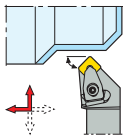


DSSNR/L..JETI	DSBNR/L	PSBNR/L	MSBNR/L	DSKNR/L	PSKNR/L
45 °	75 °	75 °	75 °	75 °	75 °
					
page(s) 267, 268	page(s) 303	page(s) 334, 335	page(s) 394	page(s) 306, 307	page(s) 336

MSRNR/L	DSDNN	DSSNR/L	PSDNN	PSSNR/L	MSDNN
75 °	45 °	45 °	45 °	45 °	90 °
					
page(s) 397, 398	page(s) 304, 305	page(s) 308, 309, 310	page(s) 336	page(s) 337	page(s) 395, 396

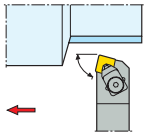
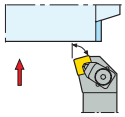
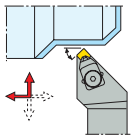
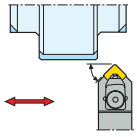
Inserts SN.A



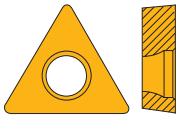
DSSNR/L..-C
45 °

page(s) 431

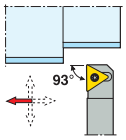
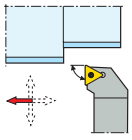
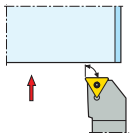
Inserts SN.N



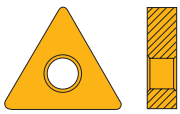
CSBNR/L	CSKNR/L	CSSNR/L	CSDNN
75 °	75 °	45 °	45 °
			
page(s) 423	page(s) 424	page(s) 426	page(s) 424, 425

Inserts TC..

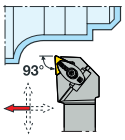


STJCR/L	STGCR/L	STFCR/L
93 °	90 °	90 °
		
page(s) 378	page(s) 375, 376, 377	page(s) 375, 376

Inserts TN..

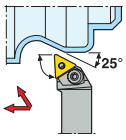


DTJNR/L..JETI
93 °



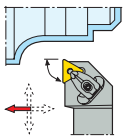
page(s) 269, 270

PTJNR/L
93 °



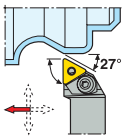
page(s) 342, 343

DTGNR/L
90 °



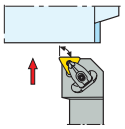
page(s) 314, 315

PTGNR/L
90 °



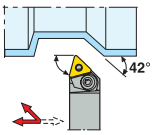
page(s) 340, 341

DTFNR/L
90 °



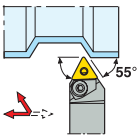
page(s) 311, 312, 313

PTBNR/L
75 °



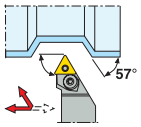
page(s) 338

PTNNR/L
63 °



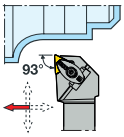
page(s) 339

PTTNR/L
60 °



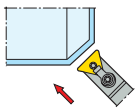
page(s) 344

DTJNR/L
90 °



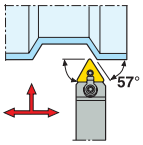
page(s) 316

MTCNN
90 °



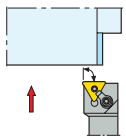
page(s) 399

MTENNS
90 °



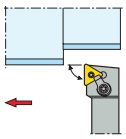
page(s) 400

MTFNR/L
90 °



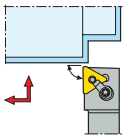
page(s) 401

MTGNR/L
90 °



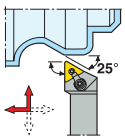
page(s) 402

MTLNR/L
90 °



page(s) 404

MTJNR/LS
90 °

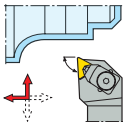


page(s) 403

Inserts TN.N

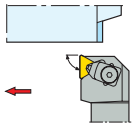


CTJNR/L
93 °



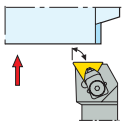
page(s) 428, 429

CTGNR/L..-PL
90 °



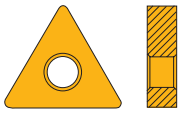
page(s) 427

CTFNR/L
91 °

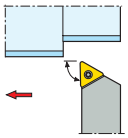


page(s) 428, 429

Inserts TP..

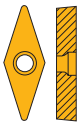


PTAPRS/LS
90 °

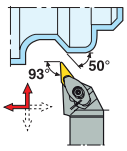


page(s) N/A

Inserts VB/VC..



DVJBR/L...JETI
93 °



page(s) 271, 272

SVLBR/L
95 °



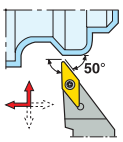
page(s) 382, 383

SVJBR/L
93 °



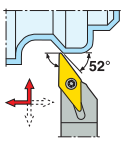
page(s) 379, 380

SVJCR/L
93 °



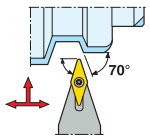
page(s) 381

SVABR/L
90 °



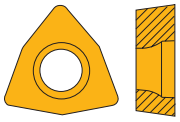
page(s) 381

SVVBN
72,5 °



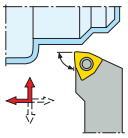
page(s) 383, 384, 385

Inserts WC..



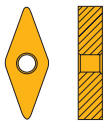
SWLCR/L

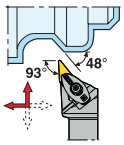
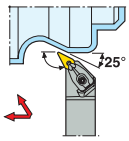
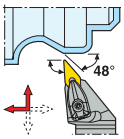
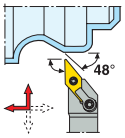
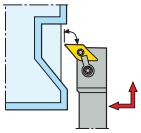
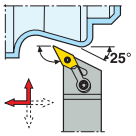
95 °



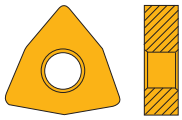
page(s) 386

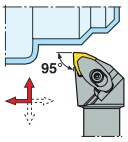
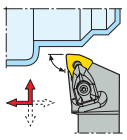
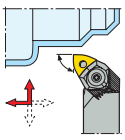
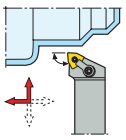
Inserts VN..



DVJNR/L..JETI	DVPNR/L	DVJNR/L	MVJNR/L	MVLNR/L	MVTNR/L
93 °	117,5 °	93 °	90 °	90 °	90 °
					
page(s) 273, 274	page(s) 320, 321	page(s) 317, 318, 319	page(s) 405	page(s) 406	page(s) 407

Inserts WN..



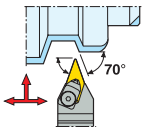
DWLNR/L..JETI	DWLNR/L	PWLNR/L	MWLNR/L
95 °	95 °	95 °	95 °
			
page(s) 275, 276	page(s) 322, 323, 324, 325	page(s) 345, 346	page(s) 408, 409

Inserts VN.A



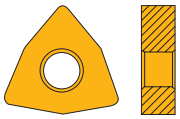
CVVNN

72,5 °



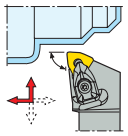
page(s) 430

Inserts WN.A



DWLNR/L..-C

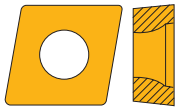
95 °



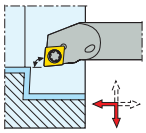
page(s) N/A

Toolholders internal, Seco-Capto™

Inserts CC..

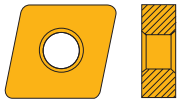


C.-SCLCR/L
95 °

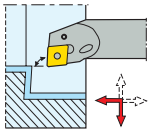


page(s) 441, 442

Inserts CN..

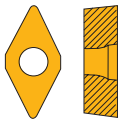


C.-PCLNR/L
95 °

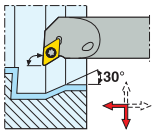


page(s) 433, 434

Inserts DC..

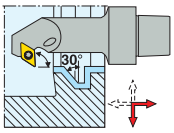


C.-SDUCR/L
93 °



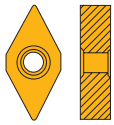
page(s) 444, 445

C.-SDUCR/L-..X
93 °

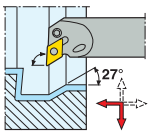


page(s) 446

Inserts DN..

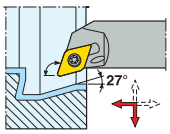


C.-PDUNR/L..-15
93 °



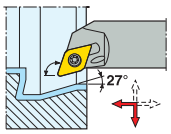
page(s) 435

C.-PDQNR/L
107,5 °



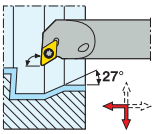
page(s) 443

C.-SDQNR/L
107,5 °



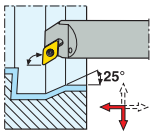
page(s) 443

C4-S/PDUNR/L..-11
93 °



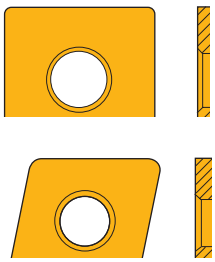
page(s) 447, 448

C5-S/PDUNR/L..-11
93 °

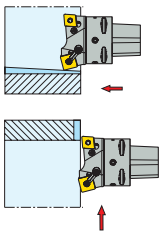


page(s) 447, 448

Inserts SN../CN..

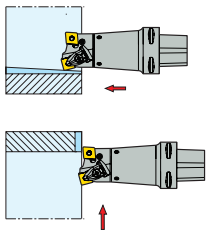


C.-MSKNR/L - PCLNR/L
75 °



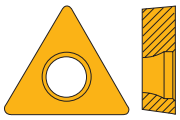
page(s) N/A

C.-DSKNR/L - PCLNR/L
75 °



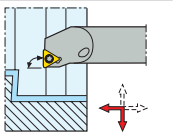
page(s) N/A

Inserts TC..



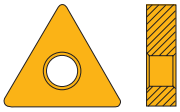
C.-STFCR/L

91 °



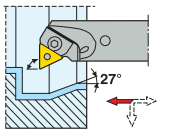
page(s) 449

Inserts TN..



C.-PTFNR/L..-W

91 °



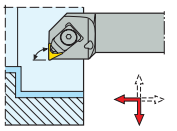
page(s) 436

Inserts TN.N



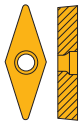
C.-CTUNR/L

93 °



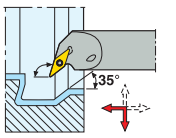
page(s) 452

Inserts VB../VC..



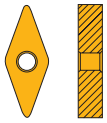
C.-SVQBR/L

107,5 °



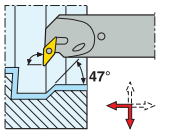
page(s) 450, 451

Inserts VN..



C.-PVUNR/L

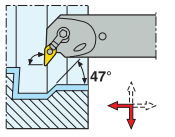
93 °



page(s) 437, 438

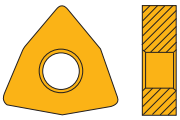
C.-MVUNR/L

93 °



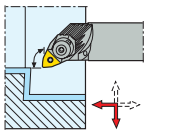
page(s) 437, 438

Inserts WN..



C.-PWLNR/L

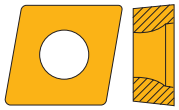
95 °

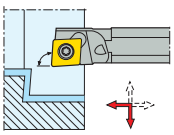
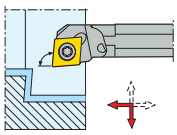
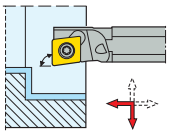
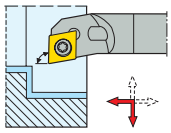
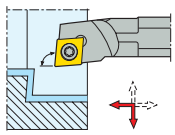


page(s) 439, 440

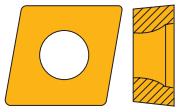
Toolholders internal

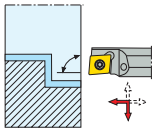
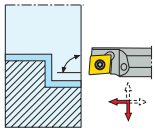
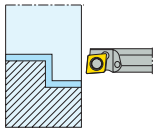
Inserts CC..



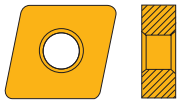
A..-SCLCR/L06	A..-SCLCR/L09	A..-SCFCR/L	E..-SCFCR/L	E..-SCLCR/L
95 °	95 °	91 °	91 °	95 °
				
page(s) 470, 471, 472, 473	page(s) 470, 471	page(s) 467, 468, 470, 471	page(s) 469	page(s) 474

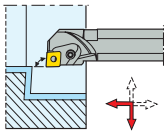
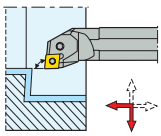
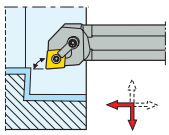
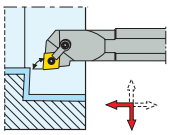
Inserts CD..



A..-SCFDR/L	A..-SCLDR/L	xx-SCLDR
91 °	95 °	90 °
		
page(s) 475	page(s) 475	page(s) 476

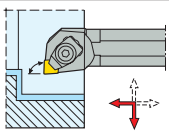
Inserts CN..



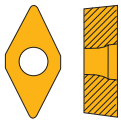
A..-PCLNR/L	S..-PCLNR/L	S..-MCLNR/L	A..-MCLNR/L
95 °	95 °	95 °	90 °
			
page(s) 454, 455	page(s) 456	page(s) 499, 500, 502	page(s) 501

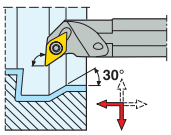
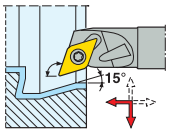
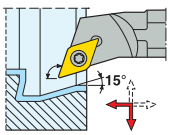
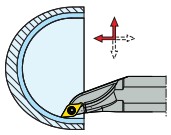
Inserts CN.N



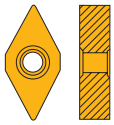
S..-CCLNR/L
95 °

page(s) 518

Inserts DC..

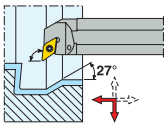


A..-SDUCR/L	A..-SDQCR/L	S..-SDQCR/L	S..-SDXCR/L
93 °	107,5 °	107,5 °	120 °
			
page(s) 481, 482, 484	page(s) 477, 484	page(s) 478	page(s) 488

Inserts DN..

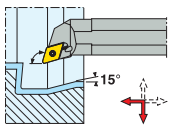


A..-SDUNR/L
93 °



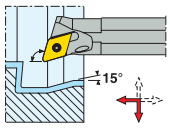
page(s) 483, 485

A..-PDQNR/L
107,5 °



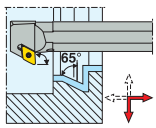
page(s) 479, 480

A..-SDQNR/L
107,5 °



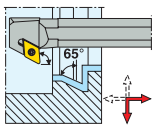
page(s) 479, 480

A..-PDYNR/L
95 °



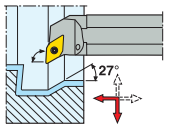
page(s) 487

A..-SDYNR/L
95 °



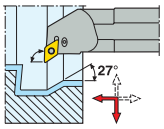
page(s) 487

A..-PDUNR/L
93 °



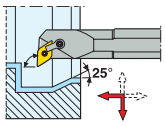
page(s) 457, 458

S..-PDUNR/L
93 °



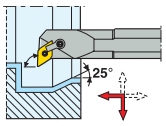
page(s) 459

A..-MDUNR/L
90 °



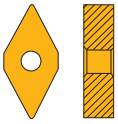
page(s) 503

S..-MDUNR/L
90 °

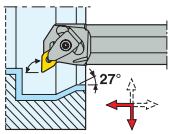


page(s) 504

Inserts DNMA

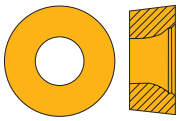


A..-DDUNR/L..-C
93 °

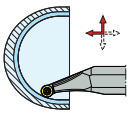


page(s) 523

Inserts RC..



A..-SRXCR/L
90 °

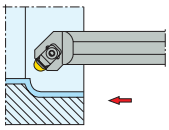


page(s) 488

Inserts RN.N

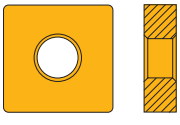


S..-CRSNR/L
45 °

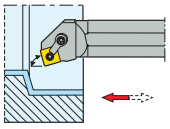


page(s) 519

Inserts SN..

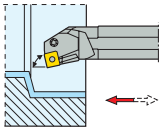


S..-MSKNR/L
75 °



page(s) 505

S..-PSKNR/L
75 °

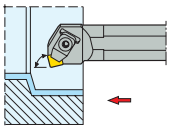


page(s) 460

Inserts SN.N

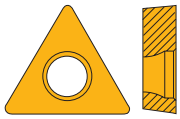


S..-CSKNR/L
75 °

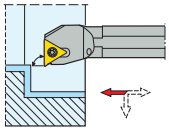


page(s) 520

Inserts TC..

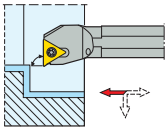


A..-STFCR/L
91 °



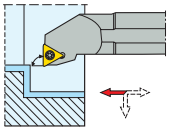
page(s) 489, 490, 491

A..-STUCR/L
90 °



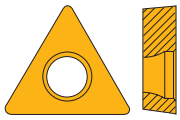
page(s) 491

E..-STFCR/L
91 °

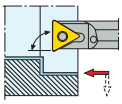


page(s) 492

Inserts TD..

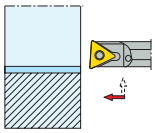


A..-STFDR/L
91 °



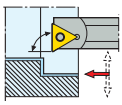
page(s) 493

A..-STLDR/L
95 °



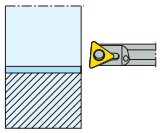
page(s) 493

S..-STFDR/L
91 °



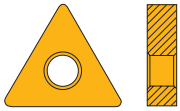
page(s) 494

xx-STLDR
90 °

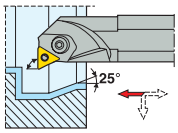


page(s) 494

Inserts TN..

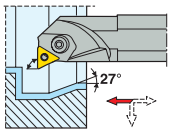


A..-PTFNR/L
91 °



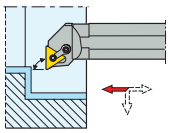
page(s) 461, 462

A..-PTFNR/L
91 °



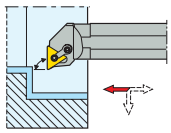
page(s) 461, 462

S..-MTFNR/L
91 °



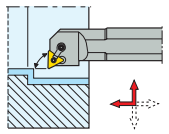
page(s) 506, 508

A..-MTFNR/L
91 °



page(s) 507

S..-MTUNR/L
90 °

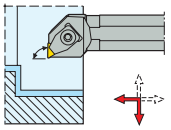


page(s) 509

Inserts TN.N

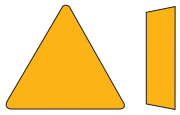


S..-CTUNR/L
93 °

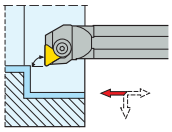


page(s) 522

Inserts TP..

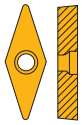


S..-CTFPR/L
91 °

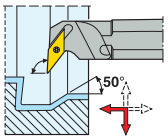


page(s) 509

Inserts VB..

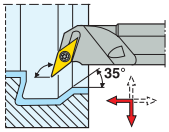


A..-SVUBR/L
93 °



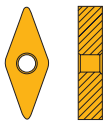
page(s) 495, 496, 497

A..-SVQBR/L
107,5 °

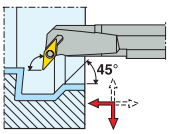


page(s) 495, 496, 497

Inserts VN..

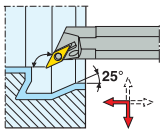


A..-PVLNR/L
95 °



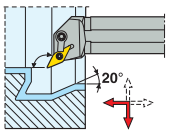
page(s) 463, 464

A..-PVPNR/L
117,5 °



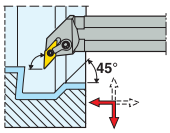
page(s) 463, 464

S..-MVPNR/L
117,5 °



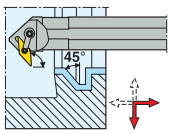
page(s) 510

S..-MVLNR/L
95 °



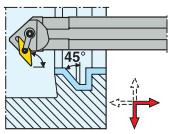
page(s) 510

S..-MVYNR/L
95 °



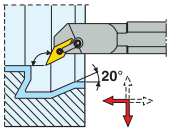
page(s) 513

A..-MVLNR/L
90 °



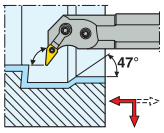
page(s) 511

A..-MVPNR/L
90 °



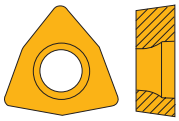
page(s) 511

A..-MVUNR/L
90 °

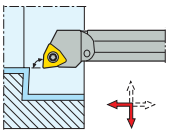


page(s) 512

Inserts WC..

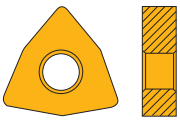


A..-SWLCR/L
95 °

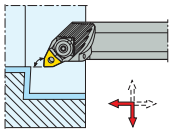


page(s) 498

Inserts WN..

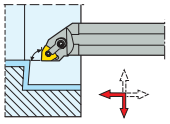


A..-PWLNR/L
95 °



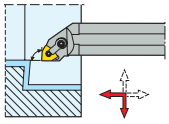
page(s) 465, 466

S..-MWLNR/L
95 °



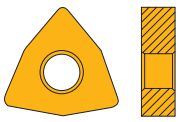
page(s) 514, 516, 517

A..-MWLNR/L
90 °

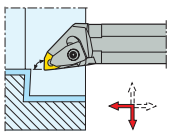


page(s) 515

Inserts WN.A



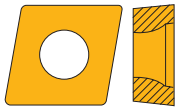
A..-DWLNR/L..-C
95 °



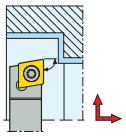
page(s) 453, N/A

Toolholders for boring

Inserts CC..

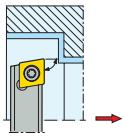


SCACL
90 °



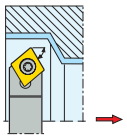
page(s) 524

S-SCACL
90 °



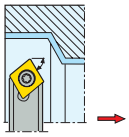
page(s) 525

SCECL
60 °



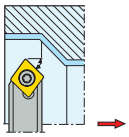
page(s) 524

S-SCECL
60 °



page(s) 525

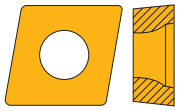
S-SCDCL
45 °



page(s) 526

Cartridges

Inserts CC..

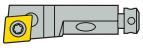


SCFCR/L
90 °



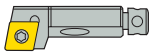
page(s) 527

SCLCR/L
95 °



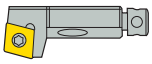
page(s) 527

SCGCR/L
90 °



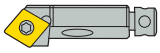
page(s) 528

SCRCR/L
75 °



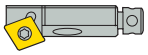
page(s) 529

SCTCR/L
60 °



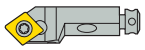
page(s) 529

SCWCR/L
60 °



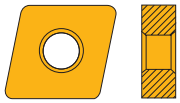
page(s) 527

SCSCR/L
45 °

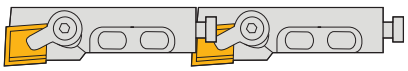


page(s) 528

Inserts CN..



MCFNR/L
90 °

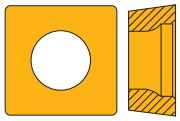


page(s) 535

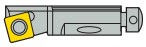
MCLNR/L
90 °

page(s) 535

Inserts SC..

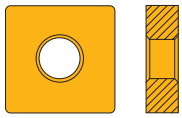


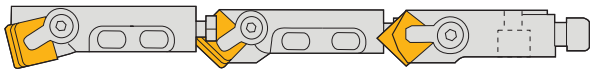
SSKCR/L
75 °



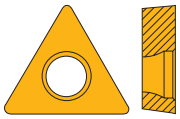
page(s) 530

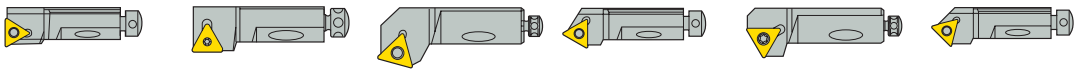
Inserts SN..



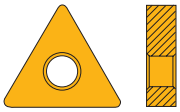
MSKNR/L	MSSNR/L	MSTNR/L
90 °	90 °	90 °
		
page(s) 536, 537	page(s) 536, 537	page(s) 537

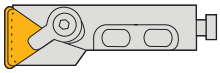
Inserts TC..



STFCR/L	STGCR/L	STRCR/L	STTCR/L	STWCR/L	STSCR/L
90 °	90 °	75 °	60 °	60 °	45 °
					
page(s) 531, 532	page(s) 533, 534	page(s) 533, 534	page(s) 533, 534	page(s) 531, 532	page(s) 531, 532

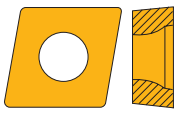
Inserts TN..

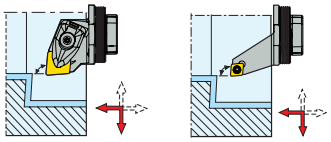


MTFNR/L
90 °

page(s) 538, 539

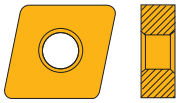
GL-heads internal

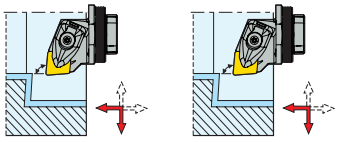
Inserts CC..



GL..-DCLCR/L..JET	GL..-SCLCR/L
95 °	95 °
	
page(s) 644	page(s) 654, 655, 656

Inserts CN..



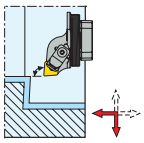
GL..-DCLNR/L..JET	GL..-DCLNR/L
95 °	95 °
	
page(s) 645	page(s) 651

Inserts CN.N



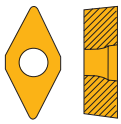
GL..-CCLNR/L

95 °



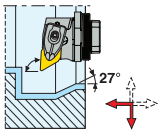
page(s) 669

Inserts DC..



GL..-DDUCR/L..JET

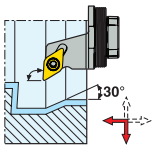
93 °



page(s) 646

GL..-SDUCR/L

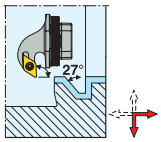
93 °



page(s) 657, 658

GL..-SDUCR/L...X

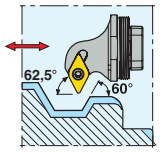
93 °



page(s) 659, 660

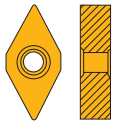
GL..-SDXCR/L

62,5 °



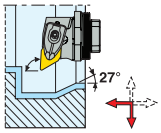
page(s) 662, 663

Inserts DN..



GL..-DDUNR/L..JET

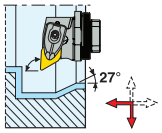
93 °



page(s) 647, 648

GL..-DDUNR/L

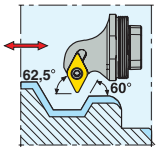
93 °



page(s) 652

GL..-SDXNR/L

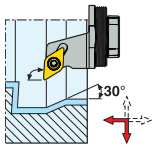
62,5 °



page(s) N/A

GL..-SDUNR/L

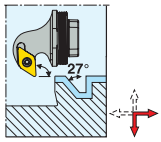
93 °



page(s) 661

GL..-SDUNR/L...X

93 °



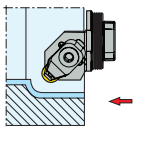
page(s) N/A

Inserts RN.N



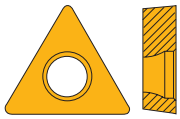
GL..-CRSNR/L

45 °



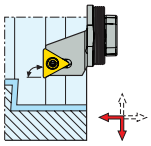
page(s) 670

Inserts TC..



GL..-STFCR/L

91 °



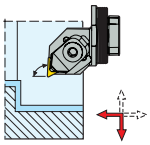
page(s) 664, 665

Inserts TN.N



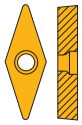
GL..-CTUNR/L

93 °



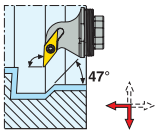
page(s) 671

Inserts VB..



GL..-DVUBR/L..JET

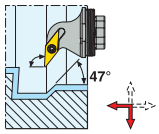
93 °



page(s) 649

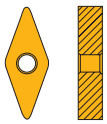
GL..-SVUBR/L

93 °



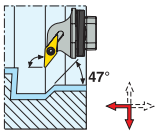
page(s) 666, 667

Inserts VN..



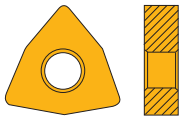
GL..-SVUNR/L

93 °



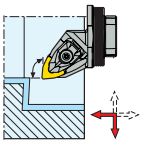
page(s) 668

Inserts WN..



GL..-DWLNR/L..JET

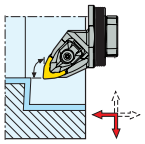
95 °



page(s) 650

GL..-DWLNR/L

95 °



page(s) 653

Chipbreaker application areas – positive inserts

The chart below is to visualize three critical design elements in one diagram for positive basic shape inserts.

The first element is seen on the left side of the diagram with the following letters and explanations

F = Finish turning

M = Medium turning

R = Rough turning

and combinations thereof, also indicated in the description of the chipbreaker.

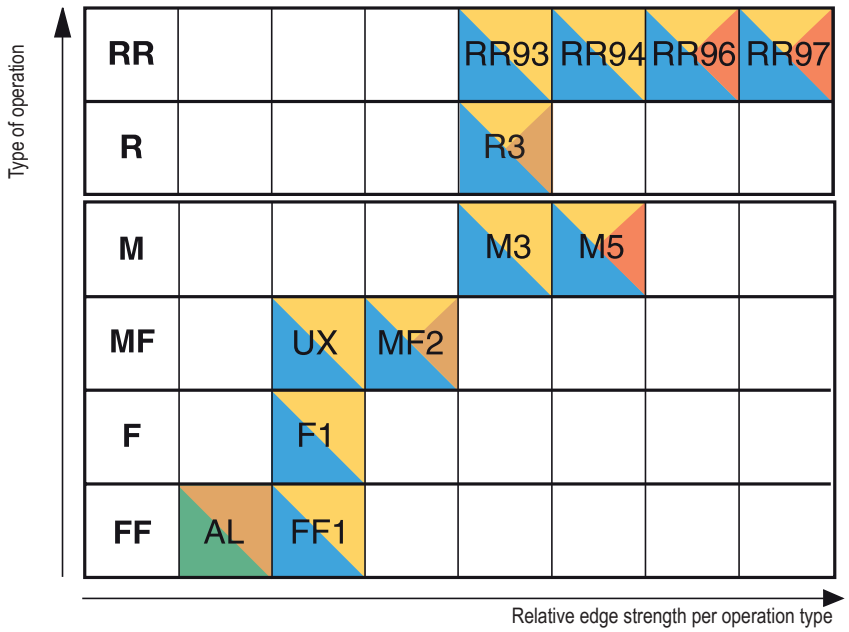
The second element is seen in the lower part of the diagram: A relative edge strength value, also indicated in the description of the chipbreaker.

The third element is the color code indicating the ISO workpiece material area as per the table and examples below and for each chipbreaker in the diagram further decribed below.

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30

Chipbreaker chart for positive basic shape inserts



ISO material group use, positive basic shape inserts

AL — Superalloys (ISO S); Non-ferrous alloys (ISO N)

F1 — Steel (ISO P); Stainless steel (ISO M)

M5 — Steel (ISO P); Stainless steel (ISO M); Cast iron (ISO K)

R3 — Steel (ISO P); Stainless steel (ISO M); Superalloys (ISO S)

Chipbreaker application areas – negative inserts

The turning chipbreakers are designed to give the proper edge geometry for different application areas. The product designs are considering capability in chipbreaking, chipcontrol, edge toughness behavior, edge line integrity as well as the overall turning work to be done such as rough and finish turning for certain workpiece materials.

The idea with the chart below for negative basic shape inserts is to visualize three of these design elements in one diagram.

The first element is seen on the left side of the diagram with the letters

F = Finish turning

M = Medium turning

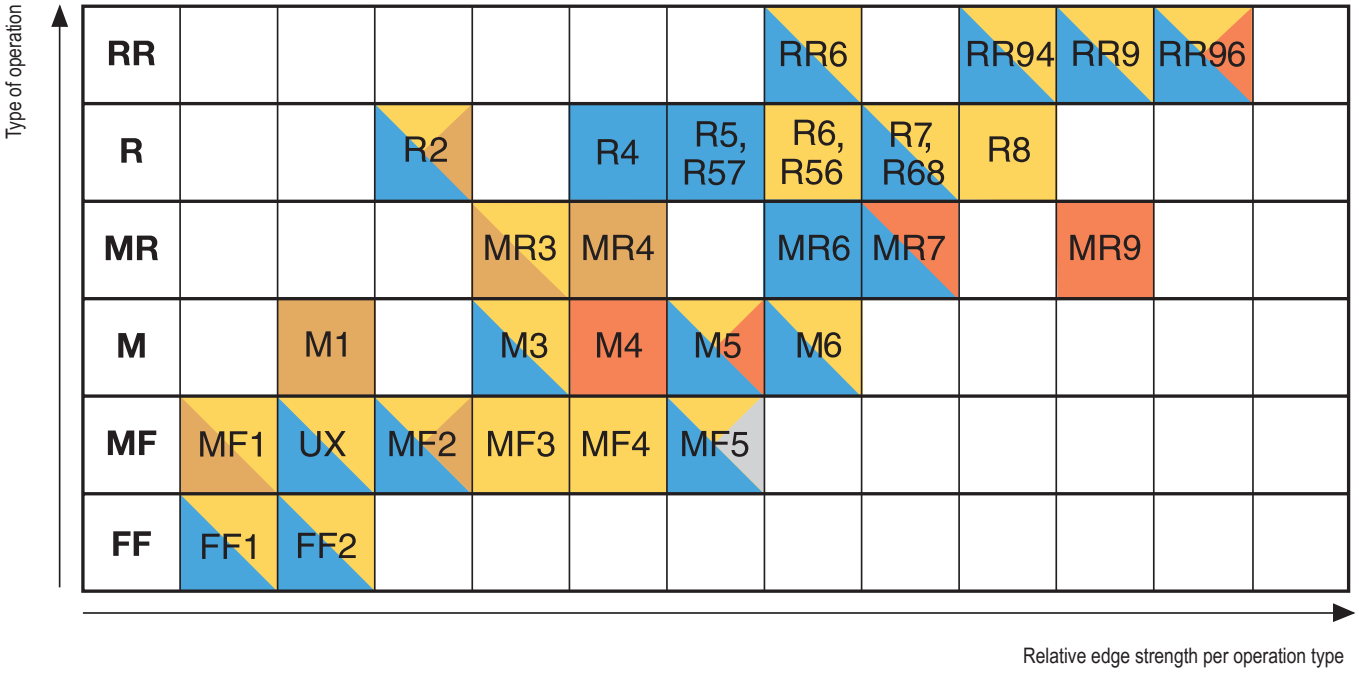
R = Rough turning

and combinations thereof also indicated in the description of the chipbreaker.

The second element is seen in the lower part of the diagram: A relative edge strength value, also indicated in the description of the chipbreaker.

The third element is the color code indicating the ISO workpiece material area as per the table on the previous page and examples below.

Chipbreaker chart for negative basic shape inserts



ISO material group use, negative basic shape inserts

MF1 – Stainless steel (ISO M); Superalloys (ISO S)

MF2 – Steel (ISO P); Stainless steel (ISO M); Superalloys (ISO S)

MF4 – Stainless steel (ISO M)

MF5 – Steel (ISO P); Stainless steel (ISO M); Hardened steel (ISO H)

M1 – Superalloys (ISO S)

M5 – Steel (ISO P); Stainless steel (ISO M); Cast iron (ISO K)

MR7 – Steel (ISO P); Cast iron (ISO K)

MR9 – Cast iron (ISO K)

R4 – Steel (ISO P)

High Feed Wiper inserts – brief introduction

For the turning professional with an ambition to have higher effectiveness and efficiency, especially when looking at chipbreakers and connecting back to insert shapes there is a need to mention High Feed Wiper inserts.

Seco High Feed Wiper Inserts offer either

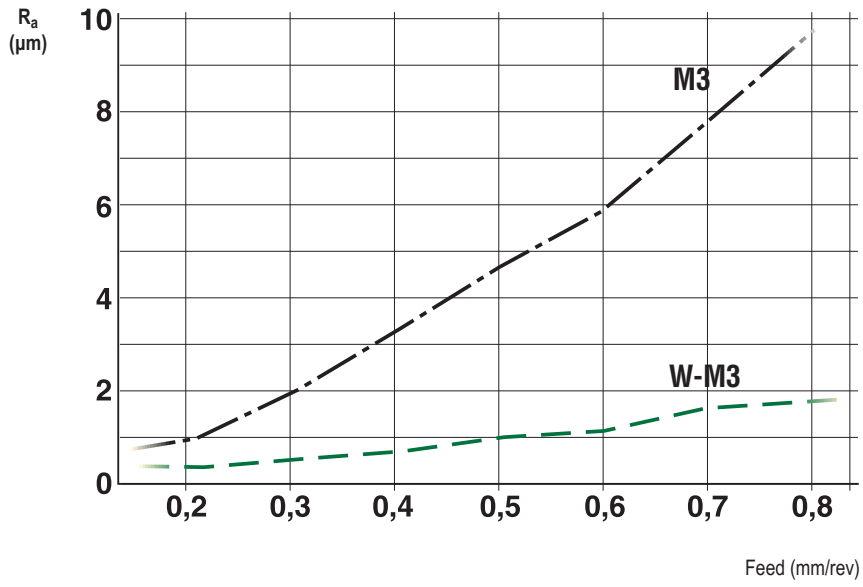
– Excellent surface finish and productivity at high feed rates

or

– Superior surface finish at normal feed rates

W	N	M	G	06	04	08	W	-	M3
1	2	3	4	5	6	7	8		12

Seco has a high feed wiper offering in inserts for most applications such as Advanced Materials and can for example be recognized by the "W" in the edge property "position 8" in the ISO insert Code Key as indicated above.



The outcome from using a High Feed Wiper insert can actually even eliminate the need for a separate finishing cut, which is indicated and decribed below.

According to the diagram above Seco High Feed Wiper Inserts (in this case CNMG120408W-M3, TP2501) shows an outcome with superior surface finish in R_a (see Y-axis) achieved in steel turning compared to standard insert (in this case CNMG120408-M3, TP2501).

For clarity the conditions for the test were 1mm depth of cut and cutting speed adjusted according to recommendations depending of feed used in SMG P4 longitudinal steel turning. Further details can be found exploring for example the www.secotools.com (see follwing pages).

Searching Turning Tools

To complement this present catalogue there are several ways to connect to www.secotools.com which help you make the use of your tools from Seco.

The webpage of www.secotools.com contains several entries like "Search for anything" including direct Product Search as well as the sequencial route by clicking "Products" in the head-banner according to the below image, ending up in the view shown to the next page.

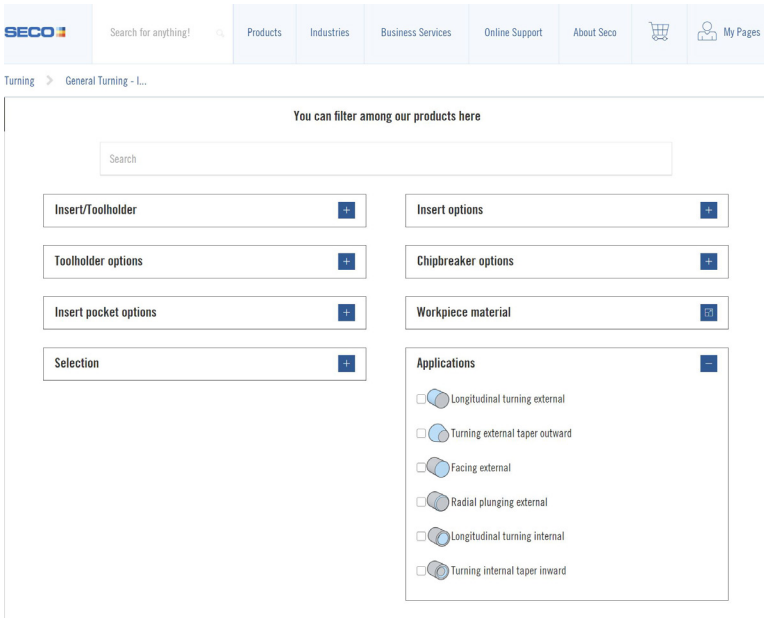
Under products you find overall applications and the Turning subgroups easily.

However, the "Search for anything" field in the heading gives instant access to many things available at www.secotools.com especially if you want to know more about the topic or tool you are looking for.

It is recommended to try yourself by reading the QR-code in the upper right corner on present page for easy access alternatively search by Designation, Item-number, Grade or Type in www.secotools.com in any webbrowser or download and use link functionality of the Seco Assistant application, available in the Google Playstore or Apple App-store.

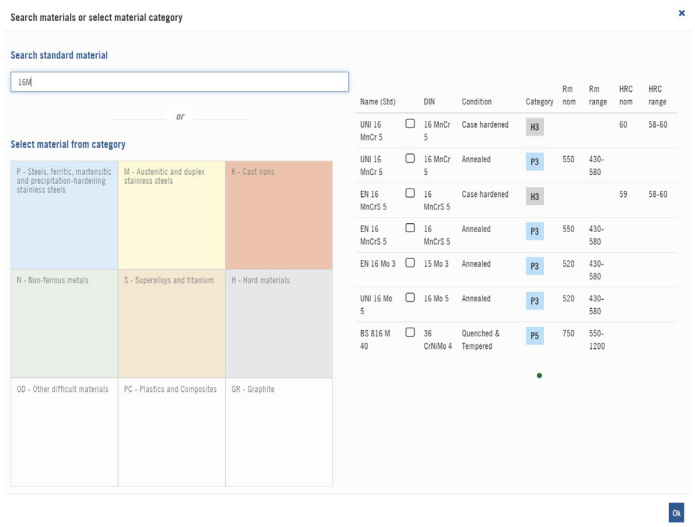


Searching using filter options

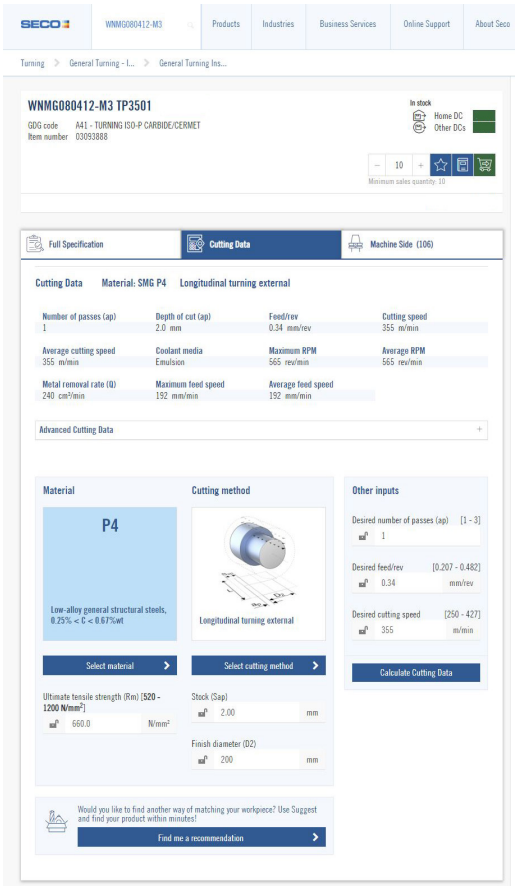


If a Turning subgroup is chosen such as General Turning – ISO (previous page) you enter a filtering view (above) where several options open up, principal application types and workpiece materials in addition to all available features on inserts, chipbreakers and toolholders.

There are opportunities to expand each filter section by pressing the right-most ”plus” as indicated above for the ”Application”-section of the filter.



Exploring cutting data recommendations



After filtering and choosing a specific product or directly product-searched an insert (in this case WNMG080412-M3,TP3501), the product specific information is accessed such as availability of stock and cutting data recommendations for the specific product (refer to the screenshot on the left).

However, there are many things to explore even when looking only at the cutting data view (lower left).

For example in the lower part of cutting data sheet there are options to refine the cutting data in order to get closer to any specific operation in particular. For example, the stock to be removed, number of passes estimated, or to adjust to the actual tensile strength of the steel. After you have made these changes, you can click on “Calculate Cutting Data”, and the cutting data view will be updated accordingly.

For the turning professional there is also an ”Advanced Cutting Data” section available when logged into MyPages.

This section will expand when clicking anywhere within the marked row.

Once you expand the “Advanced Cutting data, you will have access to change actual limitations such as ”RPM”, ”Machine Power” and ”Operation type – finishing” entering a surface finish requirement to come even closer to actual and specific application conditions.

Once again it is recommended that you try these yourself by reading the QR-code in the upper right corner for easy access alternatively search or type in directly www.secotools.com in a webbrowser.

If you are at the machine and not have access to a computer, you can find cutting data or machining calculators in the Seco Assistant app (see separate QR-code).

However also as indicated to the left there is further help for the turning professional to explore how to achieve maximum effectiveness and efficiency out of turning operations as long as you are logged in.

By further expanding into ”Cutting Data Graphs” the dynamic graphs for the specific insert selected (in this case WNMG080412-M3 / *WNMG433-M3*, TP3501) give further detail visualizing (however not limited to) the recommended use of the insert. Generally the graphs show ranges for the basic cutting data together with the current result and the applicable constraints.

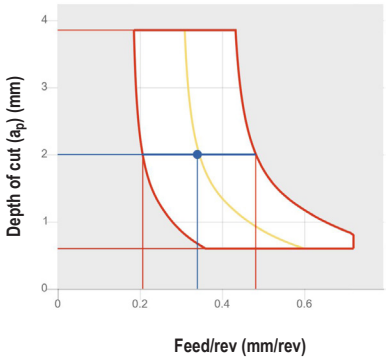
To the upper left there is a graph of the ”Working Range” indicating the recommended depth of cut and feed range.

In the center the ”Taylor-curve” diagram connects the estimated tool life and cutting speed recommendation for the chosen SMG category workpiece material and insert combination.

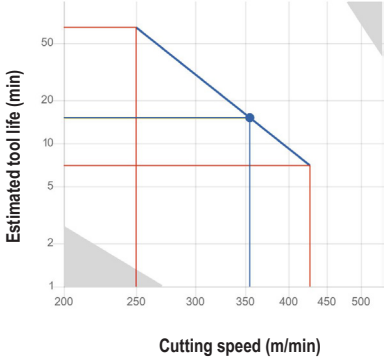
To the very right the ”Speed Range” graph indicates the relationship between recommeded speeds and feeds.

The turning professional should be aware that there are options to introduce contraints such as “Machine Power”, “RPM” and “Surface finish” in cutting data calculations. Consequently these kinds of constraints will then appear in graphs such as the below shown. It is highly recommended to try and explore how cutting calculations and cutting data graphs can provide insight and understanding for easier problem solving and during preparations of turning applications.

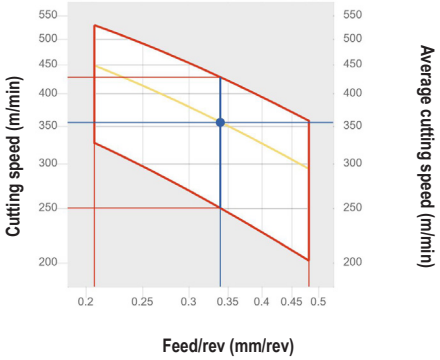
Working range $a_p(f)$



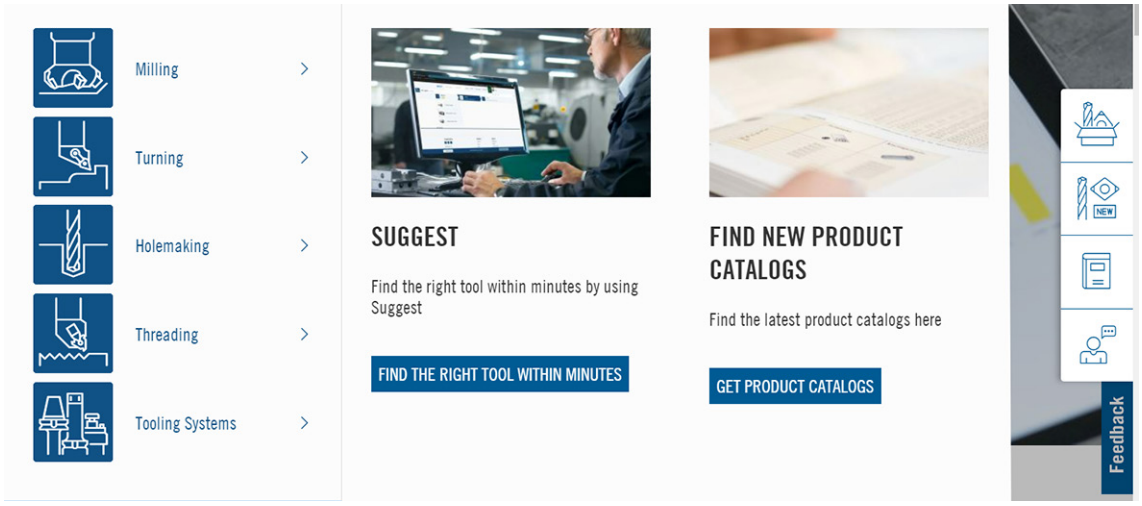
Taylor TL(v_c)



Speed range $v_c(f)$



Component based product recommendations



When starting from and considering a component instead of going directly to a turning product it is highly recommended that you use the Seco Suggest to search for tool recommendations based on principal components, applications and requirements. Below the entry view of Seco Suggest.

Please also note the four shortcut icons to the right of the screen shot above where Seco Suggest also can be accessed directly. Those are recommended to try yourself via reading the QR-code in the upper right corner for easy access by cell phone alternatively search or type in www.secotools.com as well as in your computer webbrowser or download and use this functionality in our new Seco Assistant application, available in the Google Playstore or Apple App-store.



Insert grades – Carbide

To say that the choice of a grade everytime is easy may be an exaggeration, but there are easy rules of thumb to be used using the diagram below as a starting point.

If you are looking for the first choice grade, you could follow this methodology:

1. Start from the type of workpiece material. For example, in the table below, for steel, the ISO-P grades are the first choice.

2. You should look for black application coverage areas below first which indicate grades first of all designed for the application area then white for the complementary areas.

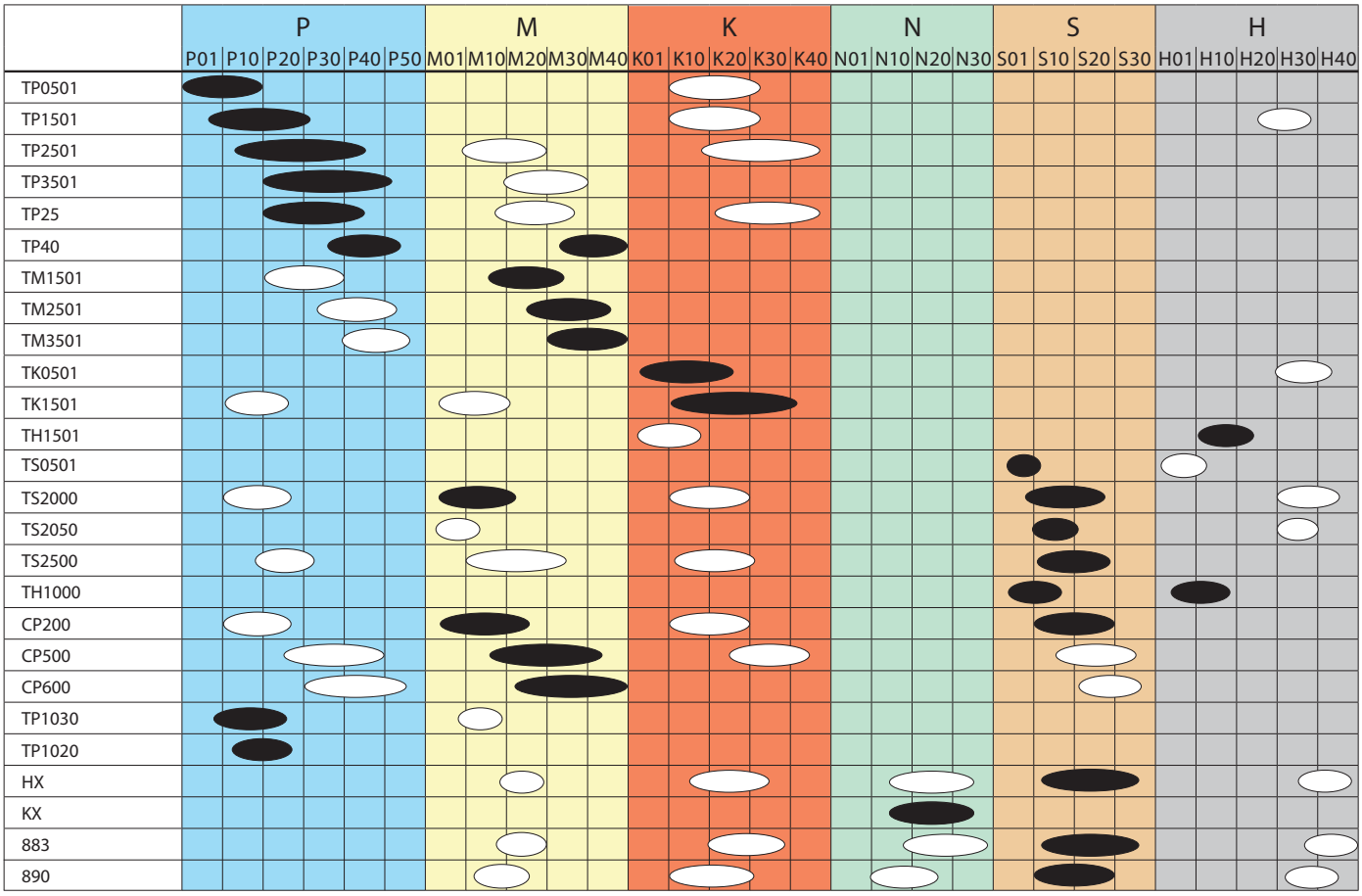
3. Then there are application divisions based on an ISO platfrom from center to i.e. for example P25 towards higher P35 which means tougher requirements and lower cutting speeds or P15 towards higher speeds or often higher surface requirements.

4. When one of the promising option chosen follow the row to the left i.e. if looking at medium turning with medium size inserts P25 the first choice would be Duratomic TP2501, but considering as high requirement on reliability but more versatility and less productivity focus the TP25 could be an option.

This is a straight-forward method giving a good first choice but there are several ways to address a skilled turning artesans' needs.

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30



The black areas in the chart indicate an insert's main ISO application groups and the white areas indicate other supplementary application groups.

An alternative would be to try finding a recommended solution in Seco systems yourself by reading the QR-code in the upper right corner for for easy access alternatively web-search or type in www.secotools.com/suggest in your webbrowser.

Introduction – PCBN

Polycrystalline Cubic Boron Nitride (PCBN) is a material which is sintered at extremely high pressure and high temperature into a wear-resistant material with properties close to those of diamond. Due to the hot hardness, oxidation resistance and fracture toughness of the material, inserts made of PCBN have excellent edge strength and long tool life when machining hard ferrous materials and pearlitic grey cast iron.

Secomax™ PCBN inserts are suitable for machining:

– Hardened steel (including hard-facing alloys)

– Pearlitic grey cast iron

– Chilled and white cast iron

– Manganese steel

– Cemented carbide

– Valve seat materials

– Powder Metallurgy (PM) alloys

– Nickel-based superalloys e.g. Inconel 718

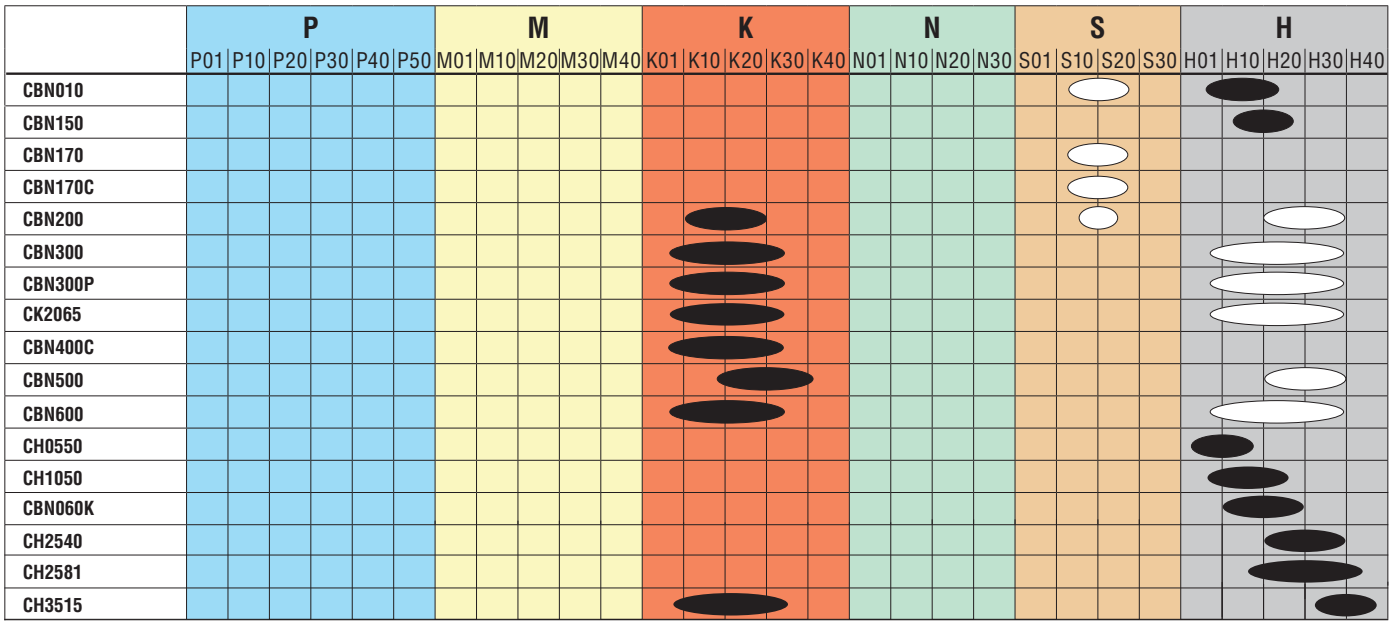
For more information including a comprehensive guide to understanding and applying PCBN successfully, please ask your sales representative for the Secomax™ PCBN, Technical Guide (available in English).

Insert grades – PCBN

The Secomax™ PCBN range of grades consists of both coated and uncoated grades.
The application areas for the Secomax™ grades are shown below.

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30



The black areas in the chart indicate an insert's main ISO application groups and the white areas indicate other supplementary application groups.

Introduction – PCD

Polycrystalline Diamond (PCD) is produced by sintering together carefully selected particles of diamond under conditions of high temperature and high pressure. PCD cutting tools combine the hardness, abrasion resistance and thermal conductivity of diamond with the toughness of tungsten carbide.

Secomax™ PCD inserts are suitable for machining non-ferrous metals and alloys, e.g.:

– Aluminium
– Copper
– Brass
– Bronze

It can also be used for other materials, e.g.:

– Composites (MMC, ...)
– Reinforced plastics
– Graphite
– Cemented/tungsten carbide
– Ceramics
– Titanium alloys

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30

	P						M					K					N				S				H				
	P01	P10	P20	P30	P40	P50	M01	M10	M20	M30	M40	K01	K10	K20	K30	K40	N01	N10	N20	N30	S01	S10	S20	S30	H01	H10	H20	H30	H40
PCD20																													
PCD30																													

Introduction – Ceramic

Secomax ceramics include a range of products developed to meet the manufacturing industries ever increasing demands on productivity and product performance.

The inserts are die-pressed and sintered by a HIP process using very fine and pure raw materials with fine microstructure to reach excellent material properties. All surfaces are then ground ensuring a product with superior dimensions and tolerances.

This comes together in a product with outstanding features:

– high thermal shock resistance

– optimised fracture toughness

– excellent wear resistance

– high product quality

Application areas

Heat resistant superalloys (HRSA) include a broad range of nickel, iron and cobalt based alloys developed specifically for applications demanding exceptional mechanical and chemical properties at elevated temperatures.

Seco ceramic inserts are intended for rough machining of nickel based heat resistant superalloys. The most common nickel based superalloy is Inconel 718, which is a precipitation hardenable nickel chromium alloy containing significant amounts of iron, niobium and molybdenum along with lesser amounts of aluminium and titanium.

Other common nickel based superalloy names are:

– Hastalloy

– Haynes (Waspaloy)

– MAR

– Nimonic

– Rene

– Udimet

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30

	P						M					K					N				S				H				
	P01	P10	P20	P30	P40	P50	M01	M10	M20	M30	M40	K01	K10	K20	K30	K40	N01	N10	N20	N30	S01	S10	S20	S30	H01	H10	H20	H30	H40
CS100																													
CS250																													
CS300																													
CW100																													

Turning problems & recommended solutions

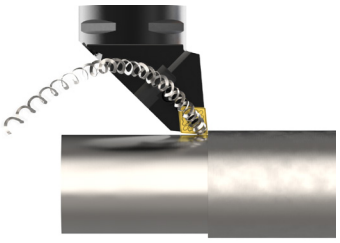
Search and install the Seco Assistant App on AppStore or GooglePlay. Please explore the app for example Utilities and connected to this page Tool Optimization under Turning. The Seco Assistant App provide a more complete list of recommended solution options.

Too long unstable chips (e.g. risks for tangling)

One of the main concerns even for the turning professional is the chipcontrol often concerning chipbreaking. Here is how to start:

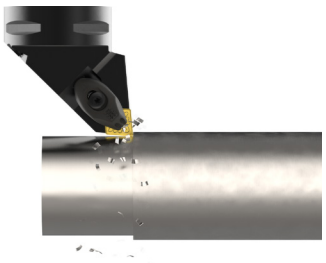
Too long unstable chips (e.g. risks for tangling)

1. Try increasing the feed rate and/or depth of cut
2. Change to a more suitable tighter chipbreaker. Use the chart on page(s) 61-62 and choose one below or to the left of the one in present use or search a recommended insert via www.secotools.com/suggest
3. Start the Seco Assistant app. Check under Utilities/Tool Optimization/Turning/Poor chip control for a more complete list of options.



Too hard-curled very short chips (e.g. risks for excess heat)

1. Try lowering the feed rate and/or depth of cut
2. Change to a more suitable open chipbreaker. Use the chart on page(s) 61-62 and choose one above or to the right of the one in present use or search a recommended insert via www.secotools.com/suggest
3. Start the Seco Assistant app. Check under Utilies/Tool Optimization/Turning/Hard chip control for a more complete list of options



Too much vibrations (e.g. risk marks and breakages)

1. Secure workpiece clamping and tools
2. Try changing cutting speed and/or feed
3. Reduce the depth of cut
4. Select a more easy-cutting chipbreaker. Use the chart on page(s) 61-62 and choose one often left of the present in use or search recommended products via www.secotools.com/suggest
5. Start the Seco Assistant app. Check under Utilies/Tool Optimization/Turning/Vibrations for a more complete list of options



Poor surface finish (e.g. risk not reaching requirements)

1. Reduce the feed rate
2. Increase cutting speed
3. Select a high-feed Wiper insert chipbreaker in accordance to the code key then use the product-search feature at www.secotools.com or search recommended products via www.secotools.com/suggest
4. Start the Seco Assistant app. Check under Utilies/Tool Optimization/Turning/Poor surface finish for a more complete list of options

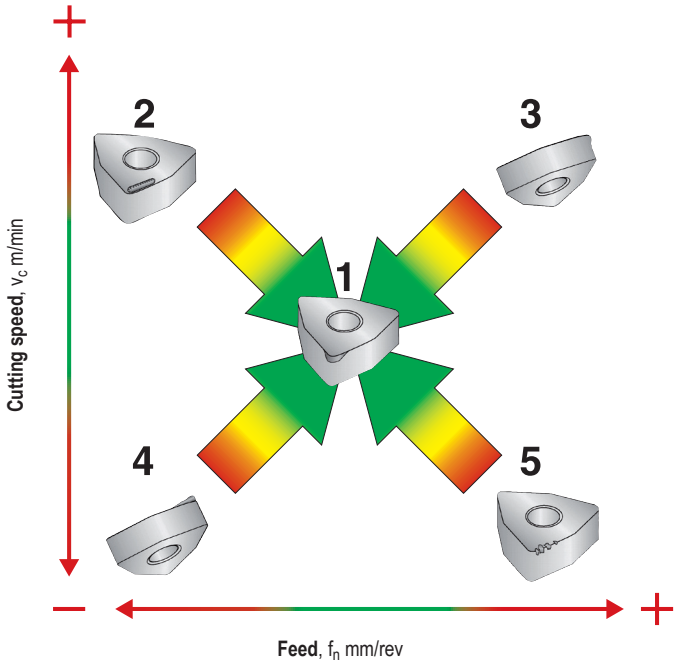


Optimization – Wear

When optimizing tool life for coated carbide grade inserts we ought to look at and consider wear behavior which to a high degree relates to the workpiece material and conditions for a turning application.

A general straight-forward method to achieve optimimum tool life could be described as the below chart as long as there are freedom to change cutting speed and feed rate. However it requires some insight in insert wear as in the picture indicated below, but most turning professionals have to consider that any severe wear process may end up with a fracture.

The diagram below should be read in the following way for example if you find plastic deformation as indicated in “3” you should reduce the feed and/or speed to have a stable flank wear as indicated in “1” to get long tool life.



1. Flank wear
2. Crater wear
3. Plastic deformation
4. Built-up edge
5. Chipping, Fracture

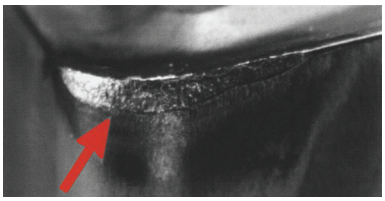
Insert wear and failure modes

When in need to go in more depth on the topic of wear of coated carbide insert and solve challenges based on wear processes the following collection will provide a comprehensive platform.

Please install the Seco Assistant App on AppStore or GooglePlay and explore the app under Utilities and Tool Optimization under Turning. Here you will find a more complete list of recommended solution options.

Normal flank wear

The normal flank wear, since it is uniform, predictable and dependable, is the most desirable wear mode.



Cause

Abrasive wear. Hard microscopic inclusions often of carbides at workpiece material surface in contact with insert cut into the insert. In some cases fractions of non-contained microscopic hard particles that cannot be retained in a matrix may tumble between surfaces in contact and also cut into the insert. An irregular flank wear that initially may look uniform, as well as too rapid though uniform flank wear, prematurely reaching a set target wear criterion, requires a corrective action in some form.

What to look for

– Relatively uniform abrasion along the cutting edge

– Non-uniform appearance may indicate influence of other wear modes (see other wear descriptions)

Note: Metal from the workpiece can be smeared over the cutting edge and can exaggerate the apparent size of the wear scar.

When to expect it

– In all materials, an insert will finally fail due to normal flank wear if it doesn't fail from something else first.

Corrective actions (to rapid flank wear)

– Select a more wear resistant, harder, or coated carbide grade

– Reduce the cutting speed (or RPM)

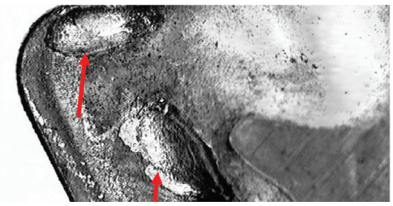
– Apply coolant correctly

– If possible, select insert with larger radius

Crater wear

Cause

A combination of chemical diffusion, decomposition and abrasive wear causes cratering. Classically, the heat from workpiece chips decomposes the tungsten carbide grains in the substrate, and carbon leaches into the chips (diffusion), creating a 'crater' on the top surface or rake face of the insert. The crater will eventually grow large enough to cause the insert to fail e.g. by chipping or rapid flank wear. Modern coating technology such as Duratomic® has reduced this wear mode drastically, but when trying to improve the productivity, using higher cutting data, it inevitably appears again.



What to look for

– Craters or pits on the top or the rake face of the inserts

– Chipbreaking may change to better or worse after cratering started

When to expect it

– Iron or titanium-based alloys

Corrective actions

– Use wear resistant grades and if needed try another grade with other coating design

Or reduce heat by…

– Using coolant

– Using a freer cutting geometry

– Reducing the cutting speed (or RPM)

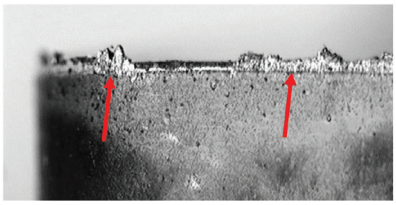
– Changing feed rate

SecoAssistant App

Built-up edge

Cause

Material adhesion. Built-up edge (BUE) is a result of the workpiece material being pressure welded to the cutting edge. This could be an indicator of exit conditions from cutting in workpiece materials with high chemical affinity, high cutting forces/pressure, and locally insufficient temperature around the cutting zone. The wear mode itself could in some cases even be beneficial for tool life, but the consequence of built-up edge breaks off and allows chips to bring pieces of the insert with it or acting as an indicator of chipping, notching or other discontinuous wear modes, makes it important.



What to look for
– Shiny material on the top or flank of the insert edge
– Erratic changes in part size or surface finish

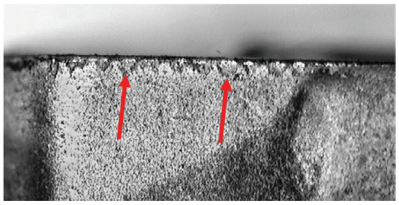
When to expect it
– High temp alloys and stainless steel and other workpiece materials appearing 'gummy'
– At relatively low speeds especially at limited cuts e.g. facing to center & parting-off and even more apparent in the centre of a drill

Corrective actions
– Change of grade to other coating designs may reduce built-up edge.
– Increase the cutting speed (or RPM) or increase the feed rate
– Try an insert with a sharper cutting edge geometry
– Apply coolant correctly or not at all; perhaps do another check on the emulsion concentration

Chipping

Cause

Mechanical instability or material adhesion. Chipping of the insert edge could be a result of vibrations in the workpiece or spindle. Larger hard inclusions in the material being cut and interrupted cuts may result in local stress concentrations that can cause chipping. In addition adhered material may cause a tensile stress that on removal can tear off parts of an insert.



What to look for
– Chipping along the edge of the insert

When to expect it
– Non-rigid set-ups (bad bearings, worn spindles, etc.)
– Demanding entrance and exit conditions
– Hard spots at well as soft spots in work materials
– Powder Metallurgically (PM) made materials

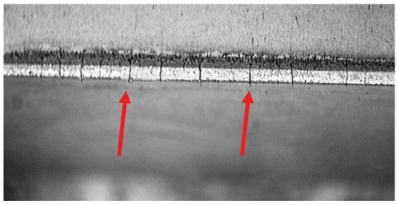
Corrective actions
– Ensure rigid machine tool setup
– Change over to tougher insert grade or stronger cutting edge geometry
– Reduce the feed rate
– In some cases, turn-off the coolant
– See also corrective actions for built-up edge

SecoAssistant App

Thermomechanical failure

Cause

A combination of thermal cycling (frequency changing the working temperature for the insert rapidly), thermal load (amount of heat), thermal shock (fast temperature change from warm to cold and the other way around in different zones), and mechanical shock (stress change from release to full load) causes thermo mechanical failure. Stress cracks form along the insert edge, eventually causing sections of carbide to pull out and appear to be chipping. Seen most commonly in milling.



What to look for

– Multiple cracks perpendicular to cutting edge
– Irregular chipping on edges or wear spots on rake face

When to expect it

– Intermittent cuts e.g. facing over slots, but also tool paths when machining a large number of parts creating the thermal cycling or intermittence in coolant flow

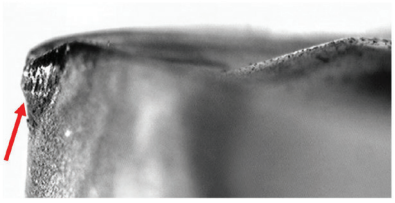
Corrective Actions

– Apply coolant differently or not at all
– Select a tougher grade
– Reduce the cutting speed (or RPM) or reducing the feed rate
– Use a free-cutting geometry or chipbreaker to reduce heat

Edge deformation

Cause

Thermal overloading. Excessive heat causes the carbide binder (cobalt) to soften. It could come in combination with mechanical overloading where the pressure of the insert against the workpiece all in all making an insert edge deform partly or fully, eventually breaking off or leading to irregular flank wear.



What to look for

– Deformation at the cutting edge or excessive irregular flank wear
– The dimensions of the workpiece may change drastically

When to expect it

– High speed and/or high feed rates
– Hard steels or work-hardened surfaces
– High temperature superalloys or stainless steels

Corrective actions

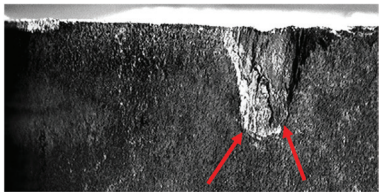
– Apply coolant correctly
– Try a harder, more wear resistant grade
– Reduce cutting speed (or RPM) or reduce the feed rate
– Select an insert with other geometric features

SecoAssistant App

Notching

Cause

Combinations of local properties in workpiece materials and cutting conditions. Notching is often caused by the conditions at the surface of the workpiece e.g. surface hardening from previous cuts, forged or cast surfaces, or surface scale. This causes the insert to wear more rapidly in that part of the cutting zone. Local stress concentration can also lead to notching as a result of the compressive stress along the cutting edge and lack of the same behind the cutting edge – the insert is particularly affected at the depth of cut.



What to look for

– Notching or clusters of chippings for example at the depth of cut area on the insert

Note: The notch could be of two kinds; the smoother which indicate more chemical/abrasive interaction or the irregular more mechanical/adhesive extensive chipping.

When to expect it

– Materials with surface scale or oxidation

– Work hardening materials

– Cast or other process affected surfaces

Corrective actions

– Vary the depth of cut

– Adjust the feed rate or increase cutting speed (Note: This will generate more flank wear)

– Select a tougher insert grade

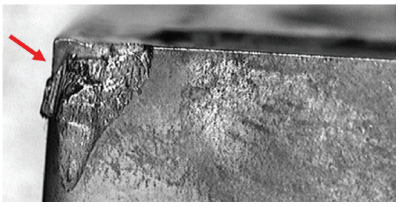
– Exchange chipbreaker design drastically

– Prevent built-up edge

Mechanical fracture

Cause

Excessive load (also caused by other wear modes than finally) can cause mechanical fracture. Mechanical overload could of course cause the insert to break from the first moments in a cut to the exit or even after the release from cut. To be considered are also surrounding cutting conditions such as the conditions of the shim, workpiece clamping or machine condition.



What to look for

– Fracture of insert (e.g appearing as irregular flank wear often at the insert radius)

– Sudden increase of cutting force level

When to expect it

– Inhomogeneous workpieces e.g. with major inclusions, pores or design features that cause heavy impact or load release

– Unstable cutting conditions

– Low cutting data especially cutting speed

Corrective actions

– Reduce the feed rate or the depth of cut

– Increase speed

– Verify set-up rigidity

– Select a tougher insert grade or a more secure insert or cutting edge

– If possible reduce workpiece's inclusions and difficult geometrical features

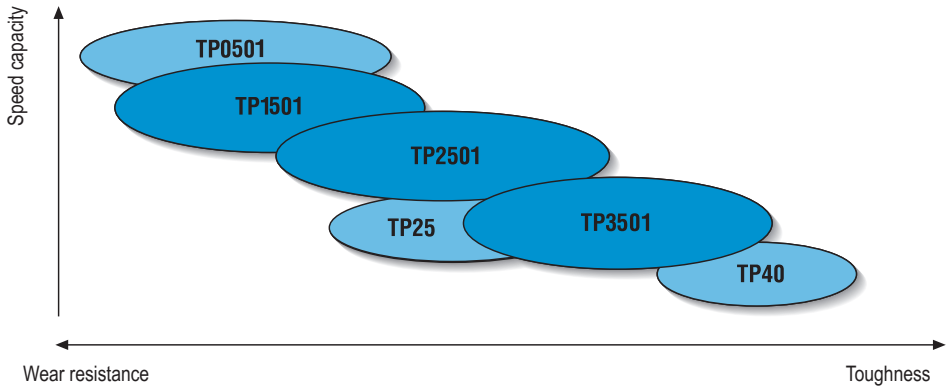
Optimisation – Grades

SecoAssistant App

However when considering wear there are limitations as well as property relations for each and between every grade even though Duratomic grades have redefined the actual opportunities considering productivity and tool life.

When looking a the simple coated cemented carbide grade overview for steel turning in the chart below, you can see that the TP2501 grade is placed in the center corresponding to the P25 application area referred earlier. However, in this chart, the speed capabilities of different grades and their wear properties are illustrated with more clarity.

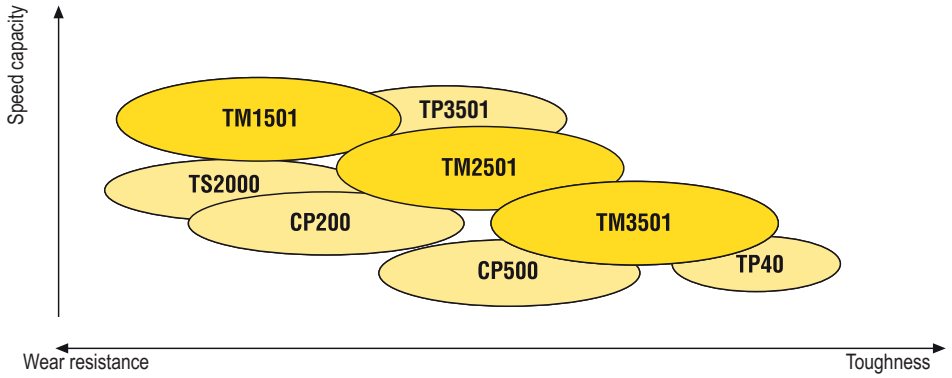
Steel



That means a chain of property relations could guide you towards a more insightful choice e.g. if you are after dry continuous steel turning TP0501 is a good choice, but lower speed medium turning application TP25 is better.

When instead, looking at the simple coated cemented carbide grade overview for stainless steel turning area below the number of grades introduced in the diagram have grown. However, the pattern where TM2501 is placed in the center, corresponding to the M25 application area can be recognized.

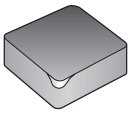
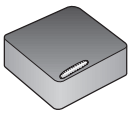
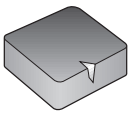
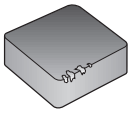
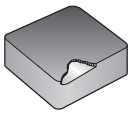
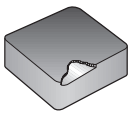
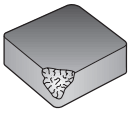
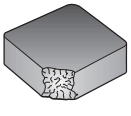
Stainless steel



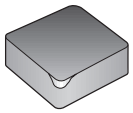
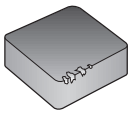
The well connected TM1501, TM2501 and TM3501 Duratomic grade chain covers applications in stainless steel turning, but also the thin PVD-coated TS2000, CP200 to CP500 complements the above high productivity CVD grades with reliability, but not at as high speeds as the Duratomic grades.

On the other hand TP3501 has been designed to have complementary properties to work well in stainless steels despite the grade was developed for steel turning.

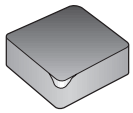
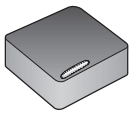
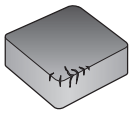
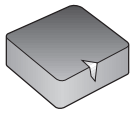
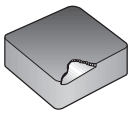
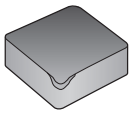
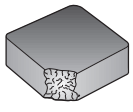
Troubleshooting – PCBN

Problem		Cause	Suggested action(s)
Flank wear		– Not correct edge temperature	– Increase cutting speed – Increase feed rate – Increase depth of cut – Check cutting tool centre height – Check the ferrite content
Crater wear		– Not correct edge temperature	– Decrease cutting speed – Decrease feed rate – Reduce chamfer angle – Use E edge preparation – Use coated insert – Use coolant (only in continuous cut)
Notch wear		– Not correct edge temperature – Too high cutting forces	– Increase cutting speed – Decrease feed rate – Increase insert approach angle (preferably round inserts) – Vary the depth of cut – Use inserts with chamfered cutting edges
Edge chipping		– Too high cutting forces	– Use inserts with chamfered cutting edges – Increase system rigidity – For interrupted cuts, chamfer the tool entry/exit slots and holes – Vary the cutting speed to eliminate vibrations
Edge flaking (continuous cut)		– Too high cutting forces	– Increase cutting speed – Reduce feed rate – Use chamfered and honed cutting edges – Check cutting tool center height – Reduce insert approach angle
Edge flaking (interrupted cut)		– Too high cutting forces	– Do not use coolant – Use chamfered and honed cutting edges – Reduce feed rate – Increase cutting speed – Check cutting tool centre height – Reduce insert approach angle
Edge breakage		– Too high cutting forces	– Reduce depth of cut – Reduce cutting speed – Increase nose radius – Use chamfered and honed inserts – Check cutting tool center height
Insert breakage		– Too high cutting forces	– Check insert seating – Check insert shim and insert clamp – Check cutting tool centre height

Troubleshooting – PCD

Problem		Cause	Suggested action(s)
Flank wear		– Wrong grade – Presence of Fe/Ni/Co	– Change to coarser PCD grade – Check material composition – Reduce cutting speed – Use coolant
Built-up edge		– Not correct edge temperature – Wrong grade	– Decrease or increase cutting speed – Choose a sharper insert – Change to a finer grade
Edge chipping		– Poor rigidity – Wrong grade – Incorrect cutting data – High run-out	– Minimize vibrations – Change to a tougher grade – Change cutting data – Check set-up
Poor surface finish		– Wrong grade – Too high cutting data – Incorrect wiper position	– Change to a finer PCD grade – Reduce cutting speed and feed rate – Check wiper position
Flaking of workpiece		– To high depth of cut	– Decrease depth of cut – Add entry chamfer on component

Troubleshooting – Ceramics

Problem		Cause	Suggested action(s)
Flank wear		– Excessive feed rate and cutting speed	– Reduce cutting speed – Use larger corner radius – Use high wear-resistant grade
Crater wear		– Excessive feed rate and cutting speed	– Reduce cutting speed – Use smaller lead angle – Check edge geometry
Thermal cracking		– Severe cycle of heating & cooling during cutting – Excessive feed rate and cutting speed	– Change to dry machining – Reduce cutting speed – Reduce feed rate
Notch wear		– Excessive feed rate and cutting depth	– Reduce cutting depth – Reduce feed rate – Increase coolant supply
Edge flaking		– Excessive feed rate – Separation of BUE – Weak cutting edge	– Check edge geometry – Increase stability of the system – Use larger lead angle
Plastic deformation		– Excessive feed rate and cutting speed	– Reduce cutting speed – Reduce feed rate – Reduce cutting depth
Built-up edge		– High affinity with workpiece – Low cutting speed	– Increase cutting speed – Increase feed rate – Use larger rake angle
Breakage		– Excessive feed rate and cutting depth	– Reduce feed rate – Reduce cutting depth – Increase stability of the system

ISO attributes

ISO attribute	Explanation
AN	clearance angle major
B	shank width
BAWS	workpiece side body angle
BD	body diameter
BLQ	balance quality code
CDRX	cutting depth radial maximum
CDX	cutting depth maximum
CDXI	cutting depth maximum insert
CDXSH	cutting depth maximum shank
CF	spot chamfer
CNT	coolant entry thread size
CP	max coolant pressure
CTMS	connection text machine side
CTWS	connection text workpiece side
CUTDIA	work piece parting diameter maximum
CW	cutting width
D1	fixing hole diameter
DCB	connection bore diameter
DCB1	connection bore diameter 1
DCB2	connection bore diameter 2
DCINN	cutting diameter internal minimum
DCINN2	cutting diameter internal minimum 2
DCINN3	cutting diameter internal minimum 3
DCONMS	connection diameter machine side
DCP	data chip provision
DCSFMS	contact surface diameter machine side
DF	flange diameter
DIX	tool changer interference diameter maximum
DMM	shank diameter
DUO	DUO Jetstream Tooling Duo, see page 85, [XXX], 96
EPSR	insert included angle
GAMO	rake angle orthogonal
H	shank height
HF	functional height
HRY	measure, Measure from ref. plane of mounting to bottom plane of unit in direction Y m
IC	inscribed circle diameter
INPLM	minimum initial plunge diameter
INPLX	initial plunge maximum
INSD	insert diameter
INSL	insert length
KCHL	corner chamfer angle left hand
KCHR	corner chamfer angle right hand
L	cutting edge length
LAMS	inclination angle
LB1	body length 1
LB2	body length 2
LCOG	length to center of gravity
LF	functional length
LF2	functional length_2
LFS	functional length secondary
LH	head length
LH2	head length 2

ISO attribute	Explanation
LIG	insert gauge length
LPR	protruding length
LS	shank length
LSC	clamping length
LU	usable length
OAH	overall height
OAL	overall length
OAW	overall width
PDX	profile distance ex
PSIRL	cutting edge angle major left hand
PSIRR	cutting edge angle major right hand
RADH	radial body height
RADW	radial body width
RE	corner radius
RETL	flank radius left hand
RETR	flank radius right hand
RoundedUpWeight	rounded up weight
RPMX	rotational speed maximum
S	insert thickness
TDZ	thread diameter size
TPI	threads per inch
W1	insert width
WF	functional width
WF2	functional width 2
WFS	functional width secondary

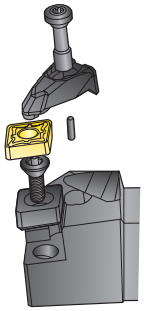
Toolholders, insert clamping principles

D Toolholder
First choice for general machining, external

– For negative basic shape inserts with hole

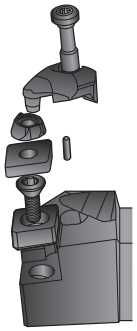
– Robust, stable locking arrangement

The insert is locked in position by means of a clamp which presses the insert into and down onto the fixed insert seat



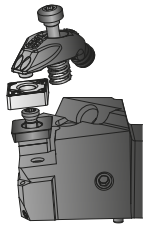
D.....-C Toolholder

– With pin and carbide pressure plate



D.....-JETI Toolholder

– With coolant clamp for Jetstream Tooling



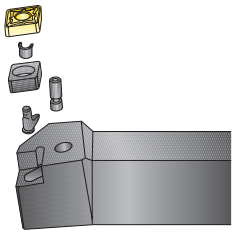
P Toolholder
A complement to the D Toolholder, external

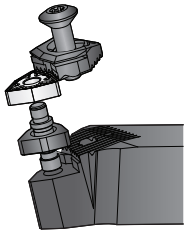
– For negative inserts with hole

– No clamp on the top, facilitates free chip flow

In the illustration when the clamping screw is tightened and the toggle lever secures the insert in the insert seat with a shim by a shim clip

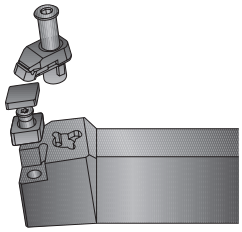
In the alternative design the clamping screw acts upon the wedge that pushes the insert towards the centre pin according to the illustration to the right





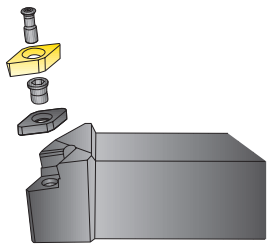
C Toolholder
Designed mainly for Seco PCBN inserts without hole

The insert is locked in position by means of a clamp, which is equipped with a carbide plate



S Toolholder
For external and internal turning with positive inserts

The insert is locked in position by a centre screw



Jetstream Tooling® – Introduction

Seco Jetstream Tooling® is a revolutionary solution to the problem of delivering coolant precisely to the cutting zone. It works by delivering a concentrated high pressure jet of coolant at high velocity straight to the optimum position close to the cutting edge. The jet lifts the chips away from rake face, improving chip control and tool life enabling increased cutting data. It is proven to show improvement in nearly all material groups and with a wide choice of coolant pressures.

Seco Jetstream Tooling® consists of holders for external turning, both square shanks, Parting-off blades and Seco-Capto™ backends. For internal turning, Jetstream Tooling® capability is being integrated to JET GL-Turning heads for Steadyline® and some internal turning bars with the help of the unique coolant clamps. It can be mounted and used on a large selection of machines. For general ISO turning coolant can either be supplied to the toolholder internally in the case of JETI or Seco-Capto™ toolholders or externally through a coolant hose.

The JETI product platform is developed with a compact assembly in mind. The JETI toolholders with integrated coolant channels eliminates the need for any external piping and connections that would otherwise obstruct machine movements in tight workspaces. Integrated channels in adapter and toolholder make it possible for coolant to reach the cutting edge directly from the adapter.

Hoses for external connection which is attached to one of the inlet positions of the toolholder allow the coolant supply to be connected to almost any position on the turret or tool block.

Seco Jetstream Tooling® Duo toolholders, feature both a rake face and flank face jet, that may provide even better chip control and significantly longer tool life.

Products are available for ISO turning with positive and negative inserts, as well as for Grooving and Parting-off. Note that it is up to the turning professional to make sure that all aspects of health and security are fulfilled.

Insert carrier	Maximum recommended coolant pressure	
	bar	psi
Square shank with hose	275	4000
GL-Head with Steadyline® bar – Cylindrical	200	3000
GL-Head with Steadyline® bar – HSK	100	1500
GL-Head with Steadyline® bar – Seco-Capto™	150	2000
Seco-Capto™	150	2000
JETI toolholders and blades	200	3000

Adapters	Maximum recommended coolant pressure	
	bar	psi
JETI Adapter with Seco-Capto™	150	2000
JETI Adapter with VDI	80	1100 (2000)
JETI Adapter with HSK-T	100	1500
JETI Adapter with Square shank	275	4000

When using toolholder together with an adapter the maximum coolant pressure is limited to the adapter's maximum coolant pressure.

Designation of Jetstream Tooling® holders follows ISO, see page(s) 12-17, 18-19.
Jetstream Tooling® for Grooving and Parting-off, see page(s) 677, 920, 966.



Coolant clamps

The unique 3D printed coolant clamps



The coolant clamp executes many functions. It provides a secure and fast clamping of the insert by virtue of the spring loaded design with a single screw. It directs and orients the high pressure coolant jets straight and close to the cutting edge. The manufacturing flexibility of the coolant clamp allows it to have an optimised coolant channel with different hole diameters.

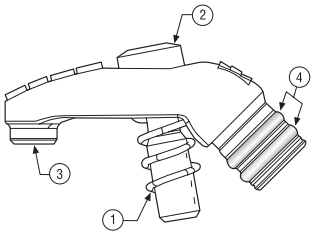
Selection includes standard, finishing and roughing coolant clamps with orientations neutral, right and left.

The horizontal orientation angles 0°, 10° and 20° are also available.

A major portion of the ordering code is laser marked on the coolant clamp.

The Jetstream Tooling coolant clamp is designed to have the coolant beam oriented as close as possible to the cutting point, this to get the best effect of the Jetstream coolant and to be able to break or redirect the chips. The APNOM value is a cutting depth indicator we recommend to stay below to get the intended performance.

Changing the insert



Simply loosen the spring loaded coolant clamp screw.

Change or index the insert. Ensure the coolant clamp pin and the double O-ring are well inside the fixing hole before tightening from the top.

Tighten the screw with recommended torque.

1. Spring
2. Clamp screw
3. Clamp pin
4. O-rings

Changing O-rings and screw

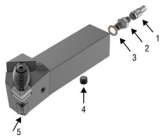


It is recommended that O-rings are checked regularly since the double O-rings are the coolant entry-point of the coolant clamps. When the O-rings are exchanged it is recommended to also make it a habit to exchange the screw to ensure pro-active high pressure operational safety.

After changing the O-rings, ensure that both the Coolant clamp pin & the O-rings are in the correct angle to the fixing hole position before tightening the screws, otherwise it may cause damage to the O-rings.

Jetstream Tooling® Assembly instructions

JETI Assembly instructions with hoses

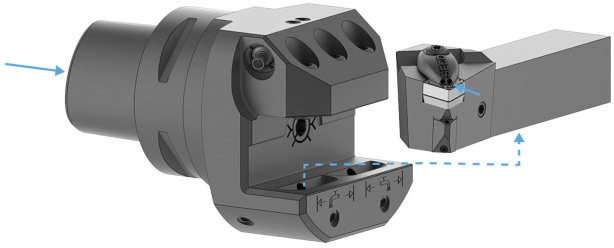


For personal safety, Jetstream Tooling® should only be used with the machine door in a fully closed position in accordance with general machine safety procedures. Please ensure that the coolant hose is located correctly and fully tightened with all seals in position. The unused coolant hose should have a blanking plug fitted.

For accessories, see page(s) 1029.

1. Coolant hose
2. 1/8" BSP Adapter
3. Copper washer
4. Plug

JETI Assembly instructions with adapter



To use the benefits of a JETI-holder there is a need to use toolholder adapter designed for JETI-connections. Maximum coolant pressure when using this feature is limited to the adapter's maximum coolant pressure.

Note: The unused coolant hole (from the back) should have a blanking plug fitted.

Seco-Capto™ – Introduction

Seco-Capto™ is a quick-change modular tooling system for quick set-up and replacement of the cutting edge.

Advantages

– Quick tool change, increases the available productive time.
– Flexible, same toolholder can be used in different machines which reduces the tool stock.
– Modular, building of tools with extension adapters reduces the tool stock.
– Rigid, no reduction of cutting data.
– Accurate, tapered polygon coupling produces a strong, self centering joint with repeatability within ±0,002 mm / *0.000078 inch*.

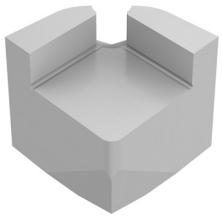
All toolholders have through holes for coolant.

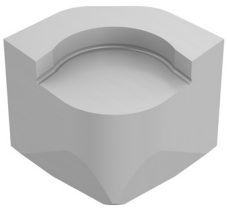
Seco-Capto™, Cassette holders for Advanced material

The replaceable cassette for PCBN and Ceramic inserts are made out of a special stainless steel with high hardness and high strength. This avoids damage to the pocket which is an otherwise normal occurrence in heavy roughing applications and will also protect the brittle insert.

The centering accuracy and repeatability of the cassette holder are as good as std Seco-Capto™ holders.







Advantages

– Flexibility and versatility by using different cassettes/ insert types in the same Capto unit will significantly reduce stock volume and net working capital.
– Cost savings as only pockets will need to be exchanged instead of entire holdes when insert pocket damages occur.
– Exceptional process reliability in applications with high risk of extensive tool wear.

Recommended tightening torques for the cassette and clamp

6 Nm

To apply the recommended tightening torque, we recommend to use torque spanners, available as accessories, see MN Tooling Systems catalogue.

Clamping units

The manual clamping units are available in different versions;

– VDI shaft, straight or angled.

– Shank type to use with external toolholders.

– Cylindrical type to use with internal toolholders.

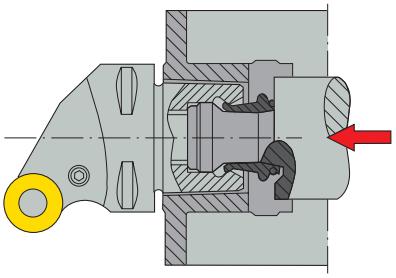
– Versions for special applications.

The unit is locked with a drawbar or screw from the back

Clamping units, please see page(s) 1013-1023.

Unclamped position

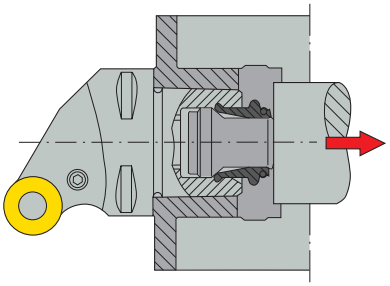
When the drawbar is pushed forward the diameter of the clamping segments decreases and the clamping segments are loosened from the cutting unit. The drawbar also pushes the cutting unit out from the joint.



Clamping segments

Clamped position

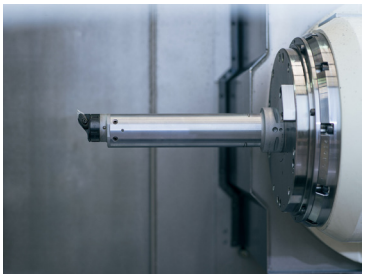
When the drawbar is pulled back, the diameter of the clamping segments expand and the cutting unit is pulled into position.



Clamping segments

Steadyline® vibration damping holders for turning and boring operations

Steadyline® for tool overhang challenges



Seco`s patented Steadyline® vibration damping holders may drastically improve the productivity of a turning assembly in application.

It allows the use of much higher cutting data, with quieter operation and optimum stability with the flexibility to optionally use same bars for turning and holemaking applications.

These boring bars are available in a range of:

– Body diameters

– Lengths

– Seco-Capto™, HSK-T/A and Cylindrical shank connections both in Metric & Inch Sizes.

– Exchangable GL-Heads for all diameters with intermediate BA-connection in some diameters

(The ranges are also indicated in the below Steadyline summary illustration see page 91)

The Picture to the right shows a Steadyline bar together with Jet GL-Turning head as mounted in machine.

Benefits from increased productivity of unique GL-Turning Heads

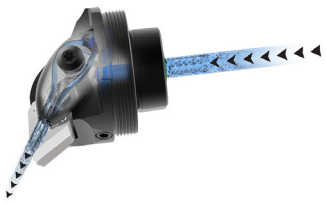
Every aspect of Steadyline® holders has been designed with the consideration for increasing productivity, capacity and machining economy in tool overhang challenges. The design features of the patented unique GL-Turning heads preserve & enhance the Steadyline bars to perform & deliver maximum benefits. Every GL-head has precisely ground, taper quadrilobe based connection which can be accurately centered & grabbed firm to the Steadyline® bar using the fine pitch threaded clamping nut delivering:

– The centering accuracy and repeatability of the GL-Heads as good as Seco-Capto™ quick-change system.

– Designed for 0°/180° turning head orientation.

– Optimum damping strength through short and compact GL-Heads for Steadyline bars.

Advantages are:



– Efficient: Ensures a quick and firm connection and thus decreases the head changing time drastically and increases productivity.

– Flexible: The quadrilobe enables 180 degree orientation of the turning head and hence can be used as left & right hand tools depending on the machining system.

– Accurate: The taper quadrilobe coupling produces a strong self-centering connection with repeatability within ±0,002 mm at identical conditions.

– Modular: Building different types and styles of Steadyline® bars with suitable GL-Turning heads reduces the inventory.

– Enhances the damping function: The compact and short GL-turning heads are close to the Steadyline® damping mass.

– Jetstream Tooling® gives higher tool life, especially for superalloys and enhances chipbreaking.

– Operational safety: The coolant seal at the backend and the double O-rings of the coolant clamp ensures maximum operational safety up to 200 bars.



The Jet GL-Turning heads further strengthen the solution by integrating the Jetstream Tooling® benefits to the GL-Turning head and in turn to the Steadyline® bar. JET GL-Turning

heads use a multifunction coolant clamp for the successful outcome by

-Increasing productivity by increased parameters, surface finish, tool life and vibration free machining

– Reduce head changing down times & insert indexing down times thanks to the unique GL-Heads

– Achieving highly accurate parts with secured surface finish

– Increasing selection & less critical spares for maximized versatility

– Increasing flexibility by using same bars for turning and boring & same heads for 0°/180° turning head orientation

– Controlling wear, heat & chips with Jetstream Tooling®

– Increasing operational safety at high pressures



GL -Turning head range offer most applicable designs for internal turning.

– Jetstream tooling integrated “Jet GL heads” ∅32, ∅40 and ∅50.

– Standard GL Heads for ∅25, ∅32, ∅40 and ∅50.

– Jetstream tooling integrated GL- Grooving/Parting off heads ∅25, ∅32, ∅40 and ∅50.

– Jetstream tooling integrated GL- Threading heads ∅25, ∅32, ∅40 and ∅50.

Note: GL25-turning heads don´t offer Jetstream tooling integrated to reduce the deflections to the minimum.



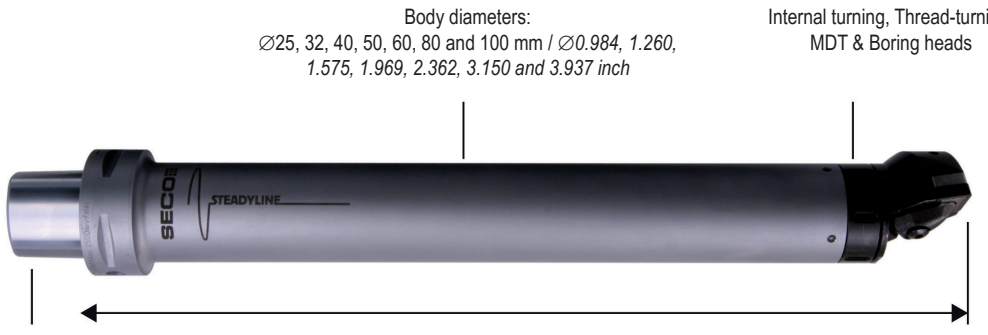
Detailed operating instructions are part of bars delivery content.

For details of GL-Turning Heads for Turning, and MDT, see page(s) 644-675.

For details of GL-Boring heads, see MN Holemaking catalogue.

Note: The Jet GL-Turning heads use a coolant clamp. See Coolant clamp page for more details regarding this in page(s) 86.

Steadyline turning product range summary



Product range and design

Steadyline body diameter	Machine side connections	Working length	BA Connection	GL-Heads	Jetstream Integration	GL-Head styles LH & RH	Inserts
∅25	C4, C5,C6 HSK-T/A63 ∅25, ∅25.4 (1”)	6xBD (Steel) 8xBD (Steel) 10xBD (Carbide reinforced)	–	GL25	–	SCLCx-09, SDUCx-07 & 11, SDXCx-11, SDUCx-11X, STFCx-11, SVUBx-11, SDUNx-11	CC09, DC07, DC11, TC11, VB11, DN11
∅32	C4, C5, C6,C8 HSK-T/A 63 HSK-T/A100 ∅32, ∅31.8 (1.25”)	6xBD (Steel) 8xBD (Steel) 10xBD (Steel)	–	GL32	–	SCLCx-06, 09 & 12, SDUCx-11, SDXCx-11, SDUCx-11X, SDXNx-11, SDUNx-11X, STFCx-16, SVUBx-16, SVUNx-13, DCLNx-12, DDUNx-11 & 15, DWLNx-06 & 08; CTUNx-11, CRSNx-09, CRSNx-09	CC06, CC09, CC12, DC11, TC16, CN12, DN11, VN13, WN06, WN08, TN11, RN09
					GL32..JET	DCLCx-09JET, DDUCx-11JET, DVUBx-16JET, DCLNx-12JET, DDUNx-11JET, DDUNx15JET, DWLNx-06 JET	CC09, DC11, VB16, CN12, DN11, DN15, WN06
∅40	C5, C6, C8 HSK-T/A 63 HSK-T/A100 ∅40, ∅38.1 (1.5”)	6xBD (Steel) 8xBD (Steel) 10xBD (Steel)	–	GL40	–	SCLCx-06, 09 &12, SDUCx-11, SDXCx-11, SDUCx-11X, SVUBx-16, DDUNx-11 & 15, STFCx-16, DCLNx-12, DWLNx-06 & 08	CC06, CC09, CC12, CN12, DC11, DN11, DN15, TC16, WN06, WN08
					GL40..JET	DCLCx-09JET, DDUCx-11JET, DVUBx-16JET, DCLNx-12 JET, DDUNx-11JET, DDUNx-15JET, DWLNx-06 JET	CC09, DC11, VB16, CN12, DN11, DN15, WN06
∅50	C6, C8 HSK-T/A 63 HSK-T/A100 ∅50, ∅50.8 (2”)	6xBD (Steel) 8xBD (Steel) 10xBD (Steel)	–	GL50	–	SCLCx-06, 09 & 12; SDUCx-11, SDXCx-11, SDUCx-11X, STFCx.16, SUBx-16, DCLNx-12, 16 & 19; DDUNx-15, DWLNx-06 & 08; CCLNx-12	CC06, CC09, CC12, DC11, TC16, CN12, CN16, CN19, DN15, WN06, WN08, CNMN12
∅60	C6, C8 HSK-T/A100 ∅60, ∅63,5 (2.5”)	6xBD (Steel) 8xBD (Steel) 10xBD (Steel)	BA60				
∅80	C8 HSK-T/A100 ∅80, ∅76.2 (3”)	6xBD (Steel) 8xBD (Steel) 10xBD (Steel)	BA80		GL50..JET	DCLCx-09JET, DDUCx-11JET, DVUBx-16JET,DCLNx-12JET, DDUNx-15JET, DWLNx-06JET	CC09, DC11, VB16, CN12, DN15, WN06
∅100	∅100, ∅101.6 (4”)	10xBD (Steel)	BA100				

Note: ∅ 25 Steadyline 10XBD bars have carbide re-in forced shank design for maximum stability.

Recommended tightening torques for GL connections

For GL workpiece side size	Recommended tightening torque
GL25	25 Nm / *221 In/Lbs.*
GL32	25 Nm / *221 In/Lbs.*
GL40	35 Nm / *310 In/Lbs.*
GL50	55 Nm / *487 In/Lbs.*

To apply the recommended tightening torque, we recommend to use torque spanners, available as Accessories, see MN Tooling systems catalogue.



BA-connection adaptor for GL-heads

BA-Connection allows making use of a wide range of GL50-Heads for Steadyline® bars ∅60, ∅80, ∅100 mm / *2.362, 3.150, 3.937 inch*.

Each BA-Connection is available in 2 radial offset sizes 'WF' to achieve 2 'f1' reaches, for flexibility over minimum bore diameter & chip space.



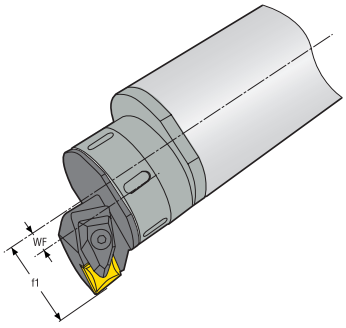


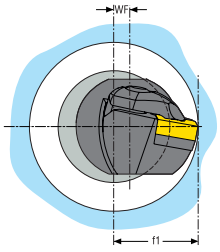
First choice: Wide offset WF providing a wider space.

Additional option: Mini offset WF when accessibility is limited.

Steadyline® BA-Connection with Seco-Capto™ and HSK-T/A machine side connections can also be used for rotating boring operations, when fitted.

For detailed information about BA to GL adapters, see page(s) 638-639.





Recommended tightening torques for BA connection screws

For BA workpiece side size	Kit of 4 locking screws	Recommended tightening torque
BA060	90FQ4	11 Nm / *97 In/Lbs.*
BA080	90FQ52	16 Nm / *142 In/Lbs.*
BA100	90FQ6	23 Nm / *204 In/Lbs.*

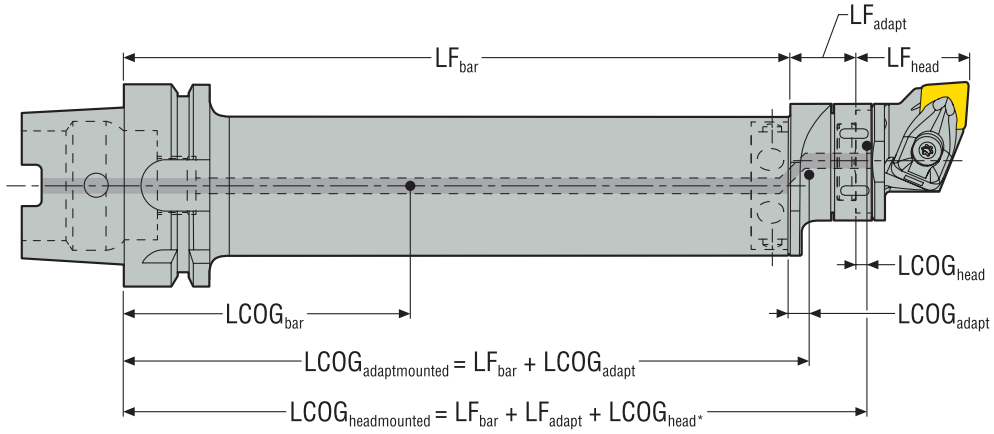
We recommend to use HC torque spanners, commonly available on the market.

Steadyline® bars clamping & in tool changers

The maximum swinging torque (T) of heavy, long assemblies must be taken into consideration when an automatic tool changers is used to move the bar in the machine.

As a first rough estimate comparing the needed swinging torque of a Steadyline® bar with a specific machine's automatic tool change torque limit, $T_{swinglimit}$, the following simplified formula can be used using only data from the Steadyline® bar in mind.

$$T_{simple} = g \times [\mathbf{LCOG}_{bar} * \mathbf{m}_{bar}] * 1.25 / 1000 \text{ Nm} < T_{swinglimit}$$



However, it is recommended to consider the swinging torque for the whole assembly by using the following formula.

$$T = \frac{g \times (\mathbf{LCOG}_{bar} * \mathbf{m}_{bar} + \mathbf{LCOG}_{adaptmounted} * \mathbf{m}_{adapt} + \mathbf{LCOG}_{headmounted} * \mathbf{m}_{head})}{1000}$$

T = Maximum swinging torque of the assembly in Nm
m = mass in kg
LF = functional lengths in mm
LCOG = Positions of the center of gravity in mm

Notes:
a) During tool change, the tool acceleration generates an additional force. It is strongly recommended to slow down the tool changing process if the tool weight or torque is close to the machine limits or to change the tool manually.
b) LCOG, LF and mass values are available in Product pages. If $LCOG_{adapt}$ / $LCOG_{head}$ is unknown, a good estimation can be obtained by replacing LCOG by respective ½ LF.

Machine clamping recommendations

Seco's first recommendation for clamping the bars onto the machines is to use bars with Seco-Capto™ machine side connections.

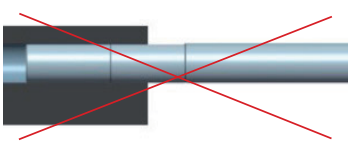
Second choice is the bars with HSK-T/A machine side connections, as both these solutions provide several benefits:

– Maximum stability thanks to the taper-face system and higher bending resistance

– High positioning accuracy of cutting edge, etc.

While using the third choice, the cylindrical bars, Seco strongly recommend to clamp on the marked cylindrical clamping area ensuring the full 4xD clamping lengths using split sleeves / boring holders.

NO



OK



4x∅

QC Modular Toolholder Introduction

QC Modular Toolholders provide small part machining companies access to benefits seen as given for larger lathes such as:

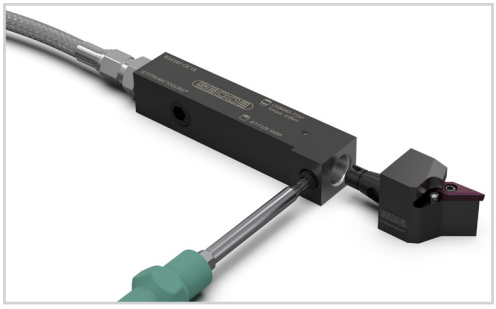
– Flexible and reduced down-time by fast QC modular head exchange.

– Precise QC modular interface allow for high repeatability

– Jetstream Tooling precise coolant delivery for improved chip control and long predictable tool life

– Multiple heads fit in same shank for greater versatility

Experience these proven solutions for all sliding head machines and see the recommended connections directly under spare parts of the shanks at www.secotools.com.



QC Shank adapter to JET-HOSE

Shank 1616 needs only a JET-Hose kit to be connected, all other sizes need also the JET-ADM8-1.0 adapter.

QC Shank adapter to JET-HOSE		QC Shanks
10001981	JET-ADM8-1.0	N03..., N05..., N10..., N12...
–	Included in JET-HOSE kit (JET-AD1/8BSP)	N16...

QC-shank JET-HOSE KITS

"...BB" in the description means Bolt-Bolt connections i.e. on each end of the hose there are threaded interfaces straight with the hose.

"...BS" in the description means Bolt-Swivel connections i.e. on one end there is a threaded interface straight with the hose and on the other there is a 90° interface with free rotation and a separate hollow bolt.

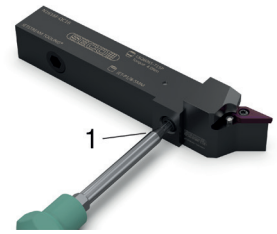
"...SS" in the description means Swivel-Swivel connections i.e. on each end there are 90° interfaces with free rotation and separate hollow bolts

QC-shank JET-HOSE KITS		Length mm / *inch*	QC Shank Adapter
02936673	JET-HOSE100BB	100 / *3.937*	N16... adapter included
02936674	JET-HOSE100BS	100 / *3.937*	N16... adapter included
02936675	JET-HOSE100SS	100 / *3.937*	N16... adapter included
02639688	JET-HOSE150BB	150 / *5.906*	N16... adapter included
02639668	JET-HOSE150BS	150 / *5.906*	N16... adapter included
02639663	JET-HOSE150SS	150 / *5.906*	N16... adapter included
02639689	JET-HOSE200BB	200 / *7.874*	N16... adapter included
02639682	JET-HOSE200BS	200 / *7.874*	N16... adapter included
02639664	JET-HOSE200SS	200 / *7.874*	N16... adapter included
02639691	JET-HOSE250BB	250 / *9.843*	N16... adapter included
02639684	JET-HOSE250BS	250 / *9.843*	N16... adapter included
02639665	JET-HOSE250SS	250 / *9.843*	N16... adapter included
02639693	JET-HOSE300BB	300 / *11.811*	N16... adapter included
02639686	JET-HOSE300BS	300 / *11.811*	N16... adapter included
02639667	JET-HOSE300SS	300 / *11.811*	N16... adapter included

QC Modular Assembly instructions

QC Modular Toolholder assembly instructions

Assembly the QC toolholder with one screw only, for precise and safe assembly between the head and shank we recommend using a torque of 4.0 Nm (Torque key T00-15P40), for all torque keys available see page(s) 1033.



1. Torque 4.0 Nm

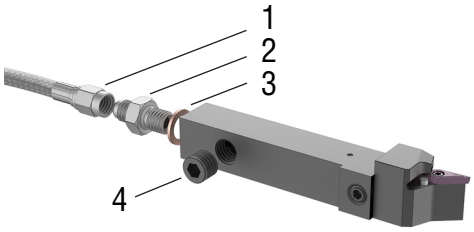
High Accuracy connection
– Twisting tolerance ± 5 µm (0.0002 inch)
– Repeatability tolerance ± 3 µm (0.0001 inch)

Jetstream Tooling® – Assembly instruction for hoses

For personal safety, Jetstream Tooling® should only be used with the machine door in a fully closed position in accordance with general machine safety procedures. Please ensure that the coolant hose is located correctly and fully tightened with all seals in position. The unused coolant hose should have a blanking plug fitted.

Hoses can be assembled from both the side as well as in the back of the shank. The thread to be use for hose connection various between different sizes, for 1616 shank the 1/8BSP thread are used and for the smaller shank sizes M8*1.0 thread.

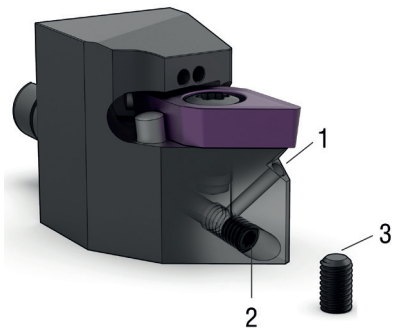
For accessories, see page(s) 1029, 1030.



1. Coolant hose
2. Hose adapter
3. Copper washer
4. Plug screw

Jetstream Tooling®Duo

Jetstream Tooling® Duo, available on a selection of cutting heads, adds a second coolant outlet from the clearance side. The second coolant outlet can be shut off if needed for specific applications for even more versatile machining or limitation in coolant supply. To shut off Duo coolant outlet, remove P6SS3X3G and change to the longer screw P6SS3X5 available as accessories. Important to also use suitable glue to seal the thread (e.g.Loctite® 270).



1. Duo Coolant
2. P6SS3X3G
3. P6SS3X5

Shims & shim screws for alternate use of DN.1506.. & DN.1504.. Inserts

Toolholder style	Insert	Insert (ANSI)	Shim	Shim (ANSI)	Shim GPN	Shim screw	Shim screw GPN
D-Clamp Toolholders Seco-Capto, GL-heads	DN..1506	DN..44	DDN150416	DDN434	02570509	C04008-T15P	02440234
	DN..1504	DN..43	DDN150616	DDN444	02570508	C04008-T15P	02440234
D-Clamp holders- C4-DDxxx-xx-15-04JETI & C6-DDxxx-xx-15-04JETI	DN..1504	DN..43	DDN150616	DDN444	02570508	C04011-T15P	00040421
	DN..1506	DN..44	DDN150416	DDN434	02570509	C04008-T15P	02440234
D- Clamp Inch holders- DDJxx-xx4x & DDJxx-xx4XJETI	DN..1504	DN..43	DDN150616	DDN444	02570508	C04011-T15P	00040421
	DN..1506	DN..44	DDN150416	DDN434	02570509	C04008-T15P	02440234
D- Clamp Inch holders -DDPxx-xx-4D & DDQxx-xx4D	DN..1504	DN..43	DDN150616	DDN444	02570509	C04008-T15P	00040421
	DN..1506	DN..44	DDN150416	DDN434	02570509	C04008-T15P	02440234
P- Clamp holders	DN..1506	DN..44	PDN150308	PDN422	00039784	LS0822	00039793
	DN..1504	DN..43	PDN150408		02897106	LS0822	00039793
P- Clamp holders C4, C5, C6-PDxxx-xx-15-04JETL	DN..1504	DN..43	PDN150408		02897106	LS0818	00039791
	DN..1506	DN..44	PDN150308	PDN422	00039784	LS0822	00039793
P-clamping bars Sxxx-PDxxx15	DN..1506	DN..44	PDN150308	PDN422	00039784	LS0822	00039793
	DN..1504	DN..43	PDN150408		02897106	LS0822	00039793
Wedge clamping bars, Axxx-PDxxx15	DN..1506	DN..44	PDD150312		74011470	WS2325-T25P	02483615
	DN..1504	DN..43	PDD150412		00084514	WS2325-T25P	02483615
Wedge clamp PDJR4032-15	DN..1506	DN..44	PDN150412		74011060	170.26-655	75009750
Inch holders MDxxx, Axx-MDxxx	DN..1506	DN..44	DSN423	DSN-423	74048118	C04008-T15P	02440234
	DN..1504	DN..43	DSN150412	DSN-433	74072198	C04008-T15P	02440234

Shims & shim screws for alternate use of WN.0804.. & WN.0806.. Inserts

Toolholder style	Insert	Insert (ANSI)	Shim	Shim (ANSI)	Shim GPN	Shim screw	Shim screw GPN
D-Clamp toolholders- Seco-Capto JETI,Seco-Capto, Shank toolholders JETI, Shank toolholders & GL-heads	WN..0804	WN..43	DWN080416	DWN434	02570511	C04008-T15P	02440234
	WN..0806	WN..44	DWN080316	DWN424	02639481	C04008-T15P	02440234
D-Clamp toolholders- Inch	WN..0804	WN..43	DWN080416	DWN434	02570511	C04008-T15P	02440234
	WN..0806	WN..44	DWN080316	DWN424	02639481	C04008-T15P	02440234
D- Clamp boring bars Axxx-DWxxx-C	WN..0804	WN..43	DWD080316		02643406	C04008-T15P	02440234
P- Clamp toolholders-Wedge	WN..0804	WN..43	WAE080412	WAE433	74027939	WS2325-T25P	02483615
	WN..0806	WN..44	WAE080312	WAE423	74037377	WS2325-T25P	02483615
P- Clamp toolholders-Seco-Capto Wedge Clamp	WN..0804	WN..43	WAI080312	WAI423	74027940	WS2325-T25P	02483615
P- Clamp boring bars s Axxx-PW...08	WN..0804	WN..43	WAI080312	WAI423	74027940	WS2325-T25P	02483615
M-clamp toolholders- MW...08	WN..0804	WN..43	MWN080412	IWSN-433	74079689	LD6025-T15P	02483533
	WN..0806	WN..44	MWN080312	IWSN-423	74079690	LD6025-T15P	02483533
M-clamp boring bars Sxx-MW...-4, Sxxx-MW...08, A32-MW...-4	WN..0804	WN..43	MWN080412	IWSN-433	74079689	NL46	00018595
	WN..0806	WN..44	MWN080312	IWSN-423	74079690	NL46L	00048120

Small diameter boring – Introduction

Seco offers a range of small diameter boring bars to machine holes as small as 5,5 mm / *0.216"*. Inserts are available in C and T shape.

The toolholders are available in steel and have the possibility for internal through coolant.

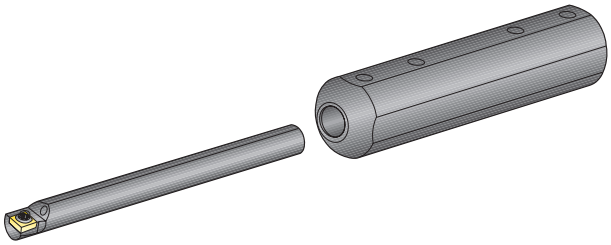
Set-up information

When positioned in the machine the insert will sit slightly above centre line. This is a design feature of the tool that compensates for the deflection and improves the machining operation.

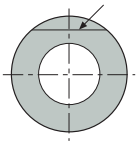
When setting the tool in the machine be sure to position it with the flat parallel and in the same plane as the bed of the machine.

The boring bars can be used with or without the cylindrical toolholder sleeve.

Please see page(s) 1012.



Position flat parallel with machine bed



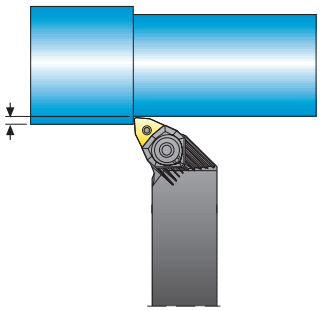
Cutting data, general

There are several opportunities to adjust and explore cutting data adjustments in www.secotools.com under the Cutting Data section especially when logging in since this unlock option not available as “Guest” For example explore cutting data directly by reading the QR-code.

Depth of cut

The maximum depth of cut that can be used depends on a number of factors. Machine power, stability, workpiece material, insert shape and size, nose radius, chipbreaker, grade and cutting edge angle.
Start with the insert size to get an indication and proceed with the recommendations for the chosen chipbreaker. This will give a suitable maximum depth of cut.

A rule of thumb could be that the minimum depth of cut should not be smaller than the nose radius.

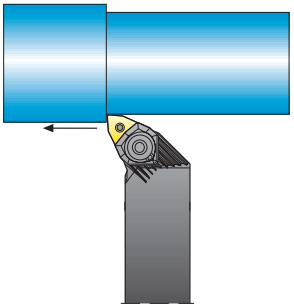


Feed rate

The maximum feed rate that can be used depends on a number of factors. Machine power, stability, workpiece material, insert shape and size, nose radius, chipbreaker, grade and cutting edge angle.
Another, very important factor is the required surface finish. Start by looking at the recommendations for the chosen chipbreaker. Then look in the surface finish table below to be sure that the required surface finish can be achieved.

The maximum feed rate should preferably be considerably smaller than the nose radius.

A too low feed rate can result in poor chipbreaking and tool life.



Surface finish

A large nose radius normally produces a better surface finish.
The table gives recommended maximum, theoretical, feed rates to achieve a specified R_a-value.
Always consider the possibility to use high feed inserts (Seco Wiper), for turning with high feed with retained surface finish.
For more information, see page(s) 63, 116-118, 130-131.

Note: The refined estimate R_a equation is based on work by J-E Ståhl and gives better surface estimates often indicating potential to increase feeds compared to other estimates.

Data according to refined estimate R_a equation

Surface finish R_a value (µm)	Nose radius, RE mm / *inch*					
	0,2 / *0.008*	**0,4** / *0.016*	**0,8** / *0.032*	**1,2** / *0.047*	**1,6**/ *0.063*	**2,4** / *0.094*
	Feed rate, f mm/ *inch* /rev					
0,6	0,06 / *0.0023*	0,08 / *0.0031*	0,12 / *0.0047*	0,14 / *0.0055*	0,17 / *0.007*	0,21 / *0.008*
1,6	0,10 / *0.0039*	0,14 / *0.0055*	0,20 / *0.008*	0,24 / *0.009*	0,28 / *0.011*	0,34 / *0.013*
3,2	0,14 / *0.0055*	0,20 / *0.008*	0,28 / *0.011*	0,34 / *0.013*	0,39 / *0.015*	0,48 / *0.019*
6,3	–	0,27 / *0.011*	0,39 / *0.015*	0,48 / *0.019*	0,55 / *0.022*	0,68 / *0.027*
8,0	–	–	0,44 / *0.017*	0,54 / *0.021*	0,63 / *0.025*	0,77 / *0.030*

Cutting data – Nomenclature and formulae

RPM

$$n = \frac{v_c \cdot 1000}{\pi \cdot D_c} \quad \text{(rev/min)}$$

Cutting speed

$$v_c = \frac{n \cdot \pi \cdot D_c}{1000} \quad \text{(m/min)}$$

Surface finish
(arithmetic average deviation)
Rough estimates

$$R_a = \frac{f^2 \cdot 50}{RE} \quad \text{(µm)}$$

$$R_a = \frac{R_t}{3,5} \quad \text{(µm)}$$

Refined estimate

$$R_a \approx 770 \cdot \left(1 - \frac{\frac{f}{2RE}}{\arcsin\left(\frac{f}{2RE}\right)}\right) \cdot RE\,(\mu m)$$

Valid for:

$$f \leq 2\sqrt{a_p(2RE - a_p)} \leq 2RE$$

see note and table in page(s) 100

Surface finish
total height of profile estimate

$$R_t = k \cdot \frac{f^2 \cdot 1000}{8 \cdot RE} \quad \text{(µm)}$$

Power demand
estimate

$$P_c = \frac{v_c \cdot f \cdot a_p}{25} \quad \text{(kW)}$$

Metal removal rate

$$Q = v_c \cdot f \cdot a_p \quad \text{(cm}^3\text{/min)}$$

a_p	=	Depth of cut	(mm)
DC	=	Workpiece diameter	(mm)
f	=	Feed rate	(mm/rev)
h	=	Chip thickness	(mm)
k	=	Constant 1,0 for steel and strainless steel 1,4 for cast iron	
n	=	RPM	(rev/min)
P_c	=	Power demand	(kW)
Q	=	Metal removal rate	(cm^3/min)
R_a	=	Surface finish (arithmetic average deviation)	(µm)
RE	=	Nose radius	(mm)
R_t	=	Total height of profile surface	(µm)
v_c	=	Cutting speed	(m/min)

Cutting data, workpiece materials

In SMG classification of workpiece materials involves a specific material standard in a specific condition assigned as reference for easy and unabiguous adjustment of cutting data for any actual material compared to any Seco reference material. As examples the reference materials EN C45E for SMG P4 and EN 42 CrMo 4 for both SMG P5 and SMG H5 shown below in table 1 where the reference level material property is indicated. (A more complete extract can be found on SMG section starting page 1034.

SMG	Description	Properties	Reference
P4	Low-alloy general structural steels, 0.25% < C < 0.67%wt Low-alloy Quench & Temper steels	520 < R_m < 1200	C 45E R_m = 660 N/mm²
P5	Structural steels, 0.25% < C < 0.67%wt Quench & Temper steels	550 < R_m < 1200	42 CrMo 4 R_m = 700 N/mm²

SMG	Description	Properties	Reference
H5	Quenched & Tempered steels	38 < HRC < 56	42 CrMo 4 50 HRC

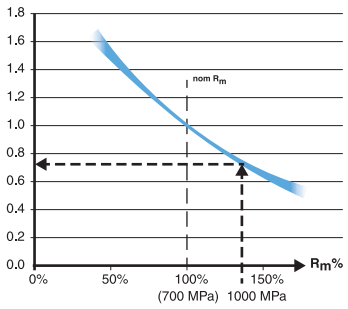
Focusing specifically on EN 42 CrMo 4 in annealed condition, the ultimate tensile strength R_m may typically vary between Rm = 630 N/mm² and R_m = 780 N/mm², which provide a reference level for SMG P5. In Quenched & Tempered condition, the ultimate tensile strength R_m may typically be between R_m = 900 N/mm² and R_m = 1100 N/mm² thus still belongs to SMG P5. However, if hardened above R_m = 1200 N/mm² it instead belongs to SMG H5.

SMG	EN	W.-Nr	AFNOR	BS	UNI	JIS	AISI / ASTM	GOST	Condition	R_{m_nom}	HRC_{nom}
P5	42 CrMo 4	1.1201	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	4142, 4140	38HM	Annealed	700	
	42 CrMo 4	1.1201	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	4142, 4140	38HM	Quenched & Tempered	1000	
H5	42 CrMo 4	1.1201	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	4142, 4140	38HM	Quenched & Tempered		45
	42 CrMo 4	1.1201	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	4142, 4140	38HM	Quenched & Tempered		50

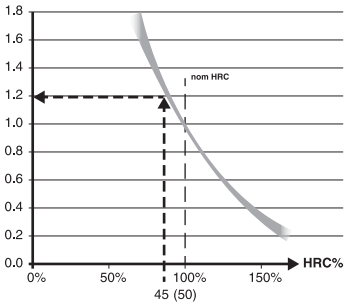
The EN 42CrMo4 quench & tempered steel could be used to illustrate the machinability dependence of materials' condition.

The graphs below indicate how speed recommendations for a nominal material conditions may be adjusted for relative R_m (left diagram valid for ISO-P) and for relative HRC (valid for ISO-H).

Speed recommendation based in material machining properties, steel



Speed recommendation based in material machining properties, hardened steel



To further illustrate how the SMG P5 nominal v_c can be adjusted to a more accurate recommended v_c we need ultimate tensile strength R_m data and in this case we use the EN 42 CrMo 4 quenched & tempered to R_m = 1000 N/mm^2 according to above table (bold blue arrows).

Assume that we find that the SMG P5 nominal v_c = 280 m/min / *918.64 sfm* for a certain product and machining.

Then, actual recommended v_c = 280 m/min x 0,75 = 210 m/min / v_c = *918.64 sfm x 0.75 = 688.98 sfm*.

Consequently in the SMG H5 the nominal v_c can be adjusted using the hardened EN 42 CrMo 4 at HRC 45 (smaller grey arrows).

Assume that the SMG H5 nominal v_c = 50 m/min / *164.04 sfm* for a certain product and machining using a coated cemented carbide tools then, actual recommended v_c = 50 m/min x 1,2 = 60 m/min.

Note that when using PCBN tools cutting data recommendation starts at page(s) 140.

For further workpiece material details please see page(s) 1034 and suggested cutting data at applicable pages.

For more convenient cutting data handling we recommend applicable tools in My Pages – on www.secotools.com

These cutting data compensations for steels are fully implemented at www.secotools.com in MyPages (see QR-code in the upper right corner).

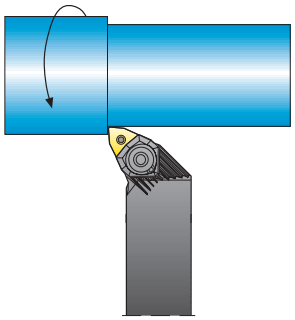
Cutting data

Cutting speed v_c (m/min)

In this section a recommended cutting speed is indicated under specified conditions and a selected SMG.

Use the tables beginning on page(s) 1034 to classify the workpiece material into a SMG.

In order to increase the accuracy towards the actual cutting conditions and requirements of the applications the recommendation is to use Seco MyPages, Suggest or explore www.secotools.com (see QR-code in the upper right corner).



KAPR = cutting edge angle (°) (from holder)

RE = nose radius (mm / *inch*)

a_p = depth of cut (mm / *inch*)

f = feed rate (mm/rev / *inch/rev*)

Representative insert: CCMT09T304-MF2 / *CCMT32.51-MF2*

Tool life = 15 min | a_p = 1 mm / *0.040* Inch | Holder: SCLCL1212M09

SMG	TP1501 f			TP2501 f			TP3501 f			CP500 f			TM1501 f		
	0,15 *0.006*	0,2 *0.008*	0,25 *0.010*	0,15 *0.006*	0,2 *0.008*	0,25 *0.010*	0,15 *0.006*	0,2 *0.008*	0,25 *0.010*	0,15 *0.006*	0,2 *0.008*	0,25 *0.010*	0,15 *0.006*	0,2 *0.008*	0,25 *0.010*
P1	820 *2650*	750 *2450*	700 *2300*	680 *2225*	640 *2075*	600 *1975*	710 *2300*	640 *2075*	580 *1900*	295 *950*	265 *870*	250 *800*	530 *1750*	490 *1600*	450 *1475*
P2	790 *2600*	730 *2400*	680 *2225*	560 *1825*	580 *1900*	580 *1900*	690 *2225*	620 *2025*	570 *1825*	285 *940*	260 *850*	240 *790*	520 *1700*	475 *1550*	440 *1425*
P3	530 *1750*	530 *1750*	520 *1700*	580 *1900*	600 *1975*	590 *1925*	450 *1450*	420 *1375*	395 *1300*	245 *800*	225 *740*	210 *670*	445 *1450*	410 *1325*	380 *1225*
P4	600 *1975*	560 *1800*	520 *1675*	500 *1650*	470 *1550*	440 *1450*	520 *1700*	470 *1550*	430 *1400*	215 *710*	195 *640*	185 *590*	390 *1275*	360 *1175*	335 *1075*
P5	445 *1450*	445 *1450*	435 *1425*	410 *1350*	425 *1400*	425 *1375*	375 *1225*	355 *1150*	335 *1075*	205 *670*	190 *610*	175 *570*	375 *1225*	345 *1125*	320 *1025*
P6	640 *2100*	600 *1925*	550 *1800*	540 *1775*	500 *1650*	475 *1550*	560 *1825*	500 *1650*	460 *1500*	230 *750*	210 *690*	195 *640*	420 *1375*	385 *1275*	355 *1175*
P7	475 *1550*	475 *1550*	460 *1500*	370 *1225*	400 *1300*	410 *1350*	400 *1300*	375 *1225*	355 *1150*	220 *720*	200 *660*	185 *610*	395 *1300*	365 *1175*	335 *1100*
P8	445 *1450*	445 *1450*	435 *1425*	410 *1350*	425 *1400*	425 *1375*	375 *1225*	355 *1150*	335 *1075*	205 *670*	190 *610*	175 *570*	375 *1225*	345 *1125*	320 *1025*
P11	460 *1500*	460 *1500*	445 *1450*	280 *920*	310 *1025*	320 *1050*	285 *940*	295 *970*	285 *940*	275 *900*	235 *750*	200 *640*	310 *1025*	295 *950*	275 *900*
P12	270 *890*	270 *890*	265 *870*	165 *540*	180 *610*	190 *620*	170 *560*	175 *570*	170 *560*	125 *410*	115 *375*	105 *345*	185 *610*	175 *560*	160 *520*

Representative insert: CCMT09T304-MF2 / *CCMT32.51-MF2*

Tool life = 15 min | a_p = 1 mm / *0.040* Inch | Holder: SCLCL1212M09

SMG	TP1030 f			TP1020 f			TP25 f		
	0,1 *0.004*	0,2 *0.008*	0,25 *0.01*	0,1 *0.004*	0,2 *0.008*	0,25 *0.01*	0,1 *0.004*	0,2 *0.008*	0,25 *0.01*
P1	560 *1800*	445 *1450*	400 *1300*	350 *1150*	235 *750*	200 *640*	600 *1975*	500 *1650*	465 *1525*
P2	540 *1775*	430 *1400*	390 *1275*	340 *1125*	230 *740*	195 *620*	580 *1900*	490 *1600*	455 *1475*
P3	465 *1525*	370 *1225*	335 *1075*	295 *950*	195 *640*	165 *540*	500 *1650*	420 *1375*	390 *1275*
P4	410 *1350*	325 *1075*	295 *950*	260 *840*	170 *560*	145 *475*	445 *1450*	370 *1225*	345 *1125*
P5	390 *1275*	310 *1025*	280 *920*	245 *800*	165 *540*	140 *460*	425 *1375*	355 *1150*	330 *1075*
P6	440 *1450*	350 *1150*	315 *1025*	280 *900*	185 *610*	155 *510*	475 *1550*	395 *1300*	370 *1200*
P7	415 *1350*	330 *1075*	300 *970*	260 *850*	175 *560*	150 *475*	450 *1450*	375 *1225*	350 *1125*
P8	390 *1275*	310 *1025*	280 *920*	245 *800*	165 *540*	140 *460*	425 *1375*	355 *1150*	330 *1075*
P11	270 *890*	190 *620*	165 *540*	245 *800*	170 *560*	145 *475*	285 *940*	280 *920*	265 *870*
P12	160 *520*	110 *360*	95 *310*	145 *475*	100 *330*	85 *280*	165 *560*	165 *540*	155 *510*

Representative insert: CNMG120408-M3 / *CNMG432-M3*

Tool life = 15 min | a_p = 2,5 mm / *0.100* Inch | Holder: DCLNR2525M12-M

SMG	TP0501 f			TP1501 f			TP2501 f			TP3501 f			TP25 f		
	0,2 *0.008*	**0,3** *0.012*	**0,4** *0.016*	**0,2** *0.008*	**0,3** *0.012*	**0,4** *0.016*	**0,2** *0.008*	**0,3** *0.012*	**0,4** *0.016*	**0,2** *0.008*	**0,3** *0.012*	**0,4** *0.016*	**0,2** *0.008*	**0,3** *0.012*	**0,4** *0.016*
P1	780 *2550*	690 *2275*	610 *1975*	690 *2275*	590 *1900*	510 *1675*	590 *1925*	510 *1675*	450 *1450*	580 *1900*	480 *1550*	410 *1325*	465 *1500*	395 *1275*	345 *1125*
P2	760 *2500*	670 *2200*	590 *1925*	680 *2200*	570 *1875*	495 *1625*	560 *1800*	520 *1675*	460 *1500*	570 *1825*	465 *1525*	400 *1300*	450 *1475*	385 *1250*	335 *1100*
P3	620 *2025*	590 *1900*	510 *1675*	500 *1650*	450 *1475*	400 *1300*	570 *1875*	530 *1700*	465 *1525*	390 *1275*	340 *1100*	300 *970*	390 *1275*	330 *1075*	290 *950*
P4	580 *1875*	510 *1675*	450 *1450*	510 *1675*	435 *1400*	375 *1225*	435 *1425*	375 *1225*	330 *1075*	430 *1400*	355 *1150*	300 *980*	340 *1125*	290 *950*	255 *840*
P5	520 *1700*	495 *1600*	435 *1400*	420 *1375*	380 *1250*	335 *1075*	405 *1325*	375 *1225*	330 *1075*	325 *1075*	285 *940*	250 *820*	325 *1075*	280 *900*	245 *790*
P6	620 *2025*	550 *1775*	480 *1575*	550 *1800*	465 *1500*	405 *1300*	465 *1525*	405 *1300*	355 *1175*	460 *1500*	380 *1225*	325 *1050*	365 *1200*	310 *1025*	275 *890*
P7	550 *1800*	520 *1700*	460 *1500*	445 *1450*	405 *1300*	355 *1150*	390 *1275*	380 *1250*	350 *1125*	345 *1125*	300 *980*	265 *870*	345 *1125*	295 *950*	260 *840*
P8	520 *1700*	495 *1600*	435 *1400*	420 *1375*	380 *1250*	335 *1075*	405 *1325*	375 *1225*	330 *1075*	325 *1075*	285 *940*	250 *820*	325 *1075*	280 *900*	245 *790*
P11	540 *1775*	510 *1650*	445 *1450*	435 *1425*	390 *1275*	345 *1125*	300 *980*	295 *970*	270 *870*	275 *900*	240 *790*	200 *660*	265 *870*	230 *740*	195 *640*
P12	315 *1025*	300 *980*	265 *850*	255 *840*	230 *750*	205 *660*	175 *590*	175 *570*	160 *510*	165 *540*	145 *460*	120 *395*	155 *510*	135 *445*	115 *375*

Representative insert: CNMG190616-MR7 / *CNMG644-MR7*

Tool life = 15 min | a_p = 6 mm / *0.240* Inch | Holder: DCLNR4040R19-M

SMG	TP0501 f			TP1501 f			TP2501 f			TP3501 f			TP25 f			TP40 f		
	0,4 *0.016*	**0,55** *0.022*	**0,7** *0.028*	**0,4** *0.016*	**0,55** *0.022*	**0,7** *0.028*	**0,4** *0.016*	**0,55** *0.022*	**0,7** *0.028*	**0,4** *0.016*	**0,55** *0.022*	**0,7** *0.028*	**0,4** *0.016*	**0,55** *0.022*	**0,7** *0.028*	**0,4** *0.016*	**0,55** *0.022*	**0,7** *0.028*
P1	590 *1900*	480 *1550*	400 *1300*	490 *1600*	405 *1300*	340 *1125*	435 *1400*	365 *1175*	315 *1025*	390 *1275*	315 *1025*	265 *850*	335 *1075*	280 *900*	240 *790*	235 *750*	190 *610*	155 *510*
P2	570 *1875*	465 *1500*	385 *1250*	480 *1550*	395 *1275*	335 *1075*	440 *1425*	350 *1125*	285 *920*	380 *1225*	305 *1000*	255 *840*	325 *1050*	270 *890*	235 *770*	230 *740*	185 *590*	155 *490*
P3	490 *1600*	375 *1225*	290 *940*	385 *1250*	310 *1000*	250 *820*	450 *1450*	355 *1150*	285 *920*	290 *940*	245 *790*	210 *690*	280 *900*	235 *750*	200 *660*	195 *640*	155 *510*	130 *425*
P4	430 *1400*	355 *1150*	295 *950*	360 *1175*	295 *970*	250 *820*	320 *1050*	270 *870*	230 *750*	290 *940*	230 *750*	195 *620*	245 *800*	205 *670*	180 *570*	170 *560*	140 *445*	115 *375*
P5	415 *1350*	315 *1025*	245 *790*	320 *1050*	260 *840*	210 *690*	315 *1025*	245 *800*	195 *620*	245 *790*	205 *670*	175 *570*	235 *770*	195 *640*	170 *560*	165 *540*	130 *425*	110 *360*
P6	465 *1500*	380 *1225*	315 *1025*	390 *1275*	320 *1025*	270 *890*	345 *1125*	290 *940*	250 *800*	310 *1000*	250 *800*	210 *670*	265 *850*	220 *720*	190 *620*	185 *610*	150 *475*	125 *410*
P7	435 *1425*	335 *1075*	260 *840*	340 *1125*	275 *890*	225 *720*	335 *1100*	275 *900*	225 *740*	260 *840*	215 *710*	190 *610*	250 *800*	210 *670*	180 *590*	175 *570*	140 *460*	115 *375*
P8	415 *1350*	315 *1025*	245 *790*	320 *1050*	260 *840*	210 *690*	315 *1025*	245 *800*	195 *620*	245 *790*	205 *670*	175 *570*	235 *770*	195 *640*	170 *560*	165 *540*	130 *425*	110 *360*
P11	425 *1375*	325 *1050*	250 *800*	330 *1075*	265 *870*	220 *710*	260 *840*	210 *670*	165 *540*	190 *620*	140 *445*	100 *330*	185 *610*	145 *475*	120 *375*	100 *330*	85 *280*	75 *245*
P12	250 *820*	190 *620*	150 *475*	195 *640*	155 *510*	130 *410*	155 *490*	125 *395*	100 *310*	110 *360*	80 *260*	60 *195*	110 *360*	85 *280*	70 *230*	60 *195*	50 *165*	46 *150*

Representative insert: CNMG120408-MF2 / *CNMG432-MF2*

Tool life = 15 min | a_p = 1,5 mm / *0.060* Inch | Holder: DCLNR2525M12-M

SMG	TH1000 f		
	0,1 *0.004*	**0,25** *0.010*	**0,4** *0.016*
H3	90 *295*	70 *230*	55 *180*
H5	170 *560*	125 *410*	100 *330*
H7	90 *295*	70 *230*	55 *180*
H8	170 *560*	125 *410*	100 *330*
H11	215 *710*	160 *520*	130 *410*
H12	200 *660*	150 *475*	115 *375*
H21	170 *560*	125 *410*	100 *330*

Representative insert: CCMT09T308-MF2 / *CCMT32.52-MF2*

Tool life = 10 min | a_p = 1 mm / *0.040* Inch | Holder: C4-SCLCR-13080-09

SMG	TM1501 f			TM2501 f			TM3501 f			CP500 f			TP25 f		
	0,1 *0.004*	0,2 *0.008*	0,3 *0.012*	0,1 *0.004*	0,2 *0.008*	0,3 *0.012*	0,1 *0.004*	0,2 *0.008*	0,3 *0.012*	0,1 *0.004*	0,2 *0.008*	0,3 *0.012*	0,1 *0.004*	0,2 *0.008*	0,3 *0.012*
P4	485 *1575*	415 *1350*	365 *1175*	— —	— —	— —	— —	— —	— —	280 *900*	225 *740*	195 *640*	495 *1600*	425 *1375*	375 *1225*
M1	400 *1300*	380 *1250*	345 *1125*	400 *1300*	335 *1100*	290 *940*	395 *1300*	335 *1075*	285 *940*	430 *1400*	335 *1075*	255 *820*	335 *1100*	355 *1150*	325 *1075*
M2	325 *1075*	310 *1025*	275 *900*	325 *1050*	270 *890*	235 *750*	320 *1050*	270 *890*	230 *750*	350 *1125*	270 *890*	205 *660*	270 *890*	285 *940*	265 *850*
M3	245 *800*	235 *770*	210 *690*	245 *800*	205 *670*	180 *570*	245 *800*	205 *670*	175 *570*	265 *870*	205 *670*	155 *510*	205 *670*	215 *710*	200 *660*
M4	— —	— —	— —	175 *570*	160 *520*	155 *510*	200 *640*	180 *590*	160 *520*	200 *660*	155 *510*	115 *375*	135 *445*	125 *410*	120 *375*
M5	— —	— —	— —	145 *475*	135 *445*	130 *410*	165 *540*	150 *490*	130 *425*	165 *540*	130 *410*	95 *310*	115 *375*	105 *345*	100 *330*

Representative insert: CNMG120408-MF4 / *CNMG432-MF4*

Tool life = 10 min | a_p = 3 mm / *0.120* Inch | Holder: DCLNL2020X12JETI

SMG	TM1501 f			TM2501 f			TM3501 f			CP500 f			TP25 f		
	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*
P4	390 *1275*	330 *1075*	290 *940*	— —	— —	— —	— —	— —	— —	210 *690*	180 *590*	160 *520*	370 *1200*	315 *1025*	275 *900*
M1	370 *1200*	315 *1025*	270 *870*	315 *1025*	260 *840*	220 *720*	310 *1025*	255 *820*	215 *710*	285 *920*	195 *620*	140 *445*	320 *1025*	275 *890*	235 *750*
M2	300 *970*	255 *820*	215 *710*	255 *820*	210 *670*	180 *590*	250 *820*	205 *670*	175 *570*	230 *740*	155 *510*	115 *360*	255 *840*	220 *720*	190 *610*
M3	225 *740*	195 *620*	165 *540*	190 *620*	160 *520*	135 *445*	190 *620*	155 *510*	135 *425*	175 *570*	120 *395*	85 *280*	195 *640*	170 *540*	145 *460*
M4	— —	— —	— —	160 *520*	150 *490*	140 *460*	170 *560*	145 *475*	125 *410*	130 *425*	90 *295*	65 *215*	115 *375*	105 *345*	100 *330*
M5	— —	— —	— —	135 *445*	125 *410*	120 *395*	140 *460*	120 *395*	105 *345*	110 *360*	75 *245*	55 *180*	95 *310*	90 *295*	85 *280*

Representative insert: CCMT09T308-M5 / *CCMT32.52-M5*

Tool life = 15 min | a_p = 1 mm / *0.040* Inch | Holder: C4-SCLCL-17090-09

SMG	TK0501 f			TK1501 f			TP1501 f			TP0501 f		
	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*	0,2 *0.008*	0,3 *0.012*	0,4 *0.016*
K1	600 *1975*	560 *1800*	520 *1700*	530 *1750*	475 *1550*	440 *1450*	455 *1500*	470 *1550*	460 *1500*	485 *1600*	495 *1625*	490 *1600*
K2	465 *1525*	435 *1425*	415 *1350*	455 *1475*	420 *1375*	400 *1300*	395 *1300*	405 *1325*	400 *1300*	420 *1375*	430 *1400*	425 *1400*
K3	395 *1275*	370 *1200*	350 *1150*	385 *1275*	355 *1175*	340 *1100*	335 *1100*	345 *1125*	340 *1125*	355 *1175*	365 *1200*	360 *1175*
K4	375 *1225*	350 *1150*	335 *1100*	365 *1200*	340 *1125*	325 *1050*	320 *1050*	330 *1075*	325 *1075*	340 *1125*	350 *1150*	345 *1125*
K5	225 *720*	210 *690*	200 *660*	220 *710*	205 *660*	190 *620*	190 *620*	195 *640*	195 *620*	200 *660*	205 *670*	205 *670*
K6	375 *1225*	345 *1125*	320 *1050*	325 *1075*	295 *970*	270 *890*	280 *920*	290 *950*	285 *940*	300 *980*	305 *1000*	305 *980*
K7	285 *940*	265 *870*	255 *840*	280 *920*	260 *850*	245 *800*	245 *800*	250 *820*	245 *800*	255 *850*	265 *870*	260 *850*

Representative insert: CNMG120412-MR7 / *CNMG433-MR7*

Tool life = 15 min | a_p = 3 mm / *0.120* Inch | Holder: A40U-PCLNL12

SMG	TK0501 f			TK1501 f			TP1501 f			TP25 f		
	0,2 *0.008*	**0,35** *0.014*	**0,5** *0.020*	**0,2** *0.008*	**0,35** *0.014*	**0,5** *0.020*	**0,2** *0.008*	**0,35** *0.014*	**0,5** *0.020*	**0,2** *0.008*	**0,35** *0.014*	**0,5** *0.020*
P4	—	—	—	—	—	—	520	410	340	345	275	230
	—	—	—	—	—	—	*1700*	*1325*	*1100*	*1125*	*900*	*750*
K1	570	495	455	480	405	355	450	435	405	465	365	305
	1825	*1625*	*1475*	*1575*	*1300*	*1175*	*1475*	*1425*	*1300*	*1500*	*1200*	*1000*
K2	420	380	355	420	375	345	390	380	350	400	320	265
	1375	*1250*	*1150*	*1350*	*1225*	*1125*	*1275*	*1225*	*1150*	*1300*	*1025*	*870*
K3	355	320	300	355	315	290	330	320	295	340	270	225
	1175	*1050*	*980*	*1175*	*1025*	*950*	*1075*	*1050*	*970*	*1125*	*870*	*740*
K4	340	305	285	340	300	280	315	305	280	325	255	215
	1125	*1000*	*940*	*1100*	*980*	*900*	*1025*	*1000*	*920*	*1050*	*840*	*710*
K5	205	180	170	200	180	165	185	180	170	—	—	—
	660	*590*	*560*	*660*	*590*	*540*	*610*	*590*	*540*	—	—	—
K6	350	305	280	295	250	220	275	270	250	—	—	—
	1150	*1000*	*920*	*970*	*820*	*720*	*900*	*890*	*800*	—	—	—
K7	260	235	215	260	230	210	240	235	215	—	—	—
	850	*770*	*710*	*840*	*750*	*690*	*790*	*750*	*710*	—	—	—

Representative insert: CCGT060204F-AL / *CCGT21.51F-AL*

Tool life = 15 min | a_p = 1 mm / *0.040* Inch | Holder: A10L-SCLCR06

SMG	KX f			CP500 f			TP25 f		
	0,1 *0.004*	**0,15** *0.006*	**0,2** *0.008*	**0,1** *0.004*	**0,15** *0.006*	**0,2** *0.008*	**0,1** *0.004*	**0,15** *0.006*	**0,2** *0.008*
P3	—	—	—	280	245	225	510	460	425
	—	—	—	*900*	*800*	*740*	*1675*	*1500*	*1375*
M3	—	—	—	235	200	170	205	210	205
	—	—	—	*770*	*660*	*540*	*670*	*690*	*670*
K3	—	—	—	265	230	205	435	395	365
	—	—	—	*870*	*750*	*670*	*1425*	*1300*	*1175*
N3	330	290	265	—	—	—	—	—	—
	1075	*950*	*870*	—	—	—	—	—	—
N11	375	335	305	215	190	170	—	—	—
	1225	*1075*	*980*	*690*	*620*	*560*	—	—	—
S3	—	—	—	27	24	22	—	—	—
	—	—	—	*90*	*80*	*70*	—	—	—

Representative insert: CCMT09T304-F1 / *CCMT32.51-F1*

Tool life = 10 min | a_p = 1 mm / *0.040* Inch | Holder: C4-SCLCR-27050-09JET

SMG	TS2000 f			CP200 f			CP500 f		
	0,08 *0.003*	**0,15** *0.006*	**0,2** *0.008*	**0,08** *0.003*	**0,15** *0.006*	**0,2** *0.008*	**0,08** *0.003*	**0,15** *0.006*	**0,2** *0.008*
S1	90	70	60	48	40	36	42	35	32
	295	*215*	*180*	*160*	*130*	*120*	*140*	*115*	*100*
S2	70	55	47	39	32	29	36	30	27
	245	*180*	*150*	*130*	*105*	*95*	*120*	*100*	*90*
S3	60	47	40	33	28	25	31	26	24
	215	*155*	*130*	*110*	*90*	*80*	*105*	*85*	*80*
S11	130	100	85	70	60	55	—	—	—
	425	*310*	*280*	*230*	*195*	*165*	—	—	—
S12	100	75	65	55	44	41	—	—	—
	330	*245*	*215*	*180*	*145*	*130*	—	—	—
S13	75	60	50	41	34	31	—	—	—
	260	*195*	*160*	*140*	*110*	*100*	—	—	—

Representative insert: CNMG120408-MF1 / *CNMP432-MF1*

Tool life = 10 min | a_p = 1,5 mm / *0.060* Inch | Holder: C6-DCLNR-45065-12JETI2

SMG	TS2000 f (mm/r) (in/rev)			CP200 f (mm/r) (in/rev)			890 f (mm/r) (in/rev)			CP500 f (mm/r) (in/rev)			TH1000 f (mm/r) (in/rev)			TS0501 f (mm/r) (in/rev)		
	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*	0,1 *0.004*	0,15 *0.008*	0,2 *0.012*
S1	95 *310*	80 *230*	75 *195*	49 *160*	45 *135*	41 *120*	45 *150*	41 *120*	38 *110*	43 *140*	39 *120*	36 *105*	120 *395*	105 *310*	95 *245*	170 *560*	150 *490*	140 *460*
S2	75 *245*	65 *195*	60 *155*	40 *130*	36 *110*	33 *95*	36 *120*	33 *100*	30 *90*	37 *120*	34 *100*	31 *90*	100 *330*	85 *245*	75 *195*	— —	— —	— —
S3	65 *215*	55 *165*	50 *135*	34 *110*	31 *90*	29 *80*	31 *100*	28 *85*	26 *75*	32 *105*	29 *90*	27 *80*	85 *280*	75 *215*	65 *180*	115 *380*	105 *300*	90 *250*
S11	135 *445*	120 *345*	105 *280*	70 *230*	65 *195*	60 *180*	65 *215*	60 *180*	55 *155*	— —	— —	— —	175 *570*	155 *445*	135 *360*	— —	— —	— —
S12	105 *345*	90 *260*	80 *215*	55 *180*	49 *150*	46 *130*	50 *165*	45 *140*	42 *120*	— —	— —	— —	135 *445*	120 *345*	105 *280*	— —	— —	— —
S13	80 *260*	70 *195*	60 *165*	43 *140*	38 *115*	35 *100*	39 *125*	35 *105*	32 *95*	— —	— —	— —	105 *345*	90 *260*	80 *215*	— —	— —	— —

Representative insert: CNMG120412-MR4 / *CNMG433-MR4*

Tool life = 10 min | a_p = 3 mm / *0.120* Inch | Holder: C8-DCLNR-55080-12JETI2

SMG	TS2500 f			883 f		
	0,2 *0.008*	0,3 *0.012*	0,45 *0.018*	0,2 *0.008*	0,3 *0.012*	0,45 *0.018*
S1	47 *155*	35 *115*	25 *80*	25 *80*	22 *70*	18 *60*
S2	38 *125*	29 *90*	21 *65*	20 *65*	17 *55*	15 *49*
S3	33 *110*	25 *80*	18 *55*	18 *55*	15 *49*	13 *43*
S11	70 *230*	50 *165*	37 *120*	36 *120*	31 *100*	26 *85*
S12	55 *165*	39 *130*	28 *90*	28 *90*	24 *80*	20 *65*
S13	41 *130*	31 *100*	22 *70*	22 *70*	19 *60*	16 *50*

Representative insert: LNMX191940-MR / *LNMX191940-MR*

Tool life = 60 min | a_p = 3 mm / *0.120* Inch | Holder: CT-PLANL3223-19

SMG	TP0501 f (mm/r) (in/rev)			TP1501 f (mm/r) (in/rev)			TP25 f (mm/r) (in/rev)		
	0,5 *0.024*	**0,9** *0.035*	**1,3** *0.051*	**0,5** *0.024*	**0,9** *0.035*	**1,3** *0.051*	**0,5** *0.024*	**0,9** *0.035*	**1,3** *0.051*
P4	290 *840*	190 *620*	135 *445*	250 *720*	165 *540*	125 *410*	195 *570*	140 *460*	110 *360*

Representative insert: RCMX250700-R3 / *RCMX250700-R3*

Tool life = 60 min | a_p = 5 mm / *0.200* Inch | Holder: PRDCN4040S25

SMG	TP0501 f (mm/r) (in/rev)			TP1501 f (mm/r) (in/rev)		
	0,6 *0.023*	**1** *0.039*	**1,4** *0.055*	**0,6** *0.023*	**1** *0.039*	**1,4** *0.055*
P4	315 *1050*	220 *740*	165 *540*	275 *920*	195 *640*	145 *475*

Representative insert: RCMX250700-RR93 / *RCMX250700-RR93*

Tool life = 45 min | a_p = 3 mm / *0.120* Inch | Holder: PRDCN4040S25

SMG	TP0501 f (mm/r) (in/rev)			TP1501 f (mm/r) (in/rev)			TP2501 f (mm/r) (in/rev)			TP25 f (mm/r) (in/rev)		
	0,6 *0.023*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.023*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.023*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.023*	**0,9** *0.035*	**1,2** *0.047*
P7	380 *1250*	315 *1025*	250 *820*	300 *1000*	245 *820*	205 *670*	280 *940*	250 *820*	210 *690*	190 *640*	165 *540*	145 *475*

Representative insert: SNMM250724-R7 / *SNMM856-R7*

Tool life = 45 min | a_p = 6 mm / *0.240* Inch | Holder: PSBNR4040S25

SMG	TP0501 f (mm/r) (in/rev)			TP2501 f (mm/r) (in/rev)			TP3501 f (mm/r) (in/rev)			TP25 f (mm/r) (in/rev)			TP40 f (mm/r) (in/rev)		
	0,6 *0.020*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.020*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.020*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.020*	**0,9** *0.035*	**1,2** *0.047*	**0,6** *0.020*	**0,9** *0.035*	**1,2** *0.047*
P4	225 *850*	155 *510*	115 *375*	200 *740*	155 *510*	125 *410*	185 *690*	130 *425*	100 *330*	160 *570*	120 *395*	100 *330*	105 *395*	75 *245*	55 *180*

Insert label and packaging

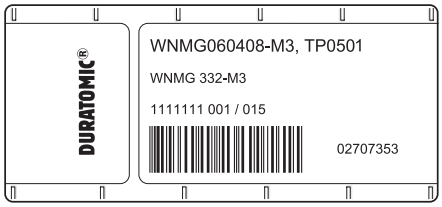
Inserts have to correspond to insert seat pocket on a toolholder and on the back of a insert box the insert code is written in accordance to ISO and ANSI standard. To simplify storage these codes also are added to one short side of the box.

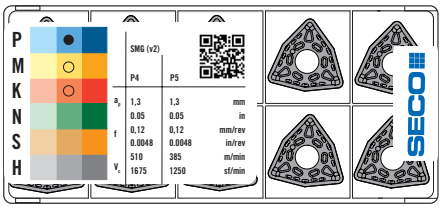
The back also holds information of the unique batch number and product number also available as bar code see to the right.

On on the front side of a general turning insert box the secolor code is present to the left (see page 33 for more clarity) and a first very general cutting data recommendation presented for two different workpiece materials categories according to the SMG classification in both metric and inch system.

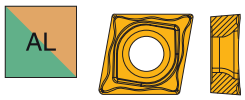
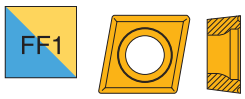
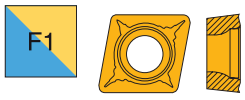
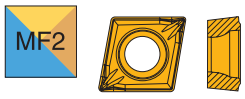
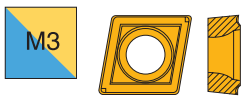
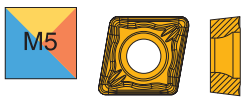
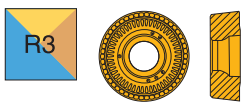
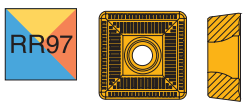
Note that the QR-code in the corner provides a direct link to the present product cutting data page to allow more precise cutting data recommendations based on the specific adjustments to actual application done at www.secotools.com webpage.

If you don't have access to a computer download the Seco Assistant application, available in the Google Playstore or Apple App-store. Then you can scan the barcode or QR-code and get instant access to product-information and many more functions.



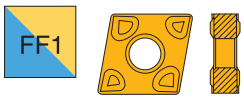


Chipbreaker program, positive basic shape inserts

-AL		Chipbreaker for positive inserts. Intended for machining of aluminium alloys. The highly polished rake face and the very large rake angle ensure extremely light cutting action. Recommended machining range: f = 0,15–0,60 mm/rev, a_p = 0,5–4,0 mm. *(f = 0,006–0,024 in/rev, a_p = 0,020–0,160 in).*
-FF1		Chipbreaker for positive inserts. Used to achieve a very fine finish when turning slender steel and stainless steel components. Recommended machining range: f = 0,05-0,30 mm/rev, a_p = 0,2-2,0 mm. *(f = 0.002-0.012 in/rev, a_p = 0.008-0.080 inch.).*
-F1		Chipbreaker for positive inserts. Positive geometry with sharp cutting edge gives easy-cutting properties. Suitable for high feed rates at fine depths of cut in precision forgings and castings. Recommended machining range: f = 0,1-0,5 mm/rev, a_p = 0,2-3,0 mm. *(f = 0.004-0.020 in/rev, a_p = 0.008-0.120 in).* Machining in bar automatics, for instance: f = 0,08-0,25 mm/rev, a_p = 1-3 mm. *(f = 0.003-0.010 in/rev, a_p = 0.040-0.120 inch).*
-MF2		A versatile finishing to semi-finishing chipbreaker with light-cutting action for positive inserts. Suitable for a wide range of cuts in steel and stainless steel finishing applications including boring. Recommended machining range: f = 0,08–0,50 mm/rev, a_p = 0,15–3,00 mm. *(f = 0.003–0.020 in/rev, a_p = 0.006–0.120 inch).*
-M3		A reliable semi-finishing to medium roughing chipbreaker ensuring safe chip flow. Suitable for medium cuts in steel and stainless steels application including boring. Recommended machining range: f = 0,12–0,60 mm/rev, a_p = 0,2–4,0 mm. *(f = 0.005–0.024 in/rev, a_p = 0.008–0.160 inch).*
-M5		A highly reliable chipbreaker for positive inserts. Intended for medium-rough and rough machining of steels, stainless steels and cast iron. Combines high edge strength with comparatively low cutting forces. Safe action in interruptions and rough skin on parts also including boring. Recommended machining range: f = 0,15–0,60 mm/rev, a_p = 1–5 mm. *(f = 0.006–0.024 in/rev, a_p = 0.040–0.200 inch).*
-R3		Chipbreaker for large round inserts are for finishing and medium machining of difficult to machine materials from steel to superalloys also in large components such as railway wheels for enhanced difficult machine materials for enhanced chipbreaking and surface finish. Recommended machining range: f = 0,5–1,2 mm/rev, a_p = 1,5–5,0 mm. *(f = 0.020–0.047 in/rev, a_p = 0.060–0.200 inch).*
-RR93		Chipbreaker for large round inserts are for medium machining and roughing of railway wheels, large components. Recommended machining range: f = 0,6-1,5 mm/rev, a_p = 3,0-10,0 mm *(f = 0.024–0.060 in/rev, a_p = 0.120–0.400 inch).*
-RR94		Chipbreaker for large inserts intended for roughing of railway wheels. Recommended machining range: f = 0,6–1,5 mm/rev, a_p = 3,0–10,0 mm. *(f = 0.024–0.060 in/rev, a_p = 0.120–0.400 inch).*
-RR96		Chipbreaker for large inserts intended for machining of steel with high depth of cut and large feed rates. Recommended machining range: f = 0,6–2,2 mm/rev, a_p = 3,0–24,0 mm. *(f = 0.024–0.085 in/rev, a_p = 0.120–0.945 inch).*
-RR97		Chipbreaker for large inserts intended for machining of steel with high depth of cut and large feed rates. The –RR97 geometry is stronger than the –RR96. Recommended machining range: f = 0,8–2,2 mm/rev, a_p = 3,0–24,0 mm. *(f = 0.032–0.085 in/rev, a_p = 0.120–0.945 inch).*
-UX		Chipbreaker for positive inserts. Smooth and easy chip flow on finishing and medium roughing in steel and stainless steel. Well suited for slim components. Recommended machining range: f = 0,05–0,40 mm/rev, a_p = 0,5-4,0 mm. *(f = 0.002–0.016 in/rev, a_p =0.020-0.160 inch).*

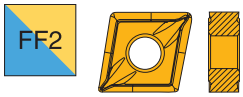
Chipbreaker program, negative basic shape inserts

-FF1



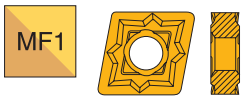
Chipbreaker for negative inserts. Used to achieve a very fine finish when turning slender steel and stainless steel components.
Recommended machining range: f = 0,08-0,30 mm/rev, a_p = 0,2-3,0 mm. *(f = 0.003-0.012 in/rev, a_p = 0.008-0.120 inch)*

-FF2



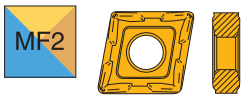
Chipbreaker for negative inserts. Intended for fine-finishing and semi-finishing of steels and stainless steels. The positive, tight chip groove offers light cutting action combined with superior chip forming.
Recommended machining range: f = 0,08–0,30 mm/rev, a_p = 0,2–1,5 mm. *(f = 0.003–0.012 in/rev, a_p = 0.008–0.060 inch)*.

-MF1



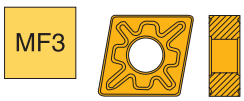
Chipbreaker intended for machining stainless steel, superalloys and titanium alloys. Type ..GG insert has a sharp, precision ground edge. Type ..MG insert has a lightly honed cutting edge for increased strength. MF1 is intended for use in semi-finishing and finishing applications.
Recommended machining range: f = 0,08–0,30 mm/rev, a_p = 0,2–3,5 mm. *(f = 0.003–0.012 inch/rev, a_p = 0.008–0.140 inch)*.

-MF2



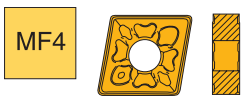
First choice for finishing with negative inserts. Suitable for chip control at depths of cut down to 0,25 mm, provided that the feed rate is in excess of 0,25 mm/rev. Good capacity for medium rough machining.
Recommended machining range: f = 0,10–0,40 mm/rev, a_p = 0,2–3,0 mm. *(f = 0.004–0.016 in/rev, a_p = 0.008–0.120 inch)*.

-MF3



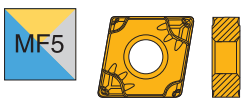
Chipbreaker with positive cutting rake angle intended for moderately difficult stainless steel. The MF3 is also intended for light roughing in relatively soft, “tacky” steel and difficult to machine stainless steel if the depth of cut is limited. MF3 can also be used for finishing of cast iron.
Recommended machining range: f = 0,2–0,4 mm/rev, a_p = 1–4 mm. *(0.008–0.016 in/rev, a_p = 0.040–0.160 inch)*.

-MF4



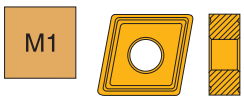
Chipbreaker intended for medium/finishing of stainless steel, very open and highly positive geometry.
Recommended machining range: f = 0,15–0,50 mm/rev, a_p = 0,5–4,0 mm. *(f = 0.006–0.020 in/rev, a_p = 0.020–0.160 inch)*.

-MF5



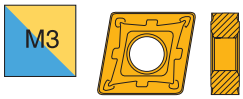
Chipbreaker intended for medium finishing of steel and stainless steel at high feeds. Very easy cutting and open geometry.
Recommended machining range: f = 0,2–0,8 mm/rev, a_p = 0,2–2,7 mm. *(f = 0.008–0.032 in/rev, a_p = 0.008–0.100 inch)*.

-M1



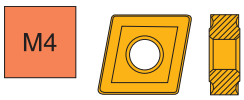
Chipbreaker intended for superalloys and titanium alloys. It has a positive cutting rake angle which is slightly honed to increase the edge strength. Also available with a perfectly sharp edge (type ..GG insert). The M1 is intended for light roughing and for semi-finishing.
Recommended machining range: f = 0,2–0,4 mm/rev, a_p = 1,5–5,0 mm. *(f = 0.008–0.016 in/rev, a_p = 0.060–0.200 inch)*.

-M3



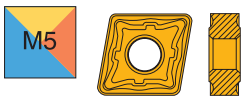
First choice for medium-rough machining and also the most versatile Seco chipbreaker. In most cases, it is the only chipbreaker needed. Offers the best useful life and best chipbreaking in a wide range of cutting data and workpiece materials. Suitable for precision forged and cast workpieces (NNS or Near Net Shape workpieces) as regards both chip control and edge strength.
Recommended machining range: f = 0,15-0,50 mm/rev, a_p = 0,5-5,0 mm. *(f = 0.006-0.020 in/rev, a_p = 0.020-0.200 inch)*.

-M4



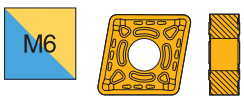
Chipbreaker intended for cast iron. Positive rake angle with a narrow T-land gives low cutting forces.
First choice for cast iron machining at high speeds.
Recommended machining range: f = 0,1-0,7 mm/rev, a_p = 0,2-5,0 mm. *(f = 0.004-0.028 in/rev, a_p = 0.008-0.200 inch)*.

-M5



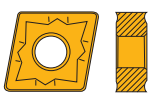
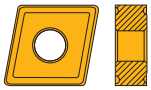
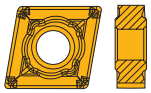
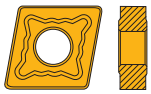
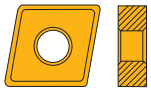
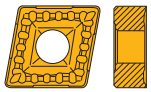
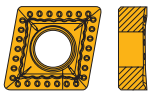
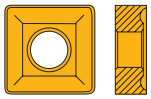
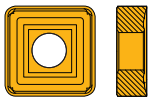
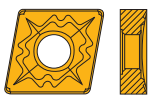
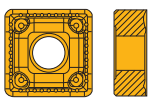
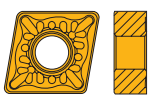
The choice for roughing by means of double-sided inserts. Intended for demanding operations at high feed rates in steel, stainless steel and cast iron. Combines high edge strength with comparatively low cutting forces.
Recommended machining range: f = 0,3-0,7 mm/rev,a_p = 1,5-7,0 mm. *(f = 0.012-0.028 in/rev,a_p = 0.060-0.280 inch)*.

-M6



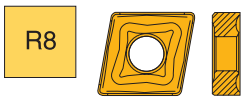
Strong double-sided chipbreaker, intended for semi-roughing and roughing of steel. A well-balanced design combining excellent chip control and relatively low cutting forces which provides reliable cutting action in both continuous as well as interrupted cuts. Well suited also for machining of ferritic and martensitic stainless steels.
Recommended machining range: f = 0,2-0,8 mm/rev, a_p = 1,0-7,0 mm. *(f = 0.008-0.031 in/rev, a_p = 0.040-0.275 inch)*.

Chipbreaker program, negative basic shape inserts

-MR3	MR3		Chipbreaker with a positive cutting rake angle that reduces cutting forces and gives a very high edge strength. Intended for medium-rough and rough machining of superalloys, titanium alloys and stainless and hardened steel. Recommended machining range: f = 0,2–0,6 mm/rev, a_p = 1,5–7,0 mm. *(f = 0.008–0.024 in/rev, a_p = 0.060–0.280 inch)*.
-MR4	MR4		The MR4 has a negative T-land, which gives extremely high edge strength. The chipbreaker is intended for more difficult machining applications on superalloys and titanium alloys, such as intermittent cuts and the machining of parts with raw surface. Recommended machining range: f = 0,15–0,50 mm/rev, a_p = 1,5–7,0 mm. *(f = 0.006–0.020 in/rev, a_p = 0.060–0.280 inch)*.
-MR6	MR6		Chipbreaker for medium and medium roughing of steel. Very easy cutting and open geometry. Double and single-sided. Recommended machining range: f = 0,25–0,80 mm/rev, a_p= 0,9–5,0 mm. *(f = 0.010–0.032 in/rev, a_p= 0.035–0.200 inch)*.
-MR7	MR7		The strongest chipbreaker for double-sided inserts. The MR7 is suitable for high feed rates and depths of cut that normally require a single-sided insert. The chipbreaker has a wide negative T land, which gives high edge strength. Recommended machining range: f = 0,35–0,90 mm/rev, a_p = 1,5–7,0 mm. *(f = 0.014–0.035 in/rev, a_p = 0.060–0.280 inch)*.
-MR9	MR9		The strongest chipbreaker intended for cast iron. The negative chamfers makes it very suitable for high feeds in interupted cuts and still with very reliable action in cast irons. Recommended machining range: f = 0,2-1,0 mm/rev a_p = 1,0-12mm. *(f = 0.008–0.040 in/rev, a_p = 0.040–0.470 inch)*.
-R4	R4		Chipbreaker for single-sided inserts. It has a positive cutting edge which gives low cutting forces. Recommended machining range: f = 0,2–0,6 mm/rev, a_p = 2–10 mm. *(f = 0.008–0.024 in/rev, a_p = 0.080–0.400 inch)*.
-R5	R5, R57		Chipbreaker for single-sided inserts. Recommended for medium-roughing of steel. Recommended machining range: f = 0,3–1,0 mm/rev, a_p = 2–12 mm. *(f = 0.012–0.040 in/rev, a_p = 0.080–0.475 inch)*.
-56 -R56	R6, R56		Chipbreaker with easy-cutting geometry for single-sided inserts. Intended for stainless steel machining applications. Recommended machining range: f = 0,4–0,8 mm/rev, a_p = 2–12 mm. *(f = 0.016–0.032 in/rev, a_p = 0.080–0.470 inch)*.
-57 -R57	R5, R57		Chipbreaker for single-sided roughing inserts. Recommended for roughing operations on steel at high feed rates and high depth of cut. Recommended machining range: f = 0,45-1,10 mm/rev, a_p = 2-12 mm. *(f = 0.018–0.042 in/rev, a_p = 0.080–0.470 inch)*.
-R6	R6, R56		Chipbreaker for single-sided inserts. Recommended for medium-roughing of stainless steel. Recommended machining range: f = 0,25–0,70 mm/rev, a_p = 2–10 mm. *(f = 0.010–0.028 in/rev, a_p = 0.080–0.400 inch)*.
-R68	R7, R68		Chipbreaker for single sided insert. Recommended for heavy-roughing of steel. Recommended machining range: f = 0,4–1,4 mm/rev, a_p = 4–14 mm. *(f = 0.016–0.055 in/rev, a_p = 0.160–0.550 inch)*.
-R7	R7, R68		A strong but easy-cutting chipbreaker for single sided inserts. The R7 is well suited for intermittent machining of both stainless and ordinary carbon steel. Recommended machining range: f = 0,4–1,6 mm/rev, a_p = 3–18 mm. *(f = 0.016–0.063 in/rev, a_p = 0.120–0.700 inch)*.

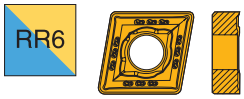
Chipbreaker program, negative basic shape inserts

-R8



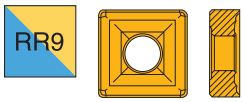
A very strong chipbreaker for single-sided inserts. The R8 is intended for high feed rates when machining castings and forgings of austenitic stainless steel.
Recommended machining range: f = 0,35–0,80 mm/rev, a_p = 2–12 mm. *(f = 0.014–0.032 in/rev, a_p = 0.080–0.470 inch).*

-RR6



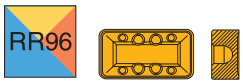
A very easy-cutting chipbreaker for single-sided inserts. Recommended for roughing of stainless steel and steel.
Recommended machining range: f = 0,3–1,0 mm/rev, a_p = 2–12 mm. *(f = 0.012–0.040 in/rev, a_p = 0.080–0.470 inch).*

-RR9



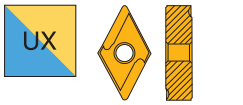
Extremely strong chipbreaker for single-sided negative inserts, for use at high feed rates. Suitable for difficult castings and forgings and for austenitic stainless steel.
Recommended machining range: f = 0,5–1,2 mm/rev, a_p = 2,5–15,0 mm. *(f = 0.020–0.047 in/rev, a_p = 0.100–0.590 inch).*

-RR96



Heavy roughing chipbreaker for negative single-sided inserts for high parameters and chip control for all materials.
Recommended machining range for LNMX50: f = 1,5–2,6 mm/rev, a_p = 12–36 mm. *(f = 0.060–0.100 in/rev, a_p = 0.470–1.415 inch).*

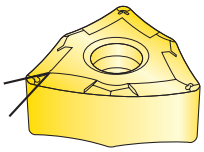
-UX

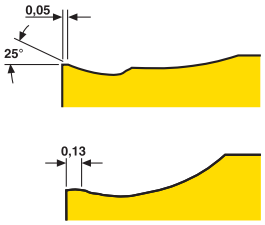


Chipbreaker for negative inserts. Positive cutting rake with sharp edge. Low cutting force. Suitable for slim components.
Recommended machining range: f = 0,2–0,4 mm/rev, a_p =1,0–6,0 mm. *(f = 0.008–0.016 in/rev, a_p =0.040–0.240 inch).*

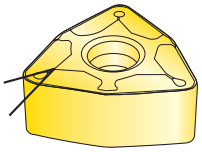
Chipbreakers

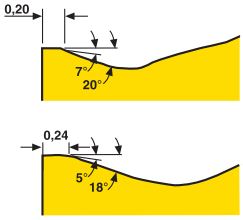
-MF2 – For finishing



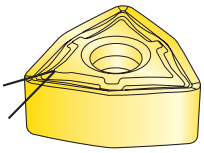


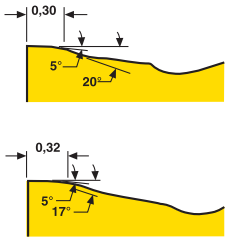
-M3 – For general machining





-M5 – For roughing

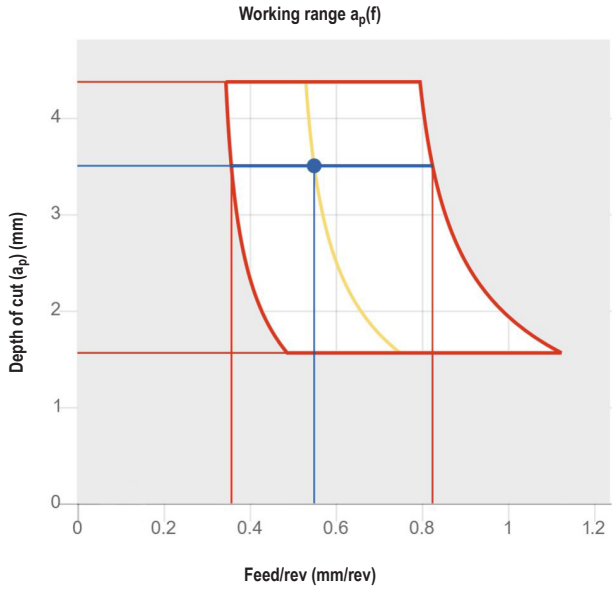




The design of a chipbreaker is made to give both good chipcontrol and additional functional benefits appropriate for the intended materials, applications and components.

Consequently a number of features on a specific insert differ to adapt to those needs for example as indicated in the drawings.

-MF2, -M3, -M5

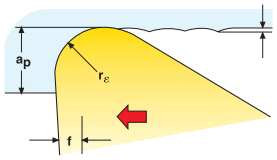


For a certain insert and chipbreaker combination there is a recommended working range and depend on several aspects in insert design and of machining conditions such as component and path.

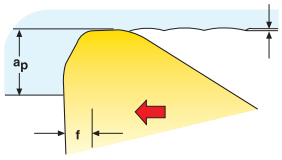
When logged in on www.secotools.com or Mypages specific cutting data graphs for general turning insert are available if Advanced Cutting Data section are expanded.

High Feed Wiper inserts

Standard insert geometry

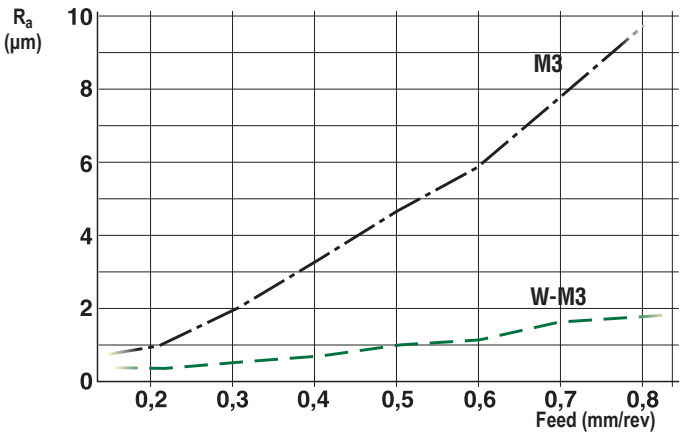


High Feed Wiper insert geometry



Often comes the question how a High Feed Wiper can generate that significantly better surface finish at the same feed rate compared to standard insert.
When looking closer to the design of an insert edge regardless if either e.g. coated carbide or PCBN insert there are similarities.
Below diagrams show the Ra-value as a function of feed rate when using standard nose radius inserts and High Feed Wiper inserts.
Regardless of chipbreaker design and workpiece material there are solutions available corresponding to the need.

M3 = Standard -M3, W-M3 = Wiper -M3

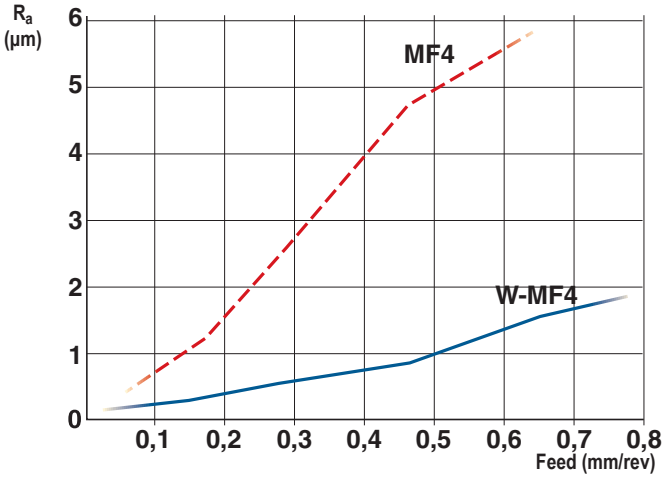


The diagram shows the superior surface finish in steel achieved with a Seco High Feed W-M3 wiper insert compared to a conventional insert.

CNMG120408W-M3 TP2501, a_p = 1 mm, cutting speed adjusted for feed, workpiece material: (steel) SMG P4.

Note that opportunities to do the same surface finish comparison for each specific product and application when logged in on www.secotools.com under the Advanced Cutting Data section.

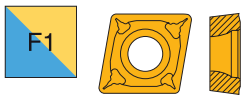
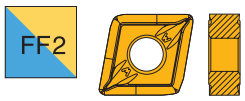
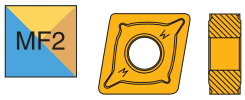
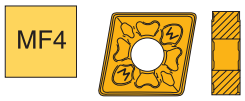
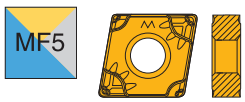
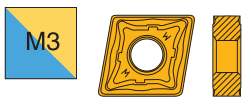
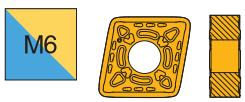
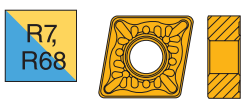
MF4 = Standard -MF4, W-MF4 = Wiper -MF4



When applying a Seco High Feed W-MF4 wiper insert in stainless steel the diagram shows the superior surface finish achieved compared to a conventional insert in stainless steel.

CNMG120408W-MF4 TM2501, a_p = 1 mm, cutting speed tool life adjusted for feed in SMG M2 (stainless steel).

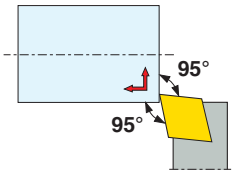
Chipbreaker program, High Feed Wiper inserts

W-F1		A versatile chipbreaker for positive inserts. For finishing machining of steel, stainless steel and cast iron giving good surface finish. Suitable for high feed rates at small depths of cut. Recommended machining range: f = 0,05-0,50 mm/rev, a_p = 0,25-3,00 mm. *(f = 0.002–0.020 in/rev, a_p = 0.010–0.120 inch).*
W-FF2		Chipbreaker for high feed finishing of steel and stainless steel. Wide chip control range in finishing and generates a superior surface quality. Recommended machining range: f = 0,1-0,5 mm/rev, a_p = 0,2-1,5 mm. *(f = 0.004-0.020 in/rev, a_p = 0.008-0.060 inch).*
W-MF2		First choice for finishing with both positive and negative inserts. Chipbreaker suitable for finishing machining of steel, stainless steel and cast iron at high feed rates giving good surface finish. Recommended machining range: f = 0,05-0,60 mm/rev, a_p = 0,5-4,0 mm. *(f = 0.002-0.024 in/rev, a_p = 0.020-0.160 inch).*
W-MF4		Easy cutting action chipbreaker for high feed machining of stainless steel. Provides good surface finish in finishing operations and High Feed Wiper productivity in medium-roughing machining. Recommended machining range: f = 0,05-0,90 mm/rev, a_p= 0,2 - 6,0 mm. *(f = 0.002-0.035 in/rev, a_p= 0.008 - 0.240 inch).*
W-MF5		Chipbreaker intended for medium finishing of steel at high feed. The geometry is very open and highly positive and equipped with wiper radius. Recommended machining range: f = 0,2-0,8 mm/rev, a_p = 0,2-2,7 mm. *(f = 0.008-0.032 in/rev, a_p = 0.008-0.105 inch).*
W-M3		Versatile chipbreaker in both positive and negative inserts for high feed finishing and medium-roughing machining of steel, stainless steel and cast iron. Operates in a wide application area. Gives a good surface finish even at high feeds. Recommended machining range: f = 0,2-0,9 mm/rev, a_p = 0,5-6,0 mm. *(f = 0.008-0.035 in/rev, a_p = 0.020-0.240 inch).*
W-M6		Strong double-sided chipbreaker, intended for high-feed semi-roughing and roughing of steel. A well-balanced design combining excellent chip control and relatively low cutting forces which provides reliable cutting action in both continuous as well as interrupted cuts. Recommended machining range: f = 0,3-1,0 mm/rev, a_p = 1,0-7,0 mm. *(f = 0.012-0.040 in/rev, a_p = 0.040-0.275 inch).*
W-R4		Chipbreaker for single sided inserts intended for high feed medium-roughing and rough machining of steel, stainless steel and cast iron. Gives a good surface finish even at high feeds. Low cutting forces. Recommended machining range: f = 0,3-1,0 mm/rev, a_p = 2,0-7,5 mm. *(f = 0.012-0.040 inch/rev, a_p = 0.080-0.295 inch).*
W-R7		A strong easy cutting chipbreaker for single sided inserts. Intended for the highest feeds when medium-roughing and roughing machining of steel, stainless steel and cast iron. Gives a good surface finish even at the higher feeds. Recommended machining range: f = 0,4-1,2 mm/rev, a_p = 2,0-9,5 mm. *(f = 0.016-0.048 in/rev, a_p = 0.080-0.375 inch).*
-WZ **-WZN** **-WZP** **-WS** **-WL**		Wiper geometries on PCBN inserts. Available in various insert styles in solid or brazed format. Developed for machining pearlitic grey cast iron and hardened steel. Gives a high quality surface finish at high feeds.

Operation guidelines

C- and W-basic shape High Feed Wiper inserts

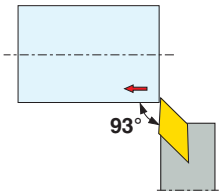
– The favourable surface finish results are lost, if the cutting edge angle diverges from 95°.
– Max diversion allowed: ±2°.
– Back-turning is NOT recommended.



On C-style High Feed inserts, except for PCBN inserts, the wiper geometry is also located on the 100° corner.
When using W-R4 or W-R7 chipbreaker use a toolholder with P- or M-type clamping.

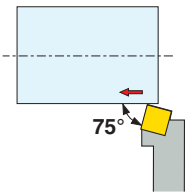
D- and T-basic shape High Feed Wiper inserts

– The favourable surface finish results are lost, if the cutting edge angle diverges from 93°.
– Max diversion allowed: ±2°.
– Back-turning is NOT recommended.



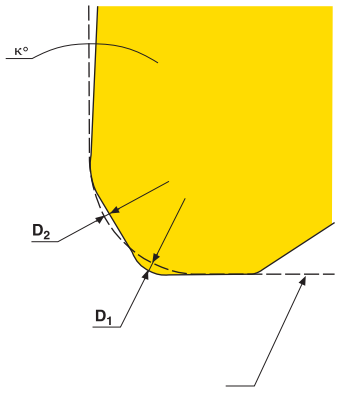
S-basic shape High Feed Wiper inserts

– S-style High Feed insert to be used in a toolholder with 75° setting angle. The favourable surface finish results are lost, if the cutting edge angle diverges from 75°. Max diversion allowed: ±2°.



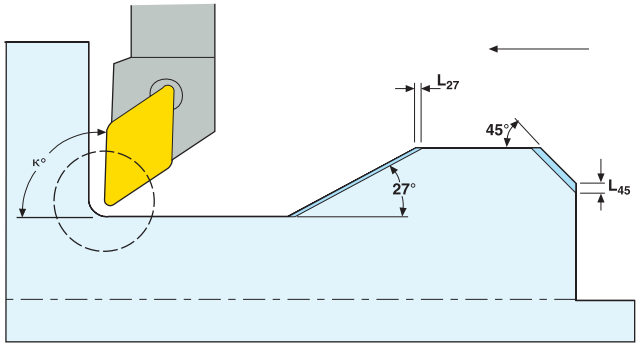
Copying with D- and T-style Wiper inserts

Since D- and T-style High Feed inserts not are designed within ISO-tolerances, an adjustment in the tool offset must be made.
A deviation from the nominal nose radius shape, will always occur (D1, D2) when going towards a corner.



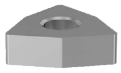
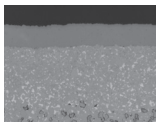
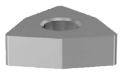
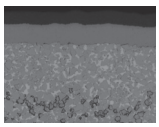
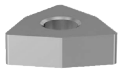
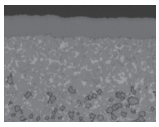
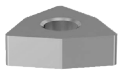
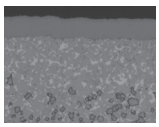
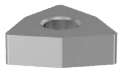
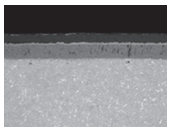
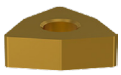
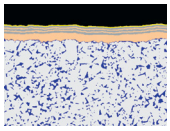
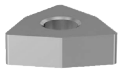
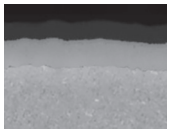
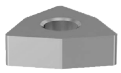
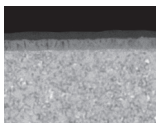
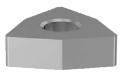
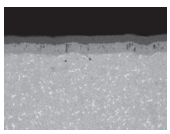
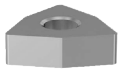
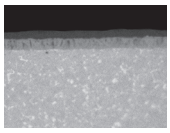
ISO-profile (Nominal nose radius)

The High Feed geometry on a D-and T-style insert does not provide an exact corner radius.



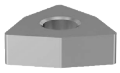
When copying with a D- or T-style High Feed insert, an adjustment must be made for dimensional deviations.

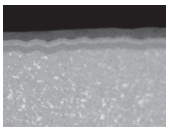
CVD Coated Grades

TP0501			Duratomic® grade. A grade with an extremely high degree of heat and wear resistance for many steel applications such as in alloy steels and especially capable under dry conditions. Also applicable for demanding applications in cast irons. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TP1501			Duratomic® grade. Highly heat and wear resistant grade extremely well suited for productive general turning of steels and a useful backup in other material groups. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TP2501			Duratomic® grade. Designed with high wear resistance and edge strength applicable in a wide range of turning applications in steels as well as many stainless steels and cast irons. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TP3501			Duratomic® grade. Enhanced edge toughness still with the characteristic high wear resistance intended for versatile performance in turning applications in steels as well as stainless steels especially including interrupted cuts. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TP25			Universal grade for high versatile performance over a wide range of applications in steels, stainless steels and cast irons. Trustworthy alternative at limited cutting speeds or high surface finish requirements. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TP40			Universal grade for a extremely secure performance in the most demanding application from steels, stainless steels to superalloys especially in castings and forgings. TiC/Ti(C,N) + TiN
TH1501			Duratomic® grade. An extremetly hard super micrograin grade intended for machining of partly hardened steels and provides an alternative for cast iron finishing. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TS0501			Duratomic ® grade. A very hard super-micrograin grade intended for semi-finish to finish machining of some harder superalloys and under some circumstances hardened steels Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TM1501			Duratomic® grade. Highly resistant and optimized grade for many continuous cut in stainless steel turning applications. Complements in mixes of steel and stainless steel turning. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)
TM2501			Duratomic® grade. A highly capable grade for austenitic stainless steel turning with combinations of high resistance and superior edge toughness. First choice in austenitic stainless steel turning. Complements in steel turning with heavy intermittent cuts. Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)

CVD Coated Grades

TM3501

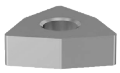


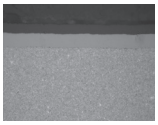


Duratomic® grade. First choice in duplex and more difficult-to-cut stainless steels and highly resistant to notch wear and chipping. Superior in finishing and in intermittent cuts in all stainless steel alloys. Versatile grade, covering a variety of stainless steel alloys and operations.

Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)

TK0501

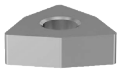


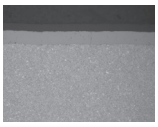


Duratomic® grade. A extremely wear resistant optimized grade choice for machining of grey cast iron and many ductile cast irons.

Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)

TK1501

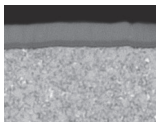
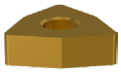
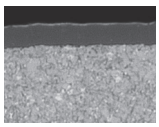
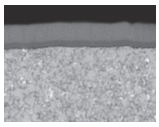
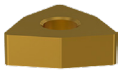
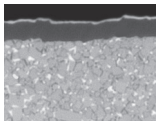
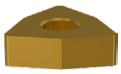
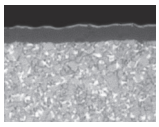
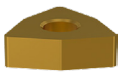
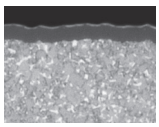
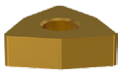
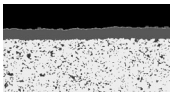




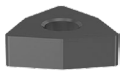
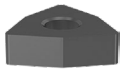
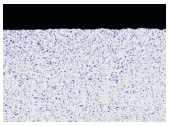
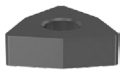
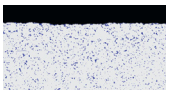
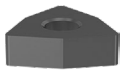
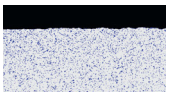
Duratomic® grade. A highly wear resistant grade for cast irons in general as well as in steels. The grade is particularly capable in machining of ductile (nodular) cast irons also in more demanding setups and interrupted cuts.

Ti(C,N) + Al_2O_3 + Used Edge Detection (Chrome)

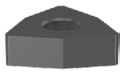
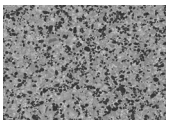
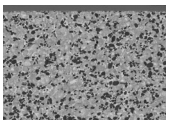
PVD Coated Grades

TH1000			Very hard supermicrograin grade intended for partly hardened steel components as well as general "hard-to-cut" workpiece materials such as superalloys and due to remarkable edge toughness it also provides high performance in interrupted cuts and hard-surface removal. Ti-Al-Si-N nanolaminate coating
TS2000			Hard micrograin wear resistant grade intended for finishing in superalloys and titanium as well as in many stainless steels. (Ti,Al)N + TiN
TS2050			Hard and wear resistant micrograin grade intended for finishing and semi-finishing of superalloys. Ti-Al-Si-N nanolaminate coating
TS2500			Relatively hard micrograin grade for machining of superalloys and titanium in roughing applications and due to its design also applicable in a wide range of materials such as stainless steels. (Ti,Al)N + TiN
CP200			Hard micrograin grade principally intended for finishing in superalloys and titanium. Also works well in stainless steels. (Ti, Al) N + TiN
CP500			Tough micrograin grade intended for finishing to medium-roughing of stainless steels but with wide applicability for example in steels and aluminium alloys. Especially suitable in intermittent cuts. (Ti,Al)N + TiN
CP600			Very tough micrograin grade intended for stainless steels and steels applicable but generally applicable when ever high edge toughness required e.g. more difficult interrupted cuts. (Ti,Al)N + TiN

Uncoated Grades

HX			Universal uncoated grade intended for machining of cast iron and hardened steels useful also in non-ferrous materials.
KX			Optimized micrograin grade intended for the machining of aluminium and other non-ferrous materials.
883			Relatively hard and still tough uncoated micrograin grade for machining of titanium in roughing applications and also suitable for superalloys.
890			High hardness uncoated micrograin grade maintaining good toughness intended for superalloys and titanium can also be applied in other materials.

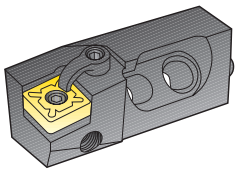
Cermet

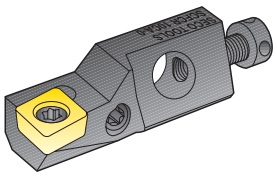
TP1020			High wear resistance cermet grade for highest surface finish with predictability, first of all, in steels and stainless steels.
TP1030			Coated highly wear resistant cermet grade for high surface finish and productivity requirements mainly used in steels and stainless steels. Ti-Al-Si-N nanolaminate coating.

Cartridges – Mounting information

Angular Mount Cartridges

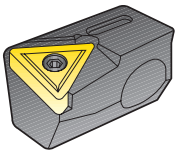
– Conform to ISO-ANSI standards
– Accomodate positive and negative rakes
– Use standard, interchangeable Seco seats and chipbreakers
– Fit any cat-head, boring bar or tool block
– now using ISO-ANSI cartridges
– Allow axial and radial adjustment
– Instant metric/inch conversion with simple substitution of components



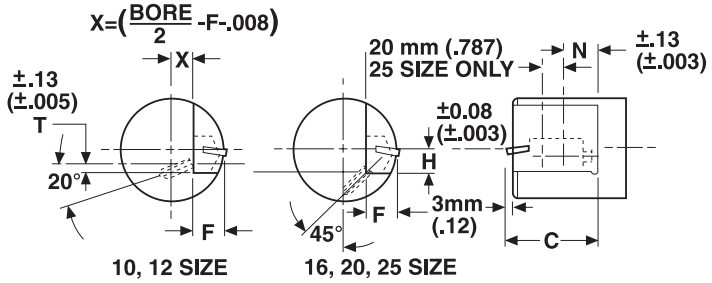


90° Mount Cartridges

– Provide close-tolerance machining with radial and axial adjustments of M and PC types



Mounting Information: ISO-ANSI, Angular Mount Cartridges



Cartridge size		C	F	H	T	N	Hold Down Screw	
Metric Std.	Inch Std.	mm/*inch*	mm/*inch*	mm/*inch*	mm/*inch*	mm/*inch*	Metric Std.	Inch Std.
10	39	50 / *1.968*	14 / *.551*	10 / *.394*	5 / *.196*	20 / *.787*	M6 (Low Hd.)	1/4 (Low Hd.)
12	47	55 / *2.165*	20 / *.787*	12 / *.472*	6 / *.236*	20 / *.787*	M6	1/4
16	63	63 / *2.480*	24 / *.945*	16 / *.630*	–	25 / *.984*	M8	5/16
20	79	70 / *2.756*	25 / *.984*	20 / *.787*	–	30 / *1.181*	M8	5/16
25	98	100 / *3.937*	32 / *1.260*	25 / *.984*	–	30 / *1.181*	M10 (2)	3/8 (2)

Cartridge Reference Guide

Cartridges are stocked with metric parts as standard.
Components with inch drives are available as optional spare parts.
See substitution charts below.

Lock Pins		Clamp Screws		Rad. Adj. Screws	
Metric (standard)	Inch (optional)	Metric (standard)	Inch (optional)	Metric (standard)	Inch (optional)
NLM-23	NLC-23	XNSM-0515	XNSC-0515	SASM-0406	SASC-0406
NLM-33	NLC-33	XNSM-0620	XNSC-0620	SASM-0412	SASC-0412
NLM-34L	NLC-34L	XNSM-0825	XNSC-0825	SASM-0516	SASC-0516
NLM-43	NLC-43			SASM-0620	SASC-0620
NLM-46S	NLC-46S			SASM-0820	SASC-0820
NLM-54	NLC-54				
NLM-58	NLC-58				
NLM-68	NLC-68				

Railway wheels – Introduction

Turning – New railway wheels

The product range consists of:

– Inserts for finish machining RCMT-R3 and RCMX-R3 geometries
– Inserts for rough machining RR93, H-RR93 & RR94 geometries
– Inserts for heavy roughing at high feed rate RR97 geometry
– Solid PRDCN toolholders up to 50x50 shank
– Seco-Capto™ custom made toolholders

R3

Stong geometries for finishing and semi finishing at high feet rates



RCMX-R3



RCMT-R3

Feed recommendation: 0,5-1,2 mm/rev / *0.002-0.047 in/rev*
D.O.C. recommendation: a_p < 5 mm / *0.197 inch*

RR94, RR93

Stong geometries for medium machining and roughing at high feet rates



RCMX-RR94



RCMX-RR93



RCMX-H-RR93

Feed recommendation: 0,6-1,4 mm/rev / *0.024-0.055 in/rev*
D.O.C. recommendation: a_p < 12 mm / *0.472 inch*

RCMX-RR97

Strong geometries for machining at high feed rates.



Feed recommendation: 0,6-1,5 mm/rev / *0.024-0.059 in/rev*
D.O.C. recommendation: a_p < 15 mm / *0.591 inch*

SNMM-R7

For roughing operations at high feed rates and large depth of cut.



Feed recommendation: 0,6-1,2 mm/rev / *0.024-0.047 in/rev*
D.O.C. recommendation: a_p < 15 mm / *0.591 inch*

R3, RR93 geometries with the chipbreaker grooves and bumps improves the chipbreaking.
Seco dedicated Duratomic® grades improves the performance.

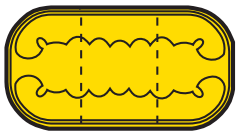
Railway wheel re-turning

The product range consists of:

– Inserts for finish machining MF and R2 geometries
– Inserts for medium rough machining RR94 geometry
– Inserts for rough machining MR and RR97 geometries
– Edge strength order R2-MF-RR94-MR-RR97
– Cassettes for railway wheel re-turning RWRT

LNMX-MF

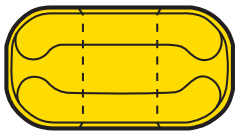
For re-machining at small depth of cut. (Normally used when machining with an under floor lathe.)



Feed recommendation: 0,4-1,0 mm/rev / *0.016-0.039 in/rev*
D.O.C. recommendation: ap < 10 mm / *0.394 inch*

LNMX-MR

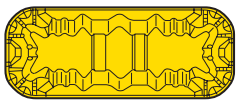
Basic choice for re-machining.



Feed recommendation: 0,6-2,0 mm/rev / *0.024-0.079 in/rev*
D.O.C. recommendation: ap < 15 mm / *0.591 inch*

LNMX-R2

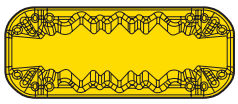
R2 – for less worn out, soft wheels for best chip control.



Feed recommendation: 0,40-1,10 mm/rev / *0.016-0.043 in/rev*
D.O.C. recommendation: ap = 2-5 mm / *0.079-0.197 inch*

LNMX-RR94

RR94 – for the moderately damaged wheels.



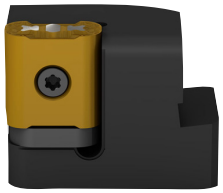
D.O.C. and feed recommendation:
LNMX19, ap = 2-5 mm / *0.079-0.197 inch*; f = 0,45-1,40 mm/rev / *0.018-0.055 in/rev*
LNMX30, ap = 2-10 mm / *0.079-0.394 inch*; f = 0,55-1,80 mm/rev / *0.022-0.071 in/rev*

Cassettes for railway wheel re-turning RWRT

Standard products

CT-PLANR/L (R/L175.32)

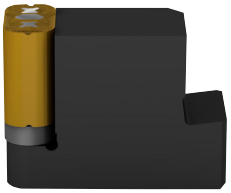
Pin clamped cassettes for LNMX19 and LNMX30



Right-hand version shown

CT-PLFNR/L (R/L177.32-3219-19)

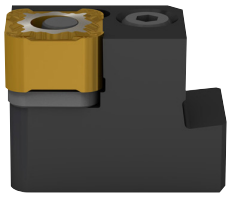
Pin clamped cassettes for LNMX19 and LNMX30



Right-hand version shown

CT-PSANR/L

Lever clamped cassettes for SNMX1911



Right-hand version shown

The cassettes are equipped with carbide shims for insert support and cassette protection.
The toolholders for these cassettes are machine specific. The combination cassettes are also machine specific. Some of them are offered as specials.

Selection of insert format – PCBN

Insert grades – PCBN

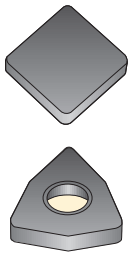
Uncoated:

CBN010
CBN150
CBN170
CBN200
CBN300
CBN500
CBN600

PVD coated grades:

CH0550
CH1050
CBN060K
CH2540
CH2581
CH3515
CBN300P
CK2065
CBN400C

Solid insert



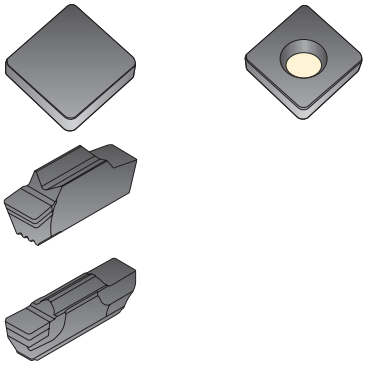
According to the geometry, two sides can be used.

Grades:
CH0550, CBN060K, CH2540, CBN300P, CK2065, CBN400C, CBN010, CBN150, CBN170, CBN200, CBN300, CBN500, CBN600, CH1050, CH2581

Toolholder styles:
D, P, C and M

CBN060K and CBN300 are also, in some geometries, available with hole.

Sintered layer insert -LF



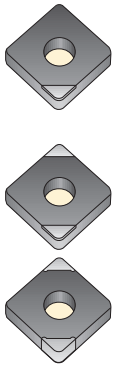
CBN layer sintered on to carbide. One side is usable.

Grades:
CBN060K, CH3515, CBN010, CBN200

Toolholder styles:
S, C and M

MDT
Grades:
CBN010, CBN170, CBN200

Brazed tip insert -L1 (single and double sided) and -L2



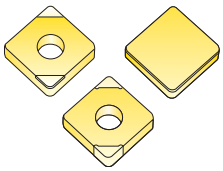
CBN brazed onto standard carbide inserts.

Grades:
CH0550, CBN060K, CH2540, CH3515, CBN010, CBN150, CBN170, CBN200, CH1050, CH2581

Toolholder styles:
D, P, S and M

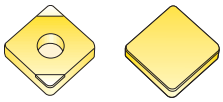
PCBN grades, coated

CH0550



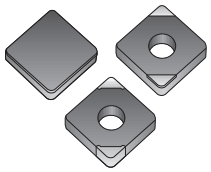
Format:
Solid & brazed tips (single & double sided).
Composition:
40% cBN bi-modal grain size distribution with average grain size of 3 µm and a TiCN ceramic binder.
Coating:
(Ti, Al, Cr)N coating

CH1050



Format:
Solid & brazed tips (single sided).
Composition:
55% cBN average grain size 2 µm and TiCN ceramic binder
Coating:
(Ti, Al, Cr)N coating

CBN060K



Format:
Solid & brazed tips (single & double sided).
Composition:
60% cBN content grade with an average grain size of 1-2 µm and a TiCN ceramic binder.
Coating:
(Ti, Al, Si)N coating.

CH2540



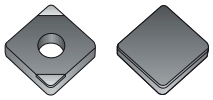
Format:
Solid & brazed tips (single sided).
Composition:
65% cBN bi-modal grain size distribution with average grain size of 6 µm and a TiCN ceramic binder.
Coating:
(Ti, Si)N coating.

CH2581



Format:
Solid & brazed tips (single sided).
Composition:
75% cBN average grain size 3-4 µm and TiCN ceramic binder.
Coating:
TiAlN coating.

CH3515



Format: Full-face layer & brazed tips (single sided).
Composition:
90% cBN average grain size of 4 µm and a AlN ceramic binder.
Coating:
(Ti, Al)N coating.

CBN300P



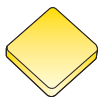
Format:
Solid.
Composition:
90% cBN content grade with an average grain size of 22 µm and a Al ceramic binder.
Coating:
(Ti, Al)N coating.

CK2065



Format:
Solid
Composition:
90% cBN content grade with an average grain size of 22 µm and a Al ceramic binder.
Coating:
Wear detection coating

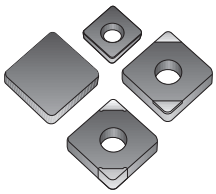
CBN400C



Format:
Solid.
Composition:
90% cBN content grade with an average grain size of 3-6 µm and a Al ceramic binder.
Coating:
(Ti, Si)N coating.

PCBN grades, uncoated

CBN010



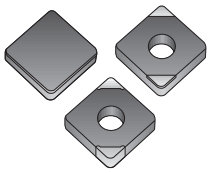
Format:
Solid, full-face layer and brazed tips (single & double sided).
Composition:
50% cBN content grade with an average grain size of 2 µm and a TiC ceramic binder.
Coating:
No coating.

CBN150



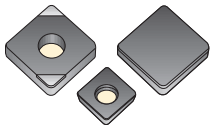
Format:
Solid and brazed tips (single sided).
Composition:
45% cBN content grade with an average grain size of < 1 µm and a TiCN ceramic binder.
Coating:
No coating.

CBN170



Format:
Solid and brazed tips (single & double sided).
Composition:
65% cBN content grade with an average grain size of 2 µm and a TiCN+SiCw ceramic binder.
Coating:
No coating.

CBN200



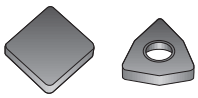
Format:
Full-face layer and brazed tips (single sided).
Composition:
85% cBN content grade with an average grain size of 2 µm and a Co-W-Al ceramic binder.
Coating:
No coating.

CBN200



Format:
Solid.
Composition:
90% cBN content grade with an average grain size of 3-6 µm and a Al ceramic binder.
Coating:
No coating.

CBN300



Format:
Solid.
Composition:
90% cBN content grade with an average grain size of 22 µm and a Al ceramic binder.
Coating:
No coating.

CBN500



Format:
Solid.
Composition:
90% cBN content grade with an average grain size of 15 µm and a Al ceramic binder.
Coating:
No coating.

CBN600



Format:
Solid.
Composition:
90% cBN content grade with multi modal grain size and Al ceramic binding.
Coating:
No coating.

PCBN High Feed Wiper inserts – Introduction

The surface finish in a turning operation is affected by a great number of factors. Two of the most important factors are feed rate and the size of the corner radius. A relation commonly used in industry when choosing relevant cutting data regarding feed and surface finish, is that R_a roughly can be said to increase with the square of the feed rate and decrease with increased size of the corner radius. At least this was the case before the development of wiper geometries designed for high feed finishing, which is now gaining popularity in the metalworking industry. Wiper geometries changed this relationship with the capability to generate high surface finishes even at higher feed rates.

Seco High Feed Wiper inserts combine the high feed capability and high quality surface finish given by large round inserts and the low cutting forces and flexibility permitted by sharp pointed inserts. This can be achieved by the fact that the main part of the radial cutting force is generated by the main cutting edge. By transferring a small part of the round insert edges into the straight cutting edges of the pointed insert, an insert design adjusted for high feed machining producing superior surface finish is achieved.

General hints

– Use a High Feed Wiper insert to increase the feed without sacrificing surface finish, relative to conventional insert geometries.

– Use a High Feed Wiper insert to eliminate grinding operations. In many cases it is possible to obtain surface finishes and dimensional tolerances previously only possible with a final grinding operation.

Seco has four different types of wiper geometries designed for optimum performance in different applications:

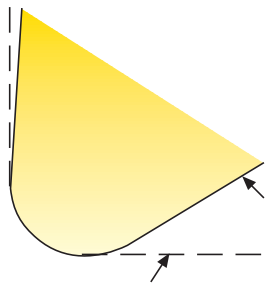
– Conventional wiper	-WZ
– Crossbill™ wiper	-L-WZ and -R-WZ
– Helix™ wiper	-WZN and -WZP
– Long/short wiper	-WL/-WS

Conventional PCBN High Feed Wiper inserts

A conventional High Feed Wiper insert consists of a large radius added to the insert outside the nose radius. This wiper segment is added on both sides of the nose radius, allowing for turning left or right.

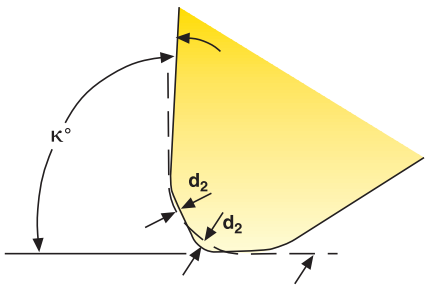
The Seco range of conventional High Feed Wiper products include all commonly used inserts shapes.

Standard insert



Standard insert-profile
(Nominal nose radius)

PCBN High Feed Wiper insert



Standard insert-profile
(Nominal nose radius)

Seco Crossbill™ High Feed Wiper insert

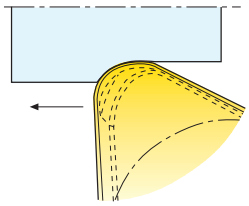
A deviation from the normal radius shape will always occur when a standard wiper geometry is used to machine towards a corner/face.

The Crossbill High Feed Wiper insert gives the opportunity to produce a radius without deviation from the normal shape and without losing the advantages from a standard High Feed Wiper insert.

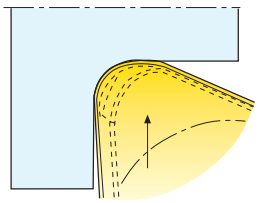
The Seco Crossbill™ High Feed Wiper inserts are available in PCBN grade CBN010 and CBN060K.

Design/Function

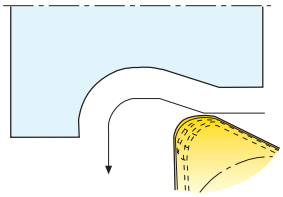
Axial turning (full wiper effect)



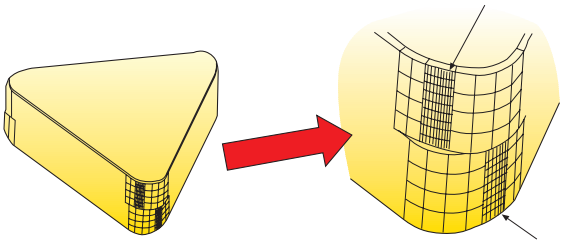
Facing (no wiper effect)



Copying (no deviation forming a radius)



Right-hand version



Wiper segment

Wiper segment

Seco Helix™ High Feed Wiper insert

Our unique patented, Helix™ High Feed Wiper concept is designed for optimization in finish machining. It has a wiper on both sides of the corner radii (as the standard) but the protection chamfer is twisted from negative to positive or from positive to negative depending on the application.

It is available in grade CH0550, CBN060K and CBN010.

Design/Function

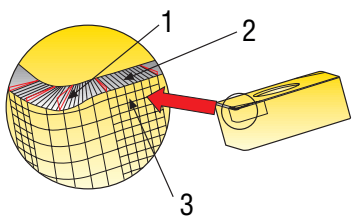
The following considerations apply when selecting the appropriate geometry:

Positive Wiper, WZP

– Reducing vibrations in weak set-ups

– Lower radial cutting forces

– Used where standard wiper cannot be used



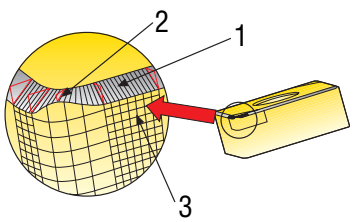
1. Big angle
2. Small angle
3. Wiper section

Negative Wiper, WZN

– Longer tool life

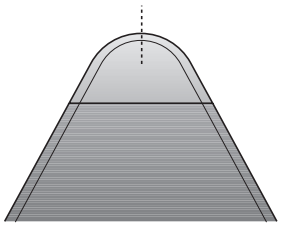
– Reducing vibrations in stable set-ups

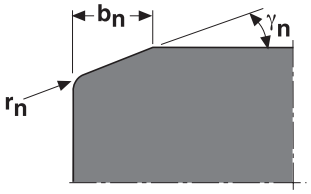
– Increasing compressive stresses



1. Big angle
2. Small angle
3. Wiper section

PCBN – Edge preparation





b_n = Chamfer width
γ_n = Chamfer angle
r_n = Hone radius

Geometry recommendations

Strong cutting edge geometries are always preferred.
– Negative cutting geometry
– Chamfered cutting edge
– Large nose radius

Sharp positive cutting edge geometry can be advantageous when:
– Finishing of small hardened bores without interruptions
– Finishing of unstable components without interruptions
– Finishing of pearlitic grey cast iron

PCBN – Geometry

Edge preparation

E	=	Honed
E25	=	Extra honed, intended for Nickel-based superalloys
S	=	Chamfered and honed
S25	=	Chamfered and extra honed intended for PM material
WZ	=	High Feed (Wiper) geometry
WZP	=	High Feed (Wiper) geometry Positive
WZN	=	High Feed (Wiper) geometry Negative
WL	=	High Feed (Wiper) geometry
WS	=	High Feed (Wiper) geometry

Design

LF	=	Complete top layer (full faced)
B	=	Brazed tips (single sided), Insert geometry C, D and V
C	=	Brazed tips (single sided), Insert geometry T and W
D	=	Brazed tips (single sided), Insert geometry S
U	=	Brazed tips (double sided), Insert geometry C, D and V
V	=	Brazed tips (double sided), Insert geometry T and W

Chamfer size and angle
Solid CBN inserts

CH0550	=	0,15 mm x 25°
CH1050	=	0,15 mm x 25°
CBN060K	=	0,15 mm x 25°
CH2540	=	0,15 mm x 25°
CH2581	=	0,15 mm x 25°
CK2065	=	0,20 mm x 20°
CBN400C	=	0,20 mm x 20°
CBN010	=	0,10 mm x 20°
CBN150	=	0,15 mm x 25°
CBN200	=	0,20 mm x 20°
CBN300	=	0,20 mm x 20°
CBN500	=	0,20 mm x 20°
CBN600	=	0,20 mm x 20°
S-04015	=	0,40 mm x 15°
X-05015	=	0,50 mm x 15°

Chamfer size and angle
Brazed & full faced CBN inserts

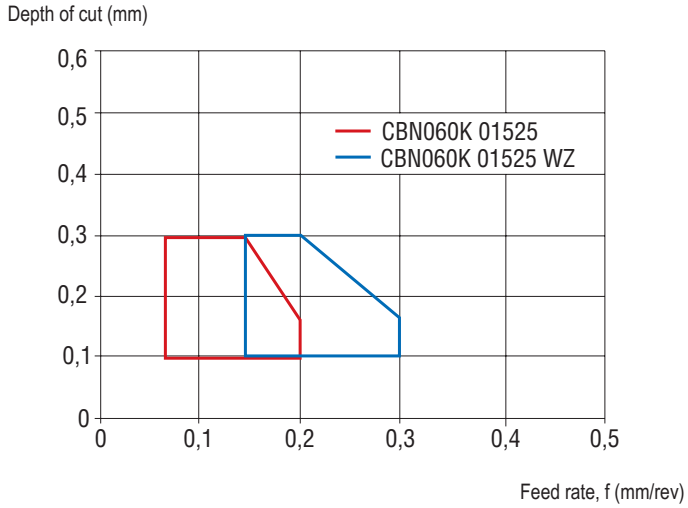
CH0550, CH1050	L1	=	0,15 mm x 25°
CBN060K	L1	=	0,10 mm x 15°
	L1	=	0,15 mm x 25°
	L1	=	0,20 mm x 35°
CH2540, CH2581	L1	=	0,15 mm x 25°
CH3515	L1	=	0,05 mm x 40°
	L1	=	0,20 mm x 20°
	LF	=	0,20 mm x 20°
CBN010	L1	=	0,10 mm x 20°
	L2	=	0,20 mm x 20°
	LF	=	0,10 mm x 20°
	LF-MDT	=	0,10 mm x 25°
CBN200	L1	=	0,20 mm x 20° (L1-WZ = 0,10mm x 20°)
	L2	=	0,20 mm x 20°
	LF	=	0,20 mm x 20°
	LF-MDT	=	0,10 mm x 25°
	X4	=	0,10 mm x 20°
CBN150	L1	=	0,15 mm x 25° (positive C-lock inserts, 0,10 mm x 20°)
	LF	=	0,15 mm x 25°

PCBN Chipbreaker inserts

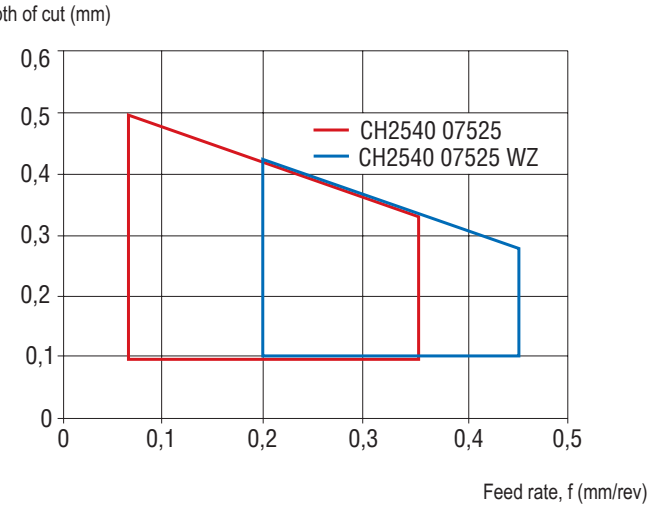
The laser machined chipbreaker comes in two different styles, one for low and one for high feed applications. The non-wiper Secomax™ chipbreaker insert makes it possible to have good chip control when low feed rates are used. The wiper Secomax™ chipbreaker insert provides improved chip control when using high feed rates.

Secomax PCBN, non-wiper and wiper chipbreaker inserts

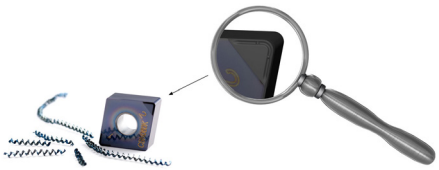
Application area grade CBN060K



Application area grade CH2540



Laser machining provides several benefi ts over conventional production technologies such as grinding. Laser technology meets the highest requirements regarding dimensional accuracy, geometrical precision and surface quality for the machining of complex, three-dimensional geometries. These advantages and possibilities have led to a complex formed chipbreaker with “bumps” that would have been impossible to produce with any other production technology.



Plunge Turning

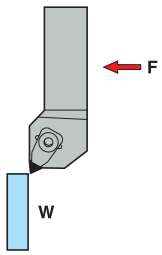
The vast majority of heat treated components in the metalworking industry are machined to their final geometrical form after hardening.

Seco have developed a method in hard turning, the Seco patented Plunge Turning.

The plunging process consists of an orthogonal cut, using the solid CBN010, CBN150, CBN060K, CH0550, CH1050, CH2540, CH2581.

Using the Plunge Turning method gives two great advantages compared to conventional hard turning, reduction in cutting time (up to 90%) and improved surface integrity.

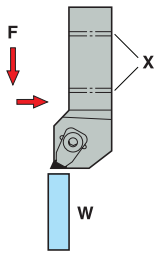
Conventional Turning



F = Feed direction
W = Workpiece

Cutting time 5 seconds

Plunge Turning



F = Feed direction
W = Workpiece
X = Set screws

Cutting time 0,5 seconds

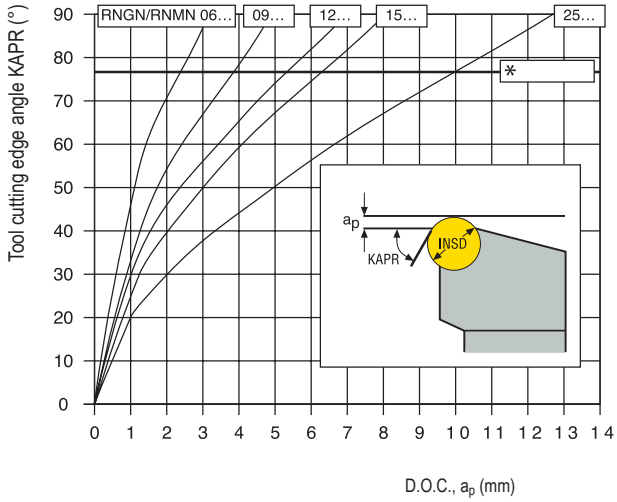
General cutting data recommendation for Plunge Turning is v_c = 200-400 m/min / *656-1312 sfm* and f = 0,04 mm/rev / *0.0016 in/rev*.

To avoid the cutting edge profile affecting surface finish, complete the operation with a small axial movement.

In addition to the introduction of the Plunge Turning method there are also some standard toolholders. These toolholders have set screws which give the possibility to adjust the toolholder to an exact setting angle. The toolholders have a designation ending with – PL, and are available for inserts in sizes T..11 and T..16.

Maximum depth of cut recommendations

Round inserts



* = KAPR limited
The tool cutting edge angle is limited to 75° resulting in maximum depth of cut (a_p).

Max. D.O.C. a_p mm / *inch*	Number of usable cutting edges/side at 80% utilization		
	R...06	R...09	R...12
0,10 / *0.0039*	20	24	–
0,15 / *0.0059*	16	20	23
0,20 / *0.008*	14	17	20
0,25 / *0.010*	12	15	18
0,30 / *0.012*	11	14	16
0,40 / *0.016*	10	12	14
0,50 / *0.020*	8	10	12
0,80 / *0.032*	7	8	10
1,00 / *0.040*	6	7	9
1,20 / *0.047*	5	7	8
1,50 / *0.060*	5	6	7
1,80 / *0.071*	4	5	6
2,00 / *0.080*	4	5	6
2,50 / *0.098*	3	4	5
3,00 / *0.120*	3	4	5
3,50 / *0.140*	–	4	4
4,00 / *0.160*	–	3	4
4,50 / *0.177*	–	–	4
5,00 / *0.200*	–	–	3

Other inserts

Type	Grade	Depth of cut a_p mm / *inch*
L1	CH0550	0,5 / 0.02
	CH1050	0,5 / 0.02
	CBN060K	0,5 / 0.02
	CH2540	0,5 / 0.02
	CH2581	1,0 / 0.04
	CH3515	1,0 / 0.04
	CBN170	0,5 / 0.02
	CBN010	0,5 / 0.02
	CBN150	0,5 / 0.02
	CBN200	1,0 / 0.04
L2	CBN010	0,5 / 0.02
LF	CBN010	0,5 / 0.02
	CBN150	0,5 / 0.02
	CBN200	30% of cutting edge length
	CH3515	30% of cutting edge length
Solid	CH0550	0,5 / 0.02
	CH1050	0,5 / 0.02
	CBN060K	0,5 / 0.02
	CH2540	0,5 / 0.02
	CH2581	1,0 / 0.04
	CBN010	0,5 / 0.02
	CBN150	0,5 / 0.02
	CK2065	30% of cutting edge length
	CBN200	30% of cutting edge length
	CBN300	30% of cutting edge length
	CBN400C	30% of cutting edge length
	CBN500	30% of cutting edge length
	CBN600	30% of cutting edge length



MDT Type	Grade	Max. D.O.C. a_p mm / *inch*
-LF	CBN010	0,5 / 0.02
	CBN170	0,5 / 0.02
	CBN200	0,5 / 0.02
M0-LF	CBN010	1,5 / 0.06
	CBN170	1,5 / 0.06
	CBN200	1,5 / 0.06

True tip length (TTL) in mm / *inch* per nose radius (RE) and tip type

Insert shape	Nose angle	RE = 0,2 / *0.008*		RE = 0,4 / *0.016*		RE = 0,8 / *0.032*		RE = 1,2 / *0.047*		RE = 1,6 / *0.063*		RE = 2,0 / *0.080*	
		L1	L2	L1	L2	L1	L2	L1	L2	L1	L2	L1	L2
C	80°	–	–	2,7 / *0.106*	–	2,4 / *0.094*	–	2,2 / *0.085*	–	–	–	–	–
D	55°	3,5 / *0.140*	–	3,2 / *0.126*	–	2,7 / *0.106*	–	2,2 / *0.085*	–	–	–	–	–
S	90°	–	–	–	–	2,2 / *0.085*	–	–	–	–	–	–	–
T	60°	–	–	2,6 / *0.100*	–	2,2 / *0.085*	–	1,8 / *0.071*	–	1,4 / *0.055*	–	1,8 / *0.071*	–
V	35°	4,4 / *0.173*	–	3,7 / *0.146*	5,1 / *0.201*	2,8 / *0.110*	4,2 / *0.165*	–	–	–	–	–	–
W	80°	–	–	–	–	2,2 / *0.085*	–	1,9 / *0.075*	–	–	–	–	–

MDT size	..-LF	..M0-LF
LC..13..	2,3 / *0.091*	2,4 / *0.094*
LC..1304..	2,4 / *0.094*	2,4 / *0.094*
LC 1603..	2,5 / *0.098*	2,5 / *0.098*
LC 1604..	2,5 / *0.098*	3,1 /*0.122*
LC 1605..	2,8 / *0.110*	3,0 / *0.120*
LC 1606..	3,2 / *0.126*	3,0 / *0.120*



PCBN, SMG

Cast Irons

SMG	Description	Reference	Recommendations
K1	Grey cast irons (GCI)	EN-GJL-250	First choice in dry machining: CBN300. Universal option: CBN600. First choice when coolant is used: CBN200. First choice for finish machining: CBN400C. Adjust the depth of cut to get under the casting skin and blow holes.
K4	Nodular cast irons (SGI)	EN-GJS-500-7	First choice for finish machining: CBN010.

Superalloys and Titanium

SMG	Description	Reference	Recommendations
S1	Iron-based superalloys	Discalloy	First choice for finish machining: CBN010 with E25 edge preparation. Use coolant.
S2	Cobalt-based superalloys	Stellite 21	First choice for finish machining: CBN010 with E25 edge preparation. Use coolant.
S3	Nickel-based superalloys	Inconel 718	PCBN tools can be used on Inconel 718 with following properties. Solution annealed + age hardened Direct age hardened Hardness 32 – 44 Hrc First choice for finish machining: CBN170. Use coolant.

Hard Materials

SMG	Description	Reference	Recommendations
H3	Case-hardened steels	16 MnCr 5 60 HRC	Dry machining is preferable. Coolant can be used. The chips should be fully annealed and brittle. First choice for finish machining: CH0550/CH1050. Universal grade for finish machining: CBN010. For high surface finish requirements, use CBN150/ CH1050. **In interrupted machining:** Moderate interruptions, use CBN060K/CBN010/CH2540. Aggressive interruptions, use CH2581/CH3515/CBN150. Reduce the feed rate. Machine without coolant. If possible, chamfer any sharp edges of the workpiece before machining.
H7	Quenched & Tempered steels Bearing steels	100 Cr 6 60 HRC	Dry machining is preferable. Coolant can be used. The chips should be fully annealed and brittle. First choice for finish machining: CBN060K/CH1050. Universal grade for finish machining: CBN010. For rough machining, use CBN200/CBN300. For high surface finish requirements, use CH1050. **In interrupted machining:** Moderate interruptions, use CBN060K/CBN010/CH2540. Aggressive interruptions, use CH2581/CH3515/CBN150. Reduce the feed rate. Machine without coolant. If possible, chamfer any sharp edges of the workpiece before machining.
H8	Tool steels High Speed Steels (HSS)	X 40 CrMoV 5 1 50 HRC	First choice for finish machining: CBN010. First choice for rough machining: CBN200. Interrupted machining of high speed steels can not be done.
H11	Martensitic stainless steels	X 20 Cr 13 45 HRC	First choice for finish machining: CBN010. First choice for rough machining: CBN300. **In interrupted machining:** Moderate interruptions, use CBN010. Aggressive interruptions, use CH2540/CH3515/CBN150.
H21	Manganese steels	X 120 Mn 12 50 HRC	First choice CBN300. When a tougher grade is needed use CBN500. Use chamfered inserts. Use stable toolholder and rigid clamping of the workpiece. Machine without coolant. Chamfer workpiece edges first.
H31	White cast irons	EN-GJN-HV600(XCr11) 55 HRC	Use CBN500 or when centerlock inserts are used CBN200. Universal option: CBN600. Adjust the depth of cut to get under the casting skin and blow holes. Dry machining is preferable.

Other Difficult Materials

SMG	Description	Reference	Recommendations
PM1	Low-alloy PM-materials	F-0008 Fe-0.7C	PCBN tools can be used on PM parts as soft as 25 HRC. The critical parameter is particle hardness, when the particle hardness exceeds 50 HRC, PCBN is useful, no matter what the bulk hardness is. First choice CBN200. Second choice CH3515. For rough machining CBN300 is an alternative. Use chamfered inserts, S25 edge preparation. Do not use coolant for interrupted cut.
PM2	Medium-alloy PM-materials	FLC-4608 Fe2Cu1.8Ni 0.5Mo0.2Mn0.8C	PCBN tools can be used on PM parts as soft as 25 HRC. The critical parameter is particle hardness, when the particle hardness exceeds 50 HRC, PCBN is useful, no matter what the bulk hardness is. First choice CBN200. Second choice CH3515. For rough machining CBN300 is an alternative. Use chamfered inserts, S25 edge preparation. Do not use coolant for interrupted cut.
PM3	High-alloy PM-materials Exhaust valve seat materials, etc.		First choice CBN150. Second choice CBN010. Use positive inserts. Use chamfered and honed edges for longer tool life. Use honed edges when tight tolerances are required. Machining can be carried out either with or without coolant.
HF1	Hardfacing alloys Welded or plasma-deposited iron-based alloys		Cr-based alloys – Hardness <60 HRC. Co-based alloys – Hardness >35 HRC. Ni-based alloys – Hardness >35 HRC. Fe-based alloys – Hardness >35 HRC. First choice for finish machining: CBN010. First choice for rough machining: CBN500, or when centerlock inserts are used: CBN200. Use round inserts if possible. Use chamfered inserts. Adjust the depth of cut to get under the welding skin and blow holes. Dry machining is preferable. Remove any weld spatter before machining.
HF2	Hardfacing alloys Welded or plasma-deposited cobalt- and nickel-based alloys		Cr-based alloys – Hardness <60 HRC. Co-based alloys – Hardness >35 HRC. Ni-based alloys – Hardness >35 HRC. Fe-based alloys – Hardness >35 HRC. First choice for finish machining: CBN010. First choice for rough machining: CBN500, or when centerlock inserts are used: CBN200. Use round inserts if possible. Use chamfered inserts. Adjust the depth of cut to get under the welding skin and blow holes. Dry machining is preferable. Remove any weld spatter before machining.
CC1	Sintered tungsten carbide	G50	Sintered tungsten carbide with a Co content >17%. **Basic conditions:** Use CBN300. When a tougher grade is needed use CBN500. Use round inserts. Use chamfered inserts. Machining with coolant is preferable. Chamfer the workpiece at entry and exit.

PCBN, Finishing a_p < 0,5 mm / *0.020* Inch

SMG	CH0550		CH1050		CBN060K		CH2540		CH2581		CH3515	
	v_c	f	v_c	f	v_c	f	v_c	f	v_c	f	v_c	f
K1	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —	500 — 1000 *1700 — 3200*	0,10 — 0,60 *0.00394 — 0.0236*
K4	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —
H3	110 — 300 *370 — 980*	0,050 — 0,30 *0.00197 — 0.0118*	110 — 250 *370 — 820*	0,050 — 0,35 *0.00197 — 0.0137*	110 — 250 *370 — 820*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 230 *400 — 750*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 230 *400 — 750*	0,050 — 0,35 *0.00197 — 0.0137*	91 — 200 *300 — 650*	0,050 — 0,35 *0.00197 — 0.0137*
H5	110 — 250 *370 — 820*	0,050 — 0,30 *0.00197 — 0.0118*	110 — 220 *370 — 720*	0,050 — 0,35 *0.00197 — 0.0137*	110 — 220 *370 — 720*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 200 *400 — 650*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 200 *400 — 650*	0,050 — 0,35 *0.00197 — 0.0137*	91 — 180 *300 — 590*	0,050 — 0,35 *0.00197 — 0.0137*
H7	110 — 230 *370 — 750*	0,050 — 0,30 *0.00197 — 0.0118*	110 — 200 *370 — 650*	0,050 — 0,35 *0.00197 — 0.0137*	110 — 200 *370 — 650*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 180 *400 — 590*	0,050 — 0,35 *0.00197 — 0.0137*	120 — 180 *400 — 590*	0,050 — 0,35 *0.00197 — 0.0137*	91 — 170 *300 — 550*	0,050 — 0,35 *0.00197 — 0.0137*
H8	91 — 180 *300 — 590*	0,050 — 0,30 *0.00197 — 0.0118*	81 — 170 *270 — 550*	0,050 — 0,35 *0.00197 — 0.0137*	81 — 170 *270 — 550*	0,050 — 0,35 *0.00197 — 0.0137*	91 — 160 *300 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	91 — 160 *300 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	71 — 150 *240 — 490*	0,050 — 0,35 *0.00197 — 0.0137*
H11	81 — 170 *270 — 550*	0,050 — 0,30 *0.00197 — 0.0118*	71 — 160 *240 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	71 — 160 *240 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	81 — 150 *270 — 490*	0,050 — 0,35 *0.00197 — 0.0137*	81 — 150 *270 — 490*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —
PM1	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —	100 — 250 *330 — 820*	0,050 — 0,30 *0.00197 — 0.0118*
PM2	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —	100 — 220 *330 — 720*	0,050 — 0,30 *0.00197 — 0.0118*
PM3	100 — 170 *330 — 550*	0,050 — 0,15 *0.00197 — 0.00590*	— —	— —	— —	— —	— —	— —	— —	— —	— —	— —
HF1	— —	— —	— —	— —	— —	— —	50 — 150 *170 — 490*	0,050 — 0,20 *0.00197 — 0.00787*	50 — 150 *170 — 490*	0,050 — 0,20 *0.00197 — 0.00787*	— —	— —
HF2	— —	— —	— —	— —	— —	— —	100 — 200 *330 — 650*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 200 *330 — 650*	0,050 — 0,20 *0.00197 — 0.00787*	— —	— —

PCBN, Finishing a_p < 0,5 mm / *0.020* Inch

SMG	CBN010		CBN150		CBN170		CBN200	
	v_c	f	v_c	f	v_c	f	v_c	f
K1	— —	— —	— —	— —	— —	— —	500 — 1000 *1700 — 3200*	0,10 — 0,60 *0.00394 — 0.0236*
K4	140 — 240 *460 — 780*	0,050 — 0,20 *0.00197 — 0.00787*	140 — 240 *460 — 780*	0,050 — 0,20 *0.00197 — 0.00787*	— —	— —	— —	— —
S1	70 — 140 *230 — 450*	0,050 — 0,30 *0.00197 — 0.0118*	— —	— —	120 — 220 *400 — 720*	0,050 — 0,25 *0.00197 — 0.00984*	— —	— —
S2	— —	— —	— —	— —	— —	— —	40 — 60 *140 — 190*	0,050 — 0,15 *0.00197 — 0.00590*
S3	100 — 240 *330 — 780*	0,050 — 0,25 *0.00197 — 0.00984*	— —	— —	120 — 280 *400 — 910*	0,050 — 0,25 *0.00197 — 0.00984*	— —	— —
H3	80 — 200 *270 — 650*	0,050 — 0,35 *0.00197 — 0.0137*	70 — 180 *230 — 590*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —	— —	— —
H5	80 — 190 *270 — 620*	0,050 — 0,35 *0.00197 — 0.0137*	70 — 170 *230 — 550*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —	— —	— —
H7	80 — 180 *270 — 590*	0,050 — 0,35 *0.00197 — 0.0137*	70 — 160 *230 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —	— —	— —
H8	70 — 170 *230 — 550*	0,050 — 0,35 *0.00197 — 0.0137*	60 — 150 *200 — 490*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —	— —	— —
H11	70 — 160 *230 — 520*	0,050 — 0,35 *0.00197 — 0.0137*	60 — 140 *200 — 450*	0,050 — 0,35 *0.00197 — 0.0137*	— —	— —	— —	— —
PM1	— —	— —	— —	— —	— —	— —	100 — 220 *330 — 720*	0,050 — 0,30 *0.00197 — 0.0118*
PM2	— —	— —	— —	— —	— —	— —	90 — 200 *300 — 650*	0,050 — 0,30 *0.00197 — 0.0118*
PM3	80 — 170 *270 — 550*	0,050 — 0,15 *0.00197 — 0.00590*	80 — 150 *270 — 490*	0,050 — 0,15 *0.00197 — 0.00590*	— —	— —	— —	— —
HF1	50 — 150 *170 — 490*	0,050 — 0,25 *0.00197 — 0.00984*	50 — 130 *170 — 420*	0,050 — 0,25 *0.00197 — 0.00984*	— —	— —	100 — 170 *330 — 550*	0,050 — 0,30 *0.00197 — 0.0118*
HF2	60 — 190 *200 — 620*	0,050 — 0,25 *0.00197 — 0.00984*	60 — 170 *200 — 550*	0,050 — 0,25 *0.00197 — 0.00984*	— —	— —	170 — 250 *560 — 820*	0,050 — 0,30 *0.00197 — 0.0118*

PCBN, Finishing a_p < 0,5 mm / *0.020* Inch

SMG	CBN300		CBN400C		CBN500		CBN600		CK2065	
	v_c	f	v_c	f	v_c	f	v_c	f	v_c	f
K1	500 — 1700 *1700 — 5500*	0,10 — 0,60 *0.00394 — 0.0236*	500 — 1800 *1700 — 5900*	0,10 — 0,60 *0.00394 — 0.0236*	500 — 1500 *1700 — 4900*	0,10 — 0,60 *0.00394 — 0.0236*	500 — 1300 *1700 — 4200*	0,10 — 0,60 *0.00394 — 0.0236*	500 — 1700 *1700 — 5500*	0,10 — 0,60 *0.00394 — 0.0236*
H21	130 — 250 *430 — 820*	0,10 — 0,60 *0.00394 — 0.0236*	— —	— —	150 — 270 *500 — 880*	0,10 — 0,60 *0.00394 — 0.0236*	120 — 220 *400 — 720*	0,10 — 0,60 *0.00394 — 0.0236*	130 — 250 *430 — 820*	0,10 — 0,60 *0.00394 — 0.0236*
H31	80 — 200 *270 — 650*	0,10 — 0,60 *0.00394 — 0.0236*	— —	— —	80 — 220 *270 — 720*	0,10 — 0,60 *0.00394 — 0.0236*	80 — 180 *270 — 590*	0,10 — 0,60 *0.00394 — 0.0236*	80 — 200 *270 — 650*	0,10 — 0,60 *0.00394 — 0.0236*
HF1	— —	— —	— —	— —	100 — 220 *330 — 720*	0,050 — 0,30 *0.00197 — 0.0118*	— —	— —	— —	— —
HF2	— —	— —	— —	— —	170 — 270 *560 — 880*	0,050 — 0,30 *0.00197 — 0.0118*	— —	— —	— —	— —
CC1	20 — 40 *66 — 130*	0,050 — 0,20 *0.00197* *— 0.00787*	— —	— —	— —	— —	20 — 40 *66 — 130*	0,050 — 0,20 *0.00197* *— 0.00787*	20 — 40 *66 — 130*	0,050 — 0,20 *0.00197* *— 0.00787*

PCBN, Roughing a_p 0,5 – 3,0 mm / *0.020 – 0.120* Inch

SMG	CBN200		CBN300		CBN500		CBN600		CK2065	
	v_c	f	v_c	f	v_c	f	v_c	f	v_c	f
K1	500 — 1000 *1700 — 3200*	0,20 — 0,65 *0.00788 — 0.0255*	500 — 1500 *1700 — 4900*	0,20 — 0,70 *0.00788 — 0.0275*	500 — 1200 *1700 — 3900*	0,20 — 0,70 *0.00788 — 0.0275*	500 — 1200 *1700 — 3900*	0,20 — 0,70 *0.00788 — 0.0275*	500 — 1500 *1700 — 4900*	0,20 — 0,70 *0.00788 — 0.0275*
H7	70 — 150 *230 — 490*	0,10 — 0,50 *0.00394 — 0.0196*	90 — 180 *300 — 590*	0,10 — 0,50 *0.00394 — 0.0196*	90 — 180 *300 — 590*	0,10 — 0,60 *0.00394 — 0.0236*	70 — 150 *230 — 490*	0,10 — 0,55 *0.00394 — 0.0216*	90 — 180 *300 — 590*	0,10 — 0,50 *0.00394 — 0.0196*
H8	50 — 130 *170 — 420*	0,10 — 0,50 *0.00394 — 0.0196*	90 — 180 *300 — 590*	0,10 — 0,50 *0.00394 — 0.0196*	50 — 150 *170 — 490*	0,10 — 0,60 *0.00394 — 0.0236*	50 — 130 *170 — 420*	0,10 — 0,55 *0.00394 — 0.0216*	90 — 180 *300 — 590*	0,10 — 0,50 *0.00394 — 0.0196*
H21	— —	— —	130 — 230 *430 — 750*	0,10 — 0,60 *0.00394 — 0.0236*	150 — 250 *500 — 820*	0,10 — 0,60 *0.00394 — 0.0236*	120 — 200 *400 — 650*	0,10 — 0,60 *0.00394 — 0.0236*	130 — 230 *430 — 750*	0,10 — 0,60 *0.00394 — 0.0236*
H31	— —	— —	80 — 180 *270 — 590*	0,10 — 0,60 *0.00394 — 0.0236*	80 — 200 *270 — 650*	0,10 — 0,60 *0.00394 — 0.0236*	80 — 160 *270 — 520*	0,10 — 0,60 *0.00394 — 0.0236*	80 — 180 *270 — 590*	0,10 — 0,60 *0.00394 — 0.0236*
PM1	100 — 200 *330 — 650*	0,10 — 0,30 *0.00394 — 0.0118*	100 — 220 *330 — 720*	0,10 — 0,30 *0.00394 — 0.0118*	— —	— —	100 — 220 *330 — 720*	0,10 — 0,30 *0.00394 — 0.0118*	100 — 220 *330 — 720*	0,10 — 0,30 *0.00394 — 0.0118*
PM2	90 — 180 *300 — 590*	0,10 — 0,30 *0.00394 — 0.0118*	100 — 200 *330 — 650*	0,10 — 0,30 *0.00394 — 0.0118*	— —	— —	100 — 200 *330 — 650*	0,10 — 0,30 *0.00394 — 0.0118*	100 — 200 *330 — 650*	0,10 — 0,30 *0.00394 — 0.0118*
HF1	100 — 150 *330 — 490*	0,10 — 0,30 *0.00394 — 0.0118*	— —	— —	100 — 200 *330 — 650*	0,10 — 0,60 *0.00394 — 0.0236*	— —	— —	— —	— —
HF2	170 — 230 *560 — 750*	0,10 — 0,30 *0.00394 — 0.0118*	— —	— —	170 — 250 *560 — 820*	0,10 — 0,60 *0.00394 — 0.0236*	— —	— —	— —	— —
CC1	— —	— —	20 — 30 *66 — 98*	0,050 — 0,20 *0.00197* *— 0.00787*	— —	— —	20 — 30 *66 — 98*	0,050 — 0,20 *0.00197* *— 0.00787*	20 — 30 *66 — 98*	0,050 — 0,20 *0.00197* *— 0.00787*

PCBN, Plunging

SMG	CH0550		CBN060K		CH2540		CBN010	
	v_c	f	v_c	f	v_c	f	v_c	f
K1	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
H3	180 — 330 *600 — 1000*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 300 *560 — 980*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 280 *560 — 910*	0,0300 — 0,13 *0.00119 — 0.0051*	160 — 320 *530 — 1000*	0,0300 — 0,13 *0.00119 — 0.0051*
H5	180 — 310 *600 — 1000*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 280 *560 — 910*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 260 *560 — 850*	0,0300 — 0,13 *0.00119 — 0.0051*	160 — 300 *530 — 980*	0,0300 — 0,13 *0.00119 — 0.0051*
H7	180 — 280 *600 — 910*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 260 *560 — 850*	0,0300 — 0,13 *0.00119 — 0.0051*	170 — 240 *560 — 780*	0,0300 — 0,13 *0.00119 — 0.0051*	160 — 370 *530 — 1200*	0,0300 — 0,13 *0.00119 — 0.0051*
H8	150 — 200 *500 — 650*	0,0300 — 0,13 *0.00119 — 0.0051*	140 — 230 *460 — 750*	0,0300 — 0,13 *0.00119 — 0.0051*	140 — 210 *460 — 680*	0,0300 — 0,13 *0.00119 — 0.0051*	130 — 200 *430 — 650*	0,0300 — 0,13 *0.00119 — 0.0051*
H11	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
H21	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
H31	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
PM1	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
PM2	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
PM3	130 — 260 *430 — 850*	0,0300 — 0,13 *0.00119 — 0.0051*	—	—	—	—	110 — 230 *370 — 750*	0,0300 — 0,13 *0.00119 — 0.0051*
	—	—	—	—	—	—	—	—
HF1	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
HF2	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—
CC1	—	—	—	—	—	—	—	—
	—	—	—	—	—	—	—	—

PCBN, Plunging

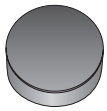
SMG	CBN200	
	v_c	f
K1	—	—
	—	—
S1	—	—
	—	—
S2	—	—
	—	—
S3	—	—
	—	—
H3	—	—
	—	—
H5	—	—
	—	—
H7	—	—
	—	—
H8	—	—
	—	—
H11	—	—
	—	—
H21	—	—
	—	—
H31	—	—
	—	—
PM1	200 — 350 *660 — 1100*	0,0300 — 0,13 *0.00119 — 0.0051*
PM2	150 — 300 *500 — 980*	0,0300 — 0,13 *0.00119 — 0.0051*
PM3	—	—
	—	—
HF1	—	—
	—	—
HF2	—	—
	—	—
CC1	—	—
	—	—

PCBN, Grooving

SMG	CBN010		CBN170		CBN200	
	v_c	f	v_c	f	v_c	f
K1	— —	— —	— —	— —	500 — 1000 *1700 — 3200*	0,0300 — 0,15 *0.00119 — 0.00590*
S1	70 — 140 *230 — 450*	0,0300 — 0,15 *0.00119 — 0.00590*	120 — 220 *400 — 720*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —
S2	— —	— —	— —	— —	40 — 60 *140 — 190*	0,0300 — 0,15 *0.00119 — 0.00590*
S3	100 — 240 *330 — 780*	0,0300 — 0,15 *0.00119 — 0.00590*	120 — 280 *400 — 910*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —
H3	80 — 200 *270 — 650*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —	— —	— —
H5	80 — 190 *270 — 620*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —	— —	— —
H7	80 — 180 *270 — 590*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —	— —	— —
H8	70 — 170 *230 — 550*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —	— —	— —
H11	70 — 160 *230 — 520*	0,0300 — 0,15 *0.00119 — 0.00590*	— —	— —	— —	— —
H21	— —	— —	— —	— —	— —	— —
H31	— —	— —	— —	— —	80 — 220 *270 — 720*	0,0300 — 0,15 *0.00119 — 0.00590*
PM1	— —	— —	— —	— —	100 — 180 *330 — 590*	0,0300 — 0,15 *0.00119 — 0.00590*
PM2	— —	— —	— —	— —	90 — 160 *300 — 520*	0,0300 — 0,15 *0.00119 — 0.00590*
PM3	— —	— —	— —	— —	— —	— —
HF1	— —	— —	— —	— —	100 — 170 *330 — 550*	0,0300 — 0,15 *0.00119 — 0.00590*
HF2	— —	— —	— —	— —	170 — 250 *560 — 820*	0,0300 — 0,15 *0.00119 — 0.00590*

Selection of insert format – PCD

Sintered layer -LF

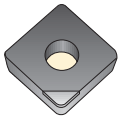


PCD sintered on carbide.
All cutting edges on one side are usable.

Grade:
PCD30

Toolholder style:
C

Brazed tip insert -L1



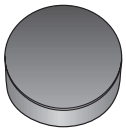
PCD brazed on to standard carbide inserts.

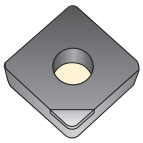
Grades:
PCD20, PCD30

Toolholder styles:
D, P, M and C

PCD grades, uncoated

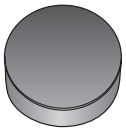
PCD20





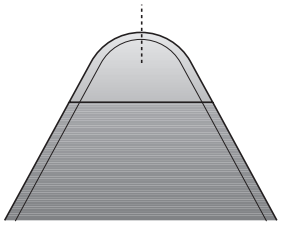
Format:
Full-face sintered layer and brazed tips (single sided).
Composition:
Grade with an average grain size of 10 µm and a Co binder.
Coating:
No coating.

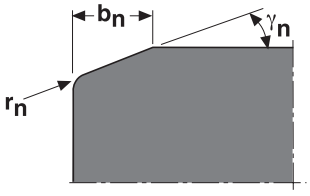
PCD30



Format:
Full-face sintered layer (single sided).
Composition:
Grade with an average grain size of 25 µm and a Co binder.
Coating:
No coating.

PCD – Edge preparation





b_n = Chamfer width
γ_n = Chamfer angle
r_n = Hone radius

Geometry recommendations	Edge preparation
A sharp cutting edge is always recommended.	F = Sharp cutting edge

PCD, SMG

Non Ferrous Metals

SMG	Description	Reference	Recommendations
N1	Aluminium alloys, Si < 9%	AW-7075	
N2	Aluminium alloys, 9% < Si < 16%	AC-44200 Si = 12%	
N3	Aluminium alloys, Si >16%	AlSi17Cu5	
N11	Copper alloys	CW614N	

Other Difficult Materials

SMG	Description	Reference	Recommendations
CC1	Sintered tungsten carbide	G50	Sintered tungsten carbide with a Co content >17%. **Basic conditions:** Use CBN300. When a tougher grade is needed use CBN500. Use round inserts. Use chamfered inserts. Machining with coolant is preferable. Chamfer the workpiece at entry and exit.

Plastics and Composites

SMG	Description	Reference	Recommendations
TS1	Thermosetting polymers	Urea formaldehyde (UF)	
TS2	Thermosetting carbon-fibre composites	T300 T700 T800 HTA-S IMA - Epoxy (M21)...	
TS3	Thermosetting glass-fibre composites	Epoxy - HX..(42..)/E glass (7781...)...	
TS4	Thermosetting aramide-fibre composites	Kevlar 49	
TP1	Thermoplastic polymers	Polycarbonate (PC)	
TP2	Thermoplastic carbon-fibre composites	PPS/PEEK - T300..	
TP3	Thermoplastic glass-fibre composites	PPS/PEEK - E-glass or A-glass...	
TP4	Thermoplastic aramide-fibre composites		

Graphites

SMG	Description	Reference	Recommendations
GR1	Graphite	R 8500	

PCD, Roughing a_p 0,5 – 3,0 mm / *0.020 – 0.120* Inch

SMG	PCD20		PCD30		PCD30M	
	v_c	f	v_c	f	v_c	f
N1	600 — 3500 *2000 — 11400*	0,050 — 0,30 *0.00197 — 0.0118*	— —	— —	— —	— —
N2	450 — 2500 *1500 — 8200*	0,050 — 0,20 *0.00197 — 0.00787*	— —	— —	— —	— —
N3	300 — 1000 *990 — 3200*	0,050 — 0,10 *0.00197 — 0.00393*	300 — 1000 *990 — 3200*	0,10 — 0,40 *0.00394 — 0.0157*	300 — 1000 *990 — 3200*	0,10 — 0,40 *0.00394 — 0.0157*
N11	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*
TS1	100 — 1500 *330 — 4900*	0,10 — 0,40 *0.00394 — 0.0157*	— —	— —	— —	— —
TS2	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TS3	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*
TS4	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TP1	100 — 1500 *330 — 4900*	0,10 — 0,40 *0.00394 — 0.0157*	— —	— —	— —	— —
TP2	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TP3	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*
TP4	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
GR1	100 — 1500 *330 — 4900*	0,10 — 0,20 *0.00394 — 0.00787*	— —	— —	— —	— —

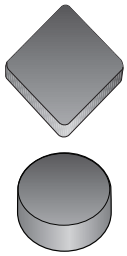
PCD, Finishing a_p < 0,5 mm / *0.020* Inch

SMG	PCD20		PCD30		PCD30M	
	v_c	f	v_c	f	v_c	f
N1	600 — 3500 *2000 — 11400*	0,050 — 0,30 *0.00197 — 0.0118*	— —	— —	— —	— —
N2	450 — 2500 *1500 — 8200*	0,050 — 0,20 *0.00197 — 0.00787*	— —	— —	— —	— —
N3	300 — 1000 *990 — 3200*	0,050 — 0,10 *0.00197 — 0.00393*	300 — 1000 *990 — 3200*	0,10 — 0,40 *0.00394 — 0.0157*	300 — 1000 *990 — 3200*	0,10 — 0,40 *0.00394 — 0.0157*
N11	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*	600 — 1200 *2000 — 3900*	0,10 — 0,50 *0.00394 — 0.0196*
CC1	— —	— —	10 — 20 *33 — 65*	0,050 — 0,15 *0.00197 — 0.00590*	10 — 20 *33 — 65*	0,050 — 0,15 *0.00197 — 0.00590*
TS1	100 — 1500 *330 — 4900*	0,10 — 0,40 *0.00394 — 0.0157*	— —	— —	— —	— —
TS2	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TS3	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*
TS4	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TP1	100 — 1500 *330 — 4900*	0,10 — 0,40 *0.00394 — 0.0157*	— —	— —	— —	— —
TP2	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
TP3	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*	100 — 800 *330 — 2600*	0,050 — 0,20 *0.00197 — 0.00787*
TP4	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*	400 — 800 *1400 — 2600*	0,10 — 0,20 *0.00394 — 0.00787*
GR1	100 — 1500 *330 — 4900*	0,10 — 0,20 *0.00394 — 0.00787*	— —	— —	— —	— —

Selection of insert format – Ceramic

Ceramic inserts are only available in solid format.

Solid insert

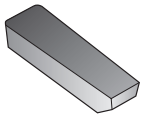


According to the geometry, two sides can be used.

Grade:
CS100, CS250, CS300, CW100

Toolholder style:
C

Solid insert



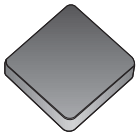
According to the geometry, one edge can be used.

Grade:
CW100

Toolholder style:
CFxx

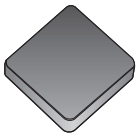
Ceramic grades, uncoated

CS100



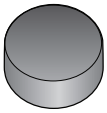
Format:
Solid.
Composition:
Sialon (Si, Al, O, N) ceramic grade.
Coating:
No coating.

CS250



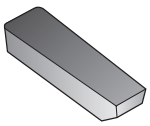
Format:
Solid.
Composition:
Sialon (Si, Al, O, N) ceramic grade.
Coating:
No coating.

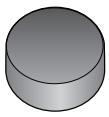
CS300



Format:
Solid.
Composition:
Sialon (Si, Al, O, N) ceramic grade.
Coating:
No coating.

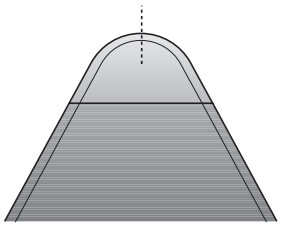
CW100

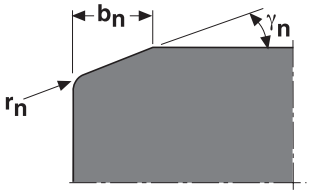




Format:
Solid.
Composition:
Aluminium oxide (Al_2O_3) + SiC-whisker reinforced ceramic grade.
Coating:
No coating.

Ceramics – Edge peparation





b_n = Chamfer width
γ_n = Chamfer angle
r_n = Hone radius

Geometry recommendations	Edge preparation	Chamfer size and angle
Strong cutting edge geometries are always preferred.	S = Chamfered and honed	CS100 = T or S = 0,10 mm x 20°
– Negative cutting geometry	T = Chamfered, no honing	CS250 = T or S = 0,10 mm x 20°
– Chamfered cutting edge	E = Honed	CS300 = T = 0,10 mm x 20°
– Large nose radius		CW100 = Honed or T = 0,10 mm x 20°

Ceramics, SMG

Superalloys

SMG	Description	Reference	Recommendations
S1	Iron-based superalloys	Discalloy	First choice for finish machining: CBN010 with E25 edge preparation. Use coolant.
S2	Cobalt-based superalloys	Stellite 21	First choice for finish machining: CBN010 with E25 edge preparation. Use coolant.
S3	Nickel-based superalloys	Inconel 718	PCBN tools can be used on Inconel 718 with following properties. Solution annealed + age hardened Direct age hardened Hardness 32 – 44 Hrc First choice for finish machining: CBN170. Use coolant.

Ceramic, Roughing a_p 0,5 – 3,0 mm / *0.020 – 0.120* Inch – Cutting data and application area for CS100 is also applicable for CS300

SMG	CS100		CW100	
	v_c	f	v_c	f
S1	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*
S2	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*
S3	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*	150 — 300 *500 — 980*	0,10 — 0,40 *0.00394 — 0.0157*

Ceramic, Grooving

SMG	CW100	
	v_c	f
S1	150 — 300 *500 — 980*	0,050 — 0,10 *0.00197 — 0.00393*
S2	150 — 300 *500 — 980*	0,050 — 0,10 *0.00197 — 0.00393*
S3	150 — 300 *500 — 980*	0,050 — 0,10 *0.00197 — 0.00393*



General ISO Turning holders for general turning machining

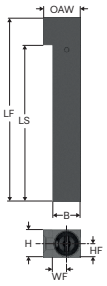
Seco offers a wide product range of ISO Turning holders. Jetstream Tooling® toolholders deliver coolant effectively through the toolholder to the optimum position close to the cutting edge. This improves chip control by lifting the chip away from the rake face and reducing the heat load, enabling longer tool life and drastically increasing cutting data to be applied. A comprehensive range of insert types, shapes and sizes are available.

- D Toolholder, first choice for stable clamping in general machining
- P Toolholder, complement reliable clamping in general machining e.g. more chip space required
- C Toolholder, designed mainly for SECO PCBN and Ceramic inserts without hole
- S Toolholder, first choice mainly for smaller inserts in general machining
- M Toolholder, strong double security clamping ideal for larger insert in general machining

Toolholders for QC-heads – Metric



N..F-QC



—Neutral version shown
—For QC heads program, see page(s) 154-162
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	H	B	OAW	WF	HF	LF	LS	Weight
			mm	mm	mm	mm	mm	mm	mm	kg
N1012F-QC12	10125184	QC12	10	12	16,0	6,0	5,0	80,0	68,0	0,1
N1212F-QC12	03280750	QC12	12	12	16,0	6,0	6,0	80,0	68,0	0,1

Spare Parts, included in delivery

For	Locking screw	Plug
		
N1010/N1212	LSQ6065-T15P	JET-M8X1.0
N1012	LSQ6065-T15P	JET-M8X1.0

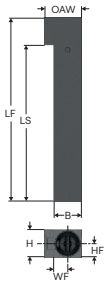
Accessories

For	Coolant adapter	Insert clamping torque	Replacement blade	Torque key
				
N1010/N1212	JET-ADM8-1.0	4.0NM	T00-15P	T00-15P40
N1012	JET-ADM8-1.0	4.0NM	T00-15P	T00-15P40

Toolholders for QC-heads – Metric/ Inch



N..F-QC



—Neutral version shown
—For QC heads program, see page(s) 154-162
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—This metric denomination corresponds to a N065F-QC16 or ANSI size 10 shank
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	H	B	OAW	WF	HF	LF	LS	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*
N1616F-QC16	03280751	QC16	16 *0.630*	16 *0.630*	18,0 *0.709*	8,0 *0.315*	8,0 *0.315*	80,0 *3.150*	68,0 *2.677*	0,2 *0.440*

Spare Parts, included in delivery

For	Locking screw	Plug
		
N1616F-QC16	LSQ6065-T15P	JET-P1/8-5MM

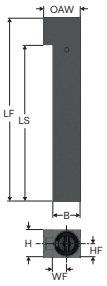
Accessories

For	Insert clamping torque	Replacement blade	Torque key
			
N1616F-QC16	4.0NM	T00-15P	T00-15P40

Toolholders for QC-heads – Inch



N..F-QC



—Neutral version shown
—For QC heads program, see page(s) 154-162
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	H	B	OAW	WF	HF	LF	LS	Weight
			inch	inch	inch	inch	inch	inch	inch	lbs
N0472-0375F-QC12	10125245	QC12	0.375	0.472	0.630	0.236	0.187	3.150	2.677	0.220
N050F-QC12	03280753	QC12	0.500	0.486	0.644	0.236	0.264	3.150	2.677	0.220

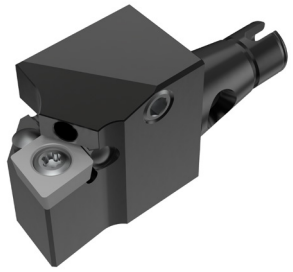
Spare Parts, included in delivery

For	Locking screw	Plug
		
N0375F/N050F	LSQ6065-T15P	JET-M8X1.0
N0472	LSQ6065-T15P	JET-UNF5/16

Accessories

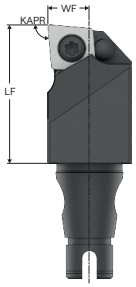
For	Coolant adapter	Insert clamping torque	Replacement blade	Torque key
				
N0375F/N050F	JET-ADM8-1.0	4.0NM	T00-15P	T00-15P40
N0472	JET-ADM8-1.0	4.0NM	T00-15P	T00-15P40

QC-SCLCR/L-JET – ISO Turning, QC-heads for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch

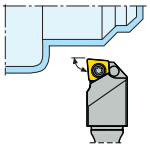


QC-SCLCR/L-JET





KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 618
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	WF	LF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
QC12-SCLCR-06JET	03280836	QC12	–	6,0 *0.234*	20 *0.787*	6,0 *0.235*	200,0 bar *2900,8*	95,0	0,0	0,0	0,3 *0.660*	CC..0602.. *CC..21.5.*
QC12-SCLCL-06JET	03280839	QC12	–	6,0 *0.234*	20 *0.787*	6,0 *0.235*	200,0 bar *2900,8*	95,0	0,0	0,0	0,3 *0.660*	CC..0602.. *CC..21.5.*
QC12-SCLCR-09JET	03280754	QC12	–	6,0 *0.234*	22 *0.866*	6,0 *0.235*	200,0 bar *2900,8*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
QC12-SCLCL-09JET	03280755	QC12	–	6,0 *0.234*	22 *0.866*	6,0 *0.235*	200,0 bar *2900,8*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
QC16-SCLCR-09JET	03280756	QC16	Yes	8,0 *0.313*	24 *0.945*	7,9 *0.311*	200,0 bar *2900,8*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
QC16-SCLCL-09JET	03280757	QC16	Yes	8,0 *0.313*	24 *0.945*	7,9 *0.311*	200,0 bar *2900,8*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*

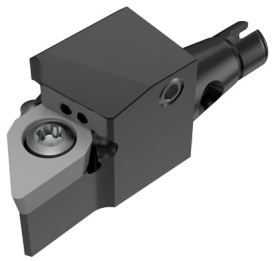
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-06	1/4HEX-T07PX50	C02506-T07P
..-09	1/4HEX-T15PX50	C04008-T15P

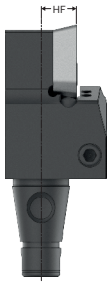
Accessories

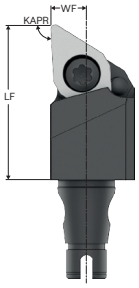
For	Bit holder	Insert clamping torque	Mounting fixture	Torque key
				
..-06	1/4HEX-S-HANDLE	0.9NM	SECO-MF7075-QC	T00-07P09
..-09	1/4HEX-S-HANDLE	3.5NM	SECO-MF7075-QC	T00-15P35

QC-SDJCR/L-JET – ISO Turning, QC-heads for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

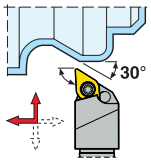


QC-SDJCR/L-JET





KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	WF	LF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
QC12-SDJCR-07JET	03280758	QC12	–	6,0 *0.234*	22 *0.866*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	DC..0702.. *DC..21.5.*
QC12-SDJCL-07JET	03280759	QC12	–	6,0 *0.234*	22 *0.866*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	DC..0702.. *DC..21.5.*
QC12-SDJCR-11JET	03280760	QC12	–	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
QC12-SDJCL-11JET	03280761	QC12	–	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
QC16-SDJCR-11JET	03280762	QC16	Yes	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
QC16-SDJCL-11JET	03280763	QC16	Yes	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*

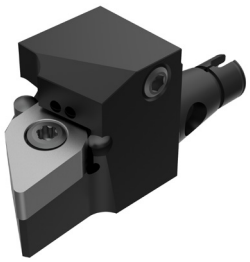
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-07	1/4HEX-T07PX50	C02506-T07P
..-11	1/4HEX-T15PX50	C04008-T15P

Accessories

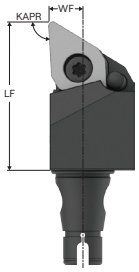
For	Bit holder	Insert clamping torque	Mounting fixture	Torque key
				
..-07	1/4HEX-S-HANDLE	0.9NM	SECO-MF7075-QC	T00-07P09
..-11	1/4HEX-S-HANDLE	3.5NM	SECO-MF7075-QC	T00-15P35

QC-SDJNR/L-JET – ISO Turning, QC-heads for inserts DNMU – Metric/ Inch

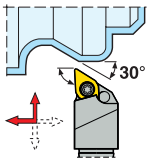


QC-SDJNR/L-JET





KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	WF	LF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
QC12-SDJNR-11JET	10050648	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	-6,0	-6,0	0,1 *0.220*	DNMU1104.. *DNMU33.*
QC12-SDJNL-11JET	10050647	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	-6,0	-6,0	0,1 *0.220*	DNMU1104.. *DNMU33.*
QC16-SDJNR-11JET	10050652	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	-6,0	-6,0	0,1 *0.220*	DNMU1104.. *DNMU33.*
QC16-SDJNL-11JET	10050651	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	-6,0	-6,0	0,1 *0.220*	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-11	1/4HEX-T09PX50	C03511-T09P

Accessories

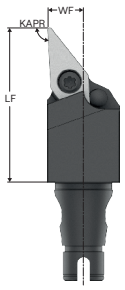
For	Bit holder	Insert clamping torque	Mounting fixture	Torque key
				
..-11	1/4HEX-S-HANDLE	2.0NM	SECO-MF7075-QC	T00-09P20

QC-SVJBR/L-JET – ISO Turning, QC-heads for inserts VBGT, VBMT – Metric/ Inch

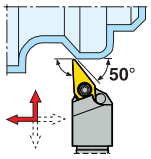


QC-SVJBR/L-JET





KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 613, 621
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	WF	LF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
QC12-SVJBR-11JET	03280764	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VB..1102.. *VB..21.5.*
QC12-SVJBL-11JET	03280765	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VB..1102.. *VB..21.5.*
QC16-SVJBR-11JET	03280766	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VB..1102.. *VB..21.5.*
QC16-SVJBL-11JET	03280767	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VB..1102.. *VB..21.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-11	1/4HEX-T07PX50	C02506-T07P

Accessories

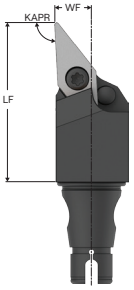
For	Bit holder	Insert clamping torque	Mounting fixture	Torque key
				
..-11	1/4HEX-S-HANDLE	0.9NM	SECO-MF7075-QC	T00-07P09

QC-SVJCR/L-JET – ISO Turning, QC-heads for inserts VCGT – Metric/ Inch

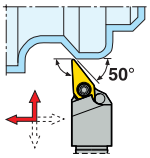


QC-SVJCR/L-JET





KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 584
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	WF	LF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
QC12-SVJCR-11JET	10050650	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VC..1103.. *VC..22.*
QC12-SVJCL-11JET	10050649	QC12	6,0 *0.234*	26 *1.024*	6,0 *0.235*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VC..1103.. *VC..22.*
QC16-SVJCR-11JET	10050654	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VC..1103.. *VC..22.*
QC16-SVJCL-11JET	10050653	QC16	8,0 *0.313*	26 *1.024*	7,9 *0.311*	200,0 bar *2900,8*	93,0	0,0	0,0	0,1 *0.220*	VC..1103.. *VC..22.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-11	1/4HEX-T07PX50	C02506-T07P

Accessories

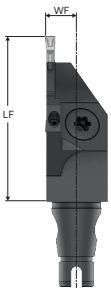
For	Bit holder	Insert clamping torque	Mounting fixture	Torque key
				
..-11	1/4HEX-S-HANDLE	0.9NM	SECO-MF7075-QC	T00-07P09

QC-CFOR/L-JET – MDT, QC-heads for inserts LCMF – Metric/ Inch

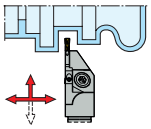


QC-CFOR/L-JET





KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	WF	LF	HF	CUTDIA	CP	KAPR°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*		kg *lbs*	
QC12-CFOR-1902RBJET	03280768	QC12	6,0 *0.236*	32 *1.260*	6,0 *0.235*	25,4 *1.000*	200,0 bar *2900,8*	90,0	0,1 *0.220*	LC..1902..
QC12-CFOL-1902RBJET	03280769	QC12	6,0 *0.236*	32 *1.260*	6,0 *0.235*	25,4 *1.000*	200,0 bar *2900,8*	90,0	0,1 *0.220*	LC..1902..
QC16-CFOR-1902RBJET	03280770	QC16	8,0 *0.315*	32 *1.260*	7,9 *0.311*	25,4 *1.000*	200,0 bar *2900,8*	90,0	0,1 *0.220*	LC..1902..
QC16-CFOL-1902RBJET	03280771	QC16	8,0 *0.315*	32 *1.260*	7,9 *0.311*	25,4 *1.000*	200,0 bar *2900,8*	90,0	0,1 *0.220*	LC..1902..

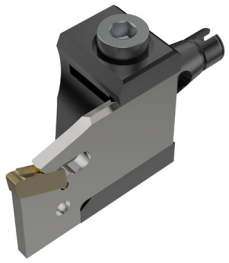
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..-19	T15P-2	L85012-T15P

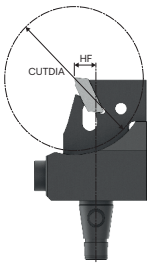
Accessories

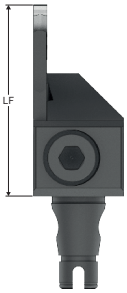
For	Insert clamping torque	Mounting fixture	Torque key
			
..-19	5.0NM	SECO-MF7075-QC	T00-15P50

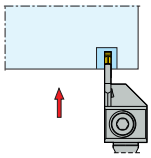
QC..-R/L150.10-..JETI – Parting-off, QC-heads for 150.10A-15 blades – Metric/ Inch



QC..-R/L150.10-..JETI



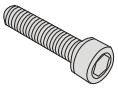
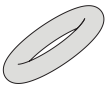




—Right-hand version shown
—For inserts program, see page(s) 947, 948
—For blades program, see page(s) 931
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	LF	HF	CUTDIA	CP	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	
QC12-R150.10-15JETI	03280777	QC12	34,2 *1.346*	6,0 *0.236*	–	200,0 bar *2900,8*	0,1 *0.220*	Blade-15
QC12-L150.10-15JETI	03280776	QC12	34,2 *1.346*	6,0 *0.236*	–	200,0 bar *2900,8*	0,1 *0.220*	Blade-15
QC16-R150.10-15JETI	03280779	QC16	34,2 *1.346*	8,0 *0.315*	–	200,0 bar *2900,8*	0,1 *0.220*	Blade-15
QC16-L150.10-15JETI	03280778	QC16	34,2 *1.346*	8,0 *0.315*	–	200,0 bar *2900,8*	0,1 *0.220*	Blade-15

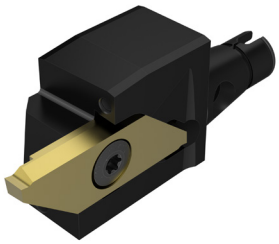
Spare Parts, included in delivery

For	Clamp key	Clamp screw	O-ring
			
..-15	4SMS795	MC6S5X18	ORING-4X1.5

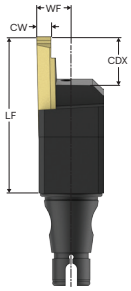
Accessories

For	Mounting fixture
	
..-15	SECO-MF7075-QC

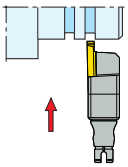
QC..-X2-..JETI – X2, QC-heads for inserts X2GA – Metric/ Inch







KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 957-963
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	LF	HF	WF	CDX	CP	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	
QC12-X2FR2503JETI	10266837	QC12	28,0 *1.102*	5,975 *0.235*	6,15 *0.242*	8,5 *0.335*	200,0 bar *2900,8*	0,1 *0.220*	X2..25..
QC12-X2FL2503JETI	10266836	QC12	28,0 *1.102*	5,975 *0.235*	6,15 *0.242*	8,5 *0.335*	200,0 bar *2900,8*	0,1 *0.220*	X2..25..
QC16-X2FR2503JETI	10266839	QC16	28,0 *1.102*	7,975 *0.314*	8,15 *0.321*	8,5 *0.335*	200,0 bar *2900,8*	0,1 *0.220*	X2..25..
QC16-X2FL2503JETI	10266838	QC16	28,0 *1.102*	7,975 *0.314*	8,15 *0.321*	8,5 *0.335*	200,0 bar *2900,8*	0,1 *0.220*	X2..25..

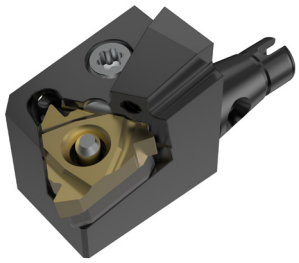
Spare Parts, included in delivery

For	Insert key	Insert screw
		
QC..-X2	1/4HEX-T08PX50	C04010-T08P

Accessories

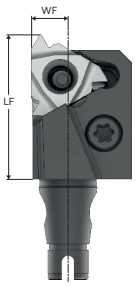
For	Adjustable Torque key	Bit holder	Replacement blade	Torque key
				
QC..-X2	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	T00-08P	T00-08P12

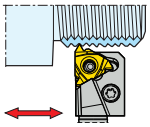
QC..-PER/L-HDJET – Thread turning, QC-heads for S-inserts – Metric/ Inch



QC..-PER/L-HDJET







—Right-hand version shown
—For inserts programme, see MN Threading catalogue
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	WF mm *inch*	LF mm *inch*	HF mm *inch*	CP bar *psi*	Weight kg *lbs*	CTWS
QC12-PER-16HDJET	03280772	QC12	6,0 *0.236*	25 *0.984*	6,0 *0.235*	200,0 bar *2900,8*	0,1 *0.220*	16ER
QC12-PEL-16HDJET	03280773	QC12	6,0 *0.236*	25 *0.984*	6,0 *0.235*	200,0 bar *2900,8*	0,1 *0.220*	16EL
QC16-PER-16HDJET	03280774	QC16	8,0 *0.315*	25 *0.984*	7,9 *0.311*	200,0 bar *2900,8*	0,1 *0.220*	16ER
QC16-PEL-16HDJET	03280775	QC16	8,0 *0.315*	25 *0.984*	7,9 *0.311*	200,0 bar *2900,8*	0,1 *0.220*	16EL

Spare Parts, included in delivery

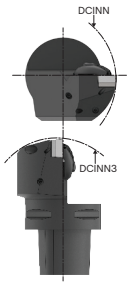
For	Insert lever	Insert shim (S)	Lever key	Lever screw	Shim pin
					
..-16	PP3712	GXA16-1	T15P-2	LS0612-T15P	AC4625

Accessories

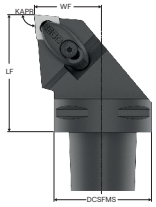
For	Insert clamping torque	Insert shim (M)	Insert shim (S) 1	Insert shim (S) 2	Insert shim (S) 3	Insert shim (S) 4	Insert shim (S) 5	Insert shim (S) 6	Mounting fixture	Torque key
										
..-16	3.0NM	MXA16-1	GXA16-0	GXA16-2	GXA16-3	GXA16-4	GXA16-99	GXA16-98	SECO-MF7075-QC	T00-15P30

C.-DCLCR/L...JETI2 – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch

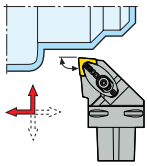




C.-DCLCR/L...JETI



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 618
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DCLCR-27050-09JETI2	10070157	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	65,0 *2.559*	120,0 *4.724*	150,0 bar *2175,6*	95,0	0,0	0,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-DCLCL-27050-09JETI2	10070155	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	65,0 *2.559*	120,0 *4.724*	150,0 bar *2175,6*	95,0	0,0	0,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-DCLCR-27050-12JETI2	10070158	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	95,0	0,0	0,0	0,4 *0.880*	CC..1204.. *CC..43.*
C4-DCLCL-27050-12JETI2	10070156	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	95,0	0,0	0,0	0,4 *0.880*	CC..1204.. *CC..43.*
C5-DCLCR-35060-12JETI2	10070186	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	140,0 *5.512*	150,0 bar *2175,6*	95,0	0,0	0,0	0,8 *1.760*	CC..1204.. *CC..43.*
C5-DCLCL-35060-12JETI2	10070185	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	140,0 *5.512*	150,0 bar *2175,6*	95,0	0,0	0,0	0,4 *0.880*	CC..1204.. *CC..43.*
C6-DCLCR-45065-12JETI2	10070215	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	160,0 *6.299*	150,0 bar *2175,6*	95,0	0,0	0,0	1,2 *2.650*	CC..1204.. *CC..43.*
C6-DCLCL-45065-12JETI2	10070214	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	160,0 *6.299*	150,0 bar *2175,6*	95,0	0,0	0,0	1,2 *2.650*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

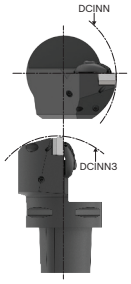
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-09	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS4X4	–	–	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS4X4	123.19-621	CA5008	S7111

Accessories

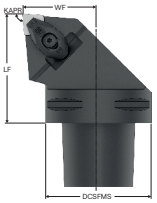
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
						
..-09	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS4X8	2.0NM	–	T00-10P20
..-12	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS4X8	3.5NM	1/4HEX-H5.0X50	T00-15P35

C.-DCLNR/L...JETI2 – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

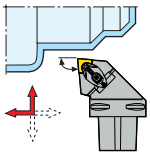




C.-DCLNR/L...JETI



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DCLNR-27050-12JETI2	10070160	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C4-DCLNL-27050-12JETI2	10070159	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C5-DCLNR-35060-12JETI2	10070189	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCLNL-35060-12JETI2	10070187	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCLNR-35060-16JETI2	10070190	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-DCLNL-35060-16JETI2	10070188	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C6-DCLNR-45065-12JETI2	10070281	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1204.. *CN..43.*
C6-DCLNL-45065-12JETI2	10070279	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,4 *3.090*	CN..1204.. *CN..43.*
C6-DCLNR-45065-16JETI2	10070282	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,4 *3.090*	CN..1606.. *CN..54.*
C6-DCLNL-45065-16JETI2	10070280	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C8-DCLNR-55080-12JETI2	10070315	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,6 *5.730*	CN..1204.. *CN..43.*
C8-DCLNL-55080-12JETI2	10070310	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,6 *5.730*	CN..1204.. *CN..43.*
C8-DCLNR-55080-16JETI2	10070316	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,6 *5.730*	CN..1606.. *CN..54.*
C8-DCLNL-55080-16JETI2	10070314	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	120,0 *4.724*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,6 *5.730*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

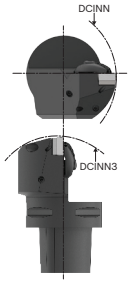
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-12	1/4HEX-T15PX50	L85021-T15P	CN17L00R-2-SET	P6SS4X4	DCO120310	C04008-T15P	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS4X4	DCN160616	C05010-T20P	S7111

Accessories

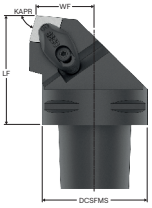
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
							
..-12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS4X8	3.5NM	–	T00-15P35
..-16	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS4X8	3.5NM	1/4HEX-T20PX50	T00-15P35

C.-DCRNR/L...JETI2 – Toolholders for inserts CNMA, CNMG, CNMM – Metric/ Inch

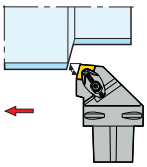




C.-DCRNR/L...JETI



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-DCRNR-35065-16JETI2	10070284	C6	✓	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	75,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-DCRNL-35065-16JETI2	10070283	C6	✓	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	75,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

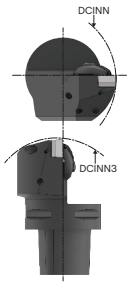
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-16	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS4X4	DCN160616	C05010-T20P	S7111

Accessories

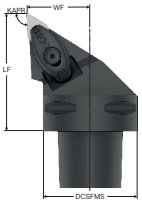
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
							
..-16	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS4X8	3.5NM	1/4HEX-T20PX50	T00-15P35

C.-DDJCR/L...JETI2 – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

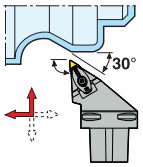




C.-DDJCR/L...JETI



KAPR = 93,0 °



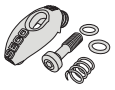
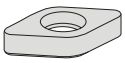
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

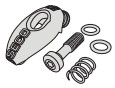


Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DDJCR-27050-11JETI2	10070162	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	95,0 *3.740*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C4-DDJCL-27050-11JETI2	10070161	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	95,0 *3.740*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C5-DDJCR-35060-11JETI2	10070192	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C5-DDJCL-35060-11JETI2	10070191	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C6-DDJCR-45065-11JETI2	10070287	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	0,0	0,0	1,1 *2.430*	DC..11T3.. *DC..32.5.*
C6-DDJCL-45065-11JETI2	10070286	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	0,0	0,0	1,1 *2.430*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

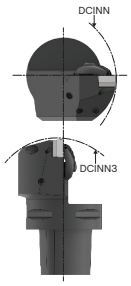
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-11	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS4X4	126.19-620	C94006-T15P	S5808

Accessories

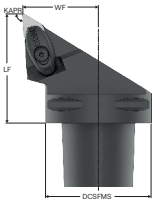
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
						
..-11	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20

C.-DDJNR/L...JETI2 – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric/ Inch

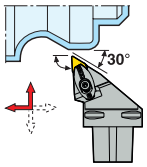




C.-DDJNR/L...JETI



KAPR = 93,0 °



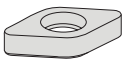
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DDJNR-27050-11JETI2	10070166	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	70,0 *2.756*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-DDJNL-27050-11JETI2	10070163	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	70,0 *2.756*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-DDJNR-27055-15-04JETI2	10070167	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	100,0 *3.937*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDJNL-27055-15-04JETI2	10070164	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	100,0 *3.937*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDJNR-27055-15JETI2	10070169	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	100,0 *3.937*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDJNL-27055-15JETI2	10070165	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	100,0 *3.937*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNR-35060-11JETI2	10070196	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	70,0 *2.756*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-DDJNL-35060-11JETI2	10070193	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	70,0 *2.756*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-DDJNR-35060-15-04JETI2	10070197	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNL-35060-15-04JETI2	10070194	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNR-35060-15JETI2	10070198	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNL-35060-15JETI2	10070195	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNR-45065-15-04JETI2	10070290	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,1 *2.430*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNL-45065-15-04JETI2	10070288	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,1 *2.430*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNR-45065-15JETI2	10070291	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,1 *2.430*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNL-45065-15JETI2	10070289	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,1 *2.430*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDJNR-55080-15JETI2	10070318	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-6,0	2,3 *5.070*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDJNL-55080-15JETI2	10070317	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-6,0	2,3 *5.070*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
C4, C6-L..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150616	C04008-T15P	S7111
C4, C6-L..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150616	C04011-T15P	S7111
C4, C6-R..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150616	C04008-T15P	S7111
C4, C6-R..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150616	C04011-T15P	S7111
C4-L..-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2L-SET	P6SS4X4	DDN110310	C03007-T09P	S5808
C4-R..-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2R-SET	P6SS4X4	DDN110310	C03007-T09P	S5808
C5-.R..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150616	C04008-T15P	S7111
C5-L..-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2L-SET	P6SS4X4	DDN110310	C03007-T09P	S5808
C5-L..-15-04	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150616	C04008-T15P	S7111
C5-R..-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2R-SET	P6SS4X4	DDN110310	C03007-T09P	S5808
L..-15	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150416	C04008-T15P	S7111
R..-15	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150416	C04008-T15P	S7111

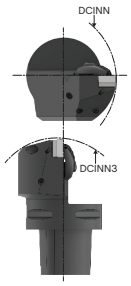
Accessories

For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Torque key
					
C4, C6-L..-15-04	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS4X8	3.5NM	T00-15P35
C4, C6-R..-15-04	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS4X8	3.5NM	T00-15P35
C4-L..-11	1/4HEX-S-HANDLE	–	P6SS4X8	2.0NM	T00-10P20
C4-R..-11	1/4HEX-S-HANDLE	–	P6SS4X8	2.0NM	T00-10P20
C5-.R..-15-04	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS4X8	3.5NM	T00-15P35
C5-L..-11	1/4HEX-S-HANDLE	–	P6SS4X8	2.0NM	T00-10P20
C5-L..-15-04	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS4X8	3.5NM	T00-15P35
C5-R..-11	1/4HEX-S-HANDLE	–	P6SS4X8	2.0NM	T00-10P20
L..-15	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS4X8	3.5NM	T00-15P35
R..-15	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS4X8	3.5NM	T00-15P35

C.-DDUNR/L...JETI2 – Toolholders for inserts DNGA, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch

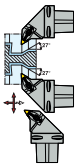


C.-DDUNR/L...JETI





KAPR = 93,0 °



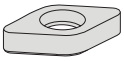
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-DDUNR-45065-15JETI2	10070293	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	95,0 *3.740*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-7,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDUNL-45065-15JETI2	10070292	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	95,0 *3.740*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-7,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDUNR-55080-15JETI2	10070320	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-7,0	2,5 *5.510*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDUNL-55080-15JETI2	10070319	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	93,0	-6,0	-7,0	2,5 *5.510*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

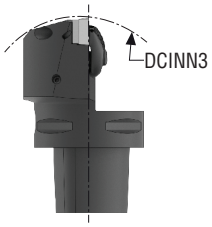
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-15	1/4HEX-T15PX50	L85021-T15P	CN17U00S-2-SET	P6SS4X4	DDN150416	C04008-T15P	S7111

Accessories

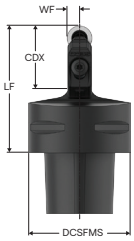
For	Bit holder	Coolant kit R-Roughing	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Torque key
						
..-15	1/4HEX-S-HANDLE	CN17L00R-2-SET	CN17L00X-2-SET	P6SS4X8	3.5NM	T00-15P35

C.-DRDCN...JET – Toolholders for inserts RCGT, RCMT – Metric/ Inch

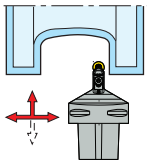




C.-DRDCN...JETI



KAPR



CTWS



—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	CDX	DCINN3	CP	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*			kg *lbs*	
C4-DRDCN-00050-10JETI	10228926	C4	✓	40,0 *1.575*	5,0 *0.197*	50,0 *1.969*	25,0 *0.984*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,4 *0.880*	RC..10T3..
C4-DRDCN-00060-12JETI	10228929	C4	✓	40,0 *1.575*	6,0 *0.236*	60,0 *2.362*	28,0 *1.102*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,4 *0.880*	RC..1204M0 *RC..43M0*
C5-DRDCN-00060-10JETI	10228932	C5	✓	50,0 *1.969*	5,0 *0.197*	60,0 *2.362*	25,0 *0.984*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,7 *1.540*	RC..10T3..
C5-DRDCN-00060-12JETI	10228935	C5	✓	50,0 *1.969*	6,0 *0.236*	60,0 *2.362*	28,0 *1.102*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,6 *1.320*	RC..1204M0 *RC..43M0*
C5-DRDCN-00060-16JETI	10228938	C5	✓	50,0 *1.969*	8,0 *0.315*	60,0 *2.362*	35,0 *1.378*	190,0 *7.480*	150,0 bar *2175,6*	0,0	0,0	0,6 *1.320*	RC..1606..
C6-DRDCN-00065-10JETI	10228941	C6	✓	63,0 *2.480*	5,0 *0.197*	65,0 *2.559*	25,0 *0.984*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,0 *2.200*	RC..10T3..
C6-DRDCN-00065-12JETI	10228945	C6	✓	63,0 *2.480*	6,0 *0.236*	65,0 *2.559*	28,0 *1.102*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,0 *2.200*	RC..1204M0 *RC..43M0*
C6-DRDCN-00065-16JETI	10228950	C6	✓	63,0 *2.480*	8,0 *0.315*	65,0 *2.559*	35,0 *1.378*	190,0 *7.480*	150,0 bar *2175,6*	0,0	0,0	1,0 *2.200*	RC..1606..
C8-DRDCN-00080-12JETI	10228952	C8	✓	80,0 *3.150*	6,0 *0.236*	80,0 *3.150*	28,0 *1.102*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	2,3 *5.070*	RC..1204M0 *RC..43M0*
C8-DRDCN-00080-16JETI	10228955	C8	✓	80,0 *3.150*	8,0 *0.315*	80,0 *3.150*	35,0 *1.378*	190,0 *7.480*	150,0 bar *2175,6*	0,0	0,0	2,2 *4.850*	RC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
..-10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

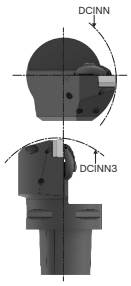
Accessories

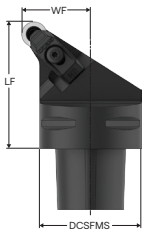
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
..-10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	T00-10P	9/64SMS875	T00-10P20
..-12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	9/64SMS875	T00-15P35
..-16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	1/4HEX-H5.0X50	T00-15P35

C.-DRSCR/L...JET – Toolholders for inserts RCGT, RCMT – Metric/ Inch

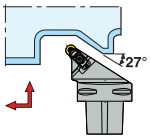


C.-DRSCR/L...JETI





KAPR



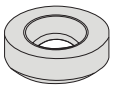
CTWS



—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	CDX	DCINN	DCINN3	CP	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*			kg *lbs*	
C3-DRSCR-22040-10JETI	10228924	C3	✓	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	2,9 *0.114*	150,0 *5.906*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,3 *0.660*	RC..10T3..
C3-DRSCL-22040-10JETI	10228925	C3	✓	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	2,9 *0.114*	150,0 *5.906*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,3 *0.660*	RC..10T3..
C4-DRSCR-27050-10JETI	10228927	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	3,07 *0.121*	150,0 *5.906*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,4 *0.880*	RC..10T3..
C4-DRSCL-27050-10JETI	10228928	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	3,07 *0.121*	150,0 *5.906*	140,0 *5.512*	150,0 bar *2175,6*	0,0	0,0	0,5 *1.100*	RC..10T3..
C4-DRSCR-27050-12JETI	10228930	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	3,13 *0.123*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,5 *1.100*	RC..1204M0 *RC..43M0*
C4-DRSCL-27050-12JETI	10228931	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	3,13 *0.123*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,4 *0.880*	RC..1204M0 *RC..43M0*
C5-DRSCR-35060-10JETI	10228933	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	3,07 *0.121*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,7 *1.540*	RC..10T3..
C5-DRSCL-35060-10JETI	10228934	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	3,07 *0.121*	150,0 *5.906*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,8 *1.760*	RC..10T3..
C5-DRSCR-35060-12JETI	10228936	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	3,13 *0.123*	130,0 *5.118*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,7 *1.540*	RC..1204M0 *RC..43M0*
C5-DRSCL-35060-12JETI	10228937	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	3,13 *0.123*	130,0 *5.118*	150,0 *5.906*	150,0 bar *2175,6*	0,0	0,0	0,8 *1.760*	RC..1204M0 *RC..43M0*
C5-DRSCR-35060-16JETI	10228939	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	4,17 *0.164*	140,0 *5.512*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	0,8 *1.760*	RC..1606..
C5-DRSCL-35060-16JETI	10228940	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	4,17 *0.164*	140,0 *5.512*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	0,8 *1.760*	RC..1606..
C6-DRSCR-45065-10JETI	10228943	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	3,07 *0.121*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,3 *2.870*	RC..10T3..
C6-DRSCL-45065-10JETI	10228944	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	3,07 *0.121*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,2 *2.650*	RC..10T3..
C6-DRSCR-45065-12JETI	10228948	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	3,13 *0.123*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,2 *2.650*	RC..1204M0 *RC..43M0*
C6-DRSCL-45065-12JETI	10228949	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	3,13 *0.123*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,2 *2.650*	RC..1204M0 *RC..43M0*
C6-DRSCR-45065-16JETI	10249254	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	4,17 *0.164*	140,0 *5.512*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,2 *2.650*	RC..1606..
C6-DRSCL-45065-16JETI	10249255	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	4,17 *0.164*	140,0 *5.512*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,2 *2.650*	RC..1606..
C8-DRSCR-55080-12JETI	10228953	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	3,13 *0.123*	165,0 *6.496*	180,0 *7.087*	150,0 bar *2175,6*	0,0	0,0	2,3 *5.070*	RC..1204M0 *RC..43M0*
C8-DRSCL-55080-12JETI	10228954	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	3,13 *0.123*	165,0 *6.496*	180,0 *7.087*	150,0 bar *2175,6*	0,0	0,0	2,5 *5.510*	RC..1204M0 *RC..43M0*
C8-DRSCR-55080-16JETI	10228957	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	4,17 *0.164*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	2,3 *5.070*	RC..1606..
C8-DRSCL-55080-16JETI	10228958	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	4,17 *0.164*	150,0 *5.906*	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	2,4 *5.290*	RC..1606..

Spare Parts, included in delivery

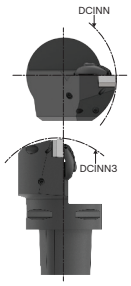
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

Accessories

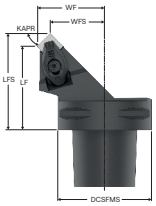
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	T00-10P	9/64SMS875	T00-10P20
..-12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	9/64SMS875	T00-15P35
..-16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	1/4HEX-H5.0X50	T00-15P35

C.-DSSNR/L...JETI2 – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric/ Inch

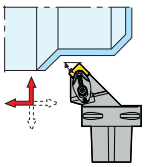




C.-DSSNR/L...JETI



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	WFS	LF	LFS	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DSSNR-27048-12JETI2	10070171	C4	✓	40,0 *1.575*	27,0 *1.063*	19,1 *0.752*	48,0 *1.890*	55,9 *2.201*	95,0 *3.740*	150,0 *5.906*	150,0 bar *2175,6*	45,0	-8,0	0,0	0,5 *1.100*	SN..1204.. *SN..43.*
C4-DSSNL-27048-12JETI2	10070170	C4	✓	40,0 *1.575*	27,0 *1.063*	19,1 *0.752*	48,0 *1.890*	55,9 *2.201*	95,0 *3.740*	150,0 *5.906*	150,0 bar *2175,6*	45,0	-8,0	0,0	0,5 *1.100*	SN..1204.. *SN..43.*
C5-DSSNR-35052-12JETI2	10070200	C5	✓	50,0 *1.969*	35,0 *1.378*	26,67 *1.050*	52,0 *2.047*	59,86 *2.357*	95,0 *3.740*	130,0 *5.118*	150,0 bar *2175,6*	45,0	-8,0	0,0	0,7 *1.540*	SN..1204.. *SN..43.*
C5-DSSNL-35052-12JETI2	10070199	C5	✓	50,0 *1.969*	35,0 *1.378*	26,67 *1.050*	52,0 *2.047*	59,86 *2.357*	95,0 *3.740*	130,0 *5.118*	150,0 bar *2175,6*	45,0	-8,0	0,0	0,7 *1.540*	SN..1204.. *SN..43.*
C6-DSSNR-45056-12JETI2	10070296	C6	✓	63,0 *2.480*	45,0 *1.772*	36,68 *1.444*	56,0 *2.205*	64,3 *2.531*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	45,0	-8,0	0,0	1,1 *2.430*	SN..1204.. *SN..43.*
C6-DSSNL-45056-12JETI2	10070294	C6	✓	63,0 *2.480*	45,0 *1.772*	36,68 *1.444*	56,0 *2.205*	64,3 *2.531*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	45,0	-8,0	0,0	1,1 *2.430*	SN..1204.. *SN..43.*
C6-DSSNR-45056-15JETI2	10070297	C6	✓	63,0 *2.480*	45,0 *1.772*	34,27 *1.349*	56,0 *2.205*	66,73 *2.627*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	45,0	-8,0	0,0	1,1 *2.430*	SN..1506.. *SN..54.*
C6-DSSNL-45056-15JETI2	10070295	C6	✓	63,0 *2.480*	45,0 *1.772*	34,27 *1.349*	56,0 *2.205*	66,73 *2.627*	100,0 *3.937*	140,0 *5.512*	150,0 bar *2175,6*	45,0	-8,0	0,0	1,3 *2.870*	SN..1506.. *SN..54.*
C8-DSSNR-55080-12JETI2	10070322	C8	✓	80,0 *3.150*	55,0 *2.165*	47,1 *1.854*	80,0 *3.150*	87,4 *3.441*	110,0 *4.331*	150,0 *5.906*	150,0 bar *2175,6*	45,0	-8,0	0,0	2,5 *5.510*	SN..1204.. *SN..43.*
C8-DSSNL-55080-12JETI2	10070321	C8	✓	80,0 *3.150*	55,0 *2.165*	47,1 *1.854*	80,0 *3.150*	87,4 *3.441*	110,0 *4.331*	150,0 *5.906*	150,0 bar *2175,6*	45,0	-8,0	0,0	2,4 *5.290*	SN..1204.. *SN..43.*

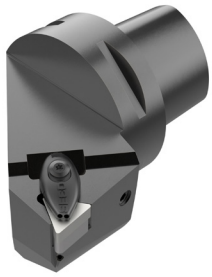
Spare Parts, included in delivery

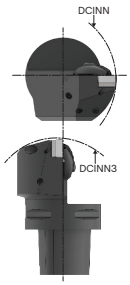
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-12	1/4HEX-T15PX50	L85021-T15P	CN17L00R-2-SET	P6SS4X4	DSN120616	C04008-T15P	S7111
..-15	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS4X4	DSN150624	C05010-T20P	S7111

Accessories

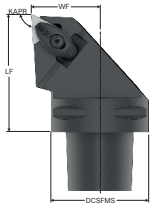
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
							
..-12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS4X8	3.5NM	–	T00-15P35
..-15	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS4X8	3.5NM	1/4HEX-T20PX50	T00-15P35

C.-DTJNR/L...JETI2 – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMX – Metric/ Inch

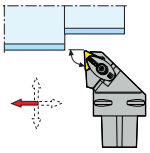




C.-DTJNR/L...JETI



KAPR = 93,0 °



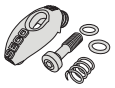
—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 612
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DTJNR-27050-16JETI2	10070173	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	90,0 *3.543*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	TN..1604.. *TN..33.*
C4-DTJNL-27050-16JETI2	10070172	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	90,0 *3.543*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,4 *0.880*	TN..1604.. *TN..33.*
C5-DTJNR-35060-16JETI2	10070202	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*
C5-DTJNL-35060-16JETI2	10070201	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*
C6-DTJNR-45065-16JETI2	10070299	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,4 *3.090*	TN..1604.. *TN..33.*
C6-DTJNL-45065-16JETI2	10070298	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	150,0 *5.906*	150,0 bar *2175,6*	93,0	-6,0	-6,0	1,4 *3.090*	TN..1604.. *TN..33.*

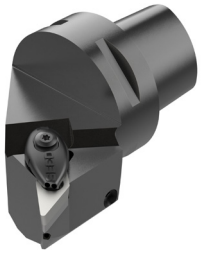
Spare Parts, included in delivery

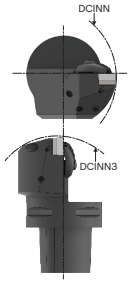
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
C4-..L	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2R-SET	P6SS3X3	DTN160616	C03007-T09P	S5808
C4-..R	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2L-SET	P6SS3X3	DTN160616	C03007-T09P	S5808
C5, C6-..L	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2R-SET	P6SS4X4	DTN160616	C03007-T09P	S5808
C5, C6-..R	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2L-SET	P6SS4X4	DTN160616	C03007-T09P	S5808

Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
C4-..L	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T09PX50	T00-10P20
C4-..R	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T09PX50	T00-10P20
C5, C6-..L	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	–	T00-10P20
C5, C6-..R	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	–	T00-10P20

C.-DVHBR/L...JETI2 – Toolholders for inserts VBMT, VBGT, VBGW, VBMW, VCGT – Metric/ Inch

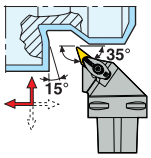




C.-DVHBR/L...JETI



KAPR = 107,5 °



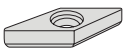
CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 613, 621
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DVHBR-27050-16JETI2	10070175	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	90,0 *3.543*	95,0 *3.740*	150,0 bar *2175.600*	107,5	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C4-DVHBL-27050-16JETI2	10070174	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	90,0 *3.543*	95,0 *3.740*	150,0 bar *2175.600*	107,5	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-DVHBR-35060-16JETI2	10070204	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	90,0 *3.543*	100,0 *3.937*	150,0 bar *2175.600*	107,5	0,0	0,0	0,7 *1.540*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-DVHBL-35060-16JETI2	10070203	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	90,0 *3.543*	100,0 *3.937*	150,0 bar *2175.600*	107,5	0,0	0,0	0,7 *1.540*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVHBR-45065-16JETI2	10070301	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	90,0 *3.543*	120,0 *4.724*	150,0 bar *2175.600*	107,5	0,0	0,0	1,2 *2.650*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVHBL-45065-16JETI2	10070300	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	90,0 *3.543*	120,0 *4.724*	150,0 bar *2175.600*	107,5	0,0	0,0	1,2 *2.650*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

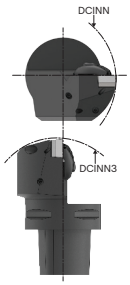
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
C4-..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
C4-..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
C5, C6-..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-621	C94006-T15P	S5808
C5, C6-..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-621	C94006-T15P	S5808

Accessories

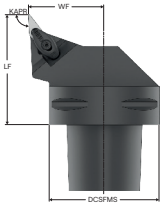
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
C4-..L	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20
C4-..R	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20
C5, C6-..L	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20
C5, C6-..R	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

C.-DVJBR/L...JETI2 – Toolholders for inserts VBMT, VBGT, VBGW, VBMW, VCGT – Metric/ Inch

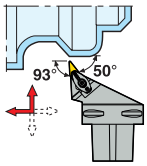




C.-DVJBR/L...JETI



KAPR = 93,0 °



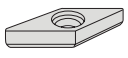
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DVJBR-27055-16JETI2	10070177	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	95,0 *3.740*	85,0 *3.346*	150,0 bar *2175,6*	93,0	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C4-DVJBL-27055-16JETI2	10070176	C4	✓	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	95,0 *3.740*	85,0 *3.346*	150,0 bar *2175,6*	93,0	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-DVJBR-35060-16JETI2	10070206	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,7 *1.540*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-DVJBL-35060-16JETI2	10070205	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	100,0 *3.937*	150,0 bar *2175,6*	93,0	0,0	0,0	0,7 *1.540*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVJBR-45065-16JETI2	10070304	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVJBL-45065-16JETI2	10070303	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*
C8-DVJBR-55080-16JETI2	10070324	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	150,0 bar *2175,6*	93,0	0,0	0,0	2,6 *5.730*	VB..1604-VC..1604 *VB..33.-VC..33.*
C8-DVJBL-55080-16JETI2	10070323	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	150,0 bar *2175,6*	93,0	0,0	0,0	2,6 *5.730*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

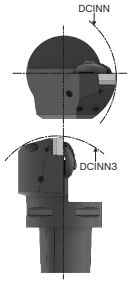
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
C4-..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
C4-..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
C5, C6, C8-..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-621	C94006-T15P	S5808
C5, C6, C8-..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-621	C94006-T15P	S5808

Accessories

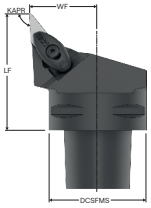
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
C4-..L	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20
C4-..R	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20
C5, C6, C8-..L	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20
C5, C6, C8-..R	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

C.-DVJNR/L...JETI2 – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric/ Inch

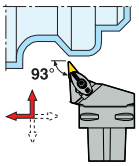




C.-DVJNR/L...JETI



KAPR = 93,0 °



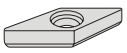
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DVJNR-27060-16JETI2	10070179	C4	✓	40,0 *1.575*	27,0 *1.063*	60,0 *2.362*	65,0 *2.559*	95,0 *3.740*	150,0 bar *2175,6*	93,0	-4,5	-13,5	0,5 *1.100*	VN..1604.. *VN..33.*
C4-DVJNL-27060-16JETI2	10070178	C4	✓	40,0 *1.575*	27,0 *1.063*	60,0 *2.362*	65,0 *2.559*	95,0 *3.740*	150,0 bar *2175,6*	93,0	-4,5	-13,5	0,5 *1.100*	VN..1604.. *VN..33.*
C5-DVJNR-35060-16JETI2	10070208	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-4,5	-13,5	0,7 *1.540*	VN..1604.. *VN..33.*
C5-DVJNL-35060-16JETI2	10070207	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	100,0 *3.937*	150,0 bar *2175,6*	93,0	-4,5	-13,5	0,7 *1.540*	VN..1604.. *VN..33.*
C6-DVJNR-45065-16JETI2	10070306	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-4,5	-13,5	1,2 *2.650*	VN..1604.. *VN..33.*
C6-DVJNL-45065-16JETI2	10070305	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	93,0	-4,5	-13,5	1,2 *2.650*	VN..1604.. *VN..33.*

Spare Parts, included in delivery

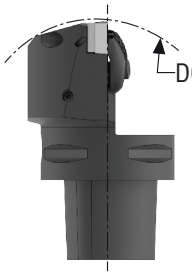
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-L	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2R-SET	P6SS3X3	171.19-620	C94006-T15P	S5808
..-R	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2L-SET	P6SS3X3	171.19-620	C94006-T15P	S5808

Accessories

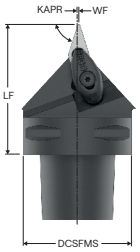
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
..-L	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20
..-R	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

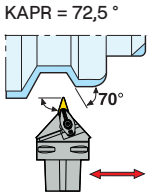
C.-DVVBN...JETI2 – Toolholders for inserts VBMT, VBGT, VBGW, VBMW, VCGT – Metric/ Inch





C.-DVVBN...JETI





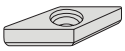
CTWS



—Neutral version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DVVBN-00055-16JETI2	10070184	C4	✓	40,0 *1.575*	0,6 *0.024*	55,0 *2.165*	100,0 *3.937*	150,0 bar *2175,6*	72,5	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-DVVBN-00060-16JETI2	10070213	C5	✓	50,0 *1.969*	0,6 *0.024*	60,0 *2.362*	100,0 *3.937*	150,0 bar *2175,6*	72,5	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVVBN-00065-16JETI2	10070309	C6	✓	63,0 *2.480*	0,6 *0.024*	65,0 *2.559*	120,0 *4.724*	150,0 bar *2175,6*	72,5	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
C4	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
C5, C6	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-621	C94006-T15P	S5808

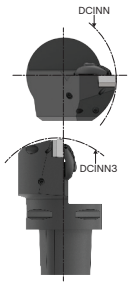
Accessories

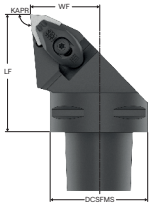
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
C4	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	1/4HEX-T15PX50	T00-10P20
C5, C6	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

C.-DWLNR/L...JETI2 – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric/ Inch

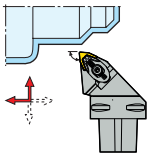


C.-DWLNR/L...JETI





KAPR = 95,0 °



CTWS



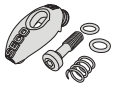
—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C4-DWLNR-27050-06JETI2	10070182	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-DWLNL-27050-06JETI2	10070180	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-DWLNR-27050-08JETI2	10070183	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	140,0 *5.512*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0804-WN..0806* *WN..43-WN..44**
C4-DWLNL-27050-08JETI2	10070181	C4	✓	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	140,0 *5.512*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0804-WN..0806* *WN..43-WN..44**
C5-DWLNR-35060-06JETI2	10070211	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	130,0 *5.118*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0604.. *WN..33.*
C5-DWLNL-35060-06JETI2	10070209	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	130,0 *5.118*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0604.. *WN..33.*
C5-DWLNR-35060-08JETI2	10070212	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	130,0 *5.118*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0804-WN..0806* *WN..43-WN..44**
C5-DWLNL-35060-08JETI2	10070210	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	85,0 *3.346*	130,0 *5.118*	150,0 bar *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0804-WN..0806* *WN..43-WN..44**
C6-DWLNR-45065-08JETI2	10070308	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804-WN..0806* *WN..43-WN..44**
C6-DWLNL-45065-08JETI2	10070307	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	100,0 *3.937*	120,0 *4.724*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804-WN..0806* *WN..43-WN..44**

Spare Parts, included in delivery

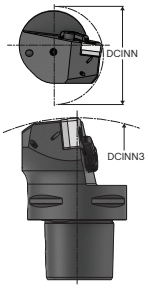
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-06	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	P6SS4X4	DWN060310	C03007-T09P	S5808
..-08	1/4HEX-T15PX50	L85021-T15P	CN17L00R-2-SET	P6SS4X4	DWN080416	C04008-T15P	S7111

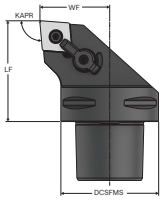
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Torque key
						
..-06	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	P6SS4X8	2.0NM	T00-10P20
..-08	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS4X8	3.5NM	T00-15P35

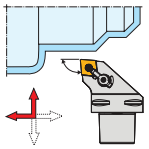
C.-MCLNR/L...JETI – Toolholders for inserts CNMA, CNMG, CNMM – Metric/ Inch







KAPR = 95,0 °



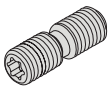
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

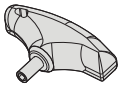
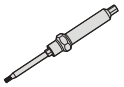
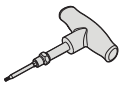


Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C5-MCLNL-35060-16JETI	10360924	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	130,0 *5.118*	170,0 *6.693*	150,0 *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-MCLNR-35060-16JETI	10360925	C5	✓	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	130,0 *5.118*	170,0 *6.693*	150,0 *2175,6*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C6-MCLNR-45065-16JETI	10360928	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	130,0 *5.118*	170,0 *6.693*	150,0 *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-MCLNL-45065-16JETI	10360926	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	130,0 *5.118*	170,0 *6.693*	150,0 *2175,6*	95,0	-6,0	-6,0	1,2 *2.650*	CN..1606.. *CN..54.*
C6-MCLNL-45065-19JETI	10360927	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	230,0 *9.055*	230,0 *9.055*	150,0 *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C6-MCLNR-45065-19JETI	10360929	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	230,0 *9.055*	230,0 *9.055*	150,0 *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C8-MCLNL-55080-19JETI	10360939	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	250,0 *9.843*	300,0 *11.811*	150,0 *2175,6*	95,0	-6,0	-6,0	2,6 *5.730*	CN..1906.. *CN..64.*
C8-MCLNR-55080-19JETI	10360940	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	250,0 *9.843*	300,0 *11.811*	150,0 *2175,6*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1906.. *CN..64.*

Spare Parts, included in delivery

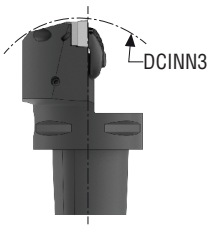
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..16	LD6024-T20P	MC21-A	P6SS3X3	CSN160412	1/4HEX-T20PX50	MN1520-T20P
..19	LD6024-T20P	MC22-A	P6SS3X3	CSN190412	1/4HEX-T20PX50	MN1920-T20P

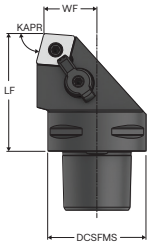
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..16	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-20P	T00T-20P60
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-20P	T00T-20P60

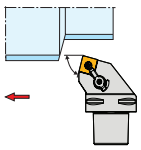
C.-MCLNR/L...JETI – Toolholders for inserts CNMA, CNMG, CNMM – Metric/ Inch







KAPR = 75,0 °



CTWS



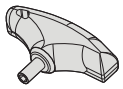
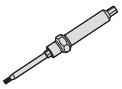
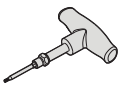
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C5-MCRNL-27060-16JETI	10360922	C5	✓	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	160,0 *6.299*	150,0 *2175,6*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-MCRNR-27060-16JETI	10360923	C5	✓	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	160,0 *6.299*	150,0 *2175,6*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

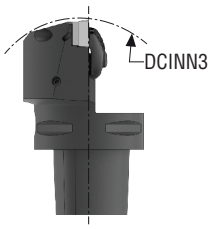
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..16	LD6024-T20P	MC21-A	P6SS3X3	CSN160412	1/4HEX-T20PX50	MN1520-T20P

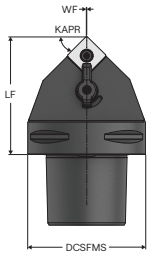
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..16	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-20P	T00T-20P60

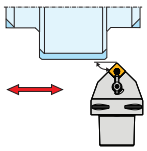
C.-MSDNN...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Metric/ Inch







KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

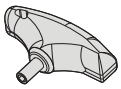
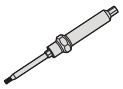
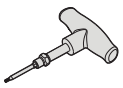


Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C8-MSDNN-00080-19JETI	10360943	C8	✓	80,0 *3.150*	0,5 *0.020*	80,0 *3.150*	150,0 *5.906*	150,0 *2175,6*	45,0	-6,0	-6,0	2,3 *5.070*	SN..1906.. *SN..64.*
C8-MSDNN-00080-25JETI	10360946	C8	✓	80,0 *3.150*	1,0 *0.039*	80,0 *3.150*	160,0 *6.299*	150,0 *2175,6*	45,0	-6,0	-6,0	2,3 *5.070*	SN..2509.. *SN..86.*

Spare Parts, included in delivery

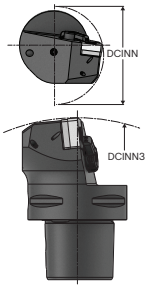
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..19	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P
..25	LD1035-T25P	MC24-A	P6SS4X4	SSN250616	1/4HEX-T25PX50	MN2525-T25P

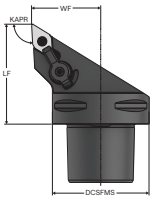
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60
..25	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-25P	T00T-25P60

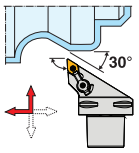
C.-MDJNR/L...JETI – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM – Metric/ Inch







KAPR = 93,0 °



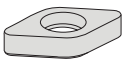
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-MDJNL-45065-15-JETI	10360930	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	230,0 *9.055*	150,0 *5.906*	150,0 *2175,6*	93,0	-6,0	-6,0	1,2 *2.650*	DN..1504-DN..1506* *DN..43-DN..44**
C6-MDJNR-45065-15-JETI	10360931	C6	✓	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	230,0 *9.055*	150,0 *5.906*	150,0 *2175,6*	93,0	-6,0	-6,0	1,1 *2.430*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..15	LD6025-T15P	MC22-A	P6SS3X3	DSN150412	1/4HEX-T15PX50	MN1215L-T15P

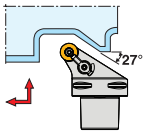
Accessories

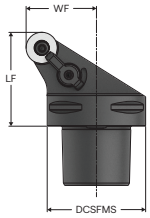
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..15	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	P6SS4X8	3.0NM	T00-15P	T00-15P30

C.-MRSCR/L...JETI – Toolholders for inserts RCMT – Metric/ Inch



KAPR





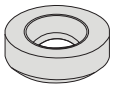
CTWS



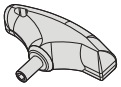
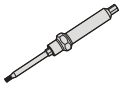
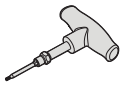
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	CP	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	bar *psi*			kg *lbs*	
C6-MRSCL-45060-20JETI	10360936	C6	✓	63,0 *2.480*	45,0 *1.772*	60,0 *2.362*	150,0 *2175,6*	0,0	0,0	1,1 *2.430*	RC..2006..
C6-MRSCR-45060-20JETI	10360937	C6	✓	63,0 *2.480*	45,0 *1.772*	60,0 *2.362*	150,0 *2175,6*	0,0	0,0	1,2 *2.650*	RC..2006..
C8-MRSCL-55080-20JETI	10360947	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	150,0 *2175,6*	0,0	0,0	2,2 *4.850*	RC..2006..
C8-MRSCR-55080-20JETI	10360948	C8	✓	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	150,0 *2175,6*	0,0	0,0	2,2 *4.850*	RC..2006..

Spare Parts, included in delivery

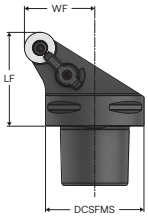
For	Clamp key	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert key	Insert screw	Insert shim
							
..20	1/4HEX-T20PX50	LD6024-T20P	MC22-A	P6SS4X4	1/4HEX-T25PX50	C06018-T25P	RSP2004M0

Accessories

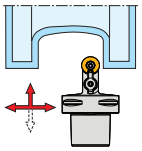
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
							
..20	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	8.0NM	T00T-25P	1/4HEX-H6.0X50	T00T-25P80

C.-MRDCN...JETI – Toolholders for inserts RCMT – Metric/ Inch





KAPR



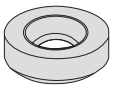
CTWS



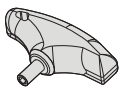
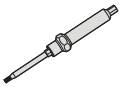
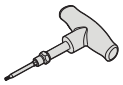
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	CP	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	bar *psi*			kg *lbs*	
C6-MRDCN-00065-20JETI	10360938	C6	✓	63,0 *2.480*	10,0 *0.394*	65,0 *2.559*	150,0 *2175,6*	0,0	0,0	1,0 *2.200*	RC..2006..
C8-MRDCN-00080-20JETI	10360949	C8	✓	80,0 *3.150*	10,0 *0.394*	80,0 *3.150*	150,0 *2175,6*	0,0	0,0	1,9 *4.190*	RC..2006..

Spare Parts, included in delivery

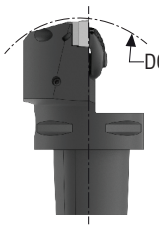
For	Clamp key	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert key	Insert screw	Insert shim
							
C6-20	1/4HEX-T20PX50	LD6024-T20P	MC21-A	P6SS4X4	1/4HEX-T25PX50	C06018-T25P	RSP2004M0
C8-20	1/4HEX-T20PX50	LD6024-T20P	MC22-A	P6SS4X4	1/4HEX-T25PX50	C06018-T25P	RSP2004M0

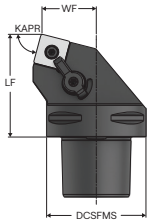
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
							
C6-20	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	8.0NM	T00T-25P	1/4HEX-H6.0X50	T00T-25P80
C8-20	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	8.0NM	T00T-25P	1/4HEX-H6.0X50	T00T-25P80

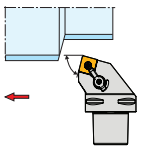
C.-MSRNR/L...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Metric/ Inch







KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

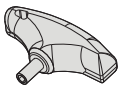
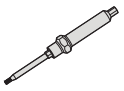
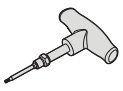


Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-MSRNL-35065-19JETI	10360932	C6	✓	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	150,0 *5.906*	150,0 *2175,6*	75,0	-6,0	-6,0	1,3 *2.870*	SN..1906.. *SN..64.*
C6-MSRNR-35065-19JETI	10360933	C6	✓	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	150,0 *5.906*	150,0 *2175,6*	75,0	-6,0	-6,0	1,3 *2.870*	SN..1906.. *SN..64.*
C8-MSRNL-45080-19JETI	10360941	C8	✓	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	150,0 *5.906*	150,0 *2175,6*	75,0	-6,0	-6,0	2,5 *5.510*	SN..1906.. *SN..64.*
C8-MSRNR-45080-19JETI	10360942	C8	✓	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	150,0 *5.906*	150,0 *2175,6*	75,0	-6,0	-6,0	2,5 *5.510*	SN..1906.. *SN..64.*
C8-MSRNL-45080-25JETI	10360944	C8	✓	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	180,0 *7.087*	150,0 *2175,6*	75,0	-6,0	-6,0	2,6 *5.730*	SN..2509.. *SN..86.*
C8-MSRNR-45080-25JETI	10360945	C8	✓	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	180,0 *7.087*	150,0 *2175,6*	75,0	-6,0	-6,0	2,6 *5.730*	SN..2509.. *SN..86.*

Spare Parts, included in delivery

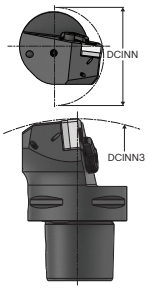
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..19	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P
..25	LD1035-T25P	MC24-A	P6SS4X4	SSN250616	1/4HEX-T25PX50	MN2525-T25P

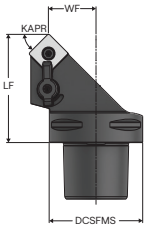
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60
..25	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-25P	T00T-25P60

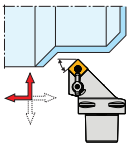
C.-MSSNR/L...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Metric/ Inch







KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

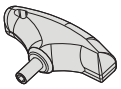
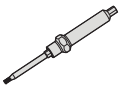
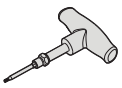


Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-MSSNL-45060-19JETI	10360934	C6	✓	63,0 *2.480*	45,0 *1.772*	60,0 *2.362*	280,0 *11.024*	290,0 *11.417*	150,0 *2175,6*	45,0	-8,0	0,0	1,3 *2.870*	SN..1906.. *SN..64.*
C6-MSSNR-45060-19JETI	10360935	C6	✓	63,0 *2.480*	45,0 *1.772*	60,0 *2.362*	280,0 *11.024*	290,0 *11.417*	150,0 *2175,6*	45,0	-8,0	0,0	1,3 *2.870*	SN..1906.. *SN..64.*

Spare Parts, included in delivery

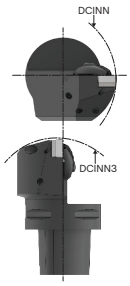
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..19	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P

Accessories

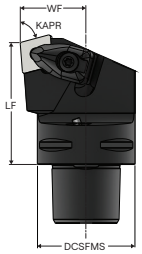
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60

C.-DCKNR/L...-M – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

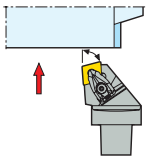




C.-DCKNR/L...-M



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12-13
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DCKNR-27050-12-M	02587878	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,5 *1.100*	CN..1204.. *CN..43.*
C4-DCKNL-27050-12-M	02587879	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,5 *1.100*	CN..1204.. *CN..43.*
C5-DCKNR-35060-12-M	02587884	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,9 *1.980*	CN..1204.. *CN..43.*
C5-DCKNL-35060-12-M	02587885	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,9 *1.980*	CN..1204.. *CN..43.*
C5-DCKNR-35060-16-M	02587886	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	0,9 *1.980*	CN..1606.. *CN..54.*
C5-DCKNL-35060-16-M	02587887	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-DCKNR-35060-19-M	02587888	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	95,0 *3.740*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1906.. *CN..64.*
C5-DCKNL-35060-19-M	02587889	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	95,0 *3.740*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1906.. *CN..64.*
C6-DCKNR-45065-12-M	02587890	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	1,5 *3.310*	CN..1204.. *CN..43.*
C6-DCKNL-45065-12-M	02587891	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	1,4 *3.090*	CN..1204.. *CN..43.*
C6-DCKNR-45065-16-M	02587892	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	1,5 *3.310*	CN..1606.. *CN..54.*
C6-DCKNL-45065-16-M	02587893	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	1,4 *3.090*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

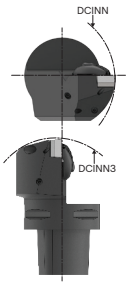
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4..-12	FP2012	L85021-T15P	CN6	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C5, C6..-16	FP2012	L86026-T20P	CN7	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
C5..-12	FP2012	L85021-T15P	CN7	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C5..-19	FP2012	L86026-T20P	CN6	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010
C6..-12	FP2012	L85021-T15P	CN7	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

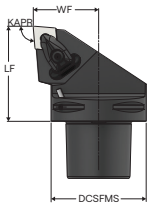
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5, C6..-16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C5..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60
C6..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DCLNR/L...-M, C.-DCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

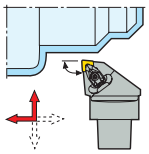




C.-DCLNR/L..-M



KAPR = 95,0 °



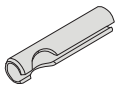
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12-13
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DCLNR-27050-12-M	02587838	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C4-DCLNL-27050-12-M	02587839	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C4-DCLNR-27055-16-M	02587840	C4	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	125,0 *4.921*	155,0 *6.102*	95,0	-6,0	-6,0	0,5 *1.100*	CN..1606.. *CN..54.*
C4-DCLNL-27055-16-M	02587841	C4	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	125,0 *4.921*	155,0 *6.102*	95,0	-6,0	-6,0	0,5 *1.100*	CN..1606.. *CN..54.*
C5-DCLNR-35060-12-M	02587844	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCLNL-35060-12-M	02587845	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCLNR-35060-16-M	02587846	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	125,0 *4.921*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-DCLNL-35060-16-M	02587847	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	125,0 *4.921*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-DCLNR-35060-19-M	02587848	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	80,0 *3.150*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1906.. *CN..64.*
C5-DCLNL-35060-19-M	02587849	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	80,0 *3.150*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1906.. *CN..64.*
C6-DCLNR-45065-12-M	02587850	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1204.. *CN..43.*
C6-DCLNL-45065-12-M	02587851	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1204.. *CN..43.*
C6-DCLNR-45065-16-M	02587852	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-DCLNL-45065-16-M	02587853	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-DCLNR-45065-19-M	02587854	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C6-DCLNL-45065-19-M	02587855	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C8-DCLNR-55080-16	02417033	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	125,0 *4.921*	150,0 *5.906*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1606.. *CN..54.*
C8-DCLNL-55080-16	02417031	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	125,0 *4.921*	150,0 *5.906*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1606.. *CN..54.*
C8-DCLNR-55080-19	00024776	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	100,0 *3.937*	250,0 *9.843*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1906.. *CN..64.*
C8-DCLNL-55080-19	02417036	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	100,0 *3.937*	250,0 *9.843*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1906.. *CN..64.*

Spare Parts, included in delivery

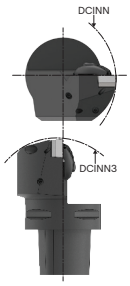
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-12	FP2012	L85021-T15P	CN3	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
..-16	FP2012	L86026-T20P	CN3	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
..-19	FP2012	L86026-T20P	CN3	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

Accessories

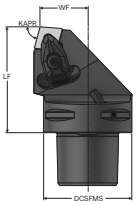
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
..-16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

C.-DCRNR/L...-M, C.-DCRNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

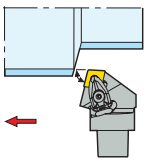




C.-DCRNR/L..-M



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12-13
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DCRNR-22050-12-M	02587858	C4	40,0 *1.575*	22,0 *0.866*	50,0 *1.969*	140,0 *5.512*	140,0 *5.512*	75,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C4-DCRNL-22050-12-M	02587859	C4	40,0 *1.575*	22,0 *0.866*	50,0 *1.969*	140,0 *5.512*	140,0 *5.512*	75,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
C4-DCRNR-22055-16-M	02587860	C4	40,0 *1.575*	22,0 *0.866*	55,0 *2.165*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,5 *1.100*	CN..1606.. *CN..54.*
C4-DCRNL-22055-16-M	02587861	C4	40,0 *1.575*	22,0 *0.866*	55,0 *2.165*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,5 *1.100*	CN..1606.. *CN..54.*
C5-DCRNR-27060-12-M	02587864	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCRNL-27060-12-M	02587865	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-DCRNR-27060-16-M	02587866	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-DCRNL-27060-16-M	02587867	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C6-DCRNR-35065-12-M	02587870	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,2 *2.650*	CN..1204.. *CN..43.*
C6-DCRNL-35065-12-M	02587871	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,2 *2.650*	CN..1204.. *CN..43.*
C6-DCRNR-35065-16-M	02587872	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-DCRNL-35065-16-M	02587873	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,2 *2.650*	CN..1606.. *CN..54.*
C6-DCRNR-35065-19-M	02587874	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C6-DCRNL-35065-19-M	02587875	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C8-DCRNR-55080-19	00024777	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	250,0 *9.843*	250,0 *9.843*	75,0	-6,0	-6,0	2,7 *5.950*	CN..1906.. *CN..64.*
C8-DCRNL-55080-19	02546532	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	250,0 *9.843*	250,0 *9.843*	75,0	-6,0	-6,0	2,6 *5.730*	CN..1906.. *CN..64.*

Spare Parts, included in delivery

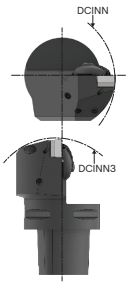
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4..-12	FP2012	L85021-T15P	CN6	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C4..-16	FP2012	L86026-T20P	CN6	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
C5, C6..-12	FP2012	L85021-T15P	CN3	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C5, C6..-16	FP2012	L86026-T20P	CN3	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
C6, C8..-19	FP2012	L86026-T20P	CN3	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

Accessories

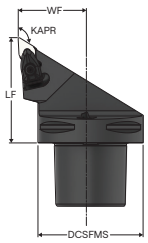
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C4..-16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C5, C6..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5, C6..-16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C6, C8..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

C.-DDJNR/L...-M, C.-DDJNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch

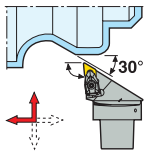




C.-DDJNR/L, ..-M



KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12-13
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DDJNR-27050-11-M	02587896	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	140,0 *5.512*	93,0	-6,0	-7,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-DDJNL-27050-11-M	02587897	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	140,0 *5.512*	93,0	-6,0	-7,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-DDJNR-27055-15-M	02587902	C4	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	110,0 *4.331*	145,0 *5.709*	93,0	-6,0	-7,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDJNL-27055-15-M	02587903	C4	40,0 *1.575*	27,0 *1.063*	55,0 *2.165*	110,0 *4.331*	145,0 *5.709*	93,0	-6,0	-7,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNR-35060-11-M	02587898	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	65,0 *2.559*	165,0 *6.496*	93,0	-6,0	-7,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-DDJNL-35060-11-M	02587899	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	65,0 *2.559*	165,0 *6.496*	93,0	-6,0	-7,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-DDJNR-35060-15-M	02587904	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-7,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDJNL-35060-15-M	02587905	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-7,0	0,7 *1.540*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNR-45065-11-M	02587900	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	93,0	-6,0	-7,0	1,2 *2.650*	DNMU1104.. *DNMU33.*
C6-DDJNL-45065-11-M	02587901	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	93,0	-6,0	-7,0	1,2 *2.650*	DNMU1104.. *DNMU33.*
C6-DDJNR-45065-15-M	02587906	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,2 *2.650*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDJNL-45065-15-M	02587907	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,2 *2.650*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDJNR-55080-15	02417037	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	250,0 *9.843*	93,0	-6,0	-7,0	2,2 *4.850*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDJNL-55080-15	02417038	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	250,0 *9.843*	93,0	-6,0	-7,0	2,2 *4.850*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

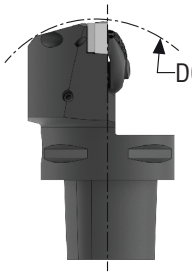
For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Plug screw	Shim/clamp key	Shim screw	Spring
											
C4..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	CN6	–	DDN110310	–	–	C03007-T09P	S5608
C4..-15	–	–	FP2012	L85021-T15P	CN6	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912
C5..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	CN6	–	DDN110310	P6SS4X4	–	C03007-T09P	S5608
C5..-15	–	–	FP2012	L85021-T15P	CN3	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912
C6..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	CN6	–	DDN110310	P6SS4X4	–	C03007-T09P	S5608
C6..-15	–	–	FP2012	L85021-T15P	CN7	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912
C8..-15	–	–	FP2012	L85021-T15P	CN8	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

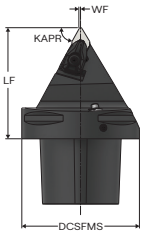
For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
C4..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-09P	T00-10P20
C4..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	T00-10P20
C4..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35
C5..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	T00-10P20
C5..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35
C6..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	T00-10P20
C6..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35
C8..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DDNNN...-M – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM – Metric/ Inch

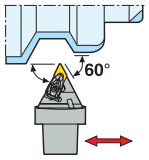




C.-DDNNN..-M



KAPR = 62,5 °



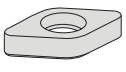
CTWS



—Neutral version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12-13
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DDNNN-00050-11-M	02587914	C4	40,0 *1.575*	0,5 *0.020*	50,0 *1.969*	140,0 *5.512*	62,5	-5,0	-9,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-DDNNN-00055-15-M	02587917	C4	40,0 *1.575*	0,5 *0.020*	55,0 *2.165*	145,0 *5.709*	62,5	-5,0	-9,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDNNN-00060-15-M	02587918	C5	50,0 *1.969*	0,5 *0.020*	60,0 *2.362*	165,0 *6.496*	62,5	-5,0	-9,0	0,6 *1.320*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDNNN-00065-11-M	02587916	C6	63,0 *2.480*	0,5 *0.020*	65,0 *2.559*	190,0 *7.480*	62,5	-5,0	-9,0	1,0 *2.200*	DNMU1104.. *DNMU33.*
C6-DDNNN-00065-15-M	02587919	C6	63,0 *2.480*	0,5 *0.020*	65,0 *2.559*	190,0 *7.480*	62,5	-5,0	-9,0	1,0 *2.200*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

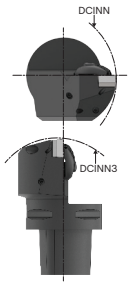
For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Plug screw	Shim/clamp key	Shim screw	Spring
											
C4..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	CN6	–	DDN110310	–	–	C03007-T09P	S5608
C4..-15	–	–	FP2012	L85021-T15P	CN6	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912
C5, C6..-15	–	–	FP2012	L85021-T15P	CN3	CD12-S	DDN150416	–	1/4HEX-T15PX50	C04008-T15P	S6912
C6..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	CN6	–	DDN110310	P6SS4X4	–	C03007-T09P	S5608

Accessories

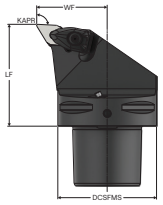
For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
								
C4..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
C4..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	–	T00-15P35
C5, C6..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	–	T00-15P35
C6..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20

C.-DDUNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch

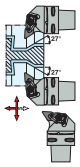




C.-DDUNR/L



KAPR = 93,0 °



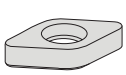
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12–13
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DDUNR-27050-15	02611291	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-7,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDUNR-27050-15-04	02640737	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-7,0	0,5 *1.100*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDUNL-27050-15	02631210	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-7,0	0,5 *1.100*	DN..1504-DN..1506* *DN..43-DN..44**
C4-DDUNL-27050-15-04	02640738	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-7,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDUNR-35060-15	02611233	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-7,0	0,8 *1.760*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDUNL-35060-15	02510294	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-7,0	0,8 *1.760*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDUNR-45065-15	02506920	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDUNR-45065-15-04	02640744	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDUNL-45065-15	02540058	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDUNL-45065-15-04	02640745	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-7,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDUNR-55080-15	02578445	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	250,0 *9.843*	93,0	-6,0	-7,0	2,6 *5.730*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDUNR-55080-15-04	02640746	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	250,0 *9.843*	93,0	-6,0	-7,0	2,7 *5.950*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDUNL-55080-15	02599256	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	110,0 *4.331*	250,0 *9.843*	93,0	-6,0	-7,0	2,6 *5.730*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

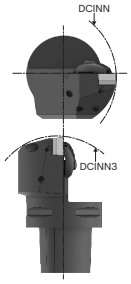
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4	FP2012	L85021-T15P	CN7	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
C4..-04	FP2012	L85021-T15P	CN7	CD12-S	DDN150616	1/4HEX-T15PX50	C04008-T15P	S6912
C5	FP2012	L85021-T15P	CN7	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
C6	FP2012	L85021-T15P	CN8	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
C6..-04	FP2012	L85021-T15P	CN8	CD12-S	DDN150616	1/4HEX-T15PX50	C04008-T15P	S6912
C8	FP2012	L85021-T15P	CN8	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
C8..-04	FP2012	L85021-T15P	CN8	CD12-S	DDN150616	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C4..-04	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C6	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C6..-04	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C8	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C8..-04	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DRSNR/L...-M – Toolholders for inserts RNMA, RNMG – Metric/ Inch

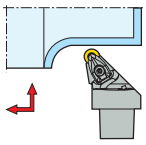




C.-DRSNR/L..-M



KAPR = 45,0 °



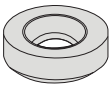
—Right-hand version shown
—For inserts program, see page(s) 566
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DRSNR-27050-12-M	02587923	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	45,0	-6,0	-6,0	0,4 *0.880*	RN..1204.. *RN..43.*
C4-DRSNL-27050-12-M	02587924	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	45,0	-6,0	-6,0	0,4 *0.880*	RN..1204.. *RN..43.*
C6-DRSNR-45065-19-M	02587931	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	-6,0	-6,0	1,4 *3.090*	RN..1906.. *RN..64.*
C6-DRSNL-45065-19-M	02587932	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	-6,0	-6,0	1,4 *3.090*	RN..1906.. *RN..64.*

Spare Parts, included in delivery

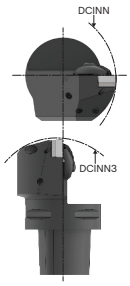
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4	FP2012	L85021-T15P	CN6	CD12-S	DRN120600	1/4HEX-T15PX50	C04008-T15P	S6912
C6	FP2012	L86026-T20P	CN6	CD19-S	DRN190600	1/4HEX-T20PX50	C05010-T20P	S7010

Accessories

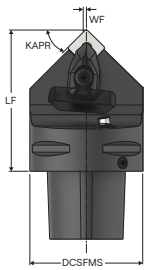
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C6	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

C.-DSDNN...-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric/ Inch

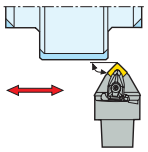




C.-DSDNN..-M



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 12-13
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—Shim DSN190640 for insert SN..190624.., to be ordered separately
—Shim DSN250424 for insert SN..2509.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS

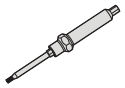
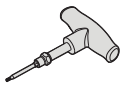


Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DSDNN-00055-15-M	02587975	C4	40,0 *1.575*	0,5 *0.020*	55,0 *2.165*	165,0 *6.496*	165,0 *6.496*	45,0	-6,0	-6,0	0,5 *1.100*	SN..1506.. *SN..54.*
C5-DSDNN-00060-12-M	02587977	C5	50,0 *1.969*	0,3 *0.012*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	45,0	-6,0	-6,0	0,7 *1.540*	SN..1204.. *SN..43.*
C5-DSDNN-00060-15-M	02587978	C5	50,0 *1.969*	0,5 *0.020*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	45,0	-6,0	-6,0	0,7 *1.540*	SN..1506.. *SN..54.*
C6-DSDNN-00065-12-M	02587980	C6	63,0 *2.480*	0,3 *0.012*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	45,0	-6,0	-6,0	1,5 *3.310*	SN..1204.. *SN..43.*
C6-DSDNN-00070-19-M	02587982	C6	63,0 *2.480*	0,5 *0.020*	70,0 *2.756*	195,0 *7.677*	195,0 *7.677*	45,0	-6,0	-6,0	1,2 *2.650*	SN..1906.. *SN..64.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4..-15	FP2012	L86026-T20P	CN6	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010
C5, C6..-12	FP2012	L85021-T15P	CN3	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C5, C6..-15	FP2012	L86026-T20P	CN3	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010
C6..-19	FP2012	L86026-T20P	CN3	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010

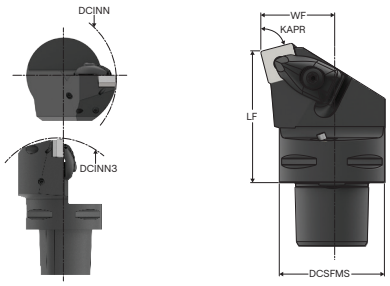
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4..-15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C5, C6..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5, C6..-15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C6..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

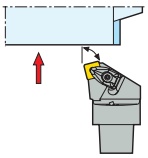
C.-DSKNR/L...-M, C.-DSKNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric/ Inch



C.-DSKNR/L, ..-M



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 12–13
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—Shim DSN190640 for insert SN..190624.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS mm *inch*	WF mm *inch*	LF mm *inch*	DCINN mm *inch*	DCINN3 mm *inch*	KAPR°	GAMO°	LAMS°	Weight kg *lbs*	CTWS
C4-DSKNR-27050-12-M	02587985	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,5 *1.100*	SN..1204.. *SN..43.*
C4-DSKNL-27050-12-M	02587986	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	110,0 *4.331*	75,0	-6,0	-6,0	0,5 *1.100*	SN..1204.. *SN..43.*
C6-DSKNR-45065-19-M	02588001	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	1,3 *2.870*	SN..1906.. *SN..64.*
C6-DSKNL-45065-19-M	02588002	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	1,3 *2.870*	SN..1906.. *SN..64.*
C8-DSKNR-55080-19	02597490	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	2,6 *5.730*	SN..1906.. *SN..64.*
C8-DSKNL-55080-19	02597074	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	125,0 *4.921*	125,0 *4.921*	75,0	-6,0	-6,0	2,5 *5.510*	SN..1906.. *SN..64.*

Spare Parts, included in delivery

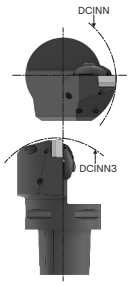
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
C4	FP2012	L85021-T15P	CN6	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C6	FP2012	L86026-T20P	CN7	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010
C8	FP2012	L86026-T20P	CN8	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010

Accessories

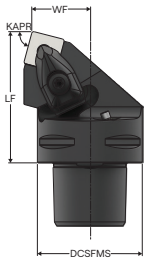
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
C4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C6	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60
C8	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

C.-DSRNR/L...-M, C.-DSRNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric/ Inch

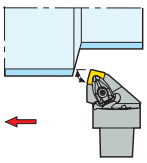




C.-DSRNR/L, ..-M



KAPR = 75,0 °



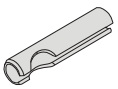
CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 12-13
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DSRNR-22050-12-M	02587935	C4	40,0 *1.575*	22,0 *0.866*	50,0 *1.969*	140,0 *5.512*	140,0 *5.512*	75,0	-6,0	-6,0	0,4 *0.880*	SN..1204.. *SN..43.*
C4-DSRNL-22050-12-M	02587936	C4	40,0 *1.575*	22,0 *0.866*	50,0 *1.969*	140,0 *5.512*	140,0 *5.512*	75,0	-6,0	-6,0	0,4 *0.880*	SN..1204.. *SN..43.*
C4-DSRNR-22055-15-M	02587937	C4	40,0 *1.575*	22,0 *0.866*	55,0 *2.165*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,5 *1.100*	SN..1506.. *SN..54.*
C5-DSRNR-27060-12-M	02587941	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,7 *1.540*	SN..1204.. *SN..43.*
C5-DSRNL-27060-12-M	02587942	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	75,0	-6,0	-6,0	0,7 *1.540*	SN..1204.. *SN..43.*
C6-DSRNR-35065-15-M	02587949	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,2 *2.650*	SN..1506.. *SN..54.*
C6-DSRNL-35065-15-M	02587950	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	190,0 *7.480*	190,0 *7.480*	75,0	-6,0	-6,0	1,2 *2.650*	SN..1506.. *SN..54.*
C8-DSRNR-45080-19	02619061	C8	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	250,0 *9.843*	250,0 *9.843*	75,0	-6,0	-6,0	2,4 *5.290*	SN..1906.. *SN..64.*
C8-DSRNL-45080-19	02619062	C8	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	250,0 *9.843*	250,0 *9.843*	75,0	-6,0	-6,0	2,4 *5.290*	SN..1906.. *SN..64.*

Spare Parts, included in delivery

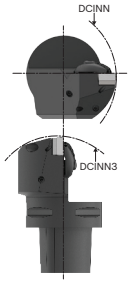
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
-12	FP2012	L85021-T15P	CN3	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
-19	FP2012	L86026-T20P	CN3	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010
C4..-15	FP2012	L86026-T20P	CN6	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010
C6..-15	FP2012	L86026-T20P	CN3	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010

Accessories

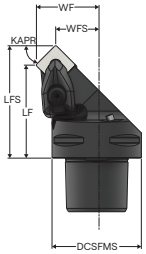
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60
C4..-15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
C6..-15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60

C.-DSSNR/L...-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric/ Inch

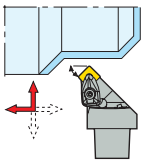




C.-DSSNR/L..-M



KAPR = 45,0 °



–Right-hand version shown
–For inserts program, see page(s) 569, 570, 571, 572, 604
–For holder code key, see page(s) 12–13
–Shim DSN120416 for insert SN..1206.., to be ordered separately
–For ISO attribute explanation, see page 82

CTWS

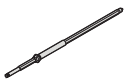


Designation	Item number	CTMS	DCSFMS	WF	WFS	LF	LFS	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DSSNR-27042-12-M	02587955	C4	40,0 *1.575*	27,0 *1.063*	18,7 *0.736*	42,0 *1.654*	50,3 *1.980*	110,0 *4.331*	140,0 *5.512*	45,0	-8,0	0,0	0,4 *0.880*	SN..1204.. *SN..43.*
C4-DSSNL-27042-12-M	02587956	C4	40,0 *1.575*	27,0 *1.063*	18,7 *0.736*	42,0 *1.654*	50,3 *1.980*	110,0 *4.331*	140,0 *5.512*	45,0	-8,0	0,0	0,4 *0.880*	SN..1204.. *SN..43.*
C5-DSSNR-35052-12-M	02587961	C5	50,0 *1.969*	35,0 *1.378*	26,7 *1.051*	52,0 *2.047*	60,3 *2.374*	110,0 *4.331*	165,0 *6.496*	45,0	-8,0	0,0	0,7 *1.540*	SN..1204.. *SN..43.*
C5-DSSNL-35052-12-M	02587962	C5	50,0 *1.969*	35,0 *1.378*	26,7 *1.051*	52,0 *2.047*	60,3 *2.374*	110,0 *4.331*	165,0 *6.496*	45,0	-8,0	0,0	0,7 *1.540*	SN..1204.. *SN..43.*
C5-DSSNR-35050-15-M	02587963	C5	50,0 *1.969*	35,0 *1.378*	24,8 *0.976*	50,0 *1.969*	60,2 *2.370*	125,0 *4.921*	165,0 *6.496*	45,0	-8,0	0,0	0,6 *1.320*	SN..1506.. *SN..54.*
C5-DSSNL-35050-15-M	02587964	C5	50,0 *1.969*	35,0 *1.378*	24,8 *0.976*	50,0 *1.969*	60,2 *2.370*	125,0 *4.921*	165,0 *6.496*	45,0	-8,0	0,0	0,6 *1.320*	SN..1506.. *SN..54.*
C6-DSSNR-45056-12-M	02587967	C6	63,0 *2.480*	45,0 *1.772*	36,7 *1.445*	56,0 *2.205*	64,3 *2.531*	110,0 *4.331*	190,0 *7.480*	45,0	-8,0	0,0	1,1 *2.430*	SN..1204.. *SN..43.*
C6-DSSNL-45056-12-M	02587968	C6	63,0 *2.480*	45,0 *1.772*	36,7 *1.445*	56,0 *2.205*	64,3 *2.531*	110,0 *4.331*	190,0 *7.480*	45,0	-8,0	0,0	1,1 *2.430*	SN..1204.. *SN..43.*
C6-DSSNR-45052-19-M	02587971	C6	63,0 *2.480*	45,0 *1.772*	32,5 *1.280*	52,0 *2.047*	64,5 *2.539*	125,0 *4.921*	190,0 *7.480*	45,0	-8,0	0,0	1,1 *2.430*	SN..1906.. *SN..64.*
C6-DSSNL-45052-19-M	02587972	C6	63,0 *2.480*	45,0 *1.772*	32,5 *1.280*	52,0 *2.047*	64,5 *2.539*	125,0 *4.921*	190,0 *7.480*	45,0	-8,0	0,0	1,1 *2.430*	SN..1906.. *SN..64.*
C8-DSSNR-55070-25-09	02640505	C8	80,0 *3.150*	55,0 *2.165*	38,5 *1.516*	70,0 *2.756*	86,5 *3.406*	150,0 *5.906*	256,0 *10.079*	45,0	-8,0	0,0	2,3 *5.070*	SN..2509.. *SN..86.*

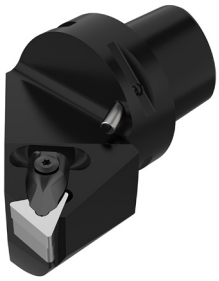
Spare Parts, included in delivery

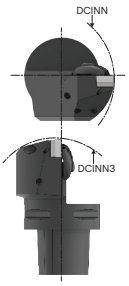
For	Clamp kit	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
..-15	–	FP2012	L86026-T20P	CN7	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010
..-19	–	FP2012	L86026-T20P	CN7	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010
..-25	CD25-S25	–	–	–	–	DSN250424	1/4HEX-T25PX50	C06012-T25P	–
C4..-12	–	FP2012	L85021-T15P	CN6	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C5..-12	–	FP2012	L85021-T15P	CN7	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
C6..-12	–	FP2012	L85021-T15P	CN3	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

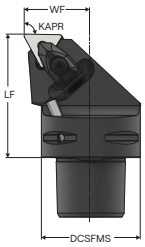
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60
..-25	1/4HEX-S-HANDLE	–	–	–	–
C4..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C5..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
C6..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DTFNR/L...-M – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric/ Inch

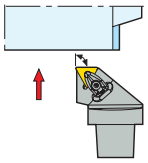




C.-DTFNR/L..-M



KAPR = 91,0 °



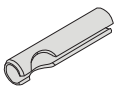
—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 12–13
—Shim DTN220640 for insert TN..220432.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DTFNR-27050-16-M	02588029	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	91,0	-6,0	-6,0	0,4 *0.880*	TN..1604.. *TN..33.*
C4-DTFNL-27050-16-M	02588030	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	91,0	-6,0	-6,0	0,4 *0.880*	TN..1604.. *TN..33.*
C5-DTFNR-35060-16-M	02588033	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	91,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*
C5-DTFNL-35060-16-M	02588034	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	91,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*

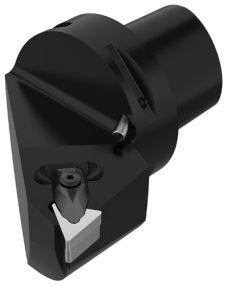
Spare Parts, included in delivery

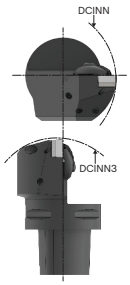
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-16	FP1508	L84017-T09P	CN3	CD09-S	DTN160616	1/4HEX-T09PX50	C03007-T09P	S5608

Accessories

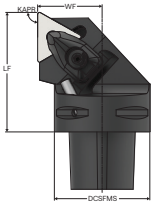
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-16	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	T00-09P20

C.-DTGNR/L...-M – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric/ Inch





C.-DTGNR/L..-M



KAPR = 90,0 °



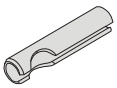
CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 12-13
—Shim DTN220640 for insert TN..220432.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DTGNR-27050-22-M	02588017	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	90,0	-6,0	-6,0	0,5 *1.100*	TN..2204.. *TN..43.*
C4-DTGNL-27050-22-M	02588018	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	90,0	-6,0	-6,0	0,5 *1.100*	TN..2204.. *TN..43.*

Spare Parts, included in delivery

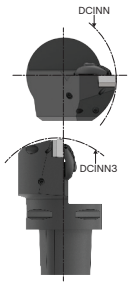
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4	FP2012	L85021-T15P	CN3	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

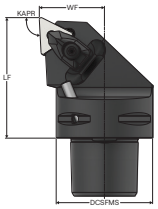
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DTJNR/L...-M – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMX – Metric/ Inch

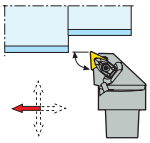




C.-DTJNR/L..-M



KAPR = 93,0 °



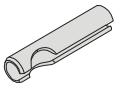
—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 612
—For holder code key, see page(s) 12–13
—Shim DTN220640 for insert TN..220432.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DTJNR-27050-16-M	02588003	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-6,0	0,5 *1.100*	TN..1604.. *TN..33.*
C4-DTJNL-27050-16-M	02588004	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	93,0	-6,0	-6,0	0,5 *1.100*	TN..1604.. *TN..33.*
C5-DTJNR-35060-16-M	02588007	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*
C5-DTJNL-35060-16-M	02588008	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-6,0	0,8 *1.760*	TN..1604.. *TN..33.*
C5-DTJNR-35060-22-M	02588009	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-6,0	0,8 *1.760*	TN..2204.. *TN..43.*
C5-DTJNL-35060-22-M	02588010	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	93,0	-6,0	-6,0	0,8 *1.760*	TN..2204.. *TN..43.*
C6-DTJNR-45065-16-M	02588011	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-6,0	1,3 *2.870*	TN..1604.. *TN..33.*
C6-DTJNL-45065-16-M	02588012	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	93,0	-6,0	-6,0	1,3 *2.870*	TN..1604.. *TN..33.*

Spare Parts, included in delivery

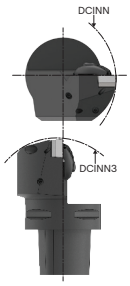
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-16	FP1508	L84017-T09P	CN3	CD09-S	DTN160616	1/4HEX-T09PX50	C03007-T09P	S5608
..-22	FP2012	L85021-T15P	CN3	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

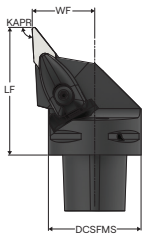
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-16	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	T00-09P20
..-22	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

C.-DVJNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG, VNMU – Metric/ Inch

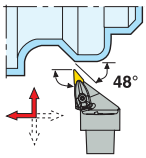




C.-DVJNR/L



KAPR = 93,0 °



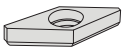
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DVJNR-27062-16	02588047	C4	40,0 *1.575*	27,0 *1.063*	62,0 *2.441*	65,0 *2.559*	152,0 *5.984*	93,0	-4,0	-13,0	0,5 *1.100*	VN..1604.. *VN..33.*
C4-DVJNL-27062-16	02588048	C4	40,0 *1.575*	27,0 *1.063*	62,0 *2.441*	65,0 *2.559*	152,0 *5.984*	93,0	-4,0	-13,0	0,5 *1.100*	VN..1604.. *VN..33.*
C5-DVJNR-35065-16	02588049	C5	50,0 *1.969*	35,0 *1.378*	65,0 *2.559*	65,0 *2.559*	170,0 *6.693*	93,0	-4,0	-13,0	0,7 *1.540*	VN..1604.. *VN..33.*
C5-DVJNL-35065-16	02588050	C5	50,0 *1.969*	35,0 *1.378*	65,0 *2.559*	65,0 *2.559*	170,0 *6.693*	93,0	-4,0	-13,0	0,7 *1.540*	VN..1604.. *VN..33.*
C6-DVJNR-45065-16	02588051	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	93,0	-4,0	-13,0	1,1 *2.430*	VN..1604.. *VN..33.*
C6-DVJNL-45065-16	02588052	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	93,0	-4,0	-13,0	1,1 *2.430*	VN..1604.. *VN..33.*

Spare Parts, included in delivery

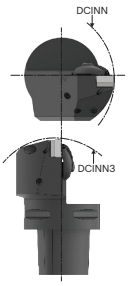
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4	FP2012	L85021-T15P	CN6	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912
C5, C6	FP2012	L85021-T15P	CN7	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912

Accessories

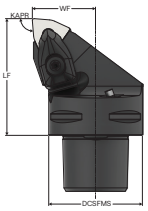
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
C4	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35
C5, C6	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35

C.-DWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric/ Inch

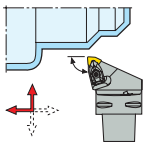




C.-DWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 12–13
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-DWLNR-27050-06	02588053	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-DWLNL-27050-06	02588054	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	60,0 *2.362*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-DWLNR-27050-08	02588055	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0804-WN..0806* *WN..43-WN..44**
C4-DWLNL-27050-08	02588056	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	110,0 *4.331*	140,0 *5.512*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0804-WN..0806* *WN..43-WN..44**
C5-DWLNR-35060-06	02588057	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	65,0 *2.559*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0604.. *WN..33.*
C5-DWLNL-35060-06	02588058	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	65,0 *2.559*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0604.. *WN..33.*
C5-DWLNR-35060-08	02588059	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0804-WN..0806* *WN..43-WN..44**
C5-DWLNL-35060-08	02588060	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	110,0 *4.331*	165,0 *6.496*	95,0	-6,0	-6,0	0,7 *1.540*	WN..0804-WN..0806* *WN..43-WN..44**
C6-DWLNR-45065-06	02588061	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0604.. *WN..33.*
C6-DWLNL-45065-06	02588062	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	81,0 *3.189*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0604.. *WN..33.*
C6-DWLNR-45065-08	02588063	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804-WN..0806* *WN..43-WN..44**
C6-DWLNL-45065-08	02588064	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	110,0 *4.331*	190,0 *7.480*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804-WN..0806* *WN..43-WN..44**

Spare Parts, included in delivery

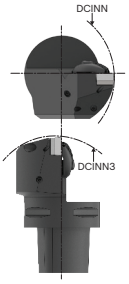
For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
C4..-06	FP1508	L84017-T09P	CN6	CD09-S	DWN060310	1/4HEX-T09PX50	C03007-T09P	S5608
C4..-08	FP2012	L85021-T15P	CN6	CD12-S	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912
C5, C6..-06	FP1508	L84017-T09P	CN3	CD09-S	DWN060310	1/4HEX-T09PX50	C03007-T09P	S5608
C5, C6..-08	FP2012	L85021-T15P	CN3	CD12-S	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

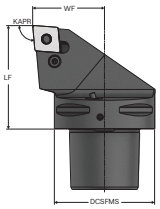
For	Bit holder	Clamp kit	Insert clamping torque	Insert shim	Replacement blade	Torque key
						
C4..-06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	–	T00-09P	T00-09P20
C4..-08	1/4HEX-S-HANDLE	CD12-S12	3.5NM	DWN080316	T00-15P	T00-15P35
C5, C6..-06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	–	T00-09P	T00-09P20
C5, C6..-08	1/4HEX-S-HANDLE	CD12-S12	3.5NM	DWN080316	T00-15P	T00-15P35

C.-PCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

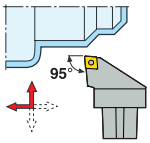




C.-PCLNR/L



KAPR = 95,0 °



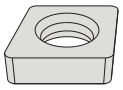
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS

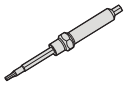


Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-PCLNR-35060-16	02617872	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	150,0 *5.906*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C5-PCLNL-35060-16	02902843	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	100,0 *3.937*	150,0 *5.906*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1606.. *CN..54.*
C6-PCLNR-45065-16	00045792	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	200,0 *7.874*	95,0	-6,0	-6,0	1,5 *3.310*	CN..1606.. *CN..54.*
C6-PCLNL-45065-16	00070115	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	200,0 *7.874*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1606.. *CN..54.*
C6-PCLNR-45065-19	02452428	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	200,0 *7.874*	95,0	-6,0	-6,0	1,5 *3.310*	CN..1906.. *CN..64.*
C6-PCLNL-45065-19	02466284	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	120,0 *4.724*	200,0 *7.874*	95,0	-6,0	-6,0	1,3 *2.870*	CN..1906.. *CN..64.*
C8-PCLNR-55080-19	02207793	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	120,0 *4.724*	220,0 *8.661*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1906.. *CN..64.*
C8-PCLNL-55080-19	02527457	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	120,0 *4.724*	220,0 *8.661*	95,0	-6,0	-6,0	2,5 *5.510*	CN..1906.. *CN..64.*

Spare Parts, included in delivery

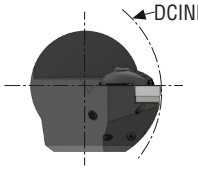
For	Coolant nozzle	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
							
..-16	CN7	PP6017	PCN160412	1/4HEX-H3.0X50	LS0820	MP1519	RP8286
C6..-19	CN7	PP7521	PCN190416	1/4HEX-H4.0X50	LS1027	MP1519	RP9811
C8..-19	CN8	PP7521	PCN190416	1/4HEX-H4.0X50	LS1027	MP1519	RP9811

Accessories

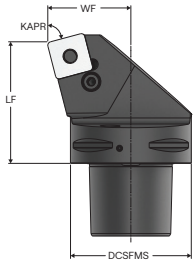
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-16	1/4HEX-S-HANDLE	–	–	–
C6..-19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
C8..-19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050

C.-PSKNR/L – Toolholders for inserts SNMA, SNMG, SNMM – Metric/ Inch

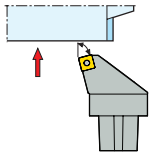




C.-PSKNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS

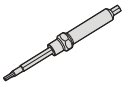
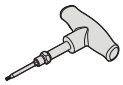


Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C8-PSKNR-55080-25	02527456	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	180,0 *7.087*	75,0	-6,0	-6,0	2,8 *6.170*	SN..2507.. *SN..85.*
C8-PSKNL-55080-25	02559645	C8	80,0 *3.150*	55,0 *2.165*	80,0 *3.150*	180,0 *7.087*	75,0	-6,0	-6,0	3,3 *7.280*	SN..2507.. *SN..85.*

Spare Parts, included in delivery

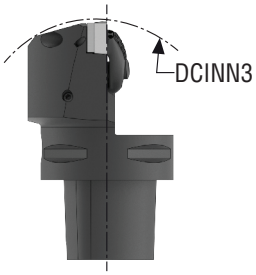
For	Coolant nozzle	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
							
C8	CN8	PP1325	PSN250624	1/4HEX-H5.0X50	LS1236	MP25	RP1312

Accessories

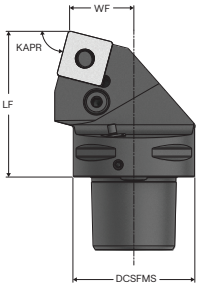
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
C8	1/4HEX-S-HANDLE	5.0NM	H00T-5.0	H00T-5050

C.-PSRNR/L – Toolholders for inserts SNMA, SNMG, SNMM – Metric/ Inch

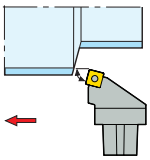




C.-PSRNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS

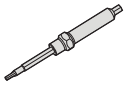


Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-PSRNR-27060-19	02547736	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	130,0 *5.118*	75,0	-6,0	-6,0	0,9 *1.980*	SN..1906.. *SN..64.*
C5-PSRNL-27060-19	02547737	C5	50,0 *1.969*	27,0 *1.063*	60,0 *2.362*	130,0 *5.118*	75,0	-6,0	-6,0	0,7 *1.540*	SN..1906.. *SN..64.*
C6-PSRNR-35065-19	02684139	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	160,0 *6.299*	75,0	-6,0	-6,0	1,4 *3.090*	SN..1906.. *SN..64.*
C6-PSRNL-35065-19	02684140	C6	63,0 *2.480*	35,0 *1.378*	65,0 *2.559*	160,0 *6.299*	75,0	-6,0	-6,0	1,4 *3.090*	SN..1906.. *SN..64.*
C8-PSRNR-45080-25	02559638	C8	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	220,0 *8.661*	75,0	-6,0	-6,0	2,4 *5.290*	SN..2507.. *SN..85.*
C8-PSRNL-45080-25	02630987	C8	80,0 *3.150*	45,0 *1.772*	80,0 *3.150*	220,0 *8.661*	75,0	-6,0	-6,0	2,4 *5.290*	SN..2507.. *SN..85.*

Spare Parts, included in delivery

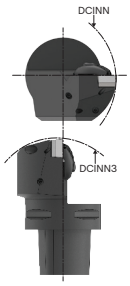
For	Coolant nozzle	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
							
C5, C6	CN7	PP7521	PSN190412	1/4HEX-H4.0X50	LS1027	MP1519	RP9811
C8	CN8	PP1325	PSN250624	1/4HEX-H5.0X50	LS1236	MP25	RP1312

Accessories

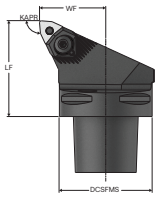
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
C5, C6	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
C8	1/4HEX-S-HANDLE	5.0NM	H00T-5.0	H00T-5050

C.-PWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric/ Inch

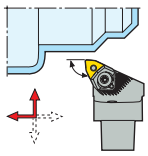




C.-PWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 12-13
—Wedge WNW08 for insert WNMM08.., to be ordered separately
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-PWLNR-27050-06	75257218	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-PWLNL-27050-06	00092036	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-PWLNR-27050-08	00092037	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0804.. *WN..43.*
C4-PWLNL-27050-08	75069455	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	WN..0804.. *WN..43.*
C5-PWLNR-35060-06	00092039	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0604.. *WN..33.*
C5-PWLNL-35060-06	00089504	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0604.. *WN..33.*
C5-PWLNR-35060-08	75675111	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0804.. *WN..43.*
C5-PWLNL-35060-08	75675112	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	WN..0804.. *WN..43.*
C6-PWLNR-45065-08	00012511	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804.. *WN..43.*
C6-PWLNL-45065-08	00012512	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	-6,0	-6,0	1,3 *2.870*	WN..0804.. *WN..43.*

Spare Parts, included in delivery

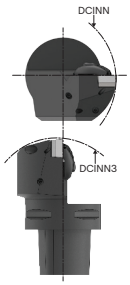
For	Coolant nozzle	Insert shim	Setting screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
							
C4..-06	CN6	WAE060312	L82511-T07P	PP2109-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
C4..-08	CN6	WAE080412	L82511-T07P	PP2015-1-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
C5..-06	CN7	WAE060312	L82511-T07P	PP2109-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
C5..-08	CN6	WAE080412	L82511-T07P	PP2015-1-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
C6..-08	CN8	WAE080412	L82511-T07P	PP2015-1-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P

Accessories

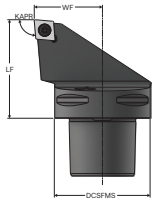
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C4..-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
C4..-08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
C5..-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
C5..-08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
C6..-08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50

C.-SCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric/ Inch

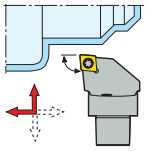




C.-SCLCR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C3-SCLCR-22040-09	00094076	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	–	–	95,0	0,0	0,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
C3-SCLCL-22040-09	00094065	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	–	–	95,0	0,0	0,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
C4-SCLCR-27050-09	00083466	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	0,0	0,0	0,5 *1.100*	CC..09T3.. *CC..32.5.*
C4-SCLCL-27050-09	75069013	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	0,0	0,0	0,5 *1.100*	CC..09T3.. *CC..32.5.*
C4-SCLCR-27050-12	00094168	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	0,0	0,0	0,5 *1.100*	CC..1204.. *CC..43.*
C4-SCLCL-27050-12	00094163	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	0,0	0,0	0,5 *1.100*	CC..1204.. *CC..43.*
C5-SCLCR-35060-09	00094277	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	0,0	0,0	0,8 *1.760*	CC..09T3.. *CC..32.5.*
C5-SCLCL-35060-09	00094261	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	0,0	0,0	0,8 *1.760*	CC..09T3.. *CC..32.5.*
C5-SCLCR-35060-12	00094278	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	0,0	0,0	0,7 *1.540*	CC..1204.. *CC..43.*
C5-SCLCL-35060-12	00094265	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	0,0	0,0	0,7 *1.540*	CC..1204.. *CC..43.*
C6-SCLCR-45065-12	00094313	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	0,0	0,0	1,2 *2.650*	CC..1204.. *CC..43.*
C6-SCLCL-45065-12	00094311	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	0,0	0,0	1,4 *3.090*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

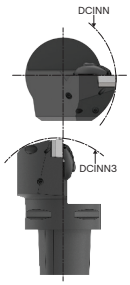
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C3, C4..-09	CN6	1/4HEX-T15PX50	C03512-T15P	SCN090308	CA3507
C3, C4..-12	CN6	1/4HEX-T15PX50	C04014-T15P	SCN12T308	CA4010
C5, C6..-09	CN7	1/4HEX-T15PX50	C03512-T15P	SCN090308	CA3507
C5, C6..-12	CN7	1/4HEX-T15PX50	C04014-T15P	SCN12T308	CA4010

Accessories

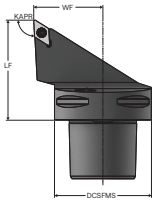
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C3, C4..-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C3, C4..-12	1/4HEX-S-HANDLE	3.5NM	T00-15P	1/4HEX-H4.0X50	T00-15P35
C5, C6..-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5, C6..-12	1/4HEX-S-HANDLE	3.5NM	T00-15P	1/4HEX-H4.0X50	T00-15P35

C.-SDJCR/L – Toolholders for inserts DCGT, DCMT, DCMW, DCMX – Metric/ Inch

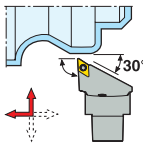




C.-SDJCR/L



KAPR = 93,0 °



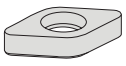
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 619
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C3-SDJCR-22040-11	00091724	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
C3-SDJCL-22040-11	00091725	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
C4-SDJCR-27050-11	75080768	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	93,0	0,0	0,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C4-SDJCL-27050-11	00084487	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	93,0	0,0	0,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C5-SDJCR-35060-11	00094282	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	93,0	0,0	0,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C5-SDJCL-35060-11	00094281	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	93,0	0,0	0,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C6-SDJCR-45065-11	00023659	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	1,1 *2.430*	DC..11T3.. *DC..32.5.*
C6-SDJCL-45065-11	00023658	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	1,1 *2.430*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

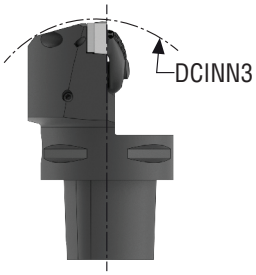
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C3, C4	CN6	1/4HEX-T15PX50	C03512-T15P	126.19-620	CA3507
C5, C6	CN7	1/4HEX-T15PX50	C03512-T15P	126.19-620	CA3507

Accessories

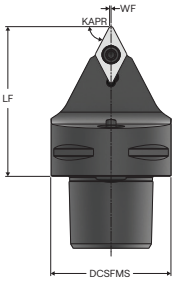
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C3, C4	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5, C6	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SDNCN – Toolholders for inserts DCGT, DCMT, DCMW – Metric/ Inch

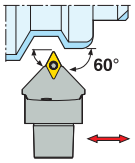




C.-SDNCN



KAPR = 62,5 °



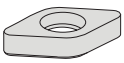
CTWS



– Neutral version shown
– For inserts program, see page(s) 555, 556, 557, 619
– For holder code key, see page(s) 12–13
– For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS mm *inch*	WF mm *inch*	LF mm *inch*	DCINN3 mm *inch*	KAPR°	GAMO°	LAMS°	Weight kg *lbs*	CTWS
C4-SDNCN-00050-11	00083467	C4	40,0 *1.575*	0,5 *0.020*	50,0 *1.969*	165,0 *6.496*	62,5	0,0	0,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C5-SDNCN-00060-11	00094283	C5	50,0 *1.969*	0,5 *0.020*	60,0 *2.362*	165,0 *6.496*	62,5	0,0	0,0	0,6 *1.320*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

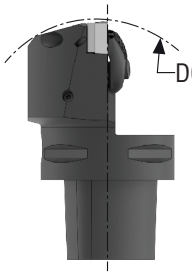
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C4	CN6	1/4HEX-T15PX50	C03512-T15P	126.19-620	CA3507
C5	CN7	1/4HEX-T15PX50	C03512-T15P	126.19-620	CA3507

Accessories

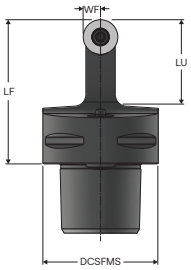
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C4	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SRDCN – Toolholders for inserts RCMT – Metric/ Inch

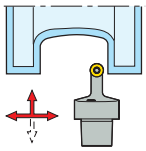




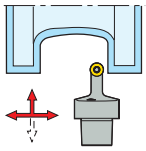
C.-SRDCN-..A



KAPR = 45,0 °



KAPR



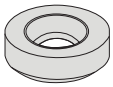
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS

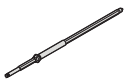


Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SRDCN-00050-12A	00094192	C4	40,0 *1.575*	6,0 *0.236*	50,0 *1.969*	28,0 *1.102*	165,0 *6.496*	45,0	0,0	0,0	0,3 *0.660*	RC..1204M0 *RC..43M0*
C5-SRDCN-00060-06A	00094341	C5	50,0 *1.969*	3,0 *0.118*	60,0 *2.362*	12,0 *0.472*	165,0 *6.496*	–	0,0	0,0	0,7 *1.540*	RCMT0602..
C5-SRDCN-00060-08A	00094342	C5	50,0 *1.969*	4,0 *0.157*	60,0 *2.362*	16,0 *0.630*	165,0 *6.496*	–	0,0	0,0	0,7 *1.540*	RC..0803..
C5-SRDCN-00060-10A	00094229	C5	50,0 *1.969*	5,0 *0.197*	60,0 *2.362*	25,0 *0.984*	165,0 *6.496*	–	0,0	0,0	0,6 *1.320*	RC..10T3..
C5-SRDCN-00060-12A	00094344	C5	50,0 *1.969*	6,0 *0.236*	60,0 *2.362*	28,0 *1.102*	165,0 *6.496*	–	0,0	0,0	0,4 *0.880*	RC..1204M0 *RC..43M0*
C5-SRDCN-00060-16A	00094345	C5	50,0 *1.969*	8,0 *0.315*	60,0 *2.362*	35,0 *1.378*	165,0 *6.496*	–	0,0	0,0	0,6 *1.320*	RC..1606..
C6-SRDCN-00065-10A	00094314	C6	63,0 *2.480*	5,0 *0.197*	65,0 *2.559*	25,0 *0.984*	165,0 *6.496*	–	0,0	0,0	1,0 *2.200*	RC..10T3..
C6-SRDCN-00065-12A	00094315	C6	63,0 *2.480*	6,0 *0.236*	65,0 *2.559*	28,0 *1.102*	165,0 *6.496*	–	0,0	0,0	0,9 *1.980*	RC..1204M0 *RC..43M0*
C6-SRDCN-00065-16A	00094317	C6	63,0 *2.480*	8,0 *0.315*	65,0 *2.559*	35,0 *1.378*	165,0 *6.496*	–	0,0	0,0	1,0 *2.200*	RC..1606..

Spare Parts, included in delivery

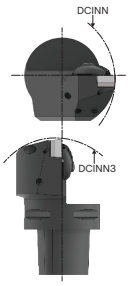
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C4, C5, C6..-06	CN7	1/4HEX-T07PX50	C02506-T07P	–	–
C4, C5, C6..-08	CN7	1/4HEX-T09PX50	C03007-T09P	–	–
C4, C5, C6..-10	CN7	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3507
C4, C5, C6..-16	CN7	1/4HEX-T20PX50	C05018-T20P	SRN160400	CA5010
C4..-12	CN6	1/4HEX-T15PX50	C03512-T15P	111.19-621	CA3507
C5, C6..-12	CN7	1/4HEX-T15PX50	C03512-T15P	111.19-621	CA3507

Accessories

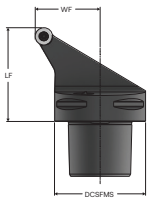
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C4, C5, C6..-06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4, C5, C6..-08	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
C4, C5, C6..-10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C4, C5, C6..-16	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50
C4..-12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5, C6..-12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SRSCR/L – Toolholders for inserts RCMT – Metric/ Inch

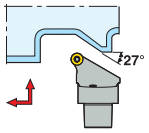




C.-SRSCR/L



KAPR = 45,0 °



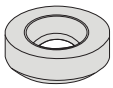
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-SRSCR-35060-06	00094353	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,7 *1.540*	RCMT0602..
C5-SRSCL-35060-06	00094347	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,6 *1.320*	RCMT0602..
C5-SRSCR-35060-08	00094354	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,7 *1.540*	RC..0803..
C5-SRSCL-35060-08	00094348	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,7 *1.540*	RC..0803..
C5-SRSCR-35060-10	00094355	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,7 *1.540*	RC..10T3..
C5-SRSCL-35060-10	00094349	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,6 *1.320*	RC..10T3..
C5-SRSCR-35060-12	00094356	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,6 *1.320*	RC..1204M0 *RC..43M0*
C5-SRSCL-35060-12	00094350	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	0,0	0,8 *1.760*	RC..1204M0 *RC..43M0*
C5-SRSCR-35060-16	00094357	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	140,0 *5.512*	165,0 *6.496*	45,0	0,0	0,0	0,8 *1.760*	RC..1606..
C5-SRSCL-35060-16	00094351	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	140,0 *5.512*	165,0 *6.496*	45,0	0,0	0,0	0,8 *1.760*	RC..1606..
C6-SRSCR-45065-10	00094323	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	0,0	1,2 *2.650*	RC..10T3..
C6-SRSCL-45065-10	00094319	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	0,0	1,2 *2.650*	RC..10T3..
C6-SRSCR-45065-12	00094324	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	0,0	1,1 *2.430*	RC..1204M0 *RC..43M0*
C6-SRSCL-45065-12	00094320	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	0,0	1,1 *2.430*	RC..1204M0 *RC..43M0*
C6-SRSCR-45065-16	00094325	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	140,0 *5.512*	165,0 *6.496*	45,0	0,0	0,0	1,1 *2.430*	RC..1606..
C6-SRSCL-45065-16	00094321	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	140,0 *5.512*	165,0 *6.496*	45,0	0,0	0,0	1,1 *2.430*	RC..1606..
C6-SRSCR-45065-20	00094326	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	–	–	45,0	0,0	0,0	1,1 *2.430*	RC..2006..
C6-SRSCL-45065-20	00094322	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	–	–	45,0	0,0	0,0	1,1 *2.430*	RC..2006..

Spare Parts, included in delivery

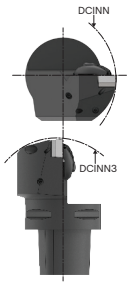
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
..-06	CN7	1/4HEX-T07PX50	C02506-T07P	–	–
..-08	CN7	1/4HEX-T09PX50	C03007-T09P	–	–
..-10	CN7	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3507
..-12	CN7	1/4HEX-T15PX50	C03512-T15P	111.19-621	CA3507
..-16	CN7	1/4HEX-T20PX50	C05013-T20P	SRN160400	CA5010
..-20	–	1/4HEX-T25PX50	C06018-T25P	RSP2004M0	–

Accessories

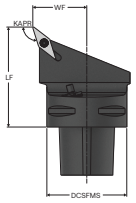
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
..-08	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
..-10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
..-12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
..-16	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50
..-20	1/4HEX-S-HANDLE	8.0NM	T00T-25P	–	T00T-25P80

C.-SVHBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric/ Inch

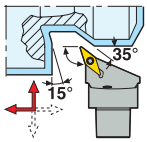




C.-SVHBR/L



KAPR = 107,5 °



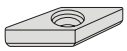
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SVHBR-27050-11	00094226	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	–	–	107,5	0,0	0,0	0,4 *0.880*	VB..1102.. *VB..21.5.*
C4-SVHBL-27050-11	00094224	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	–	–	107,5	0,0	0,0	0,4 *0.880*	VB..1102.. *VB..21.5.*
C4-SVHBR-27050-16	75065644	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C4-SVHBL-27050-16	00094225	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVHBR-35060-16	00094386	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVHBL-35060-16	00094384	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVHBR-45065-16	00094330	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVHBL-45065-16	00094329	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	95,0 *3.740*	165,0 *6.496*	107,5	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

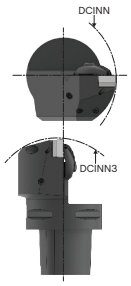
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C4, C5..-11	CN7	1/4HEX-T07PX50	C02506-T07P	–	–
C4..-16	CN6	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507
C5, C6..-16	CN7	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507

Accessories

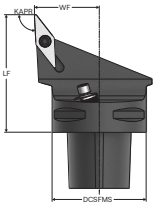
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C4, C5..-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5, C6..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SVJBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric/ Inch

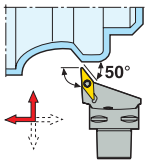




C.-SVJBR/L



KAPR = 93,0 °



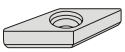
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C3-SVJBR-22040-11	00094146	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	170,0 *6.693*	165,0 *6.496*	93,0	0,0	0,0	0,2 *0.440*	VB..1102.. *VB..21.5.*
C3-SVJBL-22040-11	00094145	C3	32,0 *1.260*	22,0 *0.866*	40,0 *1.575*	170,0 *6.693*	165,0 *6.496*	93,0	0,0	0,0	0,2 *0.440*	VB..1102.. *VB..21.5.*
C4-SVJBR-27050-11	00094230	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	220,0 *8.661*	200,0 *7.874*	93,0	0,0	0,0	0,4 *0.880*	VB..1102.. *VB..21.5.*
C4-SVJBL-27050-11	00094227	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	220,0 *8.661*	200,0 *7.874*	93,0	0,0	0,0	0,4 *0.880*	VB..1102.. *VB..21.5.*
C4-SVJBR-27050-16	75069318	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	93,0	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C4-SVJBL-27050-16	75068368	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	93,0	0,0	0,0	0,4 *0.880*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVJBR-35060-16	75029329	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	93,0	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVJBL-35060-16	00094388	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	93,0	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVJBR-45065-16	00094332	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVJBL-45065-16	00094331	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	93,0	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

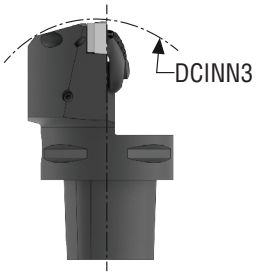
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C3..-11	CN6	1/4HEX-T07PX50	C02506-T07P	–	–
C4, C5..-11	CN7	1/4HEX-T07PX50	C02506-T07P	–	–
C4..-16	CN6	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507
C5, C6..-16	CN7	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507

Accessories

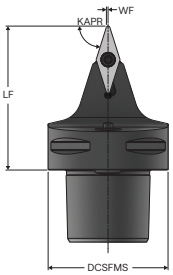
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C3..-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4, C5..-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5, C6..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SVVBN – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric/ Inch

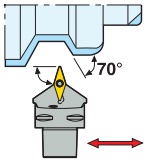




C.-SVVBN



KAPR = 72,5 °



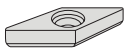
—Neutral version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SVVBN-00050-16	75069505	C4	40,0 *1.575*	0,6 *0.024*	50,0 *1.969*	165,0 *6.496*	72,5	0,0	0,0	0,3 *0.660*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVVBN-00060-16	00094309	C5	50,0 *1.969*	0,6 *0.024*	60,0 *2.362*	165,0 *6.496*	72,5	0,0	0,0	0,6 *1.320*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVVBN-00065-16	00094339	C6	63,0 *2.480*	0,6 *0.024*	65,0 *2.559*	165,0 *6.496*	72,5	0,0	0,0	0,9 *1.980*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

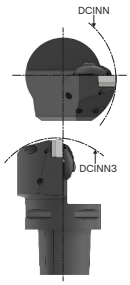
For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
C4	CN6	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507
C5	CN7	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507
C6	CN7	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507

Accessories

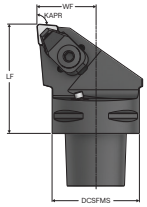
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C4	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C5	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C6	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-CCLNR/L – Toolholders for PCBN inserts CNGN, CNMN – Metric/ Inch

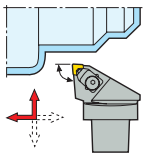




C.-CCLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 596, 622
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-CCLNR-27050-09	00042706	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	CN.N0903.. *CN.N32.*
C4-CCLNR-27050-12	00042743	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	CN..1204.. *CN..43.*
C4-CCLNL-27050-12	00042707	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	95,0	-6,0	-6,0	0,5 *1.100*	CN..1204.. *CN..43.*
C5-CCLNR-35060-09	00042745	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN.N0903.. *CN.N32.*
C5-CCLNL-35060-09	00042744	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN.N0903.. *CN.N32.*
C5-CCLNR-35060-12	00042747	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C5-CCLNL-35060-12	00042746	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	95,0	-6,0	-6,0	0,8 *1.760*	CN..1204.. *CN..43.*
C6-CCLNR-45065-12	00042752	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	-6,0	-6,0	1,4 *3.090*	CN..1204.. *CN..43.*
C6-CCLNL-45065-12	00042750	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	95,0	-6,0	-6,0	1,4 *3.090*	CN..1204.. *CN..43.*

Spare Parts, included in delivery

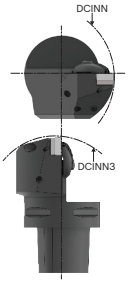
For	Cantilever clamp	Clamp key	Coolant nozzle	Insert shim	Pressure plate	Shim screw
						
C4..-09	CC17P-09	1/4HEX-H4.0X50	CN6	CCN090412	P1311-09	174.10-652-T07P
C4..-12	CC17P	1/4HEX-H4.0X50	CN6	CCN120312	P1311	F94009-T09P
C5, C6..-12	CC17P	1/4HEX-H4.0X50	CN8	CCN120312	P1311	F94009-T09P
C5..-09	CC17P-09	1/4HEX-H4.0X50	CN8	CCN090412	P1311-09	174.10-652-T07P

Accessories

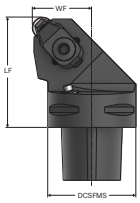
For	Bit holder	Shim key
		
C4..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
C4..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50
C5, C6..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50
C5..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50

C.-CRSNR/L – Toolholders for PCBN inserts RNGN, RNMN – Metric/ Inch

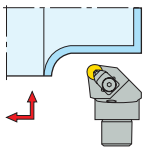




C.-CRSNR/L



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 12–13
—Shim 117.10–621 for insert RN.N1204.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-CRSNR-27050-09	00042755	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	45,0	0,0	-8,0	0,5 *1.100*	RN.N0903.. *RN.N32.*
C4-CRSNL-27050-09	00042754	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	45,0	0,0	-8,0	0,5 *1.100*	RN.N0903.. *RN.N32.*
C4-CRSNR-27050-12	00042758	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	165,0 *6.496*	45,0	0,0	-8,0	0,5 *1.100*	RN.N1203.. *RN.N42.*
C5-CRSNR-35060-09	00042762	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	-8,0	0,8 *1.760*	RN.N0903.. *RN.N32.*
C5-CRSNL-35060-09	00042761	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	-8,0	0,8 *1.760*	RN.N0903.. *RN.N32.*
C5-CRSNR-35060-12	00042764	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	-8,0	0,8 *1.760*	RN.N1203.. *RN.N42.*
C5-CRSNL-35060-12	00042763	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	165,0 *6.496*	45,0	0,0	-8,0	0,8 *1.760*	RN.N1203.. *RN.N42.*
C6-CRSNR-45065-09	00042766	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	-8,0	1,3 *2.870*	RN.N0903.. *RN.N32.*
C6-CRSNL-45065-09	00042765	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	-8,0	1,3 *2.870*	RN.N0903.. *RN.N32.*
C6-CRSNR-45065-12	00042768	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	-8,0	1,3 *2.870*	RN.N1203.. *RN.N42.*
C6-CRSNL-45065-12	00042767	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	121,0 *4.764*	165,0 *6.496*	45,0	0,0	-8,0	1,3 *2.870*	RN.N1203.. *RN.N42.*

Spare Parts, included in delivery

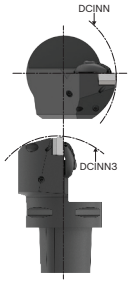
For	Cantilever clamp	Clamp key	Coolant nozzle	Insert shim	Pressure plate	Shim screw
						
C4..-09	CC17P-09	1/4HEX-H4.0X50	CN6	117.10-620	P1311-09	174.10-652-T07P
C4..-12	CC17P	1/4HEX-H4.0X50	CN6	117.10-622	P1311	F94009-T09P
C5..-09	CC17P-09	1/4HEX-H4.0X50	CN7	117.10-620	P1311-09	174.10-652-T07P
C5..-12	CC17P	1/4HEX-H4.0X50	CN7	117.10-622	P1311	F94009-T09P
C6..-09	CC17P-09	1/4HEX-H4.0X50	CN8	117.10-620	P1311-09	174.10-652-T07P
C6..-12	CC17P	1/4HEX-H4.0X50	CN8	117.10-622	P1311	F94009-T09P

Accessories

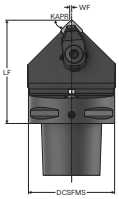
For	Bit holder	Shim key
		
C4..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
C4..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50
C5..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
C5..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50
C6..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
C6..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

C.-CSDNN – Toolholders for PCBN inserts SNGN, SNMN, SNUN – Metric/ Inch

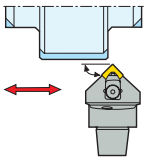




C.-CSDNN



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 605, 606
—For holder code key, see page(s) 12–13
—Shim 174.10-622 for insert SN.N1203.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-CSDNN-00060-12	00042773	C5	50,0 *1.969*	0,3 *0.012*	60,0 *2.362*	165,0 *6.496*	165,0 *6.496*	45,0	-6,0	-6,0	0,7 *1.540*	SN..1204.. *SN..43.*
C6-CSDNN-00065-12	00042774	C6	63,0 *2.480*	0,3 *0.012*	65,0 *2.559*	165,0 *6.496*	165,0 *6.496*	45,0	-6,0	-6,0	1,1 *2.430*	SN..1204.. *SN..43.*

Spare Parts, included in delivery

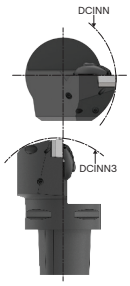
For	Cantilever clamp	Clamp key	Coolant nozzle	Insert shim	Pressure plate	Shim screw
						
..-12	CC20P	1/4HEX-H4.0X50	CN6	174.10-621	P1311	F94009-T09P

Accessories

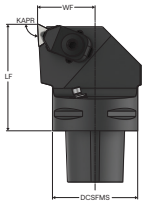
For	Bit holder	Shim key
		
..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

C.-CTJNR/L – Toolholders for PCBN inserts TNGN, TNGX, TNMN, TNMX – Metric/ Inch

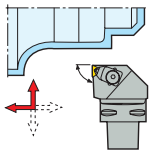




C.-CTJNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-CTJNR-27050-11	02545416	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	75,0 *2.953*	93,0	-6,0	-6,0	0,5 *1.100*	TN..1103.. *TN..22.*
C4-CTJNL-27050-11	02508823	C4	40,0 *1.575*	27,0 *1.063*	50,0 *1.969*	75,0 *2.953*	75,0 *2.953*	93,0	-6,0	-6,0	0,5 *1.100*	TN..1103.. *TN..22.*
C5-CTJNL-35060-11	02595995	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	95,0 *3.740*	95,0 *3.740*	93,0	-6,0	-6,0	1,0 *2.200*	TN..1103.. *TN..22.*

Spare Parts, included in delivery

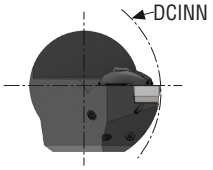
For	Cantilever clamp	Clamp key	Coolant nozzle	Insert shim	Pressure plate	Shim screw
						
C4	CC17P-06	1/4HEX-H4.0X50	CN6	CTN110308	P1311-06	CS2507-T07P
C5	CC17P-06	1/4HEX-H4.0X50	CN8	CTN110308	P1311-06	CS2507-T07P

Accessories

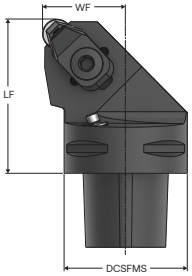
For	Bit holder	Shim key
		
C4	1/4HEX-S-HANDLE	1/4HEX-T07PX50
C5	1/4HEX-S-HANDLE	1/4HEX-T07PX50

C.-CRSNR/L-..C – Toolholders for ceramic inserts RNGN – Metric/ Inch

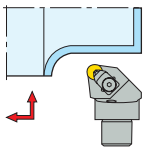




C.-CRSNR/L-..C



KAPR = 0,0 °



—Right-hand version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-CRSNR-35060-12C	02926924	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	250,0 *9.843*	0,0	-6,0	-6,0	0,9 *1.980*	RN..1207.. *RN..45.*
C5-CRSNL-35060-12C	02926925	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	250,0 *9.843*	0,0	-6,0	-6,0	0,9 *1.980*	RN..1207.. *RN..45.*
C6-CRSNR-45065-12C	02926926	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	325,0 *12.795*	0,0	-6,0	-6,0	1,5 *3.310*	RN..1207.. *RN..45.*
C6-CRSNL-45065-12C	02926927	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	325,0 *12.795*	0,0	-6,0	-6,0	1,4 *3.090*	RN..1207.. *RN..45.*

Spare Parts, included in delivery

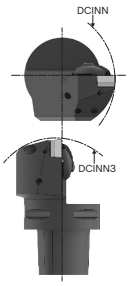
For	Clamp	Clamp key	Coolant nozzle	Insert shim	Pressure plate	Shim screw
						
C5	CC17P	1/4HEX-H4.0X50	CN2	CRN120400	P1311	L85013-T20P
C6	CC17P	1/4HEX-H4.0X50	CN2	CRN120400	P1311	L85013-T20P

Accessories

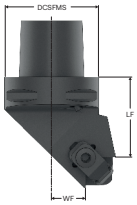
For	Bit holder	Insert shim	Shim key
			
C5	1/4HEX-S-HANDLE	CRN120800	1/4HEX-T20PX50
C6	1/4HEX-S-HANDLE	CRN120800	1/4HEX-T20PX50

C.-CXXXR/L – Toolholders for cassettes – Metric/ Inch





C..-CXXXR/L



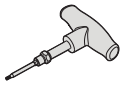
—Right-hand version shown
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	DCINN3	GAMO°	LAMS°	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			kg *lbs*
C5-CXXXR-35060-CT10	03300014	C5	50,0 *1.969*	18,0 *0.709*	43 *1.691*	95,0 *3.740*	170,0 *6.693*	-6,0	-6,0	0,7 *1.540*
C5-CXXXL-35060-CT10	03300009	C5	50,0 *1.969*	17,0 *0.669*	17 *0.669*	95,0 *3.740*	170,0 *6.693*	-6,0	-6,0	0,7 *1.540*
C6-CXXXR-45065-CT10	03300016	C6	63,0 *2.480*	17,0 *0.669*	17 *0.669*	120,0 *4.724*	180,0 *7.087*	-6,0	-6,0	1,3 *2.870*
C6-CXXXL-45065-CT10	03300015	C6	63,0 *2.480*	17,0 *0.669*	17 *0.669*	120,0 *4.724*	180,0 *7.087*	-6,0	-6,0	1,3 *2.870*

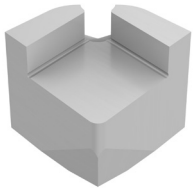
Spare Parts, included in delivery

For	Cassette screw	Clamp for insert size 12	Clamp key	Coolant nozzle	Key (L-style)	Pressure plate
						
C5	C05013-T20P	CC17P	1/4HEX-H4.0X50	CN6	1/4HEX-T20PX50	P1311
C6	C05013-T20P	CC17P	1/4HEX-H4.0X50	CN8	1/4HEX-T20PX50	P1311

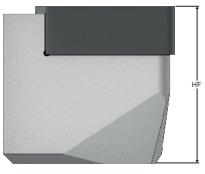
Accessories

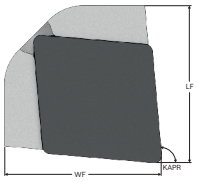
For	Bit holder	Clamp for insert size 09	Insert clamping torque	Torque key
				
C5	1/4HEX-S-HANDLE	CC20P	6.0NM	T00T-20P60
C6	1/4HEX-S-HANDLE	CC20P	6.0NM	T00T-20P60

CT-CCLNX – Cassettes for Seco-Capto™ holders – Metric/ Inch

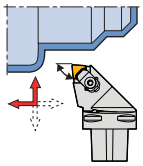


CT-CCLNX





KAPR = 95,0 °



—For inserts program, see page(s) 596, 622
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS

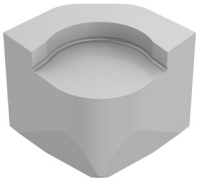


Designation	Item number	CT size	WF	LF	HF	KAPR°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*		kg *lbs*	
CT10-CCLNX-0903	03300028	CT10	17,0 *0.669*	17 *0.669*	15,5 *0.611*	95,0	0,1 *0.220*	CN.N0903.. *CN.N32.*
CT10-CCLNX-1204	03300023	CT10	17,0 *0.669*	17 *0.669*	15,5 *0.611*	95,0	0,1 *0.220*	CN..1204.. *CN..43.*
CT10-CCLNX-1207	03300024	CT10	17,0 *0.669*	17 *0.669*	15,5 *0.611*	95,0	0,1 *0.220*	CN.N1207.. *CN.N45.*

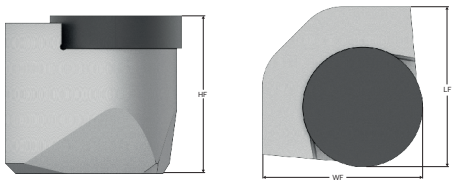
Accessories

For	Clamp for insert size 09	Clamp for insert size 12
		
...-09	CC20P	–
...-12	–	CC17P

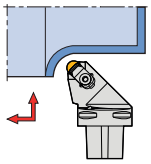
CT-CRSNX – Cassettes for Seco-Capto™ holders – Metric/ Inch



CT-CRSNX



KAPR = 45,0 °



—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

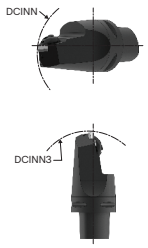
CTWS

Accessories

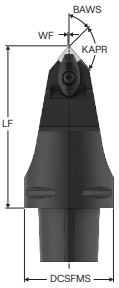
For	Clamp for insert size 09	Clamp for insert size 12
		
...-09	CC20P	–
...-12	–	CC17P

C.-DCMCN...JETI – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric/ Inch

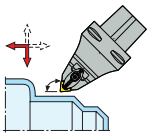




C.-DCMCN...JETI



KAPR = 95,0 °



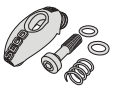
—Neutral version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-DCMCN-00090-12JETI	10189798	C6	✓	63,0 *2.480*	0,36 *0.014*	90,0 *3.543*	600,0 *23.622*	200,0 *7.874*	150,0 bar *2175,6*	95,0	0,0	0,0	1,5 *3.310*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

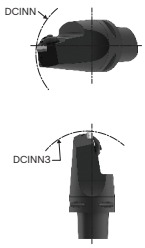
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
DCMCN	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS4X4	123.19-621	CA5008	S7111

Accessories

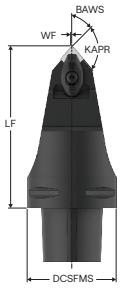
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Torque key
					
DCMCN	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS4X8	3.5NM	T00-15P35

C.-DCMNN...JETI – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch

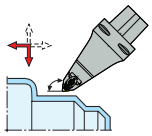




C.-DCMNN...JETI



KAPR = 95,0 °



CTWS



—Neutral version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C5-DCMNN-00115-12JETI	10189784	C5	Yes	50,0 *1.969*	0,36 *0.014*	115,0 *4.528*	200,0 *7.874*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,2 *2.650*	CN..1204.. *CN..43.*
C6-DCMNN-00090-12JETI	10189799	C6	Yes	63,0 *2.480*	0,36 *0.014*	90,0 *3.543*	200,0 *7.874*	140,0 *5.512*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,4 *3.090*	CN..1204.. *CN..43.*
C6-DCMNN-00115-12JETI	10189800	C6	Yes	63,0 *2.480*	0,36 *0.014*	115,0 *4.528*	200,0 *7.874*	160,0 *6.299*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,9 *4.190*	CN..1204.. *CN..43.*
C8-DCMNN-00150-12JETI	10189792	C8	Yes	80,0 *3.150*	0,36 *0.014*	150,0 *5.906*	240,0 *9.449*	200,0 *7.874*	150,0 bar *2175,6*	95,0	-6,0	-6,0	3,9 *8.600*	CN..1204.. *CN..43.*
C8-DCMNN-00150-16JETI	10189806	C8	Yes	80,0 *3.150*	0,36 *0.014*	150,0 *5.906*	240,0 *9.449*	215,0 *8.465*	150,0 bar *2175,6*	95,0	-6,0	-6,0	4,1 *9.040*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

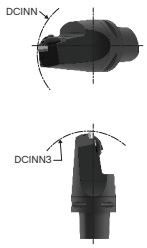
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
...-12	1/4HEX-T15PX50	L85021-T15P	CN17L00R-2-SET	P6SS4X4	DCO120310	C04008-T15P	S7111
...-16	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS4X4	DCN160616	C05010-T20P	S7111

Accessories

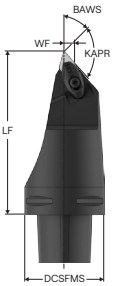
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Torque key
						
...-12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS4X8	3.5NM	T00-15P35
...-16	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS4X8	3.5NM	T00-15P35

C.-DDMNR/L...JETI – Toolholders for inserts DNGA, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch

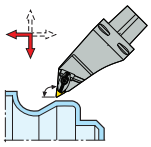




C.-DDMNR/L...JETI



KAPR = 95,0 °



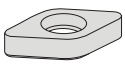
—Left-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS mm inch	WF mm inch	LF mm inch	DCINN mm inch	DCINN3 mm inch	CP bar psi	KAPR°	GAMO°	LAMS°	Weight kg lbs	CTWS
C5-DDMNL-00115-1504JETI	10189795	C5	Yes	50,0 *1.969*	0,0 –	115,0 *4.528*	125,0 *4.921*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C5-DDMNL-00115-15JETI	10189796	C5	Yes	50,0 *1.969*	0,0 –	115,0 *4.528*	125,0 *4.921*	150,0 *5.906*	150,0 bar *2175,6*	95,0	-6,0	-6,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNR-00130-1504JETI	10189803	C6	Yes	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNL-00130-1504JETI	10189801	C6	Yes	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNR-00130-15JETI	10189787	C6	Yes	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNL-00130-15JETI	10189785	C6	Yes	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNL-33120-1504JETI	10189802	C6	Yes	63,0 *2.480*	33,0 *1.299*	120,0 *4.724*	160,0 *6.299*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNL-33120-15JETI	10189786	C6	Yes	63,0 *2.480*	33,0 *1.299*	120,0 *4.724*	175,0 *6.890*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-6,0	-6,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDMNL-00160-1504JETI	10189793	C8	Yes	80,0 *3.150*	0,0 –	160,0 *6.299*	175,0 *6.890*	220,0 *8.661*	150,0 bar *2175,6*	95,0	-6,0	-6,0	4,0 *8.820*	DN..1504-DN..1506* *DN..43-DN..44**
C8-DDMNL-00160-15JETI	10189804	C8	Yes	80,0 *3.150*	0,0 –	160,0 *6.299*	175,0 *6.890*	220,0 *8.661*	150,0 bar *2175,6*	95,0	-6,0	-6,0	4,0 *8.820*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

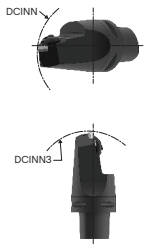
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
DDMNL..-15	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150416	C04008-T15P	S7111
DDMNL..-1504	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2L-SET	P6SS4X4	DDN150616	C04008-T15P	S7111
DDMNR..-15	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150416	C04008-T15P	S7111
DDMNR..-1504	1/4HEX-T15PX50	L85021-T15P	CN17U10S-2R-SET	P6SS4X4	DDN150616	C04008-T15P	S7111

Accessories

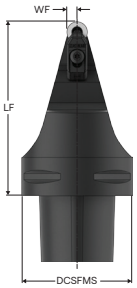
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Torque key
					
DDMNL..-15	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS4X8	3.5NM	T00-15P35
DDMNL..-1504	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS4X8	3.5NM	T00-15P35
DDMNR..-15	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS4X8	3.5NM	T00-15P35
DDMNR..-1504	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS4X8	3.5NM	T00-15P35

C.-DRDCN...JET – Toolholders for inserts RCGT, RCMT – Metric/ Inch

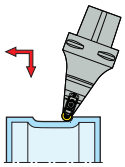




C.-DRDCN...JETI



KAPR



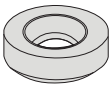
CTWS



—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	CDX	DCINN	DCINN3	CP	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*			kg *lbs*	
C6-DRDCN-00100-10JETI	10228942	C6	✓	63,0 *2.480*	5,0 *0.197*	100,0 *3.937*	2,68 *0.106*	–	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,5 *3.310*	RC..10T3..
C6-DRDCN-00100-12JETI	10228946	C6	✓	63,0 *2.480*	6,0 *0.236*	100,0 *3.937*	3,26 *0.128*	–	165,0 *6.496*	150,0 bar *2175,6*	0,0	0,0	1,5 *3.310*	RC..1204M0 *RC..43M0*
C6-DRDCN-00100-16JETI	10228951	C6	✓	63,0 *2.480*	8,0 *0.315*	100,0 *3.937*	4,49 *0.177*	–	190,0 *7.480*	150,0 bar *2175,6*	0,0	0,0	1,6 *3.530*	RC..1606..
C8-DRDCN-00160-16JETI	10228956	C8	✓	80,0 *3.150*	8,0 *0.315*	160,0 *6.299*	4,49 *0.177*	–	220,0 *8.661*	150,0 bar *2175,6*	0,0	0,0	4,0 *8.820*	RC..1606..

Spare Parts, included in delivery

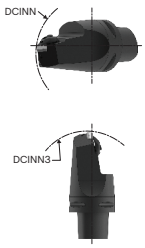
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

Accessories

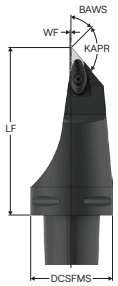
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	T00-10P	9/64SMS875	T00-10P20
..-12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	9/64SMS875	T00-15P35
..-16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	T00-15P	1/4HEX-H5.0X50	T00-15P35

C.-DVMBR/L...JETI – Toolholders for inserts VBMT, VBGT, VBGW, VBMW, VCGT – Metric/ Inch

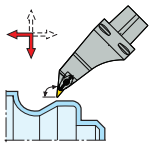




C.-DVMBR/L...JETI



KAPR = 95,0 °



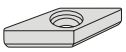
CTWS



—Left-hand version shown
—For inserts program, see page(s) 583, 584, 613, 621
—For holder code key, see page(s) 12-13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C5-DVMBL-00115-16JETI	10189797	C5	✓	50,0 *1.969*	0,0 –	115,0 *4.528*	125,0 *4.921*	150,0 *5.906*	150,0 bar *2175,6*	95,0	0,0	0,0	1,1 *2.430*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVMBR-00130-16JETI	10189790	C6	✓	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	0,0	0,0	1,8 *3.970*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVMBL-00130-16JETI	10189788	C6	✓	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	0,0	0,0	1,8 *3.970*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-DVMBL-33130-16JETI	10189789	C6	✓	63,0 *2.480*	33,0 *1.299*	130,0 *5.118*	160,0 *6.299*	175,0 *6.890*	150,0 bar *2175,6*	95,0	0,0	0,0	2,3 *5.070*	VB..1604-VC..1604 *VB..33.-VC..33.*
C8-DVMBR-00160-16JETI	10189805	C8	✓	80,0 *3.150*	0,0 –	160,0 *6.299*	170,0 *6.693*	215,0 *8.465*	150,0 bar *2175,6*	95,0	0,0	0,0	3,8 *8.380*	VB..1604-VC..1604 *VB..33.-VC..33.*
C8-DVMBL-00160-16JETI	10189794	C8	✓	80,0 *3.150*	0,0 –	160,0 *6.299*	170,0 *6.693*	215,0 *8.465*	150,0 bar *2175,6*	95,0	0,0	0,0	3,8 *8.380*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

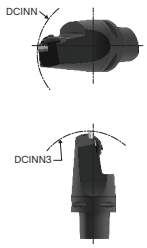
For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
DVMBL	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS4X4	171.19-621	C94006-T15P	S5808
DVMBL	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-621	C94006-T15P	S5808
DVMBR	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-621	C94006-T15P	S5808

Accessories

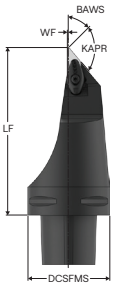
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
DVMBL	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20
DVMBR	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

C.-DVMNR/L...JETI – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric/ Inch

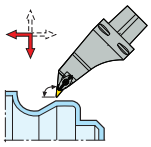




C.-DVMNR/L...JETI



KAPR = 95,0 °



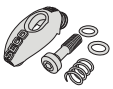
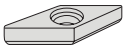
—Left-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 12–13
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	Duo	DCSFMS	WF	LF	DCINN	DCINN3	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
C6-DVMNL-00130-16JETI	10189791	C6	✓	63,0 *2.480*	0,0 –	130,0 *5.118*	140,0 *5.512*	175,0 *6.890*	150,0 bar *2175,6*	95,0	-4,5	-13,5	1,9 *4.190*	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
DVMNL	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2R-SET	P6SS3X3	171.19-620	C94006-T15P	S5808

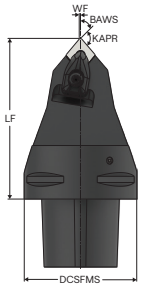
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Shim key	Torque key
					
DVMNL	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	1/4HEX-T15PX50	T00-10P20

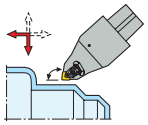
C.-DCMNN..-M – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric/ Inch



C.-DCMNN..-M



KAPR = 95,0 °



CTWS



—Neutral version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-DCMNN-00090-12-M	02588065	C6	63,0 *2.480*	0,0 *0.0*	90 *3.543*	95,0	45,0	-6,0	-6,0	1,5 *3.310*	CN..1204.. *CN..43.*
C6-DCMNN-00115-12-M	02588066	C6	63,0 *2.480*	0,0 *0.0*	115 *4.528*	95,0	45,0	-6,0	-6,0	2,1 *4.630*	CN..1204.. *CN..43.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
00090-12	FP2012	L85021-T15P	CN6	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
00115-12	FP2012	L85021-T15P	CN8	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912

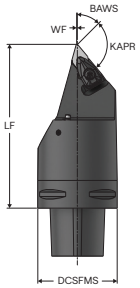
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
00090-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
00115-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

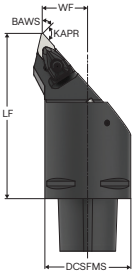
C.-DDMNL – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch



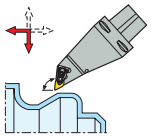
C.-...-00130..-M



C.-...-33120..-M



KAPR = 93,0 °



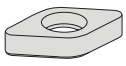
—Left-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 12–13
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-DDMNL-00130-15-M	02588067	C6	63,0 *2.480*	0,0 *0.0*	130 *5.118*	93,0	45,0	-6,0	-6,0	2,3 *5.070*	DN..1504-DN..1506* *DN..43-DN..44**
C6-DDMNL-33120-15-M	02649370	C6	63,0 *2.480*	33,0 *1.299*	120 *4.724*	93,0	45,0	-6,0	-6,0	2,2 *4.850*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
00130-15	FP2012	L85021-T15P	CN6	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
33120-15	FP2012	L85021-T15P	CN8	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912

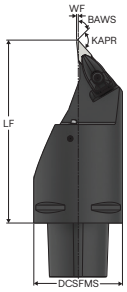
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
00130-15	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
33120-15	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

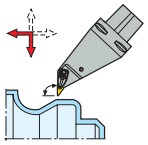
C.-DVMNL..-M – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric/ Inch



C.-DVMNL..-M



KAPR = 93,0 °



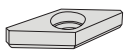
CTWS



—Left-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-DVMNL-00130-16-M	02588068	C6	63,0 *2.480*	0,0 *0.0*	130 *5.118*	93,0	45,0	-4,5	-13,5	2,2 *4.850*	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Coolant nozzle	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...-16	FP2012	L85021-T15P	CN6	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912

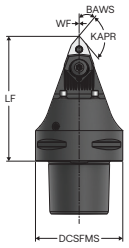
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...-16	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35

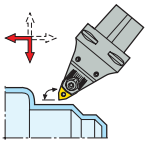
C.-PWLNN – Toolholders for inserts WNGA, WNMA, WNMG, WNMM – Metric/ Inch



C.-PWLNN



KAPR = 95,0 °



CTWS



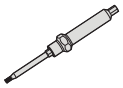
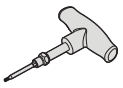
—Neutral version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 12–13
—Wedge WNW08 for insert WNMM08.., to be ordered separately
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-PWLNN-00090-08	02509282	C6	63,0 *2.480*	0,0 *0.0*	90 *3.543*	95,0	45,0	-5,5	-6,5	1,4 *3.090*	WN..0804.. *WN..43.*

Spare Parts, included in delivery

For	Coolant nozzle	Insert shim	Setting screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
							
...-08	CN8	WAE080412	L82511-T07P	PP2015-1-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P

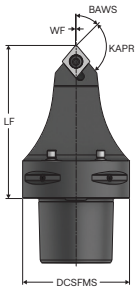
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50

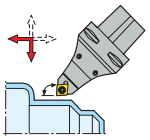
C.-SCMCN – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch



C.-SCMCN



KAPR = 95,0 °



—Neutral version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-SCMCN-00090-12	02437226	C6	63,0 *2.480*	0,0 *0.0*	90 *3.543*	95,0	45,0	0,0	0,0	1,2 *2.650*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
...-12	CN8	1/4HEX-T15PX50	C05012-T15P	123.19-621	CA5008

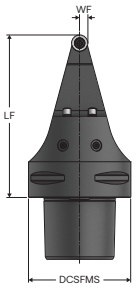
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-12	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50

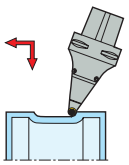
C.-SRDCN – Toolholders for inserts RCMT – Metric/ Inch



C.-SRDCN



KAPR = 45,0 °



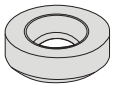
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 12–13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS mm *inch*	WF mm *inch*	LF mm *inch*	KAPR°	BAWS°	GAMO°	LAMS°	Weight kg *lbs*	CTWS
C6-SRDCN-00100-10	02509285	C6	63,0 *2.480*	5,0 *0.197*	100 *3.937*	45,0	–	0,0	0,0	1,5 *3.310*	RC..10T3..
C6-SRDCN-00100-16	02509286	C6	63,0 *2.480*	8,0 *0.315*	100 *3.937*	45,0	–	0,0	0,0	1,5 *3.310*	RC..1606..

Spare Parts, included in delivery

For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
...-10	CN8	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3510
...-16	CN8	1/4HEX-T20PX50	C05018-T20P	SRN16T3M0	CA5015

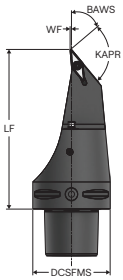
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...-16	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50

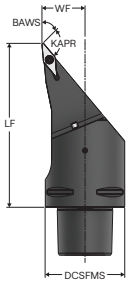
C.-SVMBL – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric/ Inch



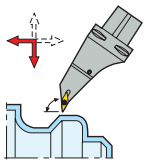
C.-SVMBL-00130



C.-SVMBL-33130



KAPR = 95,0 °



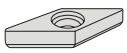
—Left-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 12-13
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	KAPR°	BAWS°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*					kg *lbs*	
C6-SVMBL-00130-16	02509287	C6	63,0 *2.480*	1,1 *0.043*	130 *5.118*	95,0	45,0	0,0	0,0	1,9 *4.190*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVMBL-33130-16	02435740	C6	63,0 *2.480*	33,0 *1.299*	130 *5.118*	95,0	45,0	0,0	0,0	2,1 *4.630*	VB..1604-VC..1604 *VB..33.-VC..33.*

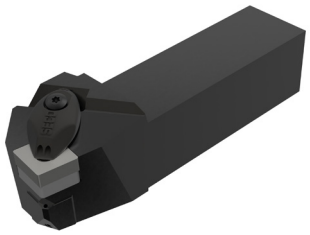
Spare Parts, included in delivery

For	Coolant nozzle	Insert key	Insert screw	Insert shim	Shim screw
					
...-16	CN8	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3510

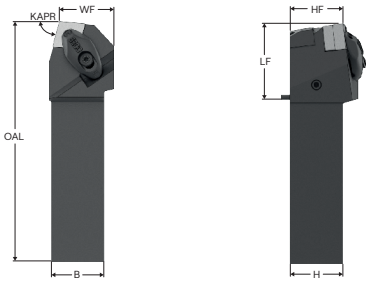
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

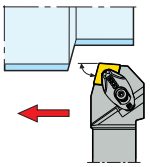
DCBNR/L...JETI – Toolholders for inserts CNMA, CNMG, CNMM – Metric



DCBNR/L...JETI



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DCBNR3232X16JETI	03282306	✓	32	32	145	46	27,0	32,0	200,0 bar	75,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*
DCBNL3232X16JETI	03282305	✓	32	32	145	46	27,0	32,0	200,0 bar	75,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*

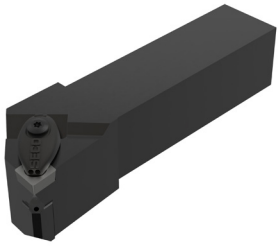
Spare Parts, included in delivery

For	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
								
...16	L85021-T15P	CN21L00R-2-SET	P6SS3X3	DCN160616	JET-P1/8-5MM	1/4HEX-T15PX50	C05010-T20P	S7111

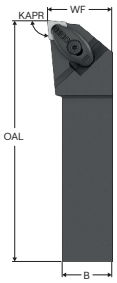
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
								
...16	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-T20PX50	T00-15P35

DCLCR/L...JETI – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric

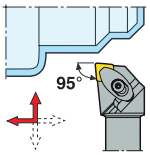


DCLCR/L...JETI





KAPR = 95,0 °



CTWS



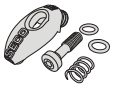
—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DCLCR2020X09JETI	03282310	✓	20	20	100	36	27,0	20,0	200,0 bar	95,0	0,0	0,0	0,4	CC..09T3.. *CC..32.5.*
DCLCR2525X09JETI	03282311	✓	25	25	120	36	32,0	25,0	200,0 bar	95,0	0,0	0,0	0,6	CC..09T3.. *CC..32.5.*
DCLCL2020X09JETI	03282307	✓	20	20	100	36	27,0	20,0	200,0 bar	95,0	0,0	0,0	0,4	CC..09T3.. *CC..32.5.*
DCLCL2525X09JETI	03282308	✓	25	25	120	36	32,0	25,0	200,0 bar	95,0	0,0	0,0	0,6	CC..09T3.. *CC..32.5.*
DCLCR2525X12JETI	03282312	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	0,0	0,0	0,7	CC..1204.. *CC..43.*
DCLCL2525X12JETI	03282309	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	0,0	0,0	0,7	CC..1204.. *CC..43.*

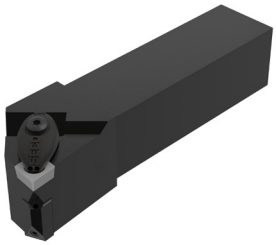
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
...09	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	–	JET-P1/8-5MM	–	–	S5808
...12	–	L85021-T15P	CP17U00S-2-SET	P6SS3X3	123.19-621	JET-P1/8-5MM	1/4HEX-T15PX50	CA5008	S7111

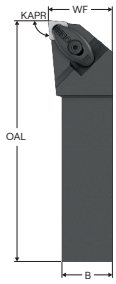
Accessories

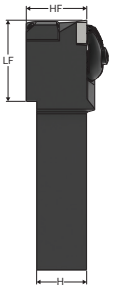
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
							
...09	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	–	T00-10P20
...12	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-H5.0X50	T00-15P35

DCLCR/L...JETI – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Inch

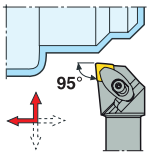


DCLCR/L...JETI





KAPR = 95,0 °



CTWS



– Right-hand version shown
– For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
– For suitable adapter, see page(s) 989-1000
– For holder code key, see page(s) 18-19
– For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
– For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DCLCR-12-3XJETI	03282256	✓	0.750	0.750	3.740	1.220	1.059	0.750	2900,8	95,0	0,0	0,0	0.660	CC..09T3.. *CC..32.5.*
DCLCR-16-3XJETI	03282257	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	0,0	0,0	1.320	CC..09T3.. *CC..32.5.*
DCLCL-12-3XJETI	03282253	✓	0.750	0.750	3.740	1.220	1.059	0.750	2900,8	95,0	0,0	0,0	0.660	CC..09T3.. *CC..32.5.*
DCLCL-16-3XJETI	03282255	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	0,0	0,0	1.320	CC..09T3.. *CC..32.5.*
DCLCR-12-4XJETI	03284736	✓	0.750	0.750	4.173	1.654	1.059	0.750	2900,8	95,0	0,0	0,0	0.880	CC..1204.. *CC..43.*
DCLCR-20-4XJETI	03282258	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	95,0	0,0	0,0	2.430	CC..1204.. *CC..43.*
DCLCL-12-4XJETI	03282254	✓	0.750	0.750	4.173	1.654	1.059	0.750	2900,8	95,0	0,0	0,0	0.880	CC..1204.. *CC..43.*
DCLCL-20-4XJETI	03284737	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	95,0	0,0	0,0	2.430	CC..1204.. *CC..43.*

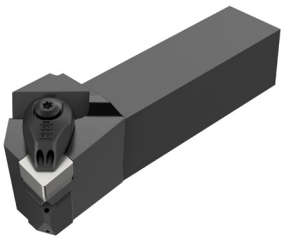
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
..-12-3	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	–	JET-P1/8-5MM	–	S5808
..-16-3	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	–	JET-P1/8-5MM	–	S5808
..L-12-4	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS4X4	123.19-621	JET-P1/8-5MM	CA5008	S7111
..L-20-4	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS3X3	123.19-621	JET-P1/8-5MM	CA5008	S7111
..R-12-4	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS4X4	123.19-621	JET-P1/8-5MM	CA5008	S7111
..R-20-4	1/4HEX-T15PX50	L85021-T15P	CP17U00S-2-SET	P6SS3X3	123.19-621	JET-P1/8-5MM	–	CA5008

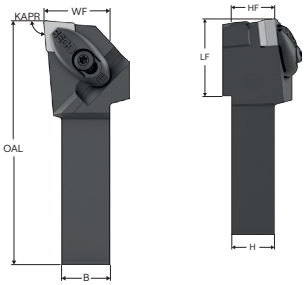
Accessories

For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
							
..-12-3	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	–	T00-10P20
..-16-3	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	–	T00-10P20
..L-12-4	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-H5.0X50	T00-15P35
..L-20-4	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-H5.0X50	T00-15P35
..R-12-4	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-H5.0X50	T00-15P35
..R-20-4	1/4HEX-S-HANDLE	CP17L00R-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-H5.0X50	T00-15P35

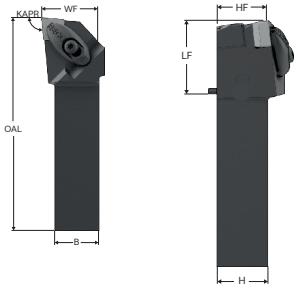
DCLNR/L...JETI – Toolholders for inserts CNGA, CNGG, CNGM, CNMA, CNMG, CNMM – Metric



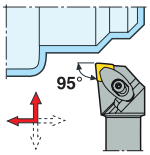
DCLNR/L2020...JETI



DCLNR/L2525/3232...JETI



KAPR = 95,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595, 616
–For suitable adapter, see page(s) 989-1000
–For holder code key, see page(s) 16-17
–For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
–For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DCLNR2020X12JETI	03213106	✓	20	20	100	36	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
DCLNR2525X12JETI	03213107	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	CN..1204.. *CN..43.*
DCLNR3232X12JETI	03282315	✓	32	32	140	41	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,2	CN..1204.. *CN..43.*
DCLNL2020X12JETI	03213104	✓	20	20	100	36	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
DCLNL2525X12JETI	03213105	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	CN..1204.. *CN..43.*
DCLNL3232X12JETI	03282313	✓	32	32	140	41	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,2	CN..1204.. *CN..43.*
DCLNR3232X16JETI	03282316	✓	32	32	139	40	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*
DCLNL3232X16JETI	03282314	✓	32	32	139	40	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*

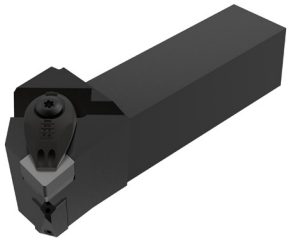
Spare Parts, included in delivery

For	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
								
20/25	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DCO120310	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
32...12	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DCO120310	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
32...16	L85021-T15P	CN21L00R-2-SET	P6SS3X3	DCN160616	JET-P1/8-5MM	1/4HEX-T15PX50	C05010-T20P	S7111

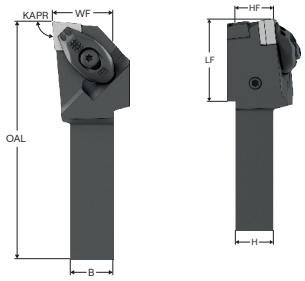
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
								
20/25	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	–	T00-15P35
32...12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	–	T00-15P35
32...16	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-T20PX50	T00-15P35

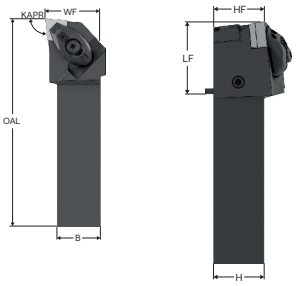
DCLNR/L...JETI – Toolholders for inserts CNGA, CNGG, CNGM, CNMA, CNMG, CNMM – Inch



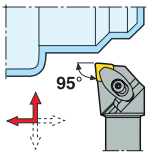
DCLNR/L0.75...JETI



DCLNR/L1.00/1.25...JETI



KAPR = 95,0 °



CTWS



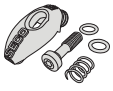
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595, 616
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DCLNR-12-4XJETI	03282262	✓	0.750	0.750	4.134	1.614	1.059	0.750	2900,8	95,0	-6,0	-6,0	0.880	CN..1204.. *CN..43.*
DCLNR-16-4XJETI	03282263	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.540	CN..1204.. *CN..43.*
DCLNR-20-4XJETI	03282264	✓	1.250	1.250	5.315	1.417	1.500	1.250	2900,8	95,0	-6,0	-6,0	2.430	CN..1204.. *CN..43.*
DCLNL-12-4XJETI	03282259	✓	0.750	0.750	4.134	1.614	1.059	0.750	2900,8	95,0	-6,0	-6,0	0.880	CN..1204.. *CN..43.*
DCLNL-16-4XJETI	03282260	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.540	CN..1204.. *CN..43.*
DCLNL-20-4XJETI	03282261	✓	1.250	1.250	5.315	1.417	1.500	1.250	2900,8	95,0	-6,0	-6,0	2.430	CN..1204.. *CN..43.*

Spare Parts, included in delivery

For	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
								
..-12-4	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DCO120310	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
..-16-4	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DCO120310	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
..-20-4	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DCO120310	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111

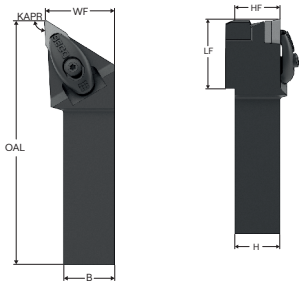
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
							
..-12-4	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35
..-16-4	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35
..-20-4	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

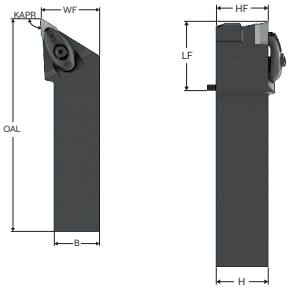
DDJCR/L...JETI – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric



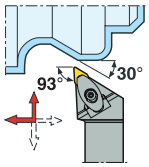
DDJCR/L2020...JETI



DDJCR/L2525...JETI



KAPR = 93,0 °



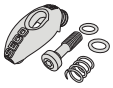
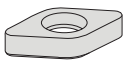
CTWS



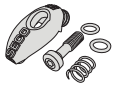
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DDJCR2020X11JETI	03213110	✓	20	20	95	31	27,2	20,0	200,0 bar	93,0	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
DDJCR2525X11JETI	03213111	✓	25	25	117	33	32,2	25,0	200,0 bar	93,0	0,0	0,0	0,6	DC..11T3.. *DC..32.5.*
DDJCL2020X11JETI	03213108	✓	20	20	95	31	27,2	20,0	200,0 bar	93,0	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
DDJCL2525X11JETI	03213109	✓	25	25	117	33	32,2	25,0	200,0 bar	93,0	0,0	0,0	0,6	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
...11	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	126.19-620	JET-P1/8-5MM	C94006-T15P	S5808

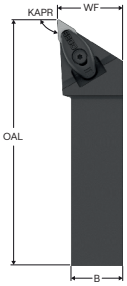
Accessories

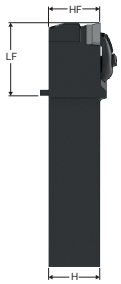
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
							
...11	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

DDJCR/L...JETI – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Inch

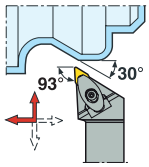


DDJCR/L...JETI





KAPR = 93,0 °



CTWS



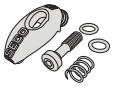
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DDJCR-12-3XJETI	03282267	✓	0.750	0.750	3.740	1.220	1.051	0.750	2900,8	93,0	0,0	0,0	1.100	DC..11T3.. *DC..32.5.*
DDJCR-16-3XJETI	03282268	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	93,0	0,0	0,0	1.320	DC..11T3.. *DC..32.5.*
DDJCL-12-3XJETI	03282265	✓	0.750	0.750	3.740	1.220	1.051	0.750	2900,8	93,0	0,0	0,0	0.660	DC..11T3.. *DC..32.5.*
DDJCL-16-3XJETI	03282266	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	93,0	0,0	0,0	1.320	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
..-12-3	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	126.19-620	JET-P1/8-5MM	C94006-T15P	S5808
..-16-3	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	P6SS3X3	126.19-620	JET-P1/8-5MM	C94006-T15P	S5808

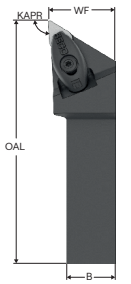
Accessories

For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
							
..-12-3	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
..-16-3	1/4HEX-S-HANDLE	CP14L00R-2-SET	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

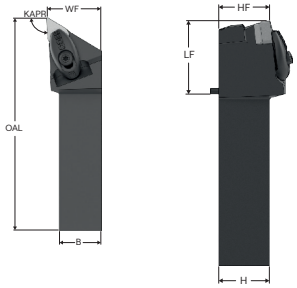
DDJNR/L...JETI – Toolholders for inserts DNGA, DNGM, DNMA, DNMM, DNMU, DNMX – Metric



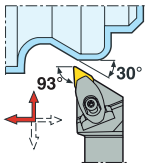
DDJNR/L2020...JETI



DDJNR/L2525/3232...JETI



KAPR = 93,0 °



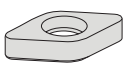
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DDJNR2020X11JETI	03213114	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDJNR2525X11JETI	03213115	✓	25	25	120	36	32,2	25,0	200,0 bar	93,0	-6,0	-6,0	0,6	DNMU1104.. *DNMU33.*
DDJNL2020X11JETI	03213112	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDJNL2525X11JETI	03213113	✓	25	25	120	36	32,2	25,0	200,0 bar	93,0	-6,0	-6,0	0,6	DNMU1104.. *DNMU33.*
DDJNR2020X15JETI	03213118	✓	20	20	105	41	27,2	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR2525X15JETI	03213119	✓	25	25	127	43	32,2	25,0	200,0 bar	93,0	-6,0	-6,0	0,6	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR3232X15JETI	03282318	✓	32	32	145	46	40,0	32,0	200,0 bar	93,0	-6,0	-6,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL2020X15JETI	03213116	✓	20	20	105	41	27,2	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL2525X15JETI	03213117	✓	25	25	127	43	32,2	25,0	200,0 bar	93,0	-6,0	-6,0	0,6	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL3232X15JETI	03282317	✓	32	32	145	46	40,0	32,0	200,0 bar	93,0	-6,0	-6,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
L-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2L-SET	P6SS3X3	DDN110310	JET-P1/8-5MM	–	C03007-T09P	S5808
L-15	–	L85021-T15P	CN17U10S-2L-SET	P6SS3X3	DDN150416	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
R-11	1/4HEX-T10PX50	L84017-T10P	CX14U10S-2R-SET	P6SS3X3	DDN110310	JET-P1/8-5MM	–	C03007-T09P	S5808
R-15	–	L85021-T15P	CN17U10S-2R-SET	P6SS3X3	DDN150416	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111

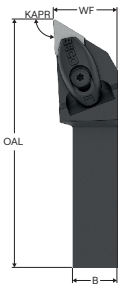
Accessories

For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
						
L-11	1/4HEX-S-HANDLE	–	P6SS3X5	2.0NM	P6SS6X6	T00-10P20
L-15	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35
R-11	1/4HEX-S-HANDLE	–	P6SS3X5	2.0NM	P6SS6X6	T00-10P20
R-15	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

DDJNR/L...JETI – Toolholders for inserts DNGA, DNGM, DNMA, DNMM, DNMU, DNMX – Inch



DDJNR/L0.75...JETI



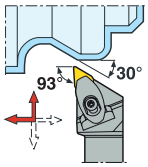


DDJNR/L1.00/1.25...JETI





KAPR = 93,0 °



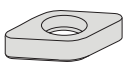
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DDJNR-12-4XJETI	03282272	✓	0.750	0.750	4.134	1.614	1.059	0.750	2900,8	93,0	-6,0	-6,0	0.880	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR-16-4XJETI	03282273	✓	1.000	1.000	5.000	1.693	1.260	1.000	2900,8	93,0	-6,0	-6,0	1.540	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR-20-4XJETI	03282274	✓	1.250	1.250	5.709	1.811	1.500	1.250	2900,8	93,0	-6,0	-6,0	2.650	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-12-4XJETI	03282269	✓	0.750	0.750	4.134	1.614	1.059	0.750	2900,8	93,0	-6,0	-6,0	0.880	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-16-4XJETI	03282270	✓	1.000	1.000	5.000	1.693	1.260	1.000	2900,8	93,0	-6,0	-6,0	1.540	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-20-4XJETI	03282271	✓	1.250	1.250	5.709	1.811	1.500	1.250	2900,8	93,0	-6,0	-6,0	2.430	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
								
..-20-4	L85021-T15P	CN17U10S-2L-SET	P6SS3X3	DDN150616	JET-P1/8-5MM	1/4HEX-T15PX50	C04011-T15P	S7111
..L-12/16-4	L85021-T15P	CN17U10S-2L-SET	P6SS3X3	DDN150616	JET-P1/8-5MM	1/4HEX-T15PX50	C04011-T15P	S7111
..R-12/16-4	L85021-T15P	CN17U10S-2R-SET	P6SS3X3	DDN150616	JET-P1/8-5MM	1/4HEX-T15PX50	C04011-T15P	S7111

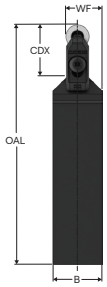
Accessories

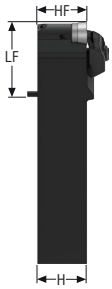
For	Bit holder	Coolant kit R-Roughing	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
						
..-20-4	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35
..L-12/16-4	1/4HEX-S-HANDLE	CN17L10R-2L-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35
..R-12/16-4	1/4HEX-S-HANDLE	CN17L10R-2R-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

DRDCN...JET – Toolholders for inserts RCGT, RCMT – Metric

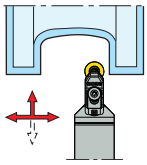


DRDCN...JETI





KAPR



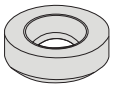
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	Duo	H	B	LF	WF	HF	CDX	CP	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar			kg	
DRDCN2020X10JETI	10228959	✓	20	20	38	15,0	20,0	25,0	275,0 bar	0,0	0,0	0,3	RC..10T3..
DRDCN2525X10JETI	10228965	✓	25	25	37	17,5	25,0	25,0	275,0 bar	0,0	0,0	0,6	RC..10T3..
DRDCN2020X12JETI	10228962	✓	20	20	41	16,0	20,0	25,0	275,0 bar	0,0	0,0	0,3	RC..1204M0 *RC..43M0*
DRDCN2525X12JETI	10228968	✓	25	25	37	18,5	25,0	25,0	275,0 bar	0,0	0,0	0,6	RC..1204M0 *RC..43M0*
DRDCN3232X12JETI	10228971	✓	32	32	46	22,0	32,0	32,0	275,0 bar	0,0	0,0	1,0	RC..1204M0 *RC..43M0*
DRDCN3232X16JETI	10228974	✓	32	32	46	24,0	32,0	35,0	275,0 bar	0,0	0,0	1,0	RC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
...10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
...12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
...16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

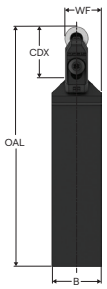
Accessories

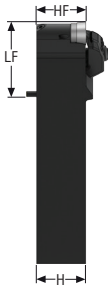
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Replacement blade	Shim key	Torque key
							
...10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P	9/64SMS875	T00-10P20
...12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	9/64SMS875	T00-15P35
...16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	1/4HEX-H5.0X50	T00-15P35

DRDCN...JET – Toolholders for inserts RCGT, RCMT – Inch



DRDCN...JETI





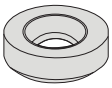
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18–19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	Duo	H	B	LF	WF	HF	CDX	CP	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi			lbs	
DRDCN-12-10JETI	10228977	✓	0.750	0.750	1.496	0.572	0.750	0.984	3988,5	0,0	0,0	0.660	RC..10T3..
DRDCN-12-12JETI	10228980	✓	0.750	0.750	1.614	0.611	0.750	0.984	3988,5	0,0	0,0	0.660	RC..1204M0 *RC..43M0*
DRDCN-16-10JETI	10228983	✓	1.000	1.000	1.457	0.697	1.000	0.984	3988,5	0,0	0,0	1.320	RC..10T3..
DRDCN-16-12JETI	10228986	✓	1.000	1.000	1.457	0.736	1.000	0.984	3988,5	0,0	0,0	1.320	RC..1204M0 *RC..43M0*
DRDCN-20-12JETI	10228989	✓	1.250	1.250	1.811	0.861	1.250	1.260	3988,5	0,0	0,0	2.200	RC..1204M0 *RC..43M0*
DRDCN-20-16JETI	10228992	✓	1.250	1.250	1.811	0.940	1.250	1.378	3988,5	0,0	0,0	2.200	RC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

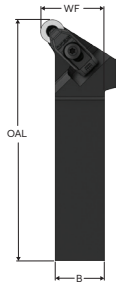
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Replacement blade	Shim key	Torque key
							
..-10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P	9/64SMS875	T00-10P20
..-12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	9/64SMS875	T00-15P35
..-16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	1/4HEX-H5.0X50	T00-15P35

DRSCR/L...JETI – Toolholders for inserts RCGT, RCMT – Metric

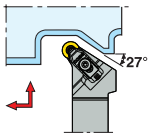


DRDCR/L...JETI





KAPR



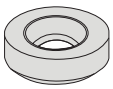
–Right-hand version shown
–For inserts program, see page(s) 564, 565
–For holder code key, see page(s) 16-17
–For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	Duo	H	B	LF	WF	HF	CDX	CP	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar			kg	
DRSCR2020X10JETI	10228960	✓	20	20	36	25,0	20,0	3,1	275,0 bar	0,0	0,0	0,4	RC..10T3..
DRSCR2525X10JETI	10228966	✓	25	25	36	32,0	25,0	3,1	275,0 bar	0,0	0,0	0,6	RC..10T3..
DRSCL2020X10JETI	10228961	✓	20	20	36	25,0	20,0	3,1	275,0 bar	0,0	0,0	0,4	RC..10T3..
DRSCL2525X10JETI	10228967	✓	25	25	36	32,0	25,0	3,1	275,0 bar	0,0	0,0	0,6	RC..10T3..
DRSCR2020X12JETI	10228963	✓	20	20	38	27,0	20,0	3,1	275,0 bar	0,0	0,0	0,4	RC..1204M0 *RC..43M0*
DRSCR2525X12JETI	10228969	✓	25	25	38	32,0	25,0	3,1	275,0 bar	0,0	0,0	0,6	RC..1204M0 *RC..43M0*
DRSCR3232X12JETI	10228972	✓	32	32	35	40,0	32,0	3,1	275,0 bar	0,0	0,0	1,1	RC..1204M0 *RC..43M0*
DRSCL2020X12JETI	10228964	✓	20	20	38	27,0	20,0	3,1	275,0 bar	0,0	0,0	0,4	RC..1204M0 *RC..43M0*
DRSCL2525X12JETI	10228970	✓	25	25	38	32,0	25,0	3,1	275,0 bar	0,0	0,0	0,6	RC..1204M0 *RC..43M0*
DRSCL3232X12JETI	10228973	✓	32	32	35	40,0	32,0	3,1	275,0 bar	0,0	0,0	1,0	RC..1204M0 *RC..43M0*
DRSCR3232X16JETI	10228975	✓	32	32	35	40,0	32,0	4,2	275,0 bar	0,0	0,0	1,1	RC..1606..
DRSCL3232X16JETI	10228976	✓	32	32	35	40,0	32,0	4,2	275,0 bar	0,0	0,0	1,0	RC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
...10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
...12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
...16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

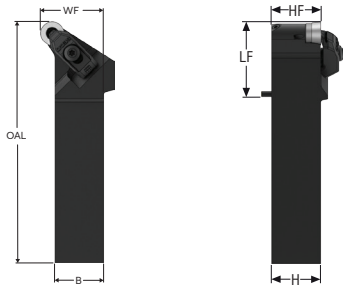
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Replacement blade	Shim key	Torque key
							
...10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P	9/64SMS875	T00-10P20
...12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	9/64SMS875	T00-15P35
...16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	1/4HEX-H5.0X50	T00-15P35

DRSCR/L...JETI – Toolholders for inserts RCGT, RCMT – Inch



DRDCR/L...JETI



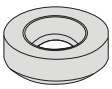
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18–19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	Duo	H	B	LF	WF	HF	CDX	CP	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi			lbs	
DRSCR-12-10JETI	10228978	✓	0.750	0.750	1.417	1.122	0.750	0.121	3988,5	0,0	0,0	0.880	RC..10T3..
DRSCR-16-10JETI	10228984	✓	1.000	1.000	1.417	1.268	1.000	0.121	3988,5	0,0	0,0	1.320	RC..10T3..
DRSCL-12-10JETI	10228979	✓	0.750	0.750	1.417	1.122	0.750	0.121	3988,5	0,0	0,0	0.880	RC..10T3..
DRSCL-16-10JETI	10228985	✓	1.000	1.000	1.417	1.268	1.000	0.121	3988,5	0,0	0,0	1.540	RC..10T3..
DRSCR-12-12JETI	10228981	✓	0.750	0.750	1.496	1.161	0.750	0.123	3988,5	0,0	0,0	0.880	RC..1204M0 *RC..43M0*
DRSCR-16-12JETI	10228987	✓	1.000	1.000	1.496	1.268	1.000	0.123	3988,5	0,0	0,0	1.540	RC..1204M0 *RC..43M0*
DRSCR-20-12JETI	10228990	✓	1.250	1.250	1.378	1.575	1.250	0.123	3988,5	0,0	0,0	2.430	RC..1204M0 *RC..43M0*
DRSCL-12-12JETI	10228982	✓	0.750	0.750	1.496	1.161	0.750	0.123	3988,5	0,0	0,0	0.880	RC..1204M0 *RC..43M0*
DRSCL-16-12JETI	10228988	✓	1.000	1.000	1.496	1.268	1.000	0.123	3988,5	0,0	0,0	1.320	RC..1204M0 *RC..43M0*
DRSCL-20-12JETI	10228991	✓	1.250	1.250	1.378	1.575	1.250	0.123	3988,5	0,0	0,0	2.430	RC..1204M0 *RC..43M0*
DRSCR-20-16JETI	10228993	✓	1.250	1.250	1.378	1.575	1.250	0.164	3988,5	0,0	0,0	2.430	RC..1606..
DRSCL-20-16JETI	10228994	✓	1.250	1.250	1.378	1.575	1.250	0.164	3988,5	0,0	0,0	2.430	RC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Shim screw	Spring
							
..-10	1/4HEX-T10PX50	L84017-T10P	CP14X00R-1-SET	P6SS4X4	111.19-620	CA3507	S5808
..-12	1/4HEX-T15PX50	L85021-T15P	CP17X00R-1-SET	P6SS4X4	111.19-621	CA3507	S7111
..-16	1/4HEX-T15PX50	L85021-T15P	CPL17X00R-1-SET	P6SS4X4	SRN16T3M0	CA5008	S7111

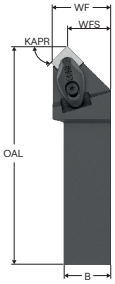
Accessories

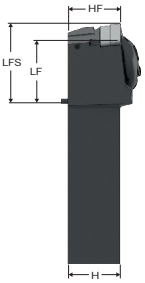
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Replacement blade	Shim key	Torque key
							
..-10	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P	9/64SMS875	T00-10P20
..-12	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	9/64SMS875	T00-15P35
..-16	1/4HEX-S-HANDLE	P6SS4X8	3.5NM	P6SS6X6	T00-15P	1/4HEX-H5.0X50	T00-15P35

DSSNR/L...JETI – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric

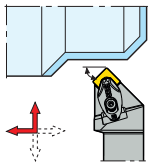


DSSNR/L...JETI





KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	Duo	H	B	OAL	LF	LFS	WF	WFS	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	mm	mm	bar				kg	
DSSNR2525X12JETI	03282326	✓	25	25	128	36	44	32,0	24,3	25,0	200,0 bar	45,0	-8,0	0,0	0,7	SN..1204.. *SN..43.*
DSSNL2525X12JETI	03282323	✓	25	25	128	36	44	32,0	24,3	25,0	200,0 bar	45,0	-8,0	0,0	0,6	SN..1204.. *SN..43.*
DSSNR3232X15JETI	03282327	✓	32	32	149	40	50	40,0	30,7	32,0	200,0 bar	45,0	-8,0	0,0	1,2	SN..1506.. *SN..54.*
DSSNL3232X15JETI	03282325	✓	32	32	149	40	50	40,0	30,7	32,0	200,0 bar	45,0	-8,0	0,0	1,2	SN..1506.. *SN..54.*

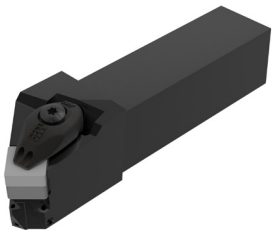
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
L-12	–	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DSN120616	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
L-15	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS3X3	DSN150624	JET-P1/8-5MM	–	C05010-T20P	S7111
R-12	–	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DSN120616	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111
R-15	1/4HEX-T15PX50	L85021-T15P	CN21L00R-2-SET	P6SS3X3	DSN150624	JET-P1/8-5MM	–	C05010-T20P	S7111

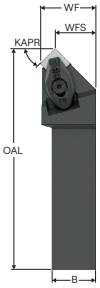
Accessories

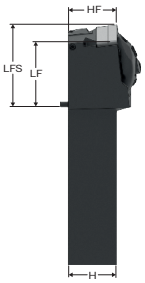
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
								
L-12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	–	T00-15P35
L-15	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-T20PX50	T00-15P35
R-12	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	–	T00-15P35
R-15	1/4HEX-S-HANDLE	CN21U00S-2-SET	CN21L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	1/4HEX-T20PX50	T00-15P35

DSSNR/L...JETI – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Inch

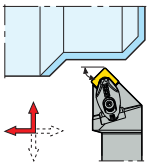


DSSNR/L...JETI





KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS

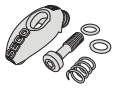


Designation	Item number	Duo	H	B	OAL	LF	LFS	WF	WFS	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	inch	inch	psi				lbs	
DSSNR-16-4XJETI	03282282	✓	1.000	1.000	5.035	1.417	1.728	1.260	0.949	1.000	2900,8	45,0	-8,0	0,0	1.320	SN..1204.. *SN..43.*
DSSNL-16-4XJETI	03282281	✓	1.000	1.000	5.035	1.417	1.728	1.260	0.949	1.000	2900,8	45,0	-8,0	0,0	1.540	SN..1204.. *SN..43.*

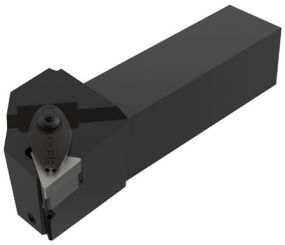
Spare Parts, included in delivery

For	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
								
..-16-4	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DSN120616	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111

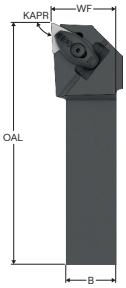
Accessories

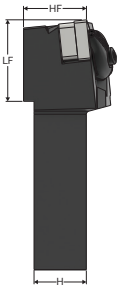
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
							
..-16-4	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

DTJNR/L...JETI – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMX – Metric

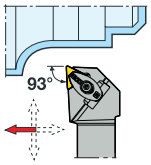


DTJNR/L...JETI





KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 612
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DTJNR2020X16JETI	03282330	✓	20	20	95	31	27,0	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	TN..1604.. *TN..33.*
DTJNR2525X16JETI	03282331	✓	25	25	120	36	32,0	25,0	200,0 bar	93,0	-6,0	-6,0	0,7	TN..1604.. *TN..33.*
DTJNL2020X16JETI	03282328	✓	20	20	95	31	27,0	20,0	200,0 bar	93,0	-6,0	-6,0	0,4	TN..1604.. *TN..33.*
DTJNL2525X16JETI	03282329	✓	25	25	120	36	32,0	25,0	200,0 bar	93,0	-6,0	-6,0	0,7	TN..1604.. *TN..33.*

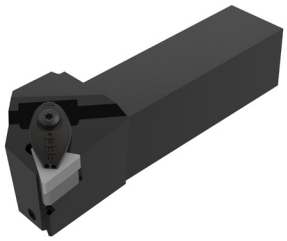
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
...NL20	–	L84017-T10P	CN14U10S-2R-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	1/4HEX-T10PX50	C03007-T09P	S5808
...NL25	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2R-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	–	C03007-T09P	S5808
...NR20	–	L84017-T10P	CN14U10S-2L-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	1/4HEX-T10PX50	C03007-T09P	S5808
...NR25	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2L-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	–	C03007-T09P	S5808

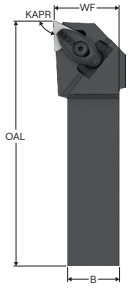
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
						
...NL20	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	–	T00-10P20
...NL25	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T09PX50	T00-10P20
...NR20	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	–	T00-10P20
...NR25	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T09PX50	T00-10P20

DTJNR/L...JETI – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMX – Inch

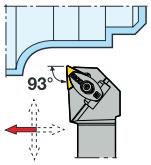


DTJNR/L...JETI





KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 612
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DTJNR-16-3XJETI	03282284	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	93,0	-6,0	-6,0	1.320	TN..1604.. *TN..33.*
DTJNL-16-3XJETI	03282283	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	93,0	-6,0	-6,0	1.540	TN..1604.. *TN..33.*

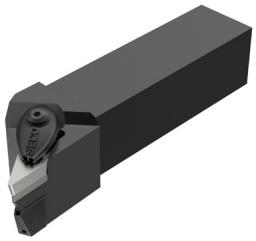
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
..L-16-3	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2R-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	C03007-T09P	S5808
..R-16-3	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2L-SET	P6SS4X4	DTN160616	JET-P1/8-5MM	C03007-T09P	S5808

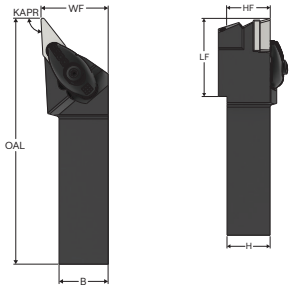
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
					
..L-16-3	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P20
..R-16-3	1/4HEX-S-HANDLE	P6SS4X8	2.0NM	P6SS6X6	T00-10P20

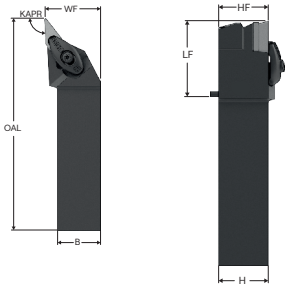
DVJBR/L...JETI – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric



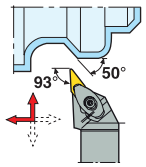
DVJBR/L2020...JETI



DVJBR/L2525/3232...JETI



KAPR = 93,0 °



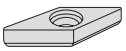
CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DVJBR2020X16JETI	03213122	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	0,0	0,0	0,3	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBR2525X16JETI	03213123	✓	25	25	122	38	32,2	25,0	200,0 bar	93,0	0,0	0,0	0,6	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBR3232X16JETI	03282333	✓	32	32	139	40	40,0	32,0	200,0 bar	93,0	0,0	0,0	1,0	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBL2020X16JETI	03213120	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	0,0	0,0	0,3	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBL2525X16JETI	03213121	✓	25	25	122	38	32,2	25,0	200,0 bar	93,0	0,0	0,0	0,6	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBL3232X16JETI	03282332	✓	32	32	139	40	40,0	32,0	200,0 bar	93,0	0,0	0,0	1,0	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
DVJBL	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
DVJBR	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808

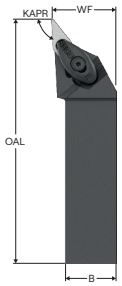
Accessories

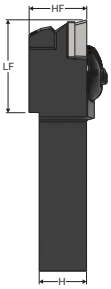
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
						
DVJBL	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
DVJBR	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

DVJBR/L...JETI – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Inch

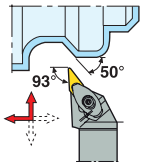


DVJBR/L...JETI





KAPR = 93,0 °



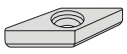
CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DVJBR-12-3XJETI	03282287	✓	0.750	0.750	3.937	1.417	1.059	0.750	2900,8	93,0	0,0	0,0	0.660	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBR-16-3XJETI	03282288	✓	1.000	1.000	4.803	1.496	1.260	1.000	2900,8	93,0	0,0	0,0	1.320	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBL-12-3XJETI	03282285	✓	0.750	0.750	3.937	1.417	1.059	0.750	2900,8	93,0	0,0	0,0	0.660	VB..1604-VC..1604 *VB..33.-VC..33.*
DVJBL-16-3XJETI	03282286	✓	1.000	1.000	4.803	1.496	1.260	1.000	2900,8	93,0	0,0	0,0	1.320	VB..1604-VC..1604 *VB..33.-VC..33.*

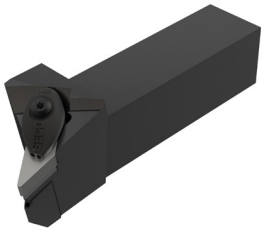
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
..L-12-3	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
..L-16-3	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
..R-12-3	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
..R-16-3	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808

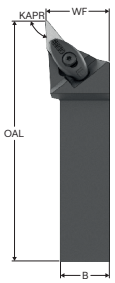
Accessories

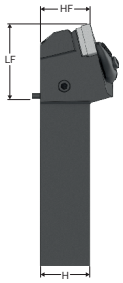
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
						
..L-12-3	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
..L-16-3	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
..R-12-3	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
..R-16-3	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

DVJNR/L...JETI – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric

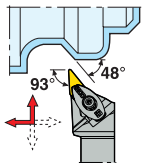


DVJNR/L...JETI





KAPR = 93,0 °



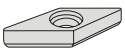
CTWS



—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For suitable adapter, see page(s) 989–1000
—For holder code key, see page(s) 16–17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DVJNR2020X16JETI	03282337	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	-4,5	-13,5	0,4	VN..1604.. *VN..33.*
DVJNR2525X16JETI	03282338	✓	25	25	122	36	32,2	25,0	200,0 bar	93,0	-4,5	-13,5	0,6	VN..1604.. *VN..33.*
DVJNL2020X16JETI	03282334	✓	20	20	100	36	27,2	20,0	200,0 bar	93,0	-4,5	-13,5	0,3	VN..1604.. *VN..33.*
DVJNL2525X16JETI	03282336	✓	25	25	122	36	32,2	25,0	200,0 bar	93,0	-4,5	-13,5	0,6	VN..1604.. *VN..33.*

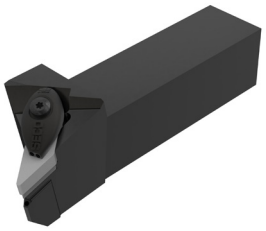
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
L-16	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2R-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
R-16	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2L-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808

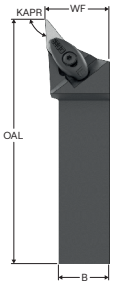
Accessories

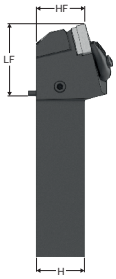
For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
						
L-16	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
R-16	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

DVJNR/L...JETI – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Inch

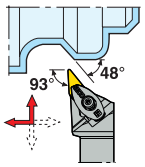


DVJNR/L...JETI





KAPR = 93,0 °



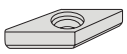
CTWS



–Right-hand version shown
–For inserts program, see page(s) 585, 586, 614
–For suitable adapter, see page(s) 989-1000
–For holder code key, see page(s) 18-19
–For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
–For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DVJNR-12-3XJETI	03282292	✓	0.750	0.750	4.055	1.535	1.059	0.750	2900,8	93,0	-4,5	-13,5	0.880	VN..1604.. *VN..33.*
DVJNR-16-3XJETI	03282293	✓	1.000	1.000	4.803	1.496	1.260	1.000	2900,8	93,0	-4,5	-13,5	1.320	VN..1604.. *VN..33.*
DVJNR-20-3XJETI	03282294	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	93,0	-4,5	-13,5	2.200	VN..1604.. *VN..33.*
DVJNL-12-3XJETI	03282289	✓	0.750	0.750	4.055	1.535	1.059	0.750	2900,8	93,0	-4,5	-13,5	0.660	VN..1604.. *VN..33.*
DVJNL-16-3XJETI	03282290	✓	1.000	1.000	4.803	1.496	1.260	1.000	2900,8	93,0	-4,5	-13,5	1.100	VN..1604.. *VN..33.*
DVJNL-20-3XJETI	03282291	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	93,0	-4,5	-13,5	2.200	VN..1604.. *VN..33.*

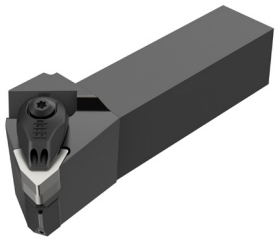
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim screw	Spring
								
...L	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2R-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808
...R	1/4HEX-T10PX50	L84017-T10P	CN14U20S-2L-SET	P6SS3X3	171.19-620	JET-P1/8-5MM	C94006-T15P	S5808

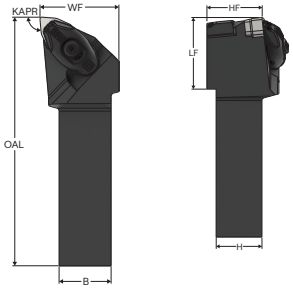
Accessories

For	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Shim key	Torque key
						
...L	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20
...R	1/4HEX-S-HANDLE	P6SS3X5	2.0NM	P6SS6X6	1/4HEX-T15PX50	T00-10P20

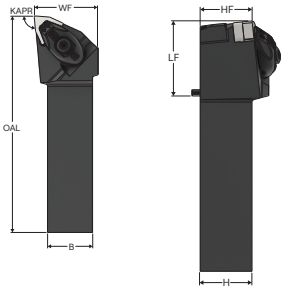
DWLNR/L...JETI – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric



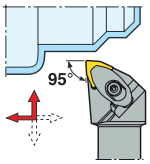
DWLNR/L2020...JETI



DWLNR/L2525/3232...JETI



KAPR = 95,0 °



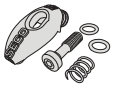
CTWS



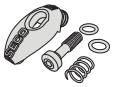
–Right-hand version shown
–For inserts program, see page(s) 587, 588, 589, 590, 615
–For suitable adapter, see page(s) 989–1000
–For holder code key, see page(s) 16–17
–For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
–* Use the right shim & the right screw for the selected insert. For details, see page 98
–For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm	mm	mm	mm	mm	mm	bar				kg	
DWLNR2020X06JETI	03213128	✓	20	20	95	31	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
DWLNR2525X06JETI	03213130	✓	25	25	117	33	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	WN..0604.. *WN..33.*
DWLNL2020X06JETI	03213124	✓	20	20	95	31	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
DWLNL2525X06JETI	03213126	✓	25	25	117	33	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	WN..0604.. *WN..33.*
DWLNR2020X08JETI	03213129	✓	20	20	100	36	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR2525X08JETI	03213131	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR3232X08JETI	03282340	✓	32	32	139	40	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,2	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL2020X08JETI	03213125	✓	20	20	100	36	27,2	20,0	200,0 bar	95,0	-6,0	-6,0	0,4	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL2525X08JETI	03213127	✓	25	25	120	36	32,2	25,0	200,0 bar	95,0	-6,0	-6,0	0,6	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL3232X08JETI	03282339	✓	32	32	139	40	40,0	32,0	200,0 bar	95,0	-6,0	-6,0	1,1	WN..0804-WN..0806* *WN..43-WN..44**

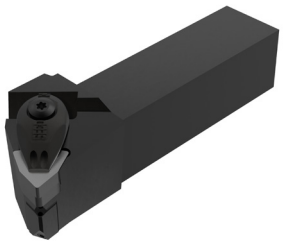
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
...06	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	P6SS3X3	DWN060310	JET-P1/8-5MM	–	C03007-T09P	S5808
...08	–	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DWN080416	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111

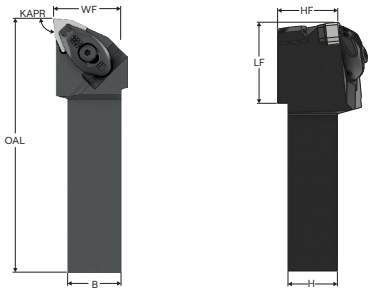
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
							
...06	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	P6SS3X5	2.0NM	P6SS6X6	T00-10P20
...08	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

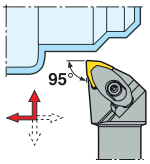
DWLNR/L...JETI – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Inch



DWLNR/L...JETI



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 18-19
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	OAL	LF	WF	HF	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	inch	psi				lbs	
DWLNR-12-3XJETI	03282300	✓	0.750	0.750	3.740	1.220	1.059	0.750	2900,8	95,0	-6,0	-6,0	1.320	WN..0604.. *WN..33.*
DWLNR-16-3XJETI	03282302	✓	1.000	1.000	4.606	1.299	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.320	WN..0604.. *WN..33.*
DWLNL-12-3XJETI	03282295	✓	0.750	0.750	3.740	1.220	1.059	0.750	2900,8	95,0	-6,0	-6,0	0.880	WN..0604.. *WN..33.*
DWLNL-16-3XJETI	03282297	✓	1.000	1.000	4.606	1.299	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.320	WN..0604.. *WN..33.*
DWLNR-12-4XJETI	03282301	✓	0.750	0.750	4.055	1.535	1.059	0.750	2900,8	95,0	-6,0	-6,0	1.320	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR-16-4XJETI	03282303	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.540	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR-20-4XJETI	03282304	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	95,0	-6,0	-6,0	2.650	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-12-4XJETI	03282296	✓	0.750	0.750	4.055	1.535	1.059	0.750	2900,8	95,0	-6,0	-6,0	0.880	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-16-4XJETI	03282298	✓	1.000	1.000	4.724	1.417	1.260	1.000	2900,8	95,0	-6,0	-6,0	1.540	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-20-4XJETI	03282299	✓	1.250	1.250	5.472	1.575	1.500	1.250	2900,8	95,0	-6,0	-6,0	2.650	WN..0804-WN..0806* *WN..43-WN..44**

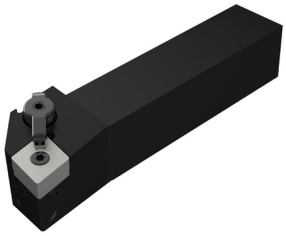
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Duo Coolant On plug screw	Insert shim	Plug	Shim/clamp key	Shim screw	Spring
									
..-3	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	P6SS3X3	DWN060310	JET-P1/8-5MM	–	C03007-T09P	S5808
..-4	–	L85021-T15P	CN17L00R-2-SET	P6SS3X3	DWN080416	JET-P1/8-5MM	1/4HEX-T15PX50	C04008-T15P	S7111

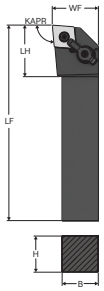
Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Duo Coolant Off plug screw	Insert clamping torque	Plug screw JETI	Torque key
							
..-3	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	P6SS3X5	2.0NM	P6SS6X6	T00-10P20
..-4	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	P6SS3X5	3.5NM	P6SS6X6	T00-15P35

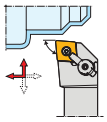
MCLNR/L...JETI – Toolholders for inserts CNMA, CNMG, CNMM – Inch



MCLNR/L3232...JET



KAPR = 95,0 °



CTWS



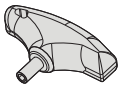
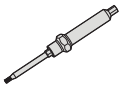
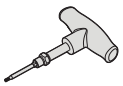
- —Right-hand version shown
- —For inserts program, see page(s) 548, 549, 550, 551, 552, 553
- —For suitable adapter, see page(s) 989-1000
- —For holder code key, see page(s) 16-17
- —For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
- —* Use the right shim & the right screw for the selected insert. For details, see page 98
- —For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	psi				lbs	
MCLNL-20-6DJET	10360912	✓	1.250	1.250	6.000	1.500	1.772	3988,5	95,0	-6,0	-6,0	2.650	CN..1906.. *CN..64.*
MCLNR-20-6DJET	10360913	✓	1.250	1.250	6.000	1.500	1.772	3988,5	95,0	-6,0	-6,0	2.650	CN..1906.. *CN..64.*

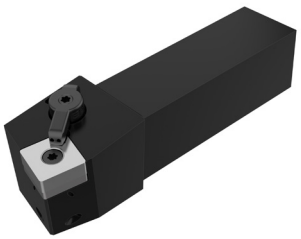
Spare Parts, included in delivery

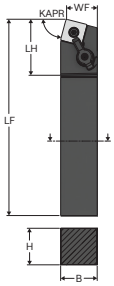
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..6	LD6024-T20P	MC22-A	P6SS3X3	CSN190412	1/4HEX-T20PX50	MN1920-T20P

Accessories

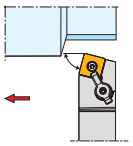
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..6	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-20P	T00T-20P60

MSRNR/L...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Inch





KAPR = 75,0 °



CTWS



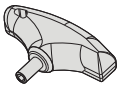
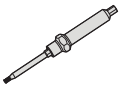
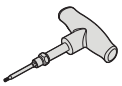
—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	psi				lbs	
MSRNL-20-6DJET	10360917	✓	1.250	1.250	6.000	1.318	2.024	3988,5	75,0	-6,0	-6,0	1.980	SN..1906.. *SN..64.*
MSRNR-20-6DJET	10360916	✓	1.250	1.250	6.000	1.318	2.024	3988,5	75,0	-6,0	-6,0	2.650	SN..1906.. *SN..64.*

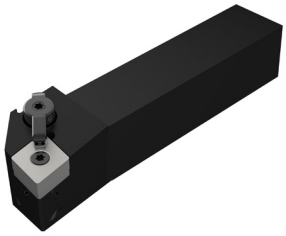
Spare Parts, included in delivery

For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..6	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P

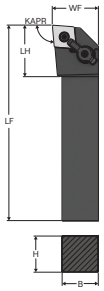
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..6	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60

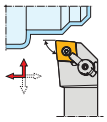
MCLNR/L...JETI – Toolholders for inserts CNMA, CNMG, CNMM – Metric



MCLNR/L3232...JET



KAPR = 95,0 °



CTWS



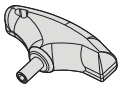
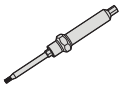
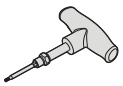
- Right-hand version shown
- For inserts program, see page(s) 548, 549, 550, 551, 552, 553
- For suitable adapter, see page(s) 989-1000
- For holder code key, see page(s) 16-17
- For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
- * Use the right shim & the right screw for the selected insert. For details, see page 98
- For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°		CTWS
			mm	mm	mm	mm	mm	bar				kg	
MCLNL3232P19JET	10360910	✓	32	32	170	40,2	45,0	275,0	95,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*
MCLNR3232P19JET	10360911	✓	32	32	170	40,2	45,0	275,0	95,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*

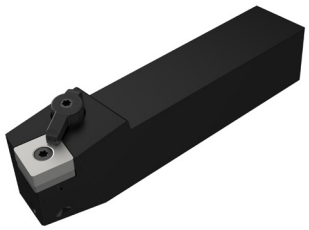
Spare Parts, included in delivery

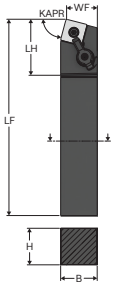
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
	LD6024-T20P	MC22-A	P6SS3X3	CSN190412	1/4HEX-T20PX50	MN1920-T20P

Accessories

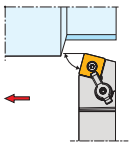
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	6.0NM	T00T-20P	T00T-20P60

MSBNR/L...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Metric





KAPR = 75,0 °



CTWS



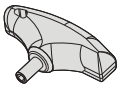
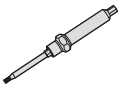
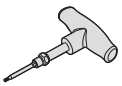
—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°		CTWS
			mm	mm	mm	mm	mm	bar				kg	
MSBNL3232P19JET	10360914	✓	32	32	170	27,2	49,0	275,0	75,0	-6,0	-6,0	1,3	SN..1906.. *SN..64.*
MSBNR3232P19JET	10360915	✓	32	32	170	27,2	49,0	275,0	75,0	-6,0	-6,0	1,3	SN..1906.. *SN..64.*

Spare Parts, included in delivery

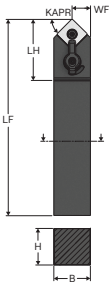
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..19	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P

Accessories

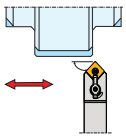
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60

MSDNN...JETI – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Inch





KAPR = 45,0 °



CTWS



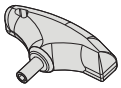
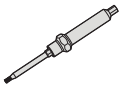
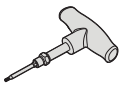
—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	psi				lbs	
MSDNN-20-6DJET	10360919	✓	1.250	1.250	6.000	0.647	2.063	3988,5	45,0	-6,0	-6,0	2.430	SN..1906.. *SN..64.*

Spare Parts, included in delivery

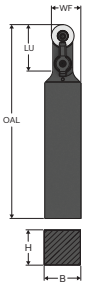
For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..6	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P

Accessories

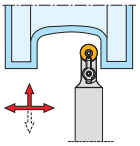
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..6	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60

MRDCN...JETI – Toolholders for inserts RCMT – Inch





KAPR



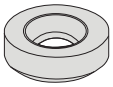
CTWS



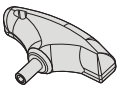
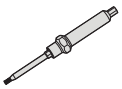
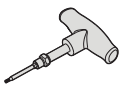
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	GAMO°	LAMS°	Weight	CTWS
			inch	inch	inch	inch	inch	psi			lbs	
MRDCN-20-6DJET	10360921	✓	1.250	1.250	6.000	1.019	1.984	3988,5	0,0	0,0	2.200	RC..2006..

Spare Parts, included in delivery

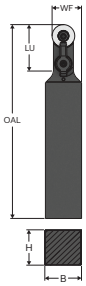
For	Clamp key	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert key	Insert screw	Insert shim
							
..6	1/4HEX-T20PX50	LD6024-T20P	MC22-A	P6SS3X3	1/4HEX-T25PX50	C06018-T25P	RSP2004M0

Accessories

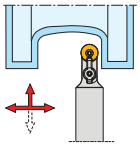
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
							
..6	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	8.0NM	T00T-25P	1/4HEX-H6.0X50	T00T-25P80

MRDCN...JETI – Toolholders for inserts RCMT – Metric





KAPR



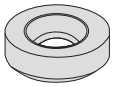
CTWS



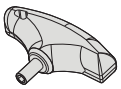
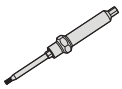
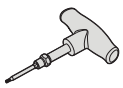
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	GAMO°	LAMS°		CTWS
			mm	mm	mm	mm	mm	bar			kg	
MRDCN3232P20JET	10360920	✓	32	32	170	26,0	51,0	275,0	0,0	0,0	1,2	RC..2006..

Spare Parts, included in delivery

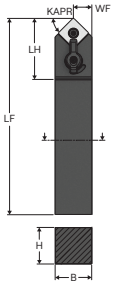
For	Clamp key	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert key	Insert screw	Insert shim
							
..20	1/4HEX-T20PX50	LD6024-T20P	MC22-A	P6SS3X3	1/4HEX-T25PX50	C06018-T25P	RSP2004M0

Accessories

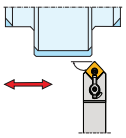
For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Shim key	Torque key
							
..20	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS3X5	8.0NM	T00T-25P	1/4HEX-H6.0X50	T00T-25P80

MSDNN...JETI – Toolholders for inserts SNMA, SNMG, SNMM – Metric





KAPR = 45,0 °



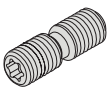
CTWS



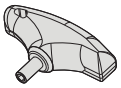
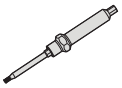
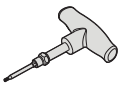
—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 16-17
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	Duo	H	B	LF	WF	LH	CP	KAPR°	GAMO°	LAMS°		CTWS
			mm	mm	mm	mm	mm	bar				kg	
MSDNN3232P19JET	10360918	✓	32	32	118	16,5	52,0	275,0	45,0	-6,0	-6,0	1,4	SN..1906.. *SN..64.*

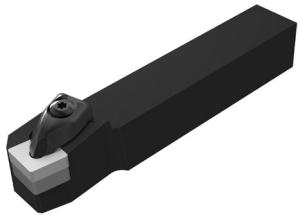
Spare Parts, included in delivery

For	Clamp screw	Coolant clamp	Duo Coolant On plug screw	Insert shim	Shim/clamp key	Shim pin
						
..19	LD6024-T20P	MC22-A	P6SS4X4	SSN190412	1/4HEX-T20PX50	MN1920-T20P

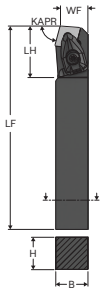
Accessories

For	Adjustable Torque key	Bit holder	Duo Coolant Off plug screw	Insert clamping torque	Replacement blade	Torque key
						
..19	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	P6SS4X8	6.0NM	T00T-20P	T00T-20P60

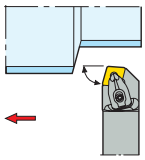
DCBNR/L – Toolholders for inserts CNGG, CNMA, CNMG, CNMM – Metric



DCBNR/L..-M



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For holder code key, see page(s) 16-17
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DCBNR2020K12-M	02588094	20	20	125	17,0	32,0	75,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
DCBNR2525M12-M	02588095	25	25	150	22,0	31,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCBNR3225P12-M	02588096	32	25	170	22,0	31,0	75,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCBNL2020K12-M	02588097	20	20	125	17,0	32,0	75,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
DCBNL2525M12-M	02588098	25	25	150	22,0	31,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCBNL3225P12-M	02588099	32	25	170	22,0	31,0	75,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCBNR2525M16-M	02588100	25	25	150	22,0	41,0	75,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCBNR3225P16-M	02588101	32	25	170	22,0	42,0	75,0	-6,0	-6,0	1,1	CN..1606.. *CN..54.*
DCBNL2525M16-M	02588102	25	25	150	22,0	41,0	75,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCBNL3225P16-M	02588103	32	25	170	22,0	42,0	75,0	-6,0	-6,0	1,1	CN..1606.. *CN..54.*
DCBNR3232P19-M	02588104	32	32	170	27,0	41,0	75,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*
DCBNR4040R19-M	02588105	40	40	200	35,0	42,0	75,0	-6,0	-6,0	2,4	CN..1906.. *CN..64.*
DCBNL3232P19-M	02588106	32	32	170	27,0	41,0	75,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*
DCBNL4040R19-M	02588107	40	40	200	35,0	42,0	75,0	-6,0	-6,0	2,5	CN..1906.. *CN..64.*

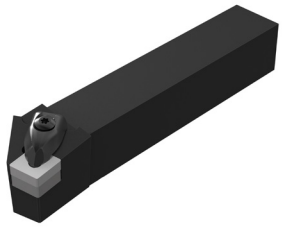
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...16	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
...19	FP2012	L86026-T20P	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

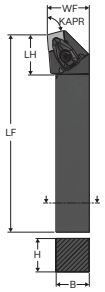
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
...16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
...19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

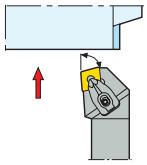
DCKNR/L – Toolholders for inserts CNGG, CNMA, CNMG, CNMM – Metric



DCKNR/L..-M



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For holder code key, see page(s) 16-17
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DCKNR2020K12-M	02588110	20	20	125	25,0	30,0	75,0	-6,0	-6,0	0,5	CN..1204.. *CN..43.*
DCKNR2525M12-M	02588111	25	25	150	32,0	31,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCKNR3225P12-M	02588112	32	25	170	32,0	31,0	75,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCKNL2020K12-M	02588113	20	20	125	25,0	30,0	75,0	-6,0	-6,0	0,5	CN..1204.. *CN..43.*
DCKNL2525M12-M	02588114	25	25	150	32,0	31,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCKNL3225P12-M	02588115	32	25	170	32,0	31,0	75,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCKNR2525M16-M	02588116	8	8	150	32,0	36,0	75,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCKNR3225P16-M	02588117	8	8	170	32,0	36,0	75,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*
DCKNL2525M16-M	02588118	8	8	150	32,0	36,0	75,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCKNL3225P16-M	02588119	8	8	170	32,0	36,0	75,0	-6,0	-6,0	1,2	CN..1606.. *CN..54.*
DCKNR3232P19-M	02588121	32	32	170	40,0	36,0	75,0	-6,0	-6,0	1,5	CN..1906.. *CN..64.*
DCKNL3232P19-M	02588123	32	32	170	40,0	36,0	75,0	-6,0	-6,0	1,5	CN..1906.. *CN..64.*

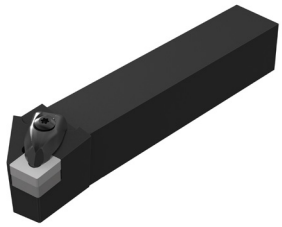
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...16	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
...19	FP2012	L86026-T20P	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

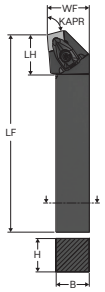
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
...16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
...19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

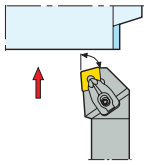
DCKNR/L – Toolholders for inserts CNGA, CNGP, CNMA, CNMG, CNMM, CNMP – Inch



DCKNR/L



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 18-19
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DCKNR-16-4D	02565475	1.000	1.000	6.000	1.250	1.299	75,0	-6,0	-6,0	1.760	CN..1204.. *CN..43.*
DCKNR-20-4D	02565476	1.250	1.250	6.000	1.500	1.299	75,0	-6,0	-6,0	2.870	CN..1204.. *CN..43.*
DCKNL-16-4D	02565479	1.000	1.000	6.000	1.250	1.299	75,0	-6,0	-6,0	1.760	CN..1204.. *CN..43.*
DCKNL-20-4D	02565480	1.250	1.250	6.000	1.500	1.299	75,0	-6,0	-6,0	2.650	CN..1204.. *CN..43.*
DCKNR-16-5D	02565481	0.315	0.315	6.000	1.250	1.535	75,0	-6,0	-6,0	1.980	CN..1606.. *CN..54.*
DCKNL-16-5D	02565483	0.315	0.315	6.000	1.250	1.654	75,0	-6,0	-6,0	1.980	CN..1606.. *CN..54.*

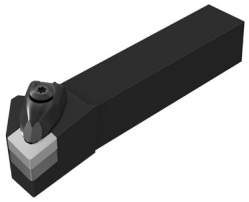
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-16-4	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
..-16-5	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
..-20	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912

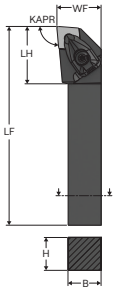
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-16-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
..-16-5	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
..-20	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

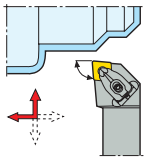
DCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric



DCLNR/L..-M



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 16-17
—Shim DCN120416 for insert CN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DCLNR1616H09-M	02587765	16	16	100	20,0	25,0	95,0	-6,0	-6,0	0,3	CN..0903.. *CN..32.*
DCLNR2020K09-M	02588069	20	20	125	25,0	23,0	95,0	-6,0	-6,0	0,4	CN..0903.. *CN..32.*
DCLNR2525M09-M	02588070	25	25	150	32,0	25,0	95,0	-6,0	-6,0	0,8	CN..0903.. *CN..32.*
DCLNL1616H09-M	02588071	16	16	100	20,0	25,0	95,0	-6,0	-6,0	0,3	CN..0903.. *CN..32.*
DCLNL2525M09-M	02588073	25	25	150	32,0	25,0	95,0	-6,0	-6,0	0,8	CN..0903.. *CN..32.*
DCLNL2020K09-M	02588072	20	20	125	25,0	23,0	95,0	-6,0	-6,0	0,4	CN..0903.. *CN..32.*
DCLNR2020K12-M	02588074	20	20	125	25,0	32,0	95,0	-6,0	-6,0	0,5	CN..1204.. *CN..43.*
DCLNR2525M12-M	02588075	25	25	150	32,0	32,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCLNR3225P12-M	02588076	32	25	170	32,0	32,0	95,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCLNR3232P12-M	02588077	32	32	170	40,0	32,0	95,0	-6,0	-6,0	1,4	CN..1204.. *CN..43.*
DCLNL2020K12-M	02588078	20	20	125	25,0	32,0	95,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
DCLNL2525M12-M	02588079	25	25	150	32,0	32,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
DCLNL3225P12-M	02588080	32	25	170	32,0	32,0	95,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
DCLNL3232P12-M	02588081	32	32	170	40,0	32,0	95,0	-6,0	-6,0	1,4	CN..1204.. *CN..43.*
DCLNR2525M16-M	02588082	25	25	150	32,0	40,0	95,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCLNR3225P16-M	02588083	32	25	170	32,0	42,0	95,0	-6,0	-6,0	1,1	CN..1606.. *CN..54.*
DCLNR3232P16-M	02588084	32	32	170	40,0	42,0	95,0	-6,0	-6,0	1,4	CN..1606.. *CN..54.*
DCLNL2525M16-M	02588085	25	25	150	32,0	40,0	95,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
DCLNL3225P16-M	02588086	32	25	170	32,0	42,0	95,0	-6,0	-6,0	1,1	CN..1606.. *CN..54.*
DCLNL3232P16-M	02588087	32	32	170	40,0	42,0	95,0	-6,0	-6,0	1,4	CN..1606.. *CN..54.*
DCLNR3232P19-M	02588089	32	32	170	40,0	42,0	95,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*
DCLNR4040R19-M	02588090	40	40	200	50,0	40,0	95,0	-6,0	-6,0	2,4	CN..1906.. *CN..64.*
DCLNL3232P19-M	02588092	32	32	170	40,0	42,0	95,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DCLNL4040R19-M	02588093	40	40	200	50,0	40,0	95,0	-6,0	-6,0	2,5	CN..1906.. *CN..64.*

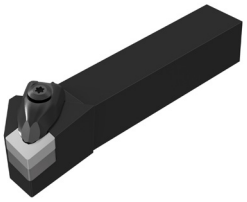
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...12	–	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...16	–	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
...19	–	FP2012	L86026-T20P	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010
DCLNL1616H09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608
DCLNL2020K09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608
DCLNL2525M09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608
DCLNR1616H09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608
DCLNR2020K09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608
DCLNR2525M09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DCN090310	–	C03007-T09P	S5608

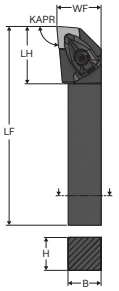
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
...16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	–	T00T-20P60
...19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	–	T00T-20P60
DCLNL1616H09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DCLNL2020K09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DCLNL2525M09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DCLNR1616H09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DCLNR2020K09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DCLNR2525M09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20

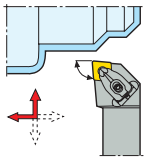
DCLNR/L – Toolholders for inserts CNGA, CNGP, CNMA, CNMG, CNMM, CNMP – Inch



DCLNR/L



KAPR = 95,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
–For holder code key, see page(s) 18–19
–Shim DCN120416 for insert CN..1206.., to be ordered separately
–For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DCLNR-12-4B	02564754	0.750	0.750	4.500	1.000	1.299	95,0	-6,0	-6,0	0.880	CN..1204.. *CN..43.*
DCLNR-16-4D	02569284	1.000	1.000	6.000	1.250	1.299	95,0	-6,0	-6,0	1.760	CN..1204.. *CN..43.*
DCLNR-20-4D	02588893	1.250	1.250	6.000	1.500	1.299	95,0	-6,0	-6,0	2.650	CN..1204.. *CN..43.*
DCLNR-24-4D	02565454	1.500	1.500	6.000	2.000	1.299	95,0	-6,0	-6,0	3.970	CN..1204.. *CN..43.*
DCLNL-12-4B	02565455	0.750	0.750	4.500	1.000	1.299	95,0	-6,0	-6,0	0.880	CN..1204.. *CN..43.*
DCLNL-16-4D	02569285	1.000	1.000	6.000	1.250	1.299	95,0	-6,0	-6,0	1.760	CN..1204.. *CN..43.*
DCLNL-20-4D	02565458	1.250	1.250	6.000	1.500	1.299	95,0	-6,0	-6,0	2.650	CN..1204.. *CN..43.*
DCLNL-24-4D	02565459	1.500	1.500	6.000	2.000	1.299	95,0	-6,0	-6,0	4.190	CN..1204.. *CN..43.*
DCLNR-16-5D	02565460	1.000	1.000	6.000	1.250	1.654	95,0	-6,0	-6,0	1.980	CN..1606.. *CN..54.*
DCLNR-20-5D	02565461	1.250	1.250	6.000	1.500	1.575	95,0	-6,0	-6,0	2.650	CN..1606.. *CN..54.*
DCLNL-16-5D	02565464	1.000	1.000	6.000	1.250	1.654	95,0	-6,0	-6,0	1.980	CN..1606.. *CN..54.*
DCLNL-20-5D	02565465	1.250	1.250	6.000	1.500	1.575	95,0	-6,0	-6,0	2.650	CN..1606.. *CN..54.*
DCLNR-20-6D	02565468	1.250	1.250	6.000	1.500	1.339	95,0	-6,0	-6,0	2.870	CN..1906.. *CN..64.*
DCLNR-24-6D	02565469	1.500	1.500	6.000	2.000	1.654	95,0	-6,0	-6,0	3.970	CN..1906.. *CN..64.*
DCLNL-20-6D	02565471	1.250	1.250	6.000	1.500	1.339	95,0	-6,0	-6,0	2.870	CN..1906.. *CN..64.*
DCLNL-24-6D	02565472	1.500	1.500	6.000	2.000	1.654	95,0	-6,0	-6,0	3.970	CN..1906.. *CN..64.*

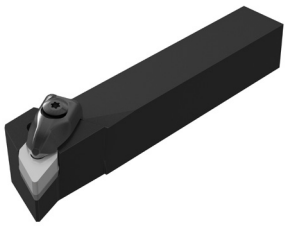
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-4	FP2012	L85021-T15P	CD12-S	DCN120616	1/4HEX-T15PX50	C04008-T15P	S6912
..-5	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
..-6	FP2012	L86026-T20P	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

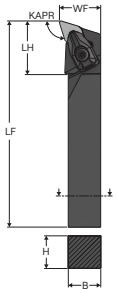
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
..-5	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
..-6	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

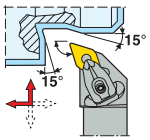
DDHNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric



DDHNR/L



KAPR = 107,5 °



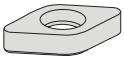
–Right-hand version shown
–For inserts program, see page(s) 558, 559, 560, 561, 598, 599
–For holder code key, see page(s) 16–17
–* Use the right shim & the right screw for the selected insert. For details, see page 97
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DDHNR1616H11	02588124	16	16	100	20,0	26,0	107,5	-6,0	-6,0	0,2	DNMU1104.. *DNMU33.*
DDHNR2020K11	02588125	20	20	125	25,0	26,0	107,5	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDHNR2525M11	02588126	25	25	150	32,0	26,0	107,5	-6,0	-6,0	0,8	DNMU1104.. *DNMU33.*
DDHNL1616H11	02588127	16	16	100	20,0	26,0	107,5	-6,0	-6,0	0,3	DNMU1104.. *DNMU33.*
DDHNL2020K11	02588128	20	20	125	25,0	26,0	107,5	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDHNL2525M11	02588129	25	25	150	32,0	26,0	107,5	-6,0	-6,0	0,8	DNMU1104.. *DNMU33.*
DDHNR2020K15	02588130	20	20	125	25,0	32,0	107,5	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDHNR2525M15	02588131	25	25	150	32,0	36,0	107,5	-6,0	-6,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
DDHNR3232P15	02588132	32	32	170	40,0	33,0	107,5	-6,0	-6,0	1,4	DN..1504-DN..1506* *DN..43-DN..44**
DDHNL2020K15	02588133	20	20	125	25,0	32,0	107,5	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDHNL2525M15	02588134	25	25	150	32,0	36,0	107,5	-6,0	-6,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
DDHNL3232P15	02588135	32	32	170	40,0	33,0	107,5	-6,0	-6,0	1,4	DN..1504-DN..1506* *DN..43-DN..44**

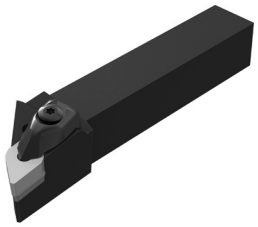
Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
...11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
...15	–	–	FP2012	L85021-T15P	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912

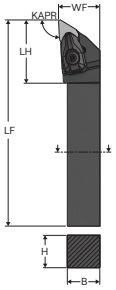
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
...11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	T00-10P20
...15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

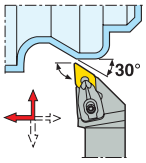
DDJNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric



DDJNR/L, ..-M



KAPR = 93,0 °



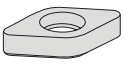
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 16-17
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DDJNR1616H11	02588136	16	16	100	20,0	31,0	93,0	-6,0	-6,0	0,2	DNMU1104.. *DNMU33.*
DDJNR2020K11	02588137	20	20	125	25,0	31,0	93,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDJNR2525M11	02588138	25	25	150	32,0	31,0	93,0	-6,0	-6,0	0,8	DNMU1104.. *DNMU33.*
DDJNR3225P11	02588139	32	25	170	32,0	31,0	93,0	-6,0	-6,0	1,1	DNMU1104.. *DNMU33.*
DDJNL1616H11	02588140	16	16	100	20,0	31,0	93,0	-6,0	-6,0	0,2	DNMU1104.. *DNMU33.*
DDJNL2020K11	02588141	20	20	125	25,0	31,0	93,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
DDJNL2525M11	02588142	25	25	150	32,0	31,0	93,0	-6,0	-6,0	0,8	DNMU1104.. *DNMU33.*
DDJNL3225P11	02588143	32	25	170	32,0	31,0	93,0	-6,0	-6,0	1,1	DNMU1104.. *DNMU33.*
DDJNR2020K15-M	02588144	20	20	125	25,0	42,0	93,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR2525M15-M	02588145	25	25	150	32,0	42,0	93,0	-6,0	-6,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR3225P15-M	02588146	32	25	170	32,0	42,0	93,0	-6,0	-6,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR3232P15-M	02588147	32	32	170	40,0	42,0	93,0	-6,0	-6,0	1,3	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL2020K15-M	02588149	20	20	125	25,0	42,0	93,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL2525M15-M	02588150	25	25	150	32,0	42,0	93,0	-6,0	-6,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL3225P15-M	02588151	32	25	170	32,0	42,0	93,0	-6,0	-6,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL3232P15-M	02588152	32	32	170	40,0	42,0	93,0	-6,0	-6,0	1,3	DN..1504-DN..1506* *DN..43-DN..44**

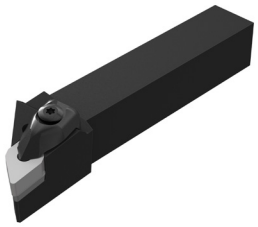
Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
...15	–	–	FP2012	L85021-T15P	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912
DDJNL1616H11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNL2020K11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNL2525M11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNL3225P11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNR1616H11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNR2020K11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNR2525M11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
DDJNR3225P11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608

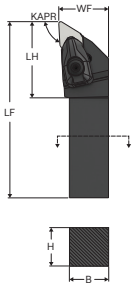
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
								
...15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	–	T00-15P35
DDJNL1616H11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNL2020K11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNL2525M11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNL3225P11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNR1616H11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNR2020K11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNR2525M11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DDJNR3225P11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20

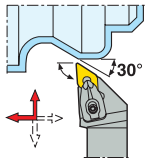
DDJNR/L – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMP, DNMU, DNMX – Inch



DDJNR/L, ..-M



KAPR = 93,0 °



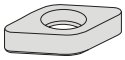
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 18-19
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DDJNR-10-3A	02565487	0.625	0.625	4.000	0.875	1.181	93,0	-6,0	-6,0	0.440	DNMU1104.. *DNMU33.*
DDJNR-12-3B	02565488	0.750	0.750	4.500	1.000	1.181	93,0	-6,0	-6,0	0.880	DNMU1104.. *DNMU33.*
DDJNR-16-3D	02565490	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.760	DNMU1104.. *DNMU33.*
DDJNL-10-3A	02565492	0.625	0.625	4.000	0.875	1.181	93,0	-6,0	-6,0	0.660	DNMU1104.. *DNMU33.*
DDJNL-12-3B	02565493	0.750	0.750	4.500	1.000	1.181	93,0	-6,0	-6,0	0.880	DNMU1104.. *DNMU33.*
DDJNL-16-3D	02565495	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.760	DNMU1104.. *DNMU33.*
DDJNR-12-4B	02565497	0.750	0.750	4.500	1.000	1.654	93,0	-6,0	-6,0	0.880	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR-16-4D-M	02569288	1.000	1.000	6.000	1.250	1.654	93,0	-6,0	-6,0	1.760	DN..1504-DN..1506* *DN..43-DN..44**
DDJNR-20-4D	02565500	1.250	1.250	6.000	1.500	1.654	93,0	-6,0	-6,0	2.650	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-12-4B	02565502	0.750	0.750	4.500	1.000	1.654	93,0	-6,0	-6,0	0.880	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-16-4D-M	02569289	1.000	1.000	6.000	1.250	1.654	93,0	-6,0	-6,0	1.760	DN..1504-DN..1506* *DN..43-DN..44**
DDJNL-20-4D	02565505	1.250	1.250	6.000	1.500	1.654	93,0	-6,0	-6,0	2.650	DN..1504-DN..1506* *DN..43-DN..44**

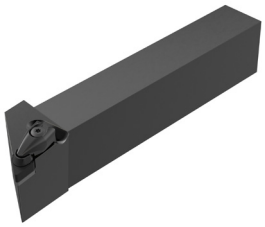
Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
..-3	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
..-4	–	–	FP2012	L85021-T15P	CD12-S	DDN150616	1/4HEX-T15PX50	C04011-T15P	S6912

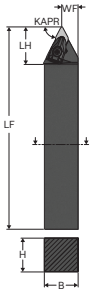
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
..-3	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-09P	T00-10P20
..-4	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

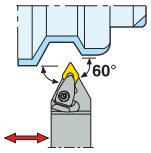
DDNNN – Toolholders for PCBN inserts DNMA – Metric



DDNNN..-C



KAPR = 62,5 °



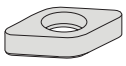
—Neutral version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DDNNN3225P11-C	02598525	32	25	170	13,2	33,0	62,5	-9,0	-5,0	1,0	DNMA1104.. *DNMA33.*

Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim screw	Spring
							
DDNNN3225P11-C	1/4HEX-T10PX50	FP1508	L84017-T10P	CC09P-D11	DDN110310	C03007-T09P	S5608

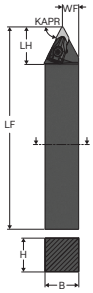
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
DDNNN3225P11-C	1/4HEX-S-HANDLE	CC09P-SET	2.0NM	T00-09P	T00-09P20

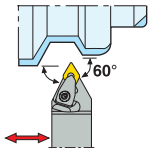
DDPNN – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMP, DNMU – Inch



DDPNN



KAPR = 62,5 °



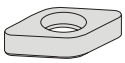
CTWS



–Right-hand version shown
–For inserts program, see page(s) 558, 559, 560, 561, 598, 599
–For holder code key, see page(s) 18-19
–* Use the right shim & the right screw for the selected insert. For details, see page 97
–For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DDPNN-16-3D	02565509	1.000	1.000	6.000	0.500	1.102	62,5	0,0	-10,0	1.760	DNMU1104.. *DNMU33.*
DDPNN-16-4D	02565512	1.000	1.000	6.000	0.500	1.693	62,5	0,0	-10,0	1.760	DN..1504-DN..1506* *DN..43-DN..44**
DDPNN-20-4D	02565513	1.246	1.246	6.000	0.625	1.693	62,5	0,0	-10,0	2.430	DN..1504-DN..1506* *DN..43-DN..44**

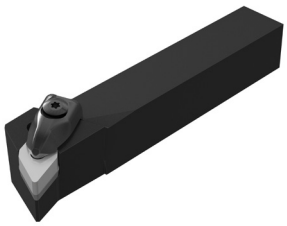
Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
..-3	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
..-4	–	–	FP2012	L85021-T15P	CD12-S	DDN150616	1/4HEX-T15PX50	C04008-T15P	S6912

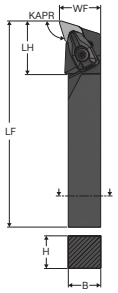
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
..-3	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-09P	T00-10P20
..-4	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

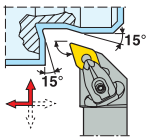
DDQNR/L – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMP, DNMU, DNMX – Inch



DDQNR/L



KAPR = 107,5 °



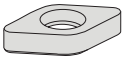
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 18–19
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DDQNR-16-3D	02880410	1.000	1.000	6.000	1.250	1.181	107,5	-6,0	-6,0	1.760	DNMU1104.. *DNMU33.*
DDQNL-16-3D	02880408	1.000	1.000	6.000	1.250	1.181	107,5	-6,0	-6,0	1.760	DNMU1104.. *DNMU33.*
DDQNR-16-4D	02904201	1.000	1.000	6.000	1.260	1.378	107,5	-6,0	-6,0	1.760	DN..1504-DN..1506* *DN..43-DN..44**
DDQNL-16-4D	02904200	1.000	1.000	6.000	1.260	1.378	107,5	-6,0	-6,0	1.760	DN..1504-DN..1506* *DN..43-DN..44**

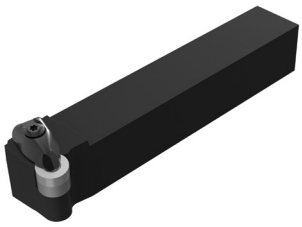
Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
..-3	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
..-4	–	–	FP2012	L85021-T15P	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912

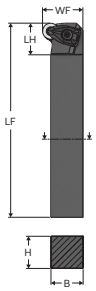
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
..-3	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-09P	T00-10P20
..-4	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

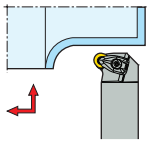
DRGNR/L – Toolholders for inserts RNM.
– Inch



DRGNR/L



KAPR = 90,0 °



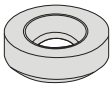
CTWS



—Right-hand version shown
—For inserts program, see page(s) 566, 602
—For holder code key, see page(s) 18-19
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DRGNR-16-4D	02565514	1.000	1.000	6.000	1.250	1.181	90,0	-6,0	-6,0	1.760	RN..1204.. *RN..43.*
DRGNL-16-4D	02565516	1.000	1.000	6.000	1.250	1.181	90,0	-6,0	-6,0	1.980	RN..1204.. *RN..43.*

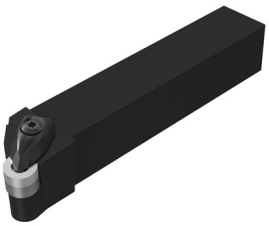
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-4	FP2012	L85021-T15P	CD12-S	DRN120600	1/4HEX-T15PX50	C04008-T15P	S6912

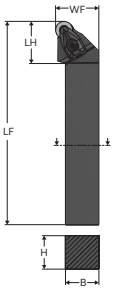
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

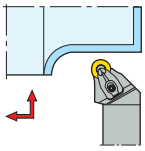
DRSNR/L..-M – Toolholders for inserts RNMA, RNMG – Metric



DRSNR/L..-M



KAPR = 45,0 °



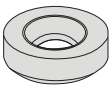
—Right-hand version shown
—For inserts program, see page(s) 566
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DRSNR2525M12-M	02588153	25	25	150	32,0	30,0	45,0	-6,0	-6,0	0,8	RN..1204.. *RN..43.*
DRSNR3225P12-M	02588154	32	25	170	32,0	30,0	45,0	-6,0	-6,0	1,1	RN..1204.. *RN..43.*
DRSNL2525M12-M	02588155	25	25	150	32,0	30,0	45,0	-6,0	-6,0	0,8	RN..1204.. *RN..43.*
DRSNL3225P12-M	02588156	32	25	170	32,0	30,0	45,0	-6,0	-6,0	1,1	RN..1204.. *RN..43.*

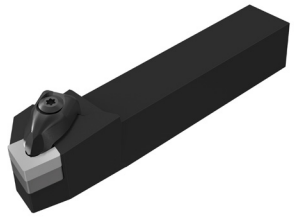
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DRN120600	1/4HEX-T15PX50	C04008-T15P	S6912

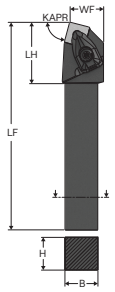
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

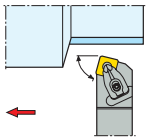
DSBNR/L..-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



DSBNR/L..-M



KAPR = 75,0 °



CTWS



- Right-hand version shown
- For inserts program, see page(s) 569, 570, 571, 572, 604
- For holder code key, see page(s) 16-17
- Shim DSN120416 for insert SN..1206.., to be ordered separately
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DSBNR2020K12-M	02588157	20	20	125	17,0	37,0	75,0	-6,0	-6,0	0,5	SN..1204.. *SN..43.*
DSBNR2525M12-M	02588158	25	25	150	22,0	36,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
DSBNL2020K12-M	02588159	20	20	125	17,0	37,0	75,0	-6,0	-6,0	0,5	SN..1204.. *SN..43.*
DSBNL2525M12-M	02588160	25	25	150	22,0	36,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
DSBNR2525M15-M	02588161	25	25	150	22,0	41,0	75,0	-6,0	-6,0	0,8	SN..1506.. *SN..54.*
DSBNR3232P15-M	02588163	32	32	170	27,0	42,0	75,0	-6,0	-6,0	1,4	SN..1506.. *SN..54.*
DSBNL2525M15-M	02588164	25	25	150	22,0	41,0	75,0	-6,0	-6,0	0,8	SN..1506.. *SN..54.*
DSBNL3232P15-M	02588166	32	32	170	27,0	42,0	75,0	-6,0	-6,0	1,4	SN..1506.. *SN..54.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...15	FP2012	L86026-T20P	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010

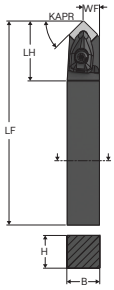
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
...15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60

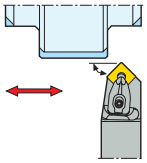
DSDNN..-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



DSDNN..-M



KAPR = 45,0 °



CTWS



—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DSDNN2020K12-M	02588189	20	20	125	10,3	37,0	45,0	-6,0	-6,0	0,4	SN..1204.. *SN..43.*
DSDNN2525M12-M	02588190	25	25	150	12,8	36,0	45,0	-6,0	-6,0	0,7	SN..1204.. *SN..43.*
DSDNN3232P12-M	02588191	32	32	170	16,3	36,0	45,0	-6,0	-6,0	1,3	SN..1204.. *SN..43.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912

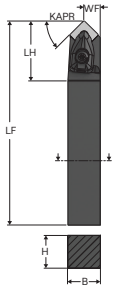
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

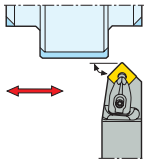
DSDNN – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Inch



DSDNN



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 18-19
—Shim DSN434 for insert SN..44., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	LFS	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch				lbs	
DSDNN-12-4B	02904197	0.750	0.750	4.500	4.173	0.386	1.260	45,0	-6,0	-6,0	0.880	SN..1204.. *SN..43.*
DSDNN-16-4D	02904198	1.000	1.000	6.000	5.669	0.512	1.575	45,0	-6,0	-6,0	1.760	SN..1204.. *SN..43.*
DSDNN-20-4D	02904199	1.250	1.250	6.000	5.674	0.638	1.575	45,0	-6,0	-6,0	2.650	SN..1204.. *SN..43.*

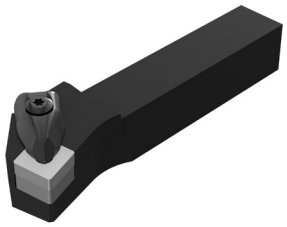
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-4	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912

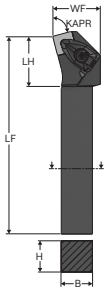
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

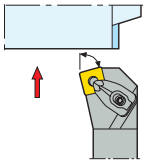
DSKNR/L..-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



DSKNR/L..-M



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—Shim DSN190640 for insert SNMM190624W-R7, to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DSKNR2020K12-M	02588192	20	20	125	25,0	33,0	75,0	-6,0	-6,0	0,5	SN..1204.. *SN..43.*
DSKNR2525M12-M	02588193	25	25	150	32,0	33,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
DSKNR3225P12-M	02588194	32	25	170	32,0	35,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
DSKNL2020K12-M	02588195	20	20	125	25,0	33,0	75,0	-6,0	-6,0	0,5	SN..1204.. *SN..43.*
DSKNL2525M12-M	02588196	25	25	150	32,0	33,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
DSKNL3225P12-M	02588197	32	25	170	32,0	35,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
DSKNR3232P19-M	02588198	32	32	170	40,0	37,0	75,0	-6,0	-6,0	1,5	SN..1906.. *SN..64.*
DSKNL3232P19-M	02588199	32	32	170	40,0	37,0	75,0	-6,0	-6,0	1,5	SN..1906.. *SN..64.*

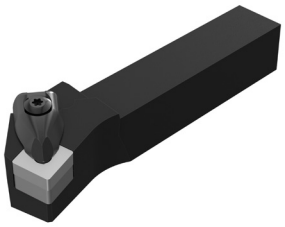
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...19	FP2012	L86026-T20P	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010

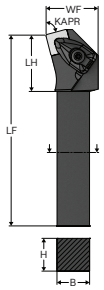
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
...19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

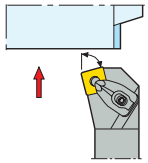
DSKNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM, SNMP – Inch



DSKNR/L



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 18-19
—Shim DSN434 for insert SN..44., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DSKNR-12-4B	02565534	0.750	0.750	4.500	1.000	1.299	75,0	-6,0	-6,0	0.880	SN..1204.. *SN..43.*
DSKNR-16-4D	02565535	1.000	1.000	6.000	1.250	1.378	75,0	-6,0	-6,0	1.760	SN..1204.. *SN..43.*
DSKNL-12-4B	02565537	0.750	0.750	4.500	1.000	1.299	75,0	-6,0	-6,0	0.880	SN..1204.. *SN..43.*
DSKNL-16-4D	02565538	1.000	1.000	6.000	1.250	1.378	75,0	-6,0	-6,0	1.760	SN..1204.. *SN..43.*
DSKNR-16-5D	02565540	1.000	1.000	6.000	1.250	1.400	75,0	-6,0	-6,0	1.980	SN..1506.. *SN..54.*
DSKNL-16-5D	02565542	1.000	1.000	6.000	1.250	1.400	75,0	-6,0	-6,0	1.980	SN..1506.. *SN..54.*

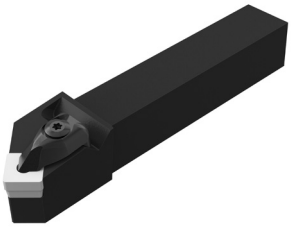
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-4	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
..-5	FP2012	L86026-T20P	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010

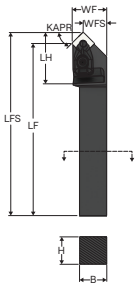
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
..-5	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60

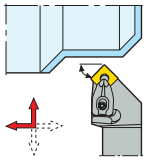
DSSNR/L..-M – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



DSSNR/L..-M



KAPR = 45,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—Shim DSN190640 for insert SNMM190624W-R7, to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	LFS	WF	WFS	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
DSSNR1616H09-M	02588167	16	16	101	107,1	20,0	14,1	32,0	45,0	-8,0	0,0	0,3	SN..0903.. *SN..32.*
DSSNR2020K09-M	02588168	20	20	125	132,1	25,0	19,1	32,0	45,0	-8,0	0,0	0,5	SN..0903.. *SN..32.*
DSSNR2525M09-M	02588169	25	25	150	157,1	32,0	26,1	32,0	45,0	-8,0	0,0	0,8	SN..0903.. *SN..32.*
DSSNL1616H09-M	02588170	16	16	101	107,1	20,0	14,1	32,0	45,0	-8,0	0,0	0,3	SN..0903.. *SN..32.*
DSSNR2020K12-M	02588173	20	20	125	134,3	25,0	16,9	39,0	45,0	-8,0	0,0	0,5	SN..1204.. *SN..43.*
DSSNR2525M12-M	02588174	25	25	150	159,3	32,0	23,9	39,0	45,0	-8,0	0,0	0,8	SN..1204.. *SN..43.*
DSSNR3225P12-M	02588175	32	25	170	179,3	32,0	23,9	39,0	45,0	-8,0	0,0	1,2	SN..1204.. *SN..43.*
DSSNL2020K12-M	02588176	20	20	125	134,3	25,0	16,9	39,0	45,0	-8,0	0,0	0,5	SN..1204.. *SN..43.*
DSSNL2525M12-M	02588177	25	25	150	159,3	32,0	23,9	39,0	45,0	-8,0	0,0	0,8	SN..1204.. *SN..43.*
DSSNL3225P12-M	02588178	32	25	170	179,3	32,0	23,9	39,0	45,0	-8,0	0,0	1,2	SN..1204.. *SN..43.*
DSSNR2525M15-M	02588179	25	25	150	161,2	32,0	22,0	41,0	45,0	-8,0	0,0	0,9	SN..1506.. *SN..54.*
DSSNR3232P15-M	02588181	32	32	171	181,2	40,0	29,6	42,0	45,0	-8,0	0,0	1,5	SN..1506.. *SN..54.*
DSSNL2525M15-M	02588182	25	25	150	161,2	32,0	22,0	41,0	45,0	-8,0	0,0	0,9	SN..1506.. *SN..54.*
DSSNL3232P15-M	02588184	32	32	171	181,2	40,0	29,6	42,0	45,0	-8,0	0,0	1,5	SN..1506.. *SN..54.*
DSSNR3232P19-M	02588185	32	32	171	181,2	40,0	30,0	46,0	45,0	-8,0	0,0	1,5	SN..1906.. *SN..64.*
DSSNR4040R19-M	02588186	40	40	201	213,5	50,0	31,7	46,0	45,0	-8,0	0,0	2,6	SN..1906.. *SN..64.*
DSSNL3232P19-M	02588187	32	32	171	181,2	40,0	30,0	46,0	45,0	-8,0	0,0	1,5	SN..1906.. *SN..64.*
DSSNL4040R19-M	02588188	40	40	201	213,5	50,0	31,7	46,0	45,0	-8,0	0,0	2,6	SN..1906.. *SN..64.*

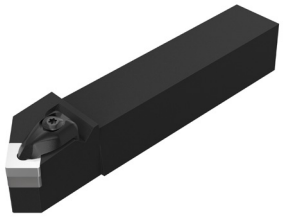
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...12	–	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912
...15	–	FP2012	L86026-T20P	CD16-S	DSN150624	1/4HEX-T20PX50	C05010-T20P	S7010
...19	–	FP2012	L86026-T20P	CD19-S	DSN190624	1/4HEX-T20PX50	C05010-T20P	S7010
DSSNL1616H09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DSN090310	–	C03007-T09P	S5608
DSSNR1616H09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DSN090310	–	C03007-T09P	S5608
DSSNR2020K09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DSN090310	–	C03007-T09P	S5608
DSSNR2525M09-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DSN090310	–	C03007-T09P	S5608

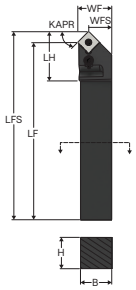
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
...15	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	–	T00T-20P60
...19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	–	T00T-20P60
DSSNL1616H09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DSSNR1616H09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DSSNR2020K09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DSSNR2525M09-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20

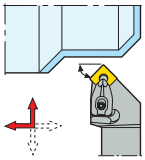
DSSNR/L – Toolholders for inserts SNGA, SNGN, SNMA, SNMG, SNMM, SNMN, SNMP – Inch



DSSNR/L



KAPR = 45,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For holder code key, see page(s) 18–19
—Shim DSN434 for insert SN..44., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	LFS	WF	WFS	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
DSSNR-16-4D	02565549	1.000	1.000	5.996	5.669	0.750	1.078	1.575	45,0	-6,0	-6,0	1.760	SN..1204.. *SN..43.*

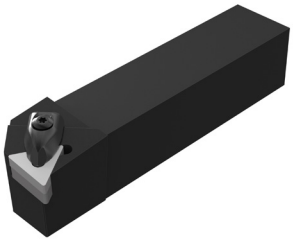
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-4	FP2012	L85021-T15P	CD12-S	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912

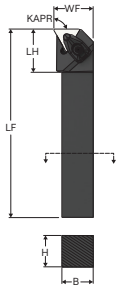
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

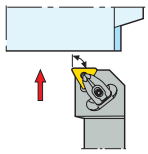
DTFNR/L..-M – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



DTFNR/L..-M



KAPR = 90,0 °



CTWS



- Right-hand version shown
- For inserts program, see page(s) 575, 576, 577, 578, 609
- For holder code key, see page(s) 16-17
- Shim DTN220640 for insert TN..220432.., to be ordered separately
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DTFNR2020K16-M	02588210	8	8	152	31,75	30,0	90,0	-6,0	-6,0	0,4	TN..1604.. *TN..33.*
DTFNR2525M16-M	02588211	8	8	125	25,4	29,0	90,0	-6,0	-6,0	0,8	TN..1604.. *TN..33.*
DTFNR3225P16-M	02588212	20	20	125	25,4	29,0	90,0	-6,0	-6,0	1,2	TN..1604.. *TN..33.*
DTFNL2020K16-M	02588213	20	20	125	25,0	30,0	90,0	-6,0	-6,0	0,4	TN..1604.. *TN..33.*
DTFNL2525M16-M	02588214	8	8	125	25,4	29,0	90,0	-6,0	-6,0	0,8	TN..1604.. *TN..33.*
DTFNL3225P16-M	02588215	20	20	125	25,4	29,0	90,0	-6,0	-6,0	1,1	TN..1604.. *TN..33.*
DTFNR2525M22-M	02588216	25	25	150	32,0	30,0	90,0	-6,0	-6,0	0,8	TN..2204.. *TN..43.*
DTFNR3232P22-M	02588218	32	32	170	40,0	32,0	90,0	-6,0	-6,0	1,4	TN..2204.. *TN..43.*
DTFNL2525M22-M	02588219	25	25	150	32,0	30,0	90,0	-6,0	-6,0	0,8	TN..2204.. *TN..43.*
DTFNL3232P22-M	02588221	32	32	170	40,0	32,0	90,0	-6,0	-6,0	1,4	TN..2204.. *TN..43.*

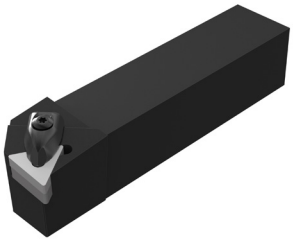
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...22	–	FP2012	L85021-T15P	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912
DTFNL2020K16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTFNL2525M16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTFNL3225P16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTFNR2020K16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTFNR2525M16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTFNR3225P16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608

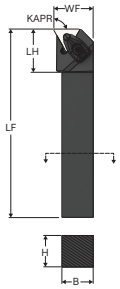
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...22	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
DTFNL2020K16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DTFNL2525M16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DTFNL3225P16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
DTFNR2020K16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DTFNR2525M16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DTFNR3225P16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20

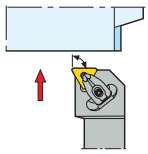
DTFNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMP – Inch



DTFNR/L



KAPR = 90,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 575, 576, 577, 578, 609
–For holder code key, see page(s) 18-19
–Shim DTN220640 for insert TN..220432.., to be ordered separately
–For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DTFNR-16-3D	02880414	0.315	0.315	4.921	1.000	1.142	90,0	-6,0	-6,0	1.760	TN..1604.. *TN..33.*
DTFNR-16-4D	02565878	1.000	1.000	6.000	1.250	1.378	90,0	-6,0	-6,0	1.760	TN..2204.. *TN..43.*
DTFNL-16-4D	02565880	1.000	1.000	6.000	1.250	1.378	90,0	-6,0	-6,0	1.760	TN..2204.. *TN..43.*
DTFNL-20-4D	02565882	1.250	1.250	6.000	1.500	1.378	90,0	-6,0	-6,0	2.650	TN..2204.. *TN..43.*

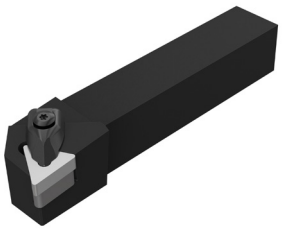
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-3	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
..-4	–	FP2012	L85021-T15P	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912

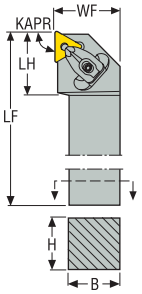
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-3	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35

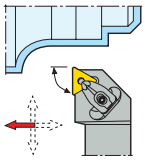
DTGNR/L..-M – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



DTGNR/L..-M



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 16-17
—Shim DTN220640 for insert TN..220432.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DTGNR2020K16-M	02588200	20	20	125	25,0	29,0	90,0	-6,0	-6,0	0,5	TN..1604.. *TN..33.*
DTGNR2525M16-M	02588201	25	25	150	32,0	30,0	90,0	-6,0	-6,0	0,8	TN..1604.. *TN..33.*
DTGNL2020K16-M	02588202	20	20	125	25,0	29,0	90,0	-6,0	-6,0	0,5	TN..1604.. *TN..33.*
DTGNL2525M16-M	02588203	25	25	150	32,0	30,0	90,0	-6,0	-6,0	0,8	TN..1604.. *TN..33.*
DTGNR2525M22-M	02588204	25	25	150	32,0	31,0	90,0	-6,0	-6,0	0,8	TN..2204.. *TN..43.*
DTGNR3232P22-M	02588206	32	32	170	40,0	32,0	90,0	-6,0	-6,0	1,4	TN..2204.. *TN..43.*
DTGNL2525M22-M	02588207	25	25	150	32,0	31,0	90,0	-6,0	-6,0	0,8	TN..2204.. *TN..43.*
DTGNL3232P22-M	02588209	32	32	170	40,0	32,0	90,0	-6,0	-6,0	1,4	TN..2204.. *TN..43.*

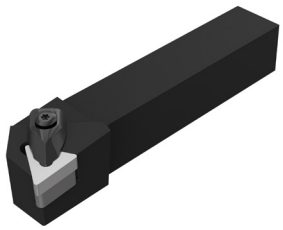
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...22	–	FP2012	L85021-T15P	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912
DTGNL2020K16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTGNL2525M16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTGNR2020K16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
DTGNR2525M16-M	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608

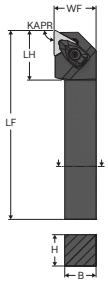
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...22	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
DTGNL2020K16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DTGNL2525M16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DTGNR2020K16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DTGNR2525M16-M	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20

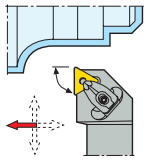
DTGNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMP – Inch



DTGNR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 18-19
—Shim DTN220640 for insert TN..220432.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DTGNR-12-3B	02565562	0.750	0.750	4.500	1.000	1.181	90,0	-6,0	-6,0	0.880	TN..1604.. *TN..33.*
DTGNL-12-3B	02565564	0.750	0.750	4.500	1.000	1.181	90,0	-6,0	-6,0	0.880	TN..1604.. *TN..33.*
DTGNR-16-4D	02565566	1.000	1.000	6.000	1.250	1.378	90,0	-6,0	-6,0	1.760	TN..2204.. *TN..43.*
DTGNL-16-4D	02565568	1.000	1.000	6.000	1.250	1.378	90,0	-5,0	-6,0	1.980	TN..2204.. *TN..43.*
DTGNR-20-4D	02565567	1.250	1.250	6.000	1.500	1.378	90,0	-6,0	-6,0	2.870	TN..2204.. *TN..43.*

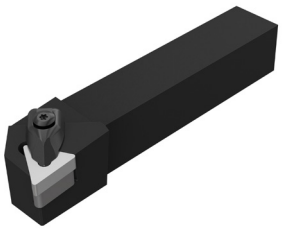
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-3	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DTN160616	–	C03007-T09P	S5608
..-4	–	FP2012	L85021-T15P	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912

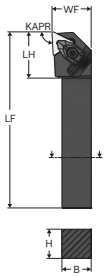
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-3	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-10P	1/4HEX-T09PX50	T00-10P20
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35

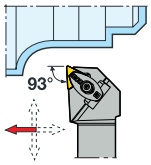
DTJNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMP, TNMX – Inch



DTJNR/L



KAPR = 93,0 °



–Right-hand version shown
–For inserts program, see page(s) 575, 576, 577, 578, 609, 612
–For holder code key, see page(s) 18–19
–Shim DTN220640 for insert TN..220432.., to be ordered separately
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DTJNR-12-3B	02565574	0.750	0.750	4.500	1.000	1.181	93,0	-6,0	-6,0	0.880	TN..1604.. *TN..33.*
DTJNR-16-3D	02565575	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.980	TN..1604.. *TN..33.*
DTJNL-12-3B	02565576	0.750	0.750	4.500	1.000	1.181	93,0	-6,0	-6,0	0.880	TN..1604.. *TN..33.*
DTJNL-16-3D	02565577	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.980	TN..1604.. *TN..33.*
DTJNR-16-4D	02565578	1.000	1.000	6.000	1.250	1.378	93,0	-6,0	-6,0	1.760	TN..2204.. *TN..43.*
DTJNR-20-4D	02565579	1.250	1.250	6.000	1.500	1.378	93,0	-6,0	-6,0	2.870	TN..2204.. *TN..43.*
DTJNL-16-4D	02565580	1.000	1.000	6.000	1.250	1.378	93,0	-6,0	-6,0	1.760	TN..2204.. *TN..43.*
DTJNL-20-4D	02565581	1.250	1.250	6.000	1.500	1.378	93,0	-6,0	-6,0	2.870	TN..2204.. *TN..43.*

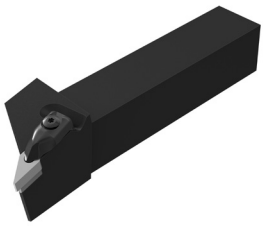
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-3	1/4HEX-T10PX50	–	L84017-T10P	–	DTN160616	–	C03007-T09P	–
..-4	–	FP2012	L85021-T15P	CD12-S	DTN220616	1/4HEX-T15PX50	C04008-T15P	S6912

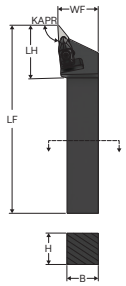
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-3	1/4HEX-S-HANDLE	CD09-S09	–	T00-10P	1/4HEX-T09PX50	T00-10P20
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35

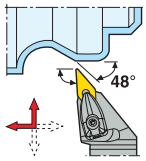
DVJNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG, VNMU – Metric



DVJNR/L



KAPR = 93,0 °



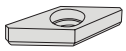
CTWS



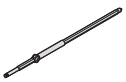
– Right-hand version shown
– For inserts program, see page(s) 585, 586, 614
– For holder code key, see page(s) 16-17
– For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DVJNR1616H13	02588228	8	8	100	20,0	42,0	93,0	-4,5	-13,5	0,3	VNMU1304.. *VNMU2.5.*
DVJNR2020K13	02564430	8	8	125	25,0	42,0	93,0	-4,5	-13,5	0,4	VNMU1304.. *VNMU2.5.*
DVJNR2525M13	02528621	8	8	150	32,0	42,0	93,0	-4,5	-13,5	0,8	VNMU1304.. *VNMU2.5.*
DVJNL1616H13	02588229	8	8	100	20,2	42,0	93,0	-4,5	-13,5	0,2	VNMU1304.. *VNMU2.5.*
DVJNL2020K13	02588230	8	8	125	25,0	42,0	93,0	-4,5	-13,5	0,4	VNMU1304.. *VNMU2.5.*
DVJNL2525M13	02588231	8	8	150	32,0	42,0	93,0	-4,5	-13,5	0,7	VNMU1304.. *VNMU2.5.*
DVJNR2020K16	02588232	20	20	125	25,0	41,0	93,0	-4,5	-13,5	0,5	VN..1604.. *VN..33.*
DVJNR2525M16	02588233	25	25	150	32,0	41,0	93,0	-4,5	-13,5	0,7	VN..1604.. *VN..33.*
DVJNR3225P16	02588234	32	25	170	32,0	41,0	93,0	-4,5	-13,5	1,0	VN..1604.. *VN..33.*
DVJNL2020K16	02588235	20	20	125	25,0	41,0	93,0	-4,5	-13,5	0,4	VN..1604.. *VN..33.*
DVJNL2525M16	02588236	25	25	150	32,0	41,0	93,0	-4,5	-13,5	0,8	VN..1604.. *VN..33.*
DVJNL3225P16	02576463	32	25	170	32,0	41,0	93,0	-4,5	-13,5	1,0	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...16	–	FP2012	L85021-T15P	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912
DVJNL1616H13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608
DVJNL2020K13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608
DVJNL2525M13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608
DVJNR1616H13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608
DVJNR2020K13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608
DVJNR2525M13	1/4HEX-T10PX50	FP1508	L84017-T10P	CD08-S	PVN130308	–	CS5008-T09P	S5608

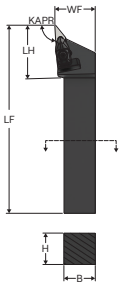
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...16	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	–	T00-15P35
DVJNL1616H13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DVJNL2020K13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	–	T00-09P20
DVJNL2525M13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	–	T00-09P20
DVJNR1616H13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	–	T00-09P20
DVJNR2020K13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DVJNR2525M13	1/4HEX-S-HANDLE	CD08-V13	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20

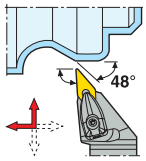
DVJNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMP, VNMU – Inch



DVJNR/L



KAPR = 93,0 °



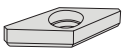
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DVJNR-12-3B	02822861	0.750	0.750	4.500	1.000	1.772	93,0	-4,5	-13,5	0.880	VN..1604.. *VN..33.*
DVJNR-16-3C	02822863	1.000	1.000	5.000	1.250	1.772	93,0	-4,5	-13,5	1.320	VN..1604.. *VN..33.*
DVJNR-20-3D	02822866	0.750	0.750	4.500	1.000	1.772	93,0	-4,5	-13,5	2.430	VN..1604.. *VN..33.*
DVJNL-12-3B	02822862	0.750	0.750	4.500	1.000	1.772	93,0	-4,5	-13,5	0.880	VN..1604.. *VN..33.*
DVJNL-16-3C	02822864	1.000	1.000	5.000	1.250	1.772	93,0	-4,5	-13,5	1.320	VN..1604.. *VN..33.*
DVJNL-20-3D	02822867	1.250	1.250	6.000	1.500	1.654	93,0	-4,5	-13,5	2.430	VN..1604.. *VN..33.*

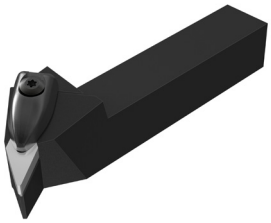
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-3	FP2012	L85021-T15P	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912

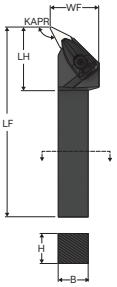
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-3	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35

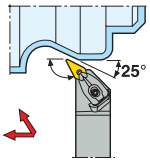
DVPNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric



DVPNR/L



KAPR = 117,5 °



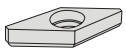
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DVPNR2020K16	02588222	20	20	125	25,0	42,0	117,5	-4,5	-13,5	0,5	VN..1604.. *VN..33.*
DVPNR2525M16	02588223	25	25	150	32,0	41,0	117,5	-4,5	-13,5	0,8	VN..1604.. *VN..33.*
DVPNR3232P16	02588224	32	32	170	40,0	41,0	117,5	-4,5	-13,5	1,4	VN..1604.. *VN..33.*
DVPNL2020K16	02588225	20	20	125	25,0	42,0	117,5	-4,5	-13,5	0,5	VN..1604.. *VN..33.*
DVPNL2525M16	02588226	25	25	150	32,0	41,0	117,5	-4,5	-13,5	0,8	VN..1604.. *VN..33.*
DVPNL3232P16	02588227	32	32	170	40,0	41,0	117,5	-4,5	-13,5	1,4	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...16	FP2012	L85021-T15P	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912

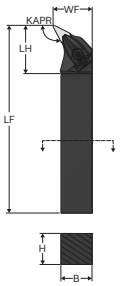
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...16	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35

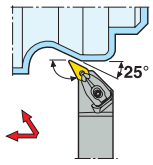
DVPNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMP, VNMU – Inch



DVPNR/L



KAPR = 117,5 °



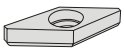
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DVPNR-16-3D	02880417	0.996	0.996	6.000	1.250	1.772	117,5	-4,0	-12,5	1.760	VN..1604.. *VN..33.*
DVPNL-16-3D	02880415	0.996	0.996	6.000	1.250	1.772	117,5	-4,0	-12,5	1.760	VN..1604.. *VN..33.*

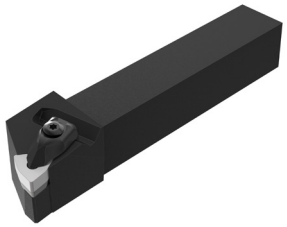
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-3	FP2012	L85021-T15P	CD19-S-V16	DVN160310	1/4HEX-T15PX50	C03508-T15P	S6912

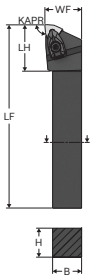
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-3	1/4HEX-S-HANDLE	CD19-V16	3.5NM	T00-15P	T00-15P35

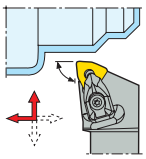
DWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric



DWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 16–17
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DWLNR1616H06	02588237	16	16	100	20,0	31,0	95,0	-6,0	-6,0	0,3	WN..0604.. *WN..33.*
DWLNR2020K06	00038364	20	20	125	25,0	31,0	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
DWLNR2525M06	00038365	8	8	150	32,0	30,0	95,0	-6,0	-6,0	0,8	WN..0604.. *WN..33.*
DWLNR3232P06	02588238	32	32	170	40,0	32,0	95,0	-6,0	-6,0	1,4	WN..0604.. *WN..33.*
DWLNL1616H06	02588239	16	16	100	20,0	31,0	95,0	-6,0	-6,0	0,3	WN..0604.. *WN..33.*
DWLNL2020K06	00038361	20	20	125	25,0	31,0	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
DWLNL2525M06	00038362	25	25	150	32,0	30,0	95,0	-6,0	-6,0	0,8	WN..0604.. *WN..33.*
DWLNL3232P06	02588240	32	32	170	40,0	32,0	95,0	-6,0	-6,0	1,4	WN..0604.. *WN..33.*
DWLNR2020K08	02588241	8	8	125	25,0	31,0	95,0	-6,0	-6,0	0,5	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR2525M08	00038372	8	8	150	32,0	35,0	95,0	-6,0	-6,0	0,8	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR3232P08	00038374	8	8	170	40,0	35,0	95,0	-6,0	-6,0	1,4	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL2020K08	02588242	8	8	125	25,0	31,0	95,0	-6,0	-6,0	0,4	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL2525M08	00038368	8	8	150	32,0	35,0	95,0	-6,0	-6,0	0,8	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL3232P08	00038370	32	32	170	40,0	35,0	95,0	-6,0	-6,0	1,4	WN..0804-WN..0806* *WN..43-WN..44**

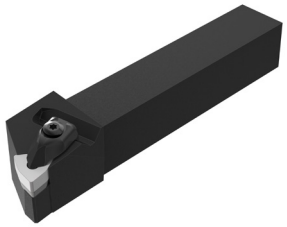
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...08	–	FP2012	L85021-T15P	CD12-S	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912
DWLNL1616H06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNL2020K06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNL2525M06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNL3232P06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR1616H06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR2020K06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR2525M06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR3232P06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608

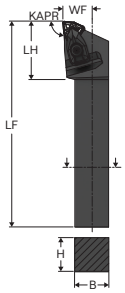
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
...08	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
DWLNL1616H06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNL2020K06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNL2525M06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNL3232P06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNR1616H06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNR2020K06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNR2525M06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DWLNR3232P06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20

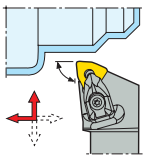
DWLNR/L – Toolholders for inserts WNGA, WNGP, WNMA, WNMG, WNMM, WNMP – Inch



DWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 18–19
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
DWLNR-10-3B	02880420	0.625	0.625	4.500	0.875	1.181	95,0	-6,0	-6,0	0.660	WN..0604.. *WN..33.*
DWLNR-12-3B	02565594	0.315	0.315	4.500	1.000	1.260	95,0	-6,0	-6,0	0.880	WN..0604.. *WN..33.*
DWLNR-16-3D	02565596	0.315	0.315	6.000	1.250	1.260	95,0	-6,0	-6,0	1.760	WN..0604.. *WN..33.*
DWLNL-10-3B	02880419	0.625	0.625	4.500	0.875	1.181	95,0	-6,0	-6,0	0.660	WN..0604.. *WN..33.*
DWLNL-12-3B	02565598	0.750	0.750	4.500	1.000	1.260	95,0	-6,0	-6,0	0.880	WN..0604.. *WN..33.*
DWLNL-16-3D	02565600	1.000	1.000	6.000	1.250	1.260	95,0	-6,0	-6,0	1.760	WN..0604.. *WN..33.*
DWLNR-12-4B	02565602	0.750	0.750	4.500	1.000	1.378	95,0	-6,0	-6,0	0.880	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR-16-4D	02569286	0.315	0.315	6.000	1.250	1.378	95,0	-6,0	-6,0	1.760	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR-16-4D-C	02605007	1.000	1.000	6.000	1.250	1.378	95,0	-6,0	-6,0	1.760	WN..0804-WN..0806* *WN..43-WN..44**
DWLNR-20-4D	02565605	0.315	0.315	6.000	1.500	1.378	95,0	-6,0	-6,0	2.650	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-12-4B	02565606	0.315	0.315	4.500	1.000	1.378	95,0	-6,0	-6,0	0.880	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-16-4D	02569287	1.000	1.000	6.000	1.250	1.378	95,0	-6,0	-6,0	1.760	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-16-4D-C	02605010	1.000	1.000	6.000	1.250	1.378	95,0	-6,0	-6,0	1.760	WN..0804-WN..0806* *WN..43-WN..44**
DWLNL-20-4D	02565609	0.315	0.315	6.000	1.500	1.378	95,0	-6,0	-6,0	2.650	WN..0804-WN..0806* *WN..43-WN..44**

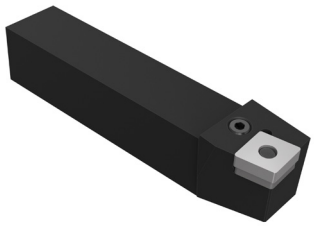
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-4	–	FP2012	L85021-T15P	CD12-S	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912
DWLNL-10-3B	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNL-12-3B	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNL-16-3D	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR-10-3B	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR-12-3B	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
DWLNR-16-3D	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608

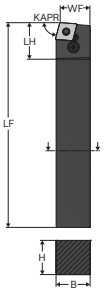
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Shim key	Torque key
						
..-4	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	–	T00-15P35
DWLNL-10-3B	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNL-12-3B	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNL-16-3D	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNR-10-3B	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	1/4HEX-T09PX50	T00-10P20
DWLNR-12-3B	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20
DWLNR-16-3D	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	–	T00-09P20

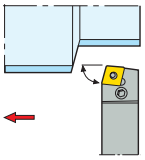
PCBNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric



PCBNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS

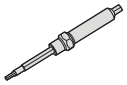


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PCBNR2525M12	00038382	25	25	150	22,0	26,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
PCBNL2525M12	00038383	25	25	150	22,0	26,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
PCBNR3232P19	02583736	32	32	170	27,0	37,0	75,0	-6,0	-6,0	1,3	CN..1906.. *CN..64.*
PCBNR4040S19	02803939	40	40	250	35,0	38,0	75,0	-6,0	-6,0	3,1	CN..1906.. *CN..64.*
PCBNL3232P19	00734298	32	32	170	27,0	37,0	75,0	-6,0	-6,0	1,3	CN..1906.. *CN..64.*
PCBNL4040S19	02803940	40	40	250	35,0	38,0	75,0	-6,0	-6,0	3,0	CN..1906.. *CN..64.*

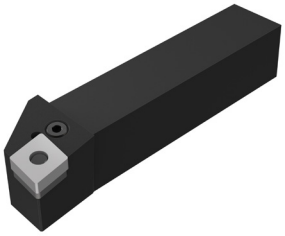
Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...12	PP4713	PCN120308	1/4HEX-H3.0X50	LS0818	MP0912	RP6757
...19	PP7521	PCN190416	1/4HEX-H4.0X50	LS1027	MP1519	RP9811

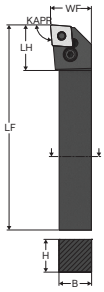
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...12	1/4HEX-S-HANDLE	–	–	–
...19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050

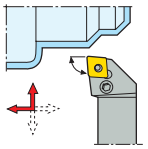
PCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric



PCLNR/L



KAPR = 95,0 °



CTWS



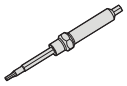
—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PCLNR2020K12	00038376	20	20	125	25,0	26,0	95,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
PCLNR2525M12	00038377	25	25	150	32,0	26,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
PCLNR3225P12	00038378	32	25	170	32,0	26,0	95,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
PCLNL2020K12	00038379	20	20	125	25,0	26,0	95,0	-6,0	-6,0	0,4	CN..1204.. *CN..43.*
PCLNL2525M12	00038380	25	25	150	32,0	26,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
PCLNL3225P12	00038381	32	25	170	32,0	26,0	95,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
PCLNR2525M16	02903947	25	25	150	32,0	33,0	95,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
PCLNR3232P16	02862002	32	32	170	40,0	33,0	95,0	-6,0	-6,0	1,4	CN..1606.. *CN..54.*
PCLNL2525M16	02903946	25	25	150	32,0	33,0	95,0	-6,0	-6,0	0,8	CN..1606.. *CN..54.*
PCLNL3232P16	02871184	32	32	170	40,0	33,0	95,0	-6,0	-6,0	1,4	CN..1606.. *CN..54.*
PCLNR3232P19	00734301	32	32	170	40,0	37,0	95,0	-6,0	-6,0	1,3	CN..1906.. *CN..64.*
PCLNR4040S19	02468695	40	40	250	50,0	38,0	95,0	-6,0	-6,0	3,0	CN..1906.. *CN..64.*
PCLNL3232P19	00734302	32	32	170	40,0	37,0	95,0	-6,0	-6,0	1,4	CN..1906.. *CN..64.*
PCLNL4040S19	02468696	40	40	250	50,0	38,0	95,0	-6,0	-6,0	3,1	CN..1906.. *CN..64.*
PCLNR4040S25	02450797	40	40	250	50,2	48,0	95,0	-6,0	-6,0	3,1	CN..2509.. *CN..86.*
PCLNL4040S25	02766744	40	40	250	50,2	48,0	95,0	-6,0	-6,0	3,1	CN..2509.. *CN..86.*

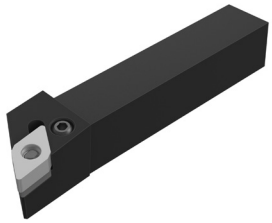
Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...12	PP4713	PCN120308	1/4HEX-H3.0X50	LS0818	MP0912	RP6757
...16	PP6017	PCN160412	1/4HEX-H3.0X50	LS0820	MP1519	RP8286
...19	PP7521	PCN190416	1/4HEX-H4.0X50	LS1027	MP1519	RP9811
...25	PP1325	PCN250620	1/4HEX-H5.0X50	LS1236	MP25	RP1312

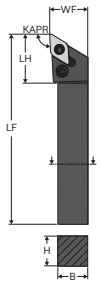
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...12	1/4HEX-S-HANDLE	–	–	–
...16	1/4HEX-S-HANDLE	–	–	–
...19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
...25	1/4HEX-S-HANDLE	5.0NM	H00T-5.0	H00T-5050

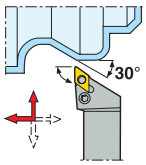
PDJNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric



PDJNR/L



KAPR = 93,0 °



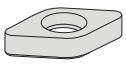
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 329, 330, 599
—For holder code key, see page(s) 16-17
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PDJNR1616H11	00038384	16	16	100	20,0	24,0	93,0	-6,0	-6,0	0,3	DNMU1104.. *DNMU33.*
PDJNR2020K11	00038385	20	20	125	25,0	30,0	93,0	-6,0	-7,0	0,4	DNMU1104.. *DNMU33.*
PDJNR2525M11	00038386	25	25	150	32,0	30,0	93,0	-6,0	-7,0	0,8	DNMU1104.. *DNMU33.*
PDJNR3225P11	00038387	32	25	170	32,0	30,0	93,0	-6,0	-7,0	1,1	DNMU1104.. *DNMU33.*
PDJNL1616H11	00038388	16	16	100	20,0	24,0	93,0	-6,0	-6,0	0,2	DNMU1104.. *DNMU33.*
PDJNL2020K11	00038389	20	20	125	25,0	30,0	93,0	-6,0	-7,0	0,4	DNMU1104.. *DNMU33.*
PDJNL2525M11	00038390	25	25	150	32,0	30,0	93,0	-6,0	-7,0	0,8	DNMU1104.. *DNMU33.*
PDJNL3225P11	00038391	32	25	170	32,0	30,0	93,0	-6,0	-7,0	1,1	DNMU1104.. *DNMU33.*
PDJNR2020K15	00038392	20	20	125	25,0	36,0	93,0	-6,0	-7,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
PDJNR2525M15	00038393	25	25	150	32,0	36,0	93,0	-6,0	-7,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
PDJNR3225P15	00038394	32	25	170	32,0	36,0	93,0	-6,0	-7,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**
PDJNL2020K15	00038395	20	20	125	25,0	36,0	93,0	-6,0	-7,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
PDJNL2525M15	00038396	25	25	150	32,0	36,0	93,0	-6,0	-7,0	0,8	DN..1504-DN..1506* *DN..43-DN..44**
PDJNL3225P15	00038397	32	25	170	32,0	36,0	93,0	-6,0	-7,0	1,1	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...11	PP3512	PDN110308	1/4HEX-H2.5X50	LS0616	MP0912	RP5153
...15	PP4716	PDN150308	1/4HEX-H3.0X50	LS0822	MP0912	RP6757

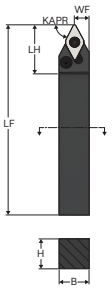
Accessories

For	Bit holder	Insert clamping torque	Torque key
			
...11	1/4HEX-S-HANDLE	3.0NM	H00-2530
...15	1/4HEX-S-HANDLE	–	–

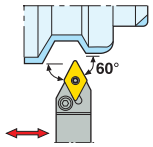
PDNNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU – Metric



PDNNR/L



KAPR = 63,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 16-17
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PDNNR1616H11	02411172	16	16	100	8,0	25,0	63,0	-6,0	-6,0	0,2	DNMU1104.. *DNMU33.*
PDNNR2020K11	75077811	20	20	125	10,0	25,0	63,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
PDNNR2525M11	75077812	25	25	150	12,5	30,0	63,0	-6,0	-6,0	0,7	DNMU1104.. *DNMU33.*
PDNNL1616H11	02411173	16	16	100	8,0	25,0	63,0	-6,0	-6,0	0,3	DNMU1104.. *DNMU33.*
PDNNL2020K11	75079685	20	20	125	10,0	25,0	63,0	-6,0	-6,0	0,4	DNMU1104.. *DNMU33.*
PDNNL2525M11	75079686	25	25	150	12,5	30,0	63,0	-6,0	-6,0	0,7	DNMU1104.. *DNMU33.*
PDNNR2020K15	02411180	20	20	125	10,0	36,0	63,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
PDNNR2525M15	02411182	25	25	150	12,5	36,0	63,0	-6,0	-6,0	0,7	DN..1504-DN..1506* *DN..43-DN..44**
PDNNR3225P15	02411186	32	25	170	12,5	36,0	63,0	-6,0	-6,0	1,0	DN..1504-DN..1506* *DN..43-DN..44**
PDNNL2020K15	02411181	20	20	125	10,0	36,0	63,0	-6,0	-6,0	0,4	DN..1504-DN..1506* *DN..43-DN..44**
PDNNL2525M15	02411185	25	25	150	12,5	36,0	63,0	-6,0	-6,0	0,7	DN..1504-DN..1506* *DN..43-DN..44**
PDNNL3225P15	02411187	32	25	170	12,5	36,0	63,0	-6,0	-6,0	1,0	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...11	PP3512	PDN110308	1/4HEX-H2.5X50	LS0616	MP0912	RP5153
...15	PP4716	PDN150308	1/4HEX-H3.0X50	LS0822	MP0912	RP6757

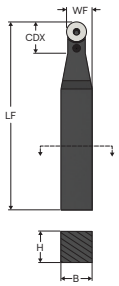
Accessories

For	Bit holder	Insert clamping torque	Torque key
			
...11	1/4HEX-S-HANDLE	3.0NM	H00-2530
...15	1/4HEX-S-HANDLE	–	–

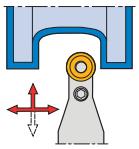
PRDCN – Toolholders for inserts RCMX – Metric



PRDCN



KAPR



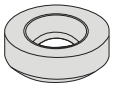
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS

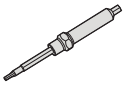


Designation	Item number	H	B	LF	WF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PRDCN3232P20	02751641	32	32	170	26,0	33,5	–	0,0	-8,0	1,2	RC..2006..
PRDCN4040S25	02674471	40	40	250	32,5	45,0	–	0,0	-8,0	2,9	RC..2507..
PRDCN5050T32	02616805	50	50	300	40,9	50,0	–	0,0	-8,0	5,3	RC..3209..

Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...20	PP5620	PRN2004M0	1/4HEX-H3.0X50	LS0823	MP1519	RP8286
...25	PP6224	PRN2506M0	1/4HEX-H4.0X50	LS1030	MP1519	RP9811
...32	PP8030	PRN3206M0	1/4HEX-H5.0X50	LS1236	MP25	RP1312

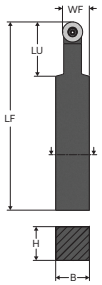
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...20	1/4HEX-S-HANDLE	–	–	–
...25	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
...32	1/4HEX-S-HANDLE	–	–	–

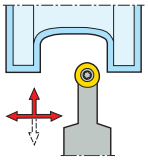
PROON – Toolholders for inserts RCMM – Inch



PROON



KAPR



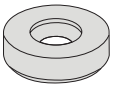
CTWS



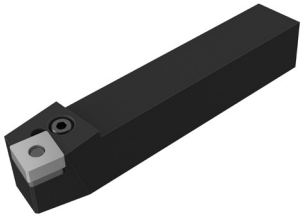
—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
PROON-20-6	00015025	1.250	1.250	7.000	1.000	2.000	–	0,0	0,0	2.650	RC..1906 *RC..64*
PROON-20-8	00015030	1.250	1.250	10.000	1.125	2.500	–	0,0	0,0	4.190	RC..2506 *RC..84*
PROON-85-4	00015040	1.252	1.000	6.000	0.750	1.500	–	0,0	0,0	1.980	RC..120400 *RC..43*

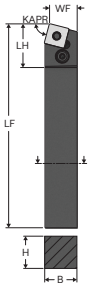
Spare Parts, included in delivery

For	Insert pin	Insert shim
		
20-6	PL-68	RSP190400
20-8	PL-68	RS83P
85-4	PL-46	RSP120400

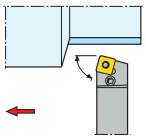
PSBNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



PSBNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS

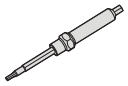


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PSBNR2020K12	00038404	20	20	125	20,3	26,0	75,0	-6,0	-6,0	0,4	SN..1204.. *SN..43.*
PSBNR2525M12	00038405	25	25	150	25,3	26,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
PSBNR3225P12	00038406	32	25	170	25,3	26,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
PSBNL2020K12	00038407	20	20	125	20,3	26,0	75,0	-6,0	-6,0	0,4	SN..1204.. *SN..43.*
PSBNL2525M12	00038408	25	25	150	25,3	26,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
PSBNL3225P12	00038409	32	25	170	25,3	26,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
PSBNR3232P19	02573597	32	32	170	27,0	37,0	75,0	-6,0	-6,0	1,3	SN..1906.. *SN..64.*
PSBNR4040S19	00045698	40	40	250	35,0	38,0	75,0	-6,0	-6,0	3,0	SN..1906.. *SN..64.*
PSBNL3232P19	02573603	32	32	170	27,0	37,0	75,0	-6,0	-6,0	1,5	SN..1906.. *SN..64.*
PSBNL4040S19	00045697	40	40	250	35,0	38,0	75,0	-6,0	-6,0	3,0	SN..1906.. *SN..64.*
PSBNR4040S25	02573594	40	40	250	35,2	48,0	75,0	-6,0	-6,0	3,1	SN..2507.. *SN..85.*
PSBNR5050S25	02415304	50	50	250	43,2	48,0	75,0	-6,0	-6,0	4,8	SN..2507.. *SN..85.*
PSBNL4040S25	02414516	40	40	250	35,2	48,0	75,0	-6,0	-6,0	3,1	SN..2507.. *SN..85.*
PSBNL5050S25	02415305	50	50	250	43,2	48,0	75,0	-6,0	-6,0	4,7	SN..2507.. *SN..85.*
PSBNR4040S2509	02785011	40	40	250	35,2	48,0	75,0	-6,0	-6,0	3,0	SN..2509.. *SN..86.*

Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...12	PP4713	PSN120312	1/4HEX-H3.0X50	LS0818	MP0912	RP6757
...19	PP7521	PSN190412	1/4HEX-H4.0X50	LS1027	MP1519	RP9811
...25	PP1325	PSN250624	1/4HEX-H5.0X50	LS1236	MP25	RP1312

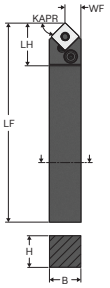
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...12	1/4HEX-S-HANDLE	–	–	–
...19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
...25	1/4HEX-S-HANDLE	5.0NM	H00T-5.0	H00T-5050

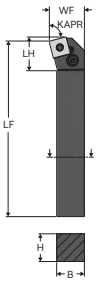
PSDNN, PSKNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



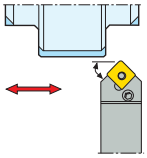
PSDNN



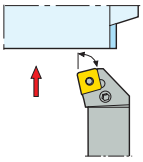
PSKNR/L



PSDNN
KAPR = 45,0 °



PSKNR/L
KAPR = 75,0 °



CTWS



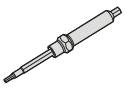
—PSDNN = Neutral version shown
—PSKNR/L = Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PSDNN2020K12	00038410	20	20	125	10,0	26,0	45,0	-7,0	-7,0	0,4	SN..1204.. *SN..43.*
PSDNN2525M12	00038411	25	25	150	12,5	26,0	45,0	-7,0	-7,0	0,7	SN..1204.. *SN..43.*
PSDNN3225P12	00038412	32	25	170	12,5	28,0	45,0	-7,0	-7,0	1,1	SN..1204.. *SN..43.*
PSDNN3232P19	00469420	32	32	170	16,0	40,0	45,0	-6,0	-6,0	1,3	SN..1906.. *SN..64.*
PSDNN4040S25	02414517	40	40	250	20,2	48,0	45,0	-6,0	-6,0	3,0	SN..2507.. *SN..85.*
PSKNR2020K12	00038413	20	20	125	25,0	23,0	75,0	-6,0	-6,0	0,5	SN..1204.. *SN..43.*
PSKNR2525M12	00038414	25	25	150	32,0	23,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*
PSKNL2020K12	00038416	20	20	125	25,0	23,0	75,0	-6,0	-6,0	0,4	SN..1204.. *SN..43.*
PSKNL2525M12	00038417	25	25	150	32,0	23,0	75,0	-6,0	-6,0	0,8	SN..1204.. *SN..43.*

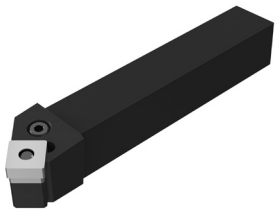
Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...12	PP4713	PSN120312	1/4HEX-H3.0X50	LS0818	MP0912	RP6757
...19	PP7521	PSN190412	1/4HEX-H4.0X50	LS1027	MP1519	RP9811
...25	PP1325	PSN250624	1/4HEX-H5.0X50	LS1236	MP25	RP1312

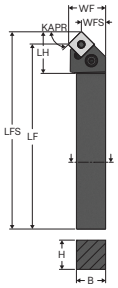
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...12	1/4HEX-S-HANDLE	–	–	–
...19	1/4HEX-S-HANDLE	5.0NM	H00T-4.0	H00T-4050
...25	1/4HEX-S-HANDLE	5.0NM	H00T-5.0	H00T-5050

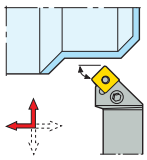
PSSNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric



PSSNR/L



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS

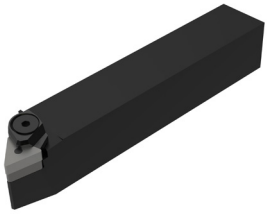


Designation	Item number	H	B	LF	LFS	WF	WFS	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
PSSNR2020K12	00038398	20	20	125	133,3	25,0	16,7	28,0	45,0	-8,0	0,0	0,5	SN..1204.. *SN..43.*
PSSNR2525M12	00038399	25	25	150	158,7	32,0	23,7	28,0	45,0	-8,0	0,0	0,8	SN..1204.. *SN..43.*
PSSNR3225P12	00038400	32	25	170	178,7	32,0	23,7	29,0	45,0	-8,0	0,0	1,1	SN..1204.. *SN..43.*
PSSNL2020K12	00038401	20	20	125	133,3	25,0	16,7	28,0	45,0	-8,0	0,0	0,5	SN..1204.. *SN..43.*
PSSNL2525M12	00038402	25	25	150	158,7	32,0	23,7	28,0	45,0	-8,0	0,0	0,8	SN..1204.. *SN..43.*
PSSNL3225P12	00038403	32	25	170	178,3	32,0	23,7	29,0	45,0	-8,0	0,0	1,1	SN..1204.. *SN..43.*

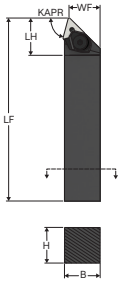
Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...12	PP4713	PSN120312	1/4HEX-H3.0X50	LS0818	MP0912	RP6757

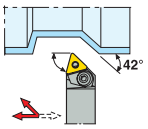
PTBNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



PTBNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS

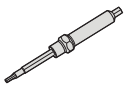
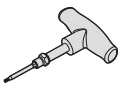


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PTBNR2525M16	00092429	25	25	150	22,0	26,0	75,0	-5,0	-6,0	0,7	TN..1604.. *TN..33.*
PTBNL2525M16	00092432	25	25	150	22,0	26,0	75,0	-5,0	-6,0	0,7	TN..1604.. *TN..33.*

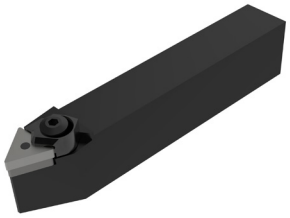
Spare Parts, included in delivery

For	Insert shim	Shim pin	Wedge clamp	Wedge key	Wedge screw
					
L...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655.1
R...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655.1

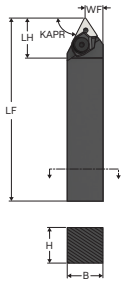
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
L...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050

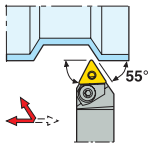
PTNNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



PTNNR/L



KAPR = 63,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS

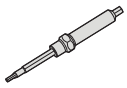
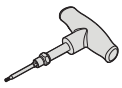


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PTNNR3225P16	00092433	32	25	170	13,0	28,0	63,0	-6,0	-5,0	1,0	TN..1604.. *TN..33.*
PTNNL3225P16	00092434	32	25	170	13,0	28,0	63,0	-6,0	-5,0	1,0	TN..1604.. *TN..33.*
PTNNR3225P22	00092435	32	25	170	13,0	34,0	63,0	-6,0	-5,0	1,0	TN..2204.. *TN..43.*
PTNNL3225P22	00092438	32	25	170	13,0	34,0	63,0	-6,0	-5,0	1,0	TN..2204.. *TN..43.*

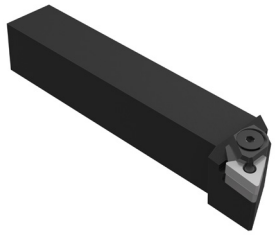
Spare Parts, included in delivery

For	Insert shim	Shim pin	Wedge clamp	Wedge key	Wedge screw
					
L...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655.1
L...22	170.26-624	PP2015-1-T15P	110.26-643.1	1/4HEX-H4.0X50	170.26-655
R...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655.1
R...22	170.26-624	PP2015-1-T15P	110.26-642.1	1/4HEX-H4.0X50	170.26-655

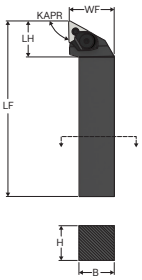
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
L...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
L...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060
R...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060

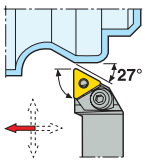
PTGNR/L, -..A – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



PTGNR/L, -..A



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PTGNR1616-11A	75011261	16	16	100	20,0	16,0	90,0	-5,0	-6,0	0,2	TN..1103.. *TN..22.*
PTGNL1616-11A	75011262	16	16	100	20,0	16,0	90,0	-5,0	-6,0	0,2	TN..1103.. *TN..22.*
PTGNR2020K16	00092181	20	20	125	25,0	23,0	90,0	-5,0	-6,0	0,4	TN..1604.. *TN..33.*
PTGNR2525M16	00092228	25	25	150	32,0	23,0	90,0	-5,0	-6,0	0,8	TN..1604.. *TN..33.*
PTGNR3225P16	00092319	32	25	170	32,0	23,0	90,0	-5,0	-6,0	1,1	TN..1604.. *TN..33.*
PTGNL2020K16	00092224	20	20	125	25,0	23,0	90,0	-5,0	-6,0	0,4	TN..1604.. *TN..33.*
PTGNL2525M16	00091326	25	25	150	32,0	23,0	90,0	-5,0	-6,0	0,8	TN..1604.. *TN..33.*
PTGNL3225P16	00092321	32	25	170	32,0	23,0	90,0	-5,0	-6,0	1,1	TN..1604.. *TN..33.*
PTGNR2525M22	00091446	25	25	150	32,0	29,0	90,0	-5,0	-6,0	0,8	TN..2204.. *TN..43.*
PTGNR3232P22	00092426	32	32	170	40,0	29,0	90,0	-5,0	-6,0	1,4	TN..2204.. *TN..43.*
PTGNL2525M22	00092413	25	25	150	32,0	29,0	90,0	-5,0	-6,0	0,8	TN..2204.. *TN..43.*
PTGNL3232P22	00092427	32	32	170	40,0	29,0	90,0	-5,0	-6,0	1,4	TN..2204.. *TN..43.*
PTGNR4040T27	75004457	40	40	300	50,0	38,0	90,0	-5,0	-6,0	3,7	TN..2706.. *TN..54.*
PTGNL4040T27	75004456	40	40	300	50,0	38,0	90,0	-5,0	-6,0	3,6	TN..2706.. *TN..54.*

Spare Parts, included in delivery

For	Insert shim	Locking screw	Nut	Punch	Shim pin	Wedge clamp	Wedge key	Wedge screw
								
L...11	117.26-620	136.26-654	–	–	117.26-654	110.26-638	1/4HEX-H2.5X50	117.26-657
L...22	170.26-624	–	–	–	PP2015-1-T15P	110.26-642.1	1/4HEX-H4.0X50	170.26-655
L...27	117.26-628	–	170.26-651	117.26-687	126.26-650	110.26-644	1/4HEX-H5.0X50	110.26-655
L20...16	117.26-622	–	–	–	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655
L25/32...16	117.26-622	–	–	–	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655.1
R...11	117.26-620	136.26-654	–	–	117.26-654	110.26-639	1/4HEX-H2.5X50	117.26-657
R...22	170.26-624	–	–	–	PP2015-1-T15P	110.26-643.1	1/4HEX-H4.0X50	170.26-655
R...27	117.26-628	–	170.26-651	117.26-687	126.26-650	110.26-645	1/4HEX-H5.0X50	110.26-655
R20...16	117.26-622	–	–	–	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655
R25/32...16	117.26-622	–	–	–	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655.1

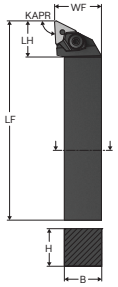
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
L...11	1/4HEX-S-HANDLE	3.0NM	H00-2.5	1/4HEX-H2.0X50	H00-2530
L...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060
L...27	1/4HEX-S-HANDLE	10.0NM	H00T-6.0	1/4HEX-H4.0X50	H00T-60100
L20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
L25/32...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R...11	1/4HEX-S-HANDLE	3.0NM	H00-2.5	1/4HEX-H2.0X50	H00-2530
R...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060
R...27	1/4HEX-S-HANDLE	10.0NM	H00T-6.0	1/4HEX-H4.0X50	H00T-60100
R20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R25/32...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050

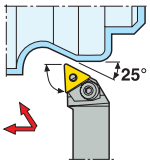
PTJNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMX – Metric



PTJNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 612
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS

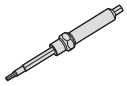
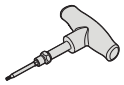


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PTJNR2020K16	00092147	20	20	125	25,0	23,0	93,0	-5,0	-6,0	0,4	TN..1604.. *TN..33.*
PTJNR2525M16	00092153	25	25	150	32,0	23,0	93,0	-5,0	-6,0	0,8	TN..1604.. *TN..33.*
PTJNR3232P16	00092156	32	32	170	40,0	23,0	93,0	-5,0	-6,0	1,3	TN..1604.. *TN..33.*
PTJNL2020K16	00092149	20	20	125	25,0	23,0	93,0	-5,0	-6,0	0,4	TN..1604.. *TN..33.*
PTJNL2525M16	00092155	25	25	150	32,0	23,0	93,0	-5,0	-6,0	0,8	TN..1604.. *TN..33.*
PTJNL3232P16	00092159	32	32	170	40,0	23,0	93,0	-5,0	-6,0	1,3	TN..1604.. *TN..33.*
PTJNR2525M22	00092161	25	25	150	32,0	29,0	93,0	-5,0	-6,0	0,8	TN..2204.. *TN..43.*
PTJNR3232P22	00091023	32	32	170	40,0	29,0	93,0	-5,0	-6,0	1,3	TN..2204.. *TN..43.*
PTJNR4032R22	00092178	40	32	200	40,0	29,0	93,0	-5,0	-6,0	1,9	TN..2204.. *TN..43.*
PTJNL2525M22	00092162	25	25	150	32,0	29,0	93,0	-5,0	-6,0	0,8	TN..2204.. *TN..43.*
PTJNL3232P22	00092177	32	32	170	40,0	29,0	93,0	-5,0	-6,0	1,4	TN..2204.. *TN..43.*
PTJNL4032R22	00092179	40	32	200	40,0	29,0	93,0	-5,0	-6,0	1,9	TN..2204.. *TN..43.*

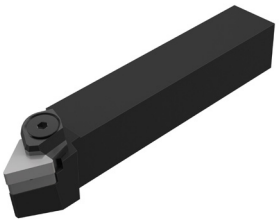
Spare Parts, included in delivery

For	Insert shim	Shim pin	Wedge clamp	Wedge key	Wedge screw
					
L...22	170.26-624	PP2015-1-T15P	110.26-642.1	1/4HEX-H4.0X50	170.26-655
L20...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655
L25/32...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655.1
R...22	170.26-624	PP2015-1-T15P	110.26-643.1	1/4HEX-H4.0X50	170.26-655
R20...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655
R25/32...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655.1

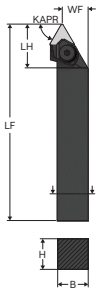
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
L...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060
L20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
L25/32...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R...22	1/4HEX-S-HANDLE	6.0NM	H00T-4.0	1/4HEX-T15PX50	H00T-4060
R20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R25/32...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050

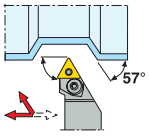
PTTNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric



PTTNR/L



KAPR = 60,0 °



–Right-hand version shown
–For inserts program, see page(s) 575, 576, 577, 578, 609
–For holder code key, see page(s) 16-17
–For ISO attribute explanation, see page 82

CTWS

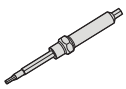
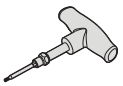


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PTTNR2020K16	00092439	20	20	125	17,0	28,0	60,0	-6,0	-5,0	0,4	TN..1604.. *TN..33.*
PTTNR2525M16	00092486	25	25	150	22,0	28,0	60,0	-6,0	-5,0	0,7	TN..1604.. *TN..33.*
PTTNL2020K16	00092473	20	20	125	17,0	28,0	60,0	-6,0	-5,0	0,4	TN..1604.. *TN..33.*
PTTNL2525M16	00092522	25	25	150	22,0	28,0	60,0	-6,0	-5,0	0,7	TN..1604.. *TN..33.*

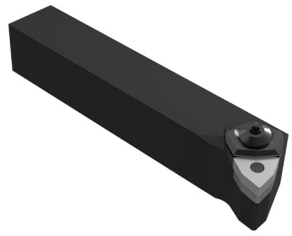
Spare Parts, included in delivery

For	Insert shim	Shim pin	Wedge clamp	Wedge key	Wedge screw
					
L20...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655
L25...16	117.26-622	PP2009-T09P	110.26-640.1	1/4HEX-H3.0X50	117.26-655.1
R20...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655
R25...16	117.26-622	PP2009-T09P	110.26-641.1	1/4HEX-H3.0X50	117.26-655.1

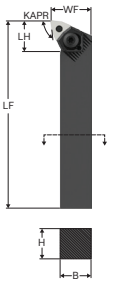
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
L20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
L25...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R20...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050
R25...16	1/4HEX-S-HANDLE	5.0NM	H00T-3.0	1/4HEX-T09PX50	H00T-3050

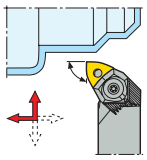
PWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric



PWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 16-17
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
PWLNR1616H06	75079504	16	16	100	20,0	21,0	95,0	-6,0	-6,0	0,3	WN..0604.. *WN..33.*
PWLNR2020K06	75028482	20	20	125	25,0	21,0	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
PWLNR2525M06	75028231	25	25	150	32,0	21,0	95,0	-6,0	-6,0	0,8	WN..0604.. *WN..33.*
PWLNR3232P06	75036498	32	32	170	40,0	21,0	95,0	-6,0	-6,0	1,4	WN..0604.. *WN..33.*
PWLNL1616H06	75079505	16	16	100	20,0	21,0	95,0	-6,0	-6,0	0,2	WN..0604.. *WN..33.*
PWLNL2020K06	75028483	20	20	125	25,0	21,0	95,0	-6,0	-6,0	0,4	WN..0604.. *WN..33.*
PWLNL2525M06	75027880	25	25	150	32,0	21,0	95,0	-6,0	-6,0	0,8	WN..0604.. *WN..33.*
PWLNL3232P06	75036499	32	32	170	40,0	21,0	95,0	-6,0	-6,0	1,3	WN..0604.. *WN..33.*
PWLNR2020K08	75027855	20	20	125	25,0	27,0	95,0	-6,0	-6,0	0,4	WN..0804.. *WN..43.*
PWLNR2525M08	75027854	25	25	150	32,0	27,0	95,0	-6,0	-6,0	0,8	WN..0804.. *WN..43.*
PWLNR3232P08	75027852	32	32	170	40,0	27,0	95,0	-6,0	-6,0	1,4	WN..0804.. *WN..43.*
PWLNL2020K08	75027856	20	20	125	25,0	27,0	95,0	-6,0	-6,0	0,4	WN..0804.. *WN..43.*
PWLNL2525M08	75027465	25	25	150	32,0	27,0	95,0	-6,0	-6,0	0,8	WN..0804.. *WN..43.*
PWLNL3232P08	75027853	32	32	170	40,0	27,0	95,0	-6,0	-6,0	1,4	WN..0804.. *WN..43.*

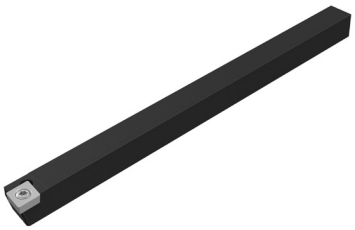
Spare Parts, included in delivery

For	Insert shim	Setting screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
						
...06	WAE060312	L82511-T07P	PP2109-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
...08	WAE080412	L82511-T07P	PP2015-1-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
...H06	WAE060312	L82511-T07P	PP1409-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P

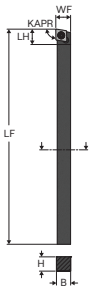
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
...08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
...H06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35

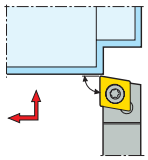
SCACR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



SCACR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SCACR0808K06	00042836	8	8	125	8,7	9,0	90,0	0,0	0,0	0,1	CC..0602.. CC..21.5.
SCACR1010M06	00042837	10	10	150	10,7	9,0	90,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCACR1212M06	02430771	12	12	150	12,7	9,0	90,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCACL0808K06	75011227	8	8	125	8,7	9,0	90,0	0,0	0,0	0,1	CC..0602.. CC..21.5.
SCACL1010M06	75011228	10	10	150	10,7	9,0	90,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCACL1212M06	02430823	12	12	150	12,7	9,0	90,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCACR1212M09	00042839	12	12	150	12,7	13,0	90,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.
SCACR1414M09	00042841	14	14	150	14,7	13,0	90,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.
SCACR1616H09	02430826	16	16	100	16,7	21,0	90,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.
SCACL1212M09	75011229	12	12	150	12,7	13,0	90,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.
SCACL1414M09	75011230	14	14	150	14,7	13,0	90,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.
SCACL1616H09	02430830	16	16	100	16,7	21,0	90,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.

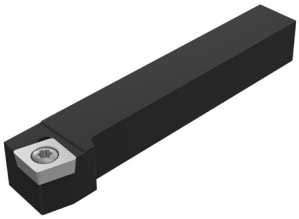
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...06	1/4HEX-T07PX50	C02506-T07P
...09	1/4HEX-T15PX50	C04008-T15P

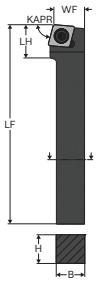
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

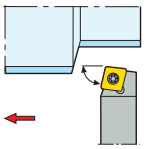
SCBCR/L – Toolholders for inserts CCGT, CCMT, CCGW..-LF – Metric



SCBCR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SCBCR1616H09	02484500	16	16	100	13,0	12,0	75,0	0,0	0,0	0,3	CC..0903.. CC..32.
SCBCR2020K09	02484537	20	20	125	17,0	12,0	75,0	0,0	0,0	0,4	CC..0903.. CC..32.
SCBCL1616H09	02484534	16	16	100	13,0	12,0	75,0	0,0	0,0	0,2	CC..0903.. CC..32.
SCBCL2020K09	02484540	20	20	125	17,0	12,0	75,0	0,0	0,0	0,4	CC..0903.. CC..32.

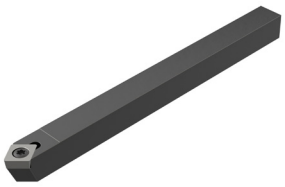
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...09	1/4HEX-T15PX50	C04008-T15P

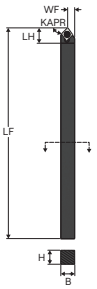
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

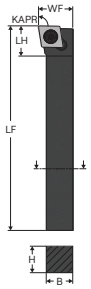
SCDCR/L, SCFCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



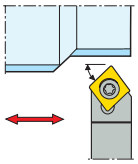
SCDCR/L



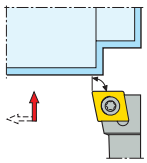
SCFCR/L



SCDCR/L
KAPR = 45,0 °



SCFCR/L
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SCDCR0808K06	02435799	8	8	125	4,2	11,0	45,0	0,0	0,0	0,1	CC..0602.. CC..21.5.
SCDCR1010M06	02435801	10	10	150	5,2	11,0	45,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCDCL0808K06	02435800	8	8	125	4,2	11,0	45,0	0,0	0,0	0,1	CC..0602.. CC..21.5.
SCDCL1010M06	02201468	10	10	150	5,2	11,0	45,0	0,0	0,0	0,2	CC..0602.. CC..21.5.
SCDCR1212M09	02435816	12	12	150	6,2	21,0	45,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.
SCDCR1414M09	02435819	14	14	150	7,2	21,0	45,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.
SCDCL1212M09	02435818	12	12	150	6,2	21,0	45,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.
SCDCL1414M09	02435821	14	14	150	7,2	21,0	45,0	0,0	0,0	0,3	CC..09T3.. CC..32.5.
SCFCR0808D06	75011627	8	8	60	10,0	9,0	90,0	0,0	0,0	0,1	CC..0602.. CC..21.5.
SCFCR1212F09	75011631	12	12	80	16,0	15,0	90,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.
SCFCL1212F09	75011632	12	12	80	16,0	15,0	90,0	0,0	0,0	0,2	CC..09T3.. CC..32.5.

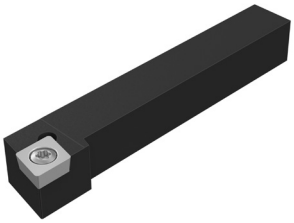
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...06	1/4HEX-T07PX50	C02506-T07P
...09	1/4HEX-T15PX50	C04008-T15P

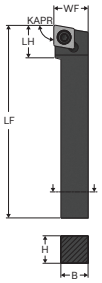
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

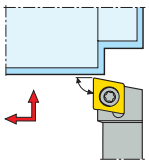
SCGCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



SCGCR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SCGCR0808D06	75011508	8	8	60	10,0	11,0	90,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
SCGCR1010E06	75011510	10	10	70	12,0	11,0	90,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
SCGCL1010E06	75011511	10	10	70	12,0	11,0	90,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
SCGCR1212F09	75011512	12	12	80	16,0	15,0	90,0	0,0	0,0	0,2	CC..09T3.. *CC..32.5.*
SCGCL1212F09	75011513	12	12	80	16,0	15,0	90,0	0,0	0,0	0,2	CC..09T3.. *CC..32.5.*

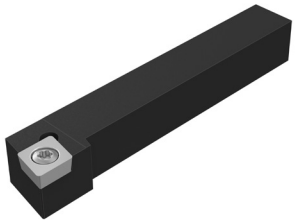
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...06	1/4HEX-T07PX50	C02506-T07P
...09	1/4HEX-T15PX50	C04008-T15P

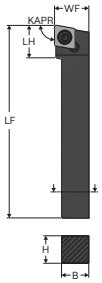
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

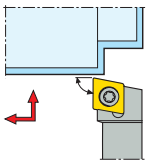
SCGCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Inch



SCGCR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SCGCR-8-3	00013326	0.500	0.500	3.500	0.625	0.620	90,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*
SCGCL-8-3	00013327	0.500	0.500	3.500	0.625	0.620	90,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*

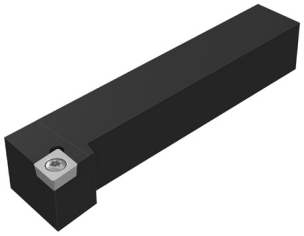
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-3	1/4HEX-T15PX50	C04008-T15P

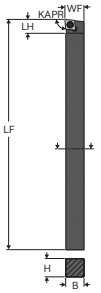
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

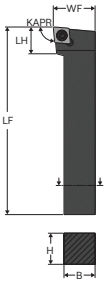
SCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



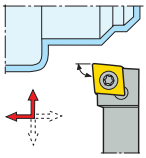
SCLCR/L



SCLCR/L..K09, ..K12



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SCLCR0808K06	02435777	8	8	125	8,5	9,0	95,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
SCLCR1010M06	02435793	10	10	150	10,5	9,0	95,0	0,0	0,0	0,2	CC..0602.. *CC..21.5.*
SCLCR1212M06	02430832	12	12	150	12,5	8,0	95,0	0,0	0,0	0,2	CC..0602.. *CC..21.5.*
SCLCL0808K06	02435781	8	8	125	8,5	9,0	95,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
SCLCL1010M06	02435796	10	10	150	10,5	9,0	95,0	0,0	0,0	0,2	CC..0602.. *CC..21.5.*
SCLCL1212M06	02430836	12	12	150	12,5	8,0	95,0	0,0	0,0	0,2	CC..0602.. *CC..21.5.*
SCLCR1212M09	02435797	12	12	150	12,5	12,0	95,0	0,0	0,0	0,2	CC..09T3.. *CC..32.5.*
SCLCR1616H09	75011182	16	16	100	16,5	12,0	95,0	0,0	0,0	0,3	CC..09T3.. *CC..32.5.*
SCLCR2020K09	00092187	20	20	125	25,0	20,0	95,0	0,0	0,0	0,5	CC..09T3.. *CC..32.5.*
SCLCL1212M09	02435798	12	12	150	12,5	12,0	95,0	0,0	0,0	0,2	CC..09T3.. *CC..32.5.*
SCLCL1616H09	75011181	16	16	100	16,5	12,0	95,0	0,0	0,0	0,3	CC..09T3.. *CC..32.5.*
SCLCL2020K09	00092188	20	20	125	25,0	20,0	95,0	0,0	0,0	0,5	CC..09T3.. *CC..32.5.*
SCLCR2020K12	75011878	20	20	125	25,0	20,0	95,0	0,0	0,0	0,4	CC..1204.. *CC..43.*
SCLCL2020K12	75011879	20	20	125	25,0	20,0	95,0	0,0	0,0	0,4	CC..1204.. *CC..43.*

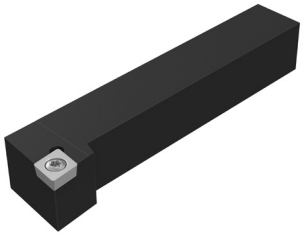
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...06	1/4HEX-T07PX50	C02506-T07P	–	–
...09	1/4HEX-T15PX50	C04008-T15P	–	–
...12	1/4HEX-T15PX50	C05012-T15P	123.19-621	CA5008

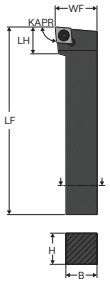
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
...12	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50

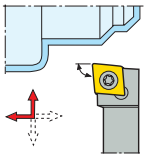
SCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Inch



SCLCR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SCLCR-6-2	00071951	0.375	0.375	2.500	0.500	0.480	95,0	0,0	0,0	0.220	CC..0602.. *CC..21.5.*
SCLCL-6-2	00071943	0.375	0.375	2.500	0.500	0.480	95,0	0,0	0,0	0.220	CC..0602.. *CC..21.5.*
SCLCR-8-3	00071949	0.500	0.500	3.500	0.625	0.670	95,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*
SCLCR-10-3	00071955	0.625	0.625	4.000	0.750	0.690	95,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*
SCLCR-12-3	00013336	0.750	0.750	4.500	1.000	0.690	95,0	0,0	0,0	0.880	CC..09T3.. *CC..32.5.*
SCLCR-16-3	00073924	1.000	1.000	6.000	1.250	0.670	95,0	0,0	0,0	1.760	CC..09T3.. *CC..32.5.*
SCLCL-8-3	00071945	0.500	0.500	3.500	0.625	0.670	95,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*
SCLCL-10-3	00071931	0.625	0.625	4.000	0.750	0.690	95,0	0,0	0,0	0.660	CC..09T3.. *CC..32.5.*
SCLCL-12-3	00013337	0.750	0.750	4.500	1.000	0.690	95,0	0,0	0,0	0.880	CC..09T3.. *CC..32.5.*
SCLCL-16-3	00073925	1.000	1.000	6.000	1.252	0.670	95,0	0,0	0,0	1.760	CC..09T3.. *CC..32.5.*
SCLCR-16-4	00043250	1.000	1.000	6.000	1.250	0.780	95,0	0,0	0,0	1.760	CC..1204.. *CC..43.*
SCLCL-16-4	00043248	1.000	1.000	5.000	1.252	0.787	95,0	0,0	0,0	1.760	CC..1204.. *CC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
..-2	1/4HEX-T07PX50	C02506-T07P	–	–
..-3	1/4HEX-T15PX50	C04008-T15P	–	–
..-4	1/4HEX-T15PX50	C05012-T15P	123.19-621	CA5008

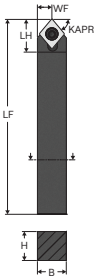
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
..-4	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50

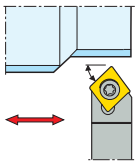
SCMCN – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Inch



SCMCN



KAPR = 50,0 °



—Neutral version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SCMCN-6-2	00013318	0.375	0.375	2.500	0.187	0.420	50,0	0,0	0,0	0.220	CC..0602.. *CC..21.5.*
SCMCN-8-3	00013319	0.500	0.500	3.500	0.264	0.610	50,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*

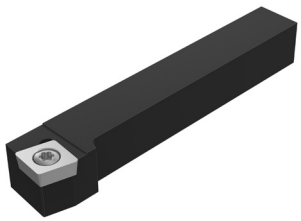
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

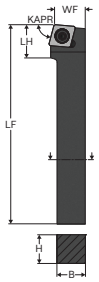
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

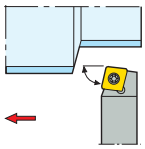
SCRCR/L – Toolholders for inserts CCGT, CCGW, CCMT – Inch



SCRCR/L



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616
—For holder code key, see page(s) 18-19
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SCRCR-8-3	00013316	0.500	0.500	3.504	0.551	0.681	75,0	0,0	0,0	0.440	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
SCRCR	1/4HEX-T15PX50	C04008-T15P

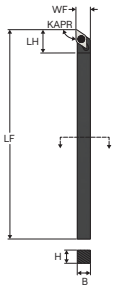
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
SCRCR	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

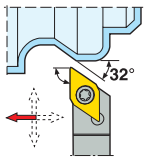
SDACR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Metric



SDACR/L



KAPR = 90,0 °



–Right-hand version shown
–For inserts program, see page(s) 555, 556, 557, 597, 619
–For holder code key, see page(s) 16–17
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SDACR0808K07	00042846	8	8	125	8,7	13,0	90,0	0,0	0,0	0,1	DC..0702.. *DC..21.5.*
SDACR1010M07	00069721	10	10	150	10,7	13,0	90,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDACR1212M07	00079389	12	12	150	12,7	13,0	90,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDACL0808K07	75011235	8	8	125	8,7	13,0	90,0	0,0	0,0	0,1	DC..0702.. *DC..21.5.*
SDACL1010M07	75011236	10	10	150	10,7	13,0	90,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDACL1212M07	75011237	12	12	150	12,7	13,0	90,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDACR1212M11	00042847	12	12	150	12,7	20,0	90,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDACR1414M11	00042849	14	14	150	14,7	20,0	90,0	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
SDACR1616H11	02430870	16	16	100	16,7	21,0	90,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDACL1212M11	75924226	12	12	150	12,7	20,0	90,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDACL1616H11	02430879	16	16	100	16,7	21,0	90,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*

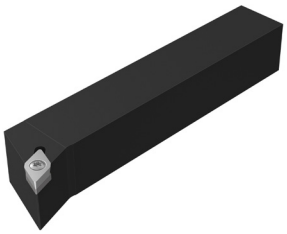
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...07	1/4HEX-T07PX50	C02506-T07P
...11	1/4HEX-T15PX50	C04008-T15P

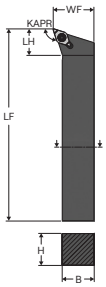
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...07	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

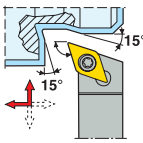
SDHCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric



SDHCR/L



KAPR = 107,5 °



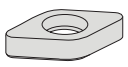
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SDHCR1010M07	02435836	10	10	150	12,0	14,0	107,5	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDHCL1010M07	02435841	10	10	150	12,0	14,0	107,5	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDHCR1212M11	02435848	12	12	150	16,0	21,0	107,5	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDHCR1616H11	75011422	16	16	100	20,0	20,0	107,5	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
SDHCR2020K11	75011696	20	20	125	25,0	20,0	107,5	0,0	0,0	0,4	DC..11T3.. *DC..32.5.*
SDHCR2525M11	00092189	25	25	150	32,0	20,0	107,5	0,0	0,0	0,8	DC..11T3.. *DC..32.5.*
SDHCL1212M11	02435849	12	12	150	16,0	21,0	107,5	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDHCL1616H11	75011423	16	16	100	20,0	20,0	107,5	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
SDHCL2020K11	75011697	20	20	125	25,0	20,0	107,5	0,0	0,0	0,4	DC..11T3.. *DC..32.5.*
SDHCL2525M11	00092190	25	25	150	32,0	20,0	107,5	0,0	0,0	0,8	DC..11T3.. *DC..32.5.*
SDHCR2525M15	75011713	25	25	150	32,0	25,0	107,5	0,0	0,0	0,8	DC..1504.. *DC..43.*
SDHCL2525M15	75011714	25	25	150	32,0	25,0	107,5	0,0	0,0	0,7	DC..1504.. *DC..43.*

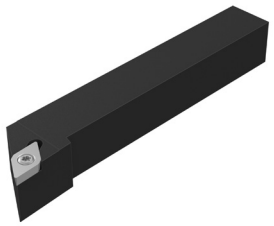
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...07	1/4HEX-T07PX50	C02506-T07P	–	–
...15	1/4HEX-T15PX50	C04518-T15P	126.19-621	CA4512
..12/16..11	1/4HEX-T15PX50	C04008-T15P	–	–
..20/25..11	1/4HEX-T15PX50	C03510-T15P	126.19-620	CA3510

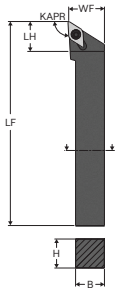
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...07	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...15	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50
..12/16..11	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
..20/25..11	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

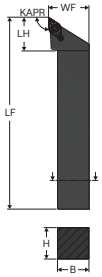
SDJCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric



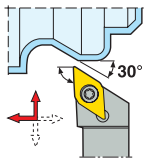
SDJCR/L..07, 1212M11, 1616H11



SDJCR/L



KAPR = 93,0 °



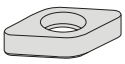
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SDJCR0808K07	02430880	8	8	125	8,5	13,0	93,0	0,0	0,0	0,1	DC..0702.. *DC..21.5.*
SDJCR1010M07	02435822	10	10	150	10,5	14,0	93,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDJCR1212M07	02430896	12	12	150	12,5	13,0	93,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDJCL0808K07	02430881	8	8	125	8,5	13,0	93,0	0,0	0,0	0,1	DC..0702.. *DC..21.5.*
SDJCL1010M07	02435824	10	10	150	10,5	14,0	93,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDJCL1212M07	02430901	12	12	150	12,5	13,0	93,0	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDJCR1212M11	02435826	12	12	150	12,5	20,0	93,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDJCR1616H11	75011180	16	16	100	16,5	20,0	93,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDJCR2020K11	75011274	20	20	125	25,0	20,0	93,0	0,0	0,0	0,4	DC..11T3.. *DC..32.5.*
SDJCR2525M11	00092199	25	25	150	32,0	25,0	93,0	0,0	0,0	0,8	DC..11T3.. *DC..32.5.*
SDJCL1212M11	02435827	12	12	150	12,5	20,0	93,0	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDJCL1616H11	75011179	16	16	100	16,5	20,0	93,0	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
SDJCL2020K11	75011275	20	20	125	25,0	20,0	93,0	0,0	0,0	0,4	DC..11T3.. *DC..32.5.*
SDJCL2525M11	00092200	25	25	150	32,0	25,0	93,0	0,0	0,0	0,7	DC..11T3.. *DC..32.5.*
SDJCR2525M15	75012040	25	25	150	32,0	28,0	93,0	0,0	0,0	0,7	DC..1504.. *DC..43.*
SDJCR3225P15	75012042	32	25	170	32,0	28,0	93,0	0,0	0,0	1,1	DC..1504.. *DC..43.*
SDJCL2525M15	75012041	25	25	150	32,0	28,0	93,0	0,0	0,0	0,7	DC..1504.. *DC..43.*
SDJCL3225P15	75012043	32	25	170	32,0	28,0	93,0	0,0	0,0	1,1	DC..1504.. *DC..43.*

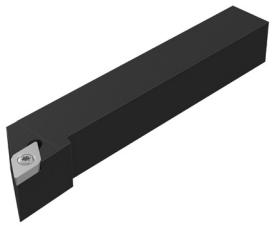
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...07	1/4HEX-T07PX50	C02506-T07P	–	–
...15	1/4HEX-T15PX50	C04518-T15P	126.19-621	CA4512
..12/16..11	1/4HEX-T15PX50	C04008-T15P	–	–
..20/25..11	1/4HEX-T15PX50	C03510-T15P	126.19-620	CA3510

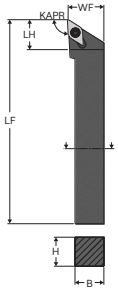
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...07	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...15	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50
..12/16..11	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
..20/25..11	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

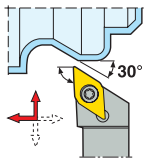
SDJCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Inch



SDJCR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SDJCR-6-2	00071938	0.375	0.375	2.500	0.500	0.680	93,0	0,0	0,0	0.220	DC..0702.. *DC..21.5.*
SDJCR-8-2	00013341	0.500	0.500	3.500	0.625	0.680	93,0	0,0	0,0	0.440	DC..0702.. *DC..21.5.*
SDJCL-6-2	00071941	0.375	0.375	2.500	0.500	0.680	93,0	0,0	0,0	0.220	DC..0702.. *DC..21.5.*
SDJCL-8-2	00013342	0.500	0.500	3.500	0.625	0.680	93,0	0,0	0,0	0.440	DC..0702.. *DC..21.5.*
SDJCR-8-3	00071952	0.500	0.500	3.500	0.625	1.000	93,0	0,0	0,0	0.440	DC..11T3.. *DC..32.5.*
SDJCR-10-3	00071948	0.625	0.625	4.000	0.750	1.000	93,0	0,0	0,0	0.440	DC..11T3.. *DC..32.5.*
SDJCR-12-3	00043256	0.750	0.750	4.500	1.000	1.000	93,0	0,0	0,0	0.880	DC..11T3.. *DC..32.5.*
SDJCR-16-3	00073937	1.000	1.000	6.000	1.252	0.980	93,0	0,0	0,0	1.760	DC..11T3.. *DC..32.5.*
SDJCL-8-3	00071939	0.500	0.500	3.500	0.625	1.000	93,0	0,0	0,0	0.440	DC..11T3.. *DC..32.5.*
SDJCL-10-3	00071947	0.625	0.625	4.000	0.750	1.000	93,0	0,0	0,0	0.440	DC..11T3.. *DC..32.5.*
SDJCL-12-3	00043252	0.750	0.750	4.500	1.000	1.000	93,0	0,0	0,0	0.880	DC..11T3.. *DC..32.5.*
SDJCL-16-3	00073938	1.000	1.000	6.000	1.252	0.980	93,0	0,0	0,0	1.760	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

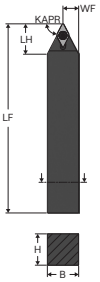
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

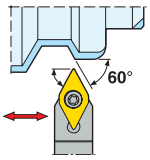
SDNCN – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Metric



SDNCN



KAPR = 62,5 °



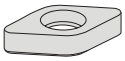
—Neutral version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SDNCN0808K07	02435828	8	8	125	4,2	16,0	62,5	0,0	0,0	0,1	DC..0702.. *DC..21.5.*
SDNCN1010M07	02435831	10	10	150	5,2	21,0	62,5	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDNCN1212M07	00092195	12	12	150	6,2	20,0	62,5	0,0	0,0	0,2	DC..0702.. *DC..21.5.*
SDNCN1212M11	00092196	12	12	150	6,2	23,0	62,5	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDNCN1414M11	00089908	14	14	150	7,2	23,0	62,5	0,0	0,0	0,3	DC..11T3.. *DC..32.5.*
SDNCN1616H11	75011788	16	16	100	8,2	22,0	62,5	0,0	0,0	0,2	DC..11T3.. *DC..32.5.*
SDNCN2020K11	00092197	20	20	125	10,2	22,0	62,5	0,0	0,0	0,4	DC..11T3.. *DC..32.5.*
SDNCN2525M11	00092198	25	25	150	12,7	23,0	62,5	0,0	0,0	0,7	DC..11T3.. *DC..32.5.*
SDNCN2020K15	75011885	20	20	125	10,2	29,0	62,5	0,0	0,0	0,4	DC..1504.. *DC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...07	1/4HEX-T07PX50	C02506-T07P	–	–
...15	1/4HEX-T15PX50	C04512-T15P	126.19-621	CA4508
.12/14/16..11	1/4HEX-T15PX50	C04008-T15P	–	–
.20/25..11	1/4HEX-T15PX50	C03510-T15P	126.19-620	CA3510

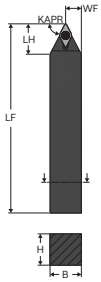
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...07	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...15	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50
.12/14/16..11	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
.20/25..11	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

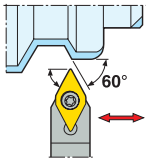
SDPCN – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Inch



SDPCN



KAPR = 62,5 °



—Neutral version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SDPCN-16-3	00073942	1.000	1.000	5.996	0.500	0.860	62,5	0,0	0,0	1.760	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
SDPCN-16-3	1/4HEX-T15PX50	C04008-T15P

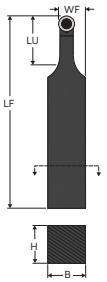
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
SDPCN-16-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

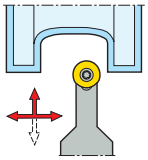
SRDCN – Toolholders for inserts RCMT – Metric



SRDCN



KAPR



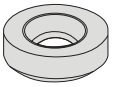
CTWS



—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SRDCN1616H06	75011837	16	16	100	11,0	16,0	–	0,0	0,0	0,2	RCMT0602..
SRDCN2020K06	75011838	20	20	125	13,0	16,0	–	0,0	0,0	0,4	RCMT0602..
SRDCN2525M06	75011839	25	25	150	15,5	16,0	–	0,0	0,0	0,7	RCMT0602..
SRDCN1616H08	75011840	16	16	100	12,0	16,0	–	0,0	0,0	0,2	RC..0803..
SRDCN2020K08	75011841	20	20	125	14,0	20,0	–	0,0	0,0	0,4	RC..0803..
SRDCN2525M08	75011706	25	25	150	16,5	25,0	–	0,0	0,0	0,7	RC..0803..
SRDCN2020K10	75011842	20	20	125	15,0	20,0	–	0,0	0,0	0,4	RC..10T3..
SRDCN2525M10	75011843	25	25	150	17,5	25,0	–	0,0	0,0	0,7	RC..10T3..
SRDCN2525M12	75011844	25	25	150	18,5	25,0	–	0,0	0,0	0,7	RC..1204M0 *RC..43M0*
SRDCN3225P12	75011845	32	25	170	18,5	32,0	–	0,0	0,0	1,0	RC..1204M0 *RC..43M0*
SRDCN3225P16	75011846	32	25	170	20,5	32,0	–	0,0	0,0	1,0	RC..1606..

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...06	1/4HEX-T07PX50	C02506-T07P	–	–
...08	1/4HEX-T09PX50	C03007-T09P	–	–
...10	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3510
...12	1/4HEX-T15PX50	C03512-T15P	111.19-621	CA3510
...16	1/4HEX-T20PX50	C05018-T20P	SRN16T3M0	CA5015

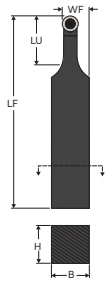
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...08	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
...10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...16	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50

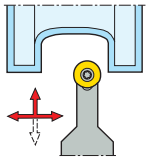
SRDCN – Toolholders for inserts RCMT – Inch



SRDCN



KAPR



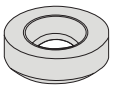
CTWS



—Neutral version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SRDCN-10-06	00071932	0.625	0.625	4.000	0.532	0.630	–	0,0	0,0	0.440	RCMT0602..
SRDCN-12-08	00057603	0.750	0.750	5.000	0.431	0.787	–	0,0	0,0	0.880	RC..0803..
SRDCN-12-10	00071935	0.750	0.750	5.000	0.532	0.787	–	0,0	0,0	0.880	RC..10T3..
SRDCN-16-12	00071928	1.000	1.000	6.000	0.736	0.984	–	0,0	0,0	1.540	RC..1204M0 *RC..43M0*
SRDCN-85-12	00071953	1.250	1.000	7.000	0.736	0.984	–	0,0	0,0	2.200	RC..1204M0 *RC..43M0*

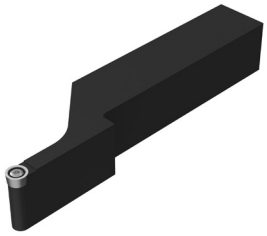
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
..-06	1/4HEX-T07PX50	C02506-T07P	–	–
..-08	1/4HEX-T09PX50	C03007-T09P	–	–
..-10	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3510
..-12	1/4HEX-T15PX50	C03510-T15P	111.19-621	CA3510

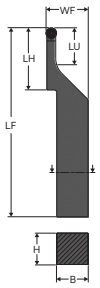
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
..-08	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
..-10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P30
..-12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

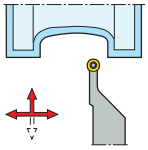
SRGCR/L – Toolholders for inserts RCMT – Inch



SRGCR/L



KAPR



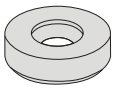
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	LH	WF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch				lbs	
SRGCR-12-2	00013346	0.750	0.750	4.500	1.480	1.000	0.730	–	0,0	0,0	0.660	RCMT0603.. *RCMT22*
SRGCR-16-2	00013351	1.000	1.000	6.000	1.480	1.252	0.730	–	0,0	0,0	1.540	RCMT0603.. *RCMT22*
SRGCL-16-2	00013352	1.000	1.000	6.000	1.480	1.252	0.730	–	0,0	0,0	1.540	RCMT0603.. *RCMT22*
SRGCL-20-2	00013357	1.250	1.250	6.024	1.480	1.500	0.730	–	0,0	0,0	1.980	RCMT0603.. *RCMT22*
SRGCR-12-3	00013348	0.750	0.750	4.500	1.730	1.000	0.980	–	0,0	0,0	0.660	RC..09T3.. *RC..32.*
SRGCR-16-3	00013353	1.000	1.000	6.000	1.730	1.252	0.980	–	0,0	0,0	1.540	RC..09T3.. *RC..32.*
SRGCR-20-3	00013358	1.250	1.250	6.000	1.730	1.500	0.980	–	0,0	0,0	2.200	RC..09T3.. *RC..32.*
SRGCL-12-3	00013349	0.750	0.750	4.500	1.730	1.000	0.945	–	0,0	0,0	0.660	RC..09T3.. *RC..32.*
SRGCL-16-3	00013354	1.000	1.000	6.000	1.730	1.252	0.980	–	0,0	0,0	1.540	RC..09T3.. *RC..32.*
SRGCL-20-3	00013359	1.250	1.250	6.000	1.730	1.500	0.980	–	0,0	0,0	2.200	RC..09T3.. *RC..32.*
SRGCR-20-4	00013361	1.250	1.250	6.000	1.720	1.500	0.970	–	0,0	0,0	2.200	RC..120400 *RC..43*
SRGCL-20-4	00013362	1.250	1.250	6.000	1.720	1.500	0.945	–	0,0	0,0	2.430	RC..120400 *RC..43*

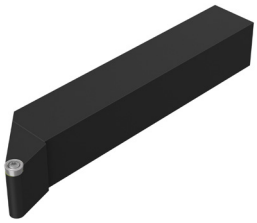
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
..-2	1/4HEX-T07PX50	C02506-T07P	–	–
..-3	1/4HEX-T15PX50	C03508-T15P	RS32C	SLS-35
..-4	1/4HEX-T15PX50	C04011-T15P	RS43C	SLS-40

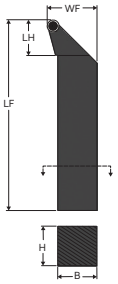
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30
..-4	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

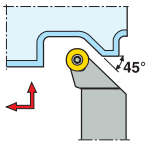
SRSCR/L – Toolholders for inserts RCMT – Metric



SRSCR/L



KAPR = 45,0 °



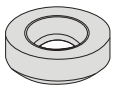
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SRSCR2020K06	00092191	20	20	125	25,0	15,0	45,0	0,0	0,0	0,4	RCMT0602..
SRSCR2525M06	75011823	25	25	150	32,0	15,0	45,0	0,0	0,0	0,7	RCMT0602..
SRSCL2020K06	00092192	20	20	125	25,0	15,0	45,0	0,0	0,0	0,4	RCMT0602..
SRSCL2525M06	75011824	25	25	150	32,0	15,0	45,0	0,0	0,0	0,7	RCMT0602..
SRSCR2020K08	75011827	20	20	125	25,0	25,0	45,0	0,0	0,0	0,4	RC..0803..
SRSCR2525M08	75011704	25	25	150	32,0	25,0	45,0	0,0	0,0	0,7	RC..0803..
SRSCL2525M08	75011705	25	25	150	32,0	25,0	45,0	0,0	0,0	0,7	RC..0803..
SRSCR2020K10	75011829	20	20	125	25,0	17,0	45,0	0,0	0,0	0,4	RC..10T3..
SRSCR2525M10	75011933	25	25	150	32,0	20,0	45,0	0,0	0,0	0,7	RC..10T3..
SRSCL2020K10	75011830	20	20	125	25,0	17,0	45,0	0,0	0,0	0,4	RC..10T3..
SRSCL2525M10	75011934	25	25	150	32,0	20,0	45,0	0,0	0,0	0,7	RC..10T3..
SRSCR2525M12	75011831	25	25	150	32,0	23,0	45,0	0,0	0,0	0,7	RC..1204M0 *RC..43M0*
SRSCR3225P12	75011833	32	25	170	32,0	23,0	45,0	0,0	0,0	1,1	RC..1204M0 *RC..43M0*
SRSCL2525M12	75011832	25	25	150	32,0	23,0	45,0	0,0	0,0	0,7	RC..1204M0 *RC..43M0*
SRSCL3225P12	75011834	32	25	170	32,0	23,0	45,0	0,0	0,0	1,1	RC..1204M0 *RC..43M0*
SRSCR3225P16	75011835	32	25	170	32,0	25,0	45,0	0,0	0,0	1,1	RC..1606..
SRSCL3225P16	75011836	32	25	170	32,0	25,0	45,0	0,0	0,0	1,1	RC..1606..

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...06	1/4HEX-T07PX50	C02506-T07P	–	–
...08	1/4HEX-T09PX50	C03007-T09P	–	–
...10	1/4HEX-T15PX50	C03510-T15P	111.19-620	CA3510
...12	1/4HEX-T15PX50	C03512-T15P	111.19-621	CA3510
...16	1/4HEX-T20PX50	C05018-T20P	SRN16T3M0	CA5015

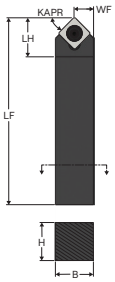
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...08	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
...10	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...12	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...16	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50

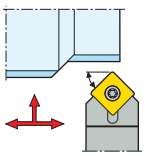
SSDCN – Toolholders for inserts SCGW, SCMT, SCMW – Metric



SSDCN



KAPR = 45,0 °



CTWS



- Neutral version shown
- For inserts program, see page(s) 567, 568, 603
- For holder code key, see page(s) 16-17
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SSDCN1212M09	00089909	12	12	150	6,2	23,0	45,0	0,0	0,0	0,2	SC..09T3.. *SC..32.5.*
SSDCN1616H09	75011882	16	16	100	8,2	26,0	45,0	0,0	0,0	0,3	SC..09T3.. *SC..32.5.*
SSDCN2020K09	00092193	20	20	125	10,2	22,0	45,0	0,0	0,0	0,4	SC..09T3.. *SC..32.5.*
SSDCN2525M09	00092194	25	25	150	12,7	23,0	45,0	0,0	0,0	0,8	SC..09T3.. *SC..32.5.*
SSDCN2020K12	75011883	20	20	125	10,2	22,0	45,0	0,0	0,0	0,4	SC..1204.. *SC..43.*
SSDCN2525M12	75011884	25	25	150	12,7	22,0	45,0	0,0	0,0	0,7	SC..1204.. *SC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...09	1/4HEX-T15PX50	C04008-T15P	–	–
...K12	1/4HEX-T15PX50	C05012-T15P	110.19-621	CA5008
...M12	1/4HEX-T20PX50	C05018-T20P	110.19-621	CA5015

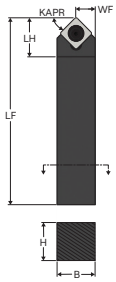
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
...K12	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50
...M12	1/4HEX-S-HANDLE	5.0NM	T00-20P	1/4HEX-H5.0X50	T00-20P50

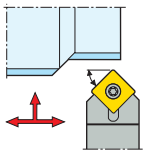
SSDCN – Toolholders for inserts SCGW, SCMT, SCMW – Inch



SSDCN



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 567, 568, 603
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SSDCN-8-3	00043262	0.500	0.500	3.500	0.250	0.630	45,0	0,0	0,0	0.220	SC..09T3.. *SC..32.5.*
SSDCN-10-3	00043259	0.625	0.625	4.000	0.312	0.630	45,0	0,0	0,0	0.440	SC..09T3.. *SC..32.5.*
SSDCN-12-4	00043260	0.750	0.750	4.500	0.375	0.810	45,0	0,0	0,0	0.880	SC..1204.. *SC..43.*

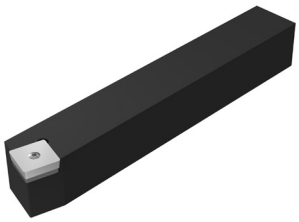
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
..-3	1/4HEX-T15PX50	C04008-T15P	–	–
..-4	1/4HEX-T15PX50	C05012-T15P	110.19-621	CA5008

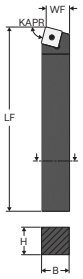
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
..-4	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50

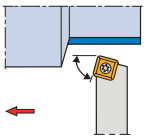
SSBCR/L – Toolholders for inserts SCMT – Metric



SSBCR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 567, 568
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SSBCR5050T38	02785005	50	50	300	43,0	0,0	75,0	0,0	0,0	5,6	SC..3809.. *SC..126.*
SSBCR6060V38	02773272	60	60	400	53,0	0,0	75,0	0,0	0,0	10,9	SC..3809.. *SC..126.*

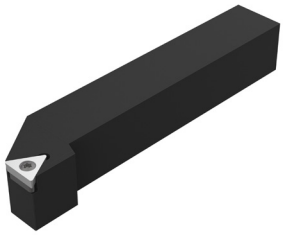
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...38	1/4HEX-T30PX50	C08020-T30P	112.19-624	CA8020

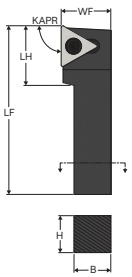
Accessories

For	Adjustable Torque key	Bit holder	Insert clamping torque	Shim key	Torx Plus bit
					
...38	1/4HEX-T-HANDLE-5.0-14.0NM	1/4HEX-T-HANDLE	8.0NM	1/4HEX-H5.0X50	1/4HEX-T30PX50

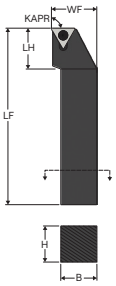
STGCR/L, STFCR/L – Toolholders for inserts TCGT, TCGW, TCMT, TCMW – Metric



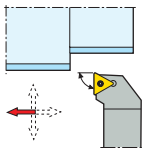
STGCR/L



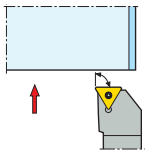
STFCR/L



STGCR/L
KAPR = 90,0 °



STFCR/L
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
STGCR1212F11	75066181	12	12	80	16,0	17,0	90,0	0,0	0,0	0,1	TC..1102.. *TC..21.5.*
STGCR1616H11	75066183	16	16	100	20,0	17,0	90,0	0,0	0,0	0,3	TC..1102.. *TC..21.5.*
STGCL1212F11	75066182	12	12	80	16,0	17,0	90,0	0,0	0,0	0,1	TC..1102.. *TC..21.5.*
STGCL1616H11	75066184	16	16	100	20,0	17,0	90,0	0,0	0,0	0,3	TC..1102.. *TC..21.5.*
STGCR1616H16	75066197	16	16	100	20,0	25,0	90,0	0,0	0,0	0,2	TC..16T3.. *TC..32.5.*
STGCR2020K16	75066199	20	20	125	25,0	26,0	90,0	0,0	0,0	0,4	TC..16T3.. *TC..32.5.*
STGCR2525M16	75066201	25	25	150	32,0	27,0	90,0	0,0	0,0	0,8	TC..16T3.. *TC..32.5.*
STGCL1616H16	75066198	16	16	100	20,0	25,0	90,0	0,0	0,0	0,3	TC..16T3.. *TC..32.5.*
STGCL2020K16	75066200	20	20	125	25,0	26,0	90,0	0,0	0,0	0,4	TC..16T3.. *TC..32.5.*
STGCL2525M16	75066203	25	25	150	32,0	27,0	90,0	0,0	0,0	0,8	TC..16T3.. *TC..32.5.*
STFCR1212F11	75054888	12	12	80	16,0	16,0	90,0	0,0	0,0	0,1	TC..1102.. *TC..21.5.*
STFCR1616H11	75028230	16	16	100	20,0	16,0	90,0	0,0	0,0	0,2	TC..1102.. *TC..21.5.*
STFCL1212F11	75066245	12	12	80	16,0	16,0	90,0	0,0	0,0	0,1	TC..1102.. *TC..21.5.*
STFCL1616H11	75034423	16	16	100	20,0	16,0	90,0	0,0	0,0	0,3	TC..1102.. *TC..21.5.*
STFCR1616H16	75066191	16	16	100	20,0	22,0	90,0	0,0	0,0	0,3	TC..16T3.. *TC..32.5.*
STFCR2020K16	75066193	20	20	125	25,0	22,0	90,0	0,0	0,0	0,4	TC..16T3.. *TC..32.5.*
STFCR2525M16	75066195	25	25	150	32,0	24,0	90,0	0,0	0,0	0,8	TC..16T3.. *TC..32.5.*
STFCL1616H16	75066192	16	16	100	20,0	22,0	90,0	0,0	0,0	0,3	TC..16T3.. *TC..32.5.*
STFCL2020K16	75066194	20	20	125	25,0	22,0	90,0	0,0	0,0	0,4	TC..16T3.. *TC..32.5.*
STFCL2525M16	75066196	25	25	150	32,0	24,0	90,0	0,0	0,0	0,8	TC..16T3.. *TC..32.5.*

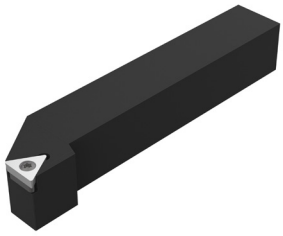
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...11	1/4HEX-T07PX50	C02506-T07P	–	–
...16	1/4HEX-T15PX50	C03509-T15P	STN160312	CA3510

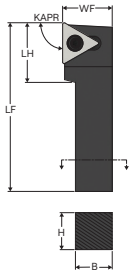
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

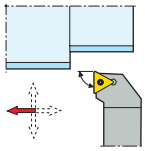
STGCR/L – Toolholders for inserts TCGT, TCGW, TCMT, TCMW – Inch



STGCR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
STGCR-6-2	00013373	0.375	0.375	2.500	0.500	0.600	90,0	0,0	0,0	0.220	TC..1102.. *TC..21.5.*
STGCR-8-2	00013376	0.500	0.500	3.500	0.625	0.620	90,0	0,0	0,0	0.440	TC..1102.. *TC..21.5.*
STGCL-6-2	00013374	0.375	0.375	2.500	0.500	0.600	90,0	0,0	0,0	0.220	TC..1102.. *TC..21.5.*
STGCL-8-2	00013377	0.500	0.500	3.500	0.625	0.620	90,0	0,0	0,0	0.440	TC..1102.. *TC..21.5.*
STGCR-10-3	00013378	0.625	0.625	4.000	0.750	0.850	90,0	0,0	0,0	0.660	TC..16T3.. *TC..32.5.*
STGCL-10-3	00013379	0.625	0.625	4.000	0.750	0.850	90,0	0,0	0,0	0.440	TC..16T3.. *TC..32.5.*

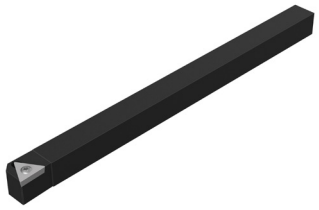
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

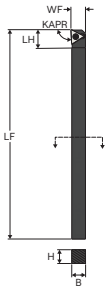
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

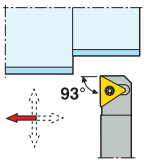
STJCR/L – Toolholders for inserts TCGT, TCGW, TCMT, TCMW – Metric



STJCR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
STJCR1010M11	02430911	10	10	150	10,0	13,0	93,0	0,0	0,0	0,2	TC..1102.. *TC..21.5.*
STJCR1212M11	02430917	12	12	150	12,0	13,0	93,0	0,0	0,0	0,2	TC..1102.. *TC..21.5.*
STJCR1616H11	02430921	16	16	100	16,0	13,0	93,0	0,0	0,0	0,3	TC..1102.. *TC..21.5.*

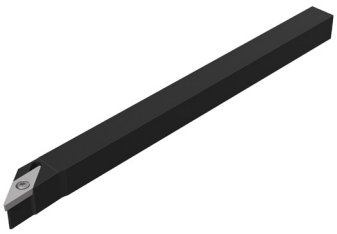
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...11	1/4HEX-T07PX50	C02506-T07P

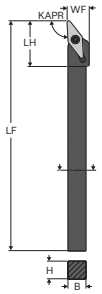
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

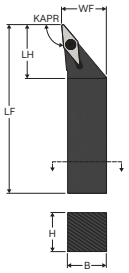
SVJBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric



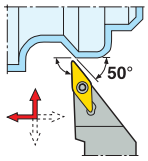
SVJBR/L



SVJBRL/..H11, ..K11, ..25M11



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SVJBR1010M11	02431006	10	10	150	10,0	20,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBR1212M11	02439655	12	12	150	12,0	20,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBR1616H11	75066240	16	16	100	20,0	27,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBR2020K11	75066241	20	20	125	25,0	27,0	93,0	0,0	0,0	0,4	VB..1102.. *VB..21.5.*
SVJBR2525M11	75077182	25	25	150	32,0	42,0	93,0	0,0	0,0	0,7	VB..1102.. *VB..21.5.*
SVJBL1010M11	02431007	10	10	150	10,0	20,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBL1212M11	02439658	12	12	150	12,0	20,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBL1616H11	75065783	16	16	100	20,0	27,0	93,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVJBL2020K11	75027877	20	20	125	25,0	27,0	93,0	0,0	0,0	0,4	VB..1102.. *VB..21.5.*
SVJBL2525M11	75077183	25	25	150	32,0	42,0	93,0	0,0	0,0	0,7	VB..1102.. *VB..21.5.*
SVJBR1212M16	02431016	12	12	150	12,5	30,0	93,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVJBR1616H16	02431021	16	16	100	16,5	30,0	93,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVJBL1212M16	02431020	12	12	150	12,0	30,0	93,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVJBL1616H16	02431024	16	16	100	16,0	30,0	93,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*

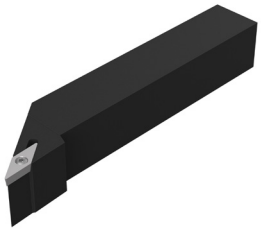
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...11	1/4HEX-T07PX50	C02506-T07P
...16	1/4HEX-T15PX50	C03512-T15P

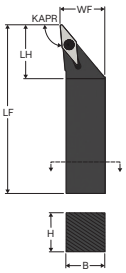
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30

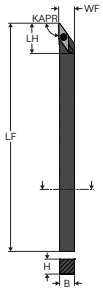
SVJCR/L, SVABR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric



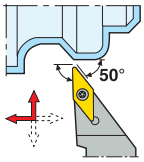
SVJCR/L



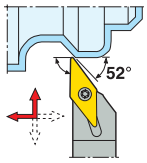
SVABR/L



SVJCR/L
KAPR = 93,0 °



SVABR/L
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SVJCR2020K11	02416717	20	20	125	25,0	25,0	93,0	0,0	0,0	0,4	VC..1103.. *VC..22.*
SVJCL2020K11	02416718	20	20	125	25,0	25,0	93,0	0,0	0,0	0,4	VC..1103.. *VC..22.*
SVABR1010M11	02430935	10	10	150	10,0	20,0	90,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVABR1212M11	02430954	12	12	150	12,0	20,0	90,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVABL1010M11	02430948	10	10	150	10,0	20,0	90,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVABL1212M11	02430956	12	12	150	12,5	20,0	90,0	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVABR1212M16	02431000	12	12	150	12,5	30,0	90,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVABR1616H16	02431002	16	16	100	16,0	30,0	90,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVABL1212M16	02431001	12	12	150	12,0	30,0	90,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVABL1616H16	02431003	16	16	100	16,0	30,0	90,0	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*

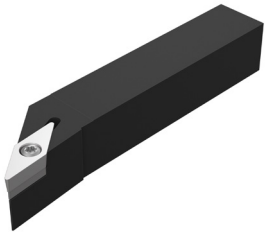
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...11	1/4HEX-T07PX50	C02506-T07P
...16	1/4HEX-T15PX50	C03510-T15P

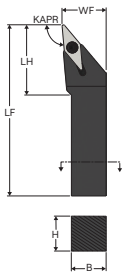
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30

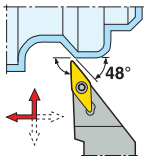
SVLBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric



SVLBR/L



KAPR = 95,0 °



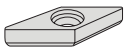
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SVLBR2020K16	75011715	20	20	125	25,0	40,0	95,0	0,0	0,0	0,4	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBR2525M16	75011717	25	25	150	32,0	40,0	95,0	0,0	0,0	0,7	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBR3225P16	75011719	32	25	170	32,0	40,0	95,0	0,0	0,0	1,0	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBL2020K16	75011716	20	20	125	25,0	40,0	95,0	0,0	0,0	0,4	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBL2525M16	75011718	25	25	150	32,0	40,0	95,0	0,0	0,0	0,7	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBL3225P16	75011720	32	25	170	32,0	40,0	95,0	0,0	0,0	1,0	VB..1604-VC..1604 *VB..33.-VC..33.*

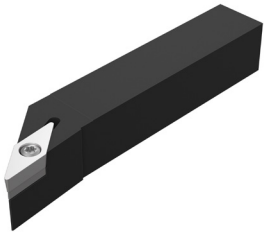
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...16	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3510

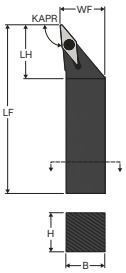
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

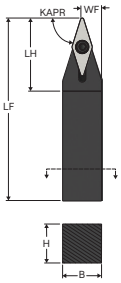
SVLBR/L, SVVBN – Toolholders for inserts VBGT, VBGM, VBMT – Inch



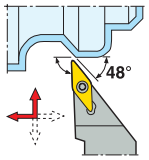
SVLBR/L



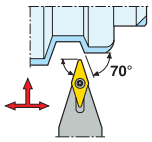
SVVBN



SVLBR/L
KAPR = 95,0 °



SVVBN
KAPR = 72,5 °



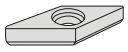
CTWS



—SVLBR/L = Right-hand version shown
—SVVBN = Neutral version shown
—For inserts program, see page(s) 583, 584
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
SVLBR-12-3	00071930	0.750	0.750	4.500	0.875	1.180	95,0	0,0	0,0	0.660	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBR-16-3	00071929	1.000	1.000	6.000	1.125	1.180	95,0	0,0	0,0	1.540	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBL-12-3	00071944	0.750	0.750	4.500	0.875	1.180	95,0	0,0	0,0	0.660	VB..1604-VC..1604 *VB..33.-VC..33.*
SVLBL-16-3	00071950	1.000	1.000	6.000	1.125	1.180	95,0	0,0	0,0	1.540	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN-12-3	00071940	0.750	0.750	4.500	0.375	1.390	72,5	0,0	0,0	0.660	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN-16-3	00071946	1.000	1.000	6.000	0.500	1.394	72,5	0,0	0,0	1.540	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
..-3	1/4HEX-T15PX50	C03510-T15P	171.19-620	CA3510

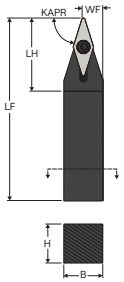
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-3	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

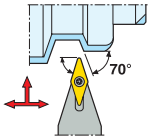
SVVBN – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric



SVVBN



KAPR = 72,5 °



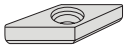
—Neutral version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SVVBN1010M11	02431026	10	10	150	5,3	25,0	72,5	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVVBN1212M11	02439659	12	12	150	6,3	25,0	72,5	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVVBN1616H11	75077179	16	16	100	8,3	26,0	72,5	0,0	0,0	0,2	VB..1102.. *VB..21.5.*
SVVBN2020K11	75077180	20	20	125	10,3	26,0	72,5	0,0	0,0	0,4	VB..1102.. *VB..21.5.*
SVVBN2525M11	75077181	25	25	150	12,8	26,0	72,5	0,0	0,0	0,7	VB..1102.. *VB..21.5.*
SVVBN1212M16	02431027	12	12	150	6,3	30,0	72,5	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN1616H16	02431029	16	16	100	8,3	30,0	72,5	0,0	0,0	0,2	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN2020K16	75011514	20	20	125	10,6	35,0	72,5	0,0	0,0	0,4	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN2525M16	75011515	25	25	150	13,1	35,0	72,5	0,0	0,0	0,7	VB..1604-VC..1604 *VB..33.-VC..33.*
SVVBN3225P16	75011516	32	25	170	13,1	35,0	72,5	0,0	0,0	1,0	VB..1604-VC..1604 *VB..33.-VC..33.*

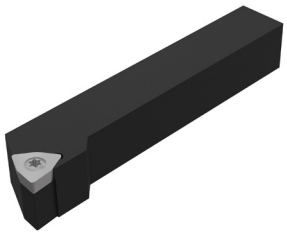
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...11	1/4HEX-T07PX50	C02506-T07P	–	–
...1212M16	1/4HEX-T15PX50	C03510-T15P	–	–
...16	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3510
...1616H16	1/4HEX-T15PX50	C03510-T15P	–	–

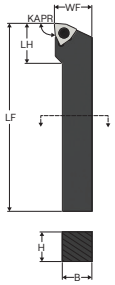
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
...1212M16	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
...1616H16	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30

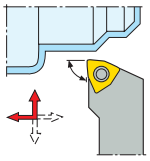
SWLCR/L – Toolholders for inserts WCMT – Metric



SWLCR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 586
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
SWLCR1616H06	75066173	16	16	100	20,0	20,0	95,0	0,0	0,0	0,2	WC..06T3.. *WC..32.5.*
SWLCR2020K06	75066175	20	20	125	25,0	21,0	95,0	0,0	0,0	0,4	WC..06T3.. *WC..32.5.*
SWLCL1616H06	75066174	16	16	100	20,0	20,0	95,0	0,0	0,0	0,2	WC..06T3.. *WC..32.5.*
SWLCL2020K06	75066176	20	20	125	25,0	21,0	95,0	0,0	0,0	0,4	WC..06T3.. *WC..32.5.*

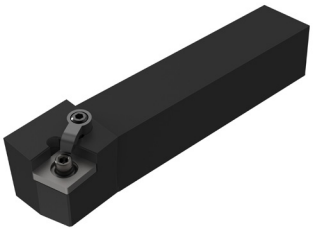
Spare Parts, included in delivery

For	Insert key	Insert screw
		
...06	1/4HEX-T15PX50	C03510-T15P

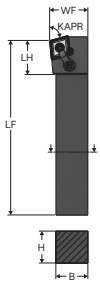
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30

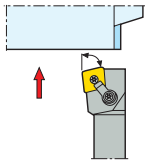
MCKNR/L – Toolholders for inserts CNGA, CNGP, CNMA, CNMG, CNMM, CNMP – Inch



MCKNR/L



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 18-19
—Shim CSN-642 for insert CN..63., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MCKNR-20-6D	00012996	1.250	1.250	6.815	1.500	1.280	75,0	-6,0	-6,0	2.870	CN..1906.. *CN..64.*

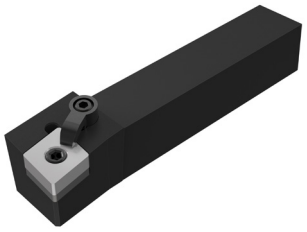
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-6	CL-12	XNS-510	NL-68	CSN190412

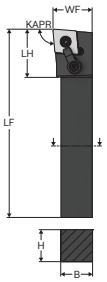
Accessories

For	Insert shim
	
..-6	CSN190608

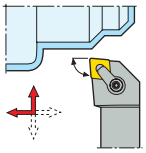
MCLNR/L – Toolholders for inserts CNGA, CNGN, CNGP, CNMA, CNMG, CNMM, CNMP – Inch



MCLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MCLNR-16-6D	00012668	1.000	1.000	6.000	1.250	1.575	95,0	-6,0	-6,0	1.760	CN..1906.. *CN..64.*
MCLNR-24-6E	00013014	1.500	1.500	7.000	2.000	1.575	95,0	-6,0	-6,0	4.630	CN..1906.. *CN..64.*
MCLNL-16-6D	00012669	1.000	1.000	6.000	1.250	1.575	95,0	-6,0	-6,0	1.760	CN..1906.. *CN..64.*
MCLNL-24-6E	00013003	1.500	1.500	7.000	2.000	1.575	95,0	-6,0	-6,0	4.850	CN..1906.. *CN..64.*
MCLNR-24-8E	00013016	1.500	1.500	7.000	2.000	1.575	95,0	-6,0	-6,0	5.070	CN..2509.. *CN..86.*
MCLNL-24-8E	00013004	1.500	1.500	7.000	2.000	1.575	95,0	-6,0	-6,0	4.630	CN..2509.. *CN..86.*

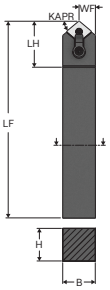
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-6	CL-12	XNS-510	NL-68	CSN190412
..-8	CL-24	XNS-610	NL-810	CSN250624

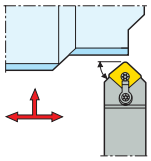
MCMNN – Toolholders for inserts CNGP, CNMA, CNMG, CNMM, CNMN, CNMP – Inch



MCMNN



KAPR = 40,0 °



—Neutral version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 596
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MCMNN-16-4	00042505	1.000	1.000	6.000	0.500	1.202	40,0	0,0	-7,0	1.760	CN..1204.. *CN..43.*
MCMNN-20-6	00042506	1.250	1.250	7.000	0.625	1.660	40,0	0,0	-7,0	3.090	CN..1906.. *CN..64.*

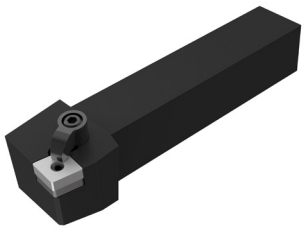
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-20	XNS-48	NL-46	CSN120412
..-6	CL-12	XNS-510	NL-68	CSN190412

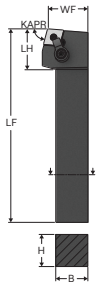
Accessories

For	Insert shim
	
..-4	–
..-6	CSN190608

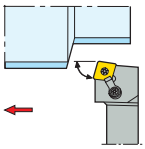
MCRNR/L – Toolholders for inserts CNGA, CNGN, CNGP, CNMA, CNMG, CNMM, CNMP – Inch



MCRNR/L



KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 18–19
—Shim CSN-642 for insert CN..63., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MCRNR-16-4D	00013033	1.000	1.000	6.000	1.250	1.258	75,0	-6,0	-6,0	1.760	CN..1204.. *CN..43.*
MCRNL-16-4D	00012574	1.000	1.000	6.000	1.250	1.258	75,0	-6,0	-6,0	1.980	CN..1204.. *CN..43.*
MCRNR-20-6D	00013038	1.250	1.250	6.024	1.500	1.496	75,0	-6,0	-6,0	2.870	CN..1906.. *CN..64.*

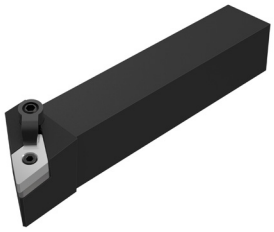
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-9	XNS-58	NL-46	CSN120412
..-6	CL-12	XNS-510	NL-68	CSN190412

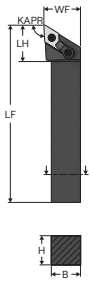
Accessories

For	Insert shim
	
..-4	–
..-6	CSN190608

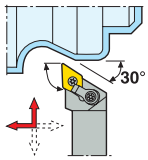
MDJNR/L – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMP, DNMU, DNMX – Inch



MDJNR/L



KAPR = 93,0 °



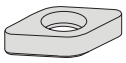
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 18-19
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

CTWS

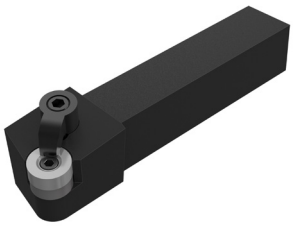


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MDJNR-16-4D	00012698	1.000	1.000	6.000	1.250	1.246	93,0	-6,0	-6,0	1.760	DN..1504.. *DN..43.*
MDJNR-24-4D	00012708	1.500	1.500	6.000	2.000	1.325	93,0	-6,0	-6,0	3.530	DN..1504.. *DN..43.*
MDJNL-16-4D	00012699	1.000	1.000	6.000	1.250	1.246	93,0	-6,0	-6,0	1.760	DN..1504.. *DN..43.*
MDJNL-24-4D	00012709	1.500	1.500	6.000	2.000	1.325	93,0	-6,0	-6,0	3.310	DN..1504.. *DN..43.*

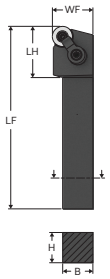
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-20	XNS-48	NL-46	DSN150412

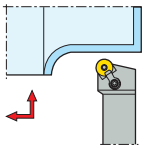
MRGNR/L – Toolholders for inserts RNGN, RNMA, RNMG, RNMN – Inch



MRGNR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 566, 601, 620, 623
—For holder code key, see page(s) 18–19
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS

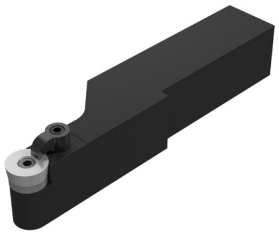


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MRGNR-12-4B	00013087	0.750	0.750	4.500	1.000	1.260	90,0	-6,0	-6,0	0.880	RN..1204.. *RN..43.*
MRGNL-12-4B	00013073	0.750	0.750	4.500	1.000	1.260	90,0	-6,0	-6,0	0.880	RN..1204.. *RN..43.*

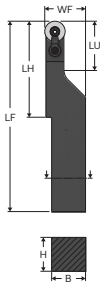
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-9	XNS-59	NL-46	RSN120400

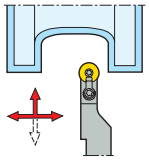
MRGOR/L – Toolholders for inserts RCMM – Inch



MRGOR/L



KAPR



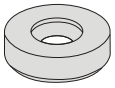
CTWS



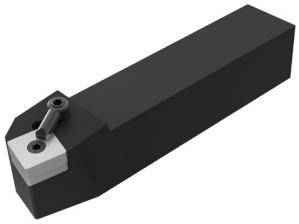
—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 18-19
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch				lbs	
MRGOR-85-4D	00013107	1.250	1.000	6.000	1.250	2.338	1.000	–	0,0	0,0	1.980	RC..120400 *RC..43*
MRGOL-85-4D	00013103	1.250	1.000	6.000	1.250	2.338	1.000	–	0,0	0,0	1.980	RC..120400 *RC..43*
MRGOR-20-6E	00013104	1.250	1.250	7.000	1.500	3.530	1.750	–	0,0	0,0	2.650	RC..1906 *RC..64*
MRGOL-20-6E	00013101	1.250	1.250	7.000	1.500	3.530	1.750	–	0,0	0,0	2.650	RC..1906 *RC..64*
MRGOR-24-8E	00013106	1.500	1.500	7.000	2.287	2.010	2.000	–	0,0	0,0	3.970	RC..2506 *RC..84*
MRGOL-24-8E	00013102	1.500	1.500	7.000	2.287	2.010	2.000	–	0,0	0,0	3.970	RC..2506 *RC..84*

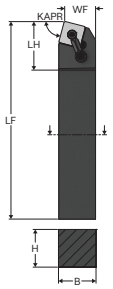
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-6	XNS-36	PL-46	RSP120400
..-6	CL-9	XNS-58	PL-68	RSP190400
..-8	CL-12	XNS-58	PL-68	RS83P

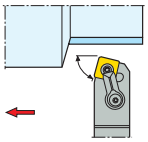
MSBNR/L – Toolholders for inserts SNMA, SNMG, SNMM – Metric



MSBNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
MSBNR3232P19	02464174	32	32	170	27,0	45,0	75,0	-6,0	-6,0	1,4	SN..1906.. *SN..64.*
MSBNR4040R19	02464204	40	40	200	35,0	45,0	75,0	-6,0	-6,0	2,4	SN..1906.. *SN..64.*
MSBNL3232P19	02464202	32	32	170	27,0	45,0	75,0	-6,0	-6,0	1,4	SN..1906.. *SN..64.*
MSBNL4040R19	02464206	40	40	200	35,0	45,0	75,0	-6,0	-6,0	2,4	SN..1906.. *SN..64.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert shim	Shim/clamp key	Shim pin
					
...19	MC22	LD6024-T20P	SSN190412	1/4HEX-T20PX50	MN1920-T20P

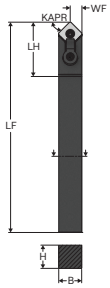
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...19	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30

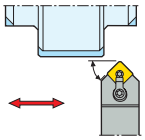
MSDNN – Toolholders for inserts SNGA, SNGN, SNMA, SNMG, SNMM, SNMN, SNMP – Inch



MSDNN



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For holder code key, see page(s) 18-19
—Shim DSN120416 for insert SN..1206.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MSDNN-8-3	00013325	0.500	0.500	4.500	0.250	1.043	45,0	0,0	-7,0	0.440	SN..0903.. *SN..32.*
MSDNN-10-3	00013330	0.625	0.625	4.500	0.375	1.402	45,0	-6,0	-6,0	0.660	SN..0903.. *SN..32.*
MSDNN-12-4	00013340	0.750	0.750	6.000	0.375	1.402	45,0	-6,0	-6,0	1.100	SN..1204.. *SN..43.*
MSDNN-16-4	00013345	1.000	1.000	6.000	0.500	1.402	45,0	0,0	-7,0	1.760	SN..1204.. *SN..43.*
MSDNN-16-5	00013360	1.000	1.000	6.000	0.500	1.607	45,0	-6,0	-6,0	1.760	SN..1506.. *SN..54.*
MSDNN-20-5	00042536	1.250	1.250	7.000	0.625	1.607	45,0	-6,0	-6,0	3.090	SN..1506.. *SN..54.*
MSDNN-20-6	00013375	1.250	1.250	7.000	0.625	1.732	45,0	-6,0	-6,0	3.090	SN..1906.. *SN..64.*
MSDNN-24-6	00013390	1.500	1.500	7.000	0.750	1.732	45,0	-6,0	-6,0	4.190	SN..1906.. *SN..64.*
MSDNN-24-8	00042538	1.500	1.500	7.000	0.750	2.223	45,0	0,0	-8,0	4.190	SN..2509.. *SN..86.*

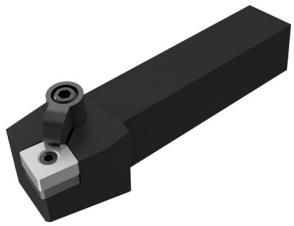
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-6	XNS-36	NL-34	SSN090308
..-4	CL-9	XNS-59	NL-46	SSN120412
..-5	CL-12	XNS-510	NL-58	SSN150412
..-6	CL-12	XNS-510	NL-68	SSN190412
..-8	CL-24	XNS-610	NL-810	SSN250616

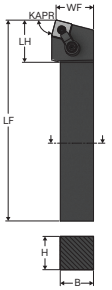
Accessories

For	Insert shim
	
..-3	–
..-4	–
..-5	–
..-6	SSN190612
..-8	–

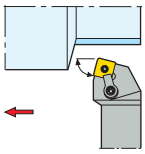
MSRNR – Toolholders for inserts SNMG, SNMM – Metric



MSRNR



KAPR = 75,0 °



CTWS



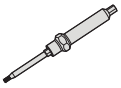
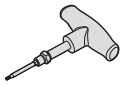
—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572
—For holder code key, see page(s) 16-17
—Shim SSN250616 for insert SN..2509.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
MSRNR5050T25	75000199	50	50	300	53,2	49,0	75,0	-6,0	-6,0	5,7	SN..2507.. *SN..85.*

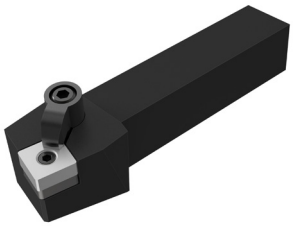
Spare Parts, included in delivery

For	Clamp	Clamp screw	Insert/Clamp key	Insert shim	Pin
					
MSRNR5050T25	MC24	LD1035-T25P	1/4HEX-T25PX50	SSN250716	MN2525-T25P

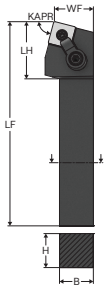
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim screw	Torque key
					
MSRNR5050T25	1/4HEX-S-HANDLE	6.0NM	T00T-25P	CS1216	T00T-25P60

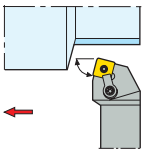
MSRNR/L – Toolholders for inserts SNGA, SNGN, SNMA, SNMG, SNMM, SNMN, SNMP – Inch



MSRNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For holder code key, see page(s) 18–19
—Shim SSN250616 for insert SN..2509.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MSRNR-12-4B	00012743	0.750	0.750	4.500	0.878	1.260	75,0	-6,0	-6,0	0.880	SN..1204.. *SN..43.*
MSRNR-16-4D	00012748	1.000	1.000	6.000	1.128	1.260	75,0	-6,0	-6,0	1.980	SN..1204.. *SN..43.*
MSRNL-12-4B	00012744	0.750	0.750	4.500	0.878	1.260	75,0	-6,0	-6,0	0.880	SN..1204.. *SN..43.*
MSRNL-16-4D	00012749	1.000	1.000	6.000	1.128	1.260	75,0	-6,0	-6,0	1.980	SN..1204.. *SN..43.*
MSRNR-20-5D	00012753	1.250	1.250	6.000	1.350	1.496	75,0	-6,0	-6,0	2.870	SN..1506.. *SN..54.*
MSRNL-16-5D	00071776	1.000	1.000	6.000	1.100	1.496	75,0	-6,0	-6,0	1.980	SN..1506.. *SN..54.*
MSRNL-20-5D	00012754	1.250	1.250	6.000	1.350	1.496	75,0	-6,0	-6,0	2.650	SN..1506.. *SN..54.*
MSRNR-20-6D	00012756	1.250	1.250	6.000	1.318	1.535	75,0	-6,0	-6,0	2.650	SN..1906.. *SN..64.*
MSRNR-24-6E	00013118	1.500	1.500	7.000	1.818	1.513	75,0	-6,0	-6,0	4.630	SN..1906.. *SN..64.*
MSRNL-20-6D	00012757	1.250	1.250	6.000	1.318	1.535	75,0	-6,0	-6,0	2.650	SN..1906.. *SN..64.*
MSRNL-24-6E	00013114	1.500	1.500	7.000	1.818	1.513	75,0	-6,0	-6,0	4.410	SN..1906.. *SN..64.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-9	XNS-59	NL-46	SSN120412
..-5	CL-12	XNS-510	NL-58	SSN150412
..-6	CL-12	XNS-510	NL-68	SSN190412

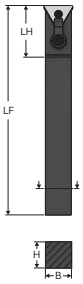
Accessories

For	Insert shim
	
..-4	–
..-5	–
..-6	SSN190612

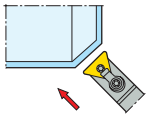
MTCNN – Toolholders for inserts TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTCNN



KAPR = 90,0 °



CTWS



—Neutral version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610, 611
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTCNN-44-3	00013835	1.000	0.500	8.000	0.075	1.147	90,0	-7,0	0,0	1.100	TN..1604.. *TN..33.*
MTCNN-12-4	00013830	0.750	0.750	6.000	–	1.430	90,0	-7,0	0,0	1.100	TN..2204.. *TN..43.*
MTCNN-64-4	00013840	1.000	0.750	8.000	–	1.430	90,0	-7,0	0,0	1.760	TN..2204.. *TN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-7	XNS-36	NL-34L	TSN160312
..-4	CL-12	XNS-510	NL-46	TSN220412

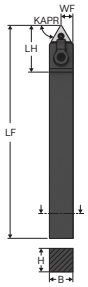
Accessories

For	Insert shim
	
..-3	TSN160412
..-4	TSNS220316

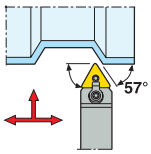
MTENNS – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMP – Inch



MTENNS



KAPR = 60,0 °



—Neutral version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTENNS-8-2	00013850	0.500	0.500	4.500	0.250	0.990	60,0	0,0	-10,0	0.440	TN..1103.. *TN..22.*
MTENNS-10-3	00013855	0.984	0.984	4.500	0.315	1.181	60,0	0,0	-10,0	0.660	TN..1604.. *TN..33.*
MTENNS-12-3	00013860	0.984	0.984	4.500	0.376	1.160	60,0	0,0	-10,0	0.660	TN..1604.. *TN..33.*
MTENNS-64-3	00013890	1.000	0.750	6.024	0.375	0.375	60,0	0,0	-10,0	1.320	TN..1604.. *TN..33.*
MTENNS-12-4	00013865	0.750	0.750	4.500	0.374	1.500	60,0	0,0	-10,0	0.880	TN..2204.. *TN..43.*
MTENNS-16-4	00013870	0.984	0.984	6.000	0.500	1.500	60,0	0,0	-10,0	1.540	TN..2204.. *TN..43.*
MTENNS-20-5	00013875	1.250	1.250	7.008	0.625	1.654	60,0	0,0	-10,0	3.090	TN..2706.. *TN..54.*
MTENNS-24-5	00013880	1.500	1.500	7.008	0.750	1.654	60,0	0,0	-10,0	3.090	TN..2706.. *TN..54.*
MTENNS-24-6	00013885	0.984	0.984	7.008	0.750	1.969	60,0	0,0	-10,0	4.410	TN..3309.. *TN..66.*

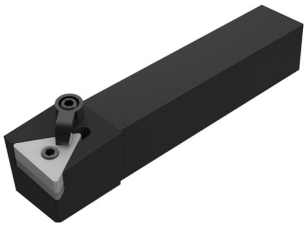
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-2	CL-6	XNS-36	NL-23	–
..-3	CL-6	XNS-36	NL-34L	TSN160312
..-4	CL-9	XNS-59	NL-46	TSN220412
..-5	CL-9	XNS-510	NL-58	TSN270412
..-6	CL-12	XNS-510	NL-68L	TSN330428

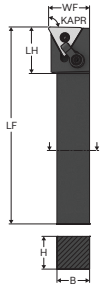
Accessories

For	Insert shim
	
..-2, -4, -5, -6	–
..-3	TSN160412

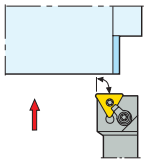
MTFNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTFNR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTFNR-10-3	00013930	0.984	0.625	4.500	0.875	0.930	91,0	-5,0	-5,0	0.660	TN..1604.. *TN..33.*
MTFNR-16-5D	00013144	1.000	1.000	6.000	1.250	1.457	91,0	-5,0	-6,0	1.760	TN..2706.. *TN..54.*

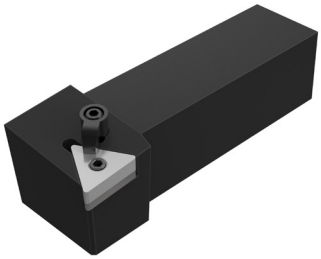
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-6	XNS-36	NL-34L	TSN160312
..-5	CL-12	XNS-510	NL-58	TSN270412

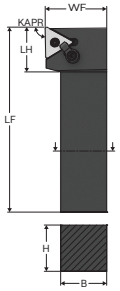
Accessories

For	Insert shim
	
..-3	TSN160412
..-5	–

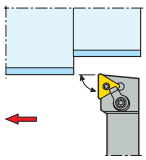
MTGNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTGNR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTGNR-8-2A	00014171	0.500	0.500	4.000	0.625	0.940	90,0	-5,0	-5,0	0.440	TN..1103.. *TN..22.*
MTGNL-8-2A	00014176	0.500	0.500	4.000	0.625	0.940	90,0	-5,0	-5,0	0.440	TN..1103.. *TN..22.*
MTGNR-10-3A	00013167	0.625	0.625	4.000	0.625	1.181	90,0	-5,0	-5,0	0.660	TN..1604.. *TN..33.*
MTGNL-10-3A	00013153	0.625	0.625	4.000	0.625	1.181	90,0	-5,0	-5,0	0.660	TN..1604.. *TN..33.*
MTGNR-24-5D	00012816	1.496	1.500	6.000	2.000	4.540	90,0	-5,0	-5,0	3.970	TN..2706.. *TN..54.*
MTGNL-24-5D	00012817	1.496	1.500	6.000	2.000	4.540	90,0	-5,0	-5,0	4.410	TN..2706.. *TN..54.*

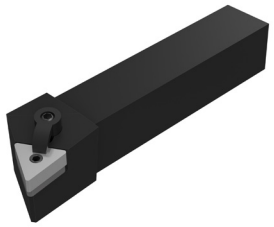
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-2	CL-19	XNS-36	NL-23	–
..-3	CL-6	XNS-36	NL-34L	TSN160312
..-5	CL-9	XNS-510	NL-58	TSN270412

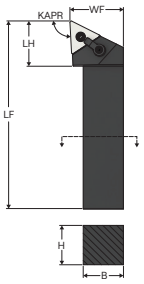
Accessories

For	Insert shim
	
..-2	–
..-3	TSN160412
..-5	–

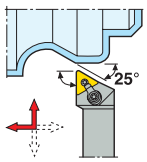
MTJNR/LS – Toolholders for inserts TNGA, TNMA, TNMG, TNMM, TNMP – Inch



MTJNR/LS



KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 18-19
—Shim ITSN333 for insert TN..32., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTJNRS-12-3	00040974	0.750	0.750	4.500	1.000	1.120	93,0	-5,0	-5,0	0.880	TN..1604.. *TN..33.*
MTJNLS-12-3	00040975	0.750	0.750	4.500	1.000	1.120	93,0	-5,0	-5,0	0.880	TN..1604.. *TN..33.*
MTJNRS-16-4D	00014440	1.000	1.000	6.000	1.250	1.190	93,0	-5,0	-5,0	1.760	TN..2204.. *TN..43.*
MTJNLS-16-4	00014445	1.000	1.000	6.000	1.250	1.190	93,0	-5,0	-5,0	1.980	TN..2204.. *TN..43.*
MTJNRS-20-5	00014450	1.250	1.252	7.008	1.500	1.441	93,0	-5,0	-5,0	3.090	TN..2706.. *TN..54.*
MTJNRS-24-5	00014460	1.500	1.500	7.008	2.000	1.441	93,0	-5,0	-5,0	5.070	TN..2706.. *TN..54.*
MTJNLS-20-5	00014455	1.250	1.252	7.008	1.500	1.441	93,0	-5,0	-5,0	3.090	TN..2706.. *TN..54.*
MTJNLS-24-5	00014465	1.500	1.500	7.008	2.000	1.441	93,0	-5,0	-5,0	4.630	TN..2706.. *TN..54.*
MTJNRS-24-6	00040978	1.500	1.500	7.008	2.000	1.669	93,0	-5,0	-5,0	4.630	TN..3309.. *TN..66.*
MTJNLS-24-6	00040979	1.500	1.500	7.008	2.000	1.669	93,0	-5,0	-5,0	4.630	TN..3309.. *TN..66.*

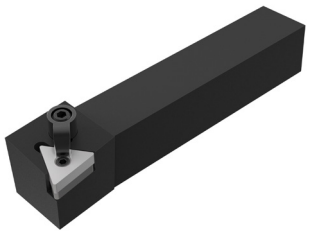
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-6	XNS-36	NL-34L	TSN160312
..-4	CL-9	XNS-510	NL-46	TSN220412
..-5	CL-9	XNS-510	NL-58	TSN270412
..-6	CL-9	XNS-510	NL-68L	TSN330428

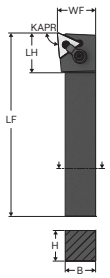
Accessories

For	Insert shim
	
..-3	TSN160412
..-4, -5, -6	–

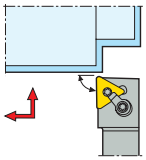
MTLNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS

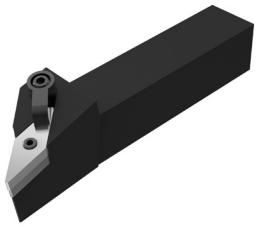


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MTLNR-16-4	00042542	1.000	1.000	6.000	1.250	1.299	95,0	-5,0	-5,0	1.760	TN..2204.. *TN..43.*
MTLNL-16-4	00042543	1.000	1.000	6.000	1.250	1.299	95,0	-5,0	-5,0	1.760	TN..2204.. *TN..43.*

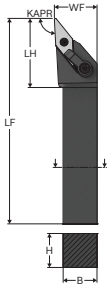
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-9	XNS-510	NL-46	TSNS220316

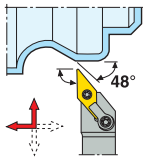
MVJNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMP, VNMU – Inch



MVJNR/L



KAPR = 93,0 °



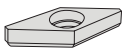
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MVJNR-16-3D	00071714	1.000	1.000	6.000	1.250	1.681	93,0	-4,0	-13,0	1.760	VN..1604.. *VN..33.*
MVJNL-16-3D	00071708	1.000	1.000	6.000	1.250	1.681	93,0	-4,0	-13,0	1.760	VN..1604.. *VN..33.*
MVJNR-16-4D	00012879	1.000	1.000	6.000	1.250	2.018	93,0	-4,0	-13,0	1.760	VN..2204.. *VN..43.*
MVJNR-20-4D	00012888	1.250	1.250	6.000	1.500	2.018	93,0	-4,0	-13,0	2.430	VN..2204.. *VN..43.*
MVJNL-16-4D	00012883	1.000	1.000	6.000	1.250	2.018	93,0	-4,0	-13,0	1.760	VN..2204.. *VN..43.*
MVJNL-20-4D	00012889	1.250	1.250	6.000	1.500	2.018	93,0	-4,0	-13,0	2.430	VN..2204.. *VN..43.*

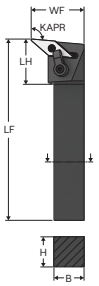
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-30	XNS-510	NL-34L	VSN160316
..-4	CL-30	XNS-510	NL-46	VSN220412

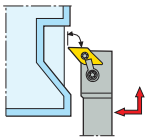
MVLNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMP – Inch



MVLNR/L



KAPR = 95,0 °



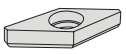
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MVLNR-16-4D	00013206	1.000	1.000	6.000	1.750	1.497	95,0	-4,0	-13,0	1.980	VN..2204.. *VN..43.*
MVLNR-20-4D	00013207	1.250	1.250	6.000	2.000	1.498	95,0	-4,0	-13,0	2.870	VN..2204.. *VN..43.*
MVLNL-16-4D	00013198	1.000	1.000	6.000	1.750	1.497	95,0	-4,0	-13,0	1.980	VN..2204.. *VN..43.*
MVLNL-20-4D	00013199	1.250	1.250	6.000	2.000	1.498	95,0	-4,0	-13,0	2.870	VN..2204.. *VN..43.*

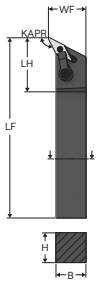
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-4	CL-12	XNS-510	NL-46	VSN220412

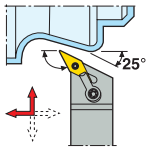
MVTNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMP – Inch



MVTNR/L



KAPR = 117,25 °



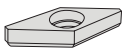
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 18-19
—For ISO attribute explanation, see page 82

CTWS

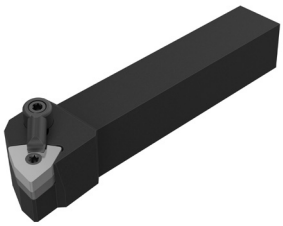


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MVTNR-12-3B	00049604	0.750	0.750	4.500	1.000	1.737	117,25	-4,0	-13,0	0.880	VN..1604.. *VN..33.*
MVTNR-16-3D	00013222	1.000	1.000	6.000	1.250	1.800	117,25	-4,0	-13,0	1.760	VN..1604.. *VN..33.*
MVTNR-20-3D	00013223	1.250	1.250	6.000	1.500	1.737	117,25	-4,0	-13,0	2.650	VN..1604.. *VN..33.*
MVTNL-12-3B	00052353	0.750	0.750	4.500	1.000	1.737	117,25	-4,0	-13,0	0.880	VN..1604.. *VN..33.*
MVTNL-16-3D	00013214	1.000	1.000	6.000	1.250	1.800	117,25	-4,0	-13,0	1.760	VN..1604.. *VN..33.*
MVTNL-20-3D	00013216	1.250	1.250	6.000	1.500	1.737	117,25	-4,0	-13,0	2.650	VN..1604.. *VN..33.*

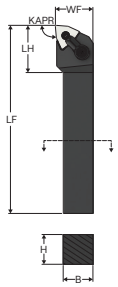
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-30	XNS-510	NL-34L	VSN160316

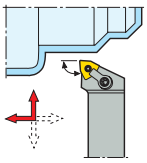
MWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric



MWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 16-17
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
MWLNR2020K08	75002232	20	20	125	25,0	31,0	95,0	-6,0	-6,0	0,4	WN..0804.. *WN..43.*
MWLNR2525M08	75002234	25	25	150	32,0	31,0	95,0	-6,0	-6,0	0,8	WN..0804.. *WN..43.*
MWLNR3232P08	75002236	32	32	170	40,0	31,0	95,0	-6,0	-6,0	1,4	WN..0804.. *WN..43.*
MWLNL2020K08	75002233	20	20	125	25,0	31,0	95,0	-6,0	-6,0	0,4	WN..0804.. *WN..43.*
MWLNL2525M08	75002235	25	25	150	32,0	31,0	95,0	-6,0	-6,0	0,8	WN..0804.. *WN..43.*
MWLNL3232P08	75002237	32	32	170	40,0	31,0	95,0	-6,0	-6,0	1,4	WN..0804.. *WN..43.*

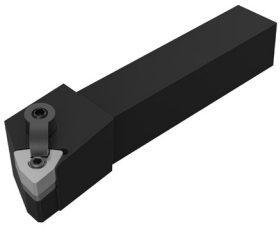
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert shim	Shim/clamp key	Shim pin
					
...08	MC21	LD6025-T15P	MWN080412	1/4HEX-T15PX50	MN1215T-T15P

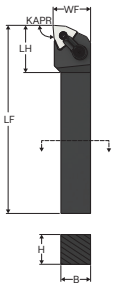
Accessories

For	Bit holder	Insert clamping torque	Plug	Replacement blade	Torque key
					
...08	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	T00-15P30

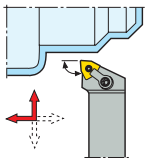
MWLNR/L – Toolholders for inserts WNGA, WNGP, WNMA, WNMG, WNMM, WNMP – Inch



MWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 18-19
—Shim IWSN423 for insert WN..44., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS

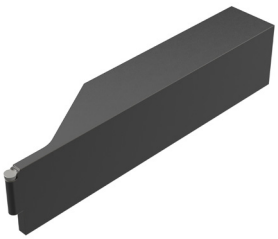


Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
MWLNR-10-3A	75056399	0.625	0.625	4.000	0.875	1.102	95,0	-6,0	-6,0	0.440	WN..0604.. *WN..33.*
MWLNL-10-3A	75056400	0.625	0.625	4.000	0.875	1.102	95,0	-6,0	-6,0	0.440	WN..0604.. *WN..33.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
..-3	CL-6	XNS-36	NL-34L	IWSN060312

TRAOR/L, TRDON – Toolholders for inserts RCGS – Metric/ Inch



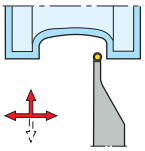
TRAOR/L



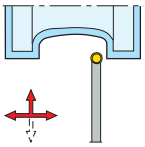
TRDON



TRAOR/L
KAPR



TRDON
KAPR = 45,0 °



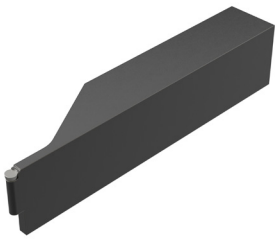
CTWS



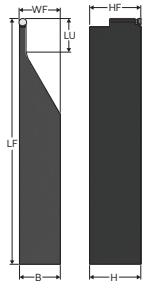
—TRAOR/L = Right-hand version shown
—TRDON = Neutral version shown
—For inserts program, see page(s) 563, 600
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	HF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
TRAOR3225-4.76	75071805	32 *1.260*	25 *0.984*	151 *5.945*	25,35 *0.998*	31,8 *1.252*	–	–	0,0	0,0	0,8 *1.760*	RCGS4.76 *RCGS1.5*
TRAOL3225-4.76	75071806	32 *1.260*	25 *0.984*	151 *5.945*	25,35 *0.998*	31,8 *1.252*	–	–	0,0	0,0	0,8 *1.760*	RCGS4.76 *RCGS1.5*
TRAOR3225-6.35	75071807	32 *1.260*	25 *0.984*	150 *5.906*	25,5 *1.004*	31,8 *1.252*	–	–	0,0	0,0	0,8 *1.760*	RCGS6.35 *RCGS2*
TRAOL3225-6.35	75071808	32 *1.260*	25 *0.984*	150 *5.906*	25,5 *1.004*	31,8 *1.252*	–	–	0,0	0,0	0,8 *1.760*	RCGS6.35 *RCGS2*
TRAOR3225-9.525	75036398	32 *1.260*	25 *0.984*	200 *7.874*	25,76 *1.014*	31,8 *1.252*	–	–	0,0	0,0	1,2 *2.650*	RCGS9.52 *RCGS3*
TRDON2004H4.76	75071812	20 *0.787*	4 *0.157*	100 *3.937*	4,38 *0.172*	19,8 *0.780*	3,7 *0.146*	45,0	0,0	0,0	0,1 *0.220*	RCGS4.76 *RCGS1.5*
TRDON2005H6.35	75071813	20 *0.787*	6 *0.217*	100 *3.937*	5,92 *0.233*	19,8 *0.780*	4,7 *0.185*	45,0	0,0	0,0	0,1 *0.220*	RCGS6.35 *RCGS2*

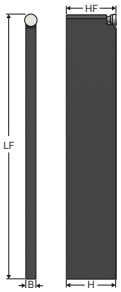
TRAOR/L, TROON – Toolholders for inserts RCGS – Inch



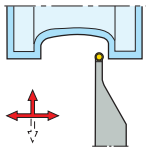
TRAOR/L



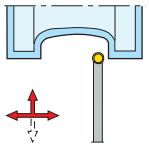
TROON



TRAOR/L
KAPR



TROON
KAPR = 90,0 °



CTWS



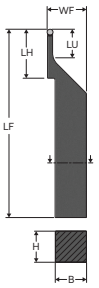
—TRAOR/L = Right-hand version shown
—TROON = Neutral version shown
—For inserts program, see page(s) 563, 600
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	HF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch				lbs	
TRAOR-85-1.5	00017945	1.250	1.000	6.000	1.014	1.250	–	–	0,0	0,0	1.760	RCGS4.76 *RCGS1.5*
TRAOL-85-1.5	75053455	1.250	1.000	6.000	1.014	1.250	–	–	0,0	0,0	1.760	RCGS4.76 *RCGS1.5*
TRAOR-85-2	00017950	1.250	1.000	6.000	1.020	1.250	–	–	0,0	0,0	1.760	RCGS6.35 *RCGS2*
TRAOL-85-2	00048374	1.250	1.000	6.000	1.020	1.250	–	–	0,0	0,0	1.760	RCGS6.35 *RCGS2*
TRAOR-85-3	00017955	1.250	1.000	8.031	1.030	1.250	–	–	0,0	0,0	2.430	RCGS9.52 *RCGS3*
TRAOL-85-3	00046228	1.250	1.000	8.031	1.030	1.250	–	–	0,0	0,0	2.430	RCGS9.52 *RCGS3*
TROON-153-1.5	00017975	0.750	0.156	4.000	–	0.750	0.150	90,0	0,0	0,0	0.220	RCGS4.76 *RCGS1.5*
TROON-23-2	00017980	0.750	0.218	4.000	–	1.252	0.189	90,0	0,0	0,0	0.220	RCGS6.35 *RCGS2*
TROON-34-3	00017985	1.000	0.312	4.000	–	1.000	0.295	90,0	0,0	0,0	0.440	RCGS9.52 *RCGS3*
TROON-45-4	00017990	1.250	0.433	4.000	–	1.250	0.374	90,0	0,0	0,0	0.660	RCGS12.7 *RCGS46*

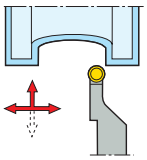
TRGOR/L – Toolholders for inserts RCGS – Inch



TRGOR/L



KAPR



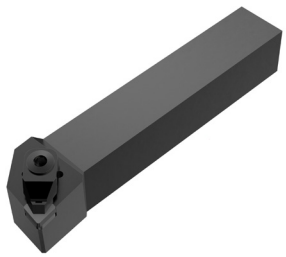
—Right-hand version shown
—For inserts program, see page(s) 563, 600
—For holder code key, see page(s) 18–19
—For ISO attribute explanation, see page 82

CTWS

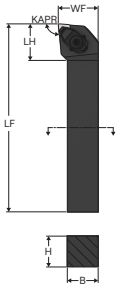


Designation	Item number	H	B	LF	WF	HF	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch				lbs	
TRGOR-16-1.5	00041032	1.000	1.000	6.000	1.252	1.000	0.760	–	0,0	0,0	1.540	RCGS4.76 *RCGS1.5*
TRGOR-20-1.5	00041040	1.250	1.250	7.000	1.500	1.250	0.760	–	0,0	0,0	2.650	RCGS4.76 *RCGS1.5*
TRGOL-16-1.5	00041033	1.000	1.000	6.000	1.250	1.000	0.760	–	0,0	0,0	1.320	RCGS4.76 *RCGS1.5*
TRGOL-20-1.5	00041041	1.250	1.250	7.000	1.500	1.250	0.760	–	0,0	0,0	2.650	RCGS4.76 *RCGS1.5*
TRGOR-16-2	00041034	1.000	1.000	6.000	1.252	1.000	0.770	–	0,0	0,0	1.540	RCGS6.35 *RCGS2*
TRGOR-20-2	00041042	1.250	1.250	7.000	1.500	1.250	0.770	–	0,0	0,0	2.650	RCGS6.35 *RCGS2*
TRGOR-24-2	00047814	1.500	1.500	7.000	2.000	1.500	0.770	–	0,0	0,0	3.530	RCGS6.35 *RCGS2*
TRGOL-16-2	00041035	1.000	1.000	6.000	1.250	1.000	0.770	–	0,0	0,0	1.540	RCGS6.35 *RCGS2*
TRGOL-20-2	00041043	1.250	1.250	7.000	1.500	1.250	0.770	–	0,0	0,0	2.650	RCGS6.35 *RCGS2*
TRGOL-24-2	00047815	1.500	1.500	7.000	2.000	1.500	0.770	–	0,0	0,0	3.530	RCGS6.35 *RCGS2*
TRGOR-16-3	00041036	1.000	1.000	6.000	1.250	1.000	1.030	–	0,0	0,0	1.540	RCGS9.52 *RCGS3*
TRGOR-20-3	00041044	1.250	1.250	7.000	1.500	1.250	1.030	–	0,0	0,0	2.650	RCGS9.52 *RCGS3*
TRGOR-24-3	00047816	1.500	1.500	7.000	2.000	1.500	1.030	–	0,0	0,0	3.750	RCGS9.52 *RCGS3*
TRGOL-16-3	00041037	1.000	1.000	6.000	1.250	1.000	1.030	–	0,0	0,0	1.540	RCGS9.52 *RCGS3*
TRGOL-20-3	00041045	1.250	1.250	7.000	1.500	1.250	1.030	–	0,0	0,0	2.650	RCGS9.52 *RCGS3*
TRGOL-24-3	00047817	1.500	1.500	7.000	2.000	1.500	1.030	–	0,0	0,0	3.530	RCGS9.52 *RCGS3*
TRGOR-16-4	00041038	1.000	1.000	6.000	1.250	1.000	1.040	–	0,0	0,0	1.540	RCGS12.7 *RCGS46*
TRGOR-20-4	00041046	1.250	1.250	7.000	1.500	1.250	1.040	–	0,0	0,0	2.650	RCGS12.7 *RCGS46*
TRGOR-24-4	00041048	1.500	1.500	7.000	2.000	1.500	1.040	–	0,0	0,0	3.530	RCGS12.7 *RCGS46*
TRGOL-16-4	00041039	1.000	1.000	6.000	1.250	1.000	1.040	–	0,0	0,0	1.540	RCGS12.7 *RCGS46*
TRGOL-20-4	00041047	1.250	1.250	7.000	1.500	1.250	1.040	–	0,0	0,0	2.650	RCGS12.7 *RCGS46*
TRGOL-24-4	00041049	1.500	1.500	7.000	2.000	1.500	1.040	–	0,0	0,0	3.530	RCGS12.7 *RCGS46*

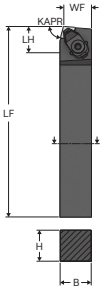
CCLNR/L, CCBNR/L – Toolholders for PCBN inserts CNGN, CNMN – Metric



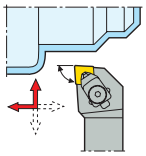
CCLNR/L



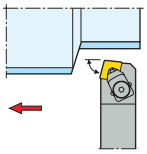
CCBNR/L



CCLNR/L
KAPR = 95,0 °



CCBNR/L
KAPR = 75,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 596, 622
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CCLNR2525M09	00089173	25	25	150	32,0	27,0	95,0	-6,0	-6,0	0,8	CN.N0903.. *CN.N32.*
CCLNR3225P09	00089175	32	25	170	32,0	27,0	95,0	-6,0	-6,0	1,1	CN.N0903.. *CN.N32.*
CCLNL2525M09	00089174	25	25	150	32,0	27,0	95,0	-6,0	-6,0	0,8	CN.N0903.. *CN.N32.*
CCLNL3225P09	00089176	32	25	170	32,0	27,0	95,0	-6,0	-6,0	1,1	CN.N0903.. *CN.N32.*
CCLNR2525M12	00089177	25	25	150	32,0	34,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
CCLNR3225P12	00089179	32	25	170	32,0	34,0	95,0	-6,0	-6,0	1,2	CN..1204.. *CN..43.*
CCLNL2525M12	00089178	25	25	150	32,0	34,0	95,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
CCLNL3225P12	00089180	32	25	170	32,0	34,0	95,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
CCBNR2525M09	00089181	25	25	150	22,0	30,0	75,0	-6,0	-6,0	0,8	CN.N0903.. *CN.N32.*
CCBNL2525M09	00089182	25	25	150	22,0	30,0	75,0	-6,0	-6,0	0,8	CN.N0903.. *CN.N32.*
CCBNR2525M12	00089185	25	25	150	22,0	34,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*
CCBNR3225P12	00089187	32	25	170	22,0	34,0	75,0	-6,0	-6,0	1,1	CN..1204.. *CN..43.*
CCBNL2525M12	00089186	25	25	150	22,0	34,0	75,0	-6,0	-6,0	0,8	CN..1204.. *CN..43.*

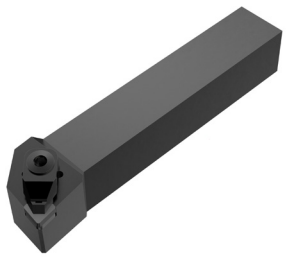
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...09	CC17P-09	1/4HEX-H4.0X50	CCN090412	P1311-09	174.10-652-T07P
...12	CC17P	1/4HEX-H4.0X50	CCN120312	P1311	F94009-T09P

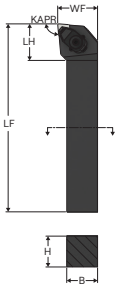
Accessories

For	Bit holder	Shim key
		
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

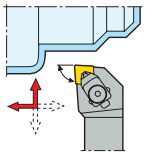
CCLNR/L-.C – Toolholders for ceramic inserts CNGN – Metric



CCLNR/L-.C



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 622
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CCLNR2525M12-4C	02926470	25	25	150	32,4	32,2	95,0	-6,0	-6,0	0,7	CN.N1207.. *CN.N45.*
CCLNL2525M12-4C	02926471	25	25	150	32,4	32,2	95,0	-6,0	-6,0	0,9	CN.N1207.. *CN.N45.*

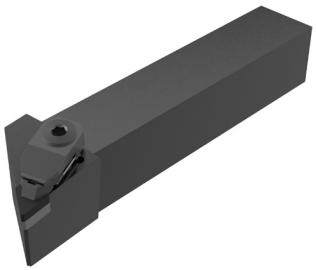
Spare Parts, included in delivery

For	Clamp kit	Insert shim	Shim screw
			
..-4C	CC12P-D12	DCN120316	C04008-T15P

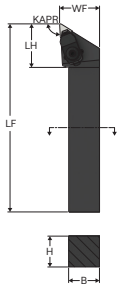
Accessories

For	Insert shim	Shim key
		
..-4C	DCN120616	T15P-2D

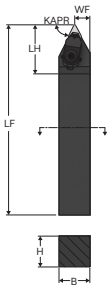
CDJNR/L, CDNNN – Toolholders for PCBN inserts DNGN, DNMN – Metric



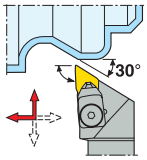
CDJNR/L



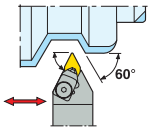
CDNNN



CDJNR/L
KAPR = 93,0 °



CDNNN
KAPR = 62,5 °



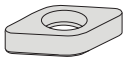
CTWS



–CDJNR/L = Right-hand version shown
–CDNNN = Neutral version shown
–For inserts program, see page(s) 599
–For holder code key, see page(s) 16-17
–For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CDJNR2525M11	00089189	20	25	150	32,0	34,0	93,0	-6,0	-6,0	0,8	DN.N1103.. *DN.N32.*
CDJNL2525M11	00089190	20	25	150	32,0	34,0	93,0	-6,0	-6,0	0,8	DN.N1103.. *DN.N32.*
CDNNN2525M11	00089193	25	25	150	13,2	30,0	62,5	-9,0	-5,0	0,7	DN.N1103.. *DN.N32.*

Spare Parts, included in delivery

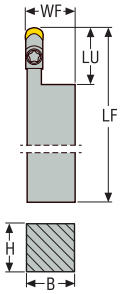
For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...11	CC20P	1/4HEX-H4.0X50	CDN110412	P1311-09	174.10-652-T07P

Accessories

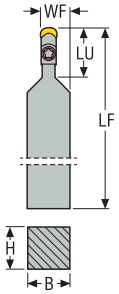
For	Bit holder	Shim key
		
...11	1/4HEX-S-HANDLE	1/4HEX-T07PX50

CRDCR...C, CRDCN...C – Toolholders for ceramic inserts RCGX, RPGX – Metric

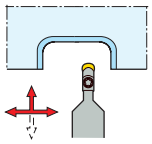
CRDCR/L...C



CRDCN...C



CRDCN...C
KAPR



CTWS



—CRDCR...C = Right-hand version shown
—CRDCN...C = Neutral version shown
—For inserts program, see page(s) 622, 624
—For holder code key, see page(s) 16–17
—For information regarding clamp screw, contact your local Seco office
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm				kg	
CRDCN3225P06C	02926478	32	25	170	15,6	–	19,4	–	0,0	0,0	0,9	RC..0606 *RC..24.*
CRDCN3225P09C	02926479	32	25	170	17,2	–	29,0	–	0,0	0,0	0,9	R.GX0907.. *R.GX35.*
CRDCN3225P12C	02926482	32	25	170	18,8	–	38,5	–	0,0	0,0	0,9	R.GX1207.. *R.GX45.*

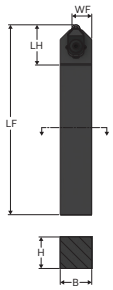
Spare Parts, included in delivery

For	Clamp	Clamp key	Insert shim	Shim key
				
CRDCN...06C	CEN055	1/4HEX-T30PX50	CN52.190	1/4HEX-H2.0X50
CRDCN...09C	CEN087	–	CN76.206	1/4HEX-T10PX50
CRDCN...12C	CEN120	1/4HEX-T30PX50	CN55.222	1/4HEX-T25PX50

CRDNN – Toolholders for PCBN inserts RNGN, RNMN – Inch



CRDNN



—Neutral version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 18–19
—Shim 117.10–621 for insert RN.N43.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
CRDNN-16-2	00073874	1.000	1.000	6.000	0.750	1.270	45,0	0,0	-7,0	1.760	RN.N0603.. *RN.N22.*
CRDNN-20-3	00073878	1.250	1.250	6.000	0.875	1.197	45,0	0,0	-7,0	2.650	RN.N0903.. *RN.N32.*
CRDNN-20-4	00073880	1.250	1.250	6.000	0.875	1.693	45,0	0,0	-7,0	2.650	RN.N1203.. *RN.N42.*

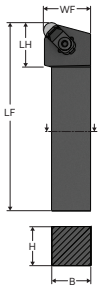
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim key	Shim screw
						
..-2	CC17P-06	1/4HEX-H4.0X50	CRN0603M0	P1311-06	1/4HEX-T07PX50	CS2507-T07P
..-3	CC17P-09	1/4HEX-H4.0X50	117.10-620	P1311-09	1/4HEX-T07PX50	174.10-652-T07P
..-4	CC17P	1/4HEX-H4.0X50	117.10-622	P1311	1/4HEX-T09PX50	F94009-T09P

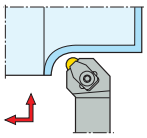
CRGNR/L – Toolholders for PCBN inserts RNGN, RNMN – Inch



CRGNR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 601, 619, 623
—For holder code key, see page(s) 18-19
—Shim 117.10-621 for insert RN.N43.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
CRGNR-20-4	00073898	1.250	1.250	6.000	1.500	1.382	90,0	-5,0	-5,0	2.870	RN.N1203.. *RN.N42.*
CRGNL-20-4	00073909	1.250	1.250	6.000	1.500	1.382	90,0	-5,0	-5,0	2.870	RN.N1203.. *RN.N42.*

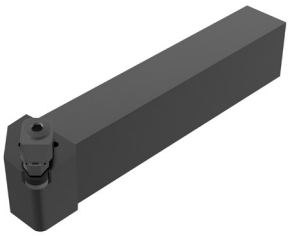
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
..-4	CC17P	1/4HEX-H4.0X50	117.10-622	P1311	F94009-T09P

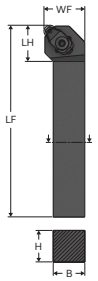
Accessories

For	Bit holder	Shim key
		
..-4	1/4HEX-S-HANDLE	1/4HEX-T09PX50

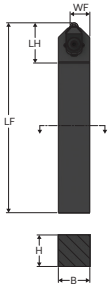
CRSNR/L, CRDNN – Toolholders for PCBN inserts RNGN, RNMN – Metric



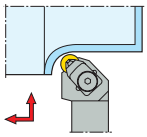
CRSNR/L



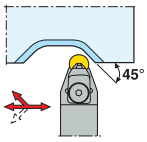
CRDNN



CRSNR/L
KAPR = 45,0 °



CRDNN
KAPR = 45,0 °



CTWS



—CRSNR/L = Right-hand version shown
—CRDNN = Neutral version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 16-17
—Shim 117.10-621 for insert RN.N1204.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CRSNR2525M06	75069238	25	25	150	32,0	27,0	45,0	-6,0	-6,0	0,8	RN.N0603.. *RN.N22.*
CRSNL2525M06	75069239	25	25	150	32,0	27,0	45,0	-6,0	-6,0	0,8	RN.N0603.. *RN.N22.*
CRSNR2525M09	00089195	25	25	150	32,0	29,0	45,0	-6,0	-6,0	0,8	RN.N0903.. *RN.N32.*
CRSNR3225P09	00089197	32	25	170	32,0	29,0	45,0	-6,0	-6,0	1,1	RN.N0903.. *RN.N32.*
CRSNR4040R09	02424441	40	40	200	50,0	29,0	45,0	-6,0	-6,0	2,5	RN.N0903.. *RN.N32.*
CRSNL2525M09	00089196	25	25	150	32,0	29,0	45,0	-6,0	-6,0	0,8	RN.N0903.. *RN.N32.*
CRSNL3225P09	00089198	32	25	170	32,0	29,0	45,0	-6,0	-6,0	1,1	RN.N0903.. *RN.N32.*
CRSNL4040R09	02424439	40	40	200	50,0	29,0	45,0	-6,0	-6,0	2,4	RN.N0903.. *RN.N32.*
CRSNR3225P12	00089199	32	25	170	32,0	30,0	45,0	-6,0	-6,0	1,1	RN.N1203.. *RN.N42.*
CRSNR4040R12	02424442	40	40	200	50,0	30,0	45,0	-6,0	-6,0	2,5	RN.N1203.. *RN.N42.*
CRSNL3225P12	00089200	32	25	170	32,0	30,0	45,0	-6,0	-6,0	1,1	RN.N1203.. *RN.N42.*
CRSNL4040R12	02424440	40	40	200	50,0	30,0	45,0	-6,0	-6,0	2,5	RN.N1203.. *RN.N42.*
CRDNN2525M06	75069237	25	25	150	15,5	29,0	45,0	0,0	-8,0	0,7	RN.N0603.. *RN.N22.*
CRDNN3225P09	00089201	32	25	170	17,0	31,0	45,0	0,0	-8,0	1,1	RN.N0903.. *RN.N32.*
CRDNN4040R09	02424437	40	40	200	24,8	31,0	45,0	0,0	-8,0	2,3	RN.N0903.. *RN.N32.*
CRDNN3225P12	00089202	32	25	170	18,5	36,0	45,0	0,0	-8,0	1,1	RN.N1203.. *RN.N42.*
CRDNN4040R12	02424438	40	40	200	26,3	36,0	45,0	0,0	-8,0	2,3	RN.N1203.. *RN.N42.*
CRDNN5040T12	75069265	50	40	300	26,3	36,0	45,0	0,0	-8,0	4,4	RN.N1203.. *RN.N42.*

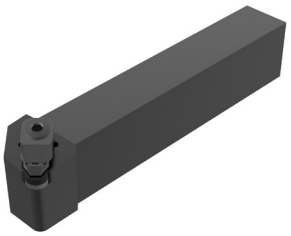
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...06	CC17P-06	1/4HEX-H4.0X50	CRN0603M0	P1311-06	CS2507-T07P
...09	CC17P-09	1/4HEX-H4.0X50	117.10-620	P1311-09	174.10-652-T07P
...12	CC17P	1/4HEX-H4.0X50	117.10-622	P1311	F94009-T09P

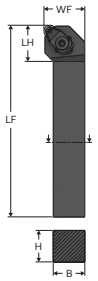
Accessories

For	Bit holder	Shim key
		
...06	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

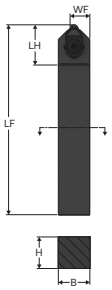
CRSNR/L...C, CRDNN...C – Toolholders for ceramic inserts RNGN – Metric



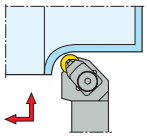
CRSNR/L...C



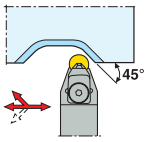
CRDNN...C



CRSNR/L...C
KAPR = 0,0 °



CRDNN...C
KAPR = 0,0 °



CTWS



—CRSNR/L...C = Right-hand version shown
—CRDNN...C = Neutral version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CRSNR2525M12C	02926488	25	25	150	32,0	28,0	0,0	-6,0	-6,0	0,7	RN..1207.. *RN..45.*
CRSNR3225P12C	02926490	32	25	170	32,0	28,0	0,0	-6,0	-6,0	1,1	RN..1207.. *RN..45.*
CRSNL2525M12C	02926489	25	25	150	32,0	28,0	0,0	-6,0	-6,0	0,7	RN..1207.. *RN..45.*
CRSNL3225P12C	02926491	32	25	170	32,0	28,0	0,0	-6,0	-6,0	1,1	RN..1207.. *RN..45.*
CRDNN2525M12C	02926486	25	25	150	18,8	32,0	0,0	0,0	0,0	0,7	RN..1207.. *RN..45.*

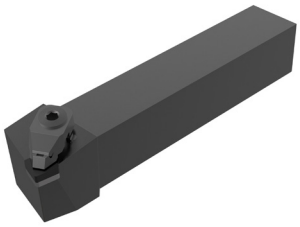
Spare Parts, included in delivery

For	Clamp	Clamp key	Insert shim	Pressure plate	Shim key	Shim screw
						
..12C	CC17P	1/4HEX-H4.0X50	CRN120400	P1311	1/4HEX-T20PX50	L85013-T20P

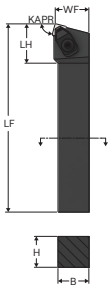
Accessories

For	Bit holder	Insert shim
		
..12C	1/4HEX-S-HANDLE	CRN120800

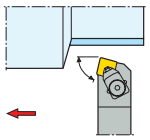
CSBNR/L – Toolholders for PCBN inserts SNGN, SNMN, SNUN – Metric



CSBNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 606
—For holder code key, see page(s) 16-17
—Shim 174.10-622 for insert SN.N1203.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CSBNR2525M09	00089203	25	25	150	22,0	30,0	75,0	-6,0	-6,0	0,8	SN..0903.. *SN..32.*
CSBNR3225P09	00089206	32	25	170	22,0	30,0	75,0	-6,0	-6,0	1,1	SN..0903.. *SN..32.*
CSBNL2525M09	00089204	25	25	150	22,0	30,0	75,0	-6,0	-6,0	0,8	SN..0903.. *SN..32.*
CSBNR3225P12	00089207	32	25	170	22,0	35,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
CSBNL3225P12	00089208	32	25	170	22,0	35,0	75,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*

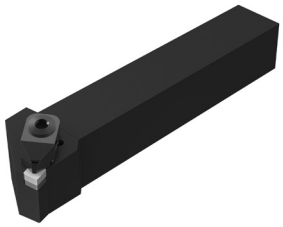
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...09	CC17P-09	1/4HEX-H4.0X50	CSN090412	P1311-09	174.10-652-T07P
...12	CC20P	1/4HEX-H4.0X50	174.10-621	P1311	F94009-T09P

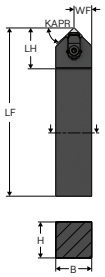
Accessories

For	Bit holder	Shim key
		
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

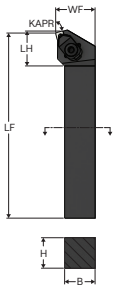
CSDNN, CSKNR/L – Toolholders for PCBN inserts SNGN, SNMN, SNUN – Metric



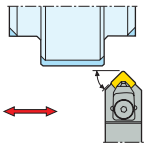
CSDNN



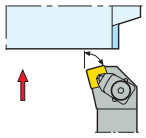
CSKNR/L



CSDNN
KAPR = 45,0 °



CSKNR/L
KAPR = 75,0 °



CTWS



—CSDNN = Neutral version shown
—CSKNR/L = Right-hand version shown
—For inserts program, see page(s) 605
—For holder code key, see page(s) 16–17
—Shim 174.10–622 for insert SN.N1203.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CSDNN3225P09	00089209	32	25	170	13,0	33,0	45,0	-6,0	-6,0	1,1	SN..0903.. *SN..32.*
CSDNN3225P12	00089210	32	25	170	13,0	40,0	45,0	-6,0	-6,0	1,1	SN..1204.. *SN..43.*
CSKNL2525M06	00005871	25	25	150	32,0	35,0	75,0	-6,0	-6,0	0,8	SN.N0603.. *SN.N22.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...06	CC17P-06	1/4HEX-H4.0X50	CSN060308	P1311-06	CS2507-T07P
...09	CC17P-09	1/4HEX-H4.0X50	CSN090412	P1311-09	174.10-652-T07P
...12	CC20P	1/4HEX-H4.0X50	174.10-621	P1311	F94009-T09P

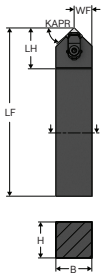
Accessories

For	Bit holder	Shim key
		
...06	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

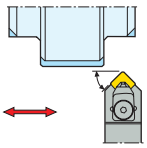
CSDNN – Toolholders for PCBN inserts SNGN, SNMN – Inch



CSDNN



KAPR = 45,0 °



—Neutral version shown
—For inserts program, see page(s) 605
—For holder code key, see page(s) 18-19
—Shim 174.10-622 for insert SN.N1203.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
CSDNN-16-4	00073786	1.000	1.000	6.000	0.500	1.701	45,0	0,0	-7,0	1.760	SN..1204.. *SN..43.*

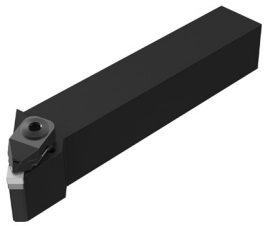
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
CSDNN-16-4	CC20P	1/4HEX-H4.0X50	174.10-622	P1311	F94009-T09P

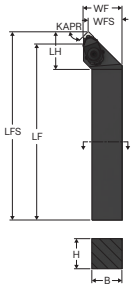
Accessories

For	Bit holder	Shim key
		
CSDNN-16-4	1/4HEX-S-HANDLE	1/4HEX-T09PX50

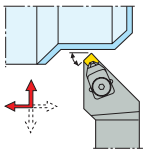
CSSNR/L – Toolholders for PCBN inserts SNGN, SNMN – Metric



CSSNR/L



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 605
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	LFS	WF	WFS	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
CSSNR2525M06	00005870	25	25	150	154,2	32,2	27,8	27,0	45,0	-7,0	0,0	0,8	SN.N0603.. *SN.N22.*
CSSNL2525M06	00005869	25	25	150	154,2	32,2	27,8	27,0	45,0	-7,0	0,0	0,8	SN.N0603.. *SN.N22.*

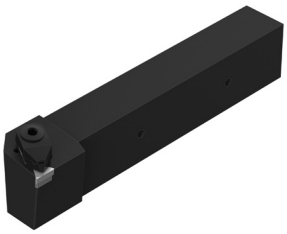
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...06	CC17P-06	1/4HEX-H4.0X50	CSN060308	P1311-06	CS2507-T07P

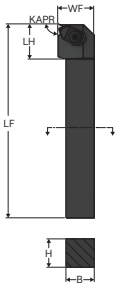
Accessories

For	Bit holder	Shim key
		
...06	1/4HEX-S-HANDLE	1/4HEX-T07PX50

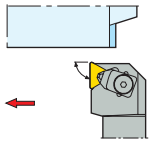
CTGNR/L..-PL – Toolholders for PCBN inserts TNGN, TNMN – Metric



CTGNR/L..-PL



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 610, 611
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CTGNR3225P11-PL	00042808	32	25	170	32,2	31,0	90,0	-8,0	0,0	1,2	TN..1103.. *TN..22.*
CTGNL3225P11-PL	00042809	32	25	170	32,2	31,0	90,0	-8,0	0,0	1,1	TN..1103.. *TN..22.*

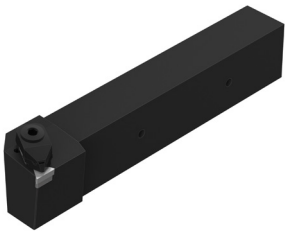
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Setting screw	Shim screw
						
...11	CC17P-06	1/4HEX-H4.0X50	CTN110308	P1311-06	179.17-686	CS2507-T07P

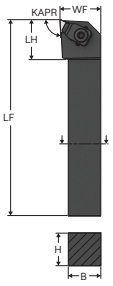
Accessories

For	Bit holder	Shim key
		
...11	1/4HEX-S-HANDLE	1/4HEX-T07PX50

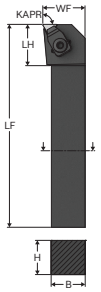
CTJNR/L, CTFNR/L – Toolholders for PCBN inserts TNGN, TNGX, TNMN, TNMX – Metric



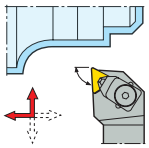
CTJNR/L



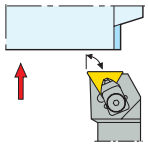
CTFNR/L



CTJNR/L
KAPR = 93,0 °



CTFNR/L
KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610
—For holder code key, see page(s) 16–17
—Shim CTN110312 for insert TN.N110312 and TNMX110308S-WZ, to be ordered separately
—Shim 175.10–622 for insert TNGN1603.., to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CTJNR2525M11	75069262	25	25	150	32,2	23,0	93,0	-6,0	-6,0	0,8	TN..1103.. *TN..22.*
CTJNL2525M11	75069263	25	25	150	32,2	23,0	93,0	-6,0	-6,0	0,8	TN..1103.. *TN..22.*
CTJNR2525M16	00095796	25	25	150	32,2	35,0	93,0	-6,0	-6,0	0,8	TN.N1604.. *TN.N33.*
CTJNL2525M16	00095797	25	25	150	32,2	35,0	93,0	-6,0	-6,0	0,8	TN.N1604.. *TN.N33.*
CTFNR2525M11	75069266	25	25	150	32,2	29,3	91,0	-6,0	-6,0	0,8	TN..1103.. *TN..22.*
CTFNL2525M11	75069267	25	25	150	32,2	29,3	91,0	-6,0	-6,0	0,8	TN..1103.. *TN..22.*
CTFNR2525M16	00095792	25	25	150	32,2	35,0	91,0	-6,0	-6,0	0,9	TN.N1604.. *TN.N33.*

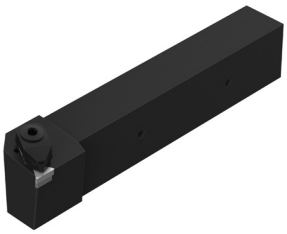
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
...11	CC17P-06	1/4HEX-H4.0X50	CTN110308	P1311-06	CS2507-T07P
...16	CC17P-09	1/4HEX-H4.0X50	175.10-621	P1311-09	F94009-T09P

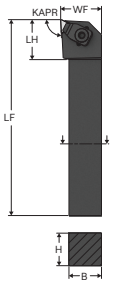
Accessories

For	Bit holder	Shim key
		
...11	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...16	1/4HEX-S-HANDLE	1/4HEX-T09PX50

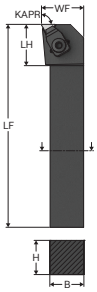
CTJNR/L, CTFNR/L – Toolholders for PCBN inserts TNGN, TNMN, TNMX – Inch



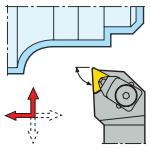
CTJNR/L



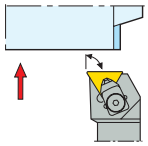
CTFNR/L



CTJNR/L
KAPR = 93,0 °



CTFNR/L
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610, 611
—For holder code key, see page(s) 18-19
—TNMX insert for CTJNR/L toolholder KAPR = 93°
—Shim CTN110312 for insert TNMN223, to be ordered separately
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch				lbs	
CTJNR-16-2	00073868	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.760	TN..1103.. *TN..22.*
CTJNL-16-2	00073871	1.000	1.000	6.000	1.250	1.181	93,0	-6,0	-6,0	1.980	TN..1103.. *TN..22.*
CTFNR-16-2	00073861	1.000	1.000	6.024	1.252	1.181	90,0	-6,0	-6,0	1.980	TN..1103.. *TN..22.*
CTFNL-16-2	00073863	1.000	1.000	6.024	1.252	1.181	90,0	-6,0	-6,0	1.980	TN..1103.. *TN..22.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Shim screw
				
..-2	CC16	1/4HEX-H4.0X50	CTN110308	CS2507-T07P

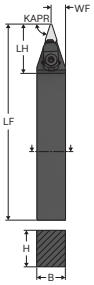
Accessories

For	Bit holder	Shim key
		
..-2	1/4HEX-S-HANDLE	1/4HEX-T07PX50

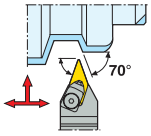
CVVNN – Toolholders for PCBN inserts VNGA, VNMA – Metric



CVVNN



KAPR = 72,5 °



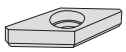
—Neutral version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 16–17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
CVVNN3225P16	00094012	32	25	170	13,1	42,0	72,5	-15,0	-5,0	1,0	VN..1604.. *VN..33.*

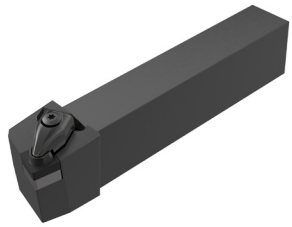
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim pin
					
CVVNN3225P16	CC20P	1/4HEX-H4.0X50	VSN160316	P1311-09	MN0909L-T09P

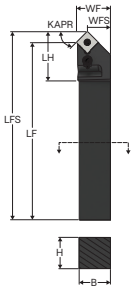
Accessories

For	Bit holder	Shim key
		
CVVNN3225P16	1/4HEX-S-HANDLE	1/4HEX-T09PX50

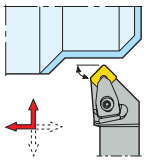
DSSNR/L..-C – Toolholders for PCBN inserts SNGA – Metric



DSSNR/L..-C



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 604
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	LFS	WF	WFS	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
DSSNR3225P12-C	02598529	32	25	170	179,1	32,0	23,9	39,0	45,0	-8,0	0,0	1,1	SN..1204.. *SN..43.*

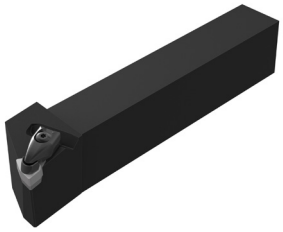
Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...12	FP2012	L85021-T15P	CC12P-S12	DSN120616	1/4HEX-T15PX50	C04008-T15P	S6912

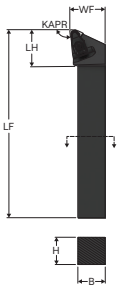
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...12	1/4HEX-S-HANDLE	CC12P-SET	3.5NM	T00-15P	T00-15P35

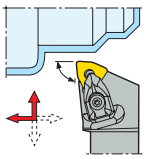
DWLNR/L..-C – Toolholders for PCBN inserts WNGA, WNMA – Metric



DWLNR/L..-C



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 16–17
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
DWLNR3225P08-C	02598537	32	25	170	32,0	35,0	95,0	-6,0	-6,0	1,2	WN..0804-WN..0806* *WN..43-WN..44**

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
...08	FP2012	L85021-T15P	CC12P-S12	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912

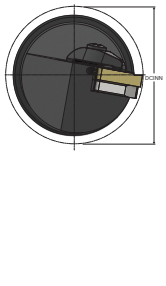
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...08	1/4HEX-S-HANDLE	CC12P-SET	3.5NM	T00-15P	T00-15P35

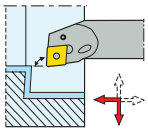
C.-PCLNR/L – Toolholders for inserts CNGG, CNGM, CNMA, CNMG, CNMM – Metric/ Inch



C.-PCLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 616
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-PCLNR-17090-12	00084497	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	69,0 *2.717*	32,0 *1.260*	95,0	-6,0	-11,0	0,5 *1.100*	CN..1204.. *CN..43.*
C4-PCLNR-22110-12	00084499	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	-6,0	-11,0	0,8 *1.760*	CN..1204.. *CN..43.*
C4-PCLNR-27080-12	00009356	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	80,0 *3.150*	60,0 *2.362*	50,0 *1.969*	95,0	-6,0	-10,0	0,8 *1.760*	CN..1204.. *CN..43.*
C4-PCLNR-27120-12	00009358	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	120,0 *4.724*	100,0 *3.937*	50,0 *1.969*	95,0	-6,0	-11,0	1,1 *2.430*	CN..1204.. *CN..43.*
C4-PCLNL-17090-12	00084498	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	69,0 *2.717*	32,0 *1.260*	95,0	-6,0	-11,0	0,5 *1.100*	CN..1204.. *CN..43.*
C4-PCLNL-22110-12	00084500	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	-6,0	-11,0	0,7 *1.540*	CN..1204.. *CN..43.*
C4-PCLNL-27080-12	02589999	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	80,0 *3.150*	60,0 *2.362*	50,0 *1.969*	95,0	-6,0	-10,0	0,7 *1.540*	CN..1204.. *CN..43.*
C5-PCLNR-17090-12	02547669	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	-6,0	-11,0	0,7 *1.540*	CN..1204.. *CN..43.*
C5-PCLNR-22110-12	00090698	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-6,0	-11,0	1,0 *2.200*	CN..1204.. *CN..43.*
C5-PCLNR-27140-12	00733878	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	-6,0	-10,0	1,4 *3.090*	CN..1204.. *CN..43.*
C5-PCLNR-35100-12	00045797	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	81,0 *3.189*	63,0 *2.480*	95,0	-6,0	-7,0	1,4 *3.090*	CN..1204.. *CN..43.*
C5-PCLNL-17090-12	00081759	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	-6,0	-11,0	0,7 *1.540*	CN..1204.. *CN..43.*
C5-PCLNL-22110-12	00081760	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-6,0	-11,0	1,0 *2.200*	CN..1204.. *CN..43.*
C5-PCLNL-27140-12	00081761	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	-6,0	-10,0	1,5 *3.310*	CN..1204.. *CN..43.*
C5-PCLNL-35100-12	00081762	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	81,0 *3.189*	63,0 *2.480*	95,0	-6,0	-7,0	1,4 *3.090*	CN..1204.. *CN..43.*
C6-PCLNR-17100-12	02426133	C6	25,0 *0.984*	63,0 *2.480*	17,0 *0.669*	100,0 *3.937*	74,0 *2.913*	32,0 *1.260*	95,0	-6,0	-11,0	1,1 *2.430*	CN..1204.. *CN..43.*
C6-PCLNR-22110-12	00059036	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	110,0 *4.331*	84,0 *3.307*	40,0 *1.575*	95,0	-6,0	-11,0	1,3 *2.870*	CN..1204.. *CN..43.*
C6-PCLNL-17100-12	02558994	C6	25,0 *0.984*	63,0 *2.480*	17,0 *0.669*	100,0 *3.937*	74,0 *2.913*	32,0 *1.260*	95,0	-6,0	-11,0	1,1 *2.430*	CN..1204.. *CN..43.*
C6-PCLNL-22110-12	00058823	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	110,0 *4.331*	84,0 *3.307*	40,0 *1.575*	95,0	-6,0	-11,0	1,3 *2.870*	CN..1204.. *CN..43.*
C6-PCLNR-27140-16	02552832	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	95,0	-6,0	-11,0	1,7 *3.750*	CN..1606.. *CN..54.*
C6-PCLNR-35175-16	02552836	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	95,0	-6,0	-11,0	2,8 *6.170*	CN..1606.. *CN..54.*
C6-PCLNL-27140-16	00070126	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	95,0	-6,0	-11,0	1,8 *3.970*	CN..1606.. *CN..54.*

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C6-PCLNL-35175-16	00070128	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	95,0	-6,0	-11,0	2,8 *6.170*	CN..1606.. *CN..54.*

Spare Parts, included in delivery

For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...-16	PP7818	PCN160408	1/4HEX-H3.0X50	LS0820	MP0912	RP8286
-17...-12	PP4613	–	1/4HEX-H2.5X50	LS0613	–	–
-22/27/35...-12	PP4713	PCN120308	1/4HEX-H3.0X50	LS0818	MP0912	RP6757

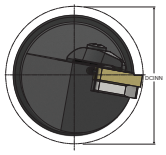
Accessories

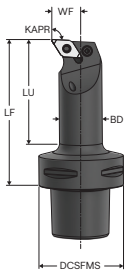
For	Bit holder	Insert clamping torque	Torque key
			
...-16	1/4HEX-S-HANDLE	–	–
-17...-12	1/4HEX-S-HANDLE	3.0NM	H00-2530
-22/27/35...-12	1/4HEX-S-HANDLE	–	–

C.-PDUNR/L – Toolholders for inserts DNGA, DNGM, DNMA, DNMG, DNMM, DNMX – Metric/ Inch

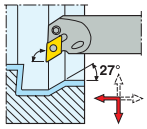


C.-PDUNR/L





KAPR = 93,0 °



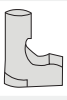
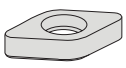
CTWS



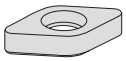
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 14-15
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-PDUNR-27140-15	00090967	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	93,0	-6,0	-11,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C5-PDUNR-35100-15	02510290	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	81,0 *3.189*	63,0 *2.480*	93,0	-6,0	-10,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C5-PDUNR-35150-15	00734071	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	150,0 *5.906*	131,0 *5.157*	63,0 *2.480*	93,0	-6,0	-10,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C5-PDUNL-27140-15	02507274	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	93,0	-6,0	-11,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C5-PDUNL-35100-15	02545481	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	81,0 *3.189*	63,0 *2.480*	93,0	-6,0	-10,0	1,4 *3.090*	DN..1504-DN..1506* *DN..43-DN..44**
C5-PDUNL-35150-15	02541180	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	150,0 *5.906*	131,0 *5.157*	63,0 *2.480*	93,0	-6,0	-10,0	2,1 *4.630*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNR-22110-15	02426139	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	110,0 *4.331*	84,0 *3.307*	40,0 *1.575*	93,0	-6,0	-12,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNR-27140-15	02207601	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	93,0	-6,0	-11,0	1,8 *3.970*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNR-35175-15	02590043	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	93,0	-6,0	-10,0	2,8 *6.170*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNL-22110-15	02590044	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	110,0 *4.331*	84,0 *3.307*	40,0 *1.575*	93,0	-6,0	-12,0	1,3 *2.870*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNL-27140-15	02567151	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	93,0	-6,0	-11,0	1,7 *3.750*	DN..1504-DN..1506* *DN..43-DN..44**
C6-PDUNL-35175-15	02492750	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	93,0	-6,0	-10,0	2,8 *6.170*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

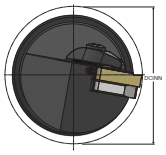
For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
-15	PP4716	PDN150308	1/4HEX-H3.0X50	LS0822	MP0912	RP6757

Accessories

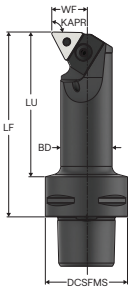
For	Bit holder	Insert shim
		
-15	1/4HEX-S-HANDLE	PDN150408

C.-PTFNR/L..-W – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric/ Inch

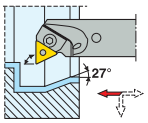




C.-PTFNR/L..-W



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-PTFNR-17090-16-W	02590007	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	69,0 *2.717*	32,0 *1.260*	91,0	-6,0	-13,0	0,5 *1.100*	TN..1604.. *TN..33.*
C4-PTFNL-17090-16-W	02590004	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	69,0 *2.717*	32,0 *1.260*	91,0	-6,0	-13,0	0,5 *1.100*	TN..1604.. *TN..33.*

Spare Parts, included in delivery

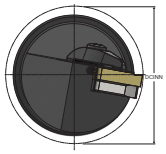
For	Setting screw	Shim pin	Wedge clamp	Wedge key
				
-17...-16	F83060-T09P	PL1003	CP16-H31	1/4HEX-H3.0X50

Accessories

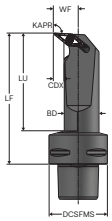
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
-17...-16	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T09PX50	T00-09P20

C.-PVUNR/L, C.-MVUNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG, VNMU – Metric/ Inch

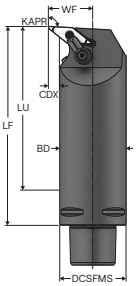




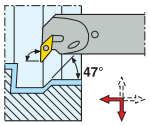
C.-PVUNR/L



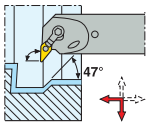
C.-MVUNR/L



C.-PVUNR/L
KAPR = 93,0 °



C.-MVUNR/L
KAPR = 93,0 °



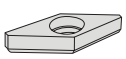
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-PVUNR-17090-13	00071983	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-14,0	0,5 *1.100*	VNMU1304.. *VNMU2.5.*
C4-PVUNL-17090-13	00071980	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-14,0	0,5 *1.100*	VNMU1304.. *VNMU2.5.*
C4-MVUNR-22110-16	00072631	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	90,0 *3.543*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	0,8 *1.760*	VN..1604.. *VN..33.*
C4-MVUNR-27120-16	00071985	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	120,0 *4.724*	100,0 *3.937*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,1 *2.430*	VN..1604.. *VN..33.*
C4-MVUNL-22110-16	00072638	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	90,0 *3.543*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	0,8 *1.760*	VN..1604.. *VN..33.*
C4-MVUNL-27120-16	00071981	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	120,0 *4.724*	100,0 *3.937*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,1 *2.430*	VN..1604.. *VN..33.*
C5-MVUNR-22110-16	00071991	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	0,9 *1.980*	VN..1604.. *VN..33.*
C5-MVUNR-27140-16	00072664	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,5 *3.310*	VN..1604.. *VN..33.*
C5-MVUNL-22110-16	00071989	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	0,9 *1.980*	VN..1604.. *VN..33.*
C5-MVUNL-27140-16	00072679	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,5 *3.310*	VN..1604.. *VN..33.*
C6-MVUNR-22120-16	00072035	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	120,0 *4.724*	88,0 *3.465*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	1,3 *2.870*	VN..1604.. *VN..33.*
C6-MVUNR-27145-16	00072036	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	145,0 *5.709*	120,0 *4.724*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,8 *3.970*	VN..1604.. *VN..33.*
C6-MVUNL-22120-16	00072033	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	120,0 *4.724*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-12,0	1,3 *2.870*	VN..1604.. *VN..33.*
C6-MVUNL-27145-16	00072034	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	145,0 *5.709*	120,0 *4.724*	6,0 *0.236*	50,0 *1.969*	93,0	-5,0	-10,0	1,8 *3.970*	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant nozzle	Insert key	Insert pin	Insert shim	Shim/clamp key	Shim pin
								
-13	–	–	CN6	1/4HEX-T09PX50	PL1403-T09P	PVN130308	–	–
-16	MC20	LD6021-T09P	CN6	–	–	VSN160316	1/4HEX-T09PX50	MN0909L-T09P

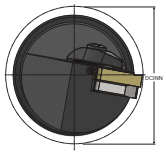
Accessories

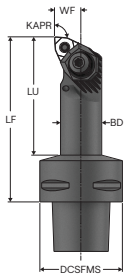
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-13	1/4HEX-S-HANDLE	–	–	–
-16	1/4HEX-S-HANDLE	2.0NM	T00-09P	T00-09P20

C.-PWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric/ Inch

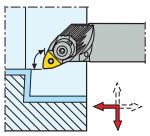


C.-PWLNR/L





KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 14-15
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-PWLNR-13080-06	00012937	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	25,0 *0.984*	95,0	-5,0	-11,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-PWLNR-17090-06	00092073	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	32,0 *1.260*	95,0	-5,0	-12,0	0,5 *1.100*	WN..0604.. *WN..33.*
C4-PWLNR-22110-06	00092075	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	-5,0	-12,0	0,7 *1.540*	WN..0604.. *WN..33.*
C4-PWLNL-13080-06	00012922	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	25,0 *0.984*	95,0	-5,0	-11,0	0,4 *0.880*	WN..0604.. *WN..33.*
C4-PWLNL-17090-06	00092072	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	32,0 *1.260*	95,0	-5,0	-12,0	0,5 *1.100*	WN..0604.. *WN..33.*
C4-PWLNR-22110-08	00092077	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	-5,0	-11,0	0,7 *1.540*	WN..0804.. *WN..43.*
C4-PWLNR-27120-08	00071982	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	120,0 *4.724*	100,0 *3.937*	50,0 *1.969*	95,0	-5,0	-8,0	1,0 *2.200*	WN..0804.. *WN..43.*
C4-PWLNL-22110-08	00092076	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	-5,0	-11,0	0,7 *1.540*	WN..0804.. *WN..43.*
C4-PWLNL-27120-08	00071979	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	120,0 *4.724*	100,0 *3.937*	50,0 *1.969*	95,0	-5,0	-8,0	1,0 *2.200*	WN..0804.. *WN..43.*
C5-PWLNR-13080-06	00072015	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	25,0 *0.984*	95,0	-5,0	-11,0	0,6 *1.320*	WN..0604.. *WN..33.*
C5-PWLNR-17090-06	00092079	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	-5,0	-12,0	0,7 *1.540*	WN..0604.. *WN..33.*
C5-PWLNR-22110-06	75094583	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-5,0	-12,0	0,9 *1.980*	WN..0604.. *WN..33.*
C5-PWLNL-13080-06	00071986	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	25,0 *0.984*	95,0	-5,0	-11,0	0,6 *1.320*	WN..0604.. *WN..33.*
C5-PWLNL-17090-06	00092078	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	-5,0	-12,0	0,7 *1.540*	WN..0604.. *WN..33.*
C5-PWLNL-22110-06	75094584	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-5,0	-12,0	0,9 *1.980*	WN..0604.. *WN..33.*
C5-PWLNR-22110-08	00092081	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-5,0	-11,0	0,9 *1.980*	WN..0804.. *WN..43.*
C5-PWLNR-27140-08	00094494	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	-5,0	-11,0	1,4 *3.090*	WN..0804.. *WN..43.*
C5-PWLNL-22110-08	00092080	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	40,0 *1.575*	95,0	-5,0	-11,0	0,9 *1.980*	WN..0804.. *WN..43.*
C5-PWLNL-27140-08	00094495	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	-5,0	-11,0	1,4 *3.090*	WN..0804.. *WN..43.*
C6-PWLNR-27140-08	00072040	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	95,0	-5,0	-8,0	1,7 *3.750*	WN..0804.. *WN..43.*
C6-PWLNR-35175-08	00072047	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	95,0	-5,0	-10,0	2,6 *5.730*	WN..0804.. *WN..43.*
C6-PWLNL-27140-08	00045763	C6	40,0 *1.575*	63,0 *2.480*	27,0 *1.063*	140,0 *5.512*	115,0 *4.528*	50,0 *1.969*	95,0	-5,0	-8,0	1,7 *3.750*	WN..0804.. *WN..43.*

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C6-PWLNL-35175-08	00072038	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	63,0 *2.480*	95,0	-5,0	10,0	2,7 *5.950*	WN..0804.. *WN..43.*

Spare Parts, included in delivery

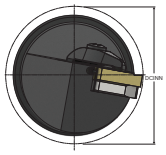
For	Insert shim	Setting screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
						
-08	WAI080312	L82511-T07P	PP1415-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
-1...-06	WAI060212	L82511-T07P	PP1209-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
-13/17...-06	WAI060212	L82511-T07P	PP1209-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
-2...-06	WAE060312	L82511-T07P	PP1409-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
-22...-06	WAE060312	L82511-T07P	PP1409-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P

Accessories

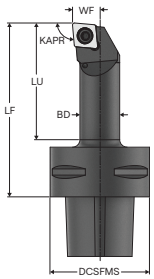
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
-08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
-1...-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
-13/17...-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
-2...-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
-22...-06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35

C.-SCLCR/L – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch

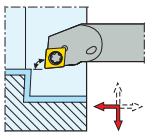




C.-SCLCR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C3-SCLCR-11065-09	00094071	C3	16,0 *0.630*	32,0 *1.260*	11,0 *0.433*	65,0 *2.559*	48,0 *1.890*	20,0 *0.787*	95,0	0,0	-12,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
C3-SCLCL-11065-09	00094061	C3	16,0 *0.630*	32,0 *1.260*	11,0 *0.433*	65,0 *2.559*	48,0 *1.890*	20,0 *0.787*	95,0	0,0	-12,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
C4-SCLCR-11070-09	00084494	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	20,0 *0.787*	95,0	0,0	-12,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-SCLCR-13080-09	00084495	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	25,0 *0.984*	95,0	0,0	-8,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-SCLCR-17090-09	75069012	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	32,0 *1.260*	95,0	0,0	-6,0	0,5 *1.100*	CC..09T3.. *CC..32.5.*
C4-SCLCL-11070-09	75065645	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	20,0 *0.787*	95,0	0,0	-12,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-SCLCL-13080-09	00084496	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	25,0 *0.984*	95,0	0,0	-8,0	0,4 *0.880*	CC..09T3.. *CC..32.5.*
C4-SCLCL-17090-09	00094160	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	32,0 *1.260*	95,0	0,0	-6,0	0,5 *1.100*	CC..09T3.. *CC..32.5.*
C4-SCLCR-22110-12	00094167	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	95,0	0,0	-10,0	0,8 *1.760*	CC..1204.. *CC..43.*
C5-SCLCR-11070-09	00094268	C5	16,0 *0.630*	50,0 *1.969*	11,0 *0.433*	70,0 *2.756*	46,0 *1.811*	20,0 *0.787*	95,0	0,0	-12,0	0,5 *1.100*	CC..09T3.. *CC..32.5.*
C5-SCLCR-13080-09	00094270	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	25,0 *0.984*	95,0	0,0	-8,0	0,6 *1.320*	CC..09T3.. *CC..32.5.*
C5-SCLCR-17090-09	00094271	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	0,0	-6,0	0,7 *1.540*	CC..09T3.. *CC..32.5.*
C5-SCLCL-11070-09	00094249	C5	16,0 *0.630*	50,0 *1.969*	11,0 *0.433*	70,0 *2.756*	46,0 *1.811*	20,0 *0.787*	95,0	0,0	-12,0	0,6 *1.320*	CC..09T3.. *CC..32.5.*
C5-SCLCL-13080-09	00094253	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	25,0 *0.984*	95,0	0,0	-8,0	0,6 *1.320*	CC..09T3.. *CC..32.5.*
C5-SCLCL-17090-09	00094255	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	32,0 *1.260*	95,0	0,0	-6,0	0,7 *1.540*	CC..09T3.. *CC..32.5.*
C5-SCLCR-27140-12	00094275	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	0,0	-8,0	1,5 *3.310*	CC..1204.. *CC..43.*
C5-SCLCL-27140-12	00094259	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	50,0 *1.969*	95,0	0,0	-8,0	1,5 *3.310*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

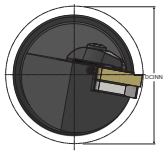
For	Insert key	Insert screw	Insert shim	Shim screw
				
...-12	1/4HEX-T15PX50	C04014-T15P	SCN12T308	CA4010
11065-09	1/4HEX-T15PX50	C03508-T15P	–	–
11070-09	1/4HEX-T15PX50	C03508-T15P	–	–
13080-09	1/4HEX-T15PX50	C03508-T15P	–	–
17090-09	1/4HEX-T15PX50	C03510-T15P	–	–

Accessories

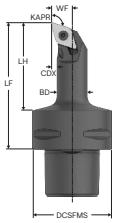
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-12	1/4HEX-S-HANDLE	3.5NM	T00-15P	1/4HEX-H4.0X50	T00-15P35
11065-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
11070-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
13080-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
17090-09	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30

C.-SDQNR/L, C.-PDQNR/L – Toolholders for inserts DNMA, DNMU – Metric/ Inch

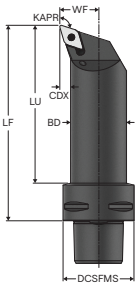




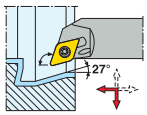
C.-SDQNR/L



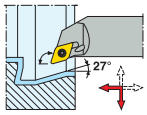
C.-PDQNR/L



C4-SD../PD..
KAPR = 107,5 °



C5-SD../PD..
KAPR = 107,5 °



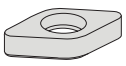
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SDQNR-11065-11	00072404	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	65,0 *2.559*	41,0 *1.614*	2,5 *0.098*	20,0 *0.787*	107,5	-5,0	-17,0	0,3 *0.660*	DNMU1104.. *DNMU33.*
C4-SDQNR-13080-11	00072447	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	107,5	-5,0	-17,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-SDQNL-11065-11	00072441	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	65,0 *2.559*	41,0 *1.614*	2,5 *0.098*	20,0 *0.787*	107,5	-5,0	-17,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-SDQNL-13080-11	00072454	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	107,5	-5,0	-17,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-PDQNR-22110-11	00072510	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	107,5	-5,0	-14,0	0,8 *1.760*	DNMU1104.. *DNMU33.*
C4-PDQNL-22110-11	00072512	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	107,5	-5,0	-14,0	0,8 *1.760*	DNMU1104.. *DNMU33.*
C5-SDQNR-13080-11	00072455	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	107,5	-5,0	-18,0	0,6 *1.320*	DNMU1104.. *DNMU33.*
C5-SDQNL-13080-11	00072462	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	107,5	-5,0	-18,0	0,6 *1.320*	DNMU1104.. *DNMU33.*
C5-PDQNR-22110-11	00072546	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	107,5	-5,0	-14,0	0,9 *1.980*	DNMU1104.. *DNMU33.*
C5-PDQNL-22110-11	00072557	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	107,5	-5,0	-14,0	0,9 *1.980*	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

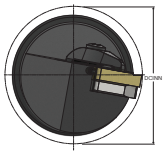
For	Insert key	Insert pin	Insert screw	Insert shim	Shim screw
					
-11..	1/4HEX-T09PX50	–	C03511-T09P	–	–
-13..	1/4HEX-T09PX50	–	C03511-T09P	DAI110212	CA3507
-22..	1/4HEX-T09PX50	PL1403-T09P	–	DAE110312	–

Accessories

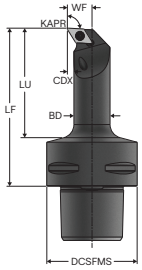
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
-11..	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
-13..	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20
-22..	1/4HEX-S-HANDLE	–	–	–	–

C.-SDUCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

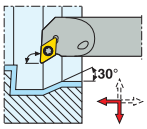




C.-SDUCR/L



KAPR = 93,0 °



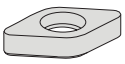
—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SDUCR-11070-07	00094180	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	2,5 *0.098*	20,0 *0.787*	93,0	0,0	-8,0	0,4 *0.880*	DC..0702.. *DC..21.5.*
C4-SDUCL-11070-07	00094173	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	2,5 *0.098*	20,0 *0.787*	93,0	0,0	-8,0	0,4 *0.880*	DC..0702.. *DC..21.5.*
C4-SDUCR-13080-11	75065648	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	2,5 *0.098*	25,0 *0.984*	93,0	0,0	-8,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C4-SDUCR-17090-11	00094182	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	0,0	-6,0	0,5 *1.100*	DC..11T3.. *DC..32.5.*
C4-SDUCR-22110-11	00094184	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	0,0	-6,0	0,8 *1.760*	DC..11T3.. *DC..32.5.*
C4-SDUCR-27080-11	00094185	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	80,0 *3.150*	60,0 *2.362*	6,0 *0.236*	50,0 *1.969*	93,0	0,0	-6,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C4-SDUCL-13080-11	75068289	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	57,0 *2.244*	2,5 *0.098*	25,0 *0.984*	93,0	0,0	-8,0	0,4 *0.880*	DC..11T3.. *DC..32.5.*
C4-SDUCL-17090-11	00094176	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	0,0	-6,0	0,5 *1.100*	DC..11T3.. *DC..32.5.*
C4-SDUCL-22110-11	00094178	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	0,0	-6,0	0,8 *1.760*	DC..11T3.. *DC..32.5.*
C4-SDUCL-27080-11	00094179	C4	40,0 *1.575*	40,0 *1.575*	27,0 *1.063*	80,0 *3.150*	60,0 *2.362*	6,0 *0.236*	50,0 *1.969*	93,0	0,0	-6,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C5-SDUCR-11070-07	00094291	C5	16,0 *0.630*	50,0 *1.969*	11,0 *0.433*	70,0 *2.756*	46,0 *1.811*	2,5 *0.098*	20,0 *0.787*	93,0	0,0	-8,0	0,5 *1.100*	DC..0702.. *DC..21.5.*
C5-SDUCL-11070-07	00094284	C5	16,0 *0.630*	50,0 *1.969*	11,0 *0.433*	70,0 *2.756*	46,0 *1.811*	2,5 *0.098*	20,0 *0.787*	93,0	0,0	-8,0	0,6 *1.320*	DC..0702.. *DC..21.5.*
C5-SDUCR-13080-11	00094293	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	0,0	-8,0	0,6 *1.320*	DC..11T3.. *DC..32.5.*
C5-SDUCR-17090-11	00094295	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	4,0 *0.157*	32,0 *1.260*	93,0	0,0	-6,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C5-SDUCR-22110-11	00094297	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	5,0 *0.197*	40,0 *1.575*	93,0	0,0	-6,0	0,9 *1.980*	DC..11T3.. *DC..32.5.*
C5-SDUCR-35100-11	00094298	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	80,0 *3.150*	6,0 *0.236*	63,0 *2.480*	93,0	0,0	-4,0	1,4 *3.090*	DC..11T3.. *DC..32.5.*
C5-SDUCL-13080-11	00094285	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	0,0	-8,0	0,6 *1.320*	DC..11T3.. *DC..32.5.*
C5-SDUCL-17090-11	00094287	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	4,0 *0.157*	32,0 *1.260*	93,0	0,0	-6,0	0,7 *1.540*	DC..11T3.. *DC..32.5.*
C5-SDUCL-22110-11	00094289	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	5,0 *0.197*	40,0 *1.575*	93,0	0,0	-6,0	0,9 *1.980*	DC..11T3.. *DC..32.5.*
C5-SDUCL-35100-11	00094290	C5	50,0 *1.969*	50,0 *1.969*	35,0 *1.378*	100,0 *3.937*	80,0 *3.150*	6,0 *0.236*	63,0 *2.480*	93,0	0,0	-4,0	1,4 *3.090*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

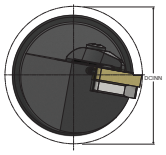
For	Insert key	Insert screw	Insert shim	Shim screw
				
...-07	1/4HEX-T07PX50	C02506-T07P	–	–
-13...-11	1/4HEX-T15PX50	C03508-T15P	–	–
-17...-11	1/4HEX-T15PX50	C03510-T15P	–	–
-22/27/35...-11	1/4HEX-T15PX50	C03512-T15P	126.19-620	CA3507

Accessories

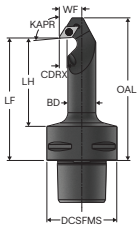
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-07	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
-13...-11	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
-17...-11	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
-22/27/35...-11	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-SDUCR/L-..X – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Metric/ Inch

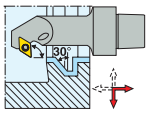




C.-SDUCR/L-..X



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	CDRX	OAL	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SDUCR-13070-07X	00089627	C4	16,0 *0.630*	40,0 *1.575*	13,0 *0.512*	70,0 *2.756*	4,0 *0.157*	81,0 *3.189*	22,0 *0.866*	93,0	0,0	-6,0	0,4 *0.880*	DC..0702.. *DC..21.5.*
C4-SDUCL-13070-07X	00094174	C4	16,0 *0.630*	40,0 *1.575*	13,0 *0.512*	70,0 *2.756*	4,0 *0.157*	81,0 *3.189*	22,0 *0.866*	93,0	0,0	-6,0	0,4 *0.880*	DC..0702.. *DC..21.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
-07X	1/4HEX-T07PX50	C02506-T07P

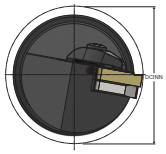
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-07X	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

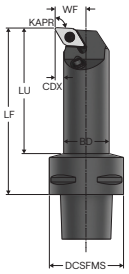
C.-SDUNR/L, C.-PDUNR/L – Toolholders for inserts DNMA, DNMU, DNMX – Metric/ Inch



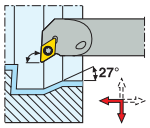
C.-SDUNR/L



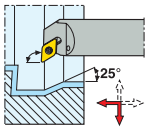
C.-PDUNR/L



C4-SD../PD..
KAPR = 93,0 °



C5-SD../PD..
KAPR = 93,0 °



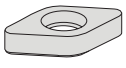
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-SDUNR-11065-11	00072369	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	65,0 *2.559*	41,0 *1.614*	2,5 *0.098*	20,0 *0.787*	93,0	-5,0	-17,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-SDUNR-13080-11	00092041	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	-5,0	-14,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-SDUNL-11065-11	00072396	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	65,0 *2.559*	41,0 *1.614*	2,5 *0.098*	20,0 *0.787*	93,0	-5,0	-17,0	0,3 *0.660*	DNMU1104.. *DNMU33.*
C4-SDUNL-13080-11	00092040	C4	20,0 *0.787*	40,0 *1.575*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	-5,0	-14,0	0,4 *0.880*	DNMU1104.. *DNMU33.*
C4-PDUNR-17090-11	00092043	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-13,0	0,5 *1.100*	DNMU1104.. *DNMU33.*
C4-PDUNR-22110-11	00092045	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-11,0	0,8 *1.760*	DNMU1104.. *DNMU33.*
C4-PDUNL-17090-11	00092042	C4	25,0 *0.984*	40,0 *1.575*	17,0 *0.669*	90,0 *3.543*	68,0 *2.677*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-13,0	0,5 *1.100*	DNMU1104.. *DNMU33.*
C4-PDUNL-22110-11	00092044	C4	32,0 *1.260*	40,0 *1.575*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-11,0	0,8 *1.760*	DNMU1104.. *DNMU33.*
C5-SDUNR-13080-11	00092047	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	-5,0	-14,0	0,6 *1.320*	DNMU1104.. *DNMU33.*
C5-SDUNL-13080-11	00092046	C5	20,0 *0.787*	50,0 *1.969*	13,0 *0.512*	80,0 *3.150*	56,0 *2.205*	2,5 *0.098*	25,0 *0.984*	93,0	-5,0	-14,0	0,6 *1.320*	DNMU1104.. *DNMU33.*
C5-PDUNR-17090-11	00092049	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-13,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-PDUNR-22110-11	00092051	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-11,0	0,9 *1.980*	DNMU1104.. *DNMU33.*
C5-PDUNL-17090-11	00092048	C5	25,0 *0.984*	50,0 *1.969*	17,0 *0.669*	90,0 *3.543*	67,0 *2.638*	4,0 *0.157*	32,0 *1.260*	93,0	-5,0	-13,0	0,7 *1.540*	DNMU1104.. *DNMU33.*
C5-PDUNL-22110-11	00092050	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	5,0 *0.197*	40,0 *1.575*	93,0	-5,0	-11,0	1,0 *2.200*	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

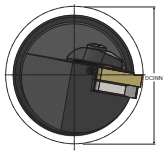
For	Coolant nozzle	Insert key	Insert pin	Insert screw	Insert shim	Shim screw
						
-11...-11	–	1/4HEX-T09PX50	–	C03511-T09P	–	–
-13...-11	–	1/4HEX-T09PX50	–	C03511-T09P	DAI110212	CA3507
-17/22...-11	CN6	1/4HEX-T09PX50	PL1403-T09P	–	DAE110312	–

Accessories

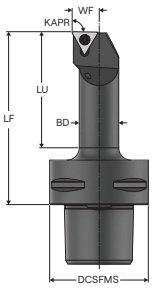
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
-11...-11	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
-13...-11	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20
-17/22...-11	1/4HEX-S-HANDLE	–	–	–	–

C.-STFCR/L – Toolholders for inserts TCGT, TCMT, TCMW – Metric/ Inch

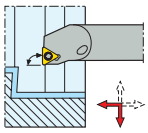




C.-STFCR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 620
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C4-STFCR-11070-11	00084501	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	20,0 *0.787*	91,0	0,0	-4,0	0,4 *0.880*	TC..1102.. *TC..21.5.*
C4-STFCL-11070-11	00084502	C4	16,0 *0.630*	40,0 *1.575*	11,0 *0.433*	70,0 *2.756*	47,0 *1.850*	20,0 *0.787*	91,0	0,0	-4,0	0,4 *0.880*	TC..1102.. *TC..21.5.*
C5-STFCR-11070-11	00094373	C5	16,0 *0.630*	50,0 *1.969*	11,0 *0.433*	70,0 *2.756*	46,0 *1.811*	40,0 *1.575*	91,0	0,0	-4,0	0,5 *1.100*	TC..1102.. *TC..21.5.*

Spare Parts, included in delivery

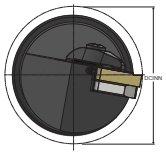
For	Insert key	Insert screw
		
-11	1/4HEX-T07PX50	C02506-T07P

Accessories

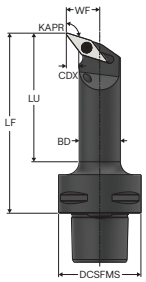
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

C.-SVQBR/L – Toolholders for inserts VBGW, VBMT, VBMW, VCGT – Metric/ Inch

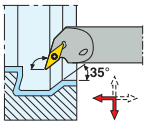




C.-SVQBR/L



KAPR = 107,5 °



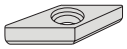
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C3-SVQBR-13070-11	00094153	C3	16,0 *0.630*	32,0 *1.260*	13,0 *0.512*	70,0 *2.756*	53,0 *2.087*	4,0 *0.157*	22,0 *0.866*	107,5	0,0	-7,0	0,2 *0.440*	VB..1102.. *VB..21.5.*
C3-SVQBL-13070-11	00094147	C3	16,0 *0.630*	32,0 *1.260*	13,0 *0.512*	70,0 *2.756*	53,0 *2.087*	4,0 *0.157*	22,0 *0.866*	107,5	0,0	-7,0	0,2 *0.440*	VB..1102.. *VB..21.5.*
C4-SVQBR-13070-11	00094239	C4	16,0 *0.630*	40,0 *1.575*	13,0 *0.512*	70,0 *2.756*	47,0 *1.850*	4,0 *0.157*	25,0 *0.984*	107,5	0,0	-7,0	0,3 *0.660*	VB..1102.. *VB..21.5.*
C4-SVQBL-13070-11	00094231	C4	16,0 *0.630*	40,0 *1.575*	13,0 *0.512*	70,0 *2.756*	47,0 *1.850*	4,0 *0.157*	25,0 *0.984*	107,5	0,0	-7,0	0,3 *0.660*	VB..1102.. *VB..21.5.*
C4-SVQBR-18090-16	00094243	C4	25,0 *0.984*	40,0 *1.575*	18,0 *0.709*	90,0 *3.543*	68,0 *2.677*	4,5 *0.177*	33,0 *1.299*	107,5	0,0	-6,0	0,5 *1.100*	VB..1604-VC..1604 *VB..33.-VC..33.*
C4-SVQBL-18090-16	00094233	C4	25,0 *0.984*	40,0 *1.575*	18,0 *0.709*	90,0 *3.543*	68,0 *2.677*	4,5 *0.177*	33,0 *1.299*	107,5	0,0	-6,0	0,5 *1.100*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVQBR-22110-16	00094303	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	5,0 *0.197*	40,0 *1.575*	107,5	0,0	-8,0	0,9 *1.980*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVQBR-27140-16	00094305	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	6,0 *0.236*	50,0 *1.969*	107,5	0,0	-8,0	1,4 *3.090*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVQBL-22110-16	00094672	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	88,0 *3.465*	5,0 *0.197*	40,0 *1.575*	107,5	0,0	-8,0	0,9 *1.980*	VB..1604-VC..1604 *VB..33.-VC..33.*
C5-SVQBL-27140-16	00094673	C5	40,0 *1.575*	50,0 *1.969*	27,0 *1.063*	140,0 *5.512*	119,0 *4.685*	6,0 *0.236*	50,0 *1.969*	107,5	0,0	-8,0	1,4 *3.090*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVQBR-22120-16	00094336	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	120,0 *4.724*	94,0 *3.701*	5,0 *0.197*	40,0 *1.575*	107,5	0,0	-8,0	1,3 *2.870*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVQBR-35175-16	00094338	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	9,0 *0.354*	63,0 *2.480*	107,5	0,0	-8,0	2,6 *5.730*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVQBL-22120-16	00094333	C6	32,0 *1.260*	63,0 *2.480*	22,0 *0.866*	120,0 *4.724*	94,0 *3.701*	5,0 *0.197*	40,0 *1.575*	107,5	0,0	-8,0	1,3 *2.870*	VB..1604-VC..1604 *VB..33.-VC..33.*
C6-SVQBL-35175-16	00094335	C6	50,0 *1.969*	63,0 *2.480*	35,0 *1.378*	175,0 *6.890*	152,0 *5.984*	9,0 *0.354*	63,0 *2.480*	107,5	0,0	-8,0	2,7 *5.950*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

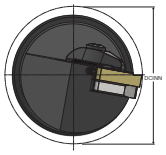
For	Insert key	Insert screw	Insert shim	Shim screw
				
C3	1/4HEX-T07PX50	C02506-T07P	–	–
C4-..13..-11	1/4HEX-T07PX50	C02506-T07P	–	–
C4-..18..-16	1/4HEX-T15PX50	C03510-T15P	–	–
C5	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507
C6	1/4HEX-T15PX50	C03512-T15P	171.19-620	CA3507

Accessories

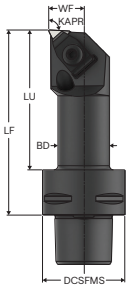
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
C3	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4-..13..-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
C4-..18..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
C5	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
C6	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

C.-CTUNR/L – Toolholders for PCBN inserts TNGN, TNGX, TNMN, TNMX – Metric/ Inch

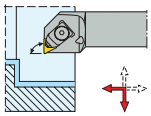




C.-CTUNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610
—For holder code key, see page(s) 14–15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LU	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
C5-CTUNL-22110-11	02595990	C5	32,0 *1.260*	50,0 *1.969*	22,0 *0.866*	110,0 *4.331*	89,0 *3.504*	40,0 *1.575*	93,0	-6,0	-12,0	1,0 *2.200*	TN..1103.. *TN..22.*

Spare Parts, included in delivery

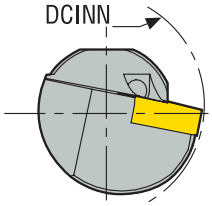
For	Cantilever clamp	Clamp key	Coolant nozzle	Insert shim	Shim screw
					
-11	CC14	1/4HEX-H4.0X50	CN6	CTN110308	CS2507-T07P

Accessories

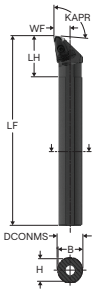
For	Bit holder	Shim key
		
-11	1/4HEX-S-HANDLE	1/4HEX-T07PX50

DWLNR/L..-C – Toolholders for PCBN inserts WNGA, WNMA – Metric

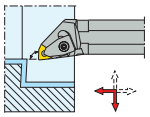




DWLNR/L..-C



DWLNR/L..-C
KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 20–21
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A25R-DWLNR06-C	02598616	25,0	23	24	200	17,0	33,0	32,0	95,0	-5,0	-12,0	0,6	WN..0604.. *WN..33.*
A25R-DWLNR08-C	02598625	25,0	23	24	200	17,0	28,0	32,0	95,0	-5,0	-11,0	0,7	WN..0804-WN..0806* *WN..43-WN..44**
A32S-DWLNR08-C	02598628	32,0	30	31	250	22,0	40,0	40,0	95,0	-5,0	-11,0	1,4	WN..0804-WN..0806* *WN..43-WN..44**
A25R-DWLNL08-C	02598627	25,0	23	24	200	17,0	28,0	32,0	95,0	-5,0	-11,0	0,7	WN..0804-WN..0806* *WN..43-WN..44**
A32S-DWLNL08-C	02598629	32,0	30	31	250	22,0	40,0	40,0	95,0	-5,0	-11,0	1,3	WN..0804-WN..0806* *WN..43-WN..44**

Spare Parts, included in delivery

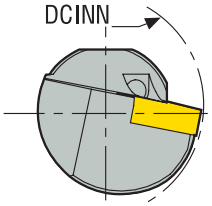
For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
...06	1/4HEX-T10PX50	FP1508	L84017-T10P	CC09P-D11	DWD060210	–	C03007-T09P	S5608
...08	–	FP2012	L85021-T15P	CC12P-S12	DWD080316	1/4HEX-T15PX50	C04008-T15P	S6912

Accessories

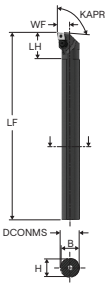
For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
...06	1/4HEX-S-HANDLE	CC09P-SET	2.0NM	T00-09P	T00-09P20
...08	1/4HEX-S-HANDLE	CC12P-SET	3.5NM	T00-15P	T00-15P35

PCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM – Metric

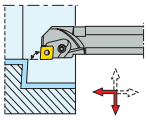




PCLNR/L



PCLNR/L
KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A20R-PCLNR09	02516558	20,0	18	19	200	13,0	30,0	25,0	95,0	-6,0	-12,0	0,4	CN..0903.. *CN..32.*
A25S-PCLNR09	00092005	25,0	23	24	250	17,0	35,0	32,0	95,0	-6,0	-11,0	0,7	CN..0903.. *CN..32.*
A20R-PCLNL09	02516563	20,0	18	19	200	13,0	30,0	25,0	95,0	-6,0	-12,0	0,4	CN..0903.. *CN..32.*
A25S-PCLNL09	00092004	25,0	23	24	250	17,0	35,0	32,0	95,0	-6,0	-11,0	0,8	CN..0903.. *CN..32.*
A32T-PCLNR12	02516543	32,0	30	31	300	22,0	50,0	40,0	95,0	-6,0	-12,0	1,6	CN..1204.. *CN..43.*
A40U-PCLNR12	02516552	40,0	37	39	350	27,0	60,0	50,0	95,0	-6,0	-8,0	3,0	CN..1204.. *CN..43.*
A32T-PCLNL12	02436407	32,0	30	31	300	22,0	50,0	40,0	95,0	-6,0	-12,0	1,6	CN..1204.. *CN..43.*
A40U-PCLNL12	02436411	40,0	37	39	350	27,0	60,0	50,0	95,0	-6,0	-8,0	3,0	CN..1204.. *CN..43.*
A40U-PCLNR16	02516592	40,0	37	39	350	27,0	60,0	50,0	95,0	-6,0	-12,0	3,0	CN..1606.. *CN..54.*
A50V-PCLNR16	02516587	50,0	47	49	400	35,0	70,0	63,0	95,0	-6,0	-10,0	5,4	CN..1606.. *CN..54.*
A40U-PCLNL16	02516586	40,0	37	39	350	27,0	60,0	50,0	95,0	-6,0	-12,0	3,0	CN..1606.. *CN..54.*
A50V-PCLNL16	02516564	50,0	47	49	400	35,0	70,0	63,0	95,0	-6,0	-10,0	5,5	CN..1606.. *CN..54.*
A50V-PCLNR19	02516593	50,0	47	49	400	35,0	70,0	63,0	95,0	-6,0	-8,0	5,4	CN..1906.. *CN..64.*
A50V-PCLNL19	02516597	50,0	47	49	400	35,0	70,0	63,0	95,0	-6,0	-8,0	5,4	CN..1906.. *CN..64.*

Spare Parts, included in delivery

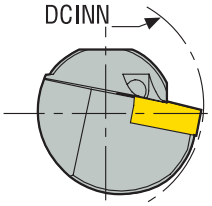
For	Insert key	Insert pin	Insert shim	Locking screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
								
A20R-..L09	1/4HEX-H2.0X50	110.26-653	–	–	–	110.26-638	1/4HEX-H2.5X50	117.26-657
A20R-..R09	1/4HEX-H2.0X50	110.26-653	–	–	–	110.26-639	1/4HEX-H2.5X50	117.26-657
A25S-..L09	1/4HEX-H2.0X50	110.26-653	–	–	–	110.26-638	1/4HEX-H2.5X50	117.26-657
A25S-..R09	1/4HEX-H2.0X50	110.26-653	–	–	–	110.26-639	1/4HEX-H2.5X50	117.26-657
A32T-..L12	–	–	123.26-621	136.26-651	131.26-652	110.26-640	1/4HEX-T20PX50	WS1620-T20P
A32T-..R12	–	–	123.26-621	136.26-651	131.26-652	110.26-641	1/4HEX-T20PX50	WS1620-T20P
A40U-..L12	–	–	123.26-621	136.26-651	131.26-652	110.26-640	1/4HEX-H3.0X50	117.26-655
A40U-..L16	–	–	123.26-625	136.26-651	123.26-650	110.26-642.1	1/4HEX-T25PX50	WS2325-T25P
A40U-..R12	–	–	123.26-621	136.26-651	131.26-652	110.26-641	1/4HEX-H3.0X50	117.26-655
A40U-..R16	–	–	123.26-625	136.26-651	123.26-650	110.26-643.1	1/4HEX-T25PX50	WS2325-T25P
A50V-..L16	–	–	123.26-625	136.26-651	123.26-650	110.26-642.5	1/4HEX-T25PX50	WS2325-T25P
A50V-..L19	–	–	123.26-627	131.26-651	131.26-653	110.26-642	1/4HEX-H4.0X50	170.26-655
A50V-..R16	–	–	123.26-625	136.26-651	123.26-650	110.26-643.5	1/4HEX-T25PX50	WS2325-T25P
A50V-..R19	–	–	123.26-627	131.26-651	131.26-653	110.26-643	1/4HEX-H4.0X50	170.26-655

Accessories

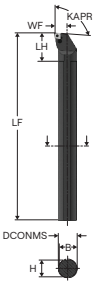
For	Bit holder	Insert clamping torque	Locking key	Punch	Replacement blade	Torque key
						
A20R-..L09	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A20R-..R09	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A25S-..L09	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A25S-..R09	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A32T-..L12	1/4HEX-S-HANDLE	3.5NM	3SMS795	117.26-687	T00-20P	T00-20P35
A32T-..R12	1/4HEX-S-HANDLE	3.5NM	3SMS795	117.26-687	T00-20P	T00-20P35
A40U-..L12	1/4HEX-S-HANDLE	5.0NM	–	117.26-687	H00T-3.0	H00T-3050
A40U-..L16	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A40U-..R12	1/4HEX-S-HANDLE	5.0NM	–	117.26-687	H00T-3.0	H00T-3050
A40U-..R16	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A50V-..L16	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A50V-..L19	1/4HEX-S-HANDLE	6.0NM	–	117.26-687	H00T-4.0	H00T-4060
A50V-..R16	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A50V-..R19	1/4HEX-S-HANDLE	6.0NM	–	117.26-687	H00T-4.0	H00T-4060

PCLNR/L – Toolholders for inserts CNGA, CNGG, CNGM, CNMA, CNMG, CNMM – Metric

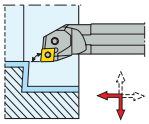




PCLNR/L



PCLNR/L
KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595, 616
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25T-PCLNR12	02411147	25,0	23	23	300	17,0	40,0	32,0	95,0	-6,0	-10,0	1,1	CN..1204.. *CN..43.*
S32U-PCLNR12	02411149	32,0	30	30	350	22,0	50,0	40,0	95,0	-6,0	-10,0	2,2	CN..1204.. *CN..43.*
S40V-PCLNR12	02411151	40,0	37	38	400	27,0	60,0	50,0	95,0	-6,0	-10,0	3,7	CN..1204.. *CN..43.*
S25T-PCLNL12	02411148	25,0	23	23	300	17,0	40,0	32,0	95,0	-6,0	-10,0	1,1	CN..1204.. *CN..43.*
S32U-PCLNL12	02411150	32,0	30	30	350	22,0	50,0	40,0	95,0	-6,0	-10,0	2,2	CN..1204.. *CN..43.*
S40V-PCLNL12	02411152	40,0	37	38	400	27,0	60,0	50,0	95,0	-6,0	-10,0	3,7	CN..1204.. *CN..43.*

Spare Parts, included in delivery

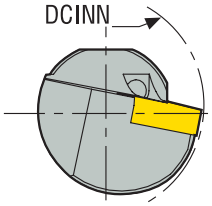
For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
S..T-..12	PP4613	–	1/4HEX-H2.5X50	LS0613	–	–
S..U/V-..12	PP4713	PCN120308	1/4HEX-H3.0X50	LS0818	MP0912	RP6757

Accessories

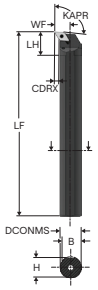
For	Bit holder	Insert clamping torque	Torque key
			
S..T-..12	1/4HEX-S-HANDLE	3.0NM	H00-2530
S..U/V-..12	1/4HEX-S-HANDLE	–	–

PDUNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric

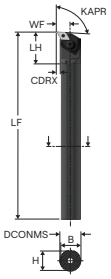




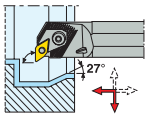
PDUNR/L–11



PDUNR/L–15



KAPR = 93,0 °



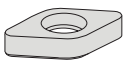
CTWS



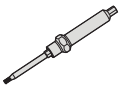
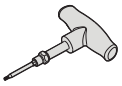
–Right-hand version shown
–For inserts program, see page(s) 558, 559, 560, 561, 598, 599
–For holder code key, see page(s) 20–21
–* Use the right shim & the right screw for the selected insert. For details, see page 97
–For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A25R-PDUNR11	00083820	25,0	23	24	200	17,0	35,0	4,0	32,0	93,0	-5,0	-13,0	0,6	DNMU1104.. *DNMU33.*
A32S-PDUNR11	00083832	32,0	30	31	250	22,0	37,0	6,0	40,0	93,0	-5,0	-11,0	1,3	DNMU1104.. *DNMU33.*
A25R-PDUNL11	00083821	25,0	23	24	200	17,0	35,0	4,0	32,0	93,0	-5,0	-13,0	0,6	DNMU1104.. *DNMU33.*
A32S-PDUNL11	00083833	32,0	30	31	250	22,0	37,0	6,0	40,0	93,0	-5,0	-11,0	1,3	DNMU1104.. *DNMU33.*
A32T-PDUNR15	02516544	32,0	30	31	300	22,0	50,0	5,0	40,0	93,0	-6,0	-15,0	1,6	DN..1504.. *DN..43.*
A40U-PDUNR15	02516547	40,0	37	39	350	27,0	60,0	5,0	50,0	93,0	-6,0	-14,0	2,9	DN..1504.. *DN..43.*
A50V-PDUNR15	02516557	50,0	47	49	400	35,0	70,0	5,0	63,0	93,0	-6,0	-11,0	5,4	DN..1504.. *DN..43.*
A32T-PDUNL15	02516554	32,0	30	31	300	22,0	50,0	5,0	40,0	93,0	-6,0	-15,0	1,5	DN..1504.. *DN..43.*
A40U-PDUNL15	02516553	40,0	37	39	350	27,0	60,0	5,0	50,0	93,0	-6,0	-14,0	2,9	DN..1504.. *DN..43.*
A50V-PDUNL15	02516561	50,0	47	49	400	35,0	70,0	5,0	63,0	93,0	-6,0	-11,0	5,4	DN..1504.. *DN..43.*

Spare Parts, included in delivery

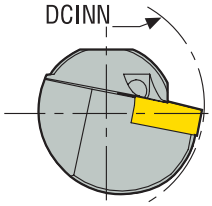
For	Insert key	Insert pin	Insert shim	Locking screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
								
...-11	1/4HEX-T09PX50	PL1403-T09P	DAE110312	–	–	–	–	–
A32T-L15	–	–	PDD150312	136.26-651	131.26-652	171.66-640	1/4HEX-T25PX50	WS2325-T25P
A32T-R15	–	–	PDD150312	136.26-651	131.26-652	171.66-641	1/4HEX-T25PX50	WS2325-T25P
A40U-L15	–	–	PDD150312	136.26-651	131.26-652	171.66-640	1/4HEX-T25PX50	WS2325-T25P
A40U-R15	–	–	PDD150312	136.26-651	131.26-652	171.66-641	1/4HEX-T25PX50	WS2325-T25P
A50V-L15	–	–	PDD150312	136.26-651	131.26-652	171.66-640	1/4HEX-H4.0X50	170.26-655
A50V-R15	–	–	PDD150312	136.26-651	131.26-652	171.66-641	1/4HEX-H4.0X50	170.26-655

Accessories

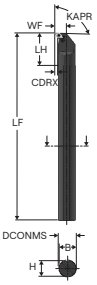
For	Bit holder	Insert clamping torque	Locking key	Punch	Replacement blade	Torque key
						
...-11	1/4HEX-S-HANDLE	–	–	–	–	–
A32T-L15	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A32T-R15	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A40U-L15	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A40U-R15	1/4HEX-S-HANDLE	5.0NM	3SMS795	117.26-687	T00T-25P	T00T-25P50
A50V-L15	1/4HEX-S-HANDLE	6.0NM	3SMS795	117.26-687	H00T-4.0	H00T-4060
A50V-R15	1/4HEX-S-HANDLE	6.0NM	3SMS795	117.26-687	H00T-4.0	H00T-4060

PDUNR/L – Toolholders for inserts DNGA, DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric

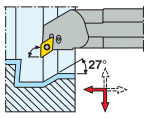




PDUNR/L



KAPR = 93,0 °



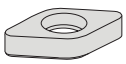
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 20–21
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
S25T-PDUNR11	02411153	25,0	23	23	300	17,0	45,0	4,5	32,0	93,0	-6,0	-13,0	1,1	DNMU1104.. *DNMU33.*
S32U-PDUNR11	02411155	32,0	30	30	350	22,0	50,0	6,0	40,0	93,0	-6,0	-11,0	2,1	DNMU1104.. *DNMU33.*
S25T-PDUNL11	02411154	25,0	23	23	300	17,0	45,0	4,5	32,0	93,0	-6,0	-13,0	1,1	DNMU1104.. *DNMU33.*
S32U-PDUNL11	02411156	32,0	30	30	350	22,0	50,0	6,0	40,0	93,0	-6,0	-11,0	2,1	DNMU1104.. *DNMU33.*
S32U-PDUNR15	02411157	32,0	30	30	350	22,0	50,0	6,0	40,0	93,0	-6,0	-13,0	2,1	DN..1504-DN..1506* *DN..43-DN..44**
S40V-PDUNR15	02411159	40,0	38	38	400	27,0	55,0	7,0	48,0	93,0	-6,0	-10,0	3,7	DN..1504-DN..1506* *DN..43-DN..44**
S50W-PDUNR15	02411161	50,0	47	49	450	35,0	70,0	10,0	61,0	93,0	-6,0	-10,0	6,4	DN..1504-DN..1506* *DN..43-DN..44**
S32U-PDUNL15	02411158	32,0	30	30	350	22,0	50,0	6,0	40,0	93,0	-6,0	-13,0	2,1	DN..1504-DN..1506* *DN..43-DN..44**
S40V-PDUNL15	02411160	40,0	38	38	400	27,0	55,0	7,0	48,0	93,0	-6,0	-10,0	3,7	DN..1504-DN..1506* *DN..43-DN..44**
S50W-PDUNL15	02207910	50,0	47	49	450	35,0	70,0	10,0	61,0	93,0	-6,0	-10,0	6,4	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

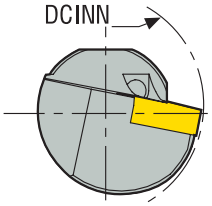
For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
...15	PP4716	PDN150308	1/4HEX-H3.0X50	LS0822	MP0912	RP6757
S25T-...11	PP3611	–	1/4HEX-H2.0X50	LS0512	–	–
S32U-...11	PP3512	PDN110308	1/4HEX-H2.5X50	LS0616	MP0912	RP5153

Accessories

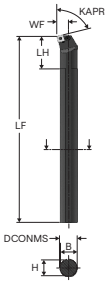
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...15	1/4HEX-S-HANDLE	–	–	–
S25T-...11	1/4HEX-S-HANDLE	2.0NM	H00-3.0	H00-3020
S32U-...11	1/4HEX-S-HANDLE	3.0NM	–	H00-2530

PSKNR/L – Toolholders for inserts SNGA, SNMA, SNMG, SNMM – Metric

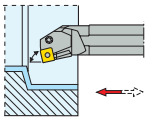




PSKNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25T-PSKNR12	00734327	25,0	23	24	300	16,88	43,0	30,0	75,0	-6,0	-10,0	1,1	SN..1204.. *SN..43.*
S32U-PSKNR12	02411165	32,0	30	30	350	22,0	52,0	40,0	75,0	-6,0	-10,0	2,1	SN..1204.. *SN..43.*
S40V-PSKNR12	02411167	40,0	38	38	400	27,0	58,0	48,0	75,0	-6,0	-10,0	3,8	SN..1204.. *SN..43.*
S25T-PSKNL12	02411162	25,0	23	24	300	16,88	43,0	30,0	75,0	-6,0	-10,0	1,1	SN..1204.. *SN..43.*
S32U-PSKNL12	02411166	32,0	30	30	350	22,0	52,0	40,0	75,0	-6,0	-10,0	2,1	SN..1204.. *SN..43.*
S40V-PSKNL12	02411169	40,0	38	38	400	27,0	58,0	48,0	75,0	-6,0	-10,0	3,8	SN..1204.. *SN..43.*

Spare Parts, included in delivery

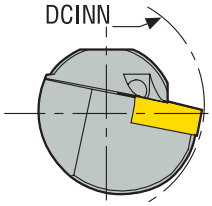
For	Insert lever	Insert shim	Lever key	Lever screw	Punch	Shim pin
						
S25	PP4613	–	1/4HEX-H2.5X50	LS0613	–	–
S32	PP4713	PSN120312	1/4HEX-H3.0X50	LS0816	MP0912	RP6757
S40	PP4713	PSN120312	1/4HEX-H3.0X50	LS0816	MP0912	RP6757

Accessories

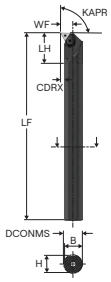
For	Bit holder	Insert clamping torque	Torque key
			
S25	1/4HEX-S-HANDLE	3.0NM	H00-2530
S32	1/4HEX-S-HANDLE	–	–
S40	1/4HEX-S-HANDLE	–	–

PTFNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric

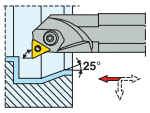




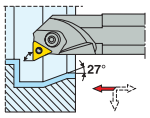
PTFNR/L



PTFNR/L A20, A25
KAPR = 91,0 °



PTFNR/L A32, A40, A50
KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A20R-PTFNR11	00039881	20,0	18	19	200	13,0	32,0	2,5	25,0	91,0	-6,0	-12,0	0,4	TN..1103.. *TN..22.*
A20R-PTFNL11	00039883	20,0	18	19	200	13,0	32,0	2,5	25,0	91,0	-6,0	-12,0	0,4	TN..1103.. *TN..22.*
A20R-PTFNR16	00039884	20,0	18	19	200	13,0	30,0	2,5	25,0	91,0	-6,0	-15,0	0,4	TN..1604.. *TN..33.*
A25S-PTFNR16	00039889	25,0	23	24	250	17,0	35,0	4,0	32,0	91,0	-6,0	-13,0	0,8	TN..1604.. *TN..33.*
A20R-PTFNL16	00039888	20,0	18	19	200	13,0	30,0	2,5	25,0	91,0	-6,0	-15,0	0,4	TN..1604.. *TN..33.*
A25S-PTFNL16	00039890	25,0	23	24	250	17,0	35,0	4,0	32,0	91,0	-6,0	-13,0	0,7	TN..1604.. *TN..33.*
A32T-PTFNR16	02516533	32,0	30	31	300	22,0	50,0	3,5	40,0	91,0	-6,0	-10,0	1,6	TN..1604.. *TN..33.*
A40U-PTFNR16	02516545	40,0	37	39	350	27,0	60,0	5,0	50,0	91,0	-6,0	-10,0	3,0	TN..1604.. *TN..33.*
A32T-PTFNL16	00090740	32,0	30	31	300	22,0	50,0	3,5	40,0	91,0	-6,0	-10,0	1,6	TN..1604.. *TN..33.*
A40U-PTFNL16	02201285	40,0	37	39	350	27,0	60,0	5,0	50,0	91,0	-6,0	-10,0	2,9	TN..1604.. *TN..33.*
A40U-PTFNR22	02516551	40,0	37	39	350	27,0	60,0	5,0	50,0	91,0	-6,0	-10,0	2,9	TN..2204.. *TN..43.*
A50V-PTFNR22	00734093	50,0	47	49	400	35,0	70,0	7,0	63,0	91,0	-6,0	-8,0	5,3	TN..2204.. *TN..43.*
A40U-PTFNL22	00130162	40,0	37	39	350	27,0	60,0	5,0	50,0	91,0	-6,0	-10,0	2,9	TN..2204.. *TN..43.*
A50V-PTFNL22	02201283	50,0	47	49	400	35,0	70,0	7,0	63,0	91,0	-6,0	-8,0	5,3	TN..2204.. *TN..43.*

Spare Parts, included in delivery

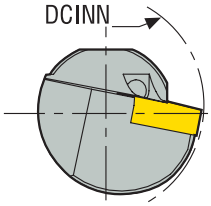
For	Insert key	Insert pin	Insert shim	Locking screw	Shim pin	Wedge/locking key	Wedge clamp	Wedge key	Wedge screw
A20R-PTFNL11	1/4HEX-H2.0X50	118.26-650	–	–	–	–	110.26-639	1/4HEX-H2.5X50	117.26-657
A20R-PTFNL16	1/4HEX-H2.5X50	136.26-653	–	–	–	–	110.26-641.1	1/4HEX-T20PX50	WS1920-T20P
A20R-PTFNR11	1/4HEX-H2.0X50	118.26-650	–	–	–	–	110.26-638	1/4HEX-H2.5X50	117.26-657
A20R-PTFNR16	1/4HEX-H2.5X50	136.26-653	–	–	–	–	110.26-640.1	1/4HEX-T20PX50	WS1920-T20P
A25S-PTFNL16	1/4HEX-H2.5X50	136.26-653	–	–	–	–	110.26-641.1	1/4HEX-T20PX50	WS1920-T20P
A25S-PTFNR16	1/4HEX-H2.5X50	136.26-653	–	–	–	–	110.26-640.1	1/4HEX-T20PX50	WS1920-T20P
A32T-PTFNL16	–	–	136.26-621	136.26-651	136.26-650	1/4HEX-H3.0X50	110.26-641.1	–	117.26-655
A32T-PTFNR16	–	–	136.26-621	136.26-651	136.26-650	1/4HEX-H3.0X50	110.26-640.1	–	117.26-655
A40U-PTFNL16	–	–	136.26-621	136.26-651	136.26-650	1/4HEX-H3.0X50	110.26-641.1	–	117.26-655
A40U-PTFNL22	–	–	136.26-624	136.26-651	136.26-652	–	110.26-643.1	1/4HEX-H4.0X50	170.26-655
A40U-PTFNR16	–	–	136.26-621	136.26-651	136.26-650	1/4HEX-H3.0X50	110.26-640.1	–	117.26-655
A40U-PTFNR22	–	–	136.26-624	136.26-651	136.26-652	–	110.26-642.1	1/4HEX-H4.0X50	170.26-655
A50V-PTFNL22	–	–	136.26-624	136.26-651	136.26-652	–	110.26-643.1	1/4HEX-H4.0X50	170.26-655
A50V-PTFNR22	–	–	136.26-624	136.26-651	136.26-652	–	110.26-642.1	1/4HEX-H4.0X50	170.26-655

Accessories

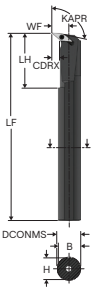
For	Bit holder	Insert clamping torque	Punch	Replacement blade	Shim key	Torque key
A20R-PTFNL11	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A20R-PTFNL16	1/4HEX-S-HANDLE	3.5NM	–	T00-20P	–	T00-20P35
A20R-PTFNR11	1/4HEX-S-HANDLE	3.0NM	–	–	–	H00-2530
A20R-PTFNR16	1/4HEX-S-HANDLE	3.5NM	–	T00-20P	–	T00-20P35
A25S-PTFNL16	1/4HEX-S-HANDLE	3.5NM	–	T00-20P	–	T00-20P35
A25S-PTFNR16	1/4HEX-S-HANDLE	3.5NM	–	T00-20P	–	T00-20P35
A32T-PTFNL16	1/4HEX-S-HANDLE	5.0NM	117.26-686	H00T-3.0	–	H00T-3050
A32T-PTFNR16	1/4HEX-S-HANDLE	5.0NM	117.26-686	H00T-3.0	–	H00T-3050
A40U-PTFNL16	1/4HEX-S-HANDLE	5.0NM	117.26-686	H00T-3.0	–	H00T-3050
A40U-PTFNL22	1/4HEX-S-HANDLE	6.0NM	117.26-687	H00T-4.0	1/4HEX-H3.0X50	H00T-4060
A40U-PTFNR16	1/4HEX-S-HANDLE	5.0NM	117.26-686	H00T-3.0	–	H00T-3050
A40U-PTFNR22	1/4HEX-S-HANDLE	6.0NM	117.26-687	H00T-4.0	1/4HEX-H3.0X50	H00T-4060
A50V-PTFNL22	1/4HEX-S-HANDLE	6.0NM	117.26-687	H00T-4.0	1/4HEX-H3.0X50	H00T-4060
A50V-PTFNR22	1/4HEX-S-HANDLE	6.0NM	117.26-687	H00T-4.0	1/4HEX-H3.0X50	H00T-4060

PVLNR/L, PVPNR/L – Toolholders for inserts VNMU – Metric

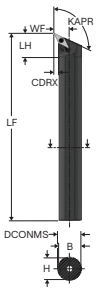




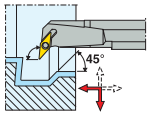
PVLNR/L



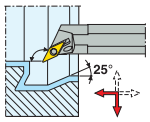
PVPNR/L



KAPR = 95,0 °



KAPR = 117,5 °



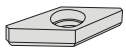
—Right-hand version shown
—For inserts program, see page(s) 585, 586
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS

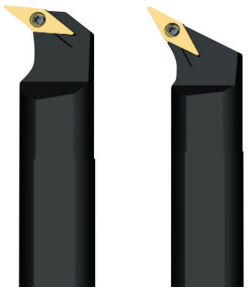


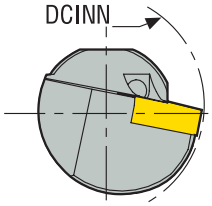
Designation	Item number	DCONMS	H	B	LF	WF	LH	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A25R-PVLNR13	00083566	25,0	23	24	200	18,0	57,0	9,5	32,0	95,0	-5,0	-14,0	0,6	VNMU1304.. *VNMU2.5.*
A32S-PVLNR13	00091720	32,0	30	31	250	23,0	50,0	6,5	40,0	95,0	-5,0	-14,0	1,3	VNMU1304.. *VNMU2.5.*
A25R-PVLNL13	00083568	25,0	23	24	200	18,0	57,0	9,5	32,0	95,0	-5,0	-14,0	0,6	VNMU1304.. *VNMU2.5.*
A32S-PVLNL13	00091721	32,0	30	31	250	23,0	50,0	6,5	40,0	95,0	-5,0	-14,0	1,3	VNMU1304.. *VNMU2.5.*
A25R-PVPNR13	00091722	25,0	23	24	200	17,0	34,0	4,0	32,0	117,5	-5,0	-19,0	0,7	VNMU1304.. *VNMU2.5.*
A32S-PVPNR13	00089737	32,0	30	31	250	22,0	35,0	5,5	40,0	117,5	-5,0	-15,5	1,3	VNMU1304.. *VNMU2.5.*
A25R-PVPNL13	00091723	25,0	23	24	200	17,0	34,0	4,0	32,0	117,5	-5,0	-19,0	0,7	VNMU1304.. *VNMU2.5.*
A32S-PVPNL13	00089738	32,0	30	31	250	22,0	35,0	5,5	40,0	117,5	-5,0	-15,5	1,3	VNMU1304.. *VNMU2.5.*

Spare Parts, included in delivery

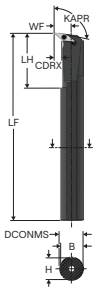
For	Insert key	Insert pin	Insert shim
			
-..13	1/4HEX-T09PX50	PL1403-T09P	PVN130308

PVLNR/L, PVPNR/L – Toolholders for inserts VNMU – Inch

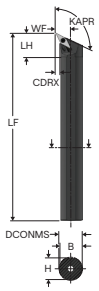




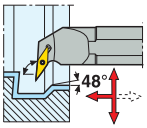
PVLNR/L



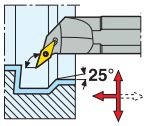
PVPNR/L



PVLNR/L
KAPR = 95,0 °



PVPNR/L
KAPR = 117,5 °



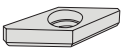
—Right-hand version shown
—For inserts program, see page(s) 585, 586
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



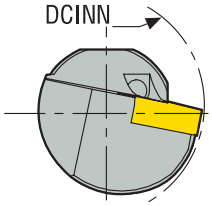
Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A16-PVLNR-2.5	00015229	1.000	0.866	0.906	12.000	0.640	1.000	0.150	1.200	95,0	-3,0	-12,0	2.200	VNMU1304.. *VNMU2.5.*
A16-PVPNR-2.5	00015234	1.000	0.866	0.906	12.000	0.750	1.098	0.260	1.300	117,5	-3,0	-12,0	2.200	VNMU1304.. *VNMU2.5.*
A16-PVPNL-2.5	00015235	1.000	0.866	0.906	12.000	0.750	1.098	0.260	1.300	117,5	-3,0	-12,0	2.200	VNMU1304.. *VNMU2.5.*

Spare Parts, included in delivery

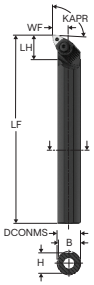
For	Insert key	Insert pin	Insert shim
			
..-2.5	1/4HEX-T09PX50	PL1403-T09P	PVN130308

PWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric

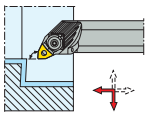




PWLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 20–21
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A20Q-PWLNR06	75036892	20,0	18	19	180	13,0	27,0	25,0	95,0	-5,0	-14,0	0,4	WN..0604.. *WN..33.*
A25R-PWLNR06	75036894	25,0	23	24	200	17,0	30,0	32,0	95,0	-5,0	-12,0	0,7	WN..0604.. *WN..33.*
A32S-PWLNR06	75036896	32,0	30	31	250	22,0	31,0	40,0	95,0	-5,0	-12,0	1,3	WN..0604.. *WN..33.*
A40T-PWLNR06	75036898	40,0	37	39	300	27,0	40,0	50,0	95,0	-5,0	-12,0	2,5	WN..0604.. *WN..33.*
A20Q-PWLNL06	75036893	20,0	18	19	180	13,0	27,0	25,0	95,0	-5,0	-14,0	0,4	WN..0604.. *WN..33.*
A25R-PWLNL06	75036895	25,0	23	24	200	17,0	30,0	32,0	95,0	-5,0	-12,0	0,7	WN..0604.. *WN..33.*
A32S-PWLNL06	75036897	32,0	30	31	250	22,0	31,0	40,0	95,0	-5,0	-12,0	1,3	WN..0604.. *WN..33.*
A40T-PWLNL06	75036899	40,0	37	39	300	27,0	40,0	50,0	95,0	-5,0	-12,0	2,5	WN..0604.. *WN..33.*
A25R-PWLNR08	75065808	25,0	23	24	200	17,0	30,0	32,0	95,0	-5,0	-11,0	0,6	WN..0804.. *WN..43.*
A32S-PWLNR08	75065810	32,0	30	31	250	22,0	31,0	40,0	95,0	-5,0	-11,0	1,3	WN..0804.. *WN..43.*
A40T-PWLNR08	75065812	40,0	37	39	300	27,0	35,0	50,0	95,0	-5,0	-14,0	2,5	WN..0804.. *WN..43.*
A25R-PWLNL08	75065809	25,0	23	24	200	17,0	30,0	32,0	95,0	-5,0	-11,0	0,6	WN..0804.. *WN..43.*
A32S-PWLNL08	75065811	32,0	30	31	250	22,0	31,0	40,0	95,0	-5,0	-11,0	1,3	WN..0804.. *WN..43.*
A40T-PWLNL08	75065813	40,0	37	39	300	27,0	35,0	50,0	95,0	-5,0	-14,0	2,5	WN..0804.. *WN..43.*

Spare Parts, included in delivery

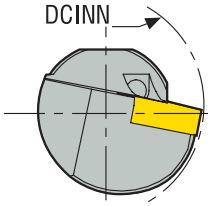
For	Insert shim	Setting screw	Shim pin	Wedge clamp	Wedge key	Wedge screw
						
A20Q-...06	WAI060212	L82511-T07P	PP1209-T09P	WNW06HD	1/4HEX-T20PX50	WS1620-T20P
A25R-...06	WAI060212	L82511-T07P	PP1209-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
A25R-...08	WAI080312	L82511-T07P	PP1415-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
A32S-...06	WAE060312	L82511-T07P	PP1409-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
A32S-...08	WAI080312	L82511-T07P	PP1415-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P
A40T-...06	WAE060312	L82511-T07P	PP1409-T09P	WNW06HD	1/4HEX-T20PX50	WS1920-T20P
A40T-...08	WAI080312	L82511-T07P	PP1415-T15P	WNW08HD	1/4HEX-T25PX50	WS2325-T25P

Accessories

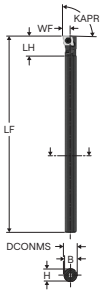
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A20Q-...06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
A25R-...06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
A25R-...08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
A32S-...06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
A32S-...08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50
A40T-...06	1/4HEX-S-HANDLE	3.5NM	T00-20P	1/4HEX-T09PX50	T00-20P35
A40T-...08	1/4HEX-S-HANDLE	5.0NM	T00T-25P	1/4HEX-T15PX50	T00T-25P50

SCFCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric

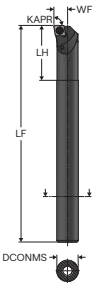




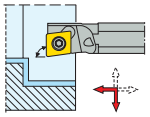
SCFCR/L



SCFCR/L..-R



KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A08K-SCFCR06	00093710	8,0	7	8	125	5,0	12,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A08K-SCFCR06-R	02516556	8,0	–	–	125	5,0	12,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A10L-SCFCR06	00093712	10,0	9	10	140	7,0	18,0	13,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A10L-SCFCR06-R	02516568	10,0	–	–	140	7,0	18,0	13,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A08K-SCFCL06	00093711	8,0	7	8	125	5,0	12,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A08K-SCFCL06-R	02516589	8,0	–	–	125	5,0	12,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A10L-SCFCL06	00093713	10,0	9	10	140	7,0	18,0	13,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A10L-SCFCL06-R	02516595	10,0	–	–	140	7,0	18,0	13,0	91,0	0,0	-11,0	0,1	CC..0602.. CC..21.5.
A12N-SCFCR09	00093714	12,0	11	12	160	9,0	20,0	17,0	91,0	0,0	-11,0	0,2	CC..09T3.. CC..32.5.
A12N-SCFCR09-R	02516559	12,0	–	–	160	9,0	20,0	17,0	91,0	0,0	-11,0	0,2	CC..09T3.. CC..32.5.
A16Q-SCFCR09	00093716	16,0	15	16	180	11,0	22,0	22,0	91,0	0,0	-5,0	0,3	CC..09T3.. CC..32.5.
A16Q-SCFCR09-R	02516585	16,0	–	–	180	11,0	22,0	22,0	91,0	0,0	-5,0	0,4	CC..09T3.. CC..32.5.
A20R-SCFCR09	00093718	20,0	18	19	200	13,0	32,0	25,0	91,0	0,0	-5,0	0,4	CC..09T3.. CC..32.5.
A20R-SCFCR09-R	02516601	20,0	–	–	200	13,0	32,0	25,0	91,0	0,0	-5,0	0,4	CC..09T3.. CC..32.5.
A12N-SCFCL09	00093715	12,0	11	12	160	9,0	20,0	17,0	91,0	0,0	-11,0	0,2	CC..09T3.. CC..32.5.
A12N-SCFCL09-R	02516590	12,0	–	–	160	9,0	20,0	17,0	91,0	0,0	-11,0	0,2	CC..09T3.. CC..32.5.
A16Q-SCFCL09	00093717	16,0	15	16	180	11,0	22,0	22,0	91,0	0,0	-5,0	0,3	CC..09T3.. CC..32.5.
A16Q-SCFCL09-R	02516602	16,0	–	–	180	11,0	22,0	22,0	91,0	0,0	-5,0	0,3	CC..09T3.. CC..32.5.
A20R-SCFCL09	00093719	20,0	18	19	200	13,0	32,0	25,0	91,0	0,0	-5,0	0,4	CC..09T3.. CC..32.5.
A20R-SCFCL09-R	00734207	20,0	–	–	200	13,0	32,0	25,0	91,0	0,0	-5,0	0,4	CC..09T3.. CC..32.5.

Spare Parts, included in delivery

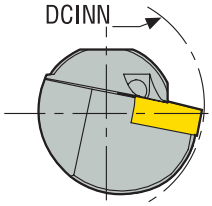
For	Insert key	Insert screw
		
A08K-...06/R	1/4HEX-T07PX50	C02505-T07P
A10L-...06/R	1/4HEX-T07PX50	C02506-T07P
A12N-...09/R	1/4HEX-T15PX50	C04008-T15P
A16Q-...09/R	1/4HEX-T15PX50	C04008-T15P
A20R-...09/R	1/4HEX-T15PX50	C04008-T15P

Accessories

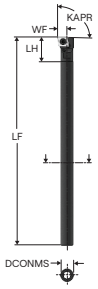
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
A08K-...06/R	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A10L-...06/R	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A12N-...09/R	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A16Q-...09/R	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A20R-...09/R	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

SCFCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric

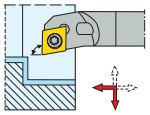




E..-SCFCR/L..-R



KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 20–21
—E = Solid carbide shank
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm				kg	
E08K-SCFCR06-R	75011692	8,0	125	5,0	21,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
E10M-SCFCR06-R	75011690	10,0	150	7,0	27,0	13,0	91,0	0,0	-11,0	0,2	CC..0602.. *CC..21.5.*
E08K-SCFCL06-R	75011691	8,0	125	5,0	21,0	10,0	91,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
E10M-SCFCL06-R	75011689	10,0	150	7,0	27,0	13,0	91,0	0,0	-11,0	0,2	CC..0602.. *CC..21.5.*
E12R-SCFCR09-R	75011688	12,0	200	9,0	27,0	17,0	91,0	0,0	-11,0	0,3	CC..09T3.. *CC..32.5.*
E16X-SCFCR09-R	75011686	16,0	230	11,0	34,0	22,0	91,0	0,0	-5,0	0,6	CC..09T3.. *CC..32.5.*
E12R-SCFCL09-R	75011687	12,0	200	9,0	27,0	17,0	91,0	0,0	-11,0	0,3	CC..09T3.. *CC..32.5.*
E16X-SCFCL09-R	75011685	16,0	230	11,0	34,0	22,0	91,0	0,0	-5,0	0,6	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
-...09-R	1/4HEX-T15PX50	C04008-T15P
E08K-...06-R	1/4HEX-T07PX50	C02505-T07P
E10M-...06-R	1/4HEX-T07PX50	C02506-T07P

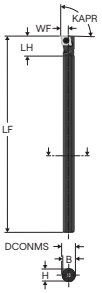
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-...09-R	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
E08K-...06-R	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
E10M-...06-R	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

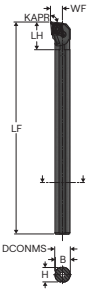
SCFCR/L, SCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Inch



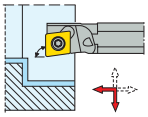
SCFCR/L



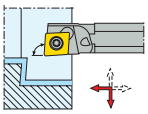
SCLCR/L



KAPR = 91,0 °



KAPR = 95,0 °



–Right-hand version shown
–For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
–For holder code key, see page(s) 22-23
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A06-SCFCR-2	02829665	0.315	0.906	0.945	6.000	0.252	0.402	0.508	91,0	0,0	-11,0	0.220	CC..0602.. *CC..21.5.*
A08-SCFCR-3	02829670	0.500	0.425	0.463	8.000	0.315	1.551	0.630	91,0	0,0	-11,0	0.440	CC..09T3.. *CC..32.5.*
A06-SCLCR-2	02829667	0.375	0.315	0.345	6.000	0.250	1.025	0.472	95,0	0,0	-10,7	0.220	CC..0602.. *CC..21.5.*
A08-SCLCR-2	02829673	0.500	0.425	0.463	6.000	0.312	1.550	0.571	95,0	0,0	-7,9	0.440	CC..0602.. *CC..21.5.*
A10-SCLCR-2	02829681	0.625	0.531	0.578	8.000	0.406	1.250	0.728	95,0	0,0	-5,34	0.660	CC..0602.. *CC..21.5.*
A06-SCLCL-2	02829666	0.375	0.315	0.345	6.000	0.250	1.025	0.472	95,0	0,0	-10,7	0.220	CC..0602.. *CC..21.5.*
A08-SCLCL-2	02829671	0.500	0.425	0.463	6.000	0.312	1.550	0.571	95,0	0,0	-7,9	0.440	CC..0602.. *CC..21.5.*
A10-SCLCL-2	02829679	0.625	0.531	0.578	8.000	0.406	1.250	0.728	95,0	0,0	-5,34	0.440	CC..0602.. *CC..21.5.*
A08-SCLCR-3	02829674	0.500	0.425	0.481	8.000	0.315	0.551	0.630	95,0	0,0	-11,0	0.440	CC..09T3.. *CC..32.5.*
A10-SCLCR-3	02829682	0.625	0.531	0.578	8.000	0.406	1.250	0.812	95,0	0,0	-8,7	0.660	CC..09T3.. *CC..32.5.*
A12-SCLCR-3	02829690	0.750	0.650	0.732	10.000	0.500	0.752	1.000	95,0	0,0	-10,0	1.100	CC..09T3.. *CC..32.5.*
A16-SCLCR-3	02829697	1.000	0.902	0.951	12.000	0.640	1.906	1.250	95,0	0,0	-3,84	2.200	CC..09T3.. *CC..32.5.*
A08-SCLCL-3	02829672	0.500	0.425	0.463	8.000	0.315	1.551	0.630	95,0	0,0	-11,0	0.440	CC..09T3.. *CC..32.5.*
A10-SCLCL-3	02829680	0.625	0.531	0.578	8.000	0.406	1.250	0.812	95,0	0,0	-8,7	0.660	CC..09T3.. *CC..32.5.*
A12-SCLCL-3	02829689	0.750	0.650	0.732	10.000	0.500	0.752	1.000	95,0	0,0	-6,3707	1.100	CC..09T3.. *CC..32.5.*
A16-SCLCL-3	02829696	1.000	0.902	0.951	12.000	0.640	1.906	1.250	95,0	0,0	-3,84	2.200	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

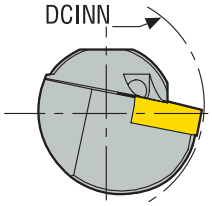
For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

Accessories

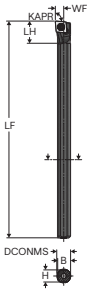
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

SCLCR/L – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric

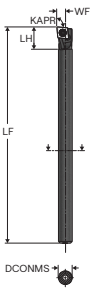




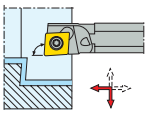
SCLCR/L



SCLCR/L..-R



KAPR = 95,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
–For holder code key, see page(s) 20-21
–For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A08K-SCLCR06	02413804	8,0	7	8	125	5,0	12,0	10,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A08K-SCLCR06-R	02413806	8,0	–	–	125	5,0	12,0	10,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A10L-SCLCR06	02413808	10,0	9	10	140	7,0	18,0	13,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A10L-SCLCR06-R	02413809	10,0	–	–	140	7,0	18,0	13,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A12N-SCLCR06	02413810	12,0	11	12	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..0602.. *CC..21.5.*
A16Q-SCLCR06	02413811	16,0	15	16	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..0602.. *CC..21.5.*
A08K-SCLCL06	02434528	8,0	7	8	125	5,0	12,0	10,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A08K-SCLCL06-R	02434553	8,0	–	–	125	5,0	12,0	10,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A10L-SCLCL06	02434560	10,0	9	10	140	7,0	18,0	13,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A10L-SCLCL06-R	02434564	10,0	–	–	140	7,0	18,0	13,0	95,0	0,0	-11,0	0,1	CC..0602.. *CC..21.5.*
A12N-SCLCL06	02434566	12,0	11	12	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..0602.. *CC..21.5.*
A16Q-SCLCL06	02434568	16,0	15	16	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..0602.. *CC..21.5.*
A12N-SCLCR09	02413812	12,0	11	12	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..09T3.. *CC..32.5.*
A12N-SCLCR09-R	02413858	12,0	–	–	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..09T3.. *CC..32.5.*
A16Q-SCLCR09	02413859	16,0	15	16	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..09T3.. *CC..32.5.*
A16Q-SCLCR09-R	02413860	16,0	–	–	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..09T3.. *CC..32.5.*
A20R-SCLCR09	02413861	20,0	18	19	200	13,0	32,0	25,0	95,0	0,0	-5,0	0,4	CC..09T3.. *CC..32.5.*
A20R-SCLCR09-R	02413862	20,0	–	–	200	13,0	32,0	25,0	95,0	0,0	-5,0	0,5	CC..09T3.. *CC..32.5.*
A12N-SCLCL09	02434572	12,0	11	12	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..09T3.. *CC..32.5.*
A12N-SCLCL09-R	02434573	12,0	–	–	160	9,0	20,0	17,0	95,0	0,0	-11,0	0,2	CC..09T3.. *CC..32.5.*
A16Q-SCLCL09	02434574	16,0	15	16	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..09T3.. *CC..32.5.*
A16Q-SCLCL09-R	02434578	16,0	–	–	180	11,0	22,0	22,0	95,0	0,0	-5,0	0,3	CC..09T3.. *CC..32.5.*
A20R-SCLCL09	02434581	20,0	18	19	200	13,0	32,0	25,0	95,0	0,0	-5,0	0,4	CC..09T3.. *CC..32.5.*

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A20R-SCLCL09-R	02434584	20,0	–	–	200	13,0	32,0	25,0	95,0	0,0	-5,0	0,5	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
A08/A10	1/4HEX-T07PX50	C02505-T07P
A12N-..06	1/4HEX-T07PX50	C02506-T07P
A12N-..09	1/4HEX-T15PX50	C04008-T15P
A16Q-..06	1/4HEX-T07PX50	C02506-T07P
A16Q-..09	1/4HEX-T15PX50	C04008-T15P
A20	1/4HEX-T15PX50	C04008-T15P

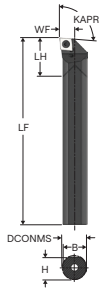
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
A08/A10	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A12N-..06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A12N-..09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A16Q-..06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A16Q-..09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A20	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

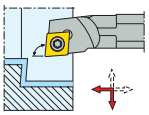
SCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Inch



SCLCR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 22-23
—E = Solid carbide shank
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
E06-SCLCR-2	00093165	0.375	0.315	0.350	6.000	0.250	1.063	0.500	95,0	0,0	-15,0	0.440	CC..0602.. *CC..21.5.*
E08-SCLCR-2	00093167	0.500	0.425	0.465	8.000	0.313	1.063	0.625	95,0	0,0	-9,0	0.880	CC..0602.. *CC..21.5.*
E10-SCLCR-2	00093179	0.625	0.579	0.579	10.000	0.406	1.339	0.812	95,0	0,0	-7,0	1.540	CC..0602.. *CC..21.5.*
E06-SCLCL-2	00093166	0.375	0.315	0.350	6.000	0.250	1.063	0.500	95,0	0,0	-15,0	0.440	CC..0602.. *CC..21.5.*
E08-SCLCL-2	00093178	0.500	0.425	0.465	8.000	0.313	1.063	0.625	95,0	0,0	-9,0	0.880	CC..0602.. *CC..21.5.*
E10-SCLCL-2	00093181	0.625	0.579	0.579	10.000	0.406	1.339	0.812	95,0	0,0	-7,0	1.540	CC..0602.. *CC..21.5.*
E12-SCLCR-3	00093183	0.750	0.704	0.704	10.000	0.500	1.457	1.000	95,0	0,0	-10,0	1.980	CC..09T3.. *CC..32.5.*
E12-SCLCL-3	00093184	0.750	0.704	0.704	10.000	0.500	0.984	1.000	95,0	0,0	-10,0	2.200	CC..09T3.. *CC..32.5.*

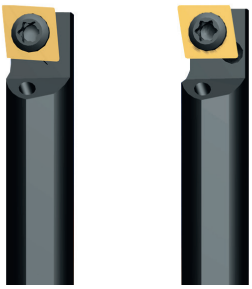
Spare Parts, included in delivery

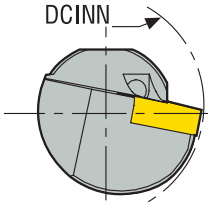
For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

Accessories

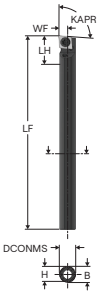
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

SCLDR/L, SCFDR/L – Toolholders for inserts CDCB – Metric

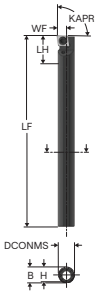




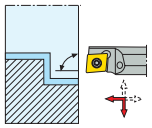
SCLDR/L



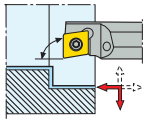
SCFDR/L



SCLDR/L
KAPR = 95,0 °



SCFDR/L
KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 547
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A05D-SCLDR04	00054546	5,0	5	5	60	3,0	9,7	5,5	95,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A06E-SCLDR04	00054660	6,0	6	6	70	3,5	10,2	6,5	95,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A08F-SCLDR04	00054692	8,0	8	8	80	4,5	11,2	8,5	95,0	0,0	-8,0	0,1	CD..04T0.. *CD..1.21.2.*
A05D-SCLDL04	00054545	5,0	5	5	60	3,0	9,7	5,5	95,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A06E-SCLDL04	00054547	6,0	6	6	70	3,5	10,2	6,5	95,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A08F-SCLDL04	00054679	8,0	8	8	80	4,5	11,2	8,5	95,0	0,0	-8,0	0,1	CD..04T0.. *CD..1.21.2.*
A05D-SCFDR04	00054762	5,0	5	5	60	3,0	9,7	5,5	91,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A06E-SCFDR04	00054765	6,0	6	6	70	3,5	10,2	6,5	91,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A05D-SCFDL04	00054761	5,0	5	5	60	3,0	9,7	5,5	91,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*
A06E-SCFDL04	00054763	6,0	6	6	70	3,5	10,2	6,5	91,0	0,0	-12,0	0,1	CD..04T0.. *CD..1.21.2.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..04	1/4HEX-T06PX50	C11804-T06P

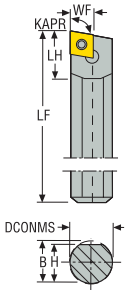
Accessories

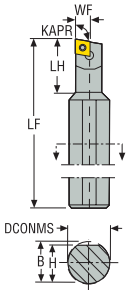
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..04	1/4HEX-S-HANDLE	0.5NM	T00-06P	T00-06P05

SCLDR/L – Toolholders for inserts CDCB – Inch

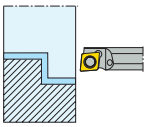


SCLDR/L





KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 547
—For holder code key, see page(s) 22-23
—Bar descriptions that begin with H denotes heavy metal construction.
—For ISO attribute explanation, see page 82

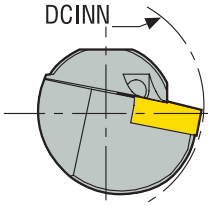
Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S03-SCLDR-1.2	00057644	0.187	0.177	0.187	2.500	0.101	0.526	0.180	95,0	0,0	-17,0	0.220	CD..04T0.. *CD..1.21.2.*
S04-SCLDR-1.2	00057646	0.250	0.235	0.250	3.000	0.140	–	0.265	95,0	0,0	-12,0	0.220	CD..04T0.. *CD..1.21.2.*
S04-SCLDL-1.2	00057647	0.250	0.235	0.250	3.000	0.141	–	0.265	95,0	0,0	-12,0	0.220	CD..04T0.. *CD..1.21.2.*
H03-SCLDR-1.2	00057648	0.187	0.177	0.187	4.000	0.110	0.394	0.204	95,0	0,0	-17,0	0.220	CD..04T0.. *CD..1.21.2.*
S0306-SCLDR-1.2	00057649	0.375	0.358	0.375	2.500	0.101	0.520	0.183	95,0	0,0	-12,0	0.220	CD..04T0.. *CD..1.21.2.*
S0406-SCLDR-1.2	00057650	0.375	0.358	0.358	2.500	0.152	1.250	0.277	95,0	0,0	-12,0	0.220	CD..04T0.. *CD..1.21.2.*
H0308-SCLDR-1.2	00057651	0.500	0.476	0.500	4.000	0.118	1.120	0.212	95,0	0,0	-17,0	0.440	CD..04T0.. *CD..1.21.2.*

Spare Parts, included in delivery

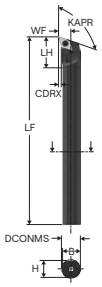
For	Insert key	Insert screw
		
S03	1/4HEX-T06PX50	CS110
S04/ H03	1/4HEX-T06PX50	CS115

SDQCR/L – Toolholders for inserts DCGT, DCMT, DCMW – Metric

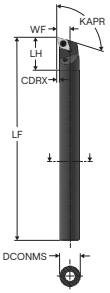




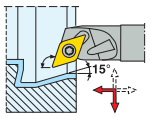
SDQCR/L



SDQCR/L..-R



KAPR = 107,5 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 619
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A10L-SDQCR07-R	00093833	10,0	–	–	140	7,0	18,0	1,5	13,0	107,5	0,0	-11,0	0,1	DC..0702.. *DC..21.5.*
A12N-SDQCR07-R	00093835	12,0	–	–	160	9,0	20,0	2,5	17,0	107,5	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A16Q-SDQCR07	00093837	16,0	15	16	180	11,0	22,0	2,5	22,0	107,5	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A10L-SDQCL07-R	00093834	10,0	–	–	140	7,0	18,0	1,5	13,0	107,5	0,0	-11,0	0,1	DC..0702.. *DC..21.5.*
A12N-SDQCL07-R	00093836	12,0	–	–	160	9,0	20,0	2,5	17,0	107,5	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A16Q-SDQCL07-R	00093838	16,0	–	–	180	11,0	22,0	2,5	22,0	107,5	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A20R-SDQCR11	00093839	20,0	18	19	200	13,0	32,0	2,5	25,0	107,5	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A20R-SDQCL11-R	00093840	20,0	–	–	200	13,0	32,0	2,5	25,0	107,5	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A25S-SDQCR15	00030964	25,0	23	24	250	17,0	40,0	4,0	32,0	107,5	0,0	-5,0	0,8	DC..1504.. *DC..43.*
A25S-SDQCL15	00030965	25,0	23	24	250	17,0	40,0	4,0	32,0	107,5	0,0	-5,0	0,8	DC..1504.. *DC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
...07	1/4HEX-T07PX50	C02506-T07P
...11	1/4HEX-T15PX50	C04008-T15P
...15	1/4HEX-T15PX50	C04512-T15P

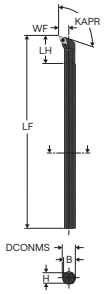
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...07	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
...11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
...15	1/4HEX-S-HANDLE	5.0NM	T00-15P	T00-15P50

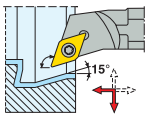
SDQCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Inch



SDQCR



KAPR = 107,5 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S08-SDQCR-2	00073944	0.500	0.394	0.425	8.000	0.437	1.175	0.780	107,5	0,0	-11,0	0.660	DC..0702.. *DC..21.5.*

Spare Parts, included in delivery

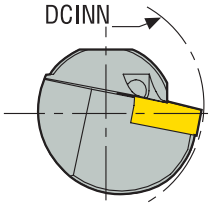
For	Insert key	Insert screw
		
S08-SDQCR-2	1/4HEX-T07PX50	C02506-T07P

Accessories

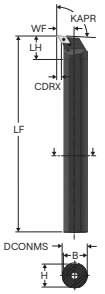
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
S08-SDQCR-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

SDQNR/L, PDQNR/L – Toolholders for inserts DNMA, DNMU – Metric

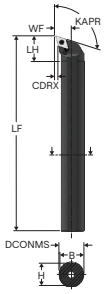




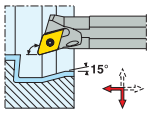
SDQNR/L



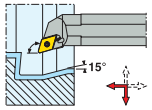
PDQNR/L



SDQNR/L
KAPR = 107,5 °



PDQNR/L
KAPR = 107,5 °



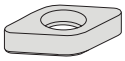
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A16M-SDQNR11	00083822	16,0	15	16	150	11,0	20,0	3,7	20,0	107,5	-5,0	-20,0	0,3	DNMU1104.. *DNMU33.*
A20Q-SDQNR11	75077819	20,0	18	19	180	13,0	30,0	4,2	25,0	107,5	-5,0	-18,0	0,4	DNMU1104.. *DNMU33.*
A16M-SDQNL11	00083824	16,0	15	16	150	11,0	20,0	3,7	20,0	107,5	-5,0	-20,0	0,3	DNMU1104.. *DNMU33.*
A20Q-SDQNL11	75077820	20,0	18	19	180	13,0	30,0	4,2	25,0	107,5	-5,0	-18,0	0,4	DNMU1104.. *DNMU33.*
A25R-PDQNR11	75077821	25,0	23	24	200	17,0	35,0	5,0	32,0	107,5	-5,0	-16,0	0,7	DNMU1104.. *DNMU33.*
A32S-PDQNR11	75077823	32,0	30	31	250	22,0	32,0	7,3	40,0	107,5	-5,0	-14,0	1,3	DNMU1104.. *DNMU33.*
A25R-PDQNL11	75077822	25,0	23	24	200	17,0	35,0	5,0	32,0	107,5	-5,0	-16,0	0,7	DNMU1104.. *DNMU33.*
A32S-PDQNL11	75079497	32,0	30	31	250	22,0	32,0	7,3	40,0	107,5	-5,0	-14,0	1,3	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

For	Insert key	Insert pin	Insert screw	Insert shim	Shim screw
					
A16	1/4HEX-T09PX50	–	C03511-T09P	–	–
A20	1/4HEX-T09PX50	–	C03511-T09P	DAI110212	CA3507
A25/32	1/4HEX-T09PX50	PL1403-T09P	–	DAE110312	–

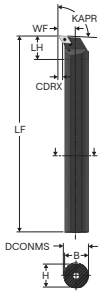
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A16	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
A20	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20
A25/32	1/4HEX-S-HANDLE	–	–	–	–

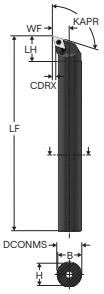
SDQNR/L, PDQNR/L – Toolholders for inserts DNMA, DNMG, DNMP, DNMU – Inch



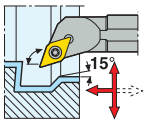
SDQNR/L



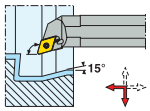
PDQNR/L



SDQNR
KAPR = 107,5 °



PDQNR
KAPR = 107,5 °



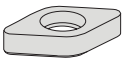
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A12-SDQNR-3	00015216	0.750	0.709	0.728	10.000	0.562	1.839	0.142	0.980	107,5	-6,0	-14,0	1.540	DNMU1104.. *DNMU33.*
A16-PDQNR-3	00015218	1.000	0.866	0.933	12.000	0.750	1.921	0.173	1.299	107,5	-5,0	-12,0	2.430	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

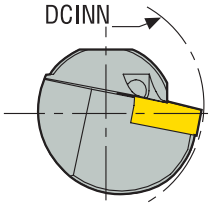
For	Insert key	Insert pin	Insert screw	Insert shim	Shim screw
					
A12	1/4HEX-T09PX50	–	C03511-T09P	DAE110312	CA3507
A16	1/4HEX-T09PX50	PL1403-T09P	–	DAE110312	–

Accessories

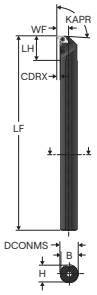
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A12	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20
A16	1/4HEX-S-HANDLE	–	–	–	–

SDUCR/L – Toolholders for inserts DCGT, DCMT, DCMW, DCMX – Metric

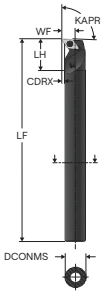




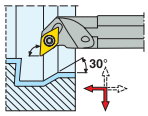
SDUCR/L



SDUCR/L..-R



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 619
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A12N-SDUCR07	02516530	12,0	11	12	160	9,0	20,0	3,5	17,0	93,0	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A12N-SDUCR07-R	00093821	12,0	–	–	160	9,0	20,0	3,5	17,0	93,0	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A16Q-SDUCR07	75066214	16,0	15	16	180	11,0	22,0	2,5	22,0	93,0	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A16Q-SDUCR07-R	00093825	16,0	–	–	180	11,0	22,0	3,5	22,0	93,0	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A12N-SDUCL07	75066213	12,0	11	12	160	9,0	20,0	3,5	17,0	93,0	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A12N-SDUCL07-R	00093822	12,0	–	–	160	9,0	20,0	3,5	17,0	93,0	0,0	-11,0	0,2	DC..0702.. *DC..21.5.*
A16Q-SDUCL07	75066215	16,0	15	16	180	11,0	22,0	3,5	22,0	93,0	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A16Q-SDUCL07-R	00734206	16,0	–	–	180	11,0	22,0	3,5	22,0	93,0	0,0	-5,0	0,3	DC..0702.. *DC..21.5.*
A20R-SDUCR11	00734209	20,0	18	19	200	13,0	30,0	4,6	25,0	93,0	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A20R-SDUCR11-R	00093829	20,0	–	–	200	13,0	30,0	3,8	25,0	93,0	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A25S-SDUCR11	02516541	25,0	23	24	250	17,0	40,0	6,1	32,0	93,0	0,0	-5,0	0,8	DC..11T3.. *DC..32.5.*
A25S-SDUCR11-R	02516599	25,0	–	–	250	17,0	40,0	5,3	32,0	93,0	0,0	-5,0	0,9	DC..11T3.. *DC..32.5.*
A20R-SDUCL11	02516546	20,0	18	19	200	13,0	30,0	4,6	25,0	93,0	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A20R-SDUCL11-R	00093830	20,0	–	–	200	13,0	30,0	3,8	25,0	93,0	0,0	-5,0	0,4	DC..11T3.. *DC..32.5.*
A25S-SDUCL11	02516549	25,0	23	24	250	17,0	40,0	6,1	32,0	93,0	0,0	-5,0	0,8	DC..11T3.. *DC..32.5.*
A25S-SDUCL11-R	02516600	25,0	–	–	250	17,0	40,0	5,3	32,0	93,0	0,0	-5,0	0,9	DC..11T3.. *DC..32.5.*
A32T-SDUCR15	00030967	32,0	30	31	300	22,0	50,0	8,1	40,0	93,0	0,0	-5,0	1,6	DC..1504.. *DC..43.*
A32T-SDUCL15	00030968	32,0	30	31	300	22,0	50,0	8,1	40,0	93,0	0,0	-5,0	1,6	DC..1504.. *DC..43.*

Spare Parts, included in delivery

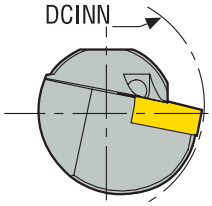
For	Insert key	Insert screw
		
A12	1/4HEX-T07PX50	C02506-T07P
A16	1/4HEX-T07PX50	C02506-T07P
A20	1/4HEX-T15PX50	C04008-T15P
A25	1/4HEX-T15PX50	C04008-T15P
A32	1/4HEX-T15PX50	C04512-T15P

Accessories

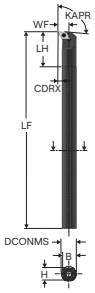
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
A12	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A16	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
A20	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A25	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
A32	1/4HEX-S-HANDLE	5.0NM	T00-15P	T00-15P50

SDUNR/L – Toolholders for inserts DNMA, DNMU, DNMX – Metric

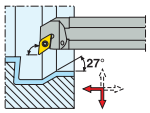




SDUNR/L



KAPR = 93,0 °



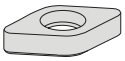
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A16M-SDUNR11	00083816	16,0	15	16	150	11,0	20,0	4,0	20,0	93,0	-5,0	-17,0	0,3	DNMU1104.. *DNMU33.*
A20Q-SDUNR11	75066111	20,0	18	19	180	13,0	30,0	4,5	25,0	93,0	-5,0	-14,0	0,4	DNMU1104.. *DNMU33.*
A16M-SDUNL11	00083817	16,0	15	16	150	11,0	20,0	4,0	20,0	93,0	-5,0	-17,0	0,3	DNMU1104.. *DNMU33.*
A20Q-SDUNL11	75066112	20,0	18	19	180	13,0	30,0	4,5	25,0	93,0	-5,0	-14,0	0,4	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
A16	1/4HEX-T09PX50	C03511-T09P	–	–
A20	1/4HEX-T09PX50	C03511-T09P	DAI110212	CA3507

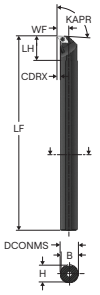
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A16	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
A20	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20

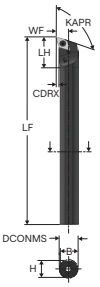
SDUCR/L, SDQCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW – Inch



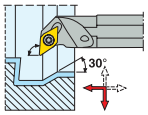
SDUCR/L



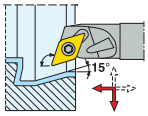
SDQCR/L



SDUCR/L
KAPR = 93,0 °



SDQCR/L
KAPR = 107,5 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A08-SDUCR-2	02829675	0.500	0.425	0.463	8.020	0.437	0.550	0.177	0.780	93,0	0,0	-11,0	0.440	DC..0702.. *DC..21.5.*
A10-SDUCR-2	02829685	0.500	0.531	0.578	8.020	0.437	0.550	0.177	1.000	93,0	0,0	-11,0	0.440	DC..0702.. *DC..21.5.*
A10-SDUCL-2	02829684	0.500	0.531	0.578	8.020	0.437	0.550	0.177	0.500	93,0	0,0	-11,0	0.440	DC..0702.. *DC..21.5.*
A12-SDUCR-3	02829693	0.750	0.650	0.707	10.000	0.625	0.906	0.319	1.125	93,0	0,0	-4,0	1.100	DC..11T3.. *DC..32.5.*
A16-SDUCR-3	02829700	1.000	0.902	0.957	12.000	0.750	1.906	0.319	1.500	93,0	0,0	-3,16	2.200	DC..11T3.. *DC..32.5.*
A12-SDUCL-3	02829692	0.750	0.650	0.707	10.000	0.625	1.750	0.319	1.125	93,0	0,0	-5,07	1.100	DC..11T3.. *DC..32.5.*
A16-SDUCL-3	02829699	1.000	0.902	0.957	12.000	0.750	1.906	0.319	1.500	93,0	0,0	-3,16	2.200	DC..11T3.. *DC..32.5.*
A10-SDQCR-2	02829683	0.625	0.535	0.578	10.000	0.500	0.625	0.197	0.840	107,5	0,0	-5,0	0.660	DC..0702.. *DC..21.5.*
A12-SDQCR-3	02829691	0.750	0.708	0.729	10.000	0.562	0.773	0.213	1.125	107,5	0,0	-5,95	0.880	DC..11T3.. *DC..32.5.*
A16-SDQCR-3	02829698	1.000	0.858	0.929	12.000	0.750	0.906	0.283	1.500	107,5	0,0	-3,27	2.200	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

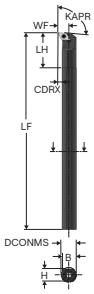
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

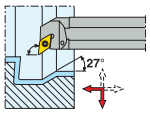
SDUNR/L – Toolholders for inserts DNMU – Inch



SDUNR/L



KAPR = 93,0 °



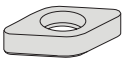
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A10-SDUNR-3	00014820	0.625	0.532	0.602	10.000	0.500	1.598	0.260	0.850	93,0	-5,0	-14,0	0.880	DNMU1104.. *DNMU33.*
A12-SDUNR-3	00014822	0.750	0.709	0.728	10.000	0.562	1.799	0.236	0.980	93,0	-5,0	-14,0	1.540	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

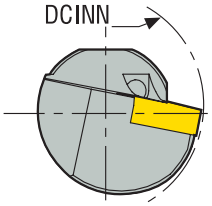
For	Insert key	Insert screw	Insert shim	Shim screw
				
..10-3	1/4HEX-T09PX50	C03511-T09P	–	–
..12-3	1/4HEX-T09PX50	C03511-T09P	DAE110312	CA3507

Accessories

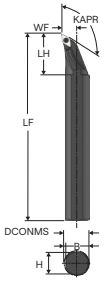
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..10-3	1/4HEX-S-HANDLE	2.0NM	T00-09P	–	T00-09P20
..12-3	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20

SDXCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric

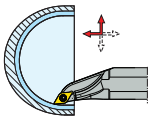




SDXCR/L



KAPR = 120,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A20M-SDXCR07	10102581	20,0	18	19	150	11,87	33,48	22,0	120,0	0,0	-3,0	0,3	DC..0702.. *DC..21.5.*
A20M-SDXCL07	10102580	20,0	18	19	150	11,87	33,48	22,0	120,0	0,0	-3,0	0,3	DC..0702.. *DC..21.5.*
A20R-SDXCR11	10102582	20,0	18	19	200	11,88	32,1	24,0	120,0	0,0	-3,0	0,4	DC..11T3.. *DC..32.5.*
A20R-SDXCL11	10102583	20,0	18	19	200	11,88	32,1	24,0	120,0	0,0	-3,0	0,4	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

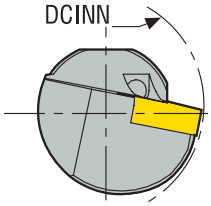
For	Insert key	Insert screw
		
..-07	1/4HEX-T07PX50	C02506-T07P
..-11	1/4HEX-T15PX50	C04008-T15P

Accessories

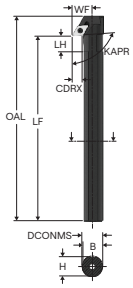
For	Bit holder	Nozzle
		
..-07	1/4HEX-S-HANDLE	JET-CN03040020
..-11	1/4HEX-S-HANDLE	JET-CN03040020

SDYNR/L, PDYNR/L – Toolholders for inserts DNMA, DNMU – Metric

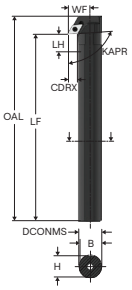




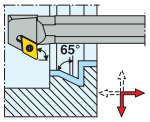
SDYNR/L



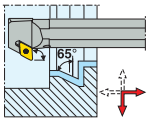
PDYNR/L



SDYNR/L
KAPR = 95,0 °



PDYNR/L
KAPR = 95,0 °



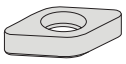
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	OAL	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm				kg	
A20Q-SDYNR11	75079498	20,0	18	19	200	180	20,0	15,0	10,9	40,0	95,0	-5,0	-14,0	0,5	DNMU1104.. *DNMU33.*
A20Q-SDYNL11	75079499	20,0	18	19	200	180	20,0	15,0	10,9	40,0	95,0	-5,0	-14,0	0,5	DNMU1104.. *DNMU33.*
A25R-PDYNR11	75079500	25,0	23	24	220	200	22,5	13,0	10,9	45,0	95,0	-5,0	-13,0	0,8	DNMU1104.. *DNMU33.*
A32S-PDYNR11	75079502	32,0	30	31	270	250	25,5	23,0	11,1	51,0	95,0	-5,0	-11,0	1,5	DNMU1104.. *DNMU33.*
A25R-PDYNL11	75079501	25,0	23	24	220	200	22,5	13,0	10,9	45,0	95,0	-5,0	-13,0	0,8	DNMU1104.. *DNMU33.*
A32S-PDYNL11	75079503	32,0	30	31	270	250	25,5	23,0	11,1	51,0	95,0	-5,0	-11,0	1,5	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

For	Insert key	Insert pin	Insert screw	Insert shim	Shim screw
					
A20	1/4HEX-T09PX50	–	C03511-T09P	DAI110212	CA3507
A25/32	1/4HEX-T09PX50	PL1403-T09P	–	DAE110312	–

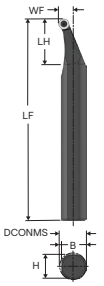
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A20	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-H9/64X50	T00-09P20
A25/32	1/4HEX-S-HANDLE	–	–	–	–

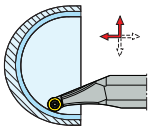
SRXCR/L – Toolholders for inserts RCMT – Metric



SRXCR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 564, 565
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A20M-SRXCR08	10102584	20,0	18	19	150	10,88	33,04	32,0	90,0	0,0	0,0	0,3	RC..0803..
A20M-SRXCL08	10102586	20,0	18	19	150	10,88	33,04	32,0	90,0	0,0	0,0	0,3	RC..0803..

Spare Parts, included in delivery

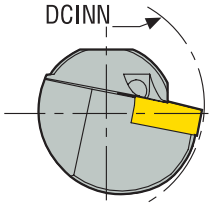
For	Insert key	Insert screw
		
..08	1/4HEX-T08PX50	C03007-T08P

Accessories

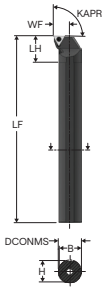
For	Bit holder	Nozzle
		
..08	1/4HEX-S-HANDLE	JET-CN03040020

STFCR/L – Toolholders for inserts TCGT, TCMT, TCMW – Metric

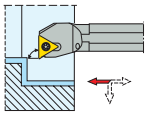




STFCR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 620
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A12M-STFCR11	00093843	12,0	11	12	150	9,0	21,0	16,0	91,0	0,0	-10,0	0,2	TC..1102.. *TC..21.5.*
A16R-STFCR11	00093845	16,0	15	15	200	11,0	25,0	20,0	91,0	0,0	-6,0	0,3	TC..1102.. *TC..21.5.*
A20S-STFCR11	00093847	20,0	18	19	250	13,0	25,0	25,0	91,0	0,0	-3,0	0,5	TC..1102.. *TC..21.5.*
A12M-STFCL11	00093844	12,0	11	12	150	9,0	21,0	16,0	91,0	0,0	-10,0	0,2	TC..1102.. *TC..21.5.*
A16R-STFCL11	00093846	16,0	15	15	200	11,0	25,0	20,0	91,0	0,0	-6,0	0,3	TC..1102.. *TC..21.5.*
A20S-STFCL11	00093848	20,0	18	19	250	13,0	25,0	25,0	91,0	0,0	-3,0	0,5	TC..1102.. *TC..21.5.*
A25R-STFCR16	00093857	25,0	23	24	200	17,0	36,0	32,0	91,0	0,0	-6,0	0,7	TC..16T3.. *TC..32.5.*
A32S-STFCR16	00093859	32,0	30	31	250	22,0	42,0	40,0	91,0	0,0	-10,0	1,3	TC..16T3.. *TC..32.5.*
A40T-STFCR16	00093861	40,0	37	39	300	27,0	50,0	50,0	91,0	0,0	-8,0	2,6	TC..16T3.. *TC..32.5.*
A25R-STFCL16	00093858	25,0	23	24	200	17,0	36,0	32,0	91,0	0,0	-6,0	0,7	TC..16T3.. *TC..32.5.*
A32S-STFCL16	00093860	32,0	30	31	250	22,0	42,0	40,0	91,0	0,0	-10,0	1,3	TC..16T3.. *TC..32.5.*
A40T-STFCL16	00093862	40,0	37	39	300	27,0	50,0	50,0	91,0	0,0	-8,0	2,6	TC..16T3.. *TC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
A12M-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A16R-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A20S-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A25R-...16	1/4HEX-T15PX50	C03509-T15P	–	–
A32S-...16	1/4HEX-T15PX50	C03509-T15P	STN160312	CA3510
A40T-...16	1/4HEX-T15PX50	C03509-T15P	STN160312	CA3510

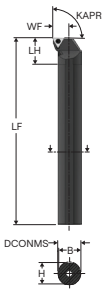
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A12M-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A16R-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A20S-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A25R-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	–	T00-15P30
A32S-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
A40T-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

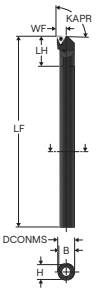
STFCR/L, STUCR/L – Toolholders for inserts TCMT, TCMW – Inch



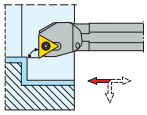
STFCR/L



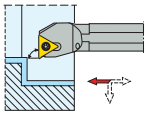
STUCR/L



STFCR/L
KAPR = 91,0 °



STUCR/L
KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 620
—For holder code key, see page(s) 22–23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A06-STFCR-2	02829668	0.375	0.315	0.345	6.000	0.250	1.400	0.512	91,0	0,0	-10,07	0.220	TC..1102.. *TC..21.5.*
A08-STFCR-2	02829676	0.500	0.425	0.463	6.000	0.312	1.550	0.625	91,0	0,0	-7,21	0.220	TC..1102.. *TC..21.5.*
A10-STFCR-2	02829686	0.625	0.531	0.578	8.000	0.406	1.250	0.812	91,0	0,0	-4,7	0.660	TC..1102.. *TC..21.5.*
A12-STFCR-2	02829694	0.750	0.650	0.707	10.000	0.500	0.750	1.000	91,0	0,0	-3,16	0.880	TC..1102.. *TC..21.5.*
A06-STUCR-2	02829669	0.375	0.532	0.579	6.000	0.406	0.625	0.500	93,0	0,0	-7,0	0.220	TC..1102.. *TC..21.5.*
A08-STUCR-2	02829678	0.500	0.532	0.579	8.000	0.406	0.625	0.625	93,0	0,0	-7,0	0.440	TC..1102.. *TC..21.5.*
A10-STUCR-2	02829688	0.625	0.532	0.579	10.000	0.406	0.625	0.812	93,0	0,0	-7,0	0.880	TC..1102.. *TC..21.5.*
A08-STUCL-2	02829677	0.500	0.532	0.579	8.000	0.406	0.625	0.630	93,0	0,0	-7,0	0.440	TC..1102.. *TC..21.5.*
A10-STUCL-2	02829687	0.625	0.532	0.579	10.000	0.406	0.625	0.812	93,0	0,0	-7,0	0.880	TC..1102.. *TC..21.5.*
A12-STUCR-3	02829695	0.750	0.708	0.729	10.000	0.500	0.750	1.000	93,0	0,0	-6,0	1.100	TC..16T3.. *TC..32.5.*
A16-STUCR-3	02829701	1.000	0.858	0.929	12.000	0.640	0.906	1.280	93,0	0,0	-4,0	2.200	TC..16T3.. *TC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P
..-3	1/4HEX-T15PX50	C04008-T15P

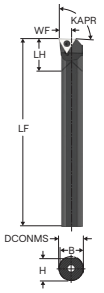
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
..-3	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

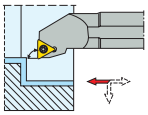
STFCR/L – Toolholders for inserts TCGT, TCGW, TCMT, TCMW – Inch



STFCR/L



KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For holder code key, see page(s) 22-23
—E = Solid carbide shank
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
E06-STFCR-2	00093116	0.375	0.315	0.350	6.000	0.250	1.063	0.500	91,0	0,0	-15,0	0.440	TC..1102.. *TC..21.5.*
E08-STFCR-2	00093118	0.500	0.465	0.465	8.000	0.313	1.063	0.625	91,0	0,0	-9,0	0.880	TC..1102.. *TC..21.5.*

Spare Parts, included in delivery

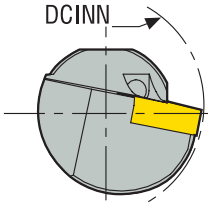
For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P

Accessories

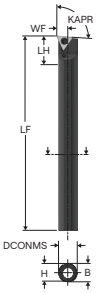
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

STLDR/L, STFDR/L – Toolholders for inserts TDAB, TDCH – Metric

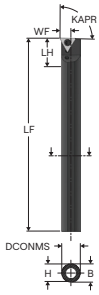




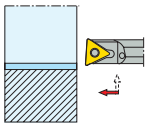
STLDR/L



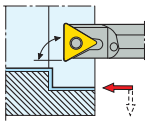
STFDR/L



STLDR/L
KAPR = 95,0 °



STFDR/L
KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 574
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A05D-STLDR06	00054775	5,0	5	5	60	3,0	9,7	6,8	95,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A06E-STLDR06	00054777	6,0	6	6	70	3,5	10,2	7,2	95,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A08F-STLDR06	00054780	8,0	8	8	80	4,5	11,2	8,8	95,0	0,0	-8,0	0,1	TD..06T0.. *TD..1.21.5.*
A05D-STLDL06	00054768	5,0	5	5	60	3,0	9,7	6,8	95,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A06E-STLDL06	00054776	6,0	6	6	70	3,5	10,2	7,2	95,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A08F-STLDL06	00054778	8,0	8	8	80	4,5	11,2	8,8	95,0	0,0	-8,0	0,1	TD..06T0.. *TD..1.21.5.*
A05D-STFDR06	00054839	5,0	5	5	60	3,0	9,7	6,8	91,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A06E-STFDR06	00054841	6,0	6	6	70	3,5	10,2	7,2	91,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A08F-STFDR06	00054843	8,0	8	8	80	4,5	11,2	8,8	91,0	0,0	-8,0	0,1	TD..06T0.. *TD..1.21.5.*
A05D-STFDL06	00054810	5,0	5	5	60	3,0	9,7	6,8	91,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A06E-STFDL06	00054840	6,0	6	6	70	3,5	10,2	7,2	91,0	0,0	-12,0	0,1	TD..06T0.. *TD..1.21.5.*
A08F-STFDL06	00054842	8,0	8	8	80	4,5	11,2	8,8	91,0	0,0	-8,0	0,1	TD..06T0.. *TD..1.21.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
...06	1/4HEX-T06PX50	C82204-T06P

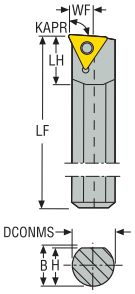
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	0.5NM	T00-06P	T00-06P05

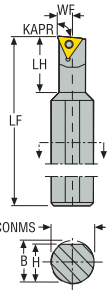
STLDR/L, STFDR/L – Toolholders for inserts TDAB, TDCH – Inch



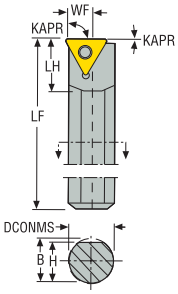
STLDR



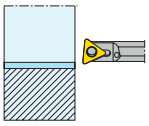
XX408.STLDR



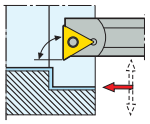
STFDR



STLDR/L
KAPR = 95,0 °



STFDR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 574
—For holder code key, see page(s) 22-23
—Bar descriptions that begin with H denotes heavy metal construction.
—For ISO attribute explanation, see page 82

CTWS



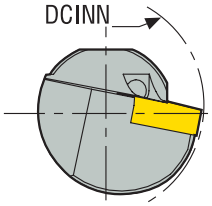
Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S04-STLDR-1.2	00057658	0.250	0.235	0.250	4.000	0.165	0.394	0.290	95,0	0,0	-12,0	0.220	TD..06T0.. *TD..1.21.5.*
S05-STLDR-1.2	00057659	0.312	0.295	0.295	4.000	0.194	–	0.350	95,0	0,0	-12,0	0.220	TD..06T0.. *TD..1.21.5.*
H04STLDR-1.2	00057661	0.250	0.235	0.250	4.000	0.165	0.394	0.290	95,0	0,0	-12,0	0.220	TD..06T0.. *TD..1.21.5.*
H05STLDR-1.2	00057662	0.312	0.295	0.313	6.000	0.194	0.394	0.350	95,0	0,0	-8,0	0.440	TD..06T0.. *TD..1.21.5.*
S0408-STLDR-1.2	00057664	0.500	0.480	0.480	3.250	0.175	1.250	0.300	95,0	0,0	-12,0	0.220	TD..06T0.. *TD..1.21.5.*
H0408STLDR-1.2	00057666	0.500	0.480	0.500	3.250	0.175	1.250	0.300	95,0	0,0	-12,0	0.440	TD..06T0.. *TD..1.21.5.*
S05-STFDR-1.2	00057667	0.313	0.295	0.295	4.000	0.194	–	0.350	90,0	0,0	-12,0	0.220	TD..1.21.5.

Spare Parts, included in delivery

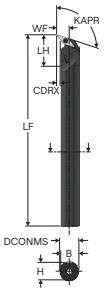
For	Insert key	Insert screw
		
..-1.2	1/4HEX-T06PX50	CS120

SVQBR/L, SVUBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW, VCGT – Metric

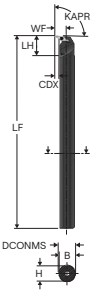




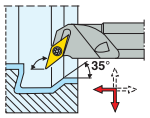
SVQBR/L



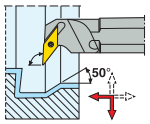
SVUBR/L



SVQBR/L
KAPR = 107,5 °



SVUBR/L
KAPR = 93,0 °



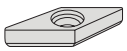
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 584, 613, 621
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A16R-SVQBR11	00093873	16,0	15	15	200	13,0	25,0	4,5	22,0	107,5	0,0	-7,0	0,3	VB..1102.. *VB..21.5.*
A20S-SVQBR11	00093875	20,0	18	19	250	15,0	25,0	4,5	27,0	107,5	0,0	-6,0	0,3	VB..1102.. *VB..21.5.*
A25T-SVQBR11	00093877	25,0	23	23	300	18,0	35,0	5,0	33,0	107,5	0,0	-4,0	1,0	VB..1102.. *VB..21.5.*
A16R-SVQBL11	00093874	16,0	15	15	200	13,0	25,0	4,5	22,0	107,5	0,0	-7,0	0,3	VB..1102.. *VB..21.5.*
A20S-SVQBL11	00093876	20,0	18	19	250	15,0	25,0	4,5	27,0	107,5	0,0	-6,0	0,5	VB..1102.. *VB..21.5.*
A25T-SVQBL11	00093878	25,0	23	23	300	18,0	35,0	5,0	33,0	107,5	0,0	-4,0	1,0	VB..1102.. *VB..21.5.*
A25S-SVQBR16	00030970	25,0	23	24	250	17,0	65,0	4,0	32,0	107,5	0,0	-8,0	0,8	VB..1604-VC..1604 *VB..33.-VC..33.*
A32T-SVQBR16	00030971	32,0	30	31	300	22,0	70,0	5,5	40,0	107,5	0,0	-8,0	1,6	VB..1604-VC..1604 *VB..33.-VC..33.*
A40U-SVQBR16	00030974	40,0	37	39	350	27,0	80,0	6,5	50,0	107,5	0,0	-8,0	2,9	VB..1604-VC..1604 *VB..33.-VC..33.*
A25S-SVQBL16	00030977	25,0	23	24	250	17,0	65,0	4,0	32,0	107,5	0,0	-8,0	0,8	VB..1604-VC..1604 *VB..33.-VC..33.*
A32T-SVQBL16	00030979	32,0	30	31	300	22,0	70,0	5,5	40,0	107,5	0,0	-8,0	1,5	VB..1604-VC..1604 *VB..33.-VC..33.*
A40U-SVQBL16	00030983	40,0	37	39	350	27,0	80,0	6,5	50,0	107,5	0,0	-8,0	2,9	VB..1604-VC..1604 *VB..33.-VC..33.*
A16R-SVUBR11	00093867	16,0	15	15	200	13,0	25,0	4,5	22,0	93,0	0,0	-7,0	0,3	VB..1102.. *VB..21.5.*
A20S-SVUBR11	00093869	20,0	18	19	250	15,0	25,0	4,5	27,0	93,0	0,0	-5,0	0,5	VB..1102.. *VB..21.5.*
A25T-SVUBR11	00093871	25,0	23	23	300	18,0	35,0	5,0	33,0	93,0	0,0	-3,0	1,0	VB..1102.. *VB..21.5.*
A16R-SVUBL11	00093868	16,0	15	15	200	13,0	25,0	4,5	22,0	93,0	0,0	-7,0	0,3	VB..1102.. *VB..21.5.*
A20S-SVUBL11	00093870	20,0	18	19	250	15,0	25,0	4,5	27,0	93,0	0,0	-5,0	0,5	VB..1102.. *VB..21.5.*
A25T-SVUBL11	00093872	25,0	23	23	300	18,0	35,0	5,0	33,0	93,0	0,0	-3,0	1,0	VB..1102.. *VB..21.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
A16R-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A20S-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A25S-...16	1/4HEX-T15PX50	C03510-T15P	171.19-620	CA3507
A25T-...11	1/4HEX-T07PX50	C02506-T07P	–	–
A32T-...16	1/4HEX-T15PX50	C03510-T15P	171.19-620	CA3507
A40U-...16	1/4HEX-T15PX50	C03510-T15P	171.19-620	CA3507

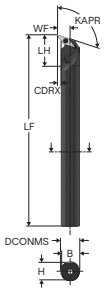
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
A16R-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A20S-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A25S-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
A25T-...11	1/4HEX-S-HANDLE	0.9NM	T00-07P	–	T00-07P09
A32T-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30
A40U-...16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

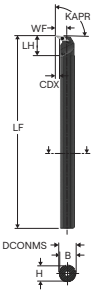
SVQBR/L, SVUBR/L – Toolholders for inserts VBGT, VBMT – Inch



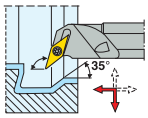
SVQBR/L



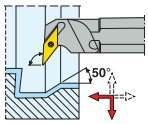
SVUBR/L



SVQBR
KAPR = 107,5 °



SVUBR/L
KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 583, 584
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A12-SVQBR-2	00002730	0.750	0.709	0.728	10.000	1.125	1.429	0.177	1.125	107,5	0,0	-5,0	1.320	VB..1102.. *VB..21.5.*
A10-SVUBR-2	00002696	0.625	0.532	0.602	10.000	0.840	1.240	0.177	0.840	93,0	0,0	-7,0	0.660	VB..1102.. *VB..21.5.*
A12-SVUBR-2	00002698	0.750	0.709	0.728	10.000	1.125	1.429	0.177	1.125	93,0	0,0	-5,0	1.100	VB..1102.. *VB..21.5.*
A16-SVUBR-2	00002725	1.000	0.866	0.933	12.000	1.500	1.921	0.177	1.500	93,0	0,0	-3,0	2.430	VB..1102.. *VB..21.5.*
A12-SVUBL-2	00002703	0.750	0.709	0.728	10.000	1.125	1.429	0.177	1.125	93,0	0,0	-5,0	1.320	VB..1102.. *VB..21.5.*

Spare Parts, included in delivery

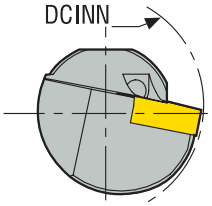
For	Insert key	Insert screw
		
..-2	1/4HEX-T07PX50	C02506-T07P

Accessories

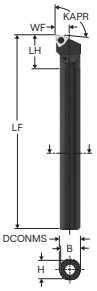
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-2	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

SWLCR/L – Toolholders for inserts WCMT – Metric

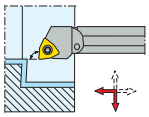




SWLCR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 586
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
A16M-SWLCR06	75034418	16,0	15	16	150	11,0	21,0	20,0	95,0	0,0	-5,0	0,3	WC..06T3.. *WC..32.5.*
A20Q-SWLCR06	75055235	20,0	18	19	180	13,0	37,0	25,0	95,0	0,0	-5,0	0,4	WC..06T3.. *WC..32.5.*
A16M-SWLCL06	75034442	16,0	15	16	150	11,0	21,0	20,0	95,0	0,0	-5,0	0,3	WC..06T3.. *WC..32.5.*
A20Q-SWLCL06	75055236	20,0	18	19	180	13,0	37,0	25,0	95,0	0,0	-5,0	0,4	WC..06T3.. *WC..32.5.*

Spare Parts, included in delivery

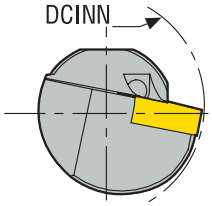
For	Insert key	Insert screw
		
...06	1/4HEX-T15PX50	C03508-T15P

Accessories

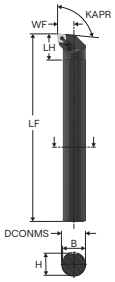
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...06	1/4HEX-S-HANDLE	3.0NM	T00-15P	T00-15P30

MCLNR/L – Toolholders for inserts CNGA, CNGG, CNMA, CNMG, CNMM, CNMN – Metric

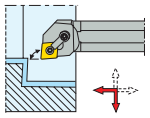




MCLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25S-MCLNR12	75002242	25,0	23	24	250	17,0	40,0	32,0	95,0	-5,0	-14,0	0,9	CN..1204.. *CN..43.*
S32T-MCLNR12	75002244	32,0	30	31	300	22,0	50,0	40,0	95,0	-5,0	-14,0	1,8	CN..1204.. *CN..43.*
S40U-MCLNR12	75071545	40,0	37	39	350	27,0	50,0	50,0	95,0	-5,0	-14,0	3,3	CN..1204.. *CN..43.*
S25S-MCLNL12	75002243	25,0	23	24	250	17,0	40,0	32,0	95,0	-5,0	-14,0	0,9	CN..1204.. *CN..43.*
S32T-MCLNL12	75002245	32,0	30	31	300	22,0	50,0	40,0	95,0	-5,0	-14,0	1,8	CN..1204.. *CN..43.*
S40U-MCLNL12	75002247	40,0	37	39	350	27,0	50,0	50,0	95,0	-5,0	-14,0	3,3	CN..1204.. *CN..43.*
S50V-MCLNR16	00018830	50,0	47	49	400	35,0	70,0	63,0	95,0	-5,0	-14,0	5,9	CN..1606.. *CN..54.*
S50V-MCLNL16	00018816	50,0	47	49	400	35,0	70,0	63,0	95,0	-5,0	-14,0	5,9	CN..1606.. *CN..54.*
S50V-MCLNR19	00018833	50,0	47	49	400	35,0	70,0	63,0	95,0	-5,0	-14,0	5,9	CN..1906.. *CN..64.*
S50V-MCLNL19	00018820	50,0	47	49	400	35,0	70,0	63,0	95,0	-5,0	-14,0	5,8	CN..1906.. *CN..64.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert/Clamp key	Insert pin	Insert shim	Shim/clamp key	Shim pin
							
-...16	MC12	LD8030-T25P	–	–	CSN160412	1/4HEX-T25PX50	MN1515-T15P
-...19	MC12	LD8030-T25P	–	–	CSN190412	1/4HEX-T25PX50	MN1925-T25P
S25S-...12	MC20	LD6020-T15P	1/4HEX-T15PX50	MN1215S-T15P	–	–	–
S32T-...12	MC20	LD6020-T15P	–	–	CSN120412	1/4HEX-T15PX50	MN1215R-T15P
S40U-...12	MC20	LD6020-T15P	–	–	CSN120412	1/4HEX-T15PX50	MN1215R-T15P

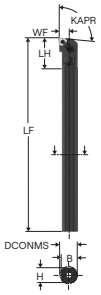
Accessories

For	Bit holder	Insert clamping torque	Plug	Replacement blade	Shim key	Shim screw	Torque key
							
-...16	1/4HEX-S-HANDLE	6.0NM	P4	T00T-25P	1/4HEX-T15PX50	CS8016-T15P	T00T-25P60
-...19	1/4HEX-S-HANDLE	6.0NM	P4	T00T-25P	–	–	T00T-25P60
S25S-...12	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	–	–	T00-15P30
S32T-...12	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	–	CS6313-T15P	T00-15P30
S40U-...12	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	–	CS6313-T15P	T00-15P30

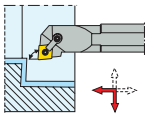
MCLNR/L – Toolholders for inserts CNGA, CNGP, CNMA, CNMG, CNMM, CNMN, CNMP – Inch



MCLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A16-MCLNR-4	00012116	1.000	0.921	0.961	12.000	0.640	1.260	1.280	95,0	-5,0	-14,0	2.430	CN..1204.. *CN..43.*
A20-MCLNR-4	00041050	1.250	1.171	1.211	14.000	0.765	2.134	1.530	95,0	-5,0	-14,0	4.410	CN..1204.. *CN..43.*
A24-MCLNR-4	00041052	1.500	0.902	1.461	14.000	0.890	2.224	1.780	95,0	-5,0	-12,0	6.170	CN..1204.. *CN..43.*
A32-MCLNR-4	00002683	2.000	1.882	1.941	16.000	1.281	2.413	2.559	95,0	-5,0	-12,0	13.450	CN..1204.. *CN..43.*
A16-MCLNL-4	00012112	1.000	0.921	0.961	12.000	0.640	1.496	1.280	95,0	-5,0	-14,0	2.200	CN..1204.. *CN..43.*
A20-MCLNL-4	00041051	1.250	1.171	1.211	14.000	0.765	2.134	1.530	95,0	-5,0	-14,0	4.410	CN..1204.. *CN..43.*
A24-MCLNL-4	00041053	1.500	0.902	1.461	14.000	0.890	2.224	1.780	95,0	-5,0	-12,0	6.390	CN..1204.. *CN..43.*
A32-MCLNL-4	00002684	2.000	1.882	1.941	16.000	1.281	2.413	2.559	95,0	-5,0	-12,0	13.230	CN..1204.. *CN..43.*
A32-MCLNR-5	00012118	2.000	1.882	1.941	16.000	1.281	2.413	2.559	95,0	-5,0	-12,0	13.450	CN..1606.. *CN..54.*
A32-MCLNL-5	00012114	2.000	1.882	1.941	16.000	1.281	2.413	2.559	95,0	-5,0	-12,0	13.230	CN..1606.. *CN..54.*

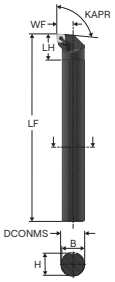
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
16/ 20-4	CL-20	XNS-47	CP-0800	NL-44	–
24/ 32-4	CL-20	XNS-47	CP-0800	NL-46	CSN120408
32-5	CL-12	XNS-510	CP-0800	NL-58	CSN160412

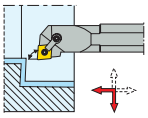
MCLNR/L – Toolholders for inserts CNGA, CNGP, CNMA, CNMG, CNMM, CNMN, CNMP – Inch



MCLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S12-MCLNR-3	00043201	0.750	0.709	0.728	10.000	0.500	1.750	1.000	95,0	-5,0	-14,0	1.320	CN..0903.. *CN..32.*
S12-MCLNL-3	00043196	0.750	0.709	0.728	10.000	0.500	1.750	1.000	95,0	-5,0	-14,0	1.320	CN..0903.. *CN..32.*

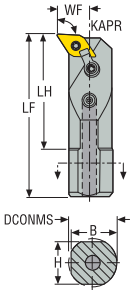
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin
			
..-3	CL-7	XNS-35	NL-33

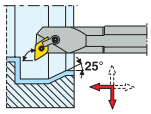
MDUNR/L – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMM, DNMP – Inch



MDUNR/L



KAPR = 93,0 °



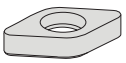
CTWS



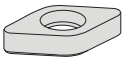
—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 22-23
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A24-MDUNR-4	00041064	1.500	1.339	1.419	14.000	1.125	2.141	2.250	93,0	-5,0	-10,0	6.610	DN..1504.. *DN..43.*
A32-MDUNR-4	00043209	2.000	1.880	1.940	16.000	1.375	2.756	3.000	93,0	-5,0	-10,0	13.010	DN..1504.. *DN..43.*
A24-MDUNL-4	00041065	1.500	1.339	1.419	14.000	1.125	2.141	2.250	93,0	-5,0	-10,0	6.170	DN..1504.. *DN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
A24	CL-12	XNS-59	CP-0800	NL-46	DSN150412
A32	CL-12	XNS-59	CP-0800	NL-46	DSN423

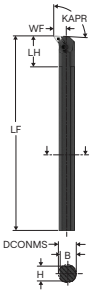
Accessories

For	Insert shim
	
A24	DSN423
A32	DSN150412

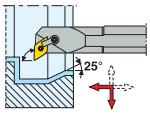
MDUNR/L – Toolholders for inserts DNGA, DNGM, DNGP, DNMA, DNMG, DNMM, DNMP, DNMU – Inch



MDUNR/L



KAPR = 93,0 °



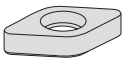
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 598, 599
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

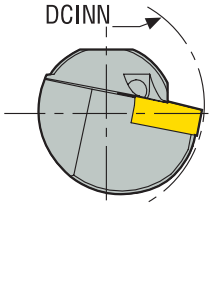
Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S12-MDUNL-3	75056415	0.750	0.689	0.708	10.000	0.562	0.800	0.980	93,0	-5,0	-14,0	1.320	DNMU1104.. *DNMU33.*
S16-MDUNR-3	75056416	1.000	0.846	0.866	12.000	0.750	0.906	1.300	93,0	-5,0	-14,0	2.650	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

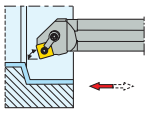
For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
S12	CL-6	XNS-36	NL-34L	DAE110312
S16	CL-20	XNS-46	NL-34L	DAE110312

MSKNR/L – Toolholders for inserts SNGA, SNGN, SNMA, SNMG, SNMM – Metric





KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S32T-MSKNR12	75002262	32,0	30	31	300	22,0	50,0	40,0	75,0	-5,0	-13,0	1,8	SN..1204.. *SN..43.*
S40U-MSKNR12	75002264	40,0	37	39	350	27,0	60,0	50,0	75,0	-5,0	-12,0	3,3	SN..1204.. *SN..43.*
S32T-MSKNL12	75002263	32,0	30	31	300	22,0	50,0	40,0	75,0	-5,0	-13,0	1,8	SN..1204.. *SN..43.*
S40U-MSKNL12	75002265	40,0	37	39	350	27,0	60,0	50,0	75,0	-5,0	-12,0	3,3	SN..1204.. *SN..43.*
S50V-MSKNR15	00018835	50,0	47	49	400	35,0	55,0	63,0	75,0	-5,0	-12,0	5,9	SN..1506.. *SN..54.*
S50V-MSKNL15	00018834	50,0	47	49	400	35,0	55,0	63,0	75,0	-5,0	-12,0	5,9	SN..1506.. *SN..54.*

Spare Parts, included in delivery

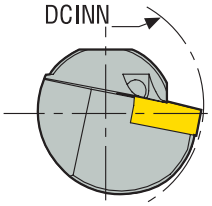
For	Cantilever clamp	Clamp key	Clamp screw	Insert shim	Shim/clamp key	Shim pin
						
...12	MC20	–	LD6020-T15P	SSN120412	1/4HEX-T15PX50	MN1215R-T15P
...15	MC12	1/4HEX-T25PX50	LD8025-T25P	SSN150412	–	MN1515-T15P

Accessories

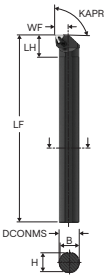
For	Bit holder	Insert clamping torque	Plug	Replacement blade	Shim key	Shim screw	Torque key
							
...12	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	–	CS6313-T15P	T00-15P30
...15	1/4HEX-S-HANDLE	6.0NM	P4	T00T-25P	1/4HEX-T15PX50	CS8016-T15P	T00T-25P60

MTFNR/L – Toolholders for inserts TNGA, TNMA, TNMG, TNMM – Metric

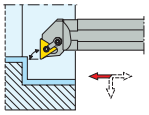




MTFNR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609
—For holder code key, see page(s) 20-21
—Shim TSN160412 for insert TN..1603.., to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S32T-MTFNR16	75002272	32,0	30	31	300	22,0	50,0	40,0	91,0	-5,0	-14,0	1,8	TN..1604.. *TN..33.*
S32T-MTFNL16	75002273	32,0	30	31	300	22,0	50,0	40,0	91,0	-5,0	-14,0	1,8	TN..1604.. *TN..33.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert shim	Shim/clamp key	Shim pin
					
...16	MC06	LD5020-T09P	TSN160312	1/4HEX-T09PX50	MN0909L-T09P

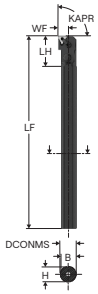
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim screw	Torque key
					
...16	1/4HEX-S-HANDLE	2.0NM	T00-09P	CS5008-T09P	T00-09P20

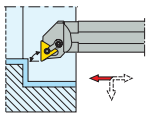
MTFNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTFNR/L



KAPR = 91,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 611
—For holder code key, see page(s) 22–23
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A16-MTFNR-3	00041090	1.000	0.866	0.933	12.000	0.640	1.924	1.280	91,0	-5,0	-12,0	2.200	TN..1604.. *TN..33.*
A20-MTFNR-3	00041092	1.250	0.472	0.571	14.000	0.765	1.902	1.530	91,0	-5,0	-12,0	4.850	TN..1604.. *TN..33.*
A24-MTFNR-4	00041094	1.500	1.339	1.419	14.000	1.031	1.969	2.559	91,0	-5,0	-10,0	6.170	TN..2204.. *TN..43.*
A32-MTFNR-4	00041098	2.000	1.880	1.940	16.000	1.292	2.203	2.559	91,0	-5,0	-8,0	13.010	TN..2204.. *TN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
..-3	CL-7	XNS-35	CP-0800	NL-33L	–
..-4	CL-9	XNS-59	CP-0800	NL-46	TSN220412

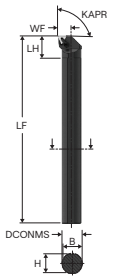
Accessories

For	Insert shim
	
..-3	–
..-4	TSNS220316

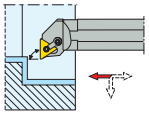
MTFNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTFNR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S12-MTFNR-3	00043212	0.750	0.650	0.707	10.000	0.500	1.750	1.000	91,0	-5,0	-14,0	1.320	TN..1604.. *TN..33.*

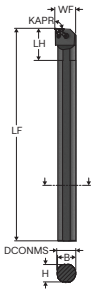
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin
			
..-3	CL-7	XNS-35	NL-33L

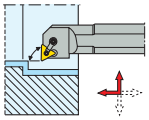
MTUNR/L – Toolholders for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMX – Inch



MTUNR/L



KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S20-MTUNR-3	00043220	1.250	1.142	1.205	14.016	0.765	2.122	1.530	93,0	-5,0	-11,0	5.070	TN..1603.. *TN..32.*

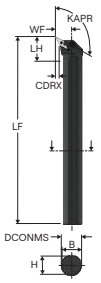
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
S20-MTUNR-3	CL-7	XNS-35	NL-34	TSN160312

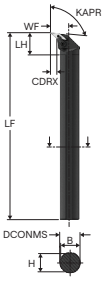
MVPNR/L, MVLNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric



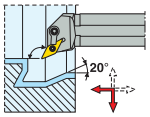
MVPNR/L



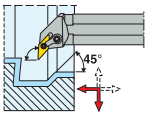
MVLNR/L



MVPNR/L
KAPR = 117,5 °



MVLNR/L
KAPR = 95,0 °



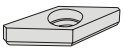
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
S32T-MVPNR16	75002282	32,0	30	31	300	27,0	50,0	10,0	46,0	117,5	-5,0	-12,0	1,8	VN..1604.. *VN..33.*
S32T-MVPNL16	75002283	32,0	30	31	300	27,0	50,0	10,0	46,0	117,5	-5,0	-12,0	1,8	VN..1604.. *VN..33.*
S32T-MVLNR16	75002280	32,0	30	31	300	30,0	50,0	13,0	48,0	95,0	-5,0	-12,0	1,8	VN..1604.. *VN..33.*
S32T-MVLNL16	75002281	32,0	30	31	300	30,0	50,0	13,0	48,0	95,0	-5,0	-12,0	1,8	VN..1604.. *VN..33.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert shim	Shim/clamp key	Shim pin
					
...16	MC20	LD6021-T09P	VSN160316	1/4HEX-T09PX50	MN0909L-T09P

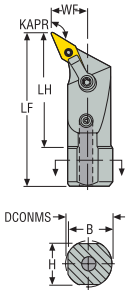
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...16	1/4HEX-S-HANDLE	2.0NM	T00-09P	T00-09P20

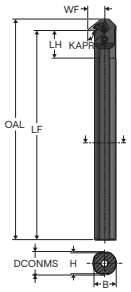
MVPNR/L, MVLNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMN, VNMP – Inch



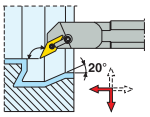
MVPNR/L



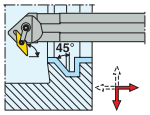
MVLNR/L



MVPNR/L
KAPR = 117,5 °



MVLNR/L
KAPR = 95,0 °



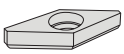
CTWS



–Right-hand version shown
–For inserts program, see page(s) 585, 586, 614
–For holder code key, see page(s) 22-23
–For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	OAL	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch				lbs	
A20-MVPNR-3	00041126	1.250	1.142	1.196	14.000	–	0.875	3.000	1.750	117,5	-5,0	-12,0	4.410	VN..1604.. *VN..33.*
A32-MVPNR-3	00041128	2.000	1.880	1.940	16.000	–	1.250	3.356	2.500	117,5	-5,0	-12,0	12.570	VN..1604.. *VN..33.*
A20-MVPNL-3	00041127	1.250	1.142	1.196	14.000	–	0.875	3.000	1.750	117,5	-5,0	-12,0	4.190	VN..1604.. *VN..33.*
A32-MVPNL-3	00041129	2.000	1.880	1.940	16.000	–	1.250	3.356	2.500	117,5	-5,0	-12,0	12.570	VN..1604.. *VN..33.*
A24-MVLNR-3	00041118	1.500	1.339	1.419	14.000	14.795	1.125	2.620	2.248	95,0	-5,0	-12,0	6.830	VN..1604.. *VN..33.*
A24-MVLNL-3	00041119	1.500	1.339	1.419	14.000	14.795	1.125	2.620	2.248	95,0	-5,0	-12,0	7.720	VN..1604.. *VN..33.*

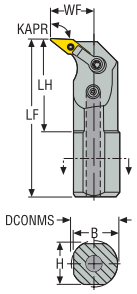
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
MVLNR/L	CL-20	XNS-47	CP-0800	NL-34L	VSN160316
MVPNR/L	CL-30	XNS-58	CP-0800	NL-34L	VSN160316

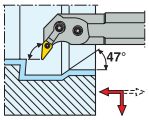
MVUNR/L – Toolholders for inserts VNGA, VNGM, VNGP, VNMA, VNMG, VNMN, VNMP – Inch



MVUNR/L



KAPR = 93,0 °



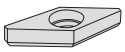
—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 22-23
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A20-MVUNR-3	00041106	1.250	1.142	1.196	14.000	1.125	1.969	2.250	93,0	-5,0	-12,0	4.410	VN..1604.. *VN..33.*
A24-MVUNR-3	00041108	1.500	1.339	1.419	14.000	1.250	1.969	2.062	93,0	-5,0	-12,0	6.390	VN..1604.. *VN..33.*
A32-MVUNR-4	00041112	2.000	1.880	1.940	16.000	1.625	1.969	3.250	93,0	-5,0	-12,0	13.450	VN..2204.. *VN..43.*

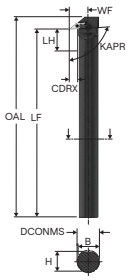
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
..-3	CL-30	XNS-510	CP-0800	NL-34L	VSN160316
..-4	CL-30	XNS-510	CP-0800	NL-46	VSN220412

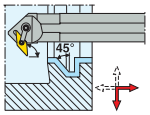
MVYNR/L – Toolholders for inserts VNGA, VNGG, VNGM, VNMA, VNMG – Metric



MVYNR/L



KAPR = 95,0 °



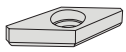
CTWS



—Right-hand version shown
—For inserts program, see page(s) 585, 586, 614
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	OAL	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm				kg	
S32T-MVYNR16	75002284	32,0	30	31	320	301	29,88	50,0	13,0	48,0	95,0	-5,0	-12,0	2,0	VN..1604.. *VN..33.*
S32T-MVYNL16	75002285	32,0	30	31	320	300	30,0	50,0	13,0	48,0	95,0	-5,0	-12,0	2,0	VN..1604.. *VN..33.*

Spare Parts, included in delivery

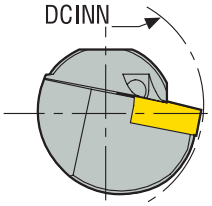
For	Cantilever clamp	Clamp screw	Insert shim	Shim/clamp key	Shim pin
					
...16	MC20	LD6021-T09P	VSN160316	1/4HEX-T09PX50	MN0909L-T09P

Accessories

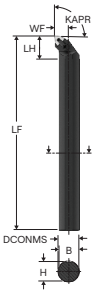
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...16	1/4HEX-S-HANDLE	2.0NM	T00-09P	T00-09P20

MWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric

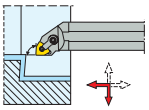




MWLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 20–21
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25S-MWLNR08	75002963	25,0	23	24	250	17,0	40,0	32,0	95,0	-5,0	-11,0	0,9	WN..0804.. *WN..43.*
S32T-MWLNR08	75002965	32,0	30	31	300	22,0	50,0	40,0	95,0	-5,0	-14,0	1,8	WN..0804.. *WN..43.*
S40U-MWLNR08	75002967	40,0	37	39	350	27,0	50,0	50,0	95,0	-5,0	-12,0	3,2	WN..0804.. *WN..43.*
S25S-MWLNL08	75002964	25,0	23	24	250	17,0	40,0	32,0	95,0	-5,0	-11,0	0,9	WN..0804.. *WN..43.*
S32T-MWLNL08	75002966	32,0	30	31	300	22,0	50,0	40,0	95,0	-5,0	-14,0	1,8	WN..0804.. *WN..43.*
S40U-MWLNL08	75002968	40,0	37	39	350	27,0	50,0	50,0	95,0	-5,0	-12,0	3,2	WN..0804.. *WN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert/Clamp key	Insert pin	Insert shim	Shim/clamp key	Shim pin
							
S25	MC20	LD6020-T15P	1/4HEX-T15PX50	MN1215S-T15P	–	–	–
S32/S40	MC21	LD6025-T15P	–	–	MWN080412	1/4HEX-T15PX50	MN1215T-T15P

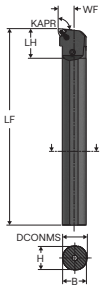
Accessories

For	Bit holder	Insert clamping torque	Plug	Replacement blade	Torque key
					
S25	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	T00-15P30
S32/S40	1/4HEX-S-HANDLE	3.0NM	P3	T00-15P	T00-15P30

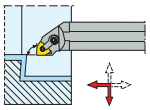
MWLNR/L – Toolholders for inserts WNGA, WNGP, WNMA, WNMG, WNMM, WNMP – Inch



MWLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 22–23
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
A32-MWLNR-4	00014792	2.000	1.882	1.941	16.000	1.281	2.230	2.559	95,0	-5,0	-12,0	13.230	WN..0804.. *WN..43.*
A32-MWLNL-4	00014793	2.000	1.882	1.941	16.000	1.281	2.230	2.559	95,0	-5,0	-12,0	13.450	WN..0804.. *WN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Coolant port	Insert pin	Insert shim
					
..-4	CL-20	XNS-47	CP-0800	NL-46	MWN080412

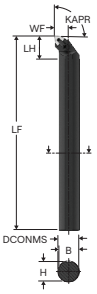
Accessories

For	Insert pin	Insert shim
		
..-4	NL-46L	MWN080312

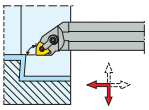
MWLNR/L – Toolholders for inserts WNGA, WNGP, WNMA, WNMG, WNMM, WNMP – Inch



MWLNR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For holder code key, see page(s) 22-23
—* Use the right shim & the right screw for the selected insert. For details, see page 98
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
S12-MWLNR-3	75051589	0.750	0.709	0.728	10.000	0.500	1.752	0.930	95,0	-5,0	-14,0	1.320	WN..0604.. *WN..33.*
S16-MWLNR-3	75051590	1.000	0.846	0.866	12.000	0.640	0.906	1.200	95,0	-5,0	-14,0	2.650	WN..0604.. *WN..33.*
S20-MWLNR-3	75051591	1.250	1.122	1.142	14.000	0.765	1.173	1.470	95,0	-5,0	-14,0	5.070	WN..0604.. *WN..33.*
S12-MWLNL-3	75051592	0.750	0.709	0.728	10.000	0.500	1.752	0.930	95,0	-5,0	-14,0	1.320	WN..0604.. *WN..33.*
S16-MWLNL-3	75051593	1.000	0.846	0.866	12.000	0.640	0.906	1.200	95,0	-5,0	-14,0	2.650	WN..0604.. *WN..33.*
S20-MWLNL-3	75051595	1.250	1.122	1.142	14.000	0.765	1.173	1.470	95,0	-5,0	-14,0	5.070	WN..0604.. *WN..33.*
S16-MWLNR-4	00043225	1.000	0.846	0.866	12.000	0.640	0.901	1.280	95,0	-5,0	-14,0	2.650	WN..0804.. *WN..43.*
S20-MWLNR-4	00043226	1.250	1.122	1.142	14.000	0.765	1.173	1.470	95,0	-5,0	-14,0	5.070	WN..0804.. *WN..43.*
S24-MWLNR-4	00043227	1.500	1.319	1.339	14.000	0.890	1.188	1.780	95,0	-5,0	-13,0	6.390	WN..0804.. *WN..43.*
S16-MWLNL-4	00043222	1.000	0.846	0.866	12.000	0.640	0.901	1.280	95,0	-5,0	-14,0	2.650	WN..0804.. *WN..43.*
S20-MWLNL-4	00043223	1.250	1.122	1.142	14.000	0.765	1.173	1.470	95,0	-5,0	-14,0	5.070	WN..0804.. *WN..43.*
S24-MWLNL-4	00043224	1.500	1.319	1.339	14.000	0.890	1.188	1.780	95,0	-5,0	-13,0	6.830	WN..0804.. *WN..43.*

Spare Parts, included in delivery

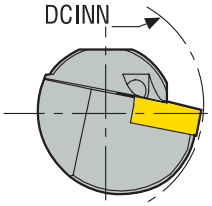
For	Cantilever clamp	Clamp screw	Insert pin	Insert shim
				
12/ 16-3	CL-6	XNS-36	NL-33L	–
16-4	XNS-47	CL-20	NL-44	–
20/ 24-4	CL-20	XNS-47	NL-46	MWN080412
20-3	CL-6	XNS-36	NL-34L	WSN060312

Accessories

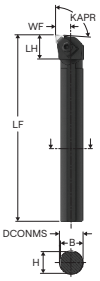
For	Insert pin	Insert shim
		
12/ 16-3	–	–
16-4	–	–
20/ 24-4	NL-46L	MWN080312
20-3	–	–

CCLNR/L – Toolholders for PCBN inserts CNMN – Metric

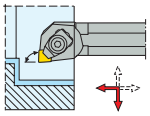




CCLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 596
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25R-CCLNR09	75069268	25,0	23	24	200	17,0	40,0	32,0	95,0	-6,0	-12,0	0,8	CN.N0903.. *CN.N32.*
S32S-CCLNR09	75069270	32,0	30	31	250	22,0	44,0	40,0	95,0	-6,0	-12,0	1,5	CN.N0903.. *CN.N32.*
S25R-CCLNL09	75069269	25,0	23	24	200	17,0	40,0	32,0	95,0	-6,0	-12,0	0,8	CN.N0903.. *CN.N32.*
S32S-CCLNL09	75069271	32,0	30	31	250	22,0	44,0	40,0	95,0	-6,0	-12,0	1,5	CN.N0903.. *CN.N32.*

Spare Parts, included in delivery

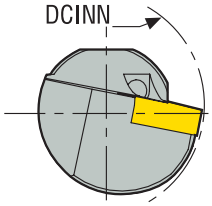
For	Cantilever clamp	Clamp key	Insert shim	Shim screw
				
...09	CC14	1/4HEX-H4.0X50	CCN090316	174.10-652-T07P

Accessories

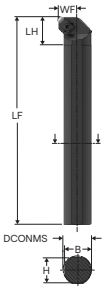
For	Bit holder	Shim key
		
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50

CRSNR/L – Toolholders for PCBN inserts RNGN, RNMN – Metric

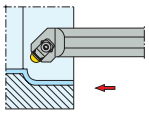




CRSNR/L



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 601, 620, 623
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25R-CRSNR06	75069272	25,0	23	24	200	17,0	37,0	32,0	45,0	-6,0	-12,0	0,8	RN.N0603.. *RN.N22.*
S32S-CRSNR06	75069278	32,0	30	31	250	22,0	40,0	40,0	45,0	-6,0	-12,0	1,6	RN.N0603.. *RN.N22.*
S40T-CRSNR06	75069280	40,0	37	39	300	27,0	40,0	50,0	45,0	-6,0	-12,0	2,8	RN.N0603.. *RN.N22.*
S25R-CRSNL06	75069273	25,0	23	24	200	17,0	37,0	32,0	45,0	-6,0	-12,0	0,8	RN.N0603.. *RN.N22.*
S32S-CRSNL06	75069279	32,0	30	31	250	22,0	40,0	40,0	45,0	-6,0	-12,0	1,6	RN.N0603.. *RN.N22.*
S40T-CRSNL06	75069281	40,0	37	39	300	27,0	40,0	50,0	45,0	-6,0	-12,0	2,8	RN.N0603.. *RN.N22.*
S32S-CRSNR09	75069286	32,0	30	31	250	22,0	40,0	40,0	45,0	-6,0	-12,0	1,5	RN.N0903.. *RN.N32.*
S40T-CRSNR09	75069276	40,0	37	39	300	27,0	43,0	50,0	45,0	-6,0	-12,0	2,8	RN.N0903.. *RN.N32.*
S32S-CRSNL09	75069287	32,0	30	31	250	22,0	40,0	40,0	45,0	-6,0	-12,0	1,5	RN.N0903.. *RN.N32.*
S40T-CRSNL09	75069277	40,0	37	39	300	27,0	43,0	50,0	45,0	-6,0	-12,0	2,8	RN.N0903.. *RN.N32.*

Spare Parts, included in delivery

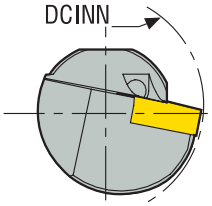
For	Cantilever clamp	Clamp key	Insert shim	Shim screw
				
...06	CC14	1/4HEX-H4.0X50	CRN0603M0	CS2507-T07P
...09	CC16	1/4HEX-H4.0X50	117.10-620	174.10-652-T07P

Accessories

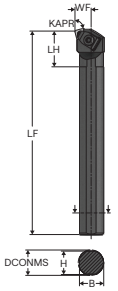
For	Bit holder	Shim key
		
...06	1/4HEX-S-HANDLE	1/4HEX-T07PX50
...09	1/4HEX-S-HANDLE	1/4HEX-T07PX50

CSKNR/L – Toolholders for PCBN inserts SNGF, SNGN, SNMN – Metric

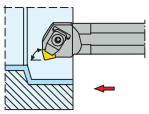




CSKNR/L



KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 604
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25R-CSKNR09	75069282	25,0	23	24	200	17,0	35,0	32,0	75,0	-6,0	-12,0	0,8	SN..0903.. *SN..32.*

Spare Parts, included in delivery

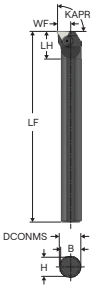
For	Cantilever clamp	Clamp key	Insert shim	Shim screw
				
S25R-CSKNR09	CC14	1/4HEX-H4.0X50	174.10-620	174.10-652-T07P

Accessories

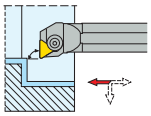
For	Bit holder	Shim key
		
S25R-CSKNR09	1/4HEX-S-HANDLE	1/4HEX-T07PX50

CTFPR/L – Toolholders for inserts TPGN, TPMM, TPMR, TPUN – Metric





KAPR = 91,0 °



–Right-hand version shown
–For inserts program, see page(s) 579, 579, 580, 581, 582, 612, 621
–For holder code key, see page(s) 20–21
–For ISO attribute explanation, see page 82

CTWS



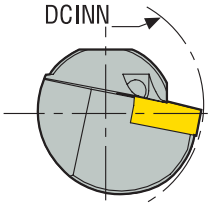
Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S16Q-CTFPR11	75007394	16,0	14	15	180	11,0	40,0	20,0	91,0	5,0	0,0	0,3	TP..1103.. *TP..22.*
S20R-CTFPR16	75006033	20,0	18	19	200	13,0	50,0	25,0	91,0	5,0	0,0	0,5	TP..1603.. *TP..32.*
S25S-CTFPR16	75006035	25,0	22	24	250	17,0	65,0	32,0	91,0	5,0	0,0	0,9	TP..1603.. *TP..32.*
S32T-CTFPR16	75006037	32,0	29	31	300	22,0	70,0	40,0	91,0	5,0	0,0	1,8	TP..1603.. *TP..32.*
S40U-CTFPR22	75000255	40,0	34	37	350	27,0	80,0	50,0	91,0	5,0	0,0	3,2	TP..2204.. *TP..43.*

Spare Parts, included in delivery

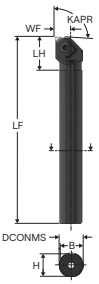
For	Chipbreaker	Clamp key	Clamp screw	Insert shim	Shim screw
					
S16Q	PT220	1/4HEX-H2.5X50	174.18-639	–	–
S20R	PT320	1/4HEX-H3.0X50	174.18-635	–	–
S25S	PT320	1/4HEX-H3.0X50	174.18-645	–	–
S32T	PT320	1/4HEX-H3.0X50	174.18-645	175.11-621	F94009-T09P
S40U	PT445	1/4HEX-H4.0X50	174.18-649	175.11-624	F94009-T09P

CTUNR/L – Toolholders for PCBN inserts TNGN, TNGX, TNMN, TNMX – Metric

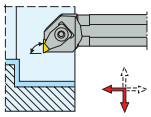




CTUNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610
—For holder code key, see page(s) 20-21
—Shim CTN110312 for insert TN.N110312 and TNMX110308S-WZ, to be ordered separately
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm				kg	
S25R-CTUNR11	75069290	25,0	23	24	200	17,0	40,0	32,0	93,0	-6,0	-10,0	0,8	TN..1103.. *TN..22.*
S32S-CTUNR11	75069292	32,0	30	31	250	22,0	40,0	40,0	93,0	-6,0	-10,0	1,5	TN..1103.. *TN..22.*
S25R-CTUNL11	75069291	25,0	23	24	200	17,0	40,0	32,0	93,0	-6,0	-10,0	0,8	TN..1103.. *TN..22.*
S32S-CTUNL11	75069293	32,0	30	31	250	22,0	40,0	40,0	93,0	-6,0	-10,0	1,5	TN..1103.. *TN..22.*

Spare Parts, included in delivery

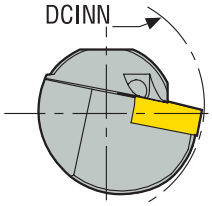
For	Cantilever clamp	Clamp key	Insert shim	Shim screw
				
...11	CC14	1/4HEX-H4.0X50	CTN110308	CS2507-T07P

Accessories

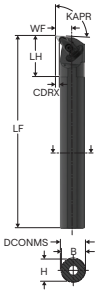
For	Bit holder	Shim key
		
...11	1/4HEX-S-HANDLE	1/4HEX-T07PX50

DDUNR/L..-C – Toolholders for PCBN inserts DNMA – Metric

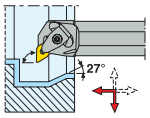




DDUNR/L..-C



KAPR = 93,0 °



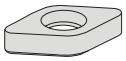
CTWS



– Right-hand version shown
– For inserts program, see page(s) 558, 559, 560, 561, 599
– For holder code key, see page(s) 20–21
– For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	CDRX	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm				kg	
A25R-DDUNR11-C	02598549	25,0	23	24	200	17,0	27,0	4,0	32,0	93,0	-6,0	-13,0	0,7	DNMA1104.. *DNMA33.*
A25R-DDUNL11-C	02598552	25,0	25	25	200	17,0	27,0	4,0	32,0	93,0	-6,0	-13,0	0,7	DNMA1104.. *DNMA33.*
A32S-DDUNL11-C	02598613	32,0	25	25	250	22,0	31,0	6,0	40,0	93,0	-5,0	-11,0	1,4	DNMA1104.. *DNMA33.*

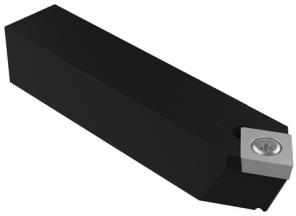
Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Plug screw	Shim screw	Spring
								
A25R-DDUNL11-C	1/4HEX-T10PX50	FP1508	L84017-T10P	CC09P-D11	DDN110310	–	C03007-T09P	S5608
A25R-DDUNR11-C	1/4HEX-T10PX50	FP1508	L84017-T10P	CC09P-D11	DDN110310	–	C03007-T09P	S5608
A32S-DDUNL11-C	1/4HEX-T10PX50	FP1508	L84017-T10P	CC09P-D11	DDN110310	P6SS4X4	C03007-T09P	S5608

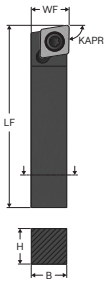
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
A25R-DDUNL11-C	1/4HEX-S-HANDLE	CC09P-SET	2.0NM	T00-09P	T00-10P20
A25R-DDUNR11-C	1/4HEX-S-HANDLE	CC09P-SET	2.0NM	T00-09P	T00-09P20
A32S-DDUNL11-C	1/4HEX-S-HANDLE	CC09P-SET	2.0NM	T00-09P	T00-10P20

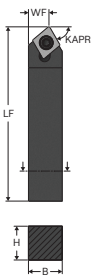
SCACL, SCECL – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric



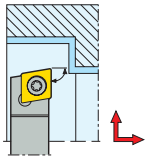
SCACL



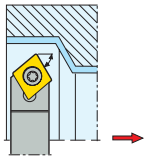
SCECL



SCACL
KAPR = 90,0 °



SCECL
KAPR = 60,0 °



CTWS



—Left-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 16-17
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm				kg	
SCACL1212D09	75011223	12	12	60	13,0	90,0	0,0	0,0	0,1	CC..09T3.. *CC..32.5.*
SCECL1010C06	75011225	10	10	50	6,2	60,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
SCACL	1/4HEX-T15PX50	C04008-T15P
SCECL	1/4HEX-T07PX50	C02506-T07P

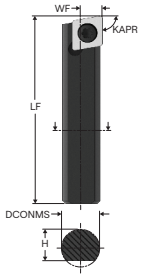
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
SCACL	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
SCECL	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

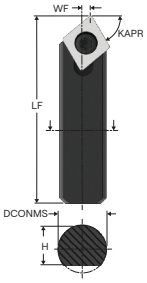
SCACL, SCECL – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



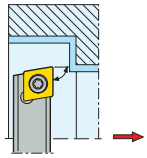
SCACL



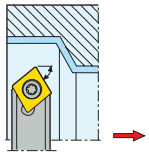
SCECL



SCACL
KAPR = 90,0 °



SCECL
KAPR = 60,0 °



CTWS



—Left-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 20–21
—For ISO attribute explanation, see page 82

Designation	Item number	H	DCONMS	LF	WF	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm				kg	
S08A-SCACL06	75011125	6	8,0	32	4,2	90,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S10C-SCACL06	75011127	8	10,0	50	5,2	90,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S12D-SCACL09	75011129	10	12,0	60	6,7	90,0	0,0	0,0	0,1	CC..09T3.. *CC..32.5.*
S08A-SCECL06	75011131	6	8,0	32	1,5	60,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S10C-SCECL06	75011133	8	10,0	50	2,4	60,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S12D-SCECL09	75011135	10	12,0	60	2,3	60,0	0,0	0,0	0,1	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
...09	1/4HEX-T15PX50	C04008-T15P
S08A-...06	1/4HEX-T07PX50	C02505-T07P
S10C-...06	1/4HEX-T07PX50	C02506-T07P
S12D-...06	1/4HEX-T15PX50	C04008-T15P

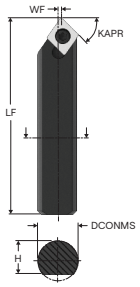
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
S08A-...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
S10C-...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
S12D-...06	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

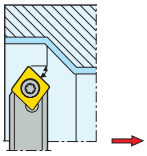
SCDCL – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric



SCDCL



KAPR = 45,0 °



—Left-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For holder code key, see page(s) 20-21
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	DCONMS	LF	WF	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm	mm	mm	mm				kg	
S08A-SCDCL06	75011161	6	8,0	32	0,3	45,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S10C-SCDCL06	75011137	8	10,0	50	1,2	45,0	0,0	0,0	0,1	CC..0602.. *CC..21.5.*
S12D-SCDCL09	75011163	10	12,0	60	0,5	45,0	0,0	0,0	0,1	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
...09	1/4HEX-T15PX50	C04008-T15P
S08A-...06	1/4HEX-T07PX50	C02505-T07P
S10C-...06	1/4HEX-T07PX50	C02506-T07P

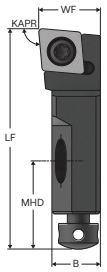
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
...09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35
S08A-...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
S10C-...06	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

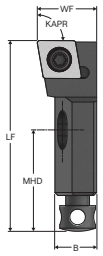
SCLCR/L, SCFCR/L, SCWCR/L – Cartridges for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch



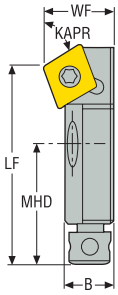
SCLCR/L

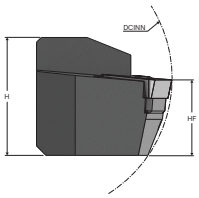


SCFCR/L



SCWCR/L





SCLCR/L
KAPR = 95,0 °



SCFCR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
SCLCR10CA-09	75011811	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCLCL10CA-09	00009143	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	95,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCLCR12CA-12	00013239	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	95,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*
SCLCL12CA-12	75606498	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	95,0	0,0	0,0	0,2 *0.440*	CC..1204.. *CC..43.*
SCFCR08CA-06	75029427	11 *0.433*	7 *0.276*	26 *1.024*	17 *0.669*	10,0 *0.394*	8,0 *0.315*	25,0 *0.984*	90,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCFCL08CA-06	00008880	11 *0.433*	7 *0.276*	26 *1.024*	17 *0.669*	10,0 *0.394*	8,0 *0.315*	25,0 *0.984*	90,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCFCR10CA-09	75011682	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	90,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCFCL10CA-09	75011810	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	90,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCFCR12CA-12	75011863	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*
SCFCL12CA-12	75011864	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Locking screw	Setting screw (axial)	Setting screw (radial)
					
-06	1/4HEX-T07PX50	C02505-T07P	179.17-698-T09P	179.17-683	179.17-684
-09	1/4HEX-T15PX50	C04008-T15P	179.17-696-T25P	179.17-680	179.17-686
-12	1/4HEX-T20PX50	C05010-T20P	179.17-697-T25P	179.17-680	179.17-687

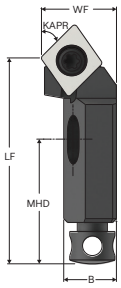
Accessories

For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Torque key
						
-06	1/4HEX-S-HANDLE	0.9NM	T09P-2	T00-07P	1.5SMS795	T00-07P09
-09	1/4HEX-S-HANDLE	3.5NM	T25P-7	T00-15P	2SMS795	T00-15P35
-12	1/4HEX-S-HANDLE	5.0NM	T25P-7	T00-20P	2SMS795	T00-20P50

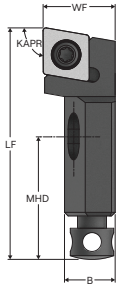
SCSCR/L, SCGCR/L – Cartridges for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch

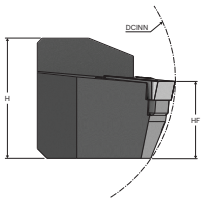


SCSCR/L



SCGCR/L

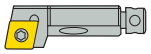




SCSCR/L
KAPR = 45,0 °



SCGCR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
SCSCR08CA-06	00008677	11 *0.433*	7 *0.276*	28 *1.102*	17 *0.669*	9,96 *0.392*	8,0 *0.315*	25,0 *0.984*	45,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCSCL08CA-06	00008877	11 *0.433*	7 *0.276*	28 *1.102*	17 *0.669*	9,96 *0.392*	8,0 *0.315*	25,0 *0.984*	45,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCSCR10CA-09	00034179	15 *0.591*	11 *0.433*	44 *1.732*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	45,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCSCR12CA-12	75011862	20 *0.787*	16 *0.630*	47 *1.850*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	45,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*
SCGCR08CA-06	00009129	11 *0.433*	7 *0.276*	32 *1.260*	17 *0.669*	9,96 *0.392*	8,0 *0.315*	25,0 *0.984*	90,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCGCL08CA-06	00008883	11 *0.433*	7 *0.276*	32 *1.260*	17 *0.669*	9,96 *0.392*	8,0 *0.315*	25,0 *0.984*	90,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCGCR10CA-09	00009131	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	90,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCGCR12CA-12	75011860	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*
SCGCL12CA-12	00045802	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Locking screw	Setting screw (axial)	Setting screw (radial)
					
-06	1/4HEX-T07PX50	C02505-T07P	179.17-698-T09P	179.17-683	179.17-684
-09	1/4HEX-T15PX50	C04008-T15P	179.17-696-T25P	179.17-680	179.17-686
-12	1/4HEX-T20PX50	C05010-T20P	179.17-697-T25P	179.17-680	179.17-687

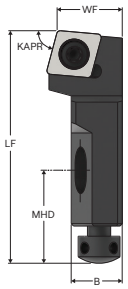
Accessories

For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Torque key
						
-06	1/4HEX-S-HANDLE	0.9NM	T09P-2	T00-07P	1.5SMS795	T00-07P09
-09	1/4HEX-S-HANDLE	3.5NM	T25P-7	T00-15P	2SMS795	T00-15P35
-12	1/4HEX-S-HANDLE	5.0NM	T25P-7	T00-20P	2SMS795	T00-20P50

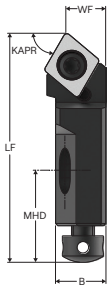
SCRCR/L, SCTCR/L – Cartridges for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch

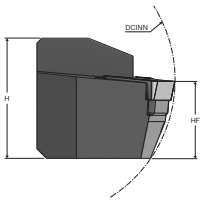


SCRCR/L

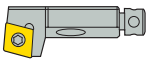


SCTCR/L

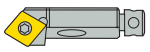




SCRCR/L
KAPR = 75,0 °



SCTCR/L
KAPR = 60,0 °



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
SCRCR10CA-09	00008684	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	75,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCRCL10CA-09	00008685	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	75,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCTCR08CA-06	00008891	11 *0.433*	7 *0.276*	26 *1.024*	17 *0.669*	6,0 *0.236*	8,0 *0.315*	25,0 *0.984*	60,0	0,0	0,0	0,1 *0.220*	CC..0602.. *CC..21.5.*
SCTCR10CA-09	00034258	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	8,96 *0.353*	10,0 *0.394*	40,0 *1.575*	60,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCTCL10CA-09	00008689	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	8,96 *0.353*	10,0 *0.394*	40,0 *1.575*	60,0	0,0	0,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
SCTCR12CA-12	00008705	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	12,96 *0.510*	12,0 *0.472*	50,0 *1.969*	60,0	0,0	0,0	0,1 *0.220*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Locking screw	Setting screw (axial)	Setting screw (radial)
					
-06	1/4HEX-T07PX50	C02505-T07P	179.17-698-T09P	179.17-683	179.17-684
-09	1/4HEX-T15PX50	C04008-T15P	179.17-696-T25P	179.17-680	179.17-686
-12	1/4HEX-T20PX50	C05010-T20P	179.17-697-T25P	179.17-680	179.17-687

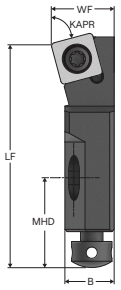
Accessories

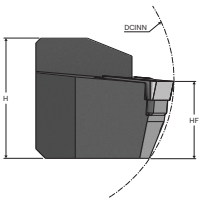
For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Torque key
						
-06	1/4HEX-S-HANDLE	0.9NM	T09P-2	T00-07P	1.5SMS795	T00-07P09
-09	1/4HEX-S-HANDLE	3.5NM	T25P-7	T00-15P	2SMS795	T00-15P35
-12	1/4HEX-S-HANDLE	5.0NM	T25P-7	T00-20P	2SMS795	T00-20P50

SSKCR/L – Cartridges for inserts SCGW, SCMT – Metric/ Inch

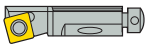


SSKCR/L





KAPR = 75,0 °



—Right-hand version shown
—For inserts program, see page(s) 567, 568, 603
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
SSKCR10CA-09	00009139	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	14,0 *0.551*	10,0 *0.394*	40,0 *1.575*	75,0	0,0	0,0	0,1 *0.220*	SC..09T3.. *SC..32.5.*
SSKCL10CA-09	75209709	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	14,0 *0.551*	10,0 *0.394*	40,0 *1.575*	75,0	0,0	0,0	0,1 *0.220*	SC..09T3.. *SC..32.5.*
SSKCR12CA-12	00009167	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	75,0	0,0	0,0	0,2 *0.440*	SC..1204.. *SC..43.*
SSKCR16CA-12	00009191	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	75,0	-4,0	0,0	0,2 *0.440*	SC..1204.. *SC..43.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Locking screw	Setting screw (axial)	Setting screw (radial)	Shim screw
							
.12..-12	1/4HEX-T20PX50	C05010-T20P	–	179.17-697-T25P	179.17-680	179.17-687	–
.16..-12	1/4HEX-T15PX50	C05012-T15P	110.19-621	179.17-693	179.17-680	179.17-685	CA5008
-09	1/4HEX-T15PX50	C04008-T15P	–	179.17-696-T25P	179.17-680	179.17-686	–

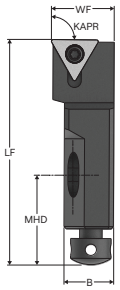
Accessories

For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Torque key
						
.12..-12	1/4HEX-S-HANDLE	5.0NM	T25P-7	T00-20P	2SMS795	T00-20P50
.16..-12	1/4HEX-S-HANDLE	5.0NM	5SMS795	T00-15P	2.5SMS795	T00-15P50
-09	1/4HEX-S-HANDLE	3.5NM	T25P-7	T00-15P	2SMS795	T00-15P35

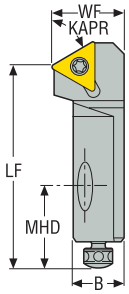
STFCR/L, STWCR/L, STSCR/L – Cartridges for inserts TCGT, TCMT, TCMW – Metric/ Inch



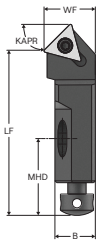
STFCR/L

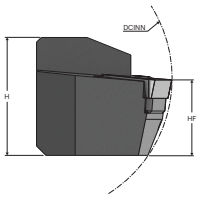


STWCR/L

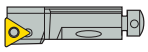


STSCR/L





STFCR/L
KAPR = 90,0 °



STSCR/L
KAPR = 45,0 °



–Right-hand version shown
–For inserts program, see page(s) 573, 574, 620
–For cartridge mounting information see page 123
–For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
STFCR10CA-11	00009136	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	90,0	0,0	0,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
STFCR12CA-11	00009166	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
STFCL10CA-11	00009146	15 *0.591*	11 *0.433*	50 *1.969*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	90,0	0,0	0,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
STFCR16CA-16	00009184	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	25,0 *0.984*	16,0 *0.630*	60,0 *2.362*	90,0	-2,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STFCL16CA-16	00009187	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	14,96 *0.589*	16,0 *0.630*	60,0 *2.362*	90,0	-2,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STSCR10CA-11	00009140	15 *0.591*	11 *0.433*	44 *1.732*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	45,0	0,0	0,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
STSCL10CA-11	00009155	15 *0.591*	11 *0.433*	44 *1.732*	20 *0.787*	13,96 *0.550*	10,0 *0.394*	40,0 *1.575*	45,0	0,0	0,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
STSCR12CA-16	00009171	20 *0.787*	16 *0.630*	47 *1.850*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	45,0	0,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STSCR16CA-16	00009192	25 *0.984*	20 *0.787*	53 *2.087*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	45,0	-6,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STSCL16CA-16	00009193	25 *0.984*	20 *0.787*	53 *2.087*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	45,0	-6,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Locking screw	Setting screw (axial)	Setting screw (radial)	Shim screw
							
..10..-11	1/4HEX-T07PX50	C02506-T07P	–	179.17-696-T25P	179.17-680	179.17-686	–
..12..-11	1/4HEX-T07PX50	C02506-T07P	–	179.17-697-T25P	179.17-680	179.17-687	–
..12..-16	1/4HEX-T15PX50	C03509-T15P	–	179.17-697-T25P	179.17-680	179.17-687	–
..16..-16	1/4HEX-T15PX50	C03509-T15P	STN160312	179.17-693	179.17-680	179.17-685	CA3510

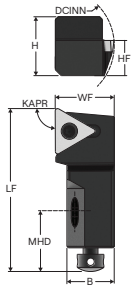
Accessories

For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Shim key	Torque key
							
..10..-11	1/4HEX-S-HANDLE	0.9NM	T25P-7	T00-07P	2SMS795	–	T00-07P09
..12..-11	1/4HEX-S-HANDLE	0.9NM	T25P-7	T00-07P	2SMS795	–	T00-07P09
..12..-16	1/4HEX-S-HANDLE	3.0NM	T25P-7	T00-15P	2SMS795	–	T00-15P30
..16..-16	1/4HEX-S-HANDLE	3.0NM	5SMS795	T00-15P	2.5SMS795	1/4HEX-H9/64X50	T00-15P30

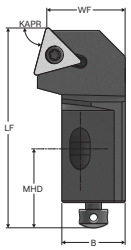
STGCR/L, STRCR/L, STTCR/L – Cartridges for inserts TCGT, TCGW, TCMT, TCMW – Metric/ Inch



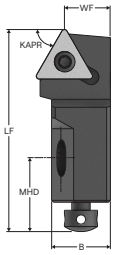
STGCR/L

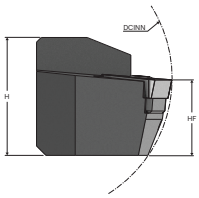


STRCR/L



STTCR/L

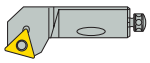




STGCR/L
KAPR = 90,0 °



STRCR/L
KAPR = 75,0 °



STTCR/L
KAPR = 60,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*	
STGCR12CA-16	00009175	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,1 *0.220*	TC..16T3.. *TC..32.5.*
STGCR16CA-16	00009196	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	90,0	-5,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STGCL12CA-16	00009174	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	19,96 *0.786*	12,0 *0.472*	50,0 *1.969*	90,0	0,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STGCL16CA-16	00009197	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	90,0	-5,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STGCL16CA-22	02600181	20 *0.787*	18 *0.689*	55 *2.165*	25 *0.984*	25,0 *0.984*	16,0 *0.630*	50,0 *1.969*	90,0	0,0	0,0	0,2 *0.440*	TC..2204.. *TC..43.*
STRCR16CA-16	00008747	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	75,0	-5,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STRCL16CA-16	00008750	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	24,96 *0.983*	16,0 *0.630*	60,0 *2.362*	75,0	-5,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STRCL16CA-22	02585320	20 *0.787*	18 *0.689*	63 *2.480*	25 *0.984*	25,0 *0.984*	16,0 *0.630*	60,0 *2.362*	75,0	0,0	0,0	0,2 *0.440*	TC..2204.. *TC..43.*
STTCR12CA-16	00009172	20 *0.787*	16 *0.630*	55 *2.165*	20 *0.787*	12,96 *0.510*	12,0 *0.472*	50,0 *1.969*	60,0	0,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STTCR16CA-16	00009195	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	14,96 *0.589*	16,0 *0.630*	60,0 *2.362*	60,0	-4,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
STTCL16CA-16	00009194	25 *0.984*	20 *0.787*	63 *2.480*	25 *0.984*	14,96 *0.589*	16,0 *0.630*	60,0 *2.362*	60,0	-4,0	0,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Locking screw	Setting screw (axial)	Setting screw (radial)	Shim screw
							
..12..-16	1/4HEX-T15PX50	C03509-T15P	–	179.17-697-T25P	179.17-680	179.17-687	–
..16..-16	1/4HEX-T15PX50	C03509-T15P	STN160312	179.17-693	179.17-680	179.17-685	CA3510
..16..-22	1/4HEX-T15PX50	C05012-T15P	–	179.17-693	179.17-680	179.17-690-T15P	–

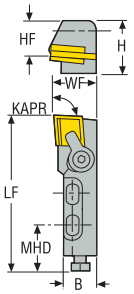
Accessories

For	Bit holder	Insert clamping torque	Locking key	Replacement blade	Setting key	Shim key	Torque key
							
..12..-16	1/4HEX-S-HANDLE	3.0NM	T25P-7	T00-15P	2SMS795	–	T00-15P30
..16..-16	1/4HEX-S-HANDLE	3.0NM	5SMS795	T00-15P	2.5SMS795	1/4HEX-H9/64X50	T00-15P30
..16..-22	1/4HEX-S-HANDLE	5.0NM	5SMS795	T00-15P	2SMS795	–	T00-15P50

MCLNR/L, MCFNR/L – Cartridges for inserts CNGA, CNGN, CNGP, CNMA, CNMG, CNMM, CNMN, CNMP – Inch



MCLNR/L / MCFNR/L



MCLNR/L
KAPR = 95,0 °



MCFNR
KAPR = 90,0 °



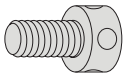
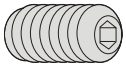
CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553, 594, 595, 622
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
MCLNR12CA-12	00041850	0.787	0.551	2.165	0.787	0.787	0.472	1.969	95,0	-5,0	-10,0	0.220	CN..1204.. *CN..43.*
MCLNL-12CA-12	00054313	0.787	0.551	2.165	0.787	0.787	0.472	1.969	95,0	-5,0	-10,0	0.220	CN..1204.. *CN..43.*
MCLNR-25CA-19	00041853	1.378	0.945	3.937	1.181	1.260	0.984	3.937	95,0	-6,0	-9,0	1.100	CN..1906.. *CN..64.*
MCFNR-12CA-12	02506169	0.791	0.551	2.165	0.787	0.787	0.472	1.969	90,0	-5,0	-10,0	0.220	CN..1204.. *CN..43.*
MCFNR-16CA-12	02506171	0.984	0.709	2.480	0.984	0.984	0.630	2.362	90,0	-5,0	-10,0	0.220	CN..1204.. *CN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim	Setting screw (axial)	Setting screw (radial)
						
..12..-12	CLM-17	XNSM-0515	NLM-43	–	EASM-0510F	SASM-0412
..16..-12	CLM-17	XNSM-0515	NLM-46S	CSN120412	EASM-0610F	SASM-0516
..25..-19	CLM-12	XNSM-0825	NLM-68	CSN190412	EASM-0816F	SASM-0820

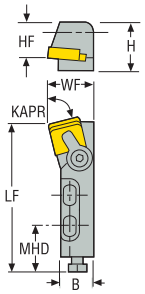
Accessories

For	Shim screw
	
..12..-12	–
..16..-12	S-46MS
..25..-19	S-68M

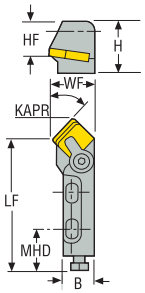
MSKNR, MSSNR – Cartridges for inserts SNGA, SNGN, SNMA, SNMG, SNMM, SNMN, SNMP – Inch



MSKNR



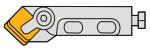
MSSNR



MSKNR
KAPR = 75,0 °



MSSNR
KAPR = 45,0 °



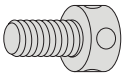
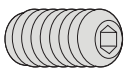
—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
MSKNR12CA-12	00041855	0.787	0.551	2.165	0.787	0.787	0.472	1.969	75,0	-10,0	-5,0	0.220	SN..1204.. *SN..43.*
MSSNR12CA-12	00041865	0.787	0.551	2.177	0.787	0.787	0.472	1.969	45,0	-9,0	-9,0	0.220	SN..1204.. *SN..43.*

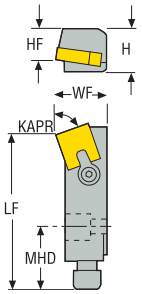
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Setting screw (axial)	Setting screw (radial)
					
..-12	CLM-6	XNSM-0515	NLM-43	EASM-0510F	SASM-0412

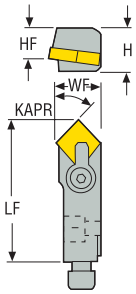
MSKNR, MSSNR, MSTNR – Cartridges for inserts SNGA, SNGN, SNMA, SNMG, SNMM, SNMN, SNMP – Inch



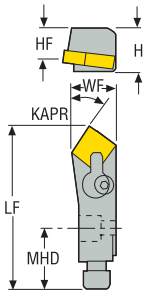
MSKNR



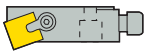
MSSNR



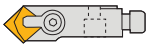
MSTNR



MSSNR
KAPR = 45,0 °



MSTNR
KAPR = 30,0 °



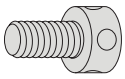
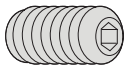
—Right-hand version shown
—For inserts program, see page(s) 569, 570, 571, 572, 604, 605
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
MSSNR-41CX-4	00036422	0.563	0.559	2.306	0.840	0.528	0.406	2.000	45,0	-8,0	-8,0	0.220	SN..1204.. *SN..43.*
MSTNR-41CX-3	00036470	0.563	0.441	1.969	0.840	0.531	0.406	1.500	30,0	-6,0	-10,0	0.220	SN..0903.. *SN..32.*
MSTNR-41CX-4	00054341	0.563	0.563	2.386	0.840	0.689	0.406	2.000	30,0	-6,0	-10,0	0.220	SN..1204.. *SN..43.*

Spare Parts, included in delivery

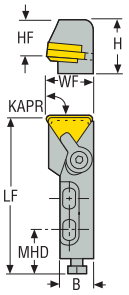
For	Cantilever clamp	Clamp screw	Insert pin	Setting screw (axial)	Setting screw (radial)
					
..-3	CL-5	XNS-35	NL-33	EAS-253	SC-605
..-4	CL-6	XNS-35	NL-43	EAS-253	SC-605

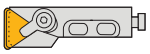
MTFNR/L – Cartridges for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch

KAPR = 90,0 °



MTFNR/L





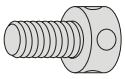
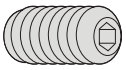
—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
MTFNR12CA-16	00041880	0.787	0.551	2.165	0.787	0.787	0.472	1.969	90,0	-5,0	-10,0	0.220	TN..1603.. *TN..32.*
MTFNL12CA-16	00041771	0.787	0.551	2.165	0.787	0.787	0.472	1.969	90,0	-5,0	-10,0	0.220	TN..1603.. *TN..32.*
MTFNR20CA-22	00041882	1.181	0.709	2.756	1.181	0.984	0.787	2.756	90,0	-5,0	-10,0	0.440	TN..2204.. *TN..43.*

Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Insert shim	Setting screw (axial)	Setting screw (radial)
						
..-16	CLM-17	XNSM-0515	NLM-33	–	EASM-0510F	SASM-0412
..-22	CLM-20	XNSM-0620	NLM-46	TSN220412	EASM-0610F	SASM-0516

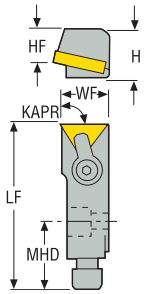
Accessories

For	Shim screw
	
..-16	–
..-22	S-46M

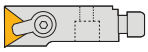
MTFNR/L – Cartridges for inserts TNGA, TNGN, TNMA, TNMG, TNMM, TNMN, TNMP – Inch



MTFNR/L



KAPR = 90,0 °



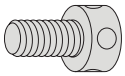
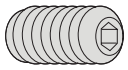
CTWS



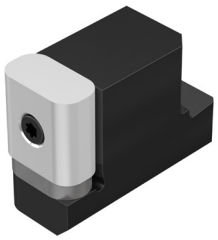
—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 609, 610, 611
—For cartridge mounting information see page 123
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	MHD	WF	HF	DCINN	KAPR°	GAMO°	LAMS°	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch				lbs	
MTFNR-41CX-2	00036500	0.563	0.441	1.969	0.840	0.531	0.406	1.500	90,0	-5,0	-10,0	0.220	TN..1103.. *TN..22.*
MTFNR-41CX-3	00036502	0.563	0.559	1.969	0.840	0.685	0.406	2.000	90,0	-5,0	-8,0	0.220	TN..1604.. *TN..33.*

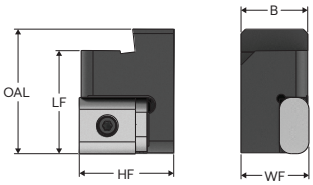
Spare Parts, included in delivery

For	Cantilever clamp	Clamp screw	Insert pin	Setting screw (axial)	Setting screw (radial)
					
..-2	CL-5	XNS-35	NL-23	EAS-253	SC-605
..-3	CL-6	XNS-35	NL-33L	EAS-253	SC-605

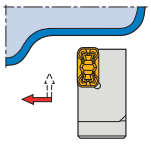
CT-PLANR/L – Toolholders/cassettes for inserts LNMX – Metric/ Inch



CT-PLANR/L



KAPR = 90,0 °



CTWS

—Right-hand version shown
—For inserts program, see page(s) 562
—CT-PLANR/L 3223-19 are updated version of R/L175.32-3223-19. They have better manufacturing tolerances. R/L175.32-3223-19 will be deleted from the program in future.
—For ISO attribute explanation, see page 82

Designation	Item number	HF	WF	B	LF	OAL	KAPR°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*	
CT-PLANR3223-19	02809911	32,0 *1.260*	23,0 *0.906*	23 *0.890*	35 *1.378*	42 *1.661*	90,0 °	0,2 *0.440*	LN..1919..
CT-PLANL3223-19	02809912	32,0 *1.260*	23,0 *0.906*	23 *0.890*	35 *1.378*	42 *1.661*	90,0 °	0,2 *0.440*	LN..1919..

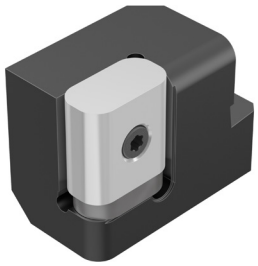
Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...-19	1/4HEX-T15PX50	MN1515SL-T15P	LN190450	174.10-650.9-T07P

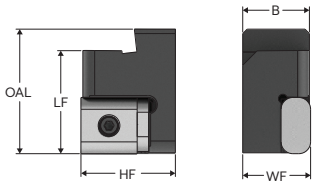
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-19	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-T07PX50	T00-15P30

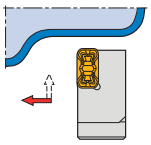
CT-PLANR/L – Toolholders/cassettes for inserts LNMX – Metric/ Inch



R/L175.32



KAPR = 90,0 °



CTWS

—Right-hand version shown
—For inserts program, see page(s) 562
—CT-PLANR/L 3223-19 are updated version of R/L175.32-3223-19. They have better manufacturing tolerances. R/L175.32-3223-19 will be deleted from the program in future.
—For ISO attribute explanation, see page 82

Designation	Item number	HF	WF	B	LF	OAL	KAPR°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*	
R175.32-3223-30	00013035	32,0 *1.260*	23,0 *0.906*	23 *0.890*	35 *1.378*	42 *1.661*	90,0 °	0,2 *0.440*	LN..3019..
L175.32-3223-30	00013036	32,0 *1.260*	23,0 *0.906*	23 *0.890*	35 *1.378*	42 *1.661*	90,0 °	0,2 *0.440*	LN..3019..

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...-30	1/4HEX-T15PX50	MN1515SL-T15P	LN300450	174.10-650.9-T07P

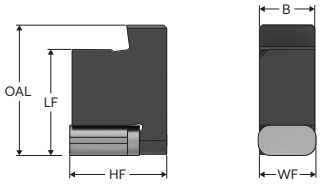
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-30	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-T07PX50	T00-15P30

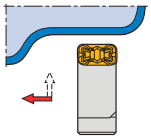
CT-PLFNR/L – Toolholders/cassettes for inserts LNMX – Metric/ Inch



CT-PLFNR/L



KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 562
—For ISO attribute explanation, see page 82

CTWS

Designation	Item number	HF	WF	B	LF	OAL	KAPR°	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*	
CT-PLFNR3219-19	02809915	32,0 *1.260*	19,0 *0.748*	18 *0.719*	35 *1.378*	43 *1.693*	90,0 °	0,2 *0.440*	LN..1919..
CT-PLFNL3219-19	02809910	32,0 *1.260*	19,0 *0.748*	18 *0.719*	35 *1.378*	43 *1.693*	90,0 °	0,2 *0.440*	LN..1919..

Spare Parts, included in delivery

For	Insert key	Insert screw	Insert shim	Shim screw
				
...-19	1/4HEX-T15PX50	MN1515SL-T15P	LN190450	174.10-650.9-T07P

Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
...-19	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-T07PX50	T00-15P30

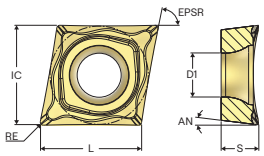


General Turning Inserts

Anything is possible when it comes to our broad selection of general turning grades and chipbreakers. Supporting inserts of different shapes, sizes and thicknesses, we developed each of these solutions with the same goal in mind: to boost the productivity and tool life in your turning applications. Covering all material groups, this comprehensive range allows you to achieve your goals in terms of material removal rates, tool life and surface finish.

- Duratomic® is an exclusive insert technology that brings an exceptional combination of wear resistance and edge toughness to a wide variety of Seco grades.
- Wide range of inserts grades to cover all workpiece material groups (SMG).
- Coated, uncoated cemented carbide and cermet grade inserts followed by Advanced material ceramic, cBN and diamond grade inserts.

CCGT, CCGX, CCMT



CCGT, CCGX
Tolerances:
IC = ±0,025/*0.001*
S = ±0,05/*0.002*
RE = (≥0,2/*0.008*) = ±0,1/*0.0039*
RE = (≤0,1/*0.004*) = ±0,025/*0.001*

CCMT
Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.0031*
IC = ±0,10/*0.0039*
IC = ±0,13/*0.0051*
S = ±0,05/*0.002*
S = ±0,13/*0.0051*
RE = ±0,1/*0.0039*

Size:
06-09/*2-3*
12/*4*
16/*5*
25/*8*
06-09/*2-3*
12-25/*4-8*

* Right-hand version shown

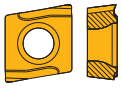
For ISO attribute explanation, see page 82

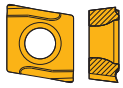
CCGT-AL

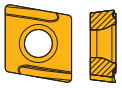

CCGT-F1


CCGT-MF2




CCGT-UX*






CCGX...W-F1

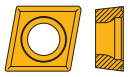

CCMT...W-F1


CCMT...W-M3


CCMT...W-MF2


CCMT-F1


CCMT-F2


CCMT-FF1


CCMT-M3


CCMT-M5

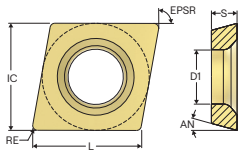

CCMT-MF2


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet				
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CCGT0602005-F1 *CCGT21.50.0-F1*	0,05 *0.002*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0																		■								
CCGT060201-F1 *CCGT21.50-F1*	0,1 *0.004*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0																		■								
CCGT060201-MF2 *CCGT21.50-MF2*	0,1 *0.004*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0														■				■								
CCGT060202-F1 *CCGT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	6,45 *0.254*	2,38 *0.094*	2,9 *0.114*	80,0	7,0														■												
CCGT060202F-AL *CCGT21.50.5F-AL*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,8 *0.110*	80,0	7,0														■							■					
CCGT060202-MF2 *CCGT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	6,45 *0.254*	2,38 *0.094*	2,9 *0.114*	80,0	7,0														■												
CCGX060202W-F1 *CCGX21.50.5W-F1*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■		■																						
CCMT060202-F1 *CCMT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■		■		■					■				■	■						■	■
CCMT060202-F2 *CCMT21.50.5-F2*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0						■														■						
CCMT060202-FF1 *CCMT21.50.5-FF1*	0,2 *0.008*	6,35 *0.250*	6,45 *0.254*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■						■																	
CCMT060202-M3 *CCMT21.50.5-M3*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■	■				■																	
CCMT060202-MF2 *CCMT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■	■					■									■								
CCGT060204F-AL *CCGT21.51F-AL*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,8 *0.110*	80,0	7,0														■							■					
CCGT060204-F1 *CCGT21.51-F1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0																										■
CCGT060204-MF2 *CCGT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0														■					■							
CCGT060204R-UX *CCGT21.51R-UX*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,8 *0.110*	80,0	7,0																			■							
CCGT060204L-UX *CCGT21.51L-UX*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,8 *0.110*	80,0	7,0																			■							
CCMT060204-F1 *CCMT21.51-F1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■		■	■	■	■	■	■		■			■	■	■	■					■	■
CCMT060204W-F1 *CCMT21.51W-F1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■																						■	
CCMT060204-F2 *CCMT21.51-F2*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0						■														■						

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																					Uncoated				Cermet					
	mm inch	mm inch	mm inch	mm inch	mm inch			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020					
CCMT060204-FF1 *CCMT21.51-FF1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■	■					■									■						■					
CCMT060204-M3 *CCMT21.51-M3*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■	■		■	■	■	■	■																	
CCMT060204-MF2 *CCMT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■			■		■									■						■					
CCMT060204W-MF2 *CCMT21.51W-MF2*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0								■										■											
CCMT060208-F1 *CCMT21.52-F1*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■	■		■		■										■						■					
CCMT060208-F2 *CCMT21.52-F2*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0						■														■									
CCMT060208-M3 *CCMT21.52-M3*	0,8 *0.031*	6,35 *0.250*	6,45 *0.254*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■	■	■			■	■		■																	
CCMT060208-MF2 *CCMT21.52-MF2*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0		■	■	■			■		■									■											
CCMT090304-M3 *CCMT321-M3*	0,4 *0.016*	9,525 *0.375*	9,67 *0.381*	3,18 *0.125*	4,5 *0.177*	80,0	7,0			■																									
CCGT09T3005-F1 *CCGT32.50.0-F1*	0,05 *0.002*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0														■															
CCGT09T301-F1 *CCGT32.50-F1*	0,1 *0.004*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0														■				■											
CCGT09T302-MF2 *CCGT32.50-MF2*	0,2 *0.008*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0														■															
CCGT09T302F-AL *CCGT32.50.5F-AL*	0,2 *0.008*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,4 *0.173*	80,0	7,0														■								■							
CCGT09T302-F1 *CCGT32.50.5-F1*	0,2 *0.008*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0														■															
CCMT09T302-F1 *CCMT32.50.5-F1*	0,2 *0.008*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■		■		■										■						■		■			
CCMT09T302-F2 *CCMT32.50.5-F2*	0,2 *0.008*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0																				■									
CCMT09T302-M3 *CCMT32.50.5-M3*	0,2 *0.008*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■		■																							
CCMT09T302-MF2 *CCMT32.50.5-MF2*	0,2 *0.008*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■						■										■											
CCGT09T304F-AL *CCGT32.51F-AL*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,4 *0.173*	80,0	7,0														■								■							
CCGT09T304-F1 *CCGT32.51-F1*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0														■															■
CCGT09T304-MF2 *CCGT32.51-MF2*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0																			■										
CCGT09T304R-UX *CCGT32.51R-UX*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,4 *0.173*	80,0	7,0																			■										
CCGT09T304L-UX *CCGT32.51L-UX*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,4 *0.173*	80,0	7,0																			■										
CCMT09T304-F1 *CCMT32.51-F1*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■	■	■	■	■	■		■		■			■	■	■	■						■		■			
CCMT09T304W-F1 *CCMT32.51W-F1*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■																									■	
CCMT09T304-F2 *CCMT32.51-F2*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0						■							■					■			■								
CCMT09T304-FF1 *CCMT32.51-FF1*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■	■					■																				
CCMT09T304-M3 *CCMT32.51-M3*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■	■		■	■	■	■	■																	
CCMT09T304-M5 *CCMT32.51-M5*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0	■	■	■					■			■																	
CCMT09T304-MF2 *CCMT32.51-MF2*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■			■	■	■										■	■					■				
CCMT09T304W-MF2 *CCMT32.51W-MF2*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■					■										■										
CCGT09T308F-AL *CCGT32.52F-AL*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,4 *0.173*	80,0	7,0																						■						
CCMT09T308-F1 *CCMT32.52-F1*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■	■	■	■	■	■	■	■		■			■	■	■	■						■				

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																					Uncoated				Cermet			
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CCMT09T308W-F1 *CCMT32.52W-F1*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■																					■	■
CCMT09T308-F2 *CCMT32.52-F2*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0						■														■					
CCMT09T308-FF1 *CCMT32.52-FF1*	0,8 *0.031*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0									■																
CCMT09T308-M3 *CCMT32.52-M3*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■	■		■	■	■	■	■														
CCMT09T308W-M3 *CCMT32.52W-M3*	0,8 *0.031*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■																						
CCMT09T308-M5 *CCMT32.52-M5*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■				■			■													
CCMT09T308-MF2 *CCMT32.52-MF2*	0,8 *0.031*	9,525 *0.375*	9,67 *0.381*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■			■	■	■									■						
CCMT09T308W-MF2 *CCMT32.52W-MF2*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■					■										■						
CCMT09T312-M3 *CCMT32.53-M3*	1,2 *0.047*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■	■																				
CCGT120404F-AL *CCGT431F-AL*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,5 *0.217*	80,0	7,0																					■					
CCMT120404-F1 *CCMT431-F1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■	■									■				■								
CCMT120404W-F1 *CCMT431W-F1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■																					
CCMT120404-F2 *CCMT431-F2*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0																				■					
CCMT120404-M3 *CCMT431-M3*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0		■	■	■	■						■													
CCGT120408F-AL *CCGT432F-AL*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,5 *0.217*	80,0	7,0																					■					
CCGT120408L-UX *CCGT432L-UX*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,5 *0.217*	80,0	7,0																			■						
CCMT120408-F1 *CCMT432-F1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■	■							■		■				■								
CCMT120408W-F1 *CCMT432W-F1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■																					
CCMT120408-F2 *CCMT432-F2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0						■														■					
CCMT120408-M3 *CCMT432-M3*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0		■	■	■	■		■	■	■	■	■													
CCMT120408-M5 *CCMT432-M5*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0		■	■	■				■		■	■													
CCMT120408-MF2 *CCMT432-MF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0		■	■	■			■		■															
CCMT120412-F1 *CCMT433-F1*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■																					
CCMT120412-M3 *CCMT433-M3*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0		■	■	■					■		■													
CCMT120412-M5 *CCMT433-M5*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0			■	■				■			■													
CCMT160508-M3 *CCMT53.52-M3*	0,8 *0.031*	15,875 *0.625*	16,12 *0.635*	5,56 *0.219*	5,6 *0.220*	80,0	7,0			■		■			■	■		■													
CCMT160508-M5 *CCMT53.52-M5*	0,8 *0.031*	15,875 *0.625*	16,12 *0.635*	5,56 *0.219*	5,6 *0.220*	80,0	7,0								■																
CCMT160512-M3 *CCMT53.53-M3*	1,2 *0.047*	15,875 *0.625*	16,12 *0.635*	5,56 *0.219*	5,6 *0.220*	80,0	7,0					■			■			■													
CCMT160512-M5 *CCMT53.53-M5*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	5,56 *0.219*	5,6 *0.220*	80,0	7,0			■	■				■																
CCMT160516-M5 *CCMT53.54-M5*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	5,56 *0.219*	5,6 *0.220*	80,0	7,0			■																					

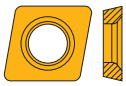
CDCB



Tolerances:
IC = ±0,025/*0.001*
S = ±0,025/*0.001*
RE = ±0,025/*0.001*

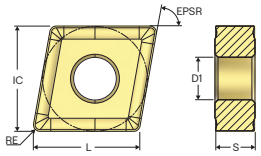
For ISO attribute explanation, see page 82

CDCB



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
CDCB04T0005 *CDCB1.21.20*	0,05 *0.002*	3,969 *0.156*	4,03 *0.159*	0,966 *0.038*	2,04 *0.080*	80,0	15,0																		■												
CDCB04T002 *CDCB1.21.20.5*	0,2 *0.008*	3,969 *0.156*	4,03 *0.159*	0,966 *0.038*	2,04 *0.080*	80,0	15,0														■				■				■								
CDCB04T004 *CDCB1.21.21*	0,4 *0.016*	3,969 *0.156*	4,03 *0.159*	0,966 *0.038*	2,04 *0.080*	80,0	15,0														■				■												

CNGG, CNMA, CNMG, CNMM



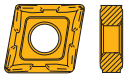
CNGG
Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

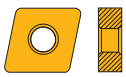
CNMA, CNMG, CNMM
Tolerances: Size:
IC = ±0,05/*0.002* 09/*3*
IC = ±0,08/*0.003* 12/*4*
IC = ±0,10/*0.004* 16-19/*5-6*
IC = ±0,13/*0.005* 25/*8*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

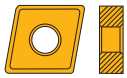
For ISO attribute explanation, see page 82

CNGG-M1


CNGG-MF1


CNGG-MF2


CNMA


CNMA-MR9


CNMG...W-FF2

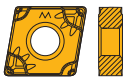

CNMG...W-M3

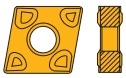

CNMG...W-M6

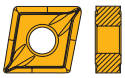

CNMG...W-MF1


CNMG...W-MF2

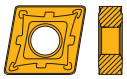

CNMG...W-MF4


CNMG...W-MF5


CNMG-FF1


CNMG-FF2


CNMG-M1

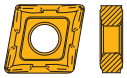

CNMG-M3


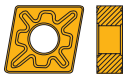
CNMG-M4


CNMG-M5


CNMG-M6

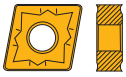

CNMG-MF1


CNMG-MF2


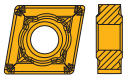
CNMG-MF3


CNMG-MF4

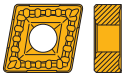

CNMG-MF5


CNMG-MR3


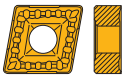
CNMG-MR4

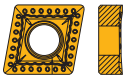

CNMG-MR6


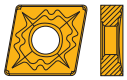
CNMG-MR7


CNMM...W-R4


CNMM...W-R7

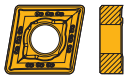

CNMM-R4


CNMM-R5


CNMM-R6


CNMM-R7


CNMM-R8


CNMM-RR6


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CNMG090304-M3 *CNMG321-M3*	0,4 *0.016*	9,525 *0.375*	9,67 *0.381*	3,18 *0.125*	3,81 *0.150*	80,0	0,0			■					■																				
CNMG090308-M3 *CNMG322-M3*	0,8 *0.031*	9,525 *0.375*	9,67 *0.381*	3,18 *0.125*	3,81 *0.150*	80,0	0,0			■					■																				
CNGG120401-MF1 *CNGP430-MF1*	0,1 *0.004*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■					■										
CNGG120402-M1 *CNGP430.5-M1*	0,2 *0.008*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0															■												
CNGG120402-MF1 *CNGP430.5-MF1*	0,2 *0.008*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■					■	■					■			
CNMG120402-FF2 *CNMG430.5-FF2*	0,2 *0.008*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																■								
CNGG120404-M1 *CNGP431F-M1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0																						■					
CNGG120404-MF1 *CNGP431-MF1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■					■	■					■			
CNMA120404 *CNMA431*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■																		

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm inch	mm inch	mm inch	mm inch	mm inch			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
CNMG120404-FF1 *CNMG431-FF1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■						■																					
CNMG120404-FF2 *CNMG431-FF2*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■														■						■						
CNMG120404W-FF2 *CNMG431W-FF2*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																										
CNMG120404-M1 *CNMP431-M1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■									■							
CNMG120404-M3 *CNMG431-M3*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■	■	■		■	■										■										
CNMG120404-M5 *CNMG431-M5*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■			■	■			■																		
CNMG120404-MF1 *CNMP431-MF1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■				■	■		■		■	■					■						
CNMG120404W-MF1 *CNMG431W-MF1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0									■																					
CNMG120404-MF2 *CNMG431-MF2*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■		■	■	■						■																	■	
CNMG120404W-MF2 *CNMG431W-MF2*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■																											
CNMG120404-MF3 *CNMG431-MF3*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■																									
CNMG120404-MF4 *CNMG431-MF4*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■				■		■				■										
CNMG120404W-MF4 *CNMG431W-MF4*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■																					
CNMG120404-MR4 *CNMG431-MR4*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0																						■							
CNGG120408-MF2 *CNGP432-MF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0												■				■													
CNGG120408-MF1 *CNGP432-MF1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0												■	■			■		■	■					■					
CNMA120408 *CNMA432*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																		
CNMA120408-MR9 *CNMA432-MR9*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																		
CNMG120408-FF1 *CNMG432-FF1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0									■																					
CNMG120408-FF2 *CNMG432-FF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
CNMG120408W-FF2 *CNMG432W-FF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																										■	
CNMG120408-M1 *CNMP432-M1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■									■							
CNMG120408-M3 *CNMG432-M3*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■		■	■	■		■						■		■										
CNMG120408W-M3 *CNMG432W-M3*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■								■																		
CNMG120408-M4 *CNMG432-M4*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																		
CNMG120408-M5 *CNMG432-M5*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■	■	■		■	■					■													
CNMG120408-M6 *CNMG432-M6*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■							■																		
CNMG120408W-M6 *CNMG432W-M6*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																											
CNMG120408-MF1 *CNMP432-MF1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■				■	■		■		■	■					■						
CNMG120408W-MF1 *CNMG432W-MF1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0																		■											
CNMG120408-MF2 *CNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■					■	■					■	■											■	
CNMG120408W-MF2 *CNMG432W-MF2*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■								■																		
CNMG120408-MF3 *CNMG432-MF3*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,762 *0.187*	5,15 *0.203*	80,0	0,0				■	■	■		■	■		■																		

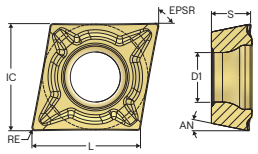
Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
CNMG120408-MF4 *CNMG432-MF4*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■			■	■	■				■		■			■												
CNMG120408W-MF4 *CNMG432W-MF4*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■																					
CNMG120408-MF5 *CNMG432-MF5*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■									■	■		■	■	■												
CNMG120408W-MF5 *CNMG432W-MF5*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■							■						■	■												
CNMG120408-MR3 *CNMG432-MR3*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0								■	■				■	■				■	■					■					
CNMG120408-MR4 *CNMG432-MR4*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■	■								■						
CNMG120408-MR6 *CNMG432-MR6*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																										
CNMG120408-MR7 *CNMG432-MR7*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■		■		■		■	■																		
CNMM120408-R4 *CNMM432-R4*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■	■																								
CNMM120408-R6 *CNMM432-R6*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■																										
CNGG120412-MF1 *CNGP433-MF1*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0												■				■													
CNGG120412-MF2 *CNGP433-MF2*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0												■				■													
CNMA120412 *CNMA433*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																		
CNMA120412-MR9 *CNMA433-MR9*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																		
CNMG120412-M3 *CNMG433-M3*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■		■	■	■										■										
CNMG120412W-M3 *CNMG433W-M3*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■								■																		
CNMG120412-M4 *CNMG433-M4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																		
CNMG120412-M5 *CNMG433-M5*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■	■	■		■	■					■													
CNMG120412-M6 *CNMG433-M6*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■																										
CNMG120412W-M6 *CNMG433W-M6*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																										
CNMG120412-MF2 *CNMG433-MF2*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■													■	■												
CNMG120412-MF3 *CNMG433-MF3*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■		■			■																				
CNMG120412-MF4 *CNMG433-MF4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■				■	■	■				■		■														
CNMG120412W-MF4 *CNMG433W-MF4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0								■																					
CNMG120412-MF5 *CNMG433-MF5*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■									■	■			■	■												
CNMG120412-MR3 *CNMG433-MR3*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0								■	■				■	■				■	■										
CNMG120412-MR4 *CNMG433-MR4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■	■								■						
CNMG120412-MR6 *CNMG433-MR6*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																										
CNMG120412-MR7 *CNMG433-MR7*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■		■		■	■																		
CNMM120412-R4 *CNMM433-R4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■		■																							
CNMM120412W-R4 *CNMM433W-R4*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■																										
CNMM120412-R6 *CNMM433-R6*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■																									
CNMM120412-R8 *CNMM433-R8*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■																							

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																														
								Coated																					Uncoated				Cermet						
	mm inch	mm inch	mm inch	mm inch	mm inch			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
CNMA120416 *CNMA434*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																			
CNMA120416-MR9 *CNMA434-MR9*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																			
CNMG120416-M3 *CNMG434-M3*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
CNMG120416-M5 *CNMG434-M5*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■				■																						
CNMG120416-M6 *CNMG434-M6*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
CNMG120416-MF4 *CNMG434-MF4*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■																						
CNMG120416-MR4 *CNMG434-MR4*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■	■								■								
CNMG120416-MR7 *CNMG434-MR7*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■						■	■																			
CNMM120416-R4 *CNMM434-R4*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
CNMA160608 *CNMA542*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0											■																			
CNMG160608-M1 *CNMP542-M1*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0																							■							
CNMG160608-M3 *CNMG542-M3*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■	■	■	■			■																						
CNMG160608-M5 *CNMG542-M5*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■	■	■				■			■																			
CNMG160608-M6 *CNMG542-M6*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■																												
CNMG160608-MF4 *CNMG542-MF4*	0,8 *0.031*	15,875 *0.625*	16,12 *0.635*	6,35 *0.250*	6,35 *0.250*	80,0	0,0							■	■	■																						
CNMG160608-MR4 *CNMG542-MR4*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0															■								■							
CNMG160608-MR7 *CNMG542-MR7*	0,8 *0.031*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0				■																											
CNMA160612 *CNMA543*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0										■	■																			
CNMA160612-MR9 *CNMA543-MR9*	1,2 *0.047*	15,875 *0.625*	16,12 *0.635*	6,35 *0.250*	6,35 *0.250*	80,0	0,0											■																			
CNMG160612-M3 *CNMG543-M3*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■			■	■																					
CNMG160612-M5 *CNMG543-M5*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■	■	■	■			■																			
CNMG160612-M6 *CNMG543-M6*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■							■																			
CNMG160612W-M6 *CNMG543W-M6*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0			■																											
CNMG160612-MF4 *CNMG543-MF4*	1,2 *0.047*	15,875 *0.625*	16,12 *0.635*	6,35 *0.250*	6,35 *0.250*	80,0	0,0							■	■	■																						
CNMG160612-MR4 *CNMG543-MR4*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0															■								■							
CNMG160612-MR7 *CNMG543-MR7*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■		■				■	■																			
CNMM160612-R4 *CNMM543-R4*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■																									
CNMM160612-R6 *CNMM543-R6*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0				■		■																								
CNMM160612-R7 *CNMM543-R7*	1,2 *0.047*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0				■																											
CNMM160612-RR6 *CNMM543-RR6*	1,2 *0.047*	15,875 *0.625*	16,12 *0.635*	6,35 *0.250*	6,35 *0.250*	80,0	0,0								■	■																						
CNMA160616 *CNMA544*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0										■	■																			
CNMA160616-MR9 *CNMA544-MR9*	1,6 *0.063*	15,875 *0.625*	16,12 *0.635*	6,35 *0.250*	6,35 *0.250*	80,0	0,0											■																			
CNMG160616-M3 *CNMG544-M3*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■	■					■																						

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020				
CNMG160616-M5 *CNMG544-M5*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■	■	■	■			■																			
CNMG160616-M6 *CNMG544-M6*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■							■																			
CNMG160616W-M6 *CNMG544W-M6*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■																												
CNMG160616-MR7 *CNMG544-MR7*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■	■		■			■																			
CNMM160616-R4 *CNMM544-R4*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■	■	■	■	■																									
CNMM160616-R5 *CNMM544-R5*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■																												
CNMM160616-R7 *CNMM544-R7*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0			■	■																										
CNMM160616-RR6 *CNMM544-RR6*	1,6 *0.063*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■	■					■	■																					
CNMG160624-M6 *CNMG546-M6*	2,4 *0.094*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0				■																										
CNMG160624-MR7 *CNMG546-MR7*	2,4 *0.094*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0		■																												
CNMM160624-R7 *CNMM546-R7*	2,4 *0.094*	15,875 *0.625*	16,1 *0.634*	6,35 *0.250*	6,35 *0.250*	80,0	0,0	■																													
CNMG190608-M1 *CNMP642-M1*	0,8 *0.031*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0																							■							
CNMG190608-M3 *CNMG642-M3*	0,8 *0.031*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■	■				■																					
CNMG190608-M5 *CNMG642-M5*	0,8 *0.031*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■		■		■																						
CNMG190608-MR7 *CNMG642-MR7*	0,8 *0.031*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0				■																										
CNMA190612 *CNMA643*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0										■	■																			
CNMG190612-M1 *CNMP643-M1*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0																							■							
CNMG190612-M3 *CNMG643-M3*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■	■				■																					
CNMG190612-M5 *CNMG643-M5*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■	■	■	■	■			■																			
CNMG190612-M6 *CNMG643-M6*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■	■	■																										
CNMG190612-MF4 *CNMG643-MF4*	1,2 *0.047*	19,05 *0.750*	19,34 *0.761*	6,35 *0.250*	7,92 *0.312*	80,0	0,0							■	■	■																					
CNMG190612-MR4 *CNMG643-MR4*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0														■										■						
CNMG190612-MR7 *CNMG643-MR7*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■	■	■	■	■		■			■																			
CNMM190612-R4 *CNMM643-R4*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■	■	■																										
CNMM190612-R6 *CNMM643-R6*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0				■		■																								
CNMM190612-R7 *CNMM643-R7*	1,2 *0.047*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0			■	■																										
CNMM190612-RR6 *CNMM643-RR6*	1,2 *0.047*	19,05 *0.750*	19,34 *0.761*	6,35 *0.250*	7,92 *0.312*	80,0	0,0								■																					
CNMA190616 *CNMA644*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0										■	■																			
CNMG190616-M3 *CNMG644-M3*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■				■	■																					
CNMG190616-M5 *CNMG644-M5*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■	■	■	■	■			■																			
CNMG190616-M6 *CNMG644-M6*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■		■																										
CNMG190616-MF4 *CNMG644-MF4*	1,6 *0.063*	19,05 *0.750*	19,34 *0.761*	6,35 *0.250*	7,92 *0.312*	80,0	0,0							■	■	■																					
CNMG190616-MR4 *CNMG644-MR4*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0																							■							

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																								Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CNMG190616-MR7 *CNMG644-MR7*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■	■	■	■	■		■			■																
CNMM190616-R4 *CNMM644-R4*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■	■	■	■																					
CNMM190616-R5 *CNMM644-R5*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■																									
CNMM190616-R7 *CNMM644-R7*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■																						
CNMM190616W-R7 *CNMM644W-R7*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■																						
CNMM190616-R8 *CNMM644-R8*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0				■																						
CNMM190616-RR6 *CNMM644-RR6*	1,6 *0.063*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0			■	■				■																		
CNMG190624-M6 *CNMG646-M6*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■	■																								
CNMG190624-MR7 *CNMG646-MR7*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■		■																					
CNMM190624-R4 *CNMM646-R4*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0		■	■	■																						
CNMM190624-R5 *CNMM646-R5*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■																									
CNMM190624-R7 *CNMM646-R7*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0			■	■																						
CNMM190624W-R7 *CNMM646W-R7*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0	■		■																							
CNMM190624-RR6 *CNMM646-RR6*	2,4 *0.094*	19,05 *0.750*	19,3 *0.760*	6,35 *0.250*	7,92 *0.312*	80,0	0,0			■					■																		
CNMG250924-MR4 *CNMG866-MR4*	2,4 *0.094*	25,4 *1.000*	25,8 *1.016*	9,52 *0.375*	9,12 *0.359*	80,0	0,0				■																						
CNMG250924-MR7 *CNMG866-MR7*	2,4 *0.094*	25,4 *1.000*	25,8 *1.016*	9,52 *0.375*	9,12 *0.359*	80,0	0,0				■	■																					

CPMT



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

For ISO attribute explanation, see page 82

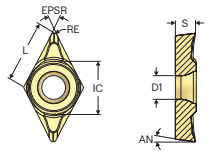
CPMT-F1



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																								Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CPMT060201-F1 *CPMT21.50-F1*	0,1 *0.004*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	11,0																	■									
CPMT060202-F1 *CPMT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	11,0																	■									
CPMT060204-F1 *CPMT21.51-F1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	11,0					■												■	■								
CPMT060208-F1 *CPMT21.52-F1*	0,8 *0.031*	6,35 *0.250*	6,45 *0.254*	2,38 *0.094*	2,9 *0.114*	80,0	11,0					■																					
CPMT09T301-F1 *CPMT32.50-F1*	0,1 *0.004*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	11,0																	■									

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																									
								Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
CPMT09T302-F1 *CPMT32.50.5-F1*	0,2 *0.008*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	11,0																		■								
CPMT09T304-F1 *CPMT32.51-F1*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	11,0					■													■	■							
CPMT09T308-F1 *CPMT32.52-F1*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	11,0					■														■							

DCGT, DCMT, DCMX



DCGT
Tolerances:
IC = ±0,025/*0.001*
S = ±0,05/*0.002*
RE (≥0,2/*0.008*) = ±0,1/*0.004*
RE (≤0,1/*0.004*) = ±0,025/*0.001*

DCMT
Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
S = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Size:
07-11/2-*3*
15/*4*
07-11/2-*3*
15/*4*

DCMX
Tolerances:
IC = ±0,05/*0.002*
S = ±0,05/*0.002*
RE = ±0,1/*0.004*

For ISO attribute explanation, see page 82

DCGT-AL


DCGT-F1


DCGT-M3


DCGT-MF2


DCMT-F1


DCMT-F2


DCMT-FF1


DCMT-M3




DCMT-M5


DCMT-MF2

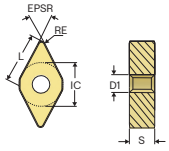

DCMX...W-F1


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																							Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
DCGT0702005F-AL *DCGT21.50.0F-AL*	0,05 *0.002*	6,35 *0.250*	7,755 *0.305*	2,38 *0.094*	2,8 *0.110*	55,0	7,0														■							■					
DCGT0702005-F1 *DCGT21.50.0-F1*	0,05 *0.002*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0																		■								
DCGT070201F-AL *DCGT21.50F-AL*	0,1 *0.004*	6,35 *0.250*	7,755 *0.305*	2,38 *0.094*	2,8 *0.110*	55,0	7,0														■							■					
DCGT070201-F1 *DCGT21.50-F1*	0,1 *0.004*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0																		■								
DCMT070202-F2 *DCMT21.50.5-F2*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0						■															■					
DCGT070202F-AL *DCGT21.50.5F-AL*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,8 *0.110*	55,0	7,0														■								■				
DCGT070202-M3 *DCGT21.50.5-M3*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0																					■					
DCGT070202-MF2 *DCGT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	7,75 *0.305*	2,38 *0.094*	2,9 *0.114*	55,0	7,0														■												
DCMT070202-F1 *DCMT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0			■	■			■						■					■	■								
DCMT070202-M3 *DCMT21.50.5-M3*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0			■																							
DCMT070202-MF2 *DCMT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0									■										■								■
DCMT070204-F2 *DCMT21.51-F2*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0						■															■					
DCGT070204F-AL *DCGT21.51F-AL*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,8 *0.110*	55,0	7,0														■								■				
DCGT070204-M3 *DCGT21.51-M3*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0																					■					
DCMT070204-F1 *DCMT21.51-F1*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0		■	■	■	■		■	■					■					■	■						■		
DCMT070204-M3 *DCMT21.51-M3*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0		■	■	■	■		■		■																	
DCMT070204-MF2 *DCMT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0		■	■	■					■										■								■
DCMT070208-F2 *DCMT21.52-F2*	0,8 *0.031*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0						■															■					
DCMT070208-F1 *DCMT21.52-F1*	0,8 *0.031*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0		■		■				■										■								
DCMT070208-M3 *DCMT21.52-M3*	0,8 *0.031*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0		■	■	■	■		■		■																	
DCMT070208-MF2 *DCMT21.52-MF2*	0,8 *0.031*	6,35 *0.250*	7,75 *0.305*	2,38 *0.094*	2,9 *0.114*	55,0	7,0				■					■																	
DCGT11T301-F1 *DCGT32.50-F1*	0,1 *0.004*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0																		■								

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																				Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020				
DCGT11T301-MF2 *DCGT32.50-MF2*	0,1 *0.004*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0													■																
DCMT11T302-F2 *DCMT32.50.5-F2*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0																				■								
DCGT11T302F-AL *DCGT32.50.5F-AL*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,4 *0.173*	55,0	7,0													■								■							
DCGT11T302-M3 *DCGT32.50.5-M3*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0																				■								
DCGT11T302-MF2 *DCGT32.50.5-MF2*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0													■															
DCMT11T302-F1 *DCMT32.50.5-F1*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■	■	■				■									■							■	■			
DCMT11T302-FF1 *DCMT32.50.5-FF1*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■						■																			
DCMT11T302-M3 *DCMT32.50.5-M3*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■																									
DCMT11T302-MF2 *DCMT32.50.5-MF2*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■	■					■									■	■						■				
DCGT11T304F-AL *DCGT32.51F-AL*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,4 *0.173*	55,0	7,0													■								■							
DCGT11T304-F1 *DCGT32.51-F1*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0												■		■			■											■
DCGT11T304-M3 *DCGT32.51-M3*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0																				■								
DCGT11T304-MF2 *DCGT32.51-MF2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0													■						■									
DCMT11T304-F1 *DCMT32.51-F1*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■	■	■	■	■	■	■	■	■		■			■	■	■	■	■					■	■		
DCMT11T304-F2 *DCMT32.51-F2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0						■							■					■		■								
DCMT11T304-FF1 *DCMT32.51-FF1*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■	■					■																			
DCMT11T304-M3 *DCMT32.51-M3*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■	■	■		■	■	■		■																	
DCMT11T304-MF2 *DCMT32.51-MF2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■	■			■	■	■										■						■			
DCMX11T304W-F1 *DCMX32.51W-F1*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■																						■			
DCGT11T308-F1 *DCGT32.52-F1*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,969 *0.156*	4,5 *0.177*	55,0	7,0												■		■			■											
DCMT11T308-F2 *DCMT32.52-F2*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0						■														■								
DCGT11T308F-AL *DCGT32.52F-AL*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,4 *0.173*	55,0	7,0																					■							
DCGT11T308-M3 *DCGT32.52-M3*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0																				■								
DCMT11T308-F1 *DCMT32.52-F1*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■	■	■		■	■		■	■		■			■	■	■	■						■	■		
DCMT11T308-FF1 *DCMT32.52-FF1*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■	■					■																			
DCMT11T308-M3 *DCMT32.52-M3*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■	■	■		■	■	■		■																	
DCMT11T308-M5 *DCMT32.52-M5*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■	■				■																			
DCMT11T308-MF2 *DCMT32.52-MF2*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■	■			■	■	■										■						■			
DCMX11T308W-F1 *DCMX32.52W-F1*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■																								■
DCMT11T312-F1 *DCMT32.53-F1*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0		■	■																								
DCMT11T312-M5 *DCMT32.53-M5*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■	■																								
DCMT11T312-MF2 *DCMT32.53-MF2*	1,2 *0.047*	9,525 *0.375*	11,63 *0.458*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■						■																			
DCMT150404-F2 *DCMT431-F2*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0																				■								

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																															
								Coated																							Uncoated				Cermet							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020							
DCGT150404-M3 *DCGT431-M3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0																				■											
DCMT150404-M3 *DCMT431-M3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0		■	■	■	■				■																						
DCGT150408-M3 *DCGT150408-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0																				■											
DCMT150408-F2 *DCMT432-F2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0						■														■											
DCMT150408-M3 *DCMT432-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0		■	■	■	■				■																						
DCMT150412-M3 *DCMT433-M3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,6 *0.220*	55,0	7,0		■	■	■																											

DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX



DNGG, DNGM
Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

DNMA, DNMG, DNMM
Tolerances:
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

DNMU, DNMX
Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*
Size:
11/*3*
15/*4*

* Right-hand version shown

For ISO attribute explanation, see page 82

DNGG-M1


DNGG-MF1


DNGG-MF2


DNGM-MF1


DNMA


DNMA-MR9


DNMG-FF1


DNMG-FF2


DNMG-M1


DNMG-M3


DNMG-M5


DNMG-M6


DNMG-MF1


DNMG-MF2


DNMG-MF3


DNMG-MF4


DNMG-MF5


DNMG-MR3


DNMG-MR4


DNMG-MR7


DNMG-UX*


DNMM-R4


DNMU-FF2


DNMU-M3


DNMU-M5


DNMU-MF1


DNMU-MF2


DNMU-MF4


DNMU-MF5


DNMX...W-M3


DNMX...W-MF2


DNMX...W-MF4

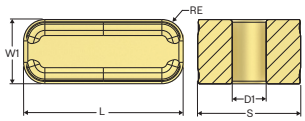

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																							Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
DNMU110402-M3 *DNMU330.5-M3*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■	■					■																		
DNMU110404-FF2 *DNMU331-FF2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■	■														■						■	
DNMU110404-M3 *DNMU331-M3*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■	■	■			■	■		■					■										
DNMU110404-MF1 *DNMU331-MF1*	0,4 *0.016*	9,525 *0.375*	11,63 *0.458*	4,762 *0.187*	3,81 *0.150*	55,0	0,0							■	■	■					■				■								
DNMU110404-MF2 *DNMU331-MF2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0	■	■	■	■	■					■					■										■	
DNMU110404-MF4 *DNMU331-MF4*	0,4 *0.016*	9,525 *0.375*	11,63 *0.458*	4,762 *0.187*	3,81 *0.150*	55,0	0,0							■	■	■																	
DNMU110404-MF5 *DNMU331-MF5*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0			■																							
DNMX110404W-MF2 *DNMX331W-MF2*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■																							
DNMU110408-FF2 *DNMU332-FF2*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■	■														■						■	
DNMU110408-M3 *DNMU332-M3*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0	■	■	■	■	■			■	■		■					■	■									
DNMU110408-M5 *DNMU332-M5*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■									■															
DNMU110408-MF1 *DNMU332-MF1*	0,8 *0.031*	9,525 *0.375*	11,63 *0.458*	4,762 *0.187*	3,81 *0.150*	55,0	0,0							■	■	■					■											
DNMU110408-MF2 *DNMU332-MF2*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0	■	■	■	■	■					■	■					■										
DNMU110408-MF4 *DNMU332-MF4*	0,8 *0.031*	9,525 *0.375*	11,63 *0.458*	4,762 *0.187*	3,81 *0.150*	55,0	0,0							■	■	■																	

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																				Uncoated				Cermet				
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020			
DNMU110408-MF5 *DNMU332-MF5*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0			■																									
DNMX110408W-MF2 *DNMX332W-MF2*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■	■																					■				
DNMU110412-M3 *DNMU333-M3*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0	■	■									■																	
DNMU110412-M5 *DNMU333-M5*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0		■																										
DNMU110412-MF2 *DNMU333-MF2*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	0,0			■																										
DNGG150402-M1 *DNGP430.5F-M1*	0,2 *0.008*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0																						■						
DNGG150404-M1 *DNGP431F-M1*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0																						■						
DNMG150404-FF2 *DNMG431-FF2*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■																							■		
DNMG150404-M3 *DNMG431-M3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■	■	■						■																	
DNMG150404-M5 *DNMG431-M5*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0				■																								
DNMG150404-MF1 *DNMP431-MF1*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0													■			■		■						■				
DNMG150404-MF2 *DNMG431-MF2*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■	■																								
DNMG150404-MF3 *DNMG431-MF3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0				■																								
DNMG150404-MF4 *DNMG431-MF4*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,762 *0.187*	5,15 *0.203*	55,0	0,0								■	■																			
DNGG150408-MF1 *DNGG432-MF1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0												■				■												
DNGG150408-MF2 *DNGG432-MF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0												■				■												
DNGG150408-M1 *DNGG432-M1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0													■															
DNGM150408-MF1 *DNGM432-MF1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0																		■										
DNMA150408 *DNMA432*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0										■																		
DNMG150408-FF2 *DNMG432-FF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■	■	■																								
DNMG150408-M1 *DNMP432-M1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0																						■						
DNMG150408-M3 *DNMG432-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■	■	■	■			■	■		■								■									
DNMG150408-M5 *DNMG432-M5*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■	■	■			■	■			■																	
DNMG150408-M6 *DNMG432-M6*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■	■																								
DNMG150408-MF1 *DNMP432-MF1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0													■	■		■		■						■				
DNMG150408-MF2 *DNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■	■	■												■											■	
DNMG150408-MF3 *DNMG432-MF3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0				■																								
DNMG150408-MF4 *DNMG432-MF4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,762 *0.187*	5,15 *0.203*	55,0	0,0							■	■	■				■		■													
DNMG150408-MF5 *DNMG432-MF5*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■							■		■				■	■											
DNMG150408-MR3 *DNMG432-MR3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0													■	■				■	■									
DNMG150408-MR4 *DNMG432-MR4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0														■	■							■						
DNMX150408W-M3 *DNMX432W-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,762 *0.187*	5,15 *0.203*	55,0	0,0		■																										
DNMX150408W-MF4 *DNMX432W-MF4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0							■																					

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																															
								Coated																						Uncoated				Cermet							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020							
DNGG150412-MF1 *DNGG433-MF1*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0											■				■																
DNMG150412-MF2 *DNMG433-MF2*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0			■																												
DNGG150412-MF2 *DNGG433-MF2*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0											■				■																
DNMA150412-MR9 *DNMA433-MR9*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0											■																				
DNMG150412-M1 *DNMP433-M1*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0																							■								
DNMG150412-M3 *DNMG433-M3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■	■	■	■						■																				
DNMG150412-M5 *DNMG433-M5*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■	■																											
DNMG150412-M6 *DNMG433-M6*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0		■	■																												
DNMG150412-MF4 *DNMG433-MF4*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0							■						■		■																
DNMG150412-MF5 *DNMG433-MF5*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0			■									■	■		■																
DNMG150412-MR3 *DNMG433-MR3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0													■	■				■													
DNMG150604-FF1 *DNMG441-FF1*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0									■																			■			
DNMG150604-FF2 *DNMG441-FF2*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■															■								■			
DNMG150604-M3 *DNMG441-M3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■	■	■	■			■		■																			
DNMG150604-M5 *DNMG441-M5*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0			■	■																											
DNMG150604-MF1 *DNMP441-MF1*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0							■	■	■				■	■		■		■	■					■							
DNMG150604-MF2 *DNMG441-MF2*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■	■	■																									■		
DNMG150604-MF3 *DNMG441-MF3*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0				■																											
DNMG150604-MF4 *DNMG441-MF4*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0							■	■	■																						
DNMG150604L-UX *DNMG441L-UX*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,16 *0.203*	55,0	0,0		■	■											■	■															
DNMG150604R-UX *DNMG441R-UX*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,16 *0.203*	55,0	0,0		■	■											■	■															
DNGG150608-MF1 *DNGG442-MF1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0												■				■															
DNGG150608-MF2 *DNGG442-MF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0												■				■															
DNMA150608 *DNMA442*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0										■																				
DNMG150608-FF2 *DNMG442-FF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■																										■		
DNMG150608-M3 *DNMG442-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■	■	■	■	■	■		■								■											
DNMG150608-M5 *DNMG442-M5*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■	■		■	■		■	■																			
DNMG150608-M6 *DNMG442-M6*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■	■							■																			
DNMG150608-MF1 *DNMP442-MF1*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0							■	■	■				■	■		■		■	■					■							
DNMG150608-MF2 *DNMG442-MF2*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■	■						■					■	■												■		
DNMG150608-MF3 *DNMG442-MF3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0				■					■																					
DNMG150608-MF4 *DNMG442-MF4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0			■	■			■	■	■				■		■															
DNMG150608-MF5 *DNMG442-MF5*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■							■		■				■	■														

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																												
								Coated																					Uncoated					Cermet			
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020			
DNMG150608-MR3 *DNMG442-MR3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0								■	■				■	■			■	■											
DNMG150608-MR7 *DNMG442-MR7*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■				■																						
DNMG150608L-UX *DNMG442L-UX*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,16 *0.203*	55,0	0,0		■	■		■									■	■												
DNMG150608R-UX *DNMG442R-UX*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,16 *0.203*	55,0	0,0		■	■		■									■	■												
DNMM150608-R4 *DNMM442-R4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■	■																							
DNMX150608W-M3 *DNMX442W-M3*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■																										
DNMX150608W-MF4 *DNMX442W-MF4*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0							■																					
DNGG150612-MF1 *DNGG443-MF1*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0												■				■												
DNGG150612-MF2 *DNGG443-MF2*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0												■				■												
DNMA150612 *DNMA443*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0										■																		
DNMA150612-MR9 *DNMA443-MR9*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0											■																	
DNMG150612-M3 *DNMG443-M3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■		■	■	■	■		■							■										
DNMG150612-M5 *DNMG443-M5*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■	■		■	■		■	■																	
DNMG150612-M6 *DNMG443-M6*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■							■																	
DNMG150612-MF2 *DNMG443-MF2*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■		■						■					■	■											
DNMG150612-MF4 *DNMG443-MF4*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0							■	■	■				■		■													
DNMG150612-MF5 *DNMG443-MF5*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■									■				■	■											
DNMG150612-MR3 *DNMG443-MR3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0								■	■					■					■									
DNMG150612-MR7 *DNMG443-MR7*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■		■							■																	
DNMM150612-R4 *DNMM443-R4*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■																								
DNMX150612W-M3 *DNMX443W-M3*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■																										
DNMG150616-M3 *DNMG444-M3*	1,6 *0.063*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■	■					■																			
DNMG150616-M5 *DNMG444-M5*	1,6 *0.063*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■	■				■																				
DNMG150616-M6 *DNMG444-M6*	1,6 *0.063*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0		■	■																									
DNMM150616-R4 *DNMM444-R4*	1,6 *0.063*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	0,0	■	■	■																									
DNMG190608-M5 *DNMG542-M5*	0,8 *0.031*	15,875 *0.625*	19,4 *0.764*	6,35 *0.250*	6,35 *0.250*	55,0	0,0				■	■																								
DNMG190612-M5 *DNMG543-M6*	1,2 *0.047*	15,875 *0.625*	19,4 *0.764*	6,35 *0.250*	6,35 *0.250*	55,0	0,0				■																									
DNMG190612-MR4 *DNMG543-MR4*	1,2 *0.047*	15,875 *0.625*	19,386 *0.763*	6,35 *0.250*	6,35 *0.250*	55,0	0,0																						■						

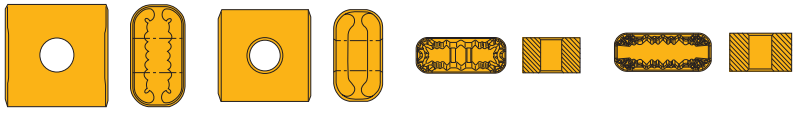
LNMX



Tolerances:
W1 = ±0,13/*0.005*
L = ±0,15/*0.006*
S = ±0,15/*0.006*
RE = ±0,1/*0.004*

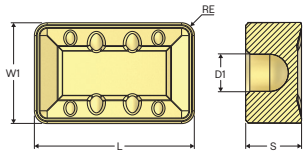
For ISO attribute explanation, see page 82

LNMX-MF **LNMX-MR** **LNMX-R2** **LNMX-RR94**



Designation	RE	W1	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																						Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
LNMX191940-MF	4,0	10,0	19,05	19,05	6,35	90,0	0,0		■			■																					
LNMX191940-MF	*0.157*	*0.394*	*0.750*	*0.750*	*0.250*																													
LNMX191940-MR	4,0	10,0	19,05	19,05	6,35	90,0	0,0	■	■																									
LNMX191940-MR	*0.157*	*0.394*	*0.750*	*0.750*	*0.250*																													
LNMX191940-R2	4,0	10,0	19,05	19,05	6,35	90,0	0,0		■																									
LNMX191940-R2	*0.157*	*0.394*	*0.750*	*0.750*	*0.250*																													
LNMX191940-RR94	4,0	10,0	19,05	19,05	6,35	90,0	0,0	■	■																									
LNMX191940-RR94	*0.157*	*0.394*	*0.750*	*0.750*	*0.250*																													
LNMX301940-MF	4,0	12,0	30,0	19,05	6,35	90,0	0,0	■	■	■																								
LNMX301940-MF	*0.157*	*0.472*	*1.181*	*0.750*	*0.250*																													
LNMX301940-MR	4,0	12,0	30,0	19,05	6,35	90,0	0,0			■																								
LNMX301940-MR	*0.157*	*0.472*	*1.181*	*0.750*	*0.250*																													
LNMX301940-R2	4,0	12,0	30,0	19,05	6,35	90,0	0,0	■	■																									
LNMX301940-R2	*0.157*	*0.472*	*1.181*	*0.750*	*0.250*																													
LNMX301940-RR94	4,0	12,0	30,0	19,05	6,35	90,0	0,0	■																										
LNMX301940-RR94	*0.157*	*0.472*	*1.181*	*0.750*	*0.250*																													

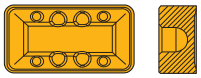
LNMX



Tolerances:
W1 = ±0,13/*0.005*
L = ±0,15/*0.006*
S = ±0,15/*0.006*
RE = ±0,1/*0.004*

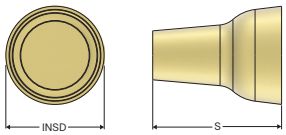
For ISO attribute explanation, see page 82

LNMX-RR96



Designation	RE	W1	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																							Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
LNMX401432-RR96 *LNMX401432-RR96*	3,2 *0.126*	25,2 *0.992*	40,0 *1.575*	14,0 *0.551*	9,3 *0.366*	90,0	0,0		■	■																								

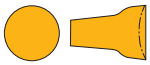
RCGS



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,25/*0.010*

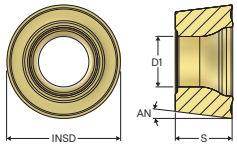
For ISO attribute explanation, see page 82

RCGS-46 **RCGS-PS**



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																																
					Coated																										Uncoated				Cermet	
	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
RCGS12.7-46 *RCGS4-46*	12,7 *0.500*	16,67 *0.656*	–	7,0													■		■			■					■	■		
RCGS12.7-PS *RCGS4F-PS*	12,7 *0.500*	16,67 *0.656*	–	7,0																							■			
RCGS4.76-46 *RCGS1.5-46*	4,76 *0.187*	6,35 *0.250*	–	7,0													■		■			■					■	■		
RCGS4.76-PS *RCGS1.5-PS*	4,76 *0.187*	6,35 *0.250*	–	7,0																		■					■			
RCGS6.35-46 *RCGS2-46*	6,35 *0.250*	9,13 *0.359*	–	7,0													■		■			■					■	■		
RCGS6.35-PS *RCGS2-PS*	6,35 *0.250*	9,13 *0.359*	–	7,0																		■					■	■		
RCGS9.525-46 *RCGS3-46*	9,525 *0.375*	13,1 *0.516*	–	7,0													■		■			■					■	■		
RCGS9.525-PS *RCGS3-PS*	9,525 *0.375*	13,1 *0.516*	–	7,0													■					■					■			

RCGT, RCMM, RCMT, RCMX



RCMM
Tolerances: Size:
INSD = ±0,08/*.003* 12-19/*4-6*
INSD = ±0,10/*.004* *25/8*
S = ±0,05/*.002*

RCMT
Tolerances: Size:
INSD = ±0,05/*.002* 06-10/*2-10*
INSD = ±0,08/*.003* *12/4*
INSD = ±0,10/*.004* *16/16*
S = ±0,05/*.002* 06-10/*2-10*
S = ±0,13/*.005* 12-16/*4-16*

RCGT, RCMX
Tolerances: Size:
INSD = ±0,08/*.003* 10-20/*10-20*
INSD = ±0,10/*.004* 25-32/*25-32*
S = ±0,05/*.002* *10/10*
S = ±0,13/*.005* 12-32/*12-32*

Shape of clamping hole differ for RCMM, RCMT and RCMX see www.secotools.com

For ISO attribute explanation, see page 82

RCGT-MF2



RCMM-46



RCMT-F1



RCMT-F16



RCMT-F2



RCMT-M3

RCMT-MF2



RCMT-R3



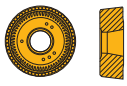
RCMT-RR94



RCMX-H-RR93



RCMX-R3



RCMX-RR93



RCMX-RR94

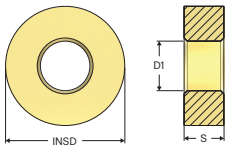


RCMX-RR97

Designation	INSD	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
						Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
RCMT0602M0-F1 *RCMT0602M0-F1*	6,0 *0.236*	2,38 *0.094*	2,9 *0.114*	–	7,0			■	■															■							
RCMT0602M0-F2 *RCMT0602M0-F2*	6,0 *0.236*	2,38 *0.094*	2,9 *0.114*	–	7,0													■							■						
RCMT0602M0-M3 *RCMT0602M0-M3*	6,0 *0.236*	2,38 *0.094*	2,9 *0.114*	0,0	7,0			■		■																					
RCMT060300-F16 *RCMT22-F16*	6,35 *0.250*	3,21 *0.126*	2,79 *0.110*	–	7,0					■																					
RCGT0803M0-MF2 *RCGT0803M0-MF2*	8,0 *0.315*	3,18 *0.125*	3,5 *0.138*	–	7,0														■				■				■				
RCMT0803M0-MF2 *RCMT0803M0-MF2*	8,0 *0.315*	3,18 *0.125*	3,5 *0.138*	–	7,0			■		■			■	■					■		■			■							
RCMT0803M0-F1 *RCMT0803M0-F1*	8,0 *0.315*	3,18 *0.125*	3,5 *0.138*	0,0	7,0			■	■	■											■			■							
RCMT0803M0-F2 *RCMT0803M0-F2*	8,0 *0.315*	3,18 *0.125*	3,5 *0.138*	–	7,0													■					■		■						
RCMT0803M0-M3 *RCMT0803M0-M3*	8,0 *0.315*	3,18 *0.125*	3,5 *0.138*	0,0	7,0		■	■	■	■						■															
RCMT09T300-F16 *RCMT32.5-F16*	9,525 *0.375*	3,97 *0.156*	3,9 *0.154*	–	7,0					■																					
RCMX100300-RR94 *RCMX100300-RR94*	10,0 *0.394*	3,18 *0.125*	3,6 *0.142*	–	7,0				■																						
RCGT10T3M0-MF2 *RCGT10T3M0-MF2*	10,0 *0.394*	3,97 *0.156*	4,5 *0.177*	–	7,0														■				■				■				
RCMT10T3M0-MF2 *RCMT10T3M0-MF2*	10,0 *0.394*	3,97 *0.156*	4,5 *0.177*	–	7,0		■	■	■	■		■	■	■					■		■			■							
RCMT10T3M0-F1 *RCMT10T3M0-F1*	10,0 *0.394*	3,97 *0.156*	4,5 *0.177*	0,0	7,0			■	■			■									■			■							
RCMT10T3M0-F2 *RCMT10T3M0-F2*	10,0 *0.394*	3,97 *0.156*	4,5 *0.177*	–	7,0						■							■								■					
RCMT10T3M0-M3 *RCMT10T3M0-M3*	10,0 *0.394*	3,97 *0.156*	4,5 *0.177*	0,0	7,0		■	■	■	■		■				■															
RCMT120400-F16 *RCMT43-F16*	12,7 *0.500*	4,76 *0.187*	4,5 *0.177*	–	7,0					■																					
RCMM120400-46 *RCMM43-46*	12,7 *0.500*	4,89 *0.193*	5,16 *0.203*	–	7,0					■																	■				
RCMX120400-RR94 *RCMX120400-RR94*	12,0 *0.472*	4,76 *0.187*	4,2 *0.165*	–	7,0			■	■																						
RCGT1204M0-MF2 *RCGT1204M0-MF2*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	–	7,0														■								■				

Designation	INSD	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
						Coated																					Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
RCMT1204M0-MF2 *RCMT1204M0-MF2*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	–	7,0		■	■	■	■		■	■	■		■	■		■		■			■							
RCMT1204M0-F1 *RCMT1204M0-F1*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	0,0	7,0		■	■	■			■				■					■			■							
RCMT1204M0-F2 *RCMT1204M0-F2*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	–	7,0						■							■								■					
RCMT1204M0-M3 *RCMT1204M0-M3*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	0,0	7,0		■	■	■	■		■			■	■					■										
RCMT1204M0-RR94 *RCMT1204M0-RR94*	12,0 *0.472*	4,76 *0.187*	4,5 *0.177*	–	7,0				■																						
RCMX160600-RR94 *RCMX160600-RR94*	16,0 *0.630*	6,35 *0.250*	5,2 *0.205*	–	7,0		■	■	■																						
RCGT1606M0-MF2 *RCGT1606M0-MF2*	16,0 *0.630*	6,35 *0.250*	5,6 *0.220*	–	7,0		■	■	■										■					■			■				
RCMT1606M0-F1 *RCMT1606M0-F1*	16,0 *0.630*	6,35 *0.250*	5,6 *0.220*	–	7,0	■	■	■	■																						
RCMT1606M0-F2 *RCMT1606M0-F2*	16,0 *0.630*	6,35 *0.250*	5,6 *0.220*	–	7,0						■															■					
RCMT1606M0-M3 *RCMT1606M0-M3*	16,0 *0.630*	6,35 *0.250*	5,6 *0.220*	0,0	7,0	■	■	■	■	■																					
RCMM190600-46 *RCMM64-46*	19,05 *0.750*	6,35 *0.250*	7,95 *0.313*	–	7,0					■										■							■				
RCMX200600-R3 *RCMX200600-R3*	20,0 *0.787*	6,35 *0.250*	6,5 *0.256*	–	7,0	■	■	■																							
RCMX200600-RR93 *RCMX200600-RR93*	20,0 *0.787*	6,35 *0.250*	6,5 *0.256*	0,0	7,0	■	■	■		■																					
RCMX200600-RR94 *RCMX200600-RR94*	20,0 *0.787*	6,35 *0.250*	6,5 *0.256*	0,0	7,0				■																						
RCMT2006M0-R3 *RCMT2006M0-R3*	20,0 *0.787*	6,35 *0.250*	6,6 *0.260*	–	7,0			■											■												
RCMM250600-46 *RCMM84-46*	25,4 *1.000*	6,35 *0.250*	7,95 *0.313*	–	7,0																						■				
RCMX250700-R3 *RCMX250700-R3*	25,0 *0.984*	7,94 *0.313*	7,2 *0.283*	–	7,0	■	■	■																							
RCMX250700-RR93 *RCMX250700-RR93*	25,0 *0.984*	7,94 *0.313*	7,2 *0.283*	0,0	7,0	■	■			■																					
RCMX250700-RR94 *RCMX250700-RR94*	25,0 *0.984*	7,94 *0.313*	7,2 *0.283*	–	7,0				■																						
RCMX320900-R3 *RCMX320900-R3*	32,0 *1.260*	9,52 *0.375*	9,5 *0.374*	–	7,0			■																							
RCMX320900-RR93 *RCMX320900-RR93*	32,0 *1.260*	9,52 *0.375*	9,5 *0.374*	–	7,0	■	■																								
RCMX320900-H-RR93 *RCMX320900-H-RR93*	32,0 *1.260*	9,52 *0.375*	10,4 *0.409*	–	7,0			■																							
RCMX320900-RR94 *RCMX320900-RR94*	32,0 *1.260*	9,52 *0.375*	9,5 *0.374*	–	7,0	■		■	■																						
RCMX320900-RR97 *RCMX320900-RR97*	32,0 *1.260*	9,52 *0.375*	9,5 *0.374*	–	7,0	■																									

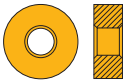
RNMA, RNMG



Tolerances: Size:
INSD = ±0,08/*0.003* 12/*4*
INSD = ±0,10/*0.004* 19/*6*
INSD = ±0,13/*0.005* 25/*8*
S = ±0,13/*0.005*

For ISO attribute explanation, see page 82

RNMA



RNMG-M3

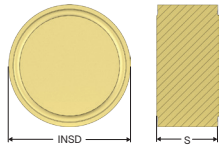


RNMG-MR4



Designation	INSD	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
						Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
RNMA120400 *RNMA43*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	–	0,0											■															
RNMG120400-M3 *RNMG43-M3*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	–	0,0		■	■	■																						
RNMG120400-MR4 *RNMG43-MR4*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	–	0,0															■							■				
RNMG190600-MR4 *RNMG64-MR4*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	–	0,0															■							■				
RNMG250900-MR4 *RNMG86-MR4*	25,4 *1.000*	9,52 *0.375*	9,12 *0.359*	–	0,0															■							■				

RNMF



Tolerances:
INSD = ±0,08/*0.003*
S = ±0,13/*0.005*

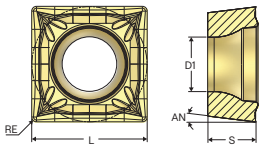
For ISO attribute explanation, see page 82

RNMF-MR7



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
					Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
RNMF150700-MR7 *RNMF55-MR7*	15,875 *0.625*	8,067 *0.318*	–	0,0		■																									

SCMT

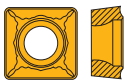


Tolerances:
L = ±0,05/*0.002*
L = ±0,08/*0.003*
L = ±0,13/*0.005*
L = ±0,15/*0.006*
S = ±0,05/*0.002*
S = ±0,13/*0.005*
S = ±0,15/*0.006*
RE = ±0,1/*0.004*

Size:
06-09/*2-3*
12/*4*
15-25/*5-8*
38/*12*
06-09/*2-3*
12-25/*4-8*
38/*12*

For ISO attribute explanation, see page 82

SCMT-F1



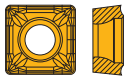
SCMT-F2/M3



SCMT-M5



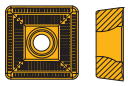
SCMT-MF2



SCMT-RR96



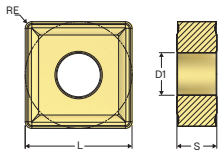
SCMT-RR97



Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
							Coated																						Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
SCMT060204-F2 *SCMT21.51-F2*	0,4 *0.016*	6,35 *0.250*	2,38 *0.094*	2,9 *0.114*	90,0	7,0						■																				
SCMT060204-M3 *SCMT21.51-M3*	0,4 *0.016*	6,35 *0.250*	2,38 *0.094*	2,9 *0.114*	90,0	7,0			■	■	■				■																	
SCMT070308-F2 *SCMT2.522-F2*	0,8 *0.031*	7,94 *0.313*	3,18 *0.125*	3,5 *0.138*	90,0	7,0						■																				
SCMT070308-M3 *SCMT2.522-M3*	0,8 *0.031*	7,94 *0.313*	3,18 *0.125*	3,5 *0.138*	90,0	7,0			■	■					■																	
SCMT09T304-F1 *SCMT32.51-F1*	0,4 *0.016*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■	■															■							
SCMT09T304-F2 *SCMT32.51-F2*	0,4 *0.016*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0						■																				
SCMT09T304-M3 *SCMT32.51-M3*	0,4 *0.016*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■	■	■		■		■																	
SCMT09T304-MF2 *SCMT32.51-MF2*	0,4 *0.016*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■						■																	
SCMT09T308-F1 *SCMT32.52-F1*	0,8 *0.031*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■	■							■								■						■	
SCMT09T308-F2 *SCMT32.52-F2*	0,8 *0.031*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0						■																				
SCMT09T308-M3 *SCMT32.52-M3*	0,8 *0.031*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0		■	■	■	■		■		■	■	■															
SCMT09T308-M5 *SCMT32.52-M5*	0,8 *0.031*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■					■																	
SCMT09T308-MF2 *SCMT32.52-MF2*	0,8 *0.031*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0			■	■					■										■						■	
SCMT09T312-F1 *SCMT32.53-F1*	1,2 *0.047*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0				■																						
SCMT09T312-M5 *SCMT32.53-M5*	1,2 *0.047*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0				■																						
SCMT09T312-MF2 *SCMT32.53-MF2*	1,2 *0.047*	9,52 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0				■					■																	
SCMT120408-F1 *SCMT432-F1*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0			■	■			■												■							
SCMT120408-F2 *SCMT432-F2*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0						■																				
SCMT120408-M3 *SCMT432-M3*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0		■	■	■	■		■		■	■	■															
SCMT120408-M5 *SCMT432-M5*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0			■	■				■			■															
SCMT120408-MF2 *SCMT432-MF2*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0			■	■	■				■																	
SCMT120412-F1 *SCMT433-F1*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0		■																	■							
SCMT120412-M3 *SCMT433-M3*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0											■															
SCMT120412-MF2 *SCMT433-MF2*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,6 *0.220*	90,0	7,0							■		■																	
SCMT150512-F2 *SCMT53.53-F2*	1,2 *0.047*	15,88 *0.625*	5,56 *0.219*	8,7 *0.343*	90,0	7,0						■																				

Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																							
							Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
SCMT250924-RR97 *SCMT866-RR97*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	8,7 *0.343*	90,0	7,0					■																			
SCMT380932-RR96 *SCMT1268-RR96*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	8,7 *0.343*	90,0	7,0					■																			
SCMT380932-RR97 *SCMT1268-RR97*	3,2 *0.126*	38,1 *1.500*	9,52 *0.375*	8,7 *0.343*	90,0	7,0	■																							

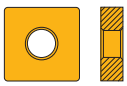
SNMA, SNMG, SNMM

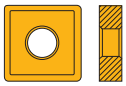


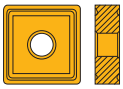
Tolerances:
L = ±0,05/*0.002*
L = ±0,08/*0.003*
L = ±0,10/*0.004*
L = ±0,13/*0.005*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

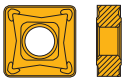
Size:
09/*3*
12/*4*
15-19/*5-6*
25/*8*

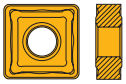
For ISO attribute explanation, see page 82

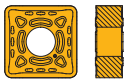
SNMA


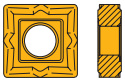
SNMA-MR9


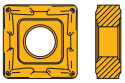
SNMG-M1


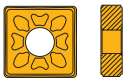
SNMG-M3


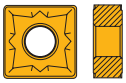
SNMG-M5


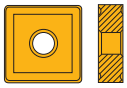
SNMG-M6


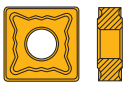
SNMG-MF1


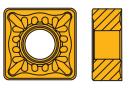
SNMG-MF2


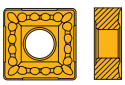
SNMG-MF4


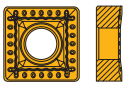
SNMG-MR3


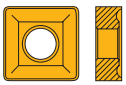
SNMG-MR4


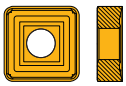
SNMG-MR7


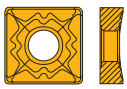
SNMM...W-R7


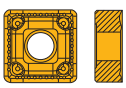
SNMM-R4


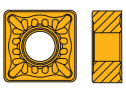
SNMM-R5


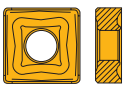
SNMM-R56


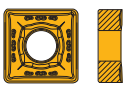
SNMM-R57


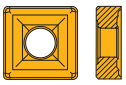
SNMM-R6


SNMM-R68


SNMM-R7


SNMM-R8


SNMM-RR6


SNMM-RR9


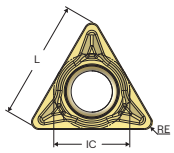
Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																												
							Coated																				Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020				
SNMG090304-MF2 *SNMG321-MF2*	0,4 *0.016*	9,525 *0.375*	3,18 *0.125*	3,81 *0.150*	90,0	0,0			■																								
SNMG090308-MF2 *SNMG322-MF2*	– –	9,525 *0.375*	– –	3,81 *0.150*	90,0	0,0			■																								
SNMG090308-M5 *SNMG322-M5*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	3,81 *0.150*	90,0	0,0			■	■																							
SNMG120404-M3 *SNMG431-M3*	0,4 *0.016*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0			■	■																							
SNMA120408 *SNMA432*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0										■	■																
SNMG120408-M1 *SNMP432-M1*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0																						■					
SNMG120408-M3 *SNMG432-M3*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■	■	■			■		■								■								
SNMG120408-M5 *SNMG432-M5*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0			■	■	■	■	■	■			■					■											
SNMG120408-M6 *SNMG432-M6*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■																							
SNMG120408-MF1 *SNMP432-MF1*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0							■		■				■	■				■	■				■				
SNMG120408-MF2 *SNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	4,762 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■	■											■									■		
SNMG120408-MF4 *SNMG432-MF4*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0							■	■	■																		
SNMG120408-MR3 *SNMG432-MR3*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0								■	■				■	■				■	■								
SNMG120408-MR4 *SNMG432-MR4*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0															■							■					
SNMG120408-MR7 *SNMG432-MR7*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0			■	■		■		■																			
SNMM120408-R4 *SNMM432-R4*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0				■																							
SNMM120408-R6 *SNMM432-R6*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0						■																					

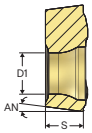
Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
							Coated																					Uncoated				Cermet	
	mm inch	mm inch	mm inch	mm inch			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
SNMA120412-MR9 *SNMA433-MR9*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0										■	■															
SNMA120412 *SNMA433*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0										■																
SNMG120412-M3 *SNMG433-M3*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■	■	■			■																	
SNMG120412-M5 *SNMG433-M5*	1,2 *0.047*	12,7 *0.500*	4,762 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■		■	■	■			■					■										
SNMG120412-M6 *SNMG433-M6*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■																								
SNMG120412-MF1 *SNMP433-MF1*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0													■	■				■	■							
SNMG120412-MF2 *SNMG433-MF2*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■													■										
SNMG120412-MF4 *SNMG433-MF4*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0							■	■	■																	
SNMG120412-MR3 *SNMG433-MR3*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0								■	■				■	■					■							
SNMG120412-MR4 *SNMG433-MR4*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0															■							■				
SNMG120412-MR7 *SNMG433-MR7*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0			■	■							■															
SNMM120412-R4 *SNMM433-R4*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0				■																						
SNMA120416-MR9 *SNMA434-MR9*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0											■															
SNMA120416 *SNMA434*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0										■																
SNMG120416-M3 *SNMG434-M3*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■																						
SNMG120416-M5 *SNMG434-M5*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0		■	■	■				■																		
SNMG120416-MR4 *SNMG434-MR4*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0															■							■				
SNMG120416-MR7 *SNMG434-MR7*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	0,0			■																							
SNMG150608-M5 *SNMG542-M5*	0,8 *0.031*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0			■																							
SNMA150612 *SNMA543*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0											■															
SNMG150612-M3 *SNMG543-M3*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0		■	■																							
SNMG150612-M5 *SNMG543-M5*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0		■	■	■	■	■		■																		
SNMG150612-M6 *SNMG543-M6*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0		■	■																							
SNMG150612-MR4 *SNMG543-MR4*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0															■							■				
SNMG150612-MR7 *SNMG543-MR7*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0			■	■		■					■															
SNMM150612-R4 *SNMM543-R4*	1,2 *0.047*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0			■	■																						
SNMA150616-MR9 *SNMA544-MR9*	1,6 *0.063*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0											■															
SNMG150616-M5 *SNMG544-M5*	1,6 *0.063*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0	■	■	■	■	■	■		■																		
SNMG150616-M6 *SNMG544-M6*	1,6 *0.063*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0	■	■		■																						
SNMG150616-MR7 *SNMG544-MR7*	1,6 *0.063*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0			■								■															
SNMM150616-R4 *SNMM544-R4*	1,6 *0.063*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0	■		■																							
SNMM150624-R7 *SNMM546-R7*	2,4 *0.094*	15,875 *0.625*	6,35 *0.250*	6,35 *0.250*	90,0	0,0			■																							
SNMA190612 *SNMA643*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0										■																

Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
							Coated																				Uncoated				Cermet		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
SNMG190612-M3 *SNMG643-M3*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■																						
SNMG190612-M5 *SNMG643-M5*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■	■	■		■			■															
SNMG190612-M6 *SNMG643-M6*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0		■																								
SNMG190612-MR4 *SNMG643-MR4*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0															■							■				
SNMG190612-MR7 *SNMG643-MR7*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■		■		■																		
SNMM190612-R4 *SNMM643-R4*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■																						
SNMM190612-R6 *SNMM643-R6*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■		■																				
SNMM190612-R7 *SNMM643-R7*	1,2 *0.047*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■																							
SNMA190616 *SNMA644*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0										■	■															
SNMG190616-M3 *SNMG644-M3*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■																							
SNMG190616-M5 *SNMG644-M5*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0		■	■	■	■	■		■																		
SNMG190616-M6 *SNMG644-M6*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0	■	■																								
SNMG190616-MR3 *SNMG644-MR3*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0														■				■	■							
SNMG190616-MR4 *SNMG644-MR4*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0																						■				
SNMG190616-MR7 *SNMG644-MR7*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0	■	■	■	■	■	■		■																		
SNMM190616-R4 *SNMM644-R4*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0		■	■	■		■																				
SNMM190616-R5 *SNMM644-R5*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■																							
SNMM190616-R56 *SNMM644-R56*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■																						
SNMM190616-R57 *SNMM644-R57*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0		■																								
SNMM190616-R6 *SNMM644-R6*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■																						
SNMM190616-R7 *SNMM644-R7*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■																						
SNMM190616W-R7 *SNMM644W-R7*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■																							
SNMM190616-R8 *SNMM644-R8*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■		■																				
SNMM190616-RR6 *SNMM643-RR6*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■				■																		
SNMM190616-RR9 *SNMM644-RR9*	1,6 *0.063*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0						■																				
SNMG190624-M6 *SNMG646-M6*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■																						
SNMG190624-MR7 *SNMG646-MR7*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■		■																					
SNMM190624-R4 *SNMM646-R4*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0	■		■	■																						
SNMM190624-R57 *SNMM646-R57*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0				■																						
SNMM190624-R7 *SNMM646-R7*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■	■																						
SNMM190624W-R7 *SNMM646W-R7*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0			■																							
SNMM190624-RR6 *SNMM646-RR6*	2,4 *0.094*	19,05 *0.750*	6,35 *0.250*	7,92 *0.312*	90,0	0,0								■																		
SNMM250724-R56 *SNMM856-R56*	2,4 *0.094*	25,4 *1.000*	7,94 *0.313*	9,12 *0.359*	90,0	0,0			■	■																						

Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																									
							Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
SNMM250724-R57 *SNMM856-R57*	2,4 *0.094*	25,4 *1.000*	7,94 *0.313*	9,12 *0.359*	90,0	0,0				■	■																					
SNMM250724-R7 *SNMM856-R7*	2,4 *0.094*	25,4 *1.000*	7,94 *0.313*	9,12 *0.359*	90,0	0,0	■		■	■	■																					
SNMM250724-RR6 *SNMM856-RR6*	2,4 *0.094*	25,4 *1.000*	7,94 *0.313*	9,12 *0.359*	90,0	0,0			■				■	■																		
SNMM250724-RR9 *SNMM856-RR9*	2,4 *0.094*	25,4 *1.000*	7,94 *0.313*	9,12 *0.359*	90,0	0,0				■		■																				
SNMG250924-MR4 *SNMG866-MR4*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	9,12 *0.359*	90,0	0,0																						■				
SNMG250924-MR7 *SNMG866-MR7*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	9,12 *0.359*	90,0	0,0	■		■	■	■																					
SNMM250924-R68 *SNMM866-R68*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	9,12 *0.359*	90,0	0,0	■		■					■																		
SNMM250924-R7 *SNMM866-R7*	2,4 *0.094*	25,4 *1.000*	9,52 *0.375*	9,12 *0.359*	90,0	0,0	■		■	■	■																					

TCGT, TCGX, TCMT, TCMX





TCGT
Tolerances:
IC = ±0,025/*0.001*
S = ±0,05/*0.002*
RE (≥0,2/*0.008*) = ±0,1/*0.004*
RE (≤0,1/*0.004*) = ±0,025/*0.001*

TCGX
Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

TCMT, TCMX
Tolerances: Size:
IC = ±0,05/*0.002* 11-16/*2-3*
IC = ±0,08/*0.003* 22/*4*
S = ±0,05/*0.002* 11-16/*2-3*
S = ±0,13/*0.005* 22/*4*
RE = ±0,1/*0.004*

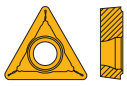
* Right-hand version shown

For ISO attribute explanation, see page 82

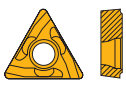
TCGT-AL



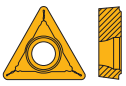
TCGT-F1



TCGT-UX*



TCMT-F1



TCMT-F2



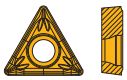
TCMT-M3



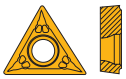
TCMT-M5



TCMT-MF2



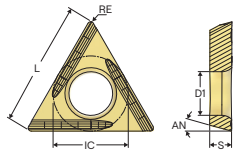
TCMX...W-F1



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																															
								Coated																					Uncoated				Cermet							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020							
TCGT090202F-AL *TCGT1.81.50.5F-AL*	0,2 *0.008*	5,56 *0.219*	9,63 *0.379*	2,38 *0.094*	2,5 *0.098*	60,0	7,0														■							■										
TCGT090204F-AL *TCGT1.81.51F-AL*	0,4 *0.016*	5,56 *0.219*	9,63 *0.379*	2,38 *0.094*	2,5 *0.098*	60,0	7,0														■							■										
TCGT110201-F1 *TCGT21.50-F1*	0,1 *0.004*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0																		■													
TCGT110202F-AL *TCGT21.50.5F-AL*	0,2 *0.008*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0														■							■										
TCGT110202R-UX *TCGT21.50.5R-UX*	0,2 *0.008*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0																		■													
TCGT110202L-UX *TCGT21.50.5L-UX*	0,2 *0.008*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0																		■													
TCMT110202-F1 *TCMT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0				■		■												■													
TCGT110204F-AL *TCGT21.51F-AL*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0														■							■										
TCGT110204R-UX *TCGT21.51R-UX*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0									■										■													
TCGT110204L-UX *TCGT21.51L-UX*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0																		■													
TCMT110204-F1 *TCMT21.51-F1*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0		■	■	■	■	■	■	■	■									■													
TCMT110204-MF2 *TCMT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0			■	■					■									■													
TCGT110208F-AL *TCGT21.52F-AL*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,8 *0.110*	60,0	7,0																					■										
TCMT110208-F1 *TCMT21.52-F1*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0		■	■	■	■	■												■													
TCMT110208-MF2 *TCMT21.52-MF2*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0			■	■					■									■													
TCMT16T302-F1 *TCMT32.50.5-F1*	0,2 *0.008*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0				■				■																							
TCGT16T304F-AL *TCGT32.51F-AL*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,4 *0.173*	60,0	7,0																					■										
TCMT16T304-F1 *TCMT32.51-F1*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■	■	■		■	■	■	■				■				■										■					
TCMT16T304-F2 *TCMT32.51-F2*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0																				■											
TCMT16T304-M3 *TCMT32.51-M3*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■	■	■	■						■																				
TCMT16T304-MF2 *TCMT32.51-MF2*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0			■	■					■									■													
TCGT16T308F-AL *TCGT32.52F-AL*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,4 *0.173*	60,0	7,0																					■										

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																					Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TCMT16T308-F1 *TCMT32.52-F1*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■	■	■	■		■	■					■					■								
TCMT16T308-F2 *TCMT32.52-F2*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0						■														■					
TCMT16T308-M3 *TCMT32.52-M3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■	■	■	■		■		■	■	■														
TCMT16T308-M5 *TCMT32.52-M5*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0	■		■	■		■		■			■														
TCMT16T308-MF2 *TCMT32.52-MF2*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0			■	■					■									■							
TCMX16T308W-F1 *TCMX32.52W-F1*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■	■																					
TCMT16T312-F1 *TCMT32.53-F1*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0		■		■																				
TCMT16T312-M5 *TCMT32.53-M5*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0			■	■							■														
TCMT220404-F2 *TCMT431-F2*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,6 *0.220*	60,0	7,0																				■					
TCMT220408-M3 *TCMT432-M3*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,6 *0.220*	60,0	7,0		■	■	■	■																				

TDAB, TDCH

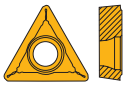


Tolerances:
IC = ±0,025/*0.001*
S = ±0,025/*0.001*
RE = ±0,025/*0.001*

* Right-hand version shown

For ISO attribute explanation, see page 82

TDAB

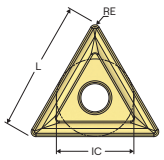


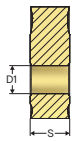
TDCH*



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																					Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TDAB06T0005 *TDAB1.21.50*	0,05 *0.002*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDAB06T002 *TDAB1.21.50.5*	0,2 *0.008*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDCH06T002L *TDCH1.21.50.5L*	0,2 *0.008*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDCH06T002R *TDCH1.21.50.5R*	0,2 *0.008*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDAB06T004 *TDAB1.21.51*	0,4 *0.016*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDCH06T004L *TDCH1.21.51L*	0,4 *0.016*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								
TDCH06T004R *TDCH1.21.51R*	0,4 *0.016*	4,064 *0.160*	6,8 *0.268*	1,194 *0.047*	2,36 *0.093*	60,0	15,0																			■								

TNMA, TNMG, TNMM, TNMX





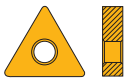
Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
IC = ±0,10/*0.004*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Size:
11-16/*2-3*
22/*4*
27-33/*5-6*

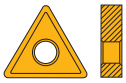
* Right-hand version shown

For ISO attribute explanation, see page 82

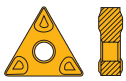
TNMA



TNMA-MR9



TNMG-FF1



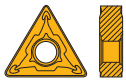
TNMG-FF2



TNMG-M1



TNMG-M3



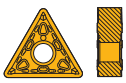
TNMG-M4



TNMG-M5



TNMG-M6



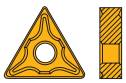
TNMG-MF1



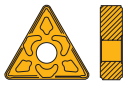
TNMG-MF2



TNMG-MF3



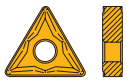
TNMG-MF4



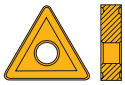
TNMG-MF5



TNMG-MR3



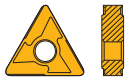
TNMG-MR4



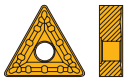
TNMG-MR7



TNMG-UX*



TNMM-R4



TNMM-R6



TNMX...W-M3



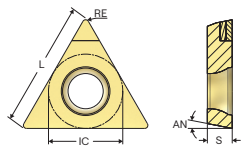
Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																				Uncoated				Cermet			
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TNMG110304-MF2 *TNMG221-MF2*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	2,26 *0.089*	60,0	0,0			■																							
TNMG110304-MR4 *TNMG221-MR4*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	2,26 *0.089*	60,0	0,0																						■				
TNMG160304-MR4 *TNMG321-MR4*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	3,81 *0.150*	60,0	0,0																						■				
TNMG160308-M5 *TNMG322-M5*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	3,81 *0.150*	60,0	0,0				■		■																				
TNMG160308-MF3 *TNMG322-MF3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	3,81 *0.150*	60,0	0,0				■																						
TNMG160308-MR4 *TNMG322-MR4*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	3,81 *0.150*	60,0	0,0																						■				
TNMG160404-FF1 *TNMG331-FF1*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0									■																■		
TNMG160404-FF2 *TNMG331-FF2*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■															■						■		
TNMG160404-M3 *TNMG331-M3*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■	■	■	■		■	■		■															
TNMG160404-M5 *TNMG331-M5*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■	■																						
TNMG160404-MF1 *TNMP331-MF1*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,762 *0.187*	3,81 *0.150*	60,0	0,0							■	■	■				■	■			■									
TNMG160404-MF2 *TNMG331-MF2*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■	■	■																				■	■
TNMG160404-MF3 *TNMG331-MF3*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0				■																						
TNMG160404-MF4 *TNMG331-MF4*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0							■	■	■																	
TNMG160404-MF5 *TNMG331-MF5*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0															■											
TNMG160404R-UX *TNMG331R-UX*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■												■											
TNMG160404L-UX *TNMG331L-UX*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■												■											

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
TNMM160404-R6 *TNMM331-R6*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0				■																										
TNMA160408 *TNMA332*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0										■	■																		
TNMG160408-FF1 *TNMG332-FF1*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■																										
TNMG160408-FF2 *TNMG332-FF2*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■																								■		
TNMG160408-M3 *TNMG332-M3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0	■	■	■	■	■	■		■	■										■										
TNMG160408-M4 *TNMG332-M4*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0											■																		
TNMG160408-M5 *TNMG332-M5*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0	■	■	■	■	■	■	■	■		■	■																		
TNMG160408-M6 *TNMG332-M6*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■																										
TNMG160408-MF1 *TNMP332-MF1*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0							■	■	■				■	■			■	■					■						
TNMG160408-MF2 *TNMG332-MF2*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0	■	■	■	■	■											■											■		
TNMG160408-MF3 *TNMG332-MF3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0				■		■			■																				
TNMG160408-MF4 *TNMG332-MF4*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0							■	■	■				■					■											
TNMG160408-MF5 *TNMG332-MF5*	0,8 *0.031*	9,525 *0.375*	16,498 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■													■	■												
TNMG160408-MR4 *TNMG332-MR4*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0															■							■						
TNMG160408-MR7 *TNMG332-MR7*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0				■		■																							
TNMG160408R-UX *TNMG332R-UX*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■												■														
TNMG160408L-UX *TNMG332L-UX*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■																										
TNMM160408-R4 *TNMM332-R4*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■	■																									
TNMM160408-R6 *TNMM332-R6*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0						■																							
TNMX160408W-M3 *TNMX332W-M3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■																										
TNMA160412-MR9 *TNMA333-MR9*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0											■																		
TNMA160412 *TNMA333*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0										■	■																		
TNMG160412-M3 *TNMG333-M3*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■	■				■																				
TNMG160412-M5 *TNMG333-M5*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0	■	■	■	■							■																		
TNMG160412-M6 *TNMG333-M6*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■		■																								
TNMG160412-MF1 *TNMP333-MF1*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0													■					■	■										
TNMG160412-MF2 *TNMG333-MF2*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■	■													■													
TNMG160412-MF4 *TNMG333-MF4*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0							■	■	■																				
TNMG160412-MF5 *TNMG333-MF5*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0			■																										
TNMG160412-MR3 *TNMG333-MR3*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0																		■											
TNMG160412-MR7 *TNMG333-MR7*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■		■																								
TNMX160412W-M3 *TNMX333W-M3*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0		■																										
TNMA160416-MR9 *TNMA334-MR9*	1,6 *0.063*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0											■																		

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																															
								Coated																					Uncoated				Cermet							
	mm inch	mm inch	mm inch	mm inch	mm inch			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020							
TNMA160416 *TNMA334*	1,6 *0.063*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0										■																					
TNMG160416-M5 *TNMG334-M5*	1,6 *0.063*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	0,0											■																					
TNMG220404-M5 *TNMG431-M5*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0			■	■																											
TNMG220404-MF2 *TNMG431-MF2*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0			■																												
TNMG220404-MF3 *TNMG431-MF3*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0				■																											
TNMG220404-MR4 *TNMG431-MR4*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0																							■							
TNMA220408 *TNMA432*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0										■																					
TNMG220408-M1 *TNMP432-M1*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0															■								■							
TNMG220408-M3 *TNMG432-M3*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■	■	■	■				■																					
TNMG220408-M5 *TNMG432-M5*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0	■	■	■	■	■	■		■			■																			
TNMG220408-M6 *TNMG432-M6*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■		■																											
TNMG220408-MF2 *TNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■	■																											
TNMG220408-MF3 *TNMG432-MF3*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0				■																											
TNMG220408-MF4 *TNMG432-MF4*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0							■	■	■																					
TNMG220408-MR4 *TNMG432-MR4*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0															■								■							
TNMG220408-MR7 *TNMG432-MR7*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0				■		■																									
TNMM220408-R4 *TNMM432-R4*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0			■	■																											
TNMM220408-R6 *TNMM432-R6*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0						■																									
TNMA220412 *TNMA433*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0											■																					
TNMG220412-M1 *TNMP433-M1*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0																							■							
TNMG220412-M3 *TNMG433-M3*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■	■	■					■																					
TNMG220412-M5 *TNMG433-M5*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0	■	■	■	■				■																					
TNMG220412-M6 *TNMG433-M6*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■																												
TNMG220412-MF4 *TNMG433-MF4*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0							■	■	■																					
TNMG220412-MR3 *TNMG433-MR3*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0																		■	■											
TNMG220412-MR4 *TNMG433-MR4*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0															■															
TNMG220412-MR7 *TNMG433-MR7*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0				■		■																									
TNMM220412-R4 *TNMM433-R4*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■	■	■																											
TNMA220416 *TNMA434*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0										■																					
TNMG220416-M1 *TNMP434-M1*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0																							■							
TNMG220416-M5 *TNMG434-M5*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0		■	■	■		■		■																					
TNMG220416-MR4 *TNMG434-MR4*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0															■															
TNMM220416-R4 *TNMM434-R4*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0			■																											

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
TNMM220416-R6 *TNMM434-R6*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0				■																										
TNMG220432-MR4 *TNMG438-MR4*	3,2 *0.126*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	60,0	0,0														■															
TNMG270608-M5 *TNMG542-M5*	0,8 *0.031*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0				■		■																						
TNMG270608-MR4 *TNMG542-MR4*	0,8 *0.031*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0																						■						
TNMG270612-M3 *TNMG543-M3*	1,2 *0.047*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0			■	■	■																							
TNMG270612-M5 *TNMG543-M5*	1,2 *0.047*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0		■	■	■	■	■		■																				
TNMG270612-M6 *TNMG543-M6*	1,2 *0.047*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0			■																									
TNMG270612-MR7 *TNMG543-MR7*	1,2 *0.047*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0			■	■																								
TNMG270616-M5 *TNMG544-M5*	1,6 *0.063*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0		■		■	■	■		■																				
TNMG270616-M6 *TNMG544-M6*	1,6 *0.063*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0		■																										
TNMG270616-MR4 *TNMG544-MR4*	1,6 *0.063*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0																						■						
TNMG270616-MR7 *TNMG544-MR7*	1,6 *0.063*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0			■	■																								
TNMG270632-MR4 *TNMG548-MR4*	3,2 *0.126*	15,875 *0.625*	27,5 *1.083*	6,35 *0.250*	6,35 *0.250*	60,0	0,0																						■						
TNMG330924-MR4 *TNMG666-MR4*	2,4 *0.094*	19,05 *0.750*	33,0 *1.299*	9,52 *0.375*	7,92 *0.312*	60,0	0,0																						■						
TNMG330924-MR7 *TNMG666-MR7*	2,4 *0.094*	19,05 *0.750*	33,0 *1.299*	9,52 *0.375*	7,92 *0.312*	60,0	0,0			■	■	■	■																						

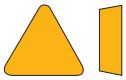
TPGN



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

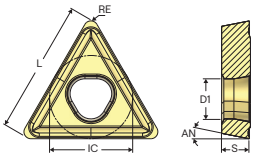
For ISO attribute explanation, see page 82

TPGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
							Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TPGN160302 *TPG320F*	0,2 *0.008*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0																						■			
TPGN160304 *TPG321F*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0																					■		■			
TPGN160304F *TPG321F*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0																								■		
TPGN160308 *TPG322F*	0,8 *0.031*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0																		■			■		■	■		
TPGN220402 *TPG430F*	0,2 *0.008*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0																							■			
TPGN220404 *TPG431F*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0																							■			
TPGN220408 *TPG432F*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0																							■	■		
TPGN220412 *TPG433F*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0																							■			
TPGN220416 *TPG434F*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0																							■			

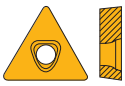
TPMM



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

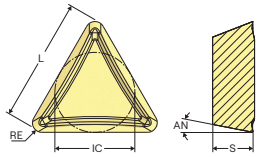
For ISO attribute explanation, see page 82

TPMM-46



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
								Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TPMM160304-46 *TPMM321-46*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	4,19 *0.165*	60,0	11,0																						■			
TPMM160308-46 *TPMM322-46*	0,8 *0.031*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	4,19 *0.165*	60,0	11,0																						■			
TPMM160312-46 *TPMM323-46*	1,2 *0.047*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	4,19 *0.165*	60,0	11,0																						■			
TPMM160316-46 *TPMM324-46*	1,6 *0.063*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	4,19 *0.165*	60,0	11,0																						■			
TPMM220404-46 *TPMM431-46*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,16 *0.203*	60,0	11,0																						■			
TPMM220408-46 *TPMM432-46*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,16 *0.203*	60,0	11,0																						■			

TPMR



Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

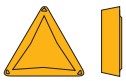
Size:
11-16/*2-3*
22/*4*

For ISO attribute explanation, see page 82

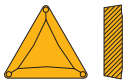
TPMR-F1



TPMR-F2

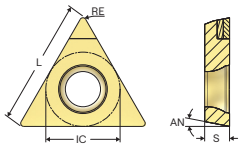


TPMR-M3



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
							Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TPMR110304-F1 *TPMR221-F1*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	11,0			■		■	■																				
TPMR110308-F1 *TPMR222-F1*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	11,0			■																							
TPMR110308-F2 *TPMR222-F2*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	11,0																			■							
TPMR160304-F1 *TPMR321-F1*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0		■	■		■	■		■																		
TPMR160304-M3 *TPMR321-M3*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0			■		■																					
TPMR160308-F1 *TPMR322-F1*	0,8 *0.031*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0		■	■		■	■		■																		
TPMR160308-F2 *TPMR322-F2*	0,8 *0.031*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0						■																				
TPMR160308-M3 *TPMR322-M3*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0			■		■																					
TPMR220408-M3 *TPMR432-M3*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0			■																							
TPMR220412-M3 *TPMR433-M3*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0			■																							

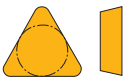
TPUN



Tolerances:
IC = ±0,13/*0.005*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

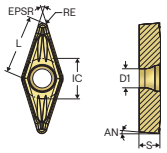
For ISO attribute explanation, see page 82

TPUN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																							
							Coated																		Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
TPUN110308 *TPU222*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	11,0											■													
TPUN160304 *TPU321*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0			■	■							■										■				
TPUN160308 *TPU322*	0,8 *0.031*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0			■	■							■										■				
TPUN160312 *TPU323*	1,2 *0.047*	9,52 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0											■													
TPUN220404 *TPU431*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0			■																					
TPUN220408 *TPU432*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0			■								■										■				
TPUN220412 *TPU433*	1,2 *0.047*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	60,0	11,0			■																					

VBGT, VBMT



VBGT
Tolerances:
IC = ±0,025/*0.001*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

VBMT
Tolerances:
IC = ±0,05/*0.002*
S = ±0,05/*0.002*
RE = ±0,1/*0.004*

For ISO attribute explanation, see page 82

VBGT-F1



VBGT-M3



VBGT-MF2



VBMT-F1



VBMT-F2



VBMT-M3



VBMT-M5



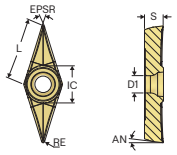
VBMT-MF2



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																															
								Coated																							Uncoated				Cermet						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020							
VBGT110201-F1 *VBGT21.50-F1*	0,1 *0.004*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0																		■													
VBGT110201-MF2 *VBGT21.50-MF2*	0,1 *0.004*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0														■																	
VBGT110202-MF2 *VBGT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0														■																	
VBMT110202-F1 *VBMT21.50.5-F1*	0,2 *0.008*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0			■	■														■							■						
VBMT110202-MF2 *VBMT21.50.5-MF2*	0,2 *0.008*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0									■									■													
VBGT110204-MF2 *VBGT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0														■																	
VBMT110204-F1 *VBMT21.51-F1*	0,4 *0.016*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0			■	■	■													■							■	■					
VBMT110204-MF2 *VBMT21.51-MF2*	0,4 *0.016*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0		■	■						■									■	■												
VBMT110208-F1 *VBMT21.52-F1*	0,8 *0.031*	6,35 *0.250*	11,07 *0.436*	2,38 *0.094*	2,9 *0.114*	35,0	5,0			■	■	■													■													
VBMT110302-F1 *VBMT220.5-F1*	0,2 *0.008*	6,35 *0.250*	11,07 *0.436*	3,18 *0.125*	2,9 *0.114*	35,0	5,0			■	■					■									■													
VBMT110304-F1 *VBMT221-F1*	0,4 *0.016*	6,35 *0.250*	11,07 *0.436*	3,18 *0.125*	2,9 *0.114*	35,0	5,0			■	■					■									■													
VBMT110308-F1 *VBMT222-F1*	0,8 *0.031*	6,35 *0.250*	11,07 *0.436*	3,18 *0.125*	2,9 *0.114*	35,0	5,0			■						■									■													
VBGT160401-F1 *VBGT330-F1*	0,1 *0.004*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0																		■													
VBMT160402-F1 *VBMT330.5-F1*	0,2 *0.008*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0			■	■														■													
VBMT160402-MF2 *VBMT330.5-MF2*	0,2 *0.008*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0				■					■									■													
VBGT160404-F1 *VBGT331-F1*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0												■		■		■															
VBGT160404-M3 *VBGT331-M3*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0																				■										
VBMT160404-F1 *VBMT331-F1*	0,4 *0.016*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■		■	■					■			■		■	■							■	■				
VBMT160404-F2 *VBMT331-F2*	0,4 *0.016*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0					■															■										
VBMT160404-M3 *VBMT331-M3*	0,4 *0.016*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■		■	■	■	■	■																			
VBMT160404-MF2 *VBMT331-MF2*	0,4 *0.016*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■	■	■	■				■	■									■							■						
VBGT160408-F1 *VBGT332-F1*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,762 *0.187*	4,5 *0.177*	35,0	5,0												■		■		■															

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																					Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
VBGT160408-M3 *VBGT332-M3*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0																				■					
VBMT160408-F1 *VBMT332-F1*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■		■	■			■		■			■	■	■	■					■	■
VBMT160408-F2 *VBMT332-F2*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0						■							■					■			■						
VBMT160408-M3 *VBMT332-M3*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■		■	■	■		■															
VBMT160408-M5 *VBMT332-M5*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■		■		■			■														
VBMT160408-MF2 *VBMT332-MF2*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■	■	■	■				■	■									■						■	
VBGT160412-F1 *VBGT333-F1*	1,2 *0.047*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0												■			■										
VBMT160412-F1 *VBMT333-F1*	1,2 *0.047*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■										■										
VBMT160412-F2 *VBMT333-F2*	1,2 *0.047*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0						■																			
VBMT160412-M3 *VBMT333-M3*	1,2 *0.047*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0		■	■	■	■		■	■	■																
VBMT160412-MF2 *VBMT333-MF2*	1,2 *0.047*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■	■	■						■																

VCGT



Tolerances:
IC = ±0,025/*0.001*
S = ±0,05/*0.002*
RE = ±0,1/*0.004*

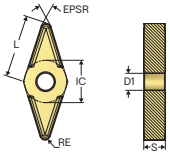
For ISO attribute explanation, see page 82

VCGT-AL



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																					Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
VCGT110302F-AL *VCGT220.5F-AL*	0,2 *0.008*	6,35 *0.250*	11,1 *0.437*	3,18 *0.125*	2,8 *0.110*	35,0	7,0														■							■					
VCGT110304F-AL *VCGT221F-AL*	0,4 *0.016*	6,35 *0.250*	11,1 *0.437*	3,18 *0.125*	2,8 *0.110*	35,0	7,0														■							■					
VCGT160402F-AL *VCGT330.5F-AL*	0,2 *0.008*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,4 *0.173*	35,0	7,0														■							■					
VCGT160404F-AL *VCGT331F-AL*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,4 *0.173*	35,0	7,0														■							■					
VCGT160408F-AL *VCGT332F-AL*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,4 *0.173*	35,0	7,0																					■					
VCGT160412F-AL *VCGT333F-AL*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,4 *0.173*	35,0	7,0																					■					

VNGG, VNGM, VNMA, VNMG, VNMU

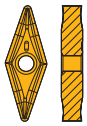


VNGG, VNGM
Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

VNMA, VNMG, VNMU
Tolerances: Size:
IC = ±0,05/*0.002* 13-16/*2.5-3*
IC = ±0,08/*0.003* 22/*4*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

For ISO attribute explanation, see page 82

VNGG-M1


VNGG-MF1


VNGG-MF2


VNGM-MF1


VNMA


VNMG-FF1


VNMG-FF2


VNMG-M1


VNMG-M3


VNMG-MF2


VNMG-MF3


VNMG-MF4


VNMG-MF5


VNMG-MR4

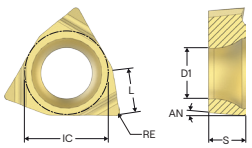

VNMU-M3


VNMU-MF2


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
VNMU130404-M3 *VNMU2.531-M3*	0,4 *0.016*	7,937 *0.312*	13,8 *0.543*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■	■					■																	
VNMU130404-MF2 *VNMU2.531-MF2*	0,4 *0.016*	7,937 *0.312*	13,8 *0.543*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■			■																					
VNMU130408-MF2 *VNMU2.532-MF2*	0,8 *0.031*	7,937 *0.312*	13,8 *0.543*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■												■												
VNMU130408-M3 *VNMU2.532-M3*	0,8 *0.031*	7,937 *0.312*	13,8 *0.543*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■	■					■				■													
VNGG160402-M1 *VNGP330.5-M1*	0,2 *0.008*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0													■		■								■			
VNMG160402-FF2 *VNMG330.5-FF2*	0,2 *0.008*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■															■						■	
VNGG160404-M1 *VNGP331-M1*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0													■		■								■			
VNGM160404-MF1 *VNGM331F-MF1*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0													■					■	■					■		
VNMG160404-FF1 *VNMG331-FF1*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■							■																	
VNMG160404-FF2 *VNMG331-FF2*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■															■						■	
VNMG160404-M1 *VNMP331-M1*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0														■								■			
VNMG160404-M3 *VNMG331-M3*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■	■	■			■			■														
VNMG160404-MF2 *VNMG331-MF2*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■	■																					
VNMG160404-MF3 *VNMG331-MF3*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0				■																					
VNMG160404-MF4 *VNMG331-MF4*	0,4 *0.016*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0							■	■	■				■		■											
VNGG160408-MF1 *VNGP332-MF1*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0												■				■										
VNGG160408-MF2 *VNGP332-MF2*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0												■				■										
VNGG160408-M1 *VNGP332-M1*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0													■		■								■			
VNGM160408-MF1 *VNGM332F-MF1*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0																		■	■				■			

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
								Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
VNMA160408 *VNMA332*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0											■															
VNMG160408-FF2 *VNMG332-FF2*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■	■																				■	
VNMG160408-M1 *VNMP332-M1*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0																						■			
VNMG160408-M3 *VNMG332-M3*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0	■	■	■	■	■			■			■														
VNMG160408-MF2 *VNMG332-MF2*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0	■	■	■	■																					
VNMG160408-MF3 *VNMG332-MF3*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0				■																					
VNMG160408-MF4 *VNMG332-MF4*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0							■	■	■				■		■										
VNMG160408-MF5 *VNMG332-MF5*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0												■				■									
VNMG160408-MR4 *VNMG332-MR4*	0,8 *0.031*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0															■							■			
VNGG160412-MF1 *VNGP333-MF1*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0												■				■									
VNGG160412-MF2 *VNGP333-MF2*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0												■				■									
VNMG160412-M3 *VNMG333-M3*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0	■	■		■							■														
VNMG160412-MF2 *VNMG333-MF2*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0		■	■																						
VNMG160412-MR4 *VNMG333-MR4*	1,2 *0.047*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	0,0															■							■			
VNMG220404-MR4 *VNMG431-MR4*	0,4 *0.016*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,918 *0.233*	35,0	0,0																						■			
VNGG220408-M1 *VNGP432F-M1-203*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	35,0	0,0													■									■			
VNMG220408-MF3-203 *VNMG432-MF3-203*	0,8 *0.031*	12,7 *0.500*	22,14 *0.872*	4,89 *0.193*	5,16 *0.203*	35,0	0,0					■																				
VNMG220408-MR4-203 *VNMG432-MR4-203*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	35,0	0,0					■																		■		
VNMG220408-MR4 *VNMG432-MR4*	0,8 *0.031*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	35,0	0,0																						■			
VNMG220416-MR4 *VNMG434-MR4*	1,6 *0.063*	12,7 *0.500*	22,0 *0.866*	4,76 *0.187*	5,15 *0.203*	35,0	0,0																						■			

WCMT



Tolerances:
IC = ±0,05/*0.002*
S = ±0,05/*0.002*
RE = ±0,1/*0.004*

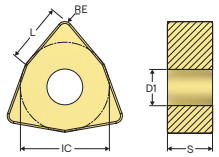
For ISO attribute explanation, see page 82

WCMT-F1



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																										
								Coated																				Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
WCMT06T308-F1 *WCMT32.52-F1*	0,8 *0.031*	9,525 *0.375*	6,531 *0.257*	3,969 *0.156*	4,5 *0.177*	80,0	7,0			■	■					■									■								

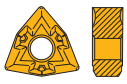
WNGG, WNMA, WNMG, WNMM

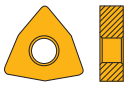


WNGG
Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

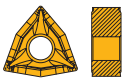
WNMA, WNMG, WNMM
Tolerances: Size:
IC = ±0,05/*0.002* 06/*3*
IC = ±0,08/*0.003* 08/*4*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

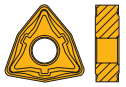
For ISO attribute explanation, see page 82

WNGG-MF1


WNMA


WNMA-MR9


WNMG...W-FF2


WNMG...W-M3


WNMG...W-M6

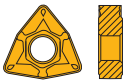

WNMG...W-MF2

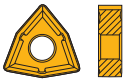

WNMG...W-MF4


WNMG...W-MF5

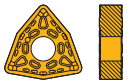

WNMG-FF2

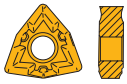

WNMG-M1


WNMG-M3


WNMG-M4


WNMG-M5

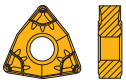

WNMG-M6


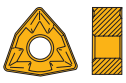
WNMG-MF1


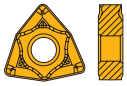
WNMG-MF2


WNMG-MF3


WNMG-MF4


WNMG-MF5


WNMG-MR3


WNMG-MR6


WNMG-MR7


WNMM-R6


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																												
								Coated																					Uncoated				Cermet			
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
WNGG060402-MF1 *WNGP330.5-MF1*	0,2 *0.008*	9,525 *0.375*	6,6 *0.260*	4,76 *0.187*	3,81 *0.150*	80,0	0,0													■					■	■					■			
WNMG060402-M3 *WNMG330.5-M3*	0,2 *0.008*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																								
WNMG060404-FF2 *WNMG331-FF2*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■															■									
WNMG060404W-FF2 *WNMG331W-FF2*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																								
WNMG060404-M3 *WNMG331-M3*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■	■	■				■																		
WNMG060404-MF1 *WNMP331-MF1*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0								■	■				■					■	■					■			
WNMG060404-MF2 *WNMG331-MF2*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■	■	■																				■		
WNMG060404W-MF2 *WNMG331W-MF2*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■																						■		
WNMG060404-MF4 *WNMG331-MF4*	0,4 *0.016*	9,525 *0.375*	6,52 *0.257*	4,76 *0.187*	3,81 *0.150*	80,0	0,0							■	■	■																		
WNMG060404-MF5 *WNMG331-MF5*	0,4 *0.016*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																								
WNMA060408 *WNMA332*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0										■	■																
WNMG060408-FF2 *WNMG332-FF2*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■																								
WNMG060408W-FF2 *WNMG332W-FF2*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																								
WNMG060408-M3 *WNMG332-M3*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0	■	■	■	■	■	■			■		■							■									
WNMG060408W-M3 *WNMG332W-M3*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■																								
WNMG060408-M5 *WNMG332-M5*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0	■	■	■	■				■		■	■																
WNMG060408-MF1 *WNMP332-MF1*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0							■	■					■					■	■					■			

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																													
								Coated																						Uncoated				Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020					
WNMG060408-MF2 *WNMG332-MF2*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■	■	■										■									■					
WNMG060408W-MF2 *WNMG332W-MF2*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■																									
WNMG060408-MF3 *WNMG332-MF3*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0				■																									
WNMG060408-MF4 *WNMG332-MF4*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■				■	■	■									■											
WNMG060408W-MF4 *WNMG332W-MF4*	0,8 *0.031*	9,525 *0.375*	6,52 *0.257*	4,76 *0.187*	3,81 *0.150*	80,0	0,0							■	■																					
WNMG060408-MF5 *WNMG332-MF5*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																									
WNMG060408W-MF5 *WNMG332W-MF5*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■																									
WNMG060408-MR3 *WNMG332-MR3*	0,8 *0.031*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0													■	■				■	■										
WNMA060412 *WNMA333*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0											■																	
WNMG060412-M3 *WNMG333-M3*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■	■	■					■																			
WNMG060412W-M3 *WNMG333W-M3*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																									
WNMG060412-M5 *WNMG333-M5*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0	■		■	■							■																	
WNMG060412-MF1 *WNMP333-MF1*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0																		■										
WNMG060412-MF2 *WNMG333-MF2*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0			■																									
WNMG060412-MF4 *WNMG333-MF4*	1,2 *0.047*	9,525 *0.375*	6,52 *0.257*	4,76 *0.187*	3,81 *0.150*	80,0	0,0							■	■	■																			
WNMG060412-MF5 *WNMG333-MF5*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0		■																									
WNMG060412-MR3 *WNMG333-MR3*	1,2 *0.047*	9,525 *0.375*	6,5 *0.256*	4,76 *0.187*	3,81 *0.150*	80,0	0,0													■	■					■										
WNGG080401-MF1 *WNGP430-MF1*	0,1 *0.004*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■																
WNGG080402-MF1 *WNGP430.5-MF1*	0,2 *0.008*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■																
WNGG080404-MF1 *WNGP431-MF1*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■																
WNMG080404-FF2 *WNMG431-FF2*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																									
WNMG080404-M1 *WNMP431-M1*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0																						■						
WNMG080404-M3 *WNMG431-M3*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■	■				■		■							■										
WNMG080404-MF1 *WNMP431-MF1*	0,4 *0.016*	12,7 *0.500*	8,69 *0.342*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■				■	■		■		■										
WNMG080404-MF2 *WNMG431-MF2*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																									
WNMG080404W-MF2 *WNMG431W-MF2*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																									
WNMG080404-MF3 *WNMG431-MF3*	0,4 *0.016*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0					■				■																			
WNMG080404-MF4 *WNMG431-MF4*	0,4 *0.016*	12,7 *0.500*	8,69 *0.342*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■	■																			
WNMG080408-MR3 *WNMG432-MR3*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■														
WNGG080408-MF1 *WNGP432-MF1*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■					■										
WNMA080408-MR9 *WNMA432-MR9*	0,8 *0.031*	12,7 *0.500*	8,69 *0.342*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																	
WNMA080408 *WNMA432*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																	
WNMG080408-MF2 *WNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																									

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																														
								Coated																						Uncoated					Cermet					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020						
WNMG080408-M1 *WNMP432-M1*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0																						■								
WNMG080408-M3 *WNMG432-M3*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■	■	■	■		■							■												
WNMG080408W-M3 *WNMG432W-M3*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■								■																			
WNMG080408-M4 *WNMG432-M4*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																			
WNMG080408-M5 *WNMG432-M5*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■	■	■		■	■						■													
WNMG080408-M6 *WNMG432-M6*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■							■																			
WNMG080408W-M6 *WNMG432W-M6*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■		■																										
WNMG080408-MF1 *WNMP432-MF1*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0								■	■				■	■		■		■												
WNMG080408-MF2 *WNMG432-MF2*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■		■											■	■													
WNMG080408W-MF2 *WNMG432W-MF2*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
WNMG080408-MF3 *WNMG432-MF3*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■		■		■	■																					
WNMG080408-MF4 *WNMG432-MF4*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■			■	■	■				■		■				■											
WNMG080408W-MF4 *WNMG432W-MF4*	0,8 *0.031*	12,7 *0.500*	8,69 *0.342*	4,76 *0.187*	5,15 *0.203*	80,0	0,0							■	■																						
WNMG080408-MF5 *WNMG432-MF5*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■										■		■	■	■													
WNMG080408W-MF5 *WNMG432W-MF5*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
WNMG080408-MR6 *WNMG432-MR6*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■																											
WNMG080408-MR7 *WNMG432-MR7*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■	■	■						■																			
WNMM080408-R6 *WNMM432-R6*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■																										
WNMG080412-MR3 *WNMG433-MR3*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0														■																
WNMA080412-MR9 *WNMA433-MR9*	1,2 *0.047*	12,7 *0.500*	8,69 *0.342*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																			
WNMA080412 *WNMA433*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■	■																			
WNMG080412-M3 *WNMG433-M3*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■		■	■	■		■								■											
WNMG080412W-M3 *WNMG433W-M3*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■								■																			
WNMG080412-M4 *WNMG433-M4*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																			
WNMG080412-M5 *WNMG433-M5*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■	■	■	■	■		■	■					■	■													
WNMG080412-M6 *WNMG433-M6*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■							■																			
WNMG080412W-M6 *WNMG433W-M6*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■																										
WNMG080412-MF2 *WNMG433-MF2*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■														■													
WNMG080412-MF4 *WNMG433-MF4*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■				■	■	■				■		■														
WNMG080412-MF5 *WNMG433-MF5*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■													■	■													
WNMG080412-MR7 *WNMG433-MR7*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■	■			■		■	■																			
WNMA080416 *WNMA434*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0											■																			
WNMG080416-M3 *WNMG434-M3*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																											

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																											
								Coated																						Uncoated				Cermet	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TP0501	TP1501	TP2501	TP3501	TP25	TP40	TM1501	TM2501	TM3501	TK0501	TK1501	TS0501	TS2000	TS2050	TS2500	TH1000	TH1501	CP200	CP500	CP600	HX	KX	883	890	TP1030	TP1020
WNMG080416-M5 *WNMG434-M5*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■	■				■																		
WNMG080416-M6 *WNMG434-M6*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■																						
WNMG080416-MF5 *WNMG434-MF5*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■																						
WNMG080416-MR7 *WNMG434-MR7*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■	■																						
WNMG080612-M5 *WNMG443-M5*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	6,35 *0.250*	5,15 *0.203*	80,0	0,0			■	■				■																		
WNMG080612-M6 *WNMG443-M6*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	6,35 *0.250*	5,15 *0.203*	80,0	0,0		■																							
WNMG080616-M5 *WNMG444-M5*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	6,35 *0.250*	5,15 *0.203*	80,0	0,0		■	■	■																						
WNMG080616-M6 *WNMG444-M6*	1,6 *0.063*	12,7 *0.500*	8,7 *0.343*	6,35 *0.250*	5,15 *0.203*	80,0	0,0		■																							

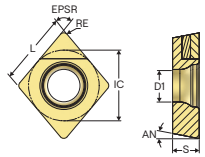


PCBN, PCD, Ceramics

Our team of advanced cutting materials experts is continuously looking for new ways to use PCBN, PCD and ceramics to develop Secomax™ cutting tools that bring exceptional productivity and tool life to the machining of difficult, highly abrasive materials.

– PCBN (Polycrystalline Cubic Boron Nitride), advanced cutting materal.
– PCD (Polycrystalline Diamond), level of hardness that is comparable to natural diamond.
– Ceramics, we have three grades that offer optimized wear resistance and toughness.

CCGW



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

CCGW...-B



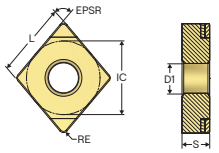
CCGW...-LF



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CCGW060202S-01020-LF *CCGW21.50.5S-00420-LF*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0													■			
CCGW060204S-01015-L1-B *CCGW21.51S-00415-L1-B*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■													
CCGW060204E-L1-B *CCGW21.51E-L1-B*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■							■			■			
CCGW060204S-01020-L1-B *CCGW21.51S-00420-L1-B*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0										■						
CCGW060204S-01525-L1-B *CCGW21.51S-00625-L1-B*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■	■	■													
CCGW060204S-01020-LF *CCGW21.51S-00420-LF*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0										■			■			
CCGW060208S-01015-L1-B *CCGW21.52S-00415-L1-B*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0			■													
CCGW060208S-01525-L1-B *CCGW21.52S-00625-L1-B*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0					■											
CCGW060208E-L1-B *CCGW21.52E-L1-B*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0													■			
CCGW060208S-02020-L1-B *CCGW21.52S-00820-L1-B*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0						■							■			
CCGW060208S-L1-WZP-B *CCGW21.52S-L1-WZP-B*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■		■													
CCGW060208S-01020-LF *CCGW21.52S-00420-LF*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0													■			
CCGW09T304S-01015-L1-B *CCGW32.51S-00415-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■													
CCGW09T304S-01525L1WZB *CCGW32.51S-00625-L1-WZ-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■													
CCGW09T304E-L1-B *CCGW32.51E-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■							■			■			
CCGW09T304S-01020-L1-B *CCGW32.51S-00420-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0										■						
CCGW09T304S-01525-L1-B *CCGW32.51S-00625-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■													
CCGW09T304S-L1-WZP-B *CCGW32.51S-L1-WZP-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0	■		■													
CCGW09T304S25-02020-L1B *CCGW32.51S25-00820-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0													■			
CCGW09T304S-01020-LF *CCGW32.51S-00420-LF*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0										■			■			
CCGW09T308S-01015-L1-B *CCGW32.52S-00415-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■													
CCGW09T308S-01525-L1-B *CCGW32.52S-00625-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0		■	■		■											
CCGW09T308S-01525L1WZB *CCGW32.52S-00625-L1-WZ-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■													
CCGW09T308E-L1-B *CCGW32.52E-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0										■			■			
CCGW09T308S-01020-L1-B *CCGW32.52S-00420-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0										■	■					

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																
								Coated									Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CCGW09T308S-02020-L1-B *CCGW32.52S-00820-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0						■							■				
CCGW09T308S-L1-WZP-B *CCGW32.52S-L1-WZP-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■														
CCGW09T308S25-02020-L1B *CCGW32.52S25-00820-L1-B*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0													■				
CCGW09T308S-01020-LF *CCGW32.52S-00420-LF*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0													■				
CCGW120404S-01020-L1-B *CCGW431S-00420-L1-B*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0										■							
CCGW120408S-01020-L1-B *CCGW432S-00420-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0										■							
CCGW120408S-02020-L1-B *CCGW432S-00820-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0													■				

CNGA



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

CNGA...-B



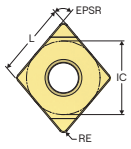
CNGA...-U

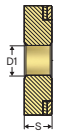


Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CNGA120404S-01015-L1-B *CNGA431S-00415-L1-B*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120404S-01020-L1-B *CNGA431S-00420-L1-B*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120404S-02020-L1-B *CNGA431S-00820-L1-B*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■										
CNGA120404S-02020-L1WZB *CNGA431S-00820-L1-WZ-B*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■										
CNGA120404S-01525-L1-U *CNGA431S-00625-L1-U*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S-01015-L1-B *CNGA432S-00415-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S-01525-L1WZB *CNGA432S-00625-L1-WZ-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■										
CNGA120408S-01525L1WZU *CNGA432S-00625-L1-WZ-U*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408E-L1-B *CNGA432E-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■			
CNGA120408S-01020-L1-B *CNGA432S-00420-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120408S-01525-L1-B *CNGA432S-00625-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■		■		■	■					■					
CNGA120408S-02020-L1-B *CNGA432S-00820-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■							■			
CNGA120408S-L1-WZN-B *CNGA432S-L1-WZN-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S-L1-WZP-B *CNGA432S-L1-WZP-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0		■	■							■						
CNGA120408S01525L1WLB *CNGA432S00625L1WLB*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S01525L1WSB *CNGA432S00625L1WSB*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S25-02020-L1B *CNGA432S25-00820-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0													■			
CNGA120408S-01020-L1WZB *CNGA432S-00420-L1-WZ-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120408S-01020-L1WZU *CNGA432S-00420-L1-WZ-U*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120408E25-L1-U *CNGA432E25-L1-U*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0												■				
CNGA120408S-01020-L1-U *CNGA432S-00420-L1-U*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120408S-01525-L1-U *CNGA432S-00625-L1-U*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120408S-01525L1WZB *CNGA432S-00625-L1-WZ-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■		■											
CNGA120412S-01525L1WZB *CNGA433S-00625-L1-WZ-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0					■											
CNGA120412S30-02035L1B *CNGA433S30-00835-L1-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													

Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CNGA120412S-01525L1WZU *CNGA433S-00625-L1-WZ-U*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■													
CNGA120412S-01020-L1-B *CNGA433S-00420-L1-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■						
CNGA120412S-01525-L1-B *CNGA433S-00625-L1-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■	■	■		■	■					■					
CNGA120412S-02020-L1-B *CNGA433S-00820-L1-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0						■										
CNGA120412S-01525-L1-U *CNGA433S-00625-L1-U*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0	■		■													

CNMN





Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Size:
09/*3*
12/*4*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

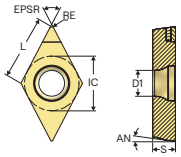
For ISO attribute explanation, see page 82

CNMN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CNMN090308S-02020 *CNMN322S-00820*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,18 *0.125*	80,0	–															■	
CNMN090308S-02020P *CNMN322S-00820*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,18 *0.125*	80,0	–																■
CNMN090308S *CNMN322S*	0,8 *0.031*	9,525 *0.375*	9,7 *0.382*	3,18 *0.125*	80,0	–														■		
CNMN090312S *CNMN323S*	1,2 *0.047*	9,525 *0.375*	9,7 *0.382*	3,18 *0.125*	80,0	–														■		
CNMN090316S *CNMN324S*	1,6 *0.063*	9,525 *0.375*	9,7 *0.382*	3,18 *0.125*	80,0	–														■		
CNMN120408S-WZ *CNMN432S-WZ*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	0,0														■		
CNMN120412S-02020P *CNMN433S-00820P*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	–																■
CNMN120412S *CNMN433S*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	–							■							■		
CNMN120416S-02020P *CNMN434S-00820P*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	–																■
CNMN120416S *CNMN434S*	1,6 *0.063*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	–														■		

DCGW



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

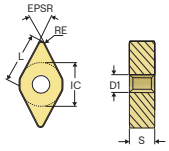
For ISO attribute explanation, see page 82

DCGW...-B



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated								Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DCGW070202S-01020-L1-B *DCGW21.50.5S-00420-L1-B*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0											■					
DCGW070202S-01525-L1-B *DCGW21.50.5S-00625-L1-B*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0				■												
DCGW070204S-01525-L1-B *DCGW21.51S-00625-L1-B*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0					■											
DCGW070204E-L1-B *DCGW21.51E-L1-B*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0										■			■			
DCGW070204S-01020-L1-B *DCGW21.51S-00420-L1-B*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0										■	■					
DCGW070204S-02020-L1-B *DCGW21.51S-00820-L1-B*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0													■			
DCGW070204S25-02020-L1B *DCGW21.51S25-00820-L1-B*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0													■			
DCGW070208S-02020-L1-B *DCGW21.52S-00820-L1-B*	0,8 *0.031*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0													■			
DCGW11T302E-L1-B *DCGW32.50E-L1-B*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0													■			
DCGW11T302S-01020-L1-B *DCGW32.50S-00420-L1-B*	0,2 *0.008*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0										■						
DCGW11T304S-01015-L1-B *DCGW32.51S-00415-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■													
DCGW11T304E-L1-B *DCGW32.51E-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0										■						
DCGW11T304S-01020-L1-B *DCGW32.51S-00420-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0										■						
DCGW11T304S-01525-L1-B *DCGW32.51S-00625-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■	■												
DCGW11T304S-02020-L1-B *DCGW32.51S-00820-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0						■							■			
DCGW11T304S25-02020-L1B *DCGW32.51S25-00820-L1-B*	0,4 *0.016*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0													■			
DCGW11T308E25-L1-B *DCGW11T308E25-L1-B*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	– –	55,0	7,0												■				
DCGW11T308S-01015-L1-B *DCGW32.52S-00415-L1-B*	0,8 *0.031*	9,525 *0.375*	11,63 *0.458*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■													
DCGW11T308S-01525-L1-B *DCGW32.52S-00625-L1-B*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■	■	■		■	■										
DCGW11T308S-L1-WZP-B *DCGW32.52S-L1-WZP-B*	0,8 *0.031*	9,525 *0.375*	11,63 *0.458*	3,97 *0.156*	4,5 *0.177*	55,0	7,0			■													
DCGW11T308E-L1-B *DCGW32.52E-L1-B*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0										■						
DCGW11T308S-01020-L1-B *DCGW32.52S-00420-L1-B*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0										■						
DCGW11T308S-02020-L1-B *DCGW32.52S-00820-L1-B*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0						■							■			

DNGA



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

DNGA...-B

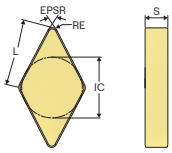


DNGA...-U



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DNGA150404S-01020-L1-B *DNGA431S-00420-L1-B*	0,4 *0.016*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	–										■						
DNGA150408S-01015-L1-B *DNGA432S-00415-L1-B*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	–			■													
DNGA150408S-01525-L1-B *DNGA432S-00625-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–		■	■		■	■										
DNGA150408S-01525L1WZB *DNGA432S-00625-L1-WZ-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	0,0	■	■														
DNGA150408S-01020-L1-B *DNGA432S-00420-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–										■						
DNGA150408S-02020-L1-B *DNGA432S-00820-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–						■							■			
DNGA150408S-01525-L1-U *DNGA432S-00625-L1-U*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–			■													
DNGA150412S-01525-L1-B *DNGA433S-00625-L1-B*	1,2 *0.047*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–					■											
DNGA150412S-02020-L1-B *DNGA433S-00820-L1-B*	1,2 *0.047*	12,7 *0.500*	15,0 *0.591*	4,76 *0.187*	5,15 *0.203*	55,0	–						■										
DNGA150604S-01020-L1-B *DNGA441S-00420-L1-B*	0,4 *0.016*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–										■						
DNGA150604S-01525-L1-U *DNGA441S-00625-L1-U*	0,4 *0.016*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–			■													
DNGA150608S-01020-L1-B *DNGA442S-00420-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–										■						
DNGA150608S-01525-L1-B *DNGA442S-00625-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–	■		■	■	■						■					
DNGA150608S-02020-L1-B *DNGA442S-00820-L1-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–													■			
DNGA150608S01020L1WZ93B *DNGA442S-00420-L1-WZ-93-B*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	0,0										■						
DNGA150608E25-L1-U *DNGA442E25-L1-U*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–												■				
DNGA150608S-01525-L1-U *DNGA442S-00625-L1-U*	0,8 *0.031*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–			■													
DNGA150612S-01525-L1-B *DNGA150612S-01525-L1-B*	1,2 *0.047*	12,7 *0.500*	15,5 *0.610*	6,35 *0.250*	5,15 *0.203*	55,0	–					■	■										
DNGA150612S-01020-L1-B *DNGA443S-00420-L1-B*	1,2 *0.047*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–										■						
DNGA150612S-01525-L1-U *DNGA443S-00625-L1-U*	1,2 *0.047*	12,7 *0.500*	15,0 *0.591*	6,35 *0.250*	5,15 *0.203*	55,0	–			■													

DNGN



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

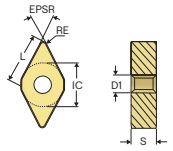
For ISO attribute explanation, see page 82

DNGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DNGN110312S-01020 *DNGN323S-00420*	1,2 *0.047*	9,525 *0.375*	11,6 *0.457*	3,18 *0.125*	55,0	–										■					

DNMA



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

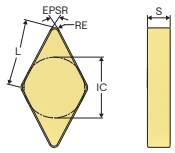
For ISO attribute explanation, see page 82

DNMA



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades													
								Coated								Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DNMA110408S *DNMA332S*	0,8 *0.031*	9,52 *0.375*	11,6 *0.457*	4,76 *0.187*	3,81 *0.150*	55,0	–													■		

DNMN



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

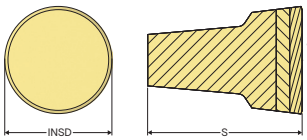
For ISO attribute explanation, see page 82

DNMN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DNMN110308S *DNMN322S*	0,8 *0.031*	9,525 *0.375*	11,6 *0.457*	3,18 *0.125*	55,0	–														■	

RCGS



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

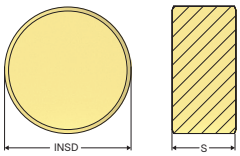
For ISO attribute explanation, see page 82

RCGS



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades																
					Coated									Uncoated							
	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
RCGS6.35S-02020-LF *RCGS2S-00820-LF*	6,35 *0.250*	9,13 *0.359*	–	14,0										■						

RNGN-LF



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

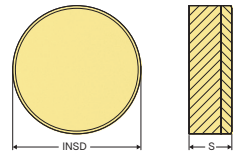
For ISO attribute explanation, see page 82

RNGN-LF



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades															
					Coated									Uncoated						
	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
RNGN060300S-02020-LF *RNGN22S-00820-LF*	6,35 *0.250*	3,18 *0.125*	–	–						■							■			
RNGN090300S-01525-LF *RNGN32S-00625-LF*	9,525 *0.375*	3,18 *0.125*	–	0,0						■										
RNGN090300S-02020-LF *RNGN32S-00820-LF*	9,52 *0.375*	3,18 *0.125*	–	0,0						■				■			■			
RNGN120400S-02020-LF *RNGN43S-00820-LF*	12,7 *0.500*	4,76 *0.187*	–	–													■			

RNGN



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

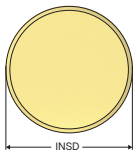
For ISO attribute explanation, see page 82

RNGN



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades															
					Coated									Uncoated						
	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
RNGN060300S-01020 *RNGN22S-00420*	6,35 *0.250*	3,18 *0.125*	–	–										■						
RNGN060300S-01525 *RNGN22S-00625*	6,35 *0.250*	3,18 *0.125*	–	0,0			■	■							■					
RNGN060300E *RNGN22E*	6,35 *0.250*	3,18 *0.125*	–	–										■						
RNGN060300S *RNGN060300S*	6,35 *0.250*	3,18 *0.125*	–	–													■			
RNGN090300S-01020 *RNGN32S-00420*	9,52 *0.375*	3,18 *0.125*	–	–										■						
RNGN090300S-01525 *RNGN32S-00625*	9,52 *0.375*	3,18 *0.125*	–	0,0	■	■	■		■						■					
RNGN090300E25 *RNGN32E25*	9,52 *0.375*	3,18 *0.125*	–	–												■				
RNGN090300S *RNGN090300S*	9,52 *0.375*	3,18 *0.125*	–	–													■			
RNGN120300S-01020 *RNGN42S-00420*	12,7 *0.500*	3,18 *0.125*	–	–										■						

RNMN



Tolerances:
INSD = ±0,05/*0.002*
INSD = ±0,08/*0.003*
INSD = ±0,10/*0.004*
INSD = ±0,13/*0.005*
S = ±0,13/*0.005*

Size:
06-09/*2-3*
12/*4*
19/*6*
25/*8*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

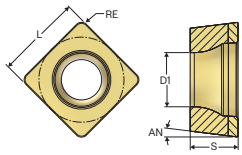
For ISO attribute explanation, see page 82

RNMN



Designation	INSD	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
					Coated									Uncoated					
	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
RNMN060300S-02020P *RNMN22S-00820P*	6,35 *0.250*	3,18 *0.125*	–	–																■
RNMN060300S *RNMN22S*	6,35 *0.250*	3,18 *0.125*	–	–							■							■		
RNMN090300S-02020 *RNMN32S-00820*	9,52 *0.375*	3,18 *0.125*	–	–									■						■	
RNMN090300S-02020P *RNMN32S-00820*	9,52 *0.375*	3,18 *0.125*	–	–																■
RNMN090300E *RNMN32E*	9,52 *0.375*	3,18 *0.125*	–	–									■					■		
RNMN090300S *RNMN32S*	9,52 *0.375*	3,18 *0.125*	–	–							■							■		
RNMN120300S-02020 *RNMN42S-00820*	12,7 *0.500*	3,18 *0.125*	–	–															■	
RNMN120300S-02020P *RNMN42S-00820P*	12,7 *0.500*	3,18 *0.125*	–	–																■
RNMN120300E *RNMN42E*	12,7 *0.500*	3,18 *0.125*	–	–														■		
RNMN120300S *RNMN42S*	12,7 *0.500*	3,18 *0.125*	–	–							■							■		
RNMN120400S-02020 *RNMN43S-00820*	12,7 *0.500*	4,76 *0.187*	–	–															■	
RNMN120400S-02020P *RNMN43S-00820P*	12,7 *0.500*	4,76 *0.187*	–	–																■
RNMN120400S-04015 *RNMN43S-01515*	12,7 *0.500*	4,76 *0.187*	–	–														■	■	
RNMN120400S-04015P *RNMN43S-01515P*	12,7 *0.500*	4,76 *0.187*	–	–																■
RNMN120400X-05015 *RNMN43X-02015*	12,7 *0.500*	4,76 *0.187*	–	–															■	
RNMN120400S *RNMN43S*	12,7 *0.500*	4,76 *0.187*	–	–							■							■		

SCGW



Tolerances:
L = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

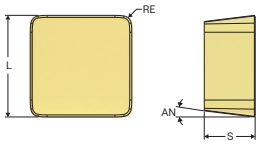
For ISO attribute explanation, see page 82

SCGW



Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SCGW060208S-01020-LF *SCGW21.52S-00420-LF*	0,8 *0.031*	6,35 *0.250*	2,38 *0.094*	2,9 *0.114*	90,0	7,0													■		
SCGW09T304S-01020-LF *SCGW32.51S-00420-LF*	0,4 *0.016*	9,525 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0													■		
SCGW09T308S-01020-LF *SCGW32.52S-00420-LF*	0,8 *0.031*	9,525 *0.375*	3,97 *0.156*	4,5 *0.177*	90,0	7,0													■		

SCMN



Tolerances:
L = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

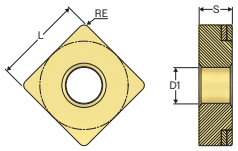
For ISO attribute explanation, see page 82

SCMN



Designation	RE	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades															
						Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SCMN090408S-WZ-85 *SCMN332S-WZ-85*	0,8 *0.031*	9,525 *0.375*	4,76 *0.187*	90,0	7,0														■		

SNGA



Tolerances:
L = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

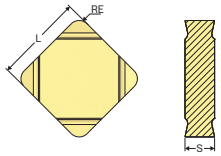
For ISO attribute explanation, see page 82

SNGA



Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SNGA120408S-02020-L1-D *SNGA432S-00820-L1-D*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	5,15 *0.203*	90,0	–													■		

SNGF



Tolerances:
L = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

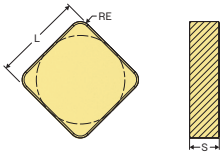
For ISO attribute explanation, see page 82

SNGF



Designation	RE	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades															
						Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SNGF090312E *SNGF323E*	1,2 *0.047*	9,525 *0.375*	3,18 *0.125*	90,0	–									■							

SNGN



Tolerances:
L = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

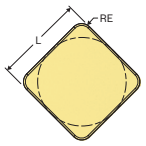
For ISO attribute explanation, see page 82

SNGN



						Cemented Carbide and Cermet Grades															
						Coated									Uncoated						
Designation	**RE**	**L**	**S**	**EPSR°**	**AN°**	CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
	mm *inch*	mm *inch*	mm *inch*																		
SNGN060308S-01020 *SNGN222S-00420*	0,8 *0.031*	6,35 *0.250*	3,18 *0.125*	90,0	–										■						
SNGN090308S-01525 *SNGN322S-00420*	0,8 *0.031*	9,525 *0.375*	3,175 *0.125*	90,0	–					■											
SNGN090308S-01020 *SNGN322S-00420*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–										■						
SNGN090308E *SNGN090308E*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–													■			
SNGN090308S *SNGN090308S*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–													■			
SNGN090312S-01020 *SNGN323S-00420*	1,2 *0.047*	9,525 *0.375*	3,18 *0.125*	90,0	–										■						
SNGN090312S *SNGN090312S*	1,2 *0.047*	9,525 *0.375*	3,18 *0.125*	90,0	–													■			
SNGN090316S *SNGN090316S*	1,6 *0.063*	9,525 *0.375*	3,18 *0.125*	90,0	–													■			

SNMN





Tolerances:
L = ±0,05/*0.002*
L = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Size:
06-09/*2-3*
12/*4*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

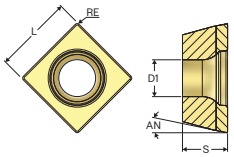
For ISO attribute explanation, see page 82

SNMN



Designation	RE	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades															
						Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SNMN060308E *SNMN222E*	0,8 *0.031*	6,35 *0.250*	3,18 *0.125*	90,0	–									■							
SNMN060308S *SNMN222S*	0,8 *0.031*	6,35 *0.250*	3,18 *0.125*	90,0	–														■		
SNMN090308S-02020 *SNMN322S-00820*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–									■							
SNMN090308E *SNMN322E*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–														■		
SNMN090308S *SNMN322S*	0,8 *0.031*	9,525 *0.375*	3,18 *0.125*	90,0	–														■		
SNMN090312S-02020P *SNMN323S-00820P*	1,2 *0.047*	9,525 *0.375*	3,18 *0.125*	90,0	–																■
SNMN090312S *SNMN323S*	1,2 *0.047*	9,525 *0.375*	3,18 *0.125*	90,0	–							■							■		
SNMN090316S *SNMN324S*	1,6 *0.063*	9,525 *0.375*	3,18 *0.125*	90,0	–														■		
SNMN120312S *SNMN423S*	1,2 *0.047*	12,7 *0.500*	3,18 *0.125*	90,0	–														■		
SNMN120408S-02020-WZ85 *SNMN432S-00820-WZ-85*	0,8 *0.031*	12,7 *0.500*	4,76 *0.187*	90,0	0,0									■							
SNMN120412S-02020 *SNMN433S-00820*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	90,0	–									■							
SNMN120412S *SNMN433S*	1,2 *0.047*	12,7 *0.500*	4,76 *0.187*	90,0	–														■		
SNMN120416S-02020 *SNMN434S-00820*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	90,0	–															■	
SNMN120416S-02020P *SNMN434S-00820P*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	90,0	–																■
SNMN120416S *SNMN434S*	1,6 *0.063*	12,7 *0.500*	4,76 *0.187*	90,0	–														■		

SPGW



Tolerances:
L = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

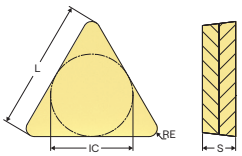
For ISO attribute explanation, see page 82

SPGW



Designation	RE	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
SPGW050302S-01020-LF *SPGW1.820.5S-00420-LF*	0,2 *0.008*	5,56 *0.219*	3,18 *0.125*	2,6 *0.102*	90,0	11,0													■		

TCGN



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

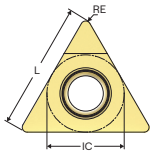
For ISO attribute explanation, see page 82

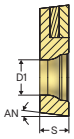
TCGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TCGN060104E-LF *TCGN1.211E-LF*	0,4 *0.016*	3,96 *0.156*	5,5 *0.217*	1,59 *0.063*	60,0	7,0										■					

TCGW





Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

TCGW...-C

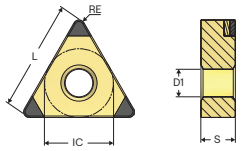


TCGW...-LF



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TCGW090204S-01020-LF *TCGW1.81.51S-00420-LF*	0,4 *0.016*	5,56 *0.219*	9,0 *0.354*	2,38 *0.094*	2,6 *0.102*	60,0	7,0										■			■			
TCGW110204E-L1-C *TCGW21.51E-L1-C*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0			■							■						
TCGW110204S-01020-L1-C *TCGW21.51S-00420-L1-C*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0										■						
TCGW110204S-01525-L1-C *TCGW21.51S-00625-L1-C*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0			■													
TCGW110204S-02020-L1-C *TCGW21.51S-00820-L1-C*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0													■			
TCGW110204S-01020-LF *TCGW21.51S-00420-LF*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0													■			
TCGW110208E-L1-C *TCGW21.52E-L1-C*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0										■						
TCGW110208S-01020-L1-C *TCGW21.52S-00420-L1-C*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0										■						
TCGW110208S-01525-L1-C *TCGW21.52S-00625-L1-C*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0			■		■											
TCGW110208S-02020-L1-C *TCGW21.52S-00820-L1-C*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0													■			
TCGW110208S-01020-LF *TCGW21.52S-00420-LF*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0													■			

TNGA



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

TNGA...-C

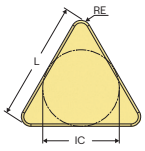


TNGA...-V



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNGA160404S-01020-L1-C *TNGA331S-00420-L1-C*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–										■						
TNGA160408S-01020-L1-C *TNGA332S-00420-L1-C*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–										■						
TNGA160408S-01525-L1-C *TNGA332S-00625-L1-C*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–					■						■					
TNGA160408S-02020-L1-C *TNGA332S-00820-L1-C*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–													■			
TNGA160408S-01525-L1-V *TNGA332S-00625-L1-V*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–			■													
TNGA160416S-00540-L1-C *TNGA334S-00240-L1-C*	1,6 *0.063*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–						■										
TNGA160420S-00540-L1-C *TNGA335S-00240-L1-C*	2,0 *0.079*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	3,81 *0.150*	60,0	–						■										

TNGN-LF





Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

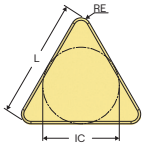
For ISO attribute explanation, see page 82

TNGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNGN110312S-01525-LF *TNGN110312S-01525-LF*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–						■									
TNGN110312S-02020-LF *TNGN223S-00820-LF*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–													■		

TNGN





Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

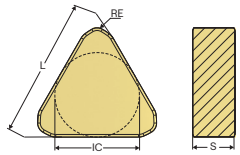
For ISO attribute explanation, see page 82

TNGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNGN110304S-01020 *TNGN221S-00420*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–										■					
TNGN110304S-01525 *TNGN221S-00625*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–			■												
TNGN110308S-01020 *TNGN222S-00420*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–										■					
TNGN110308S-01525 *TNGN222S-00625*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–	■		■		■						■				
TNGN110312S-01020 *TNGN223S-00420*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–										■					
TNGN110312S-01525 *TNGN223S-00625*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–			■								■				
TNGN160304S-01020 *TNGN321S-00420*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	–										■					

TNGX



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

TNGX-...R/L-WZ Crossbill™

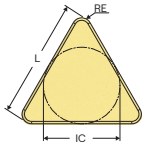


TNGX...-WZ



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNGX110308S-01020-L-WZ *TNGX222S-00420-L-WZ*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	0,0										■					
TNGX110308S-01020-R-WZ *TNGX222S-00420-R-WZ*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	0,0										■					
TNGX110308S-01020-WZ *TNGX222S-00420-WZ*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	0,0										■					
TNGX110308S-01525-WZ *TNGX222S-00625-WZ*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	0,0		■	■								■					

TNMN



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

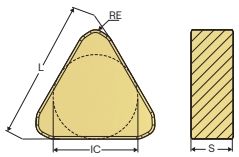
For ISO attribute explanation, see page 82

TNMN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNMN110304S *TNMN221S*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–														■	
TNMN110308S *TNMN222S*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–							■							■	
TNMN110312E *TNMN223E*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–														■	
TNMN110312S *TNMN223S*	1,2 *0.047*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	–														■	
TNMN160412S *TNMN333S*	1,2 *0.047*	9,525 *0.375*	16,5 *0.650*	4,76 *0.187*	60,0	–														■	

TNMX



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

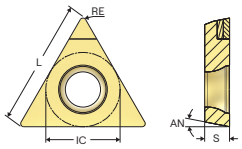
For ISO attribute explanation, see page 82

TNMX



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TNMX110308S-WZ *TNMX222S-WZ*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	0,0														■		

TPGN



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

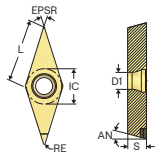
For ISO attribute explanation, see page 82

TPGN



Designation	RE	IC	L	S	EPSR°	AN°	Cemented Carbide and Cermet Grades														
							Coated									Uncoated					
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
TPGN110308S-01020 *TPGN222S-00420*	0,8 *0.031*	6,35 *0.250*	11,0 *0.433*	3,18 *0.125*	60,0	11,0										■						

VBGW



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

VBGW

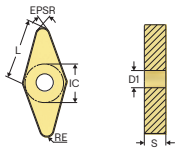


VBGW...-B



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
VBGW160402S-01020-L1-B *VBGW330.5S-00420-L1-B*	0,2 *0.008*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0										■						
VBGW160402S-01525-L1-B *VBGW330.5S-00625-L1-B*	0,2 *0.008*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0				■												
VBGW160404S-01020-L1-B *VBGW331S-00420-L1-B*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0										■						
VBGW160404S-01525-L1-B *VBGW331S-00625-L1-B*	0,4 *0.016*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■		■		■						■					
VBGW160404S-02020-L2 *VBGW331S-00820-L2*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0										■						
VBGW160408E-L1-B *VBGW332E-L1-B*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	4,5 *0.177*	35,0	5,0			■													
VBGW160408S-01020-L1-B *VBGW332S-00420-L1-B*	0,8 *0.031*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0										■						
VBGW160408S-01525-L1-B *VBGW332S-00625-L1-B*	0,8 *0.031*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0			■		■						■					

VNGA



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82



VNGA...-B



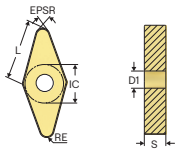


VNGA...-U



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																
								Coated									Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
VNGA160402S-01020-L1-B *VNGA330.5S-00420-L1-B*	0,2 *0.008*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	–										■						
VNGA160402S-01525-L1-B *VNGA330.5S-00625-L1-B*	0,2 *0.008*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–				■												
VNGA160404S-01525-L1-B *VNGA331S-00625-L1-B*	0,4 *0.016*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	0,0					■											
VNGA160404S-01020-L1-B *VNGA331S-00420-L1-B*	0,4 *0.016*	9,525 *0.375*	16,6 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	–										■						
VNGA160404S-02020-L1-B *VNGA331S-00820-L1-B*	0,4 *0.016*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–													■			
VNGA160404S-01525-L1-U *VNGA331S-00625-L1-U*	0,4 *0.016*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–			■													
VNGA160408S-01020-L1-B *VNGA332S-00420-L1-B*	0,8 *0.031*	9,525 *0.375*	16,61 *0.654*	4,76 *0.187*	3,81 *0.150*	35,0	–										■						
VNGA160408S-01525-L1-B *VNGA332S-00625-L1-B*	0,8 *0.031*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–					■						■					
VNGA160408S-02020-L1-B *VNGA332S-00820-L1-B*	0,8 *0.031*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–						■							■			
VNGA160408S-01525-L1-U *VNGA332S-00625-L1-U*	0,8 *0.031*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–			■													

VNMA



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

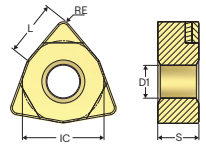
For ISO attribute explanation, see page 82

VNMA



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																
								Coated									Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
VNMA160416S *VNMA334S*	1,6 *0.063*	9,525 *0.375*	16,0 *0.630*	4,76 *0.187*	3,81 *0.150*	35,0	–														■		

WNGA



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

WNGA..-C

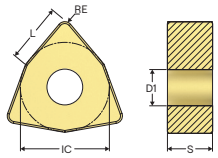


WNGA..-V



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																
								Coated									Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
WNGA060408S-02020-L1-C *WNGA332S-00820-L1-C*	0,8 *0.031*	9,525 *0.375*	6,6 *0.260*	4,76 *0.187*	3,81 *0.150*	80,0	–													■				
WNGA080408S-01525L1WZC *WNGA432S-00625-L1-WZ-C*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0				■													
WNGA080408S-01020-L1-C *WNGA432S-00420-L1-C*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	–										■							
WNGA080408S-01525L-1-C *WNGA432S-00625-L1-C*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	–				■													
WNGA080408S-01020-L1WZC *WNGA432S-00420-L1-WZ-C*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0										■							
WNGA080408S-01525L-1-V *WNGA432S-00625-L1-V*	0,8 *0.031*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	–			■														
WNGA080412S-01525L1WZV *WNGA433S-00625-L1-WZ-V*	1,2 *0.047*	12,7 *0.500*	8,7 *0.343*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■														

WNMA

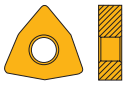


Tolerances:
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

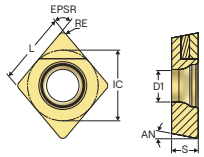
For ISO attribute explanation, see page 82

WNMA



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades																
								Coated									Uncoated							
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
WNMA060408S *WNMA332S*	0,8 *0.031*	9,52 *0.375*	6,6 *0.260*	4,76 *0.187*	3,81 *0.150*	80,0	–														■			

CCGT



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

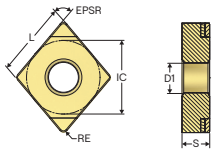
For ISO attribute explanation, see page 82

CCGT...-B



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades														
								Coated								Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CCGT09T304S-01525L1WZB *CCGT32.51S-00625-L1-WZ-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■												
CCGT09T304S-01525-L1-B *CCGT32.51S-00625-L1-B*	0,4 *0.016*	9,525 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0			■												

CNGM



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

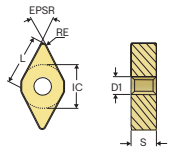
For ISO attribute explanation, see page 82

CNGM...-B



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades														
								Coated								Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
CNGM120408S-07525-L1-B *CNGM432S-03025-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0					■										
CNGM120408S-07525-L1WZB *CNGM432S-03025-L1WZB*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0					■										
CNGM120408S-01525L1WZB *CNGM432S-00625-L1-WZ-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■												
CNGM120408S-01525-L1-B *CNGM432S-00625-L1-B*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0			■												
CNGM120412S-07525-L1-B *CNGM433S-03025-L1-B*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,15 *0.203*	80,0	0,0					■										

DNGM



Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

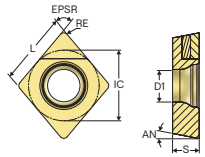
For ISO attribute explanation, see page 82

DNGM...-B



Designation	RE	IC	L	S	D1	EPSR°	AN°	Cemented Carbide and Cermet Grades															
								Coated									Uncoated						
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CH0550	CH1050	CBN060K	CH2540	CH2581	CH3515	CBN300P	CK2065	CBN400C	CBN010	CBN150	CBN170	CBN200	CBN300	CBN500	CBN600
DNGM150408S-07525-L1-B *DNGM432S-03025-L1-B*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0						■											
DNGM150408S-07525-L1WZB *DNGM432S-03025-L1WZB*	0,8 *0.031*	12,7 *0.500*	15,5 *0.610*	4,76 *0.187*	5,15 *0.203*	55,0	0,0					■											

CCMW



Tolerances:
IC = ±0,05/*0.002*
IC = ±0,08/*0.003*
S = ±0,13/*0.005*
RE = ±0,05/*0.002*

Size:
06-09/*2-3*
12/*4*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

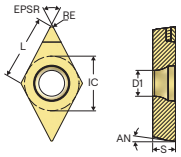
For ISO attribute explanation, see page 82

CCMW



Designation	RE	IC	L	S	D1	EPSR°	AN°	Grades		
								Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
CCMW060202F-L1 *CCMW21.50.5F-L1*	0,2 *0.008*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■		
CCMW060204F-L1 *CCMW21.51F-L1*	0,4 *0.016*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■	■	
CCMW060208F-L1 *CCMW21.52F-L1*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■		
CCMW060208F-L1-WZ *CCMW21.52F-L1-WZ*	0,8 *0.031*	6,35 *0.250*	6,5 *0.256*	2,38 *0.094*	2,9 *0.114*	80,0	7,0	■		
CCMW09T302F-L1 *CCMW32.50.5F-L1*	0,2 *0.008*	9,52 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0	■		
CCMW09T304F-L1 *CCMW32.51F-L1*	0,4 *0.016*	9,52 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0	■		
CCMW09T308F-L1 *CCMW32.52F-L1*	0,8 *0.031*	9,52 *0.375*	9,7 *0.382*	3,97 *0.156*	4,5 *0.177*	80,0	7,0	■		
CCMW120404F-L1 *CCMW431F-L1*	0,4 *0.016*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0	■		
CCMW120408F-L1 *CCMW432F-L1*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	5,6 *0.220*	80,0	7,0	■		

DCMW



Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,05/*0.002*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

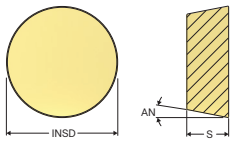
For ISO attribute explanation, see page 82

DCMW



Designation	RE	IC	L	S	D1	EPSR°	AN°	Grades		
								Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
DCMW070202F-L1 *DCMW21.50.5F-L1*	0,2 *0.008*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0	■		
DCMW070204F-L1 *DCMW21.51F-L1*	0,4 *0.016*	6,35 *0.250*	7,8 *0.307*	2,38 *0.094*	2,9 *0.114*	55,0	7,0	■		
DCMW11T302F-L1 *DCMW32.50.5F-L1*	0,2 *0.008*	9,52 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■		
DCMW11T304F-L1 *DCMW32.51F-L1*	0,4 *0.016*	9,52 *0.375*	11,6 *0.457*	3,97 *0.156*	4,5 *0.177*	55,0	7,0	■		

RCGN



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

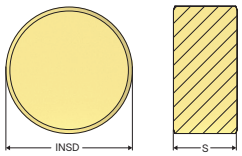
For ISO attribute explanation, see page 82

RCGN



Designation	INSD	S	EPSR°	AN°	Grades		
					Uncoated		
	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
RCGN090300F-LF *RCGN32F-LF*	9,52 *0.375*	3,18 *0.125*	–	7,0	■		

RNGN



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

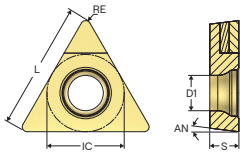
For ISO attribute explanation, see page 82

RNGN



Designation	INSD	S	EPSR°	AN°	Grades		
					Uncoated		
	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
RNGN060300F-LF *RNGN22F-LF*	6,35 *0.250*	3,18 *0.125*	–	–			■
RNGN090300F-LF *RNGN32F-LF*	9,52 *0.375*	3,18 *0.125*	–	–	■	■	
RNGN120300F-LF *RNGN42F-LF*	12,7 *0.500*	3,18 *0.125*	–	–	■		

TCMW

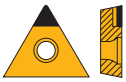


Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,05/*0.002*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

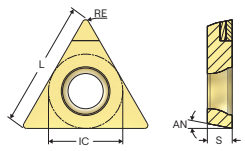
For ISO attribute explanation, see page 82

TCMW



Designation	RE	IC	L	S	D1	EPSR°	AN°	Grades		
								Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
TCMW110204F-L1 *TCMW21.51F-L1*	0,4 *0.016*	6,35 *0.250*	11,0 *0.433*	2,38 *0.094*	2,9 *0.114*	60,0	7,0	■		
TCMW16T304F-L1 *TCMW32.51F-L1*	0,4 *0.016*	9,52 *0.375*	16,5 *0.650*	3,97 *0.156*	4,5 *0.177*	60,0	7,0	■		

TPGN

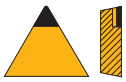


Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,05/*0.002*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

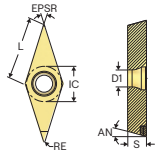
For ISO attribute explanation, see page 82

TPGN



Designation	RE	IC	L	S	EPSR°	AN°	Grades		
							Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
TPGN160302F-L1 *TPGN320.5F-L1*	0,2 *0.008*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0	■		
TPGN160304F-L1 *TPGN321F-L1*	0,4 *0.016*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0	■		
TPGN160308F-L1 *TPGN322F-L1*	0,8 *0.031*	9,525 *0.375*	16,5 *0.650*	3,18 *0.125*	60,0	11,0	■		

VBMW

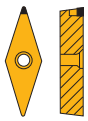


Tolerances:
IC = ±0,05/*0.002*
S = ±0,13/*0.005*
RE = ±0,05/*0.002*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

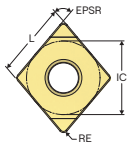
For ISO attribute explanation, see page 82

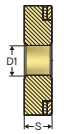
VBMW



Designation	RE	IC	L	S	D1	EPSR°	AN°	Grades		
								Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			PCD20	PCD30	PCD30M
VBMW160402F-L1 *VBMW330.5F-L1*	0,2 *0.008*	9,52 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■		
VBMW160404F-L1 *VBMW331F-L1*	0,4 *0.016*	9,52 *0.375*	16,0 *0.630*	4,76 *0.187*	4,5 *0.177*	35,0	5,0	■		

CNGN





Tolerances:
IC = ±0,025/*0.001*
S = ±0,13/*0.005*
RE = ±0,1/*0.004*

Edge preparation, see page(s) 132

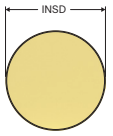
For ISO attribute explanation, see page 82

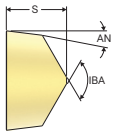
CNGN



Designation	RE	IC	L	S	EPSR°	AN°	Grades			
							Uncoated			
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CS100	CS250	CS300	CW100
CNGN120408S-01020 *CNGN432S-00420*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	4,76 *0.187*	80,0	–	■			
CNGN120708S-01020 *CNGN452S-00420*	0,8 *0.031*	12,7 *0.500*	12,9 *0.508*	7,94 *0.313*	80,0	–	■	■		
CNGN120712S-01020 *CNGN453S-00420*	1,2 *0.047*	12,7 *0.500*	12,9 *0.508*	7,94 *0.313*	80,0	–	■	■		

RCGX





Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Edge preparation, see page(s) 132

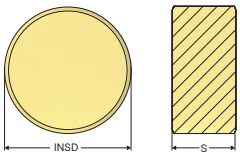
For ISO attribute explanation, see page 82

RCGX



Designation	INSD	S	EPSR°	AN°	Grades			
					Uncoated			
	mm *inch*	mm *inch*			CS100	CS250	CS300	CW100
RCGX060600T-01020 *RCGX24T-00420*	6,35 *0.250*	6,35 *0.250*	–	7,0	■			■
RCGX060600E *RCGX240E*	6,35 *0.250*	6,35 *0.250*	–	–				■
RCGX090700T-01020 *RCGX35T-00420*	9,525 *0.375*	7,94 *0.313*	–	7,0	■	■		■
RCGX120700S-01020 *RCGX45S-00420*	12,7 *0.500*	7,94 *0.313*	–	7,0	■			
RCGX120700T-01020 *RCGX450T-00420*	12,7 *0.500*	7,94 *0.313*	–	7,0	■			■
RCGX120700E *RCGX450E*	12,7 *0.500*	7,94 *0.313*	–	–				■

RNGN



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Edge preparation, see page(s) 132

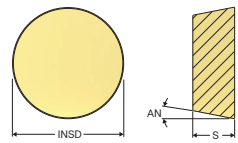
For ISO attribute explanation, see page 82

RNGN



Designation	INSD	S	EPSR°	AN°	Grades			
					Uncoated			
	mm *inch*	mm *inch*			CS100	CS250	CS300	CW100
RNGN120400S-01020 *RNGN43S-00420*	12,7 *0.500*	4,76 *0.187*	–	–	■			
RNGN120400T-01020 *RNGN43T-00420*	12,7 *0.500*	4,76 *0.187*	–	–	■		■	
RNGN120700S-01020 *RNGN45S-00420*	12,7 *0.500*	7,94 *0.313*	–	–	■			
RNGN120700T-01020 *RNGN45T-00420*	12,7 *0.500*	7,94 *0.313*	–	–	■	■	■	■
RNGN120700E *RNGN450E*	12,7 *0.500*	7,94 *0.313*	–	–				■

RPGN



Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

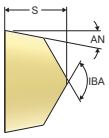
RPGN



Designation	INSD	S	EPSR°	AN°	Grades			
					Uncoated			
	mm *inch*	mm *inch*			CS100	CS250	CS300	CW100
RPGN120400T-01020 *RPGN43T-00420*	12,7 *0.500*	4,76 *0.187*	–	–			■	

RPGX





Tolerances:
INSD = ±0,025/*0.001*
S = ±0,13/*0.005*

Edge preparation, see page(s) 132

For ISO attribute explanation, see page 82

RPGX



Designation	INSD	S	EPSR°	AN°	Grades			
					Uncoated			
	mm *inch*	mm *inch*			CS100	CS250	CS300	CW100
RPGX090700T-01020 *RPGX35T-00420*	9,525 *0.375*	7,94 *0.313*	–	11,0		■		
RPGX120700S-01020 *RPGX45S-00420*	12,7 *0.500*	7,94 *0.313*	–	11,0	■			



Vibration-damping solutions

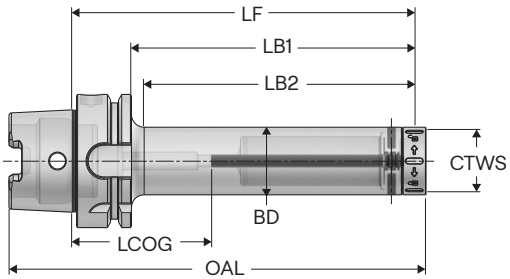
Steadyline®
Steadyline® is a modular anti-vibration tooling system consisting of dampened bars, providing an easily exchangeable head with the accurate and reliable GL interface. To add applicability, the bars are highly capable both for problem-free long-overhang internal turning as well as rotating boring applications.

- Body diameters ∅25, ∅32, ∅40, ∅50, ∅60, ∅80, ∅100, ∅120, ∅150, ∅200 mm, ∅1.0", ∅1.25", ∅1.5", ∅2.0", ∅2.5", ∅3.0" & ∅4.0".
- Lengths 6XD, 8xD and 10xD.
- Seco-Capto™ C4, C5, C6, C8 connections, HSK-T/A 63, HSK-T/A 100.
- Cylindrical shanks-Both in Metric & Inch Sizes.

Modular GL-heads
Modular GL-heads for Steadyline® anti-vibration tooling are easily exchangeable toolholder heads with the accurate and reliable GL interface. GL turning heads are offered for problem-free long-overhang internal turning accommodating a comprehensive range of insert types, shapes and sizes for respective bar diameters.

GL – Steadyline®, HSK-T/A GL holders, body diameters 25, 32, 40 and 50 mm / 0.984, 1.260, 1.575 and 1.969 inch – Metric/ Inch





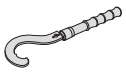
—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—With through coolant
—* Max. RPM only when used in rotating boring
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS HSK-T/A	CTWS GL size	BD	LF	LB1	LB2	OAL	LCOG	Max. RPM*	RFID hole	Balancing	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*
HSKTA63-GL25-130-K	03214283	HSK-T/A63	GL25	25,0 *0.984*	130,0 *5.118*	104,0 *4.094*	101,0 *3.976*	166,5 *6.555*	37,0 *1.457*	10000	1	PB	1,4 *3.090*
HSKTA63-GL25-180-K	03214284	HSK-T/A63	GL25	25,0 *0.984*	180,0 *7.087*	154,0 *6.063*	151,0 *5.945*	216,5 *8.524*	57,7 *2.272*	8000	1	PB	1,5 *3.310*
HSKTA63-GL25-230-K	03214285	HSK-T/A63	GL25	25,0 *0.984*	230,0 *9.055*	204,0 *8.031*	201,0 *7.913*	266,5 *10.492*	80,3 *3.161*	6000	1	PB	1,5 *3.310*
E9374-D32-160-GL32	03029521	HSK-T/A63	GL32	32,0 *1.260*	160,0 *6.299*	134,0 *5.276*	128,0 *5.039*	197,4 *7.772*	58,92 *2.320*	10000	1	PB	1,6 *3.530*
E9374-D32-224-GL32	03029522	HSK-T/A63	GL32	32,0 *1.260*	224,0 *8.819*	198,0 *7.795*	192,0 *7.559*	261,4 *10.291*	90,22 *3.552*	8000	1	PB	2,0 *4.410*
E9374-D40-208-GL40	03029523	HSK-T/A63	GL40	40,0 *1.575*	208,0 *8.189*	182,0 *7.165*	176,0 *6.929*	246,4 *9.701*	92,78 *3.653*	8000	1	PB	2,7 *5.950*
E9374-D40-288-GL40	03029524	HSK-T/A63	GL40	40,0 *1.575*	288,0 *11.339*	262,0 *10.315*	256,0 *10.079*	326,4 *12.850*	134,37 *5.290*	6000	1	PB	3,5 *7.720*
E9374-D50-268-GL50	03029525	HSK-T/A63	GL50	50,0 *1.969*	268,0 *10.551*	242,0 *9.528*	240,5 *9.469*	307,4 *12.102*	131,8 *5.189*	6000	1	PB	4,8 *10.580*
E9374-D50-368-GL50	03029526	HSK-T/A63	GL50	50,0 *1.969*	368,0 *14.488*	342,0 *13.465*	340,5 *13.406*	407,4 *16.039*	184,79 *7.275*	4000	1	PB	6,4 *14.110*
E9376-D32-160-GL32	03029527	HSK-T/A100	GL32	32,0 *1.260*	160,0 *6.299*	131,0 *5.157*	125,0 *4.921*	215,4 *8.480*	32,87 *1.294*	10000	1	PB	3,0 *6.610*
E9376-D32-224-GL32	03029528	HSK-T/A100	GL32	32,0 *1.260*	224,0 *8.819*	195,0 *7.677*	189,0 *7.441*	279,4 *11.000*	54,97 *2.164*	8000	1	PB	3,4 *7.500*
E9376-D32-288-GL32	03029529	HSK-T/A100	GL32	32,0 *1.260*	288,0 *11.339*	259,0 *10.197*	253,0 *9.961*	343,4 *13.520*	80,51 *3.170*	6000	1	PB	3,8 *8.380*
E9376-D40-208-GL40	03029530	HSK-T/A100	GL40	40,0 *1.575*	208,0 *8.189*	179,0 *7.047*	173,0 *6.811*	264,4 *10.409*	62,83 *2.474*	8000	1	PB	4,1 *9.040*
E9376-D40-288-GL40	03029531	HSK-T/A100	GL40	40,0 *1.575*	288,0 *11.339*	259,0 *10.197*	253,0 *9.961*	344,4 *13.559*	98,31 *3.870*	6000	1	PB	4,9 *10.800*
E9376-D40-368-GL40	03029532	HSK-T/A100	GL40	40,0 *1.575*	368,0 *14.488*	339,0 *13.346*	333,0 *13.110*	424,4 *16.709*	139,77 *5.503*	5000	1	PB	5,8 *12.790*
E9376-D50-268-GL50	03029533	HSK-T/A100	GL50	50,0 *1.969*	268,0 *10.551*	239,0 *9.409*	234,0 *9.213*	325,4 *12.811*	104,26 *4.105*	6000	1	PB	6,2 *13.670*
E9376-D50-368-GL50	03029534	HSK-T/A100	GL50	50,0 *1.969*	368,0 *14.488*	339,0 *13.346*	334,0 *13.150*	425,4 *16.748*	154,26 *6.073*	4000	1	PB	7,8 *17.200*
E9376-D50-468-GL50	03029535	HSK-T/A100	GL50	50,0 *1.969*	468,0 *18.425*	439,0 *17.283*	434,0 *17.087*	525,4 *20.685*	211,61 *8.331*	2500	1	PB	9,7 *21.380*

Spare Parts, included in delivery

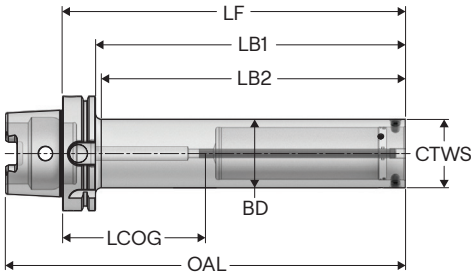
For	Locking key
	
GL25	SL25
GL32	SL32
GL40	SL40
GL50	SL50

Accessories

For	Replaceable end	Torque key
		
GL25	SL00-25	SL00-25.250
GL32	SL00-32	SL00-32.250
GL40	SL00-40	SL00-40.350
GL50	SL00-50	SL00-50.550

BA – Steadyline®, HSK T/A-BA holders – Metric/ Inch





—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—For BA-to-GL adapters program, see page 638
—To hold BA to GL adapters with GL turning heads
—With through coolant
—* Max. RPM only when used in rotating boring
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS HSK-T/A size	CTWS BA connection	BD	LF	LB1	LB2	OAL	LCOG	Max. RPM*	RFID hole	Balancing	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*
E9376-D60-301-BA060	03062828	HSK-T/A100	BA060	60,0 *2.362*	301,0 *11.850*	272,0 *10.709*	267,0 *10.512*	351,0 *13.819*	133,05 *5.238*	4000	1	PB	8,9 *19.620*
E9376-D60-421-BA060	03062829	HSK-T/A100	BA060	60,0 *2.362*	421,0 *16.575*	392,0 *15.433*	387,0 *15.236*	471,0 *18.543*	197,17 *7.763*	3000	1	PB	11,8 *26.010*
E9376-D60-541-BA060	03062830	HSK-T/A100	BA060	60,0 *2.362*	541,0 *21.299*	512,0 *20.157*	507,0 *19.961*	591,0 *23.268*	260,56 *10.258*	2000	1	PB	14,5 *31.970*
E9376-D80-421-BA080	03064109	HSK-T/A100	BA080	80,0 *3.150*	421,0 *16.575*	392,0 *15.433*	387,0 *15.236*	471,0 *18.543*	209,68 *8.255*	3000	1	PB	19,4 *42.770*
E9376-D80-581-BA080	03064111	HSK-T/A100	BA080	80,0 *3.150*	581,0 *22.874*	552,0 *21.732*	547,0 *21.535*	631,0 *24.843*	295,45 *11.632*	2000	1	PB	25,6 *56.440*

Spare Parts, included in delivery

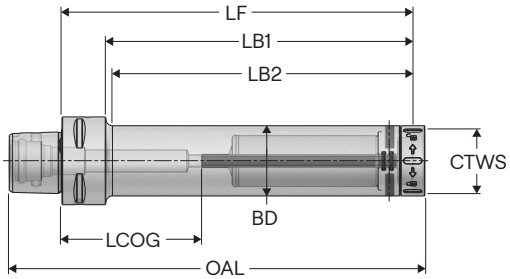
For	Locking screw
	
BA060	90FQ4
BA080	90FQ52

Accessories

For	Locking key
	
BA060	03H04
BA080	03H05

GL – Steadyline®, GL holders, body diameters 25, 32, 40 and 50 mm / 0.984, 1.260, 1.575 and 1.969 inch – Metric/ Inch





—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—With through coolant
—* Max. RPM only when used in rotating boring
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS Seco Capto™ size	CTWS GL size	BD mm inch	LF mm inch	LB1 mm inch	LB2 mm inch	OAL mm inch	LCOG mm inch	Max. RPM*	RFID hole	Balancing	Weight kg lbs
C4-D25-130-GL25	03214272	C4	GL25	25,0 0.984	130,0 5.118	110,0 4.331	107,0 4.213	158,5 6.240	51,8 2.039	10000	0	PB	0,9 1.980
C4-D25-180-GL25	03214273	C4	GL25	25,0 0.984	180,0 7.087	160,0 6.299	157,0 6.181	208,5 8.209	77,2 3.039	8000	0	PB	1,2 2.650
C4-D32-160-GL32	02807837	C4	GL32	32,0 1.260	160,0 6.299	140,0 5.512	137,0 5.394	189,4 7.457	74,73 2.942	10000	0	PB	1,4 3.090
C4-D32-224-GL32	02807838	C4	GL32	32,0 1.260	224,0 8.819	204,0 8.031	201,0 7.913	253,4 9.976	109,16 4.298	8000	0	PB	1,7 3.750
C5-D25-130-GL25	03214274	C5	GL25	25,0 0.984	130,0 5.118	110,0 4.331	107,0 4.213	164,5 6.476	41,8 1.646	10000	1	PB	1,1 2.430
C5-D25-180-GL25	03214275	C5	GL25	25,0 0.984	180,0 7.087	160,0 6.299	157,0 6.181	214,5 8.445	65,1 2.563	8000	1	PB	1,3 2.870
C5-D25-230-GL25	03214276	C5	GL25	25,0 0.984	230,0 9.055	210,0 8.268	207,0 8.150	264,5 10.413	89,8 3.535	6000	1	PB	1,5 3.310
C5-D32-160-GL32	02807840	C5	GL32	32,0 1.260	160,0 6.299	140,0 5.512	136,0 5.354	195,4 7.693	65,15 2.565	10000	1	PB	1,6 3.530
C5-D32-224-GL32	02807841	C5	GL32	32,0 1.260	224,0 8.819	204,0 8.031	200,0 7.874	259,4 10.213	98,47 3.877	8000	1	PB	2,0 4.410
C5-D32-288-GL32	02807842	C5	GL32	32,0 1.260	288,0 11.339	268,0 10.551	264,0 10.394	323,4 12.732	133,61 5.260	6000	1	PB	2,2 4.850
C5-D40-208-GL40	02807843	C5	GL40	40,0 1.575	208,0 8.189	188,0 7.402	184,0 7.244	244,4 9.622	98,32 3.871	8000	1	PB	2,8 6.170
C5-D40-288-GL40	02807844	C5	GL40	40,0 1.575	288,0 11.339	268,0 10.551	264,0 10.394	324,4 12.772	140,88 5.546	6000	1	PB	3,3 7.280
C6-D25-130-GL25	03214277	C6	GL25	25,0 0.984	130,0 5.118	105,0 4.134	102,0 4.016	172,5 6.791	30,4 1.197	10000	1	PB	1,6 3.530
C6-D25-180-GL25	03214278	C6	GL25	25,0 0.984	180,0 7.087	155,0 6.102	152,0 5.984	222,5 8.760	49,3 1.941	8000	1	PB	1,5 3.310
C6-D25-230-GL25	03214279	C6	GL25	25,0 0.984	230,0 9.055	205,0 8.071	202,0 7.953	272,5 10.728	70,2 2.764	6000	1	PB	1,7 3.750
C6-D32-160-GL32	02807846	C6	GL32	32,0 1.260	160,0 6.299	135,0 5.315	129,0 5.079	203,4 8.008	52,06 2.050	10000	1	PB	1,8 3.970
C6-D32-224-GL32	02807847	C6	GL32	32,0 1.260	224,0 8.819	199,0 7.835	193,0 7.598	267,4 10.528	82,17 3.235	8000	1	PB	2,2 4.850
C6-D32-288-GL32	02807848	C6	GL32	32,0 1.260	288,0 11.339	263,0 10.354	257,0 10.118	331,4 13.047	114,87 4.522	6000	1	PB	2,6 5.730
C6-D40-208-GL40	02807849	C6	GL40	40,0 1.575	208,0 8.189	183,0 7.205	177,0 6.969	252,4 9.937	86,42 3.402	8000	1	PB	2,9 6.390
C6-D40-288-GL40	02807850	C6	GL40	40,0 1.575	288,0 11.339	263,0 10.354	257,0 10.118	332,4 13.087	127,5 5.020	6000	1	PB	3,7 8.160
C6-D40-368-GL40	02807851	C6	GL40	40,0 1.575	368,0 14.488	343,0 13.504	337,0 13.268	412,4 16.236	173,14 6.817	5000	1	PB	4,6 10.140

Designation	Item number	CTMS Seco Capto™ size	CTWS GL size	BD	LF	LB1	LB2	OAL	LCOG	Max. RPM*	RFID hole	Balancing	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*
C6-D50-268-GL50	02807852	C6	GL50	50,0 *1.969*	268,0 *10.551*	243,0 *9.567*	238,0 *9.370*	313,4 *12.339*	126,6 *4.984*	6000	1	PB	5,4 *11.900*
C6-D50-368-GL50	02807853	C6	GL50	50,0 *1.969*	368,0 *14.488*	343,0 *13.504*	338,0 *13.307*	413,4 *16.276*	179,44 *7.065*	4000	1	PB	6,6 *14.550*
C6-D50-468-GL50	02807854	C6	GL50	50,0 *1.969*	468,0 *18.425*	443,0 *17.441*	438,0 *17.244*	513,4 *20.213*	238,49 *9.389*	2500	1	PB	8,5 *18.740*
C8-D32-224-GL32	03029356	C8	GL32	32,0 *1.260*	224,0 *8.819*	191,0 *7.520*	181,0 *7.126*	277,4 *10.921*	58,17 *2.290*	8000	1	PB	3,2 *7.050*
C8-D32-288-GL32	03029357	C8	GL32	32,0 *1.260*	288,0 *11.339*	255,0 *10.039*	245,0 *9.646*	341,4 *13.441*	84,7 *3.335*	6000	1	PB	3,6 *7.940*
C8-D40-288-GL40	03029358	C8	GL40	40,0 *1.575*	288,0 *11.339*	255,0 *10.039*	245,0 *9.646*	342,4 *13.480*	102,14 *4.021*	6000	1	PB	4,7 *10.360*
C8-D40-368-GL40	03029359	C8	GL40	40,0 *1.575*	368,0 *14.488*	335,0 *13.189*	325,0 *12.795*	422,4 *16.630*	144,04 *5.671*	5000	1	PB	5,6 *12.350*
C8-D50-268-GL50	03029360	C8	GL50	50,0 *1.969*	268,0 *10.551*	235,0 *9.252*	225,0 *8.858*	323,4 *12.732*	107,59 *4.236*	6000	1	PB	5,9 *13.010*
C8-D50-368-GL50	03029361	C8	GL50	50,0 *1.969*	368,0 *14.488*	335,0 *13.189*	325,0 *12.795*	423,4 *16.669*	158,08 *6.224*	4000	1	PB	7,5 *16.530*
C8-D50-468-GL50	03029362	C8	GL50	50,0 *1.969*	468,0 *18.425*	435,0 *17.126*	425,0 *16.732*	523,4 *20.606*	215,6 *8.488*	2500	1	PB	9,4 *20.720*

Spare Parts, included in delivery

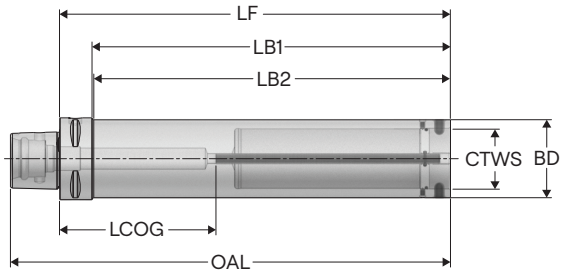
For	Locking key
	
GL25	SL25
GL32	SL32
GL40	SL40
GL50	SL50

Accessories

For	Replaceable end	Torque key
		
GL25	SL00-25	SL00-25.250
GL32	SL00-32	SL00-32.250
GL40	SL00-40	SL00-40.350
GL50	SL00-50	SL00-50.550

BA – Steadyline®, BA holders, body diameters 60 and 80 mm / 2.362 and 3.150 inch – Metric/ Inch





—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—For BA-to-GL adapters program, see page 638
—To hold BA to GL adapters with GL turning heads
—With through coolant
—* Max. RPM only when used in rotating boring
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS Seco Capto™ size	CTWS BA size	BD	LF	LB1	LB2	OAL	LCOG	Max. RPM*	RFID hole	Balancing	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*
C6-D60-301-BA060	03062831	C6	BA060	60,0 *2.362*	301,0 *11.850*	276,0 *10.866*	273,0 *10.748*	339,0 *13.346*	151,74 *5.974*	4000	1	PB	7,8 *17.200*
C6-D60-421-BA060	03062832	C6	BA060	60,0 *2.362*	421,0 *16.575*	396,0 *15.591*	393,0 *15.472*	459,0 *18.071*	218,63 *8.607*	3000	1	PB	10,6 *23.370*
C8-D60-301-BA060	03062833	C8	BA060	60,0 *2.362*	301,0 *11.850*	268,0 *10.551*	263,0 *10.354*	349,0 *13.740*	137,04 *5.395*	4000	1	PB	8,6 *18.960*
C8-D60-421-BA060	03062834	C8	BA060	60,0 *2.362*	421,0 *16.575*	388,0 *15.276*	383,0 *15.079*	469,0 *18.465*	202,5 *7.972*	3000	1	PB	11,4 *25.130*
C8-D60-541-BA060	03062835	C8	BA060	60,0 *2.362*	541,0 *21.299*	508,0 *20.000*	503,0 *19.803*	589,0 *23.189*	266,78 *10.503*	2000	1	PB	14,0 *30.860*
C8-D80-421-BA080	03065829	C8	BA080	80,0 *3.150*	421,0 *16.575*	388,0 *15.276*	383,0 *15.079*	469,0 *18.465*	213,89 *8.421*	3000	1	PB	18,8 *41.450*
C8-D80-581-BA080	03065830	C8	BA080	80,0 *3.150*	581,0 *22.874*	548,0 *21.575*	543,0 *21.378*	629,0 *24.764*	300,38 *11.826*	2000	1	PB	25,1 *55.340*

Spare Parts, included in delivery

For	Locking screw
	
BA060	90FQ4
BA080	90FQ52

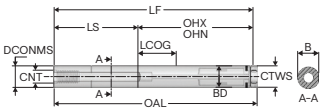
Accessories

For	Locking key
	
BA060	03H04
BA080	03H05

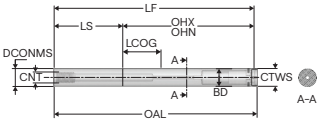
GL – Steadyline®, GL holders, body diameters 25, 32, 40 and 50 mm / 0.984, 1.260, 1.575 and 1.969 inch, steel or carbide
– Metric/ Inch



Design 1



Design 2, without flat



—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—With through coolant channel and coolant supply connecting thread
—Dxx...-CR holders feature carbide-reinforced bodies to increase the rigidity of small diameter bars with 10xD overhang
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS GL size	BD	LS	LF	OAL	OHN	OHX	B	LCOG	CNT	Design	RFID hole	Weight
		mm *inch*		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				kg *lbs*
D25-130-GL25	03214280	25,0 *0.984*	GL25	25,0 *0.984*	100,0 *3.937*	230,0 *9.055*	234,5 *9.232*	130,0 *5.118*	130,0 *5.118*	24,0 *0.945*	25,5 *1.004*	G 1/4	1	0	1,1 *2.430*
D25-180-GL25	03214281	25,0 *0.984*	GL25	25,0 *0.984*	100,0 *3.937*	280,0 *11.024*	284,5 *11.201*	180,0 *7.087*	180,0 *7.087*	–	52,8 *2.079*	G 1/4	2	0	1,2 *2.650*
D25-230-GL25-CR	03214282	25,0 *0.984*	GL25	25,0 *0.984*	75,0 *2.953*	305,0 *12.008*	309,5 *12.185*	230,0 *9.055*	230,0 *9.055*	–	69,6 *2.740*	M8x1	2	0	2,0 *4.410*
D32-160-GL32	02807855	32,0 *1.260*	GL32	32,0 *1.260*	128,0 *5.039*	288,0 *11.339*	293,4 *11.551*	160,0 *6.299*	160,0 *6.299*	31,0 *1.220*	25,31 *0.996*	G 1/4	1	0	2,0 *4.410*
D32-224-GL32	02807856	32,0 *1.260*	GL32	32,0 *1.260*	128,0 *5.039*	352,0 *13.858*	357,4 *14.071*	224,0 *8.819*	224,0 *8.819*	31,0 *1.220*	60,23 *2.371*	G 1/4	1	0	2,3 *5.070*
D32-288-GL32-CR	03334786	32,0 *1.260*	GL32	32,0 *1.260*	96,0 *3.780*	384,0 *15.118*	389,4 *15.331*	288,0 *11.339*	288,0 *11.339*	–	84,4 *3.323*	M8x1	2	0	3,7 *8.160*
D40-208-GL40	02807858	40,0 *1.575*	GL40	40,0 *1.575*	160,0 *6.299*	368,0 *14.488*	374,4 *14.740*	208,0 *8.189*	208,0 *8.189*	38,5 *1.516*	35,56 *1.400*	G 1/4	1	0	3,8 *8.380*
D40-288-GL40	02807859	40,0 *1.575*	GL40	40,0 *1.575*	160,0 *6.299*	448,0 *17.638*	454,4 *17.890*	288,0 *11.339*	288,0 *11.339*	38,5 *1.516*	78,26 *3.081*	G 1/4	1	0	4,6 *10.140*
D40-368-GL40	02807860	40,0 *1.575*	GL40	40,0 *1.575*	160,0 *6.299*	528,0 *20.787*	534,4 *21.039*	368,0 *14.488*	368,0 *14.488*	–	124,33 *4.895*	G 1/4	2	0	5,5 *12.130*
D50-268-GL50	02807861	50,0 *1.969*	GL50	50,0 *1.969*	200,0 *7.874*	468,0 *18.425*	475,4 *18.717*	268,0 *10.551*	268,0 *10.551*	48,5 *1.909*	46,44 *1.828*	G 1/4	1	0	7,5 *16.530*
D50-368-GL50	02807862	50,0 *1.969*	GL50	50,0 *1.969*	200,0 *7.874*	568,0 *22.362*	575,4 *22.654*	368,0 *14.488*	368,0 *14.488*	48,5 *1.909*	99,02 *3.898*	G 1/4	1	0	9,1 *20.060*
D50-468-GL50	02807863	50,0 *1.969*	GL50	50,0 *1.969*	200,0 *7.874*	668,0 *26.299*	675,4 *26.591*	468,0 *18.425*	468,0 *18.425*	–	158,07 *6.223*	G 1/4	2	0	11,0 *24.250*

Spare Parts, included in delivery

For	Coolant adapter	Locking key
		
GL25	–	SL25
GL25-CR	904JET08G1/4L	SL25
GL32	–	SL32
GL32-CR	904JET08G1/4L	SL32
GL40	–	SL40
GL50	–	SL50

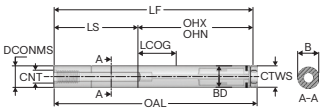
Accessories

For	Replaceable end	Torque key
		
GL25	SL00-25	SL00-25.250
GL25-CR	SL00-25	SL00-25.250
GL32	SL00-32	SL00-32.250
GL32-CR	SL00-32	SL00-32.250
GL40	SL00-40	SL00-40.350
GL50	SL00-50	SL00-50.550

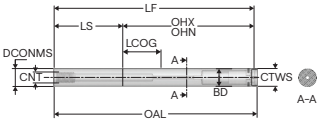
GL – Steadyline®, GL holders, body diameters 1.00, 1.25, 1.59 and 2.00 inch, steel or carbide – Inch



Design 1



Design 2, without flat



—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—With through coolant channel and coolant supply connecting thread
—Dxx...-CR holders feature carbide-reinforced bodies to increase the rigidity of small diameter bars with 10xD overhang
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS GL size	BD	LS	LF	OAL	OHN	OHX	B	LCOG	CNT	Design	RFID hole	Weight
		inch		inch	inch	inch	inch	inch	inch	inch	inch				lbs
DA16-5.25-GL25	03214286	1.000	GL25	1.000	4.000	9.250	9.427	5.250	5.250	0.945	1.031	G 1/4	1	0	2.430
DA16-7.25-GL25	03214287	1.000	GL25	1.000	4.000	11.250	11.427	7.250	7.250	–	2.118	G 1/4	2	0	2.870
DA16-9.25-GL25-CR	03214288	1.000	GL25	1.000	3.000	12.252	12.429	9.252	9.252	–	2.791	M8x1	2	0	4.630
DA20-6.50-GL32	02807928	1.250	GL32	1.260	5.000	11.500	11.713	6.500	6.500	1.215	1.139	G 1/4	1	0	4.410
DA20-9.00-GL32	02807929	1.250	GL32	1.260	5.000	14.000	14.213	9.000	9.000	1.215	2.509	G 1/4	1	0	5.070
DA20-11.50-GL32-CR	03334787	1.250	GL32	1.250	3.750	15.250	15.463	11.500	11.500	–	3.429	M8x1	2	0	8.600
DA24-8.00-GL40	02807931	1.500	GL40	1.575	6.000	14.000	14.252	8.000	8.000	1.435	1.621	G 1/4	1	0	7.720
DA24-11.00-GL40	02807933	1.500	GL40	1.575	6.000	17.000	17.252	11.000	11.000	1.435	3.244	G 1/4	1	0	10.360
DA24-14.00-GL40	02807935	1.500	GL40	1.575	6.000	20.000	20.252	14.000	14.000	–	4.991	G 1/4	2	0	11.240
DA32-10.50-GL50	02807936	2.000	GL50	1.969	8.000	18.500	18.791	10.500	10.500	1.935	1.667	G 1/4	1	0	17.860
DA32-14.50-GL50	02807937	2.000	GL50	1.969	8.000	22.500	22.791	14.500	14.500	1.935	3.762	G 1/4	1	0	20.720
DA32-18.50-GL50	02807938	2.000	GL50	1.969	8.000	26.500	26.791	18.500	18.500	–	6.111	G 1/4	2	0	24.470

Spare Parts, included in delivery

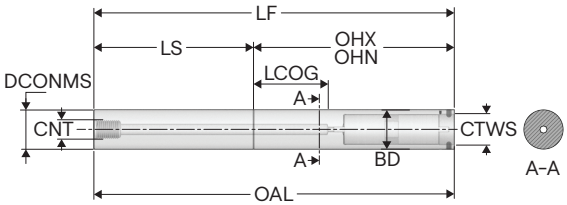
For	Coolant adapter	Locking key
		
GL25	–	SL25
GL25-CR	904JET08G1/4L	SL25
GL32	–	SL32
GL32-CR	904JET08G1/4L	SL32
GL40	–	SL40
GL50	–	SL50

Accessories

For	Replaceable end	Torque key
		
GL25	SL00-25	SL00-25.250
GL25-CR	SL00-25	SL00-25.250
GL32	SL00-32	SL00-32.250
GL32-CR	SL00-32	SL00-32.250
GL40	SL00-40	SL00-40.350
GL50	SL00-50	SL00-50.550

BA – Steadyline®, BA holders, body diameters 60, 80, 100, 120, 150, 200 mm / 2.362, 3.150, 3.937, 4.724, 5.906, 7.874 inch – Metric/ Inch





—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—For BA-to-GL adapters program, see page 638
—To hold BA to GL adapters with GL turning heads
—With through coolant
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS GL size	BD	LS	LF	OAL	OHN	OHX	LCOG	CNT	RFID hole	Weight
		mm *inch*		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			kg *lbs*
D60-301-BA060	03062826	60,0 *2.362*	BA060	60,0 *2.362*	240,0 *9.449*	541,0 *21.299*	541,0 *21.299*	301,0 *11.850*	301,0 *11.850*	50,06 *1.971*	G 3/4	0	12,5 *27.560*
D60-541-BA060	03062827	60,0 *2.362*	BA060	60,0 *2.362*	240,0 *9.449*	781,0 *30.748*	781,0 *30.748*	541,0 *21.299*	541,0 *21.299*	179,12 *7.052*	G 3/4	0	15,5 *34.170*
D80-421-BA080	03062862	80,0 *3.150*	BA080	80,0 *3.150*	320,0 *12.598*	741,0 *29.173*	741,0 *29.173*	421,0 *16.575*	421,0 *16.575*	71,0 *2.795*	G 3/4	0	30,2 *66.580*
D80-741-BA080	03062863	80,0 *3.150*	BA080	80,0 *3.150*	320,0 *12.598*	1061,0 *41.772*	1061,0 *41.772*	741,0 *29.173*	741,0 *29.173*	241,55 *9.510*	G 3/4	0	43,4 *95.680*
D100-939-BA100	03139335	100,0 *3.937*	BA100	100,0 *3.937*	500,0 *19.685*	1439,0 *56.654*	1439,0 *56.654*	939,0 *36.969*	939,0 *36.969*	271,9 *10.705*	G 3/4	0	78,0 *171.960*
D120-1200-BA120	10144409	120,0 *4.724*	BA120	120,0 *4.724*	720,0 *28.346*	1920,0 *75.591*	1920,0 *75.591*	1200,0 *47.244*	1200,0 *47.244*	314,67 *12.389*	G 3/4	0	168,0 *370.380*
D150-1500-BA150	10144410	150,0 *5.906*	BA150	150,0 *5.906*	900,0 *35.433*	2400,0 *94.488*	2400,0 *94.488*	1500,0 *59.055*	1500,0 *59.055*	413,76 *16.290*	G 3/4	0	275,0 *606.270*
D200-2000-BA200	10144411	200,0 *7.874*	BA200	200,0 *7.874*	1200,0 *47.244*	3200,0 *125.984*	3200,0 *125.984*	2000,0 *78.740*	2000,0 *78.740*	517,5 *20.374*	G 3/4	0	654,0 *1441.820*

Spare Parts, included in delivery

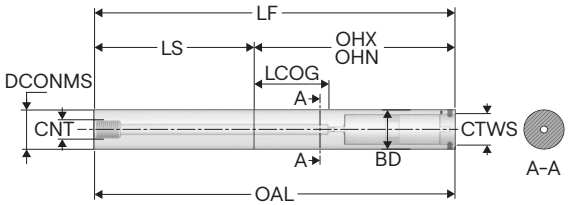
For	Locking screw
	
BA060	90FQ4
BA080	90FQ52
BA100, 120, 150	90FQ6
BA200	–

Accessories

For	Locking key
	
BA060	03H04
BA080	03H05
BA100, 120, 150	03H06
BA200	–

GL – Steadyline® turning, BA holders, body diameters 2.50, 3.00 and 4.00 inch – Inch





—With dynamic damping, ready to use
—For GL heads program, see page(s) 644-675
—For BA-to-GL adapters program, see page 638-639
—With through coolant channel and coolant supply connecting thread
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS GL size	BD	LS	LF	OAL	OHN	OHX	LCOG	CNT	RFID hole	Weight
		inch		inch	inch	inch	inch	inch	inch	inch			lbs
DA40-12.50-BA06I	03064142	2.500	BA06I	2.500	10.000	22.500	22.500	12.500	12.500	1.960	G 3/4	0	31.310
DA40-22.50-BA06I	03064143	2.500	BA06I	2.500	10.000	32.500	32.500	22.500	22.500	7.290	G 3/4	0	46.740
DA48-15.50-BA08I	03064145	3.000	BA08I	3.000	12.000	27.500	27.500	15.500	15.500	2.600	G 3/4	0	57.540
DA48-27.50-BA08I	03064147	3.000	BA08I	3.000	12.000	39.500	39.500	27.500	27.500	9.050	G 3/4	0	83.110
DA64-37.50-BA100	03139336	4.000	BA100	4.000	20.000	57.500	57.500	37.500	37.500	10.750	G 3/4	0	191.800

Spare Parts, included in delivery

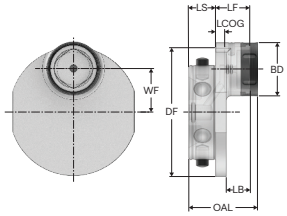
For	Locking screw
	
BA06I	90FQ4
BA08I	90FQ52
BA100	90FQ6

Accessories

For	Locking key
	
BA06I	03H04
BA08I	03H05
BA100	03H06

BA – BA-to-GL adapters – Metric/ Inch





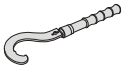
—For GL heads program, see page(s) 644-675
—To hold GL50 turning heads on Steadyline® BA holders
—With through coolant
—Each adapter size available with 2 radial offset sizes WF: when possible, preferably use the widest offset
—For ISO attribute explanation, see page 82

Designation	Item number	Machine side CTMS	Workpiece side GL size CTWS	WF	LF	DF	BD	LB	LS	OAL	LCOG	RFID hole	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*
BA060-05-27-GL50	03065832	BA060	GL50	5,0 *0.197*	27,0 *1.063*	60,0 *2.362*	50,0 *1.969*	21,5 *0.846*	16,0 *0.630*	50,4 *1.984*	5,82 *0.229*	0	0,6 *1.320*
BA060-10-27-GL50	03065833	BA060	GL50	10,0 *0.394*	27,0 *1.063*	60,0 *2.362*	50,0 *1.969*	21,5 *0.846*	16,0 *0.630*	50,4 *1.984*	5,79 *0.228*	0	0,6 *1.320*
BA080-15-27-GL50	03065834	BA080	GL50	15,0 *0.591*	27,0 *1.063*	80,0 *3.150*	50,0 *1.969*	21,5 *0.846*	22,0 *0.866*	56,4 *2.220*	1,42 *0.056*	0	1,2 *2.650*
BA080-23-27-GL50	03065835	BA080	GL50	23,0 *0.906*	27,0 *1.063*	80,0 *3.150*	50,0 *1.969*	21,5 *0.846*	22,0 *0.866*	56,4 *2.220*	1,42 *0.056*	0	0,9 *1.980*
BA100-28-29-GL50	03139337	BA100	GL50	28,0 *1.102*	29,0 *1.142*	100,0 *3.937*	50,0 *1.969*	21,5 *0.846*	25,0 *0.984*	61,4 *2.417*	-1,31 *-0.052*	0	1,9 *4.190*
BA100-38-29-GL50	03139338	BA100	GL50	38,0 *1.496*	29,0 *1.142*	100,0 *3.937*	50,0 *1.969*	21,5 *0.846*	25,0 *0.984*	61,4 *2.417*	-1,23 *-0.048*	0	1,5 *3.310*
BA120-40-32-GL50	10144674	BA120	GL50	40,0 *1.575*	32,0 *1.260*	120,0 *4.724*	50,0 *1.969*	21,5 *0.846*	25,0 *0.984*	64,4 *2.535*	0,09 *0.004*	0	2,2 *4.850*
BA150-55-32-GL50	10144412	BA150	GL50	55,0 *2.165*	32,0 *1.260*	150,0 *5.906*	50,0 *1.969*	21,5 *0.846*	25,0 *0.984*	64,4 *2.535*	-1,27 *-0.050*	0	3,8 *8.380*

Spare Parts, included in delivery

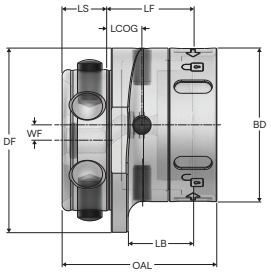
For	Locking key
	
GL50	SL50

Accessories

For	Replaceable end	Torque key
		
GL50	SL00-50	SL00-50.550

BA – BA-to-GL adapters – Inch





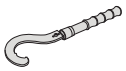
—For GL heads program, see page(s) 644-675
—To hold GL50 turning heads on Steadyline® BA holders
—With through coolant
—Each adapter size available with 2 radial offset sizes WF: when possible, preferably use the widest offset
—For ISO attribute explanation, see page 82

Designation	Item number	Machine side CTMS	Workpiece side GL size CTWS	WF	LF	DF	BD	LB	LS	OAL	LCOG	RFID hole	Weight
				inch	inch	inch	inch	inch	inch	inch	inch		lbs
BA06I-06.75-27-GL50	03065836	BA06I	GL50	0.266	1.063	2.500	1.969	0.846	0.630	1.984	0.227	0	2.200
BA06I-11.75-27-GL50	03065837	BA06I	GL50	0.463	1.063	2.500	1.969	0.846	0.630	1.984	0.226	0	2.200
BA08I-13.10-27-GL50	03065838	BA08I	GL50	0.516	1.063	3.000	1.969	0.846	0.866	2.220	0.054	0	1.980
BA08I-21.10-27-GL50	03065839	BA08I	GL50	0.831	1.063	3.000	1.969	0.846	0.866	2.220	0.055	0	2.870

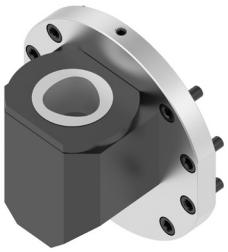
Spare Parts, included in delivery

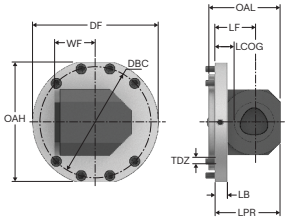
For	Locking key
	
GL50	SL50

Accessories

For	Replaceable end	Torque key
		
GL50	SL00-50	SL00-50.550

BA – BA-to-Seco Capto™ – Metric/ Inch

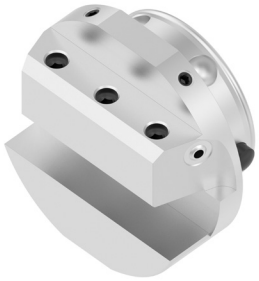


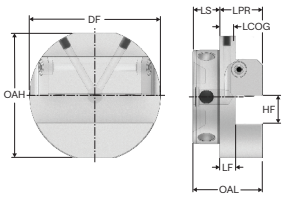


—Clamping force, see page 1017
—Spare Parts and Accessories, see page 1028
—For external Seco-Capto™ toolholders program, see page 163-235
—For ISO attribute explanation, see page 82

Designation	Item number	Machine side CTMS	Workpiece side CTWS	OAH	WF	DF	DBC	LF	LPR	LB	OAL	LCOG	TDZ	RFID hole	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			kg *lbs*
BA200-90D-62-C6-R	10144413	BA200	C6	190,0 *7.480*	65,0 *2.559*	200,0 *7.874*	175,0 *6.890*	62,0 *2.441*	104,0 *4.094*	20,0 *0.787*	114,0 *4.488*	37,75 *1.486*	M10	0	13,0 *28.660*

BA – BA-to-Shank toolholders – Metric/ Inch





—For external toolholders program, see page 252–432
—For ISO attribute explanation, see page 82

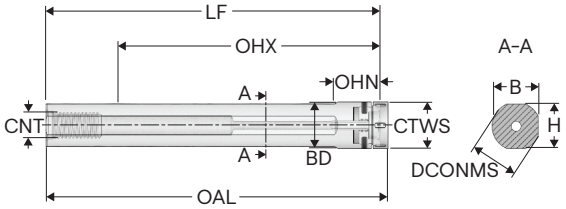
Designation	Item number	Machine side CTMS	Workpiece side CTWS	OAH	DF	LF	LPR	LS	HF	OAL	LCOG	RFID hole	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*
BA120-90D-15-SQ2525	10144415	BA120	SHANK-25	114,0 *4.488*	120,0 *4.724*	15,0 *0.591*	40,0 *1.575*	25,0 *0.984*	25,0 *0.984*	65,0 *2.559*	9,05 *0.356*	0	3,0 *6.610*
BA150-90D-15-SQ2525	10144416	BA150	SHANK-25	140,0 *5.512*	150,0 *5.906*	15,0 *0.591*	40,0 *1.575*	25,0 *0.984*	25,0 *0.984*	65,0 *2.559*	8,59 *0.338*	0	5,4 *11.900*
BA200-90D-20-SQ3232	10144417	BA200	SHANK-32	190,0 *7.480*	200,0 *7.874*	20,0 *0.787*	52,0 *2.047*	10,0 *0.394*	32,0 *1.260*	62,0 *2.441*	19,2 *0.756*	0	8,7 *19.180*

Accessories

For	Locking key
	
...-SQ2525	6SMS795
...-SQ3232	8SMS795

GL holders, body diameters 25, 32, 40 and 50 mm – Metric/ Inch





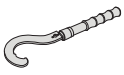
—Steel bars without damping
—With through coolant channel and coolant supply connecting thread
—For GL heads program, see page(s) 644-675
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS	BD	LF	OAL	OHN	OHX	H	B	CNT	RFID hole	Weight
		mm *inch*		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			kg *lbs*
D25-A-80-GL25	10110387	25,0 *0.984*	GL25	25,0 *0.984*	180,0 *7.087*	184,5 *7.264*	24,5 *0.965*	80,0 *3.150*	23,0 *0.906*	24,0 *0.945*	G 1/4	0	0,8 *1.760*
D32-A-96-GL32	10110388	32,0 *1.260*	GL32	32,0 *1.260*	224,0 *8.819*	229,4 *9.031*	26,0 *1.024*	96,0 *3.780*	30,0 *1.181*	31,0 *1.220*	G 1/4	0	1,4 *3.090*
D40-A-128-GL40	10110389	40,0 *1.575*	GL40	40,0 *1.575*	288,0 *11.339*	294,4 *11.591*	30,0 *1.181*	128,0 *5.039*	37,0 *1.457*	38,5 *1.516*	G 1/4	0	2,6 *5.730*
D50-A-168-GL50	10110390	50,0 *1.969*	GL50	50,0 *1.969*	368,0 *14.488*	375,4 *14.780*	33,5 *1.319*	138,0 *5.433*	47,0 *1.850*	48,5 *1.909*	G 1/4	0	5,5 *12.130*

Spare Parts, included in delivery

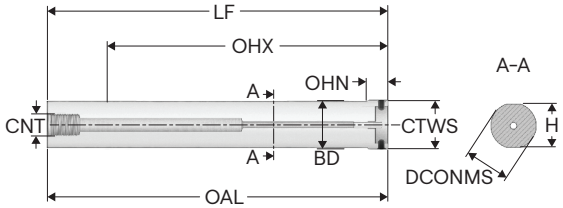
For	Locking key
	
D25	SL25
D32	SL32
D40	SL40
D50	SL50

Accessories

For	Replaceable end	Torque key
		
D25	SL00-25	SL00-25.250
D32	SL00-32	SL00-32.250
D40	SL00-40	SL00-40.350
D50	SL00-50	SL00-50.550

BA holders, body diameter 60 mm – Metric/ Inch





—Steel bars without damping
—With through coolant channel and coolant supply connecting thread
—For BA-to-GL adapters program, see page 638
—For GL heads program, see page(s) 644-675
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	CTWS	BD	LF	OAL	OHN	OHX	H	CNT	RFID hole	Weight
		mm *inch*		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			kg *lbs*
D60-A-181-BA060	10110391	60,0 *2.362*	BA060	60,0 *2.362*	421,0 *16.575*	421,0 *16.575*	26,5 *1.043*	181,0 *7.126*	57,0 *2.244*	G 3/4	0	8,4 *18.520*

Spare Parts, included in delivery

For	Locking screw
	
D60	90FQ4

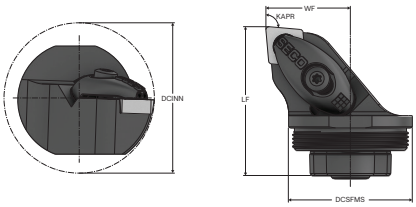
Accessories

For	Locking key
	
D60	03H04

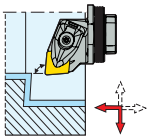
GL..-DCLCR/L – Toolholders for inserts CCGT, CCGW, CCMT, CCMW – Metric/ Inch



GL..-DCLCR/L



KAPR = 95,0 °



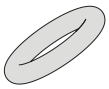
CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DCLCR-22032-09JET	02994382	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL32-DCLCL-22032-09JET	02994379	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL40-DCLCR-27032-09JET	02994389	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL40-DCLCL-27032-09JET	02994386	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL50-DCLCR-32032-09JET	02994395	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
GL50-DCLCL-32032-09JET	02994392	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Coolant seal	O-ring	Spring
						
GL32	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	O-RING-5.0X1.2	S5808
GL40	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	O-RING-5.0X1.2	S5808
GL50	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	O-RING-5.0X1.2	S5808

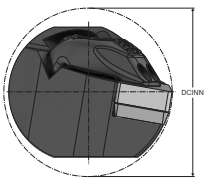
Accessories

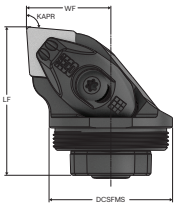
For	Bit holder	Coolant kit R-Roughing	Insert clamping torque	Replacement blade	Torque key
					
GL32	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	T00-10P20
GL40	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	T00-10P20
GL50	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	T00-10P20

GL..-DCLNR/L – Toolholders for inserts CNGG, CNMA, CNMG, CNMM – Metric/ Inch

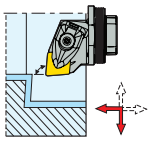


GL..-DCLNR/L





KAPR = 95,0 °



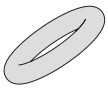
CTWS



—Right-hand version shown
—For inserts program, see page(s) 548, 549, 550, 551, 552, 553
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS mm *inch*	WF mm *inch*	LF mm *inch*	DCINN mm *inch*	CP bar *psi*	KAPR°	GAMO°	LAMS°	Weight kg *lbs*	CTWS
GL32-DCLNR-22032-12JET	02994325	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL32-DCLNL-22032-12JET	02994324	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL40-DCLNR-27032-12JET	02994341	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL40-DCLNL-27032-12JET	02994340	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL50-DCLNR-32032-12JET	02994354	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-8,0	0,3 *0.660*	CN..1204.. *CN..43.*
GL50-DCLNL-32032-12JET	02994351	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-8,0	0,3 *0.660*	CN..1204.. *CN..43.*

Spare Parts, included in delivery

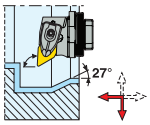
For	Clamp screw	Coolant kit	Coolant seal	Insert shim	O-ring	Shim/clamp key	Shim screw	Spring
								
GL32	L85021-T15P	CN17L00R-2-SET	930RD13	DCO120310	O-RING-5.0X1.2	1/4HEX-T15PX50	C04008-T15P	S7111
GL40	L85021-T15P	CN17L00R-2-SET	930RD13	DCO120310	O-RING-5.0X1.2	1/4HEX-T15PX50	C04008-T15P	S7111
GL50	L85021-T15P	CN17L00R-2-SET	930RD13	DCO120310	O-RING-5.0X1.2	1/4HEX-T15PX50	C04008-T15P	S7111

Accessories

For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Insert clamping torque	Replacement blade	Torque key
						
GL32	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	3.5NM	T00-15P	T00-15P35
GL40	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	3.5NM	T00-15P	T00-15P35
GL50	1/4HEX-S-HANDLE	CN17U00S-2-SET	CN17L00X-2-SET	3.5NM	T00-15P	T00-15P35

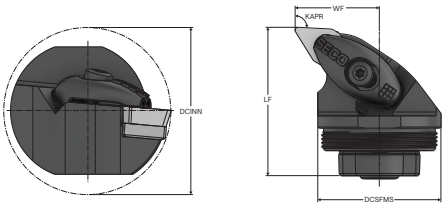
GL..-DDUCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

KAPR = 93,0 °





GL..-DDUCR/L



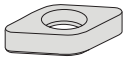
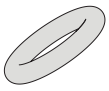
CTWS



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DDUCR-22032-11JET	02994499	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL32-DDUCL-22032-11JET	02994496	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-DDUCR-27032-11JET	02994556	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-DDUCL-27032-11JET	02994555	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL50-DDUCR-32032-11JET	02994558	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
GL50-DDUCL-32032-11JET	02994557	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Coolant seal	Insert shim	O-ring	Shim screw	Spring
								
GL32	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	126.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL40	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	126.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL50	1/4HEX-T10PX50	L84017-T10P	CP14U00S-2-SET	930RD13	126.19-620	O-RING-5.0X1.2	C94006-T15P	S5808

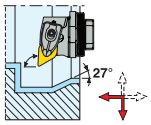
Accessories

For	Bit holder	Coolant kit R-Roughing	Insert clamping torque	Replacement blade	Shim key	Torque key
						
GL32	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL40	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL50	1/4HEX-S-HANDLE	CP14L00R-2-SET	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20

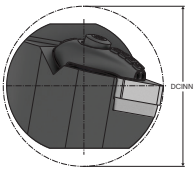
GL..-DDUNR/L – Toolholders for inserts DNGG, DNGN, DNMA, DNMG, DNMM, DNMU, DNMX – Metric/ Inch

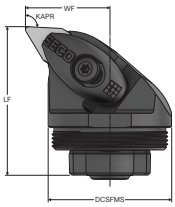


KAPR = 93,0 °



GL..-DDUNR/L





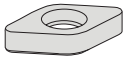
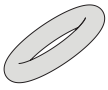
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DDUNR-22032-11JET	02994328	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL32-DDUNL-22032-11JET	02994326	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL32-DDUNR-22032-15JET	02994329	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,2 *0.440*	DN..1504-DN..1506* *DN..43-DN..44**
GL32-DDUNL-22032-15JET	02994327	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,2 *0.440*	DN..1504-DN..1506* *DN..43-DN..44**
GL40-DDUNR-27032-11JET	02994345	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-5,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL40-DDUNL-27032-11JET	02994342	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-5,0	-10,0	0,3 *0.660*	DNMU1104.. *DNMU33.*
GL40-DDUNR-27032-15JET	02994346	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,3 *0.660*	DN..1504-DN..1506* *DN..43-DN..44**
GL40-DDUNL-27032-15JET	02994343	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,3 *0.660*	DN..1504-DN..1506* *DN..43-DN..44**
GL50-DDUNR-32032-15JET	02994358	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**
GL50-DDUNL-32032-15JET	02994357	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,4 *0.880*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant kit	Coolant seal	Insert shim	O-ring	Shim/clamp key	Shim screw	Spring
									
32-11	1/4HEX-T10PX50	L84017-T10P	CX14U00S-2-SET	930RD13	DDN110310	O-RING-5.0X1.2	–	C03007-T09P	S5808
32L-15	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2L-SET	930RD13	DDN150416	O-RING-5.0X1.2	–	C04008-T15P	S5808
32R-15	1/4HEX-T10PX50	L84017-T10P	CN14U10S-2R-SET	930RD13	DDN150416	O-RING-5.0X1.2	–	C04008-T15P	S5808
40-11	1/4HEX-T10PX50	L84017-T10P	CX14U00S-2-SET	930RD13	DDN110310	O-RING-5.0X1.2	–	C03007-T09P	S5808
40-15	–	L85021-T15P	CN17U00S-2-SET	930RD13	DDN150416	O-RING-5.0X1.2	1/4HEX-T15PX50	C04008-T15P	S7111
50-15	–	L85021-T15P	CN17U00S-2-SET	930RD13	DDN150416	O-RING-5.0X1.2	1/4HEX-T15PX50	C04008-T15P	S7111

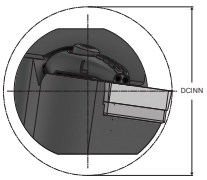
Accessories

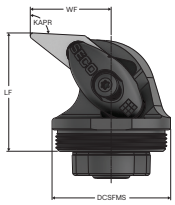
For	Bit holder	Coolant kit R-Roughing	Coolant kit X-Roughing2	Insert clamping torque	Replacement blade	Shim key	Torque key
							
32-11	1/4HEX-S-HANDLE	–	–	2.0NM	T00-10P	–	T00-10P20
32L-15	1/4HEX-S-HANDLE	–	–	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
32R-15	1/4HEX-S-HANDLE	–	–	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
40-11	1/4HEX-S-HANDLE	–	–	2.0NM	T00-10P	–	T00-10P20
40-15	1/4HEX-S-HANDLE	CN17L00R-2-SET	CN17L00X-2-SET	3.5NM	T00-15P	–	T00-15P35
50-15	1/4HEX-S-HANDLE	CN17L00R-2-SET	CN17L00X-2-SET	3.5NM	T00-15P	–	T00-15P35

GL..-DVUBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW – Metric/ Inch

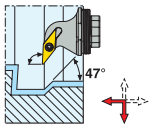


GL..-DVUBR/L





KAPR = 93,0 °



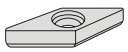
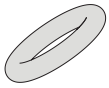
—Right-hand version shown
—For inserts program, see page(s) 583, 584, 613, 621
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DVUBR-22032-16JET	02994507	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL32-DVUBL-22032-16JET	02994506	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL40-DVUBR-27032-16JET	02994515	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL40-DVUBL-27032-16JET	02994514	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL50-DVUBR-32032-16JET	02994522	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,3 *0.660*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL50-DVUBL-32032-16JET	02994521	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-8,0	0,3 *0.660*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

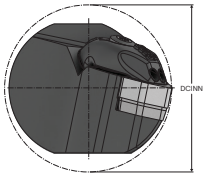
For	Clamp key	Clamp screw	Coolant kit	Coolant seal	Insert shim	O-ring	Shim screw	Spring
								
GL32..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL32..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL40..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL40..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL50..L	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2L-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808
GL50..R	1/4HEX-T10PX50	L84017-T10P	CP14U20S-2R-SET	930RD13	171.19-620	O-RING-5.0X1.2	C94006-T15P	S5808

Accessories

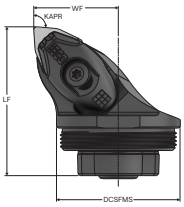
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
GL32..L	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL32..R	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL40..L	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL40..R	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL50..L	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20
GL50..R	1/4HEX-S-HANDLE	2.0NM	T00-09P	1/4HEX-T15PX50	T00-10P20

GL..-DWLNR/L – Toolholders for inserts WNGG, WNMA, WNMG, WNMM – Metric/ Inch

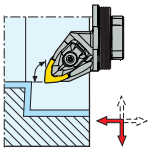




GL..-DWLNR/L



KAPR = 95,0 °



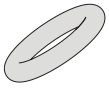
CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For coolant clamps code key, see page(s) 26
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DWLNR-22032-06JET	02994332	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0604.. *WN..33.*
GL32-DWLNL-22032-06JET	02994330	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0604.. *WN..33.*
GL40-DWLNR-27032-06JET	02994349	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0604.. *WN..33.*
GL40-DWLNL-27032-06JET	02994347	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0604.. *WN..33.*
GL50-DWLNR-32032-06JET	02994361	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,3 *0.660*	WN..0604.. *WN..33.*
GL50-DWLNL-32032-06JET	02994359	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,3 *0.660*	WN..0604.. *WN..33.*

Spare Parts, included in delivery

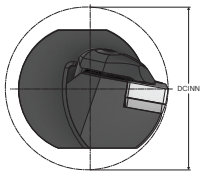
For	Clamp key	Clamp screw	Coolant kit	Coolant seal	Insert shim	O-ring	Shim screw	Spring
								
GL32	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	930RD13	DWN060310	O-RING-5.0X1.2	C03007-T09P	S5808
GL40	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	930RD13	DWN060310	O-RING-5.0X1.2	C03007-T09P	S5808
GL50	1/4HEX-T10PX50	L84017-T10P	CN14L00R-2-SET	930RD13	DWN060310	O-RING-5.0X1.2	C03007-T09P	S5808

Accessories

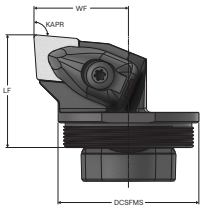
For	Bit holder	Coolant kit S-Standard	Coolant kit X-Roughing2	Insert clamping torque	Replacement blade	Torque key
						
GL32	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	2.0NM	T00-09P	T00-10P20
GL40	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	2.0NM	T00-09P	T00-10P20
GL50	1/4HEX-S-HANDLE	CN14U00S-2-SET	CN14L00X-2-SET	2.0NM	T00-09P	T00-10P20

GL..-DCLNR/L – Toolholders for inserts CNGG, CNMA, CNMG, CNMM – Metric/ Inch

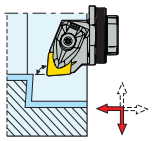




GL..-DCLNR/L



KAPR = 95,0 °



CTWS



– Right-hand version shown
– For inserts program, see page(s) 548, 549, 550, 551, 552, 553
– For damping holders program, see page(s) 626, 627-639
– For holder code key, see page(s) 14-15
– For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DCLNR-22032-12	02809539	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL32-DCLNL-22032-12	02809540	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL40-DCLNR-27032-12	02809477	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL40-DCLNL-27032-12	02809478	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-6,0	-10,0	0,2 *0.440*	CN..1204.. *CN..43.*
GL50-DCLNR-32032-12	02809517	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-8,0	0,3 *0.660*	CN..1204.. *CN..43.*
GL50-DCLNL-32032-12	02809518	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-8,0	0,3 *0.660*	CN..1204.. *CN..43.*
GL50-DCLNR-32037-16	02809519	GL50	50,0 *1.969*	32,0 *1.260*	37 *1.457*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,4 *0.880*	CN..1606.. *CN..54.*
GL50-DCLNL-32037-16	02809520	GL50	50,0 *1.969*	32,0 *1.260*	37 *1.457*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,4 *0.880*	CN..1606.. *CN..54.*
GL50-DCLNR-32040-19	02809521	GL50	50,0 *1.969*	32,0 *1.260*	40 *1.575*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,4 *0.880*	CN..1906.. *CN..64.*
GL50-DCLNL-32040-19	02809522	GL50	50,0 *1.969*	32,0 *1.260*	40 *1.575*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,4 *0.880*	CN..1906.. *CN..64.*

Spare Parts, included in delivery

For	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
							
..-12	FP2012	L85021-T15P	CD12-S	DCO120310	1/4HEX-T15PX50	C04008-T15P	S6912
..-16	FP2012	L86026-T20P	CD16-S	DCN160616	1/4HEX-T20PX50	C05010-T20P	S7010
..-19	FP2012	L86026-T20P	CD19-S	DCN190416	1/4HEX-T20PX50	C05010-T20P	S7010

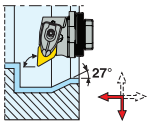
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-12	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35
..-16	1/4HEX-S-HANDLE	CD16-S16	6.0NM	T00T-20P	T00T-20P60
..-19	1/4HEX-S-HANDLE	CD19-S19	6.0NM	T00T-20P	T00T-20P60

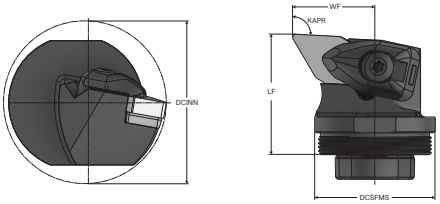
GL..-DDUNR/L – Toolholders for inserts DNGG, DNGM, DNMA, DNMG, DNMM, DNMU, DNMX – Metric/ Inch



KAPR = 93,0 °



GL..-DDUNR/L



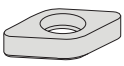
CTWS



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DDUNR-22032-11	02809541	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL32-DDUNL-22032-11	02809542	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL40-DDUNR-27032-11	02809479	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-5,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL40-DDUNL-27032-11	02809480	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-5,0	-10,0	0,2 *0.440*	DNMU1104.. *DNMU33.*
GL32-DDUNR-22032-15	02975022	GL32	32,0 *1.260*	21,88 *0.861*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,2 *0.440*	DN..1504-DN..1506* *DN..43-DN..44**
GL32-DDUNL-22032-15	02975023	GL32	32,0 *1.260*	21,88 *0.861*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-14,0	0,2 *0.440*	DN..1504-DN..1506* *DN..43-DN..44**
GL40-DDUNR-27032-15	02809481	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-6,0	-12,0	0,2 *0.440*	DN..1504-DN..1506* *DN..43-DN..44**
GL40-DDUNL-27032-15	02809482	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	-6,0	-12,0	0,3 *0.660*	DN..1504-DN..1506* *DN..43-DN..44**
GL50-DDUNR-32032-15	02809523	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	-6,0	-12,0	0,3 *0.660*	DN..1504-DN..1506* *DN..43-DN..44**
GL50-DDUNL-32032-15	02809524	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	-6,0	-12,0	0,3 *0.660*	DN..1504-DN..1506* *DN..43-DN..44**

Spare Parts, included in delivery

For	Clamp for DNMU11	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
									
..-11	CD11XP	1/4HEX-T10PX50	FP1508	L84017-T10P	–	DDN110310	–	C03007-T09P	S5608
..-15	–	–	FP2012	L85021-T15P	CD12-S	DDN150416	1/4HEX-T15PX50	C04008-T15P	S6912

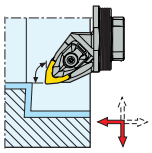
Accessories

For	Bit holder	Clamp for DNMG11	Clamp for DNMU11	Clamp kit	Insert clamping torque	Replacement blade	Torque key
							
..-11	1/4HEX-S-HANDLE	CD09-S09	CD11XP-SET	–	2.0NM	T00-10P	T00-10P20
..-15	1/4HEX-S-HANDLE	–	–	CD12-S12	3.5NM	T00-15P	T00-15P35

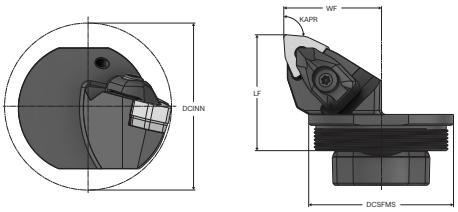
GL..-DWLNR/L – Toolholders for inserts WNGA, WNGG, WNMA, WNMG, WNMM – Metric/ Inch



KAPR = 95,0 °



GL..-DWLNR/L



CTWS



—Right-hand version shown
—For inserts program, see page(s) 587, 588, 589, 590, 615
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—* Use the right shim & the right screw for the selected insert. For details, see page 97
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-DWLNL-22032-06	02809544	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0604.. *WN..33.*
GL32-DWLNR-22035-08	02809545	GL32	32,0 *1.260*	22,0 *0.866*	35 *1.378*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,2 *0.440*	WN..0804-WN..0806* *WN..43-WN..44**
GL32-DWLNL-22035-08	02809546	GL32	32,0 *1.260*	22,0 *0.866*	35 *1.378*	40,0 *1.575*	200,0 bar *2900,8*	95,0	-5,0	-14,0	0,2 *0.440*	WN..0804-WN..0806* *WN..43-WN..44**
GL40-DWLNR-27037-08	02809485	GL40	40,0 *1.575*	27,0 *1.063*	37 *1.457*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,2 *0.440*	WN..0804-WN..0806* *WN..43-WN..44**
GL40-DWLNL-27037-08	02809486	GL40	40,0 *1.575*	27,0 *1.063*	37 *1.457*	50,0 *1.969*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,3 *0.660*	WN..0804-WN..0806* *WN..43-WN..44**
GL50-DWLNR-32038-08	02809527	GL50	50,0 *1.969*	32,0 *1.260*	38 *1.496*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,3 *0.660*	WN..0804-WN..0806* *WN..43-WN..44**
GL50-DWLNL-32038-08	02809528	GL50	50,0 *1.969*	32,0 *1.260*	38 *1.496*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-5,0	-12,0	0,4 *0.880*	WN..0804-WN..0806* *WN..43-WN..44**

Spare Parts, included in delivery

For	Clamp key	Clamp pin	Clamp screw	Floating wedge clamp	Insert shim	Shim/clamp key	Shim screw	Spring
								
..-06	1/4HEX-T10PX50	FP1508	L84017-T10P	CD09-S	DWN060310	–	C03007-T09P	S5608
..-08	–	FP2012	L85021-T15P	CD12-S	DWN080416	1/4HEX-T15PX50	C04008-T15P	S6912

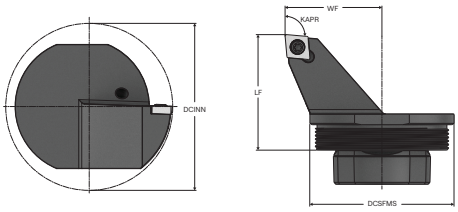
Accessories

For	Bit holder	Clamp kit	Insert clamping torque	Replacement blade	Torque key
					
..-06	1/4HEX-S-HANDLE	CD09-S09	2.0NM	T00-09P	T00-09P20
..-08	1/4HEX-S-HANDLE	CD12-S12	3.5NM	T00-15P	T00-15P35

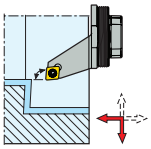
GL..-SCLCR/L – Toolholders for inserts CCGT, CCGW, CCGX, CCMT, CCMW – Metric/ Inch



GL..-SCLCR/L



KAPR = 95,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 544, 545, 546, 592, 593, 616, 618
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SCLCR-17020-09	03211318	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	95,0	0,0	-3,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
GL25-SCLCL-17020-09	03211319	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	95,0	0,0	-3,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*

Spare Parts, included in delivery

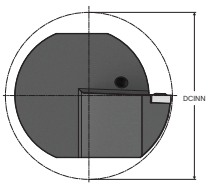
For	Insert key	Insert screw
		
-09	1/4HEX-T15PX50	C04008-T15P

Accessories

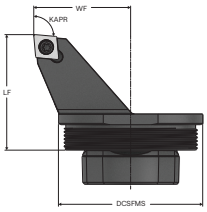
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-09	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

GL..-SCLCR/L – Toolholders for inserts CCGT, CCGW, CCGX, CCMT – Metric/ Inch

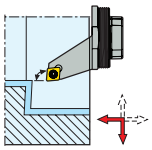




GL..-SCLCR/L



KAPR = 95,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 544, 545, 546, 592, 593, 616
–For damping holders program, see page(s) 626, 627-639
–For holder code key, see page(s) 14-15
–For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SCLCR-22032-09	02809490	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
GL32-SCLCL-22032-09	02809491	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,1 *0.220*	CC..09T3.. *CC..32.5.*
GL32-SCLCR-22032-12	02809492	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-8,0	0,1 *0.220*	CC..1204.. *CC..43.*
GL32-SCLCL-22032-12	02809493	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	95,0	0,0	-8,0	0,1 *0.220*	CC..1204.. *CC..43.*
GL40-SCLCR-27032-09	02809503	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL40-SCLCL-27032-09	02809504	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,2 *0.440*	CC..09T3.. *CC..32.5.*
GL40-SCLCR-27032-12	02809505	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-8,0	0,2 *0.440*	CC..1204.. *CC..43.*
GL40-SCLCL-27032-12	02809506	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	95,0	0,0	-8,0	0,2 *0.440*	CC..1204.. *CC..43.*
GL50-SCLCR-32032-09	02809531	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
GL50-SCLCL-32032-09	02809532	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-2,0	0,3 *0.660*	CC..09T3.. *CC..32.5.*
GL50-SCLCR-32032-12	02809533	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-5,0	0,3 *0.660*	CC..1204.. *CC..43.*
GL50-SCLCL-32032-12	02809534	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	0,0	-5,0	0,3 *0.660*	CC..1204.. *CC..43.*

Spare Parts, included in delivery

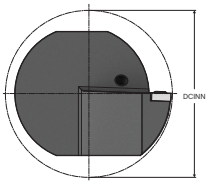
For	Insert key	Insert screw	Insert shim	Shim screw
				
..-09	1/4HEX-T15PX50	C04008-T15P	–	–
..-12	1/4HEX-T15PX50	C05012-T15P	123.19-621	CA5008

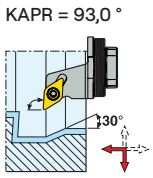
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-09	1/4HEX-S-HANDLE	3.5NM	T00-15P	–	T00-15P35
..-12	–	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50
..-12	1/4HEX-S-HANDLE	5.0NM	T00-15P	1/4HEX-H5.0X50	T00-15P50

GL..-SDUCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch







—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SDUCR-17020-07	03211320	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..0702.. *DC..21.5.*
GL25-SDUCL-17020-07	03211321	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..0702.. *DC..21.5.*
GL25-SDUCR-17020-11	03211322	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
GL25-SDUCL-17020-11	03211323	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*

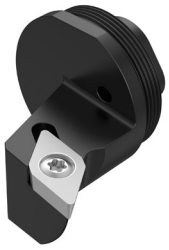
Spare Parts, included in delivery

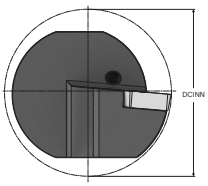
For	Insert key	Insert screw
		
-07	1/4HEX-T07PX50	C02506-T07P
-11	1/4HEX-T15PX50	C04008-T15P

Accessories

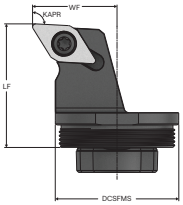
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-07	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09
-11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

GL..-SDUCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMX – Metric/ Inch

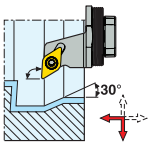




GL..-SDUCR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SDUCR-22032-11	02809494	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
GL32-SDUCL-22032-11	02809495	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
GL40-SDUCR-27032-11	02809507	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-SDUCL-27032-11	02809508	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL50-SDUCR-32032-11	02809535	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
GL50-SDUCL-32032-11	02809536	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-11	1/4HEX-T15PX50	C04008-T15P

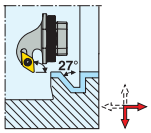
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

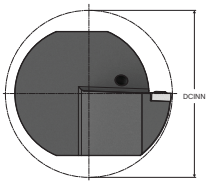
GL..-SDUCR/L-..X – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

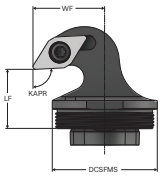


KAPR = 93,0 °



GL..-SDUCR/L-..X





CTWS



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SDUCR-17012-11X	03211326	GL25	25,0 *0.984*	17,0 *0.669*	12 *0.472*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
GL25-SDUCL-17012-11X	03211327	GL25	25,0 *0.984*	17,0 *0.669*	12 *0.472*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

For	Insert key	Insert screw
		
-11X	1/4HEX-T15PX50	C04008-T15P

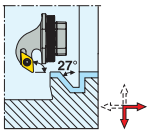
Accessories

For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11X	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

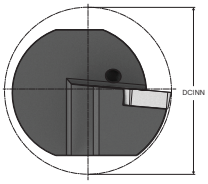
GL..-SDUCR/L-..X – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

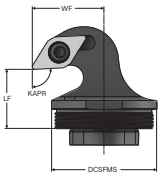


KAPR = 93,0 °



GL..-SDUCR/L-..X





CTWS



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SDUCR-22018-11X	02975005	GL32	32,0 *1.260*	21,88 *0.861*	18 *0.709*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL32-SDUCL-22018-11X	02975006	GL32	32,0 *1.260*	21,88 *0.861*	18 *0.709*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-SDUCR-27017-11X	02975007	GL40	40,0 *1.575*	26,88 *1.058*	17 *0.669*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-SDUCL-27017-11X	02975008	GL40	40,0 *1.575*	26,88 *1.058*	17 *0.669*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL50-SDUCR-32017-11X	02975009	GL50	50,0 *1.969*	32,0 *1.260*	17 *0.669*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
GL50-SDUCL-32017-11X	02975010	GL50	50,0 *1.969*	32,0 *1.260*	17 *0.669*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

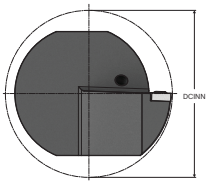
For	Insert key	Insert screw
		
..-11	1/4HEX-T15PX50	C04008-T15P

Accessories

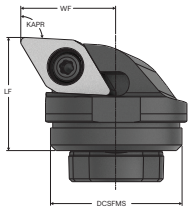
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

GL..-SDUNR/L – Toolholders for inserts DNMA, DNMU, DNMX – Metric/ Inch

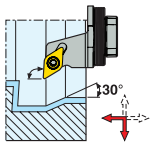




GL..-SDUNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 558, 559, 560, 561, 599
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SDUNR-17020-11	03211316	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	-5,0	-13,0	0,1 *0.220*	DNMU1104.. *DNMU33.*
GL25-SDUNL-17020-11	03211317	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	-5,0	-13,0	0,1 *0.220*	DNMU1104.. *DNMU33.*

Spare Parts, included in delivery

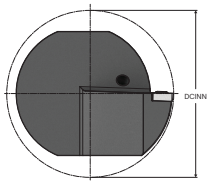
For	Insert key	Insert screw
		
-11	1/4HEX-T09PX50	C03511-T09P

Accessories

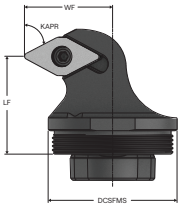
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11	1/4HEX-S-HANDLE	2.0NM	T00-09P	T00-09P20

GL..-SDXCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

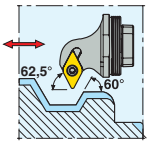




GL..-SDXCR/L



KAPR = 62,5 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SDXCR-17018-11	03211324	GL25	25,0 *0.984*	17,0 *0.669*	18 *0.709*	32,0 *1.260*	200,0 bar *2900,8*	62,5	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*
GL25-SDXCL-17018-11	03211325	GL25	25,0 *0.984*	17,0 *0.669*	18 *0.709*	32,0 *1.260*	200,0 bar *2900,8*	62,5	0,0	-6,0	0,1 *0.220*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

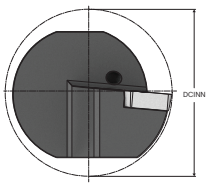
For	Insert key	Insert screw
		
-11	1/4HEX-T15PX50	C04008-T15P

Accessories

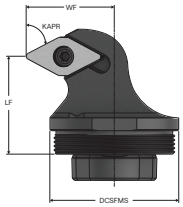
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

GL..-SDXCR/L – Toolholders for inserts DCGT, DCGW, DCMT, DCMW, DCMX – Metric/ Inch

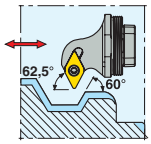




GL..-SDXCR/L



KAPR = 62,5 °



—Right-hand version shown
—For inserts program, see page(s) 555, 556, 557, 597, 619
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SDXCR-22025-11	02975013	GL32	32,0 *1.260*	21,88 *0.861*	25 *0.984*	40,0 *1.575*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL32-SDXCL-22025-11	02975014	GL32	32,0 *1.260*	21,88 *0.861*	25 *0.984*	40,0 *1.575*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-SDXCR-27025-11	02975015	GL40	40,0 *1.575*	26,88 *1.058*	25 *0.984*	50,0 *1.969*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL40-SDXCL-27025-11	02975016	GL40	40,0 *1.575*	26,88 *1.058*	25 *0.984*	50,0 *1.969*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,2 *0.440*	DC..11T3.. *DC..32.5.*
GL50-SDXCR-32025-11	02975017	GL50	50,0 *1.969*	31,88 *1.255*	25 *0.984*	63,0 *2.480*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*
GL50-SDXCL-32025-11	02975018	GL50	50,0 *1.969*	31,88 *1.255*	25 *0.984*	63,0 *2.480*	200,0 bar *2900,8*	62,5	0,0	-5,0	0,3 *0.660*	DC..11T3.. *DC..32.5.*

Spare Parts, included in delivery

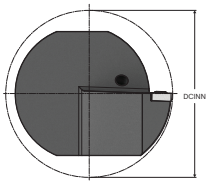
For	Insert key	Insert screw
		
..-11	1/4HEX-T15PX50	C04008-T15P

Accessories

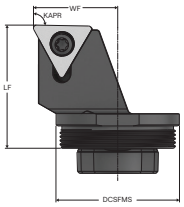
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-11	1/4HEX-S-HANDLE	3.5NM	T00-15P	T00-15P35

GL..-STFCR/L – Toolholders for inserts TCGT, TCGW, TCMT, TCMW – Metric/ Inch

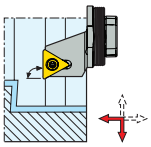




GL..-STFCR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 608, 620
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-STFCR-17020-11	03211328	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	91,0	0,0	-3,0	0,1 *0.220*	TC..1102.. *TC..21.5.*
GL25-STFCL-17020-11	03211329	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	91,0	0,0	-3,0	0,1 *0.220*	TC..1102.. *TC..21.5.*

Spare Parts, included in delivery

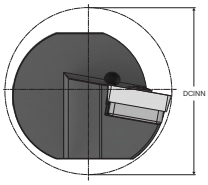
For	Insert key	Insert screw
		
-11	1/4HEX-T07PX50	C02506-T07P

Accessories

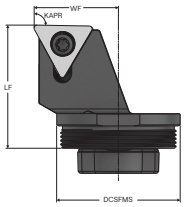
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

GL..-STFCR/L – Toolholders for inserts TCGT, TCGX, TCMT, TCMW, TCMX – Metric/ Inch

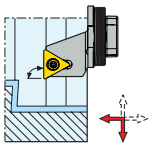




GL..-STFCR/L



KAPR = 91,0 °



—Right-hand version shown
—For inserts program, see page(s) 573, 574, 611, 620
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-STFCR-22032-16	02809496	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	91,0	0,0	-10,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
GL32-STFCL-22032-16	02809497	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	91,0	0,0	-10,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
GL40-STFCR-27032-16	02809509	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	91,0	0,0	-8,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
GL40-STFCL-27032-16	02809510	GL40	40,0 *1.575*	27,0 *1.063*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	91,0	0,0	-8,0	0,2 *0.440*	TC..16T3.. *TC..32.5.*
GL50-STFCR-32032-16	02809537	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	91,0	0,0	-8,0	0,3 *0.660*	TC..16T3.. *TC..32.5.*
GL50-STFCL-32032-16	02809538	GL50	50,0 *1.969*	32,0 *1.260*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	91,0	0,0	-8,0	0,3 *0.660*	TC..16T3.. *TC..32.5.*

Spare Parts, included in delivery

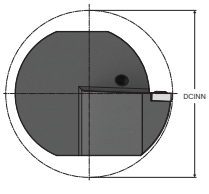
For	Insert key	Insert screw	Insert shim	Shim screw
				
..-16	1/4HEX-T15PX50	C03509-T15P	STN160312	CA3510

Accessories

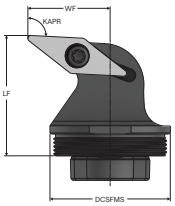
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

GL..-SVUBR/L – Toolholders for inserts VBGT, VBMT – Metric/ Inch

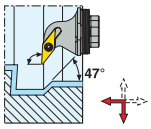




GL..-SVUBR/L



KAPR = 93,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 583, 584
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL25-SVUBR-17020-11	03211330	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-4,0	0,1 *0.220*	VB..1102.. *VB..21.5.*
GL25-SVUBL-17020-11	03211331	GL25	25,0 *0.984*	17,0 *0.669*	20 *0.787*	32,0 *1.260*	200,0 bar *2900,8*	93,0	0,0	-4,0	0,1 *0.220*	VB..1102.. *VB..21.5.*

Spare Parts, included in delivery

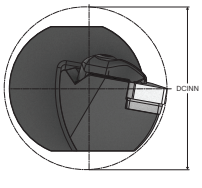
For	Insert key	Insert screw
		
-11	1/4HEX-T07PX50	C02506-T07P

Accessories

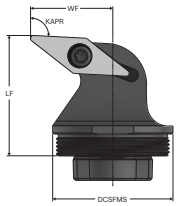
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
-11	1/4HEX-S-HANDLE	0.9NM	T00-07P	T00-07P09

GL..-SVUBR/L – Toolholders for inserts VBGT, VBGW, VBMT, VBMW – Metric/ Inch

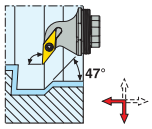




GL..-SVUBR/L



KAPR = 93,0 °



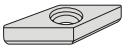
CTWS



–Right-hand version shown
–For inserts program, see page(s) 583, 584, 613, 621
–For damping holders program, see page(s) 626, 627-639
–For holder code key, see page(s) 14-15
–For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SVUBR-22032-16	02974997	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL32-SVUBL-22032-16	02974998	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL40-SVUBR-27032-16	02974999	GL40	40,0 *1.575*	26,88 *1.058*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL40-SVUBL-27032-16	02975000	GL40	40,0 *1.575*	26,88 *1.058*	32 *1.260*	50,0 *1.969*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,2 *0.440*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL50-SVUBR-32032-16	02975001	GL50	50,0 *1.969*	31,88 *1.255*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,3 *0.660*	VB..1604-VC..1604 *VB..33.-VC..33.*
GL50-SVUBL-32032-16	02975002	GL50	50,0 *1.969*	31,88 *1.255*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	93,0	0,0	-3,0	0,3 *0.660*	VB..1604-VC..1604 *VB..33.-VC..33.*

Spare Parts, included in delivery

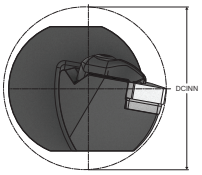
For	Insert key	Insert screw	Insert shim	Shim screw
				
..-16	1/4HEX-T15PX50	C03510-T15P	171.19-620	CA3507

Accessories

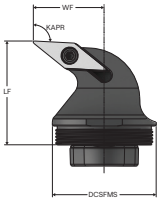
For	Bit holder	Insert clamping torque	Replacement blade	Shim key	Torque key
					
..-16	1/4HEX-S-HANDLE	3.0NM	T00-15P	1/4HEX-H9/64X50	T00-15P30

GL..-SVUNR/L – Toolholders for inserts VNMU – Metric/ Inch

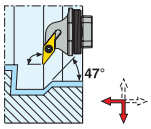




GL..-SVUNR/L



KAPR = 93,0 °



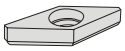
CTWS



—Right-hand version shown
—For inserts program, see page(s) 585, 586
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-SVUNR-22032-13	02974995	GL32	32,0 *1.260*	21,88 *0.861*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-5,0	-12,0	0,2 *0.440*	VNMU1304.. *VNMU2.5.*
GL32-SVUNL-22032-13	02974996	GL32	32,0 *1.260*	21,88 *0.861*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-5,0	-12,0	0,2 *0.440*	VNMU1304.. *VNMU2.5.*

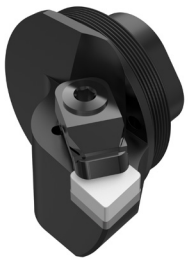
Spare Parts, included in delivery

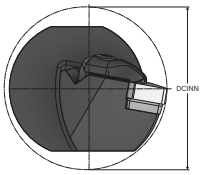
For	Insert key	Insert screw	Insert shim	Shim screw
				
..-13	1/4HEX-T09PX50	C03511-T09P	PVN130308	CA3507

Accessories

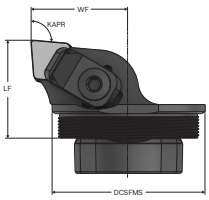
For	Bit holder	Insert clamping torque	Replacement blade	Torque key
				
..-13	1/4HEX-S-HANDLE	2.0NM	T00-09P	T00-09P20

GL..-CCLNR/L – Toolholders for PCBN inserts CNMN – Metric/ Inch

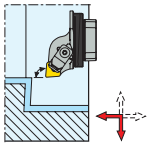




GL..-CCLNR/L



KAPR = 95,0 °



—Right-hand version shown
—For inserts program, see page(s) 596
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL50-CCLNR-32032-12	02975024	GL50	50,0 *1.969*	31,88 *1.255*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*
GL50-CCLNL-32032-12	02975025	GL50	50,0 *1.969*	31,88 *1.255*	32 *1.260*	63,0 *2.480*	200,0 bar *2900,8*	95,0	-6,0	-6,0	0,4 *0.880*	CN..1204.. *CN..43.*

Spare Parts, included in delivery

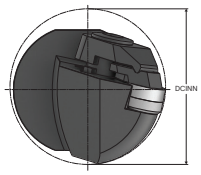
For	Clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
..-12	CC17P	1/4HEX-H4.0X50	CCN120312	P1311	F94009-T09P

Accessories

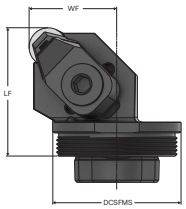
For	Bit holder	Shim key
		
..-12	1/4HEX-S-HANDLE	1/4HEX-T09PX50

GL..-CRSNR/L – Toolholders for PCBN inserts RNGN-LF, RNGN, RNMN – Metric/ Inch

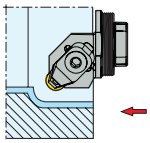




GL..-CRSNR/L



KAPR = 45,0 °



—Right-hand version shown
—For inserts program, see page(s) 601, 602, 620, 623
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-CRSNR-22032-09	02809500	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	45,0	-6,0	-12,0	0,2 *0.440*	RN.N0903.. *RN.N32.*

Spare Parts, included in delivery

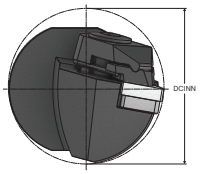
For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
..-09	CC17P-09	1/4HEX-H4.0X50	117.10-620	P1311-09	174.10-652-T07P

Accessories

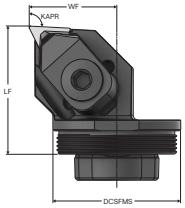
For	Bit holder	Shim key
		
..-09	1/4HEX-S-HANDLE	1/4HEX-T07PX50

GL..-CTUNR/L – Toolholders for PCBN inserts TNGN-LF, TNGN, TNGX, TNMN, TNMX – Metric/ Inch

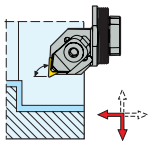




GL..-CTUNR/L



KAPR = 93,0 °



—Right-hand version shown
—For inserts program, see page(s) 575, 576, 577, 578, 610
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 14-15
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	DCINN	CP	KAPR°	GAMO°	LAMS°	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*				kg *lbs*	
GL32-CTUNR-22032-11	02809498	GL32	32,0 *1.260*	22,0 *0.866*	32 *1.260*	40,0 *1.575*	200,0 bar *2900,8*	93,0	-6,0	-10,0	0,1 *0.220*	TN..1103.. *TN..22.*

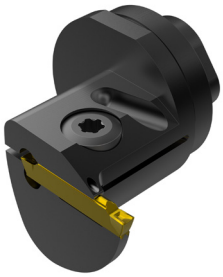
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Insert shim	Pressure plate	Shim screw
					
..-11	CC17P-06	1/4HEX-H4.0X50	CTN110308	P1311-06	CS2507-T07P

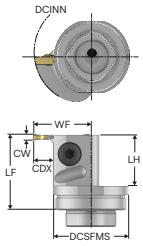
Accessories

For	Bit holder	Shim key
		
..-11	1/4HEX-S-HANDLE	1/4HEX-T07PX50

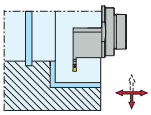
GL.-CGIR/L-..JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



GL.-CGIR/L-..JET



KAPR = 0,0 °



CTWS



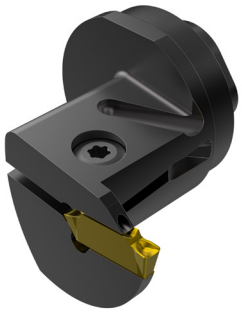
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 696
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	LH	CDX	DCINN	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
GL25-CGIR-19025-1902JET	03212509	GL25	25,0 *0.984*	19,0 *0.748*	25 *0.984*	23,0 *0.906*	6,0 *0.236*	32,0 *1.260*	200,0 bar *2900,8*	0,1 *0.220*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL25-CGIL-19025-1902JET	03212510	GL25	25,0 *0.984*	19,0 *0.748*	25 *0.984*	23,0 *0.906*	6,0 *0.236*	32,0 *1.260*	200,0 bar *2900,8*	0,1 *0.220*	2,0 *0.079*	5,0 *44.3*	LC..1902..

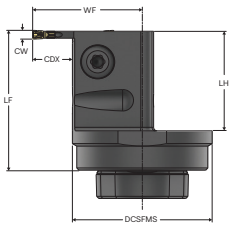
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
...-1902	T15P-7	L85011-T15P

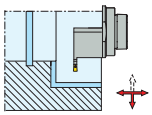
GL.-CGJR/L-..JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



GL.-CGJR/L-..JET



KAPR = 0,0 °



CTWS



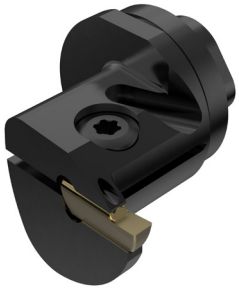
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 696
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

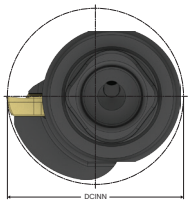
Designation	Item number	CTMS	DCSFMS	WF	LF	LH	CDX	DCINN	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
GL32-CGJR-25032-1902JET	02947169	GL32	32,0 *1.260*	25,0 *0.984*	32 *1.260*	23,0 *0.906*	7,0 *0.276*	43,0 *1.693*	200,0 bar *2900,8*	0,2 *0.440*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL32-CGJL-25032-1902JET	02947170	GL32	32,0 *1.260*	25,0 *0.984*	32 *1.260*	23,0 *0.906*	7,0 *0.276*	43,0 *1.693*	200,0 bar *2900,8*	0,2 *0.440*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL40-CGJR-29032-1902JET	02947171	GL40	40,0 *1.575*	29,0 *1.142*	32 *1.260*	22,0 *0.866*	7,0 *0.276*	51,0 *2.008*	200,0 bar *2900,8*	0,2 *0.440*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL40-CGJL-29032-1902JET	02947172	GL40	40,0 *1.575*	29,0 *1.142*	32 *1.260*	22,0 *0.866*	7,0 *0.276*	51,0 *2.008*	200,0 bar *2900,8*	0,2 *0.440*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL50-CGJR-34032-1902JET	02947173	GL50	50,0 *1.969*	34,0 *1.339*	32 *1.260*	21,5 *0.846*	7,0 *0.276*	61,0 *2.402*	200,0 bar *2900,8*	0,3 *0.660*	2,0 *0.079*	5,0 *44.3*	LC..1902..
GL50-CGJL-34032-1902JET	02947174	GL50	50,0 *1.969*	34,0 *1.339*	32 *1.260*	21,5 *0.846*	7,0 *0.276*	61,0 *2.402*	200,0 bar *2900,8*	0,3 *0.660*	2,0 *0.079*	5,0 *44.3*	LC..1902..

Spare Parts, included in delivery

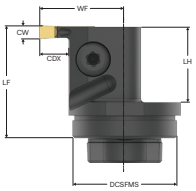
For	Clamp key	Clamp screw	Screw
			
...-1902	T15P-2	L85011-T15P	P6SS3X5

GL.-CGGR/L-..JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch

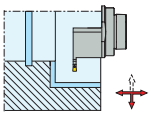




GL.-CGGR/L-..JET



KAPR = 0,0 °



CTWS



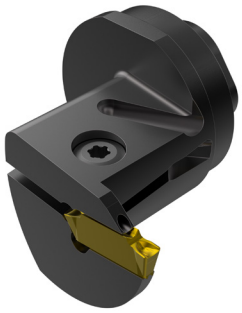
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 696
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	LH	CDX	DCINN	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
GL25-CGGR-19025-1303JET	03212511	GL25	25,0 *0.984*	19,0 *0.748*	25 *0.984*	17,0 *0.669*	6,5 *0.256*	32,0 *1.260*	200,0 bar *2900,8*	0,1 *0.220*	3,0 *0.118*	5,0 *44.3*	LC..1303..
GL25-CGGL-19025-1303JET	03212512	GL25	25,0 *0.984*	19,0 *0.748*	25 *0.984*	17,0 *0.669*	6,5 *0.256*	32,0 *1.260*	200,0 bar *2900,8*	0,1 *0.220*	3,0 *0.118*	5,0 *44.3*	LC..1303..

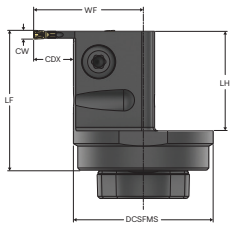
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
...-1303	T15P-2	L85011-T15P

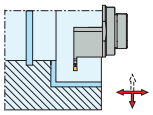
GL.-CG.R/L-..JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



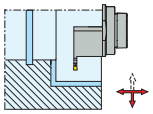
GL.-CGIR/L-..JET



GL.-CGIR/L-..JET
KAPR = 0,0 °



GL.-CGHR/L-..JET
KAPR = 0,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For damping holders program, see page(s) 626, 627-639
—For holder code key, see page(s) 696
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	LH	CDX	DCINN	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
GL32-CGIR-26032-1603JET	02947175	GL32	32,0 *1.260*	26,5 *1.043*	32 *1.260*	23,0 *0.906*	9,0 *0.354*	44,0 *1.732*	200,0 bar *2900,8*	0,2 *0.440*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL32-CGIL-26032-1603JET	02947176	GL32	32,0 *1.260*	26,5 *1.043*	32 *1.260*	23,0 *0.906*	9,0 *0.354*	44,0 *1.732*	200,0 bar *2900,8*	0,2 *0.440*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL40-CGIR-30032-1603JET	02947177	GL40	40,0 *1.575*	30,5 *1.201*	32 *1.260*	22,5 *0.886*	9,0 *0.354*	52,0 *2.047*	200,0 bar *2900,8*	0,2 *0.440*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL40-CGIL-30032-1603JET	02947178	GL40	40,0 *1.575*	30,5 *1.201*	32 *1.260*	22,5 *0.886*	9,0 *0.354*	52,0 *2.047*	200,0 bar *2900,8*	0,2 *0.440*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL50-CGIR-35032-1603JET	02947179	GL50	50,0 *1.969*	35,5 *1.398*	32 *1.260*	21,5 *0.846*	9,0 *0.354*	62,0 *2.441*	200,0 bar *2900,8*	0,3 *0.660*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL50-CGIL-35032-1603JET	02947180	GL50	50,0 *1.969*	35,5 *1.398*	32 *1.260*	21,5 *0.846*	9,0 *0.354*	62,0 *2.441*	200,0 bar *2900,8*	0,3 *0.660*	3,0 *0.118*	5,0 *44.3*	LC..1603..
GL32-CGHR-27032-1604JET	02947181	GL32	32,0 *1.260*	27,5 *1.083*	32 *1.260*	23,0 *0.906*	10,0 *0.394*	45,0 *1.772*	200,0 bar *2900,8*	0,2 *0.440*	4,0 *0.157*	5,0 *44.3*	LC..1604..
GL32-CGHL-27032-1604JET	02947182	GL32	32,0 *1.260*	27,5 *1.083*	32 *1.260*	23,0 *0.906*	10,0 *0.394*	45,0 *1.772*	200,0 bar *2900,8*	0,2 *0.440*	4,0 *0.157*	5,0 *44.3*	LC..1604..
GL40-CGHR-31032-1604JET	02947183	GL40	40,0 *1.575*	31,5 *1.240*	32 *1.260*	22,5 *0.886*	10,0 *0.394*	53,0 *2.087*	200,0 bar *2900,8*	0,2 *0.440*	4,0 *0.157*	5,0 *44.3*	LC..1604..
GL40-CGHL-31032-1604JET	02947184	GL40	40,0 *1.575*	31,5 *1.240*	32 *1.260*	22,5 *0.886*	10,0 *0.394*	53,0 *2.087*	200,0 bar *2900,8*	0,2 *0.440*	4,0 *0.157*	5,0 *44.3*	LC..1604..
GL50-CGHR-36032-1604JET	02947185	GL50	50,0 *1.969*	36,5 *1.437*	32 *1.260*	21,5 *0.846*	10,0 *0.394*	63,0 *2.480*	200,0 bar *2900,8*	0,3 *0.660*	4,0 *0.157*	5,0 *44.3*	LC..1604..
GL50-CGHL-36032-1604JET	02947186	GL50	50,0 *1.969*	36,5 *1.437*	32 *1.260*	21,5 *0.846*	10,0 *0.394*	63,0 *2.480*	200,0 bar *2900,8*	0,3 *0.660*	4,0 *0.157*	5,0 *44.3*	LC..1604..

Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
...-1603	T15P-2	L85011-T15P
...-1604	T15P-2	L85011-T15P



MDT - Multi Directional Turning

The Seco MDT (Multi-Directional Turning) is universally suitable for a variety of applications including grooving, profiling, turning, parting-off, and threading. The unique Secoloc™ clamping delivers the best stability and safety in addition to high productivity and performance. Applications include turning parts with many different diameters, complicated profiles and grooves, replacing the need for several standard and special tools with a single Seco MDT.

– Unique insert clamping method for superb stability.
– MDT is available also in combination with Jetstream Tooling®, a high-pressure coolant system.

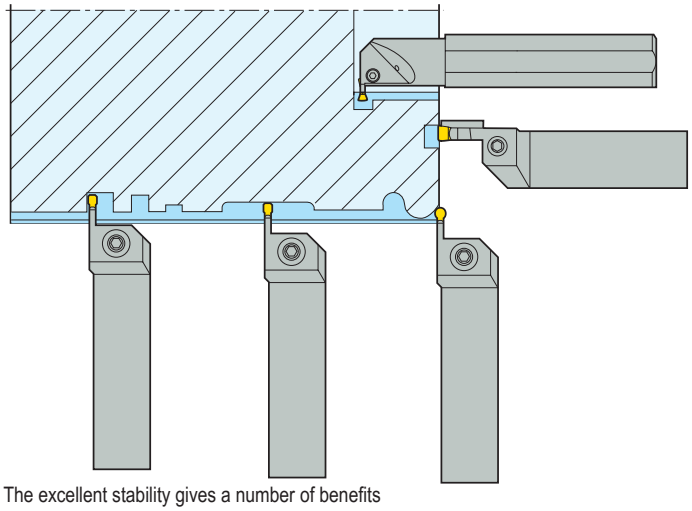
General information

The Seco MDT (Multi Directional Turning) system consists of holders and inserts for external radial, external axial and internal machining.

The system can be used for:

– Turning
– Profiling
– Grooving
– Parting-off
– Threading

Suitable applications are turning of parts with many different diameters, complicated profiles and grooves. For complex parts of this type several standard and special tools can be replaced by one Seco MDT tool. Savings can be achieved through fewer tool changes and reduced tool stock.



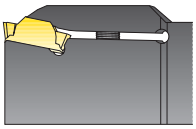
Seco MDT has a unique insert clamping method – Secoloc™.

A combination of V-shaped top clamp and serrated contact surfaces between the underside of the insert and the toolholder offers superb stability.

The relatively long insert also increases the stability.

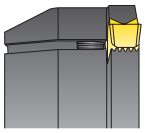
The excellent stability gives a number of benefits

– Improved process safety
– Increased metal removal capacity/productivity
– Improved surface finish
– Reduced vibration risk
– Good repeatability (±0,03 mm)







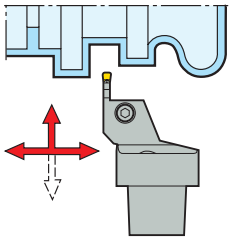


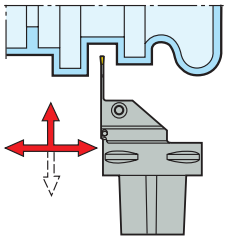
Seco Jetstream Tooling®

Seco Jetstream Tooling® holders feature a rake face coolant jet, that may provide even better chip control and significantly longer tool life. For more information on Jetstream Tooling® and accessories, please see page(s) 85-[XXX] and 1029.



External holders, Seco-Capto™ – Metric/ Inch

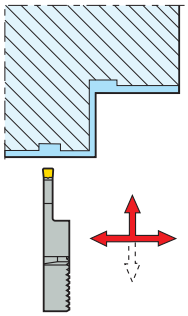


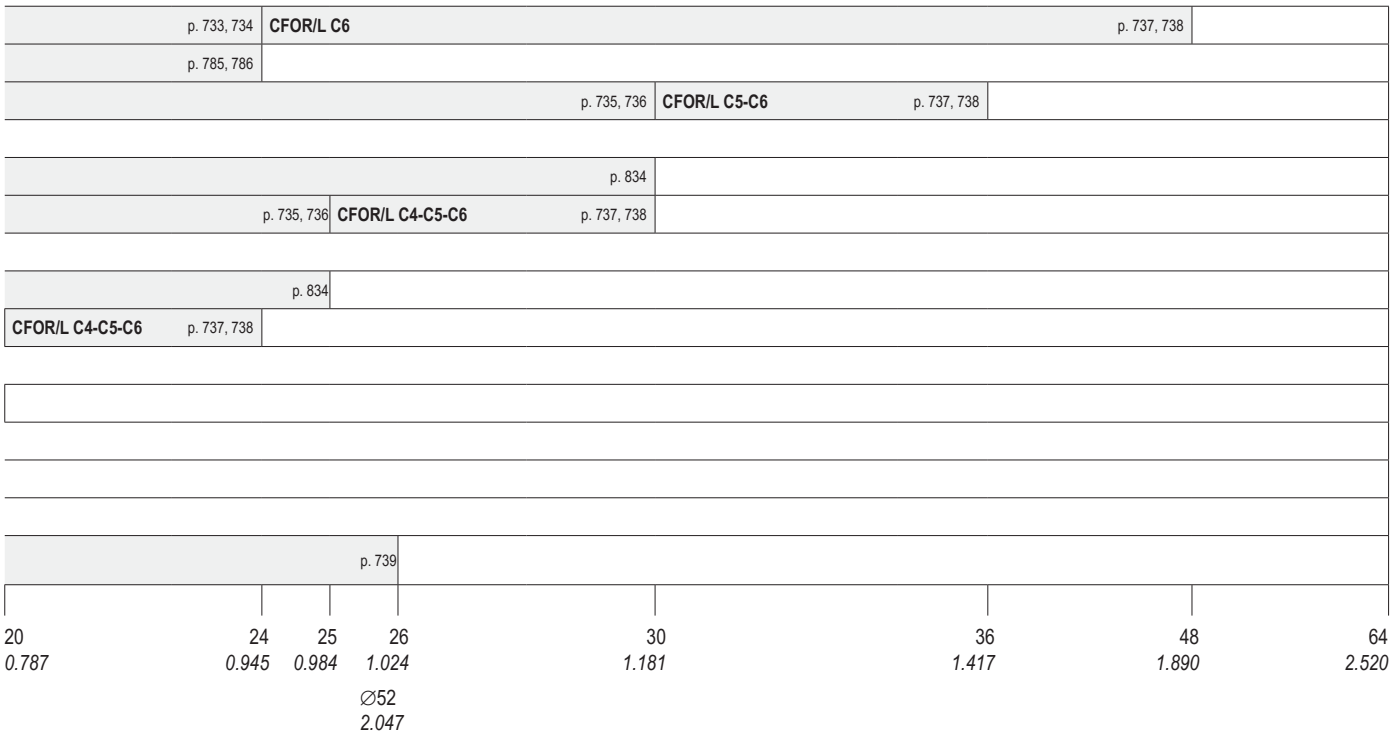


CW

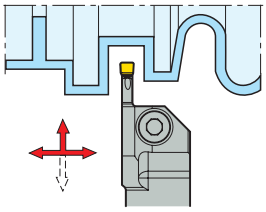
8 *0.315*	JETI	CFIR/L C6									
	non JET	CFIR/L C6									
6 *0.236*	JETI	CFIR/L C5-C6						p. 733, 734	CFMR/L C5-C6		
	non JET	CFIR/L C5-C6						p. 785, 786			
	modular	V21-CIR/L C4-C5-C6						p. 834	V21-CMR/L C4-C5-C6		
5 *0.197*	JETI	CFIR/L C4-C5-C6				p. 733, 734	CFMR/L C5-C6				
	non JET	CFIR/L C4-C5-C6				p. 785, 786					
	modular	V21-CIR/L C4-C5-C6				p. 834	V21-CMR/L C4-C5-C6				
4 *0.157*	JETI	CFIR/L C4-C5-C6	p. 733, 734	CFMR/L C4-C5-C6					p. 735, 736		
	non JET	CFIR/L C4-C5-C6	p. 785, 786								
	modular	V21-CIR/L C4-C5-C6	p. 834	V21-CMR/L C4-C5-C6					p. 834		
3 *0.118*	JETI	CFIR/L C4-C5-C6	p. 733, 734	CFMR/L C4-C5-C6	p. 735, 736	CFOR/L C4-C5-C6	p. 737, 738				
	non JET	CFIR/L C4-C5-C6	p. 785, 786								
	modular	V21-CIR/L C4-C5-C6	p. 834	V21-CMR/L C4-C5-C6	p. 834						
2 *0.079*	JETI	CFZR/L C4-C5-C6 *									
		CDX = 9 *0.354*		12 *0.472*		15 *0.591*		18 *0.709*		20 *0.787*	

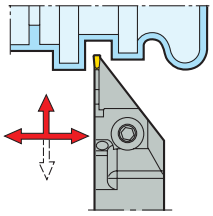
* Due to the design, grooving depth is limited to given ∅




p. 733, 734
CFOR/L C6
p. 737, 738
p. 785, 786
p. 735, 736
CFOR/L C5-C6
p. 737, 738
p. 834
p. 735, 736
CFOR/L C4-C5-C6
p. 737, 738
p. 834
CFOR/L C4-C5-C6
p. 737, 738
p. 739
20
0.787
24
0.945
25
0.984
26
1.024
∅52
2.047
30
1.181
36
1.417
48
1.890
64
2.520

External holders – Metric

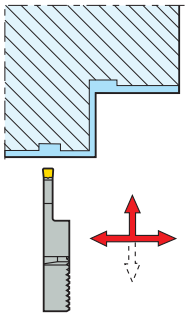


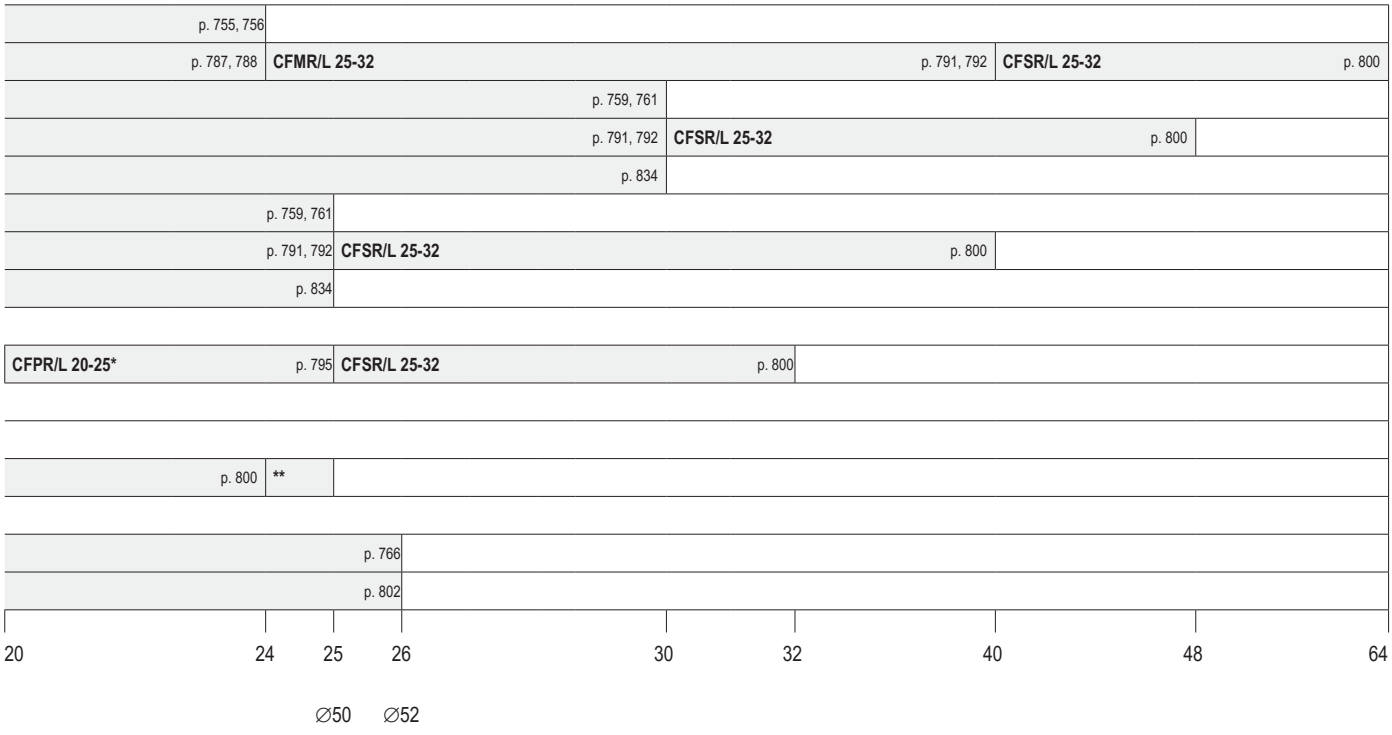


CW

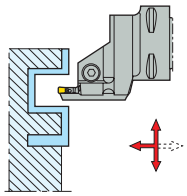
8	JET	CFIR/L 25-32													
	non JET	CFIR/L 25-32													
6	JET	CFIR/L 20-25-32										p. 755, 756	CFMR/L 25-32		
	non JET	CFIR/L 20-25-32										p. 787, 788	CFMR/L 20-25-32		
	modular	V21-CIR/L 20-25-32										p. 834	V21-CMR/L 20-25-32		
5	JET	CFIR/L 20-25-32							p. 755, 756	CFMR/L 25-32					
	non JET	CFIR/L 20-25-32							p. 787, 788	CFMR/L 20-25-32					
	modular	V21-CIR/L 20-25-32							p. 834	V21-CMR/L 20-25-32					
4	JET	CFIR/L 20-25-32			p. 755, 756	CFMR/L 20-25-32							p. 759, 761		
	non JET	CFIR/L 12-16-20-25-32			p. 787, 788	CFMR/L 20-25-32							p. 791, 792		
	modular	V21-CIR/L 20-25-32			p. 834	V21-CMR/L 20-25-32							p. 834		
3	JET	CFIR/L 20-25-32	p. 755, 756	CFMR/L 20-25-32				p. 759, 761							
	non JET	CFIR/L 12-16-20-25-32	p. 787, 788	CFMR/L 20-25-32				p. 791, 792	CFOR/L 12*	p. 795	CFSR/L 25-32				
	modular	V21-CIR/L 20-25-32	p. 834	V21-CMR/L 20-25-32				p. 834							
2	JET	CFOR/L 12-16*				p. 762	CFSR/L 20*	p. 764	CFZR/L 20-25*						
	non JET	CFOR/L 12-16*				p. 798	CFSR/L 12-16*	p. 798	CFZR/L 16*						
		CDX = 9		12			15		18		20				
							Ø25,4		Ø33		Ø37				

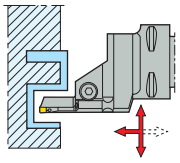
* Due to the design, grooving depth is limited to given ∅
** CFTR/L 16-20-25 ∅50/*1.969* – see p. 795



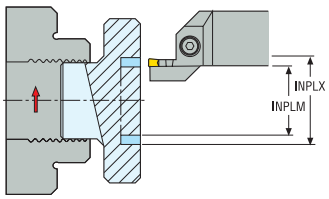

p. 755, 756
p. 787, 788
CFMR/L 25-32
p. 791, 792
CFSR/L 25-32
p. 800
p. 759, 761
p. 791, 792
CFSR/L 25-32
p. 800
p. 834
p. 759, 761
p. 791, 792
CFSR/L 25-32
p. 800
p. 834
CFPR/L 20-25*
p. 795
CFSR/L 25-32
p. 800
p. 800
**
p. 766
p. 802
20
24
25
26
30
32
40
48
64
∅50
∅52

Axial holders, Seco Capto™ – Metric/ Inch





∅ of initial plunge INPLM-INPLX	CW	All Seco-Capto™ axial holders are JET				
200-500 *7.874-19.686*	**8** *0.315*	**CFIR/L C6**				
	6 *0.240*	**CFOR/L C5-C6**				
	5 *0.200*	**CFOR/L C4-C5-C6**				
	4 *0.160*	**CFOR/L C4-C5-C6**				
	3 *0.120*	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754			
140-230 *5.512-9.055*	**8** *0.315*	**CFIR/L C6**				
	6 *0.240*	**CFIR/L C5-C6**	p. 741, 742, 743, 744			
	5 *0.200*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	4 *0.160*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	3 *0.120*	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754			
110-170 *4.331-6.693*	**8** *0.315*	**CFIR/L C6**				
	6 *0.240*	**CFIR/L C5-C6**	p. 741, 742, 743, 744			
	5 *0.200*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	4 *0.160*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	3 *0.120*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
90-130 *3.543-5.118*	**8** *0.315*	**CFIR/L C6**				
	6 *0.240*	**CFIR/L C5-C6**	p. 741, 742, 743, 744			
	5 *0.200*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	4 *0.160*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	3 *0.120*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
70-100 *2.756-3.937*	**6** *0.240*	**CFIR/L C5-C6**	p. 741, 742, 743, 744			
	5 *0.200*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	4 *0.160*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	3 *0.120*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
55-80 *2.165-3.150*	**6** *0.240*	**CFIR/L C5-C6**	p. 741, 742, 743, 744			
	5 *0.200*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	4 *0.160*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**		
	3 *0.120*	**CFIR/L C4-C5-C6**	p. 741, 742, 743, 744	**CFOR/L C4-C5-C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
		CDX = 9 *0.354*	12 *0.470*	15 *0.590*	18 *0.700*	



p. 741, 742, 743, 744	**CFOR/L C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

p. 741, 742, 743, 744	**CFOR/L C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754
CFOR/L C5-C6	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

p. 741, 742, 743, 744	**CFOR/L C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754
CFOR/L C5-C6	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

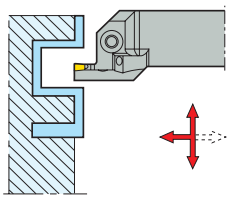
p. 741, 742, 743, 744	**CFOR/L C6**	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754
CFOR/L C5-C6	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

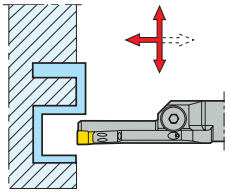
CFOR/L C5-C6	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

CFOR/L C5-C6	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
	p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754	
p. 745, 746, 747, 748, 749, 750, 751, 752, 753, 754		

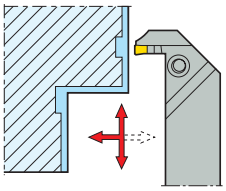
18	24	30	36	48
0.700	*0.945*	*1.180*	*1.415*	*1.890*

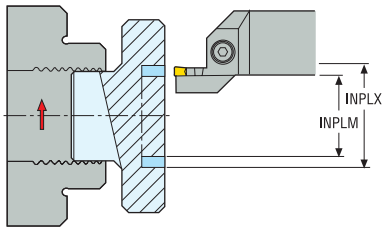
Axial holders – Metric





∅ of initial plunge INPLM-INPLX	CW				
200-500	8	CF(G)IR/L 32 / CFIR/L 32JET			
	6	CFOR/L 25JET			
	5	CFOR/L 25JET			
	4	CFOR/L 25JET			
	3	CFOR/L 25JET			p. 775, 776, 780, 781
140-230	8	CF(G)IR/L 32 / CFIR/L 32JET			
	6	CF(G)IR/L 25 / CFIR/L 25JET			p. 770, 771
	5	CF(G)IR/L 25 / CFIR/L 25JET		p. 770, 771	CFOR/L 25JET
	4	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	
	3	CFOR/L 25JET			p. 775, 776, 780, 781
110-170	8	CF(G)IR/L 32 / CFIR/L 32JET			
	6	CF(G)IR/L 25 / CFIR/L 25JET			p. 770, 771, 804, 805
	5	CF(G)IR/L 25 / CFIR/L 25JET		p. 770, 771	CFOR/L 25JET
	4	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	
	3	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	p. 775, 776, 780, 781
90-130	8	CF(G)IR/L 32 / CFIR/L 32JET			
	6	CF(G)IR/L 25 / CFIR/L 25JET			p. 770, 771, 804, 805
	5	CF(G)IR/L 25 / CFIR/L 25JET		p. 770, 771	CFOR/L 25JET
	4	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	
	3	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	p. 775, 776, 780, 781
70-100	6	CF(G)IR/L 25 / CFIR/L 25JET			p. 770, 771, 804, 805
	5	CF(G)IR/L 25 / CFIR/L 25JET		p. 770, 771	CFOR/L 25JET
	4	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	
	3	CF(G)IR/L 25 / CFIR/L 25JET	p. 770, 771, 804, 805	CFOR/L 25JET	p. 775, 776, 780, 781
55-80	6	CFIR/L 25JET			p. 768, 770, 771
	5	CFIR/L 25JET		p. 768, 770, 771	CFOR/L 25JET
	4	CFIR/L 25JET	p. 768, 770, 771	CFOR/L 25JET	
	3	CFIR/L 25JET	p. 768, 770, 771	CFOR/L 25JET	p. 775, 776, 780, 781
			CDX = 9	12	15 18

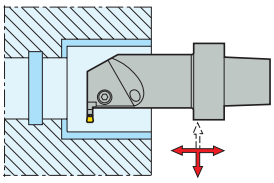


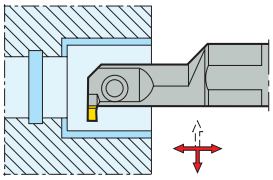


p. 772, 804, 805	**CFOR/L 32JET**	p. 777, 782
	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		
p. 772, 804, 805	**CFOR/L 32JET**	p. 777, 782
CFOR/L 25JET	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		
p. 772, 804, 805	**CFOR/L 32JET**	p. 777, 782
CFOR/L 25JET	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		
p. 772, 804, 805	**CFOR/L 32JET**	p. 777, 782
CFOR/L 25JET	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		
CFOR/L 25JET	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		
CFOR/L 25JET	p. 775, 776, 780, 781	
	p. 775, 776, 780, 781	
p. 775, 776, 780, 781		

18 24 30 36 48

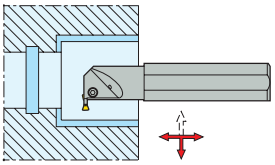
Internal holders, Seco-Capto – Metric/ Inch, Bar – Metric

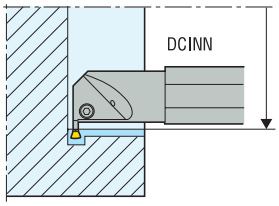




$DCINN_{min}$	CW	Shank type		
45 *1.772*	6 *0.240*	Seco-Capto	CGGR/L C5-C6	
		Bar	CGGR/L ∅40	
	5 *0.200*	Seco-Capto	CGGR/L C4-C5-C6	
		Bar	CGGR/L ∅40	
	4 *0.160*	Seco-Capto	CGGR/L C4-C5-C6	
		Bar	CGGR/L ∅40*	
	3 *0.120*	Seco-Capto	CGGR/L C4-C5-C6	p. 816, 817
		Bar	CGGR/L ∅40	p. 822
32 *1.260*	6 *0.240*	Seco-Capto	CGFR/L C5-C6	
		Bar	CGFR/L ∅32	
	5 *0.200*	Seco-Capto	CGFR/L C4-C5-C6	
		Bar	CGFR/L ∅32	
	4 *0.160*	Seco-Capto	CGGR/L C4-C5-C6	
		Bar	CGGR/L ∅32	
	3 *0.120*	Seco-Capto	CGIR/L C4-C5-C6	
		Bar	CGIR/L ∅32	
25 *0.984*	4 *0.160*	Seco-Capto	CGFR/L C5-C6	
		Bar	CGFR/L ∅25	
	3 *0.120*	Seco-Capto	CGHR/L C5-C6	
		Bar	CGHR/L ∅25	
	2 *0.080*	Seco-Capto	CGJR/L C4-C5-C6	
		Bar	CGJR/L ∅25	
20 *0.787*	4 *0.160*	Seco-Capto	CGFR/L C4-C5-C6	p. 811, 812
		Bar	CGFR/L ∅20	p. 818
	3 *0.120*	Seco-Capto	CGFR/L C4-C5-C6	p. 811, 812
		Bar	CGFR/L ∅20	p. 818
	2 *0.080*	Seco-Capto	CGHR/L C4-C5-C6	p. 815
		Bar	CGHR/L ∅20	p. 824
16 *0.630*	3 *0.120*	Seco-Capto	CGER/L C4-C5-C6	p. 811, 812
		Bar	CGER/L ∅16	p. 818

CDX = 3 *0.120* | 5,5 *0.217* | 6 *0.240*

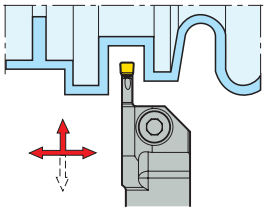


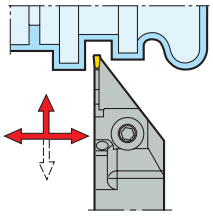


			p. 816, 817
			p. 822
		p. 816, 817	
		p. 822	
p. 816, 817			
p. 822			
p. 813, 814			
p. 820			
p. 813, 814			
p. 820			
p. 813, 814	**CGHR/L C5-C6**	p. 811, 812	
p. 820	**CGHR/L ∅32**	p. 818	
p. 813, 814	**CGJR/L C5-C6**	p. 811, 812	
p. 820	**CGJR/L ∅32**	p. 818	
p. 811, 812			
p. 818			
p. 811, 812			
p. 818			
p. 815			
p. 824			

6	7,5	8	9	10	10,5	12
0.240	*0.295*	*0.315*	*0.354*	*0.400*	*0.413*	*0.470*

External holders – Inch

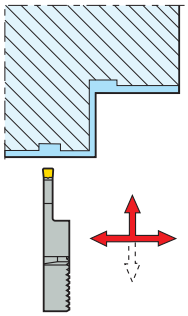


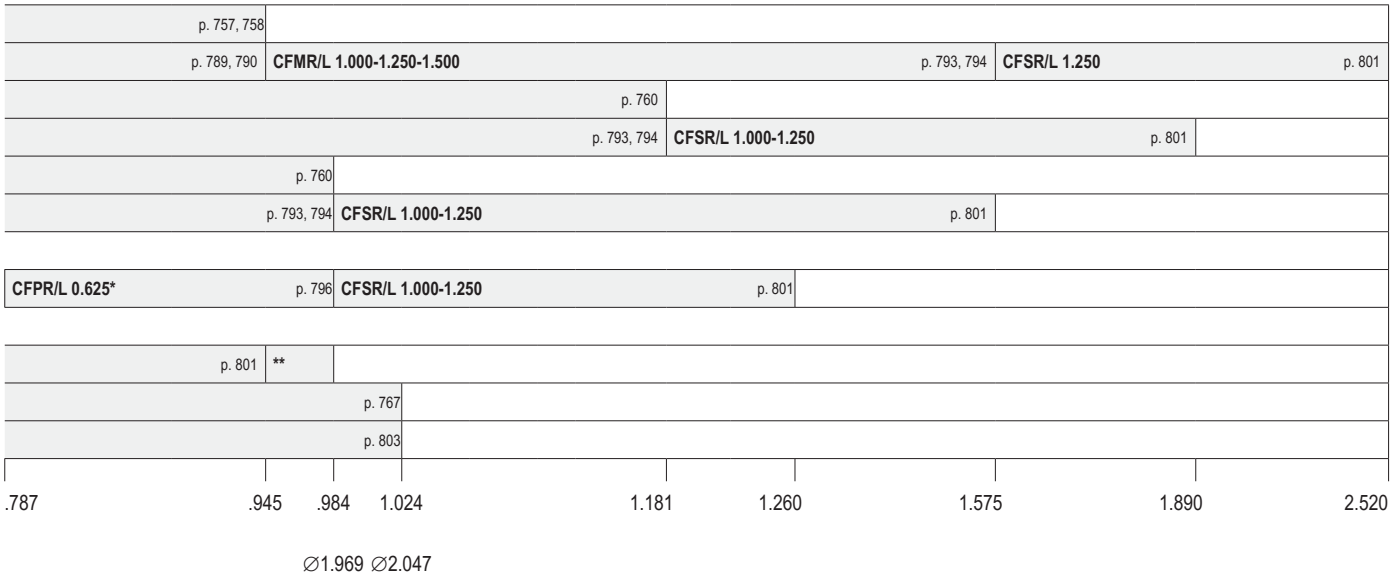


CW

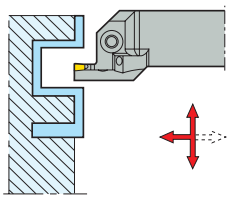
0.315	JET	CFIR/L 1.000-1.250									
	non JET	CFIR/L 1.000-1.250									
0.236	JET	CFIR/L 1.000-1.250							p. 757, 758	CFMR/L 1.000-1.250	
	non JET	CFIR/L 1.000-1.250							p. 789, 790	CFMR/L 1.000-1.250-1.500	
0.197	JET	CFIR/L 0.750-1.000-1.250				p. 757, 758	CFMR/L 1.000-1.250				
	non JET	CFIR/L 0.750-1.000-1.250				p. 789, 790	CFMR/L 1.000-1.250-1.500				
0.157	JET	CFIR/L 0.750-1.000-1.250	p. 757, 758	CFMR/L 0.750-1.000-1.250	p. 760						
	non JET	CFIR/L 0.750-1.000-1.250	p. 789, 790	CFMR/L 0.750-1.000-1.250-1.500	p. 793, 794						
0.118	JET	CFIR/L 0.750-1.000-1.250	p. 757, 758	CFMR/L 0.750-1.000-1.250	p. 760						
	non JET	CFIR/L 0.625-0.750-1.000-1.250	p. 789, 790	CFMR/L 0.750-1.000-1.250-1.500	p. 793, 794	CFSR/L 1.000-1.250					
0.079	JET	CFOR/L 0.500*	p. 763	CFSR/L 0.750*	p. 765	CFZR/L 0.750-1.000*					
	non JET	CFOR/L 0.500-0.625*	p. 799	CFSR/L 0.500-0.625*	p. 799	CFZR/L 0.625*					
		CDX = .354		.472		.591		.709		.787	
				∅1.000		∅1.299		∅1.457			

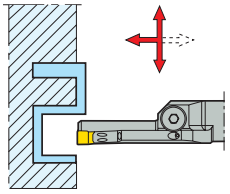
* Due to the design, grooving depth is limited to given ∅
** CFTR/L 0.750-1.000" - see p. 796



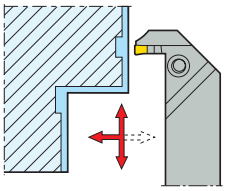

p. 757, 758
p. 789, 790
CFMR/L 1.000-1.250-1.500
p. 793, 794
CFSR/L 1.250
p. 801
p. 760
p. 793, 794
CFSR/L 1.000-1.250
p. 801
p. 760
p. 793, 794
CFSR/L 1.000-1.250
p. 801
CFPR/L 0.625*
p. 796
CFSR/L 1.000-1.250
p. 801
p. 801
**
p. 767
p. 803
.787
.945
.984
1.024
1.181
1.260
1.575
1.890
2.520
∅1.969 ∅2.047

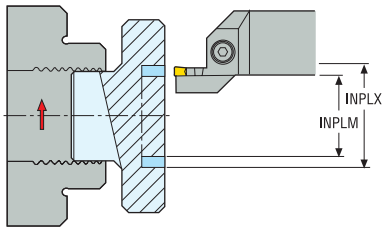
Axial holders – Inch





∅ of initial plunge INPLM-INPLX	CW	CDX = .354	.472	.591	.709
7.874-19.685	.315	CF(G)IR/L 1.000 / CFIR/L 1.000-1.250JET			
	.236	CFOR/L 1.000JET			
	.197	CFOR/L 1.000JET			
	.157	CFOR/L 1.000JET			
	.118	CFOR/L 1.000JET			p. 783, 784
5.512-9.055	.315	CF(G)IR/L 1.000 / CFIR/L 1.000-1.250JET			
	.236	CF(G)IR/L 1.000 / CFIR/L 1.000JET			p. 773, 774, 806, 807, 810
	.197	CF(G)IR/L 1.000 / CFIR/L 1.000JET		p. 773, 774, 806, 807	CFOR/L 1.000JET
	.157	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807	CFOR/L 1.000JET	
	.118	CFOR/L 1.000JET			p. 783, 784
4.331-6.693	.315	CF(G)IR/L 1.000 / CFIR/L 1.000-1.250JET			
	.236	CF(G)IR/L 1.000 / CFIR/L 1.000JET			p. 773, 774, 806, 807, 810
	.197	CF(G)IR/L 1.000 / CFIR/L 1.000JET		p. 773, 774, 806, 807	CFOR/L 1.000JET
	.157	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774	CFOR/L 1.000JET	
	.118	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807	CFOR/L 1.000JET	p. 783, 784
3.543-5.118	.315	CF(G)IR/L 1.000 / CFIR/L 1.000-1.250JET			
	.236	CF(G)IR/L 1.000 / CFIR/L 1.000JET			p. 773, 774, 806, 807, 810
	.197	CF(G)IR/L 1.000 / CFIR/L 1.000JET		p. 773, 774, 806, 807	CFOR/L 1.000JET
	.157	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807, 810	CFOR/L 1.000JET	
	.118	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807, 810	CFOR/L 1.000JET	p. 783, 784
2.756-3.937	.236	CF(G)IR/L 1.000 / CFIR/L 1.0005JET			p. 773, 774, 806, 807
	.197	CF(G)IR/L 1.000 / CFIR/L 1.000JET		p. 773, 774, 806, 807	CFOR/L 1.000JET
	.157	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807, 810	CFOR/L 1.000JET	
	.118	CF(G)IR/L 1.000 / CFIR/L 1.000JET	p. 773, 774, 806, 807, 810	CFOR/L 1.000JET	p. 783, 784
2.165-3.150	.236	CFIR/L 1.000JET			p. 769, 773, 774
	.197	CFIR/L 1.000JET		p. 769, 773, 774	CFOR/L 1.000JET
	.157	CFIR/L 1.000JET	p. 769, 773, 774	CFOR/L 1.000JET	
	.118	CFIR/L 1.000JET	p. 769, 773, 774	CFOR/L 1.000JET	p. 783, 784





p. 773, 774, 806, 807, 810 | CFOR/L 1.250JET | p. 778, 779, 783, 784
p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

p. 773, 774, 806, 807, 810 | CFOR/L 1.250JET | p. 778, 779, 783, 784
CFOR/L 1.000JET | p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

p. 773, 774, 806, 807, 810 | CFOR/L 1.250JET | p. 778, 779, 783, 784
CFOR/L 1.000JET | p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

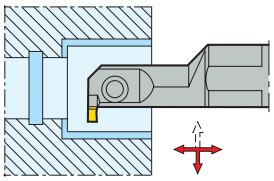
p. 773, 774, 806, 807, 810 | CFOR/L 1.250JET | p. 778, 779, 783, 784
CFOR/L 1.000JET | p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

CFOR/L 1.000JET | p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

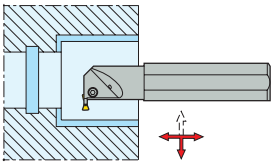
CFOR/L 1.000JET | p. 783, 784
p. 783, 784
p. 778, 779, 783, 784

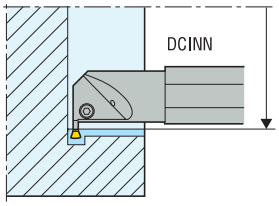
.709 .945 1.181 1.417 1.890

Internal holders – Inch



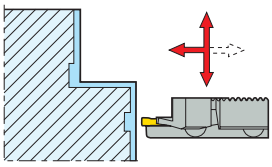
$DCINN_{min}$	CW	Shank type						
1.800	0.236	Bar	CGGR/L ∅1.500					
	0.197	Bar	CGGR/L ∅1.500					
	0.157	Bar	CGGR/L ∅1.500					
	0.118	Bar	CGGR/L ∅1.500					
1.260	0.236	Bar	CGFR/L ∅1.250					p. 821
	0.197	Bar	CGFR/L ∅1.250					p. 821
	0.157	Bar	CGGR/L ∅1.250					
	0.118	Bar	CGIR/L ∅1.250					
0.985	0.157	Bar	CGFR/L ∅1.000					p. 819
	0.118	Bar	CGHR/L ∅1.000					p. 819
	0.079	Bar	CGJR/L ∅1.000				p. 825	
0.790	0.157	Bar	CGFR/L ∅0.750			p. 819		
	0.118	Bar	CGFR/L ∅0.750			p. 819		
	0.079	Bar	CGHR/L ∅0.750		p. 825			
0.630	0.118	Bar	CGER/L ∅0.625	p. 819				
				CDX = .118	.197	.216	.276	.295

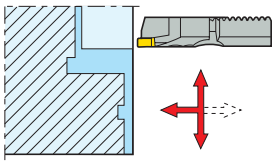




					p. 823
				p. 823	
				p. 823	
				p. 823	
		p. 821	**CGHR/L ∅1.250**	p. 819	
	p. 821	**CGJR/L ∅1.250**		p. 819	
.295	**.354**	**.394**	**.413**	**.440**	**.515**

Axial modular blades – Metric



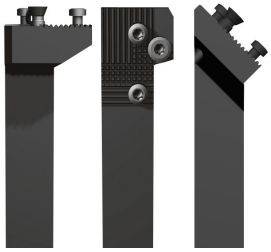


INPLM-INPLX	CW		
17-200		V21-CMR/L	p. 835, 836, 837, 838
26-100	4	V21-CIR/L	p. 835, 836, 837, 838
17-34		V21-CHR/L	p. 835, 836, 837, 838
17-200		V21-COR/L	p. 835, 836, 837, 838
33-76	3	V21-CKR/L	p. 835, 836, 837, 838
17-39		V21-CJR/L	p. 835, 836, 837, 838

CDX = 10,5 | 12 | 18 | 20

Holders for modular blades – Metric/ Inch



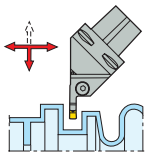






C4-C5-C6	p. 828	**20-25-32** / *0.750 - 1.000 - 1.250*	p. 829, 830	**C4, C5, C6, ∅25-32-40** / *1.000 - 1.250 - 1.500*	p. 831, 833

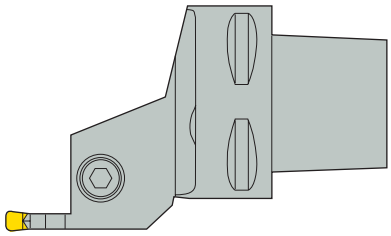
External MTM holders – Metric/ Inch



CW			
8 *0.315*	JETI	CDIR/L C6	p. 826, 827
6 *0.240*	JETI	CDIR/L C6	p. 826, 827
5 *0.200*	JETI	CDIR/L C6	p. 826, 827
4 *0.160*	JETI	CDIR/L C6	p. 826, 827
3 *0.120*	JETI	CDIR/L C6	p. 826, 827

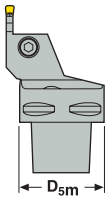
CDX = 9 *0.354* | 12 *0.470* | 15 *0.590* | 18 *0.700* | 24 *0.945*

Seco-Capto™ – External toolholders



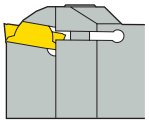
C4	C	F	I	R	-	27	050	-	03
1	2	3	4	5		6	7		8

1. Seco-Capto™ size



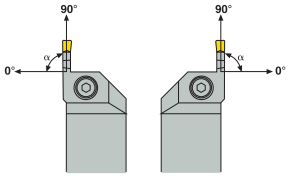
C3 = 32 mm
C4 = 40 mm
C5 = 50 mm
C6 = 63 mm

2. Insert clamping



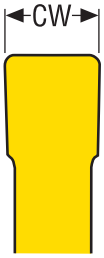
C

3. Toolholder setting angle



a
G = 0°
R = 15°
T = 30°
S = 45°
W = 60°
K = 75°
F = 90°
B = 105°
E = 120°
D = 135°

4. Maximum grooving/turning depth

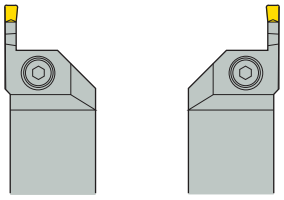


E = 1,0 x CW
F = 1,5 x CW
G = 2,0 x CW
H = 2,5 x CW
I = 3,0 x CW
J = 3,5 x CW
K = 4,0 x CW

L = 4,5 x CW
M = 5,0 x CW
N = 5,5 x CW
O = 6,0 x CW
S = 8,0 x CW
T = 8,5 x CW
Z = 12,5 x CW

X = Special

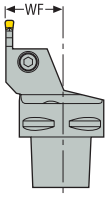
5. Version



R

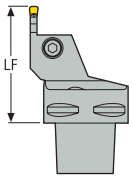
L

6. WF-dimension



27 = 27 mm
35 = 35 mm
45 = 45 mm
etc.

7. LF-dimension



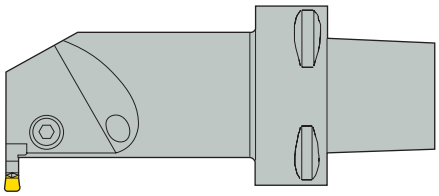
12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

8. Seat size



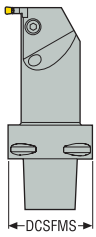
03	= 2,3 mm
04	= 3,1 mm
05	= 4,1 mm
06	= 5,1 mm
08	= 6,8 mm
1902	= 1,6 mm
2802	= 1,6 mm
etc.	

Seco-Capto™ – Internal toolholders and modular GL-turning heads

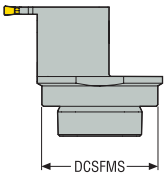


C4	C	G	G	R	-	25	090	-	03
1	2	3	4	5		6	7		8

1. Seco-Capto™ and GL size

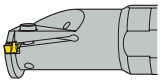


C3 = 32 mm
C4 = 40 mm
C5 = 50 mm
C6 = 63 mm



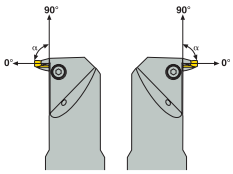
GL25 = 25 mm
GL32 = 32 mm
GL40 = 40 mm
GL50 = 50 mm

2. Insert clamping



C

3. Toolholder setting angle



a
G = 0°
R = 15°
T = 30°
S = 45°
W = 60°
K = 75°
F = 90°
B = 105°
E = 120°
D = 135°

4. Maximum grooving/turning depth

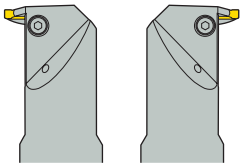


E = 1,0 x CW
F = 1,5 x CW
G = 2,0 x CW
H = 2,5 x CW
I = 3,0 x CW
J = 3,5 x CW
K = 4,0 x CW

L = 4,5 x CW
M = 5,0 x CW
N = 5,5 x CW
O = 6,0 x CW
S = 8,0 x CW
T = 8,5 x CW
Z = 12,5 x CW

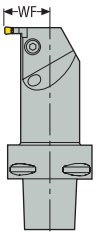
X = Special

5. Version



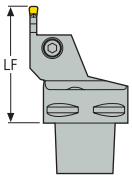
R L

6. WF-dimension



12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

7. LF-dimension



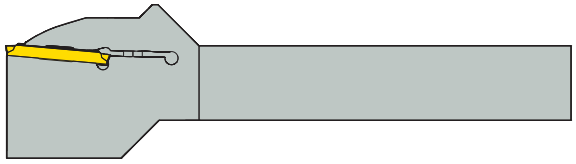
065 = 65 mm
075 = 75 mm
080 = 80 mm
etc.

8. Seat size



1303 = 2,4 mm
1304 = 3,4 mm
03, 1603 = 2,3 mm
04, 1604 = 3,1 mm
05, 1605 = 4,1 mm
06, 1606 = 5,1 mm
1902 = 1,6 mm
etc.

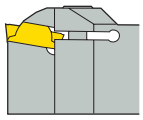
External toolholders



C	F	Z	R	20	20	M	2802	RB	JET
1	2	3	4	5	6	7	8	12	13

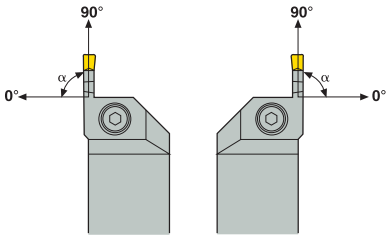
C	F	I	R	25	25	M	04	L	100	070
1	2	3	4	5	6	7	8	9	10	11

1. Insert clamping



Clamp

2. Toolholder setting angle



a
G = 0°
R = 15°
T = 30°
S = 45°
W = 60°
K = 75°
F = 90°
B = 105°
E = 120°
D = 135°

3. Maximum grooving/turning depth

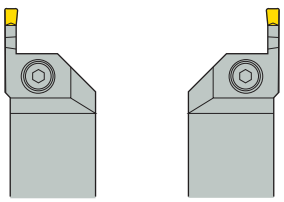


E = 1,0 x CW
F = 1,5 x CW
G = 2,0 x CW
H = 2,5 x CW
I = 3,0 x CW
J = 3,5 x CW
K = 4,0 x CW
L = 4,5 x CW

M = 5,0 x CW
N = 5,5 x CW
O = 6,0 x CW
P = 6,25 x CW
S = 8,0 x CW
T = 8,5 x CW
Z = 12,5 x CW

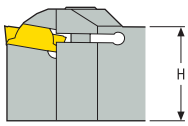
X = Special

4. Version



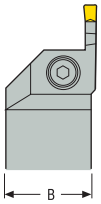
R L

5. Shank height



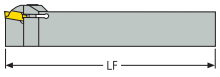
12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

6. Shank width



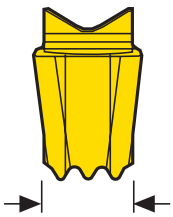
12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

7. Tool length



H = 100 mm
K = 125 mm
M = 150 mm
P = 170 mm
R = 200 mm

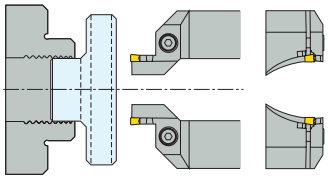
8. Seat size



Seat size

1303 = 2,4 mm
1304 = 3,4 mm
1603 = 2,3 mm
1604 = 3,1 mm
1605 = 4,1 mm
1606 = 5,1 mm
1902 = 1,6 mm
2802 = 1,6 mm
3008 = 6,8 mm
etc.

9. Tang curvature direction



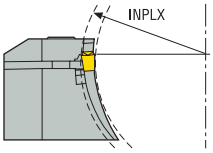
L

R

Additional information for axial machining

10. Maximum diameter

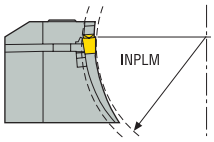
100 mm (INPLX)



Additional information for axial machining

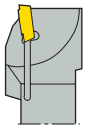
11. Minimum diameter

070 = 70 mm (INPLM)



Additional information for axial machining

12. Holder modification



RB = Reinforced blade for specified diameter

13. Cooling system

JET = Jetstream Tooling®
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet

Additional information for axial machining

Internal toolholders



A	20	R	-	C	G	F	R	1303
1	2	3		4	5	6	7	8

1. Toolholder type

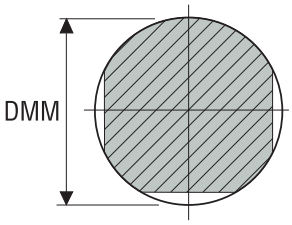
A = Steel with coolant passage

S = Solid steel

E = Solid carbide with brazed* cutting head and coolant passage

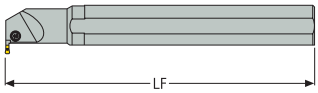
* Brazed or equivalent

2. Shank diameter



12 = 12 mm
20 = 20 mm
25 = 25 mm
etc.

3. Tool length

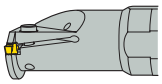


K = 125 mm
L = 140 mm
M = 150 mm
N = 160 mm
P = 170 mm

Q = 180 mm
R = 200 mm
S = 250 mm
T = 300 mm
U = 350 mm

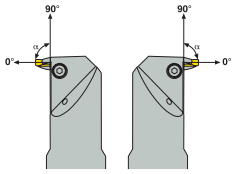
V = 400 mm

4. Insert clamping



C

5. Toolholder setting angle



a
G = 0°
R = 15°
T = 30°
S = 45°
W = 60°
K = 75°
F = 90°
B = 105°
E = 120°
D = 135°

6. Maximum grooving/turning depth

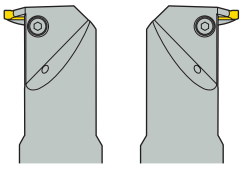


E = 1,0 x CW
F = 1,5 x CW
G = 2,0 x CW
H = 2,5 x CW
I = 3,0 x CW
J = 3,5 x CW
K = 4,0 x CW

L = 4,5 x CW
M = 5,0 x CW
N = 5,5 x CW
O = 6,0 x CW
S = 8,0 x CW
T = 8,5 x CW
Z = 12,5 x CW

X = Special

7. Version



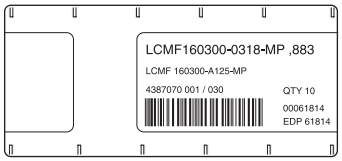
R L

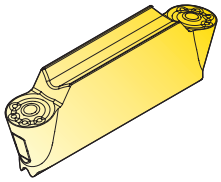
8. Seat size



1303 = 2,4 mm
1304 = 3,4 mm
1603 = 2,3 mm
1604 = 3,1 mm
1605 = 4,1 mm
1606 = 5,1 mm
1902 = 1,6 mm
2802 = 1,6 mm

Inserts





L	C	M	F	16	03	00	-	0318		-	MP
1	2	3	4	5	6	7		8	9		10

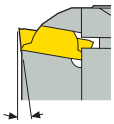
1. Shape

L



Rectangular

2. Front clearance angle



C = 7°

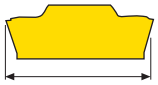
3. Tolerances

Tolerance class	Tolerances: mm/*in*			For insert width, CW mm					
	CW	RE	LIG	2	3	4	5	6	8
G	0,025/*0.001*	0,025/*0.001*	0,040/*0.0016*		•	•	•	•	•
M	0,050/*0.0020*	0,050/*0.0020*	0,080/*0.0032*	•	•	•	•	•	•

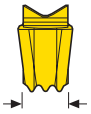
4. Insert type

R		Single ended with chipbreaker	N		Single ended without chipbreaker
F		Double ended with chipbreaker	A		Double ended without chipbreaker

5. Insert gauge length

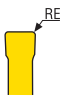


6. Insert gauge width



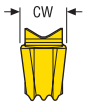
Seat size

7. Corner radius



M0,00	= round
01	= 0,1 mm
02	= 0,2 mm
04	= 0,4 mm
08	= 0,8 mm

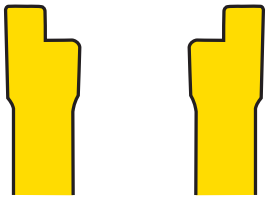
8. Insert width



0200 = 2,0 mm
0300 = 3,0 mm
0400 = 4,0 mm
0500 = 5,0 mm
etc.

9. Version

R **L**



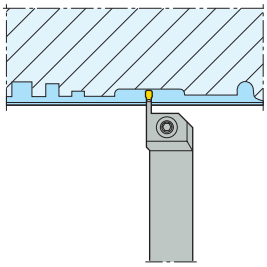
10. Insert type code, for further information please see page(s) 706

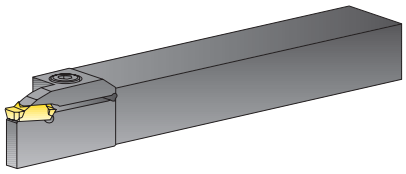
FT	= Chipbreaker for fine turning	FG	= For lock rings
FTR/L	= Right or left hand version with a specified setting angle, for parting-off	DY	= For dynamic O-rings
MT	= Chipbreaker for medium turning	ST	= For static O-rings
MG	= Chipbreaker for medium grooving	D76	= For thread undercuts
MC	= Chipbreaker for medium cut-off	R	= For radius
MCR/L	= Right or left hand version with a specified setting angle, for parting-off	A55/A60 G55/G60 ISO	= For threading
GG	= Chipbreaker for medium grooving		
GS	= Chipbreaker for fine grooving		
MP	= Chipbreaker for medium profiling		
RP	= Chipbreaker for fine and medium profiling		

Toolholders

CFIR/L – Basic choice

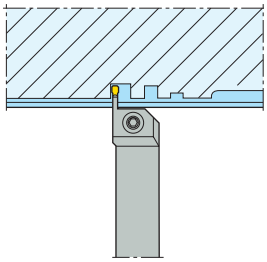
- For external turning, profiling and grooving
- Maximum working depth 3 x the insert width (can be limited by double ended inserts)
- Size 16 – For general machining
- Size 30 – For heavy machining

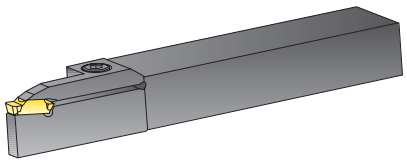




CFMR/L – Long reach

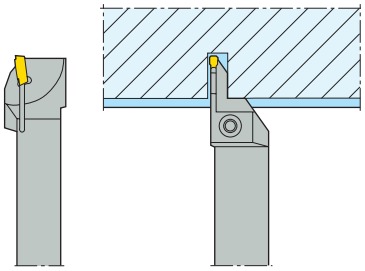
- For external turning, profiling and grooving
- Maximum working depth 5 x the insert width
- Single ended inserts should be used (CFMR/L, CFSR/L)
- Size 16 – For general machining
- Size 28 – For general machining
- Size 30 – For heavy machining

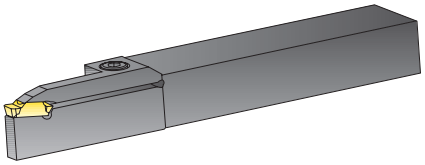




CFOR/L, CFPR/L, CFSR/L, CFTR/L, CFZR/L – Extra long reach, 6 x insert width up to 12,5 x insert width

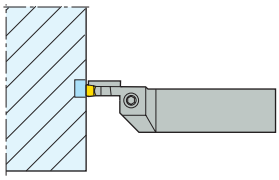
- For grooving and parting-off
- Single ended inserts should be used (CFOR/L, CFPR/L, CFTR/L)
- Size 16 – For general machining
- Size 19 – For small part machining
- Size 28 – For general machining



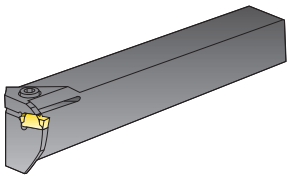


CGIR/L, CFIR/L, CFOR/L – Axial machining

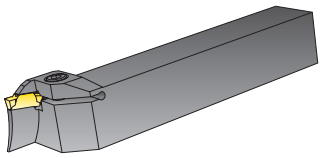
- For axial turning, profiling and grooving
- Maximum working depth 3-6 x the insert width (can be limited by double ended inserts).
- These toolholders demand that the first cut must be made between two specified diameters (see code key)
- Size 16 – For general machining
- Size 30 – For heavy machining



CGIR

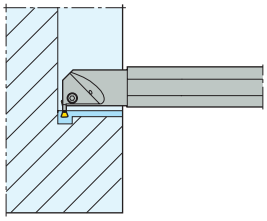


CFIL

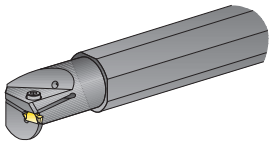


CG.IR/L – Internal machining

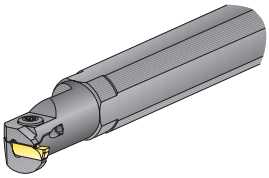
- For internal turning, profiling and grooving
- Maximum working depth 1–3,5 x the insert width for size 13
- Maximum working depth 3 x the insert width for size 16
- Maximum working depth 2,5–3,5 x the insert width for size 19
- For through coolant supply
- Size 13 – For machining in small bore sizes
- Size 16 – For general machining
- Size 19 – For machining in small bore size



MDT16

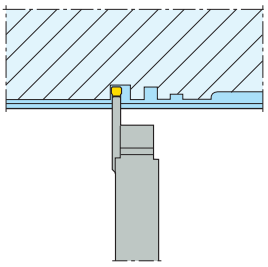


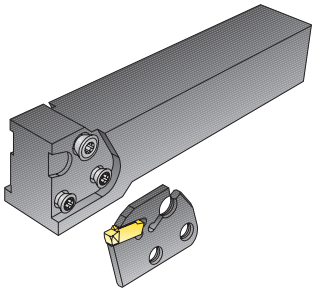
MDT13



Single ended blades

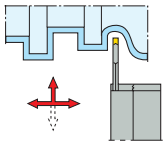
- Holder with both right and left hand blade mounting available
- Size 16 – For general machining





Double ended blades

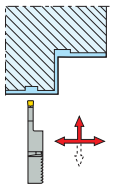
– To be used in standard 150.10 toolblocks
– Size 16 – For parting-off

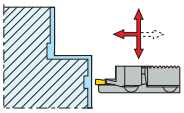


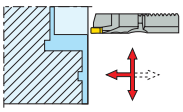


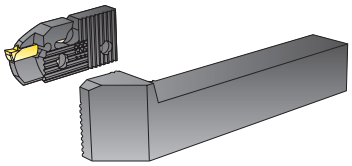
Modular holders, axial/radial

– For axial turning, profiling and grooving
– Maximum working depth 3-6 x the insert width (can be limited by double ended inserts).
– These toolholders demand that the first cut must be made between two specified diameters (see code key)
– Size 16 – For general machining
– Size 30 – For heavy machining









MDT – Inserts

LCMF – Basic choice

Double ended
Economy (cutting edges at both ends)
Size 13 – For machining in small bore sizes and axial machining at small diameters
Size 16 – For general machining
Size 19 – For small part machining
Size 28 – For general machining
Size 30 – For heavy machining

MDT13



MDT16
MDT30



MDT19
MDT28



LCMR

Single ended
Flexibility
Reach (full length clearance)
Size 13 – For machining in small bore sizes and axial machining at small diameters
Size 16 – For general machining
Size 30 – For heavy machining

MDT13



MDT16
MDT30



LCG.

Special applications
Standard and (customer specified) tailor made profiles
Double or single ended
With or without chipbreaker

Size 13 – For machining in small bore sizes and axial machining at small diameters
Size 16 – For general machining
Size 30 – For heavy machining



FT (Fine Turning)

For fine turning

For deep grooving



FT 19 and 28 (Fine Turning)

For parting-off

For deep grooving



MT (Medium Turning)

For medium turning

For shallow grooving



MG (Medium Grooving)

For medium turning

For deep grooving

For parting-off



MC (Medium Cut-off)

For parting-off tubes and small diameter workpieces

For deep grooving



GG (Grooving Ground)

Ground chipgroove

For medium grooving, complement to FT for precision grooves



GS (Grooving Sharp)

Sharp edge

For fine grooving in non-ferrous materials/ superalloys

Precision grooves



A55/A60, G55/G60, ISO

For threading applications



MP (Medium Profiling)

For medium profiling

For medium turning

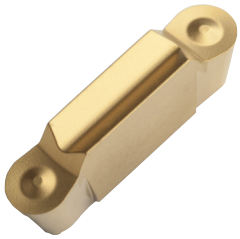


RP (Round Profiling)

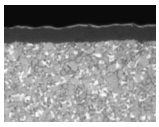
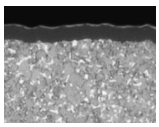
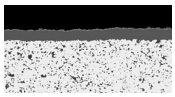
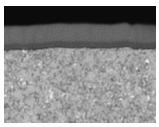
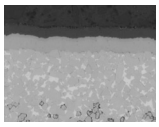
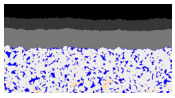
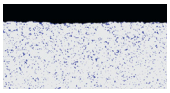
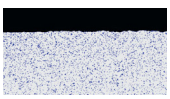
For fine and medium profiling, turning and grooving

Sharp periphery ground edges

For superalloys, titanium alloys and non-ferrous materials

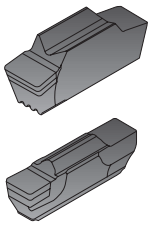


Grades

CP200		PVD-coated, hard micrograin grade with great wear resistance, intended for grooving, parting-off and profiling of superalloys, titanium alloys and hardened steels. A more wear resistant alternative to grade 890. (Ti,Al)N + TiN
CP500		Tough versatile PVD-coated micrograin grade intended for grooving in a variety of workpiece materials. Universal choice. (Ti,Al)N + TiN
CP600		Very tough PVD-coated fine-grain grade intended for deep grooving and parting-off at low to moderate cutting speeds. Well-suited in deep grooving and in interrupted cuts. Tougher alternative to CP500. (Ti,Al)N + TiN
TGH1050		Very hard supermicrograin grade intended for partly hardened steel components as well as generally workpiece materials such as superalloys and cast-iron and due to remarkable edge toughness it also provides high performance in interrupted cuts and hard-surface removal. Ti-Al-Si-N nanolaminate coating
TGK1500		Wear-resistant, hard Duratomic® CVD-coated grade intended for grooving and profiling of grey cast iron and nodular cast iron. Ti(C,N) + Al_2O_3
TGP25		A wear-resistant Duratomic® CVD-coated grade intended for grooving, turning and profiling of steels at high cutting speeds. Ti(C,N) + Al_2O_3
883		Uncoated, hard grade intended for grooving, parting-off and profiling of superalloys, titanium alloys, hardened steels and non-ferrous materials.
890		Uncoated, very hard micrograin grade intended for grooving and profiling of superalloys, titanium alloys, hardened steels and non-ferrous materials. More wear resistant alternative to grade 883.

Grades, PCBN

CBN010

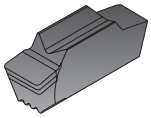


Single-ended inserts with brazed tip, intended for hardened steels and Ni-based superalloys.

Composition:
50% cBN content grade with an average grain size of 2 µm and a TiC ceramic binder.

Coating:
No coating.

CBN170

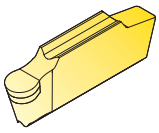


Single-ended inserts with brazed tip, intended for Ni-based superalloys.

Composition:
65% cBN content grade with an average grain size of 2 µm and a TiCN+SiCw ceramic binder.

Coating:
No coating.

CBN170C

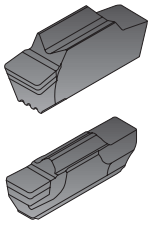


Single-ended inserts with brazed tip, intended for Ni-based superalloys.

Composition:
65% cBN content grade with an average grain size of 2 µm and a TiCN+SiCw ceramic binder.

Coating:
(Ti,Si)N

CBN200



Single-ended inserts with brazed tip, intended for perlitic cast iron and hardened steels.

Composition:
90% cBN content grade with an average grain size of 3-6 µm and a Al ceramic binder.

Coating:
No coating.

Application recommendations

Easy conditions: pre-machined surface, shallow grooves etc.
Difficult conditions: raw surface, deep grooves etc.

To centre

Easy conditions	Difficult conditions
FT TGP25	MC CP600
FT CP500	MC CP600
MT TGKI500	MT CP500
MT 883	MT CP500
MT 883	MT CP500
S-LF CBN I0 CBN 0I0	S-LF CBN200

Tube

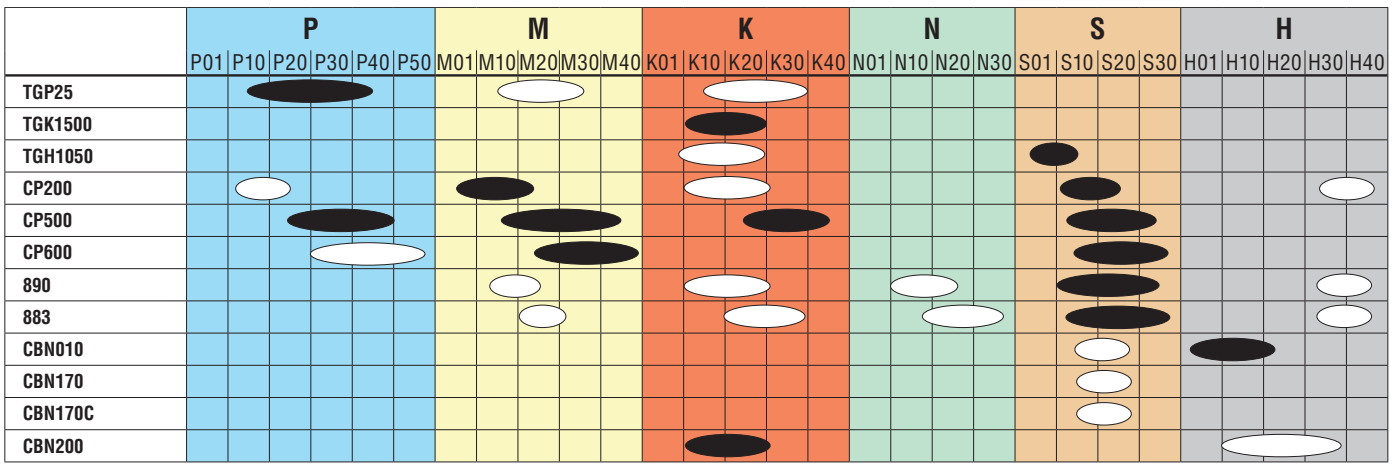
Easy conditions	Difficult conditions
MT TGP25	MT TGP25
MT TGP25	MT TGP25
MT TGKI500	MT TGP25
MT 883	MT CP500
MT 883	MT CP500
S-LF CBN I0 CBN0I0	S-LF CBN200

MDT Grades – Secolor

The chart below shows application areas for grades available in the MDT system.
The black areas in the chart indicate a grade's main ISO application groups and the white areas indicate other supplementary application groups.

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30

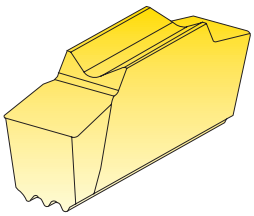


Inserts for standard grooves

Standard programme

Double-ended LCGA (MDT13)

Single-ended LCGN (MDT16)



FG
– For locking rings



DY
– For dynamic O-rings



R
– For full radius grooving



D76
– For thread undercuts



ST
– For static O-rings



Remember to check the toolholder clearance before using these inserts.

Principles

During turning the axial forces deflect the tool generating a necessary trailing edge clearance angle.

This angle depends on

– Feed

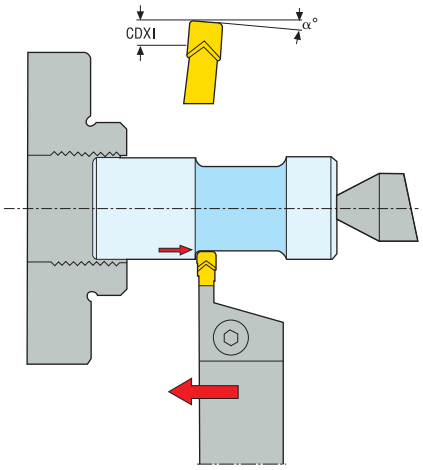
– Depth of cut

– Tool overhang

– Insert width

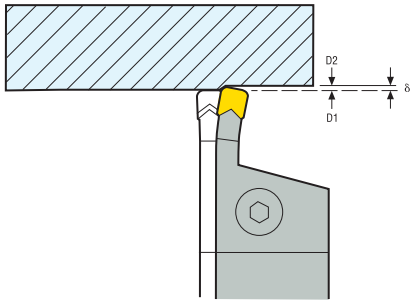
– Cutting speed

– Workpiece material



The deflection arising during turning causes a minor change of the actual tool length. This influences the received diameter on the workpiece.

The exact amount can be figured by running a test piece. First make a groove and then a turning operation to the same diameter with the selected cutting data. Compare the two different diameters and use the formula to calculate a compensation measure.



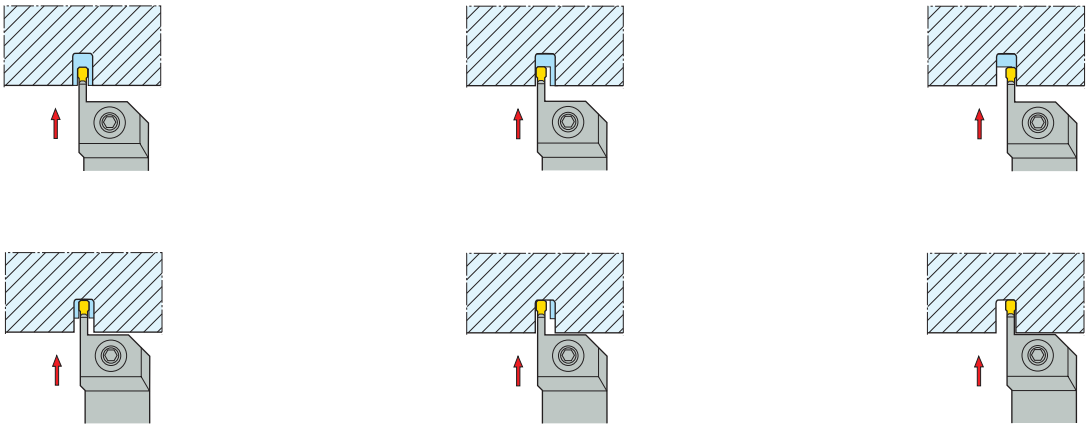
$$\delta = \frac{D1 - D2}{2}$$

Technical tips

Use the following technical tips for a favourable cutting process considering chipbreaking, cutting forces and tool life.

Machining a deep groove

– Make a central groove to half of the total depth.
– Make infeeds at both sides to the same depth.
– Machine a central groove to full depth.
– Make infeeds at both sides to the full depth.
– Always outfeed, do not rapid traverse.



Roughing a recess

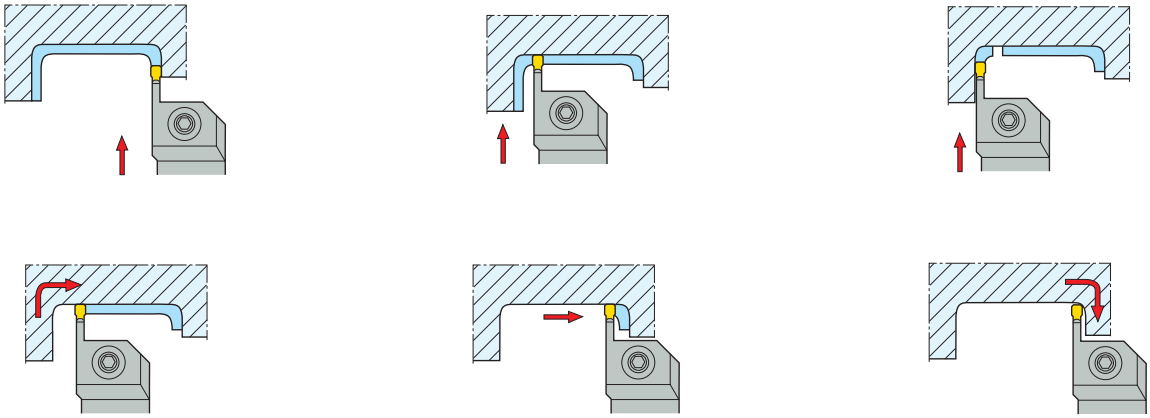
If the depth is larger than the width
– Use successive infeeds to required diameter.
– Increment a distance of the insert width – 2 x the insert corner radius to get a flat bottom surface.
– Always outfeed, do not use rapid traverse.

If the width is larger than the depth.
– Start with an infeed at one end.
– Use successive alternating turning with infeeds at the end.
– Release the tool deflection after turning before infeeding (reverse feed and reposition the insert before infeed – 0,1 mm).



Finishing a recess with corner radius or chamfer

– Machine the face down to the end point of the radius or chamfer.
– Make a groove to the required depth at the end point of the radius or chamfer.
– Machine down to the end point of the radius or chamfer.
– Machine the radius or chamfer.
– Machine the diameter until the end point of the radius or chamfer is reached (remember to compensate for the deflection).
– Machine the radius or chamfer.



Machining a large corner radius or chamfer

– Make a groove to the required depth at the end point of the radius or chamfer.
– Machine the face down to the end point of the radius or chamfer.
– Machine the radius or chamfer.
– Continue with turning starting from the groove (remember to compensate for the deflection).



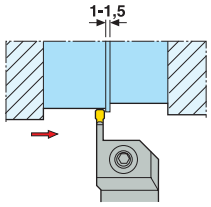
Eliminating a hanging ring

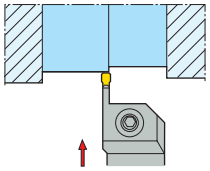
Turning towards the end of a component or towards a recess sometimes produces a hanging ring.

To avoid this

– Stop the turning operation 1,0–1,5 mm before the end of the component or the recess.

– Plunge down to the turned diameter.

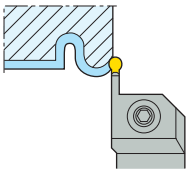




Profiling with round inserts

– The cutting depth should be maximum 0,4 x the insert diameter.

– There is no requirement to generate a trailing edge clearance angle as the geometry will provide that.



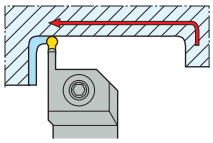
Roughing a recess with round inserts

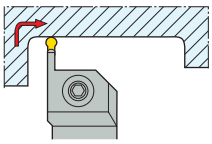
– Machine the face down to the end point of the radius or chamfer.

– Track around the radius.

– Turn to the end point of the radius or chamfer on the other side.

– Machine down the other side and track around the radius or chamfer.

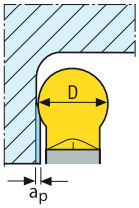


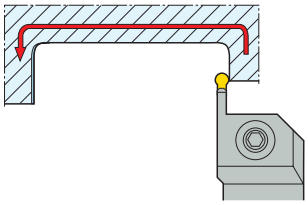


Finishing a recess with round inserts

– Make the cut in one continuous movement.
– Notice the maximum cutting depth allowed during outfeeding (see table).

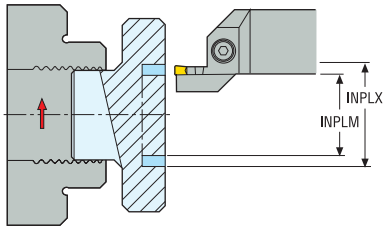
D mm	a_p mm
2	0,12
3	0,15
4	0,20
5	0,22
6	0,25
8, 10	0,40

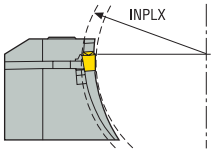


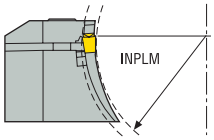


Axial machining

– In axial grooving operations the tool must be adapted to the radius of the groove.
– The toolholder code tells the maximum and minimum diameters that can be handled (see code key).
– The diameter measured on the outside of the blade (INPLX) determines the largest diameter of initial plunge.
– The diameter measured on the inside of the blade (INPLM) determines the smallest diameter of initial plunge.
– This applies to the initial groove only. Changing to turning means no general restrictions besides collision risk if machining towards centre.

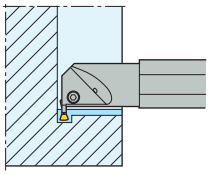






Internal machining

– Generally the same technique as for external machining should be used.
– In blind holes problems can occur with chip evacuation. To avoid that start with making a groove at the inner wall and turn towards the outside.

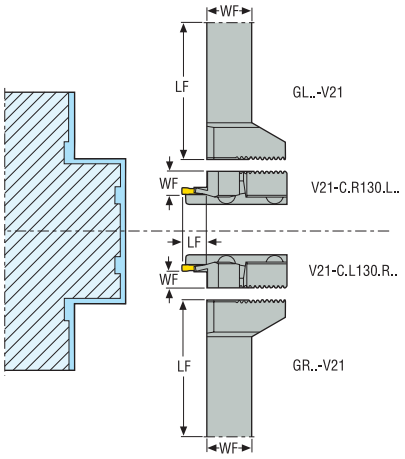


Modular holders

Calculation of dimensions after mounting

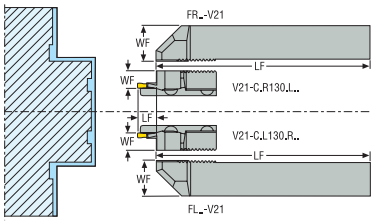
Example, left hand version (L):
– Blade holder G**L** (alternative Seco-Capto™ G**L**).
– Blade type V21-C.**R**130.**L**..
LF = LF holder + WF blade
WF = WF holder + LF blade

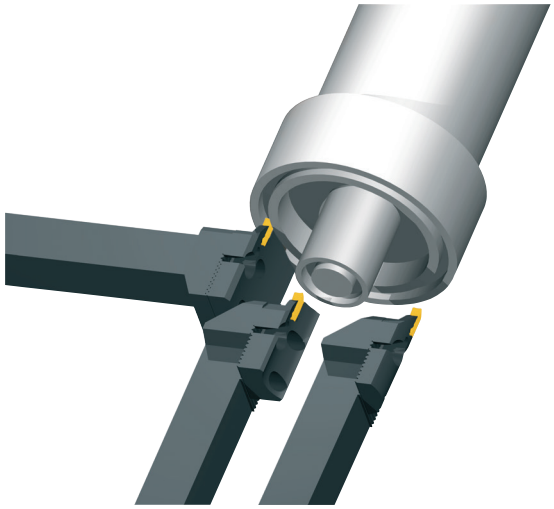
Example, right hand version (R):
– Blade holder G**R** (alternative Seco-Capto™ G**R**).
– Blade type V21-C.**L**130.**R**..
LF = LF holder + WF blade
WF = WF holder + LF blade



Example, right hand version (R):
– Blade holder F**R** (alternative Seco-Capto™ F**R**).
– Blade type V21-C.**R**130.**L**..
LF = LF holder + LF blade
WF = WF holder + WF blade

Example, left hand version (L):
– Blade holder F**L** (alternative Seco-Capto™ F**L**).
– Blade type V21-C.**L**130.**R**..
LF = LF holder + LF blade
WF = WF holder + WF blade





Calculation of dimensions after mounting

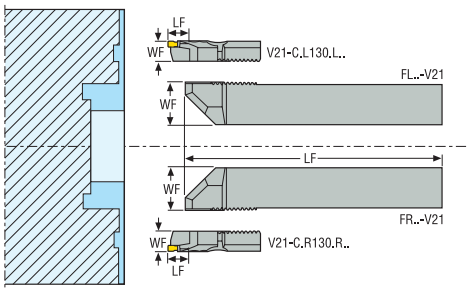
Example, left hand version (L):

– Blade holder F**L** (alternative Seco-Capto™ F**L**).

– Blade type V21-C.**L**130.**L**..

LF = LF holder + LF blade

WF = WF holder + WF blade



Example, right hand version (R):

– Blade holder F**R** (alternative Seco-Capto™ F**R**).

– Blade type V21-C.**R**130.**R**..

LF = LF holder + LF blade

WF = WF holder + WF blade

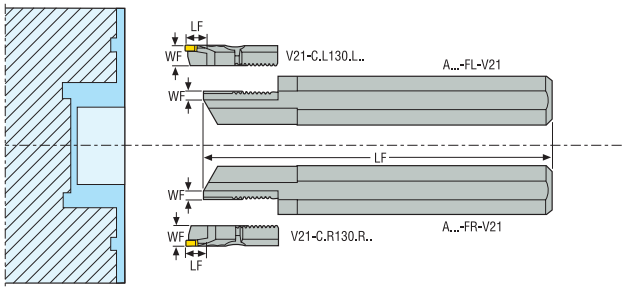
Example, left hand version (L):

– Blade holder A..F**L** (alternative Seco-Capto™ A..F**L**).

– Blade type V21-C.**L**130.**L**..

LF = LF holder + LF blade

WF = WF holder + WF blade



Example, right hand version (R):

– Blade holder A..F**R** (alternative Seco-Capto™ A..F**R**).

– Blade type V21-C.**R**130.**R**..

LF = LF holder + LF blade

WF = WF holder + WF blade

Bars A25R-F... can enter a minimum diameter DCINN ≥ 25 mm.
Bars A32S-F... can enter a minimum diameter DCINN ≥ 32 mm.



Calculation of dimensions after mounting

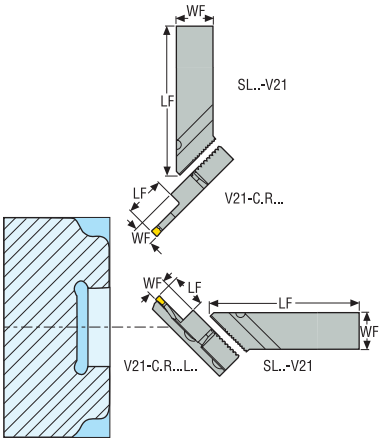
Example, left hand version (L):

– Blade holder S**L** (alternative Seco-Capto™ S**L**).

– Blade type V21-C.**R**....or V21-C.**R**....**L**..

LF = LF holder + 0,71 x (WF blade + LF blade)

WF = WF holder + 0,71 x (LF blade - WF blade)



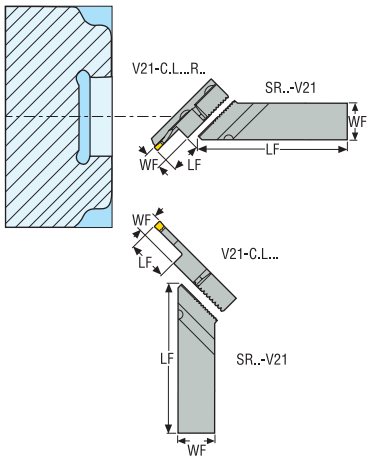
Example, right hand version (R):

– Blade holder S**R** (alternative Seco-Capto™ S**R**).

– Blade type V21-C.**L**....or V21-C.**L**....**R**..

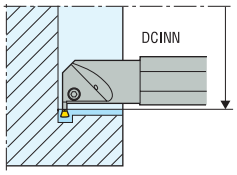
LF = LF holder + 0,71 x (WF blade + LF blade)

WF = WF holder + 0,71 x (LF blade - WF blade)

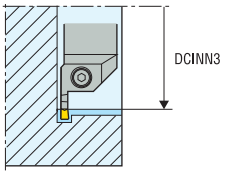


Dimensions relevant for toolholder use

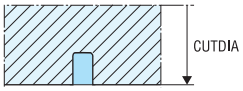
DCINN



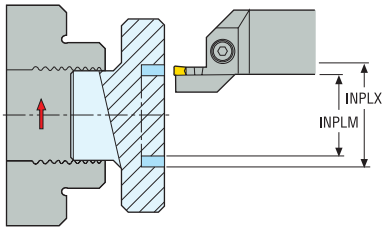
DCINN3



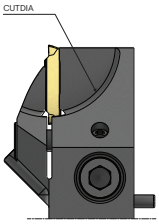
CUTDIA



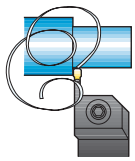
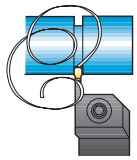
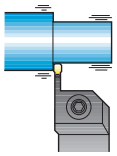
INPLM/INPLX



CUTDIA ..RB

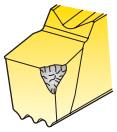


Machining problems

Chipbreaking problems/ turning 	Increase feed rate or cutting depth. Use narrower insert with smaller radius.
Chipbreaking problems/ grooving 	Reduce the cutting speed. Increase the feed rate. Use interrupted feed.
Vibrations 	Change the cutting speed. Increase the feed rate. Reduce the cutting depth. Improve the stability of the tool and workpiece. Select an insert with smaller radius.

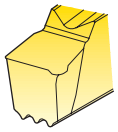
Tool life problems

Breakage



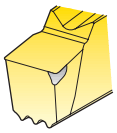
Reduce the feed rate.
Reduce the cutting depth.
Select a tougher grade.
Select an insert with larger radius.

Plastic deformation



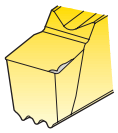
Reduce the cutting speed.
Reduce the feed rate.
Use coolant.
Select a more wear resistant grade.
Select an insert with larger radius.

Rapid flank wear



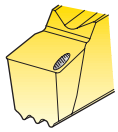
Reduce the cutting speed.

Built-up edge



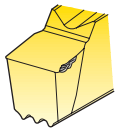
Increase the cutting speed.
Increase the feed rate.
Do not use coolant.

Rapid crater wear



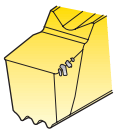
Reduce the cutting speed.
Reduce the feed rate.
Use coolant.
Select a more wear resistant grade.

Chip hammering



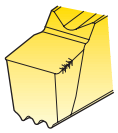
Change the feed rate.
Change the cutting depth.

Chipping



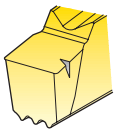
Increase the cutting speed.
Reduce the feed rate.
Select a tougher grade.

Comb cracks



Reduce the cutting speed.
Reduce the feed rate.
Use abundant coolant flow or no coolant at all.

Notch wear



Reduce the cutting speed.
Reduce the feed rate.

Workpiece out of tolerance

Poor surface finish



Reduce the feed rate.

Increase the cutting speed.

Reduce the cutting depth.

Use coolant.

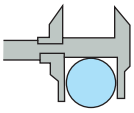
Improve the stability of the tool and workpiece.

Inaccurate square facing



Final facing should be made as radial machining from outside to centre.

Diameter out of tolerance

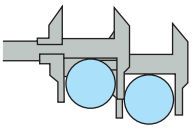


Check the tool length compensation measure.

Reduce the cutting speed.

Select a more wear resistant grade.

Repeatability problems



Keep machining conditions constant.

Check the insert wear.

Diameter variation



After grooving the tool must be retracted in accordance with the compensation measurement before proceeding with turning.

Keep machining conditions constant during turning operation.

Working depths

These working depths can be limited when using double ended inserts because of their design.

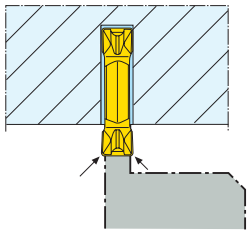
L...13 = CDXI max 11

L...16 = CDXI max 14

L...19 = CDXI max 16

L...28 = CDXI max 26

L...30 = CDXI max 28



Torque values for clamping screws

Screw	Nm
L85011-T15P	5,0
L85012-T15P	5,0
L86015-T20P	6,0
MC6S4..	4,0
MC6S5..	6,0
TCEI04..	3,5
TCEI05..	6,0
TCEI06..	8,0
TCEI08..	10,0
TCEI10..	15,0

Torque keys, please see page(s) 1032-1033.

General recommendations

– Use medium to high feeds for general grooving.

– Use medium to low feeds for precision grooving.

– Always use reverse feed instead of rapid traverse out of grooves.

– Do not use too low cutting depths and feed rates for finishing and semi-finishing turning operations.

– The appropriate deflection must be achieved. Minimum cutting depths and feed rates are shown in the table below.

– When profiling with round inserts do not use cutting depths over 0,4 x the insert diameter.

– Lower the cutting data when using holders with reach CDX ≥5 x CW because the extra length makes them deflect more.

– Maximum overhang with CGGR/L holders should be 3 x the tool diameter.

Minimum cutting depth (a_p) and feed rate (f)

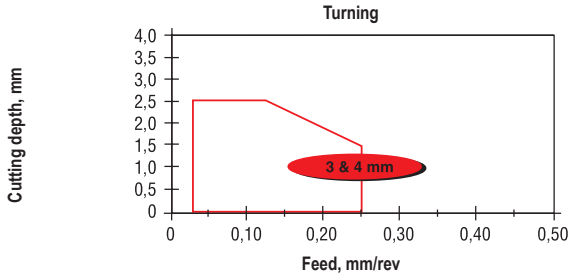
Inserts	Min a_p (mm)	Min f (mm)	Inserts	Min a_p (mm)	Min f (mm)
2-FT	0,15	0,04	5-FT	0,5	0,09
3-FT	0,3	0,05	5-MT	0,5	0,18
3-MT	0,3	0,10	5-MG	0,5	0,10
3-MG	0,5	0,05	5-MC	0,5	0,05
3-MC	0,5	0,05	6-FT	0,6	0,10
4-FT	0,4	0,08	6-MT	0,6	0,20
4-MT	0,4	0,15	6-MG	0,6	0,10
4-MG	0,5	0,10	6-MC	0,5	0,10
4-MC	0,5	0,05	8-FT	0,7	0,25

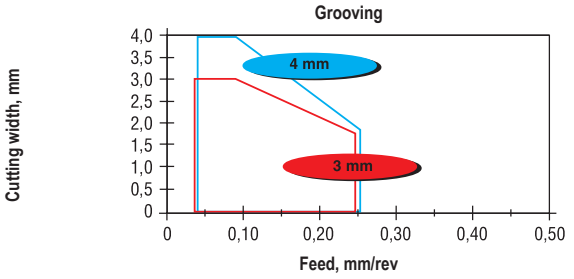
Cutting depth and feed rate recommendations

MDT 13

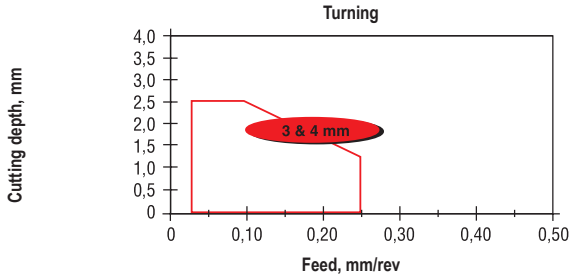
Recommended cutting depths and feed rates for the different insert geometries are found in the charts below.

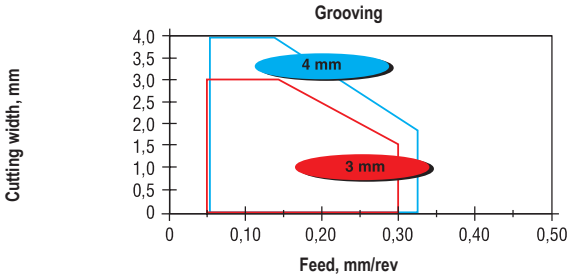
Geometry -FT



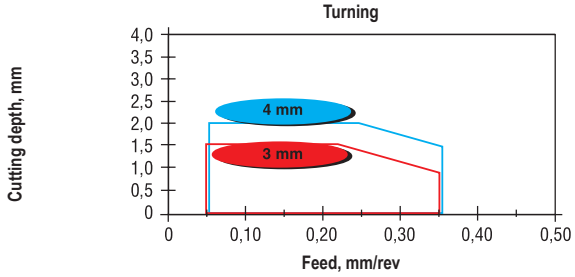


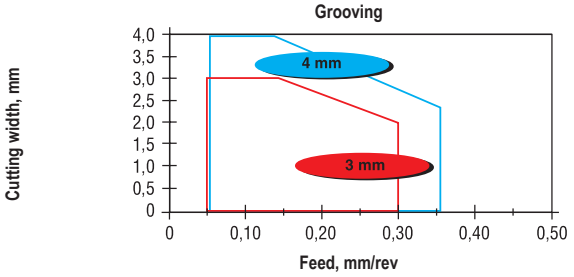
Geometry -MC





Geometry -MP

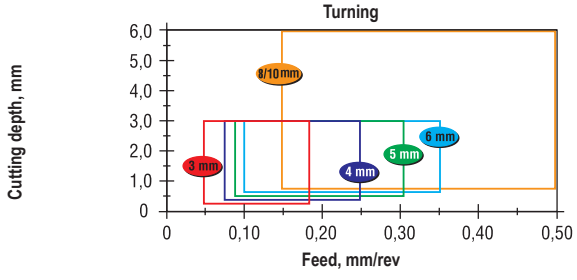


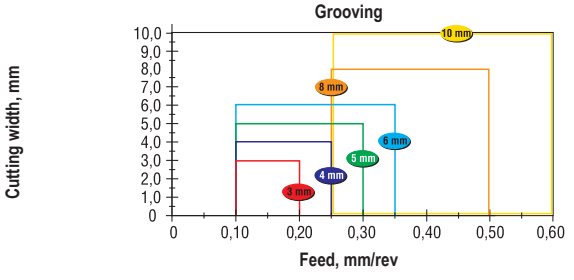


MDT 16 and 30

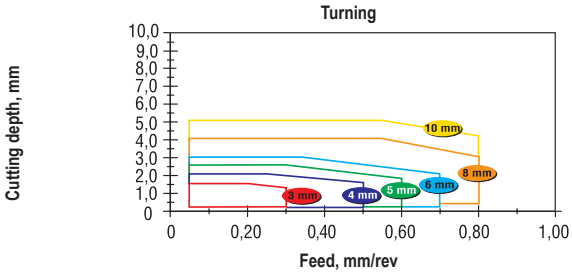
Recommended cutting depths and feed rates for the different insert geometries are found in the charts below.

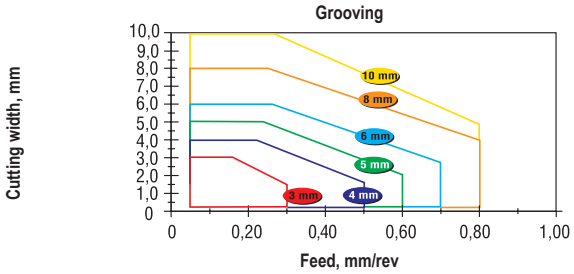
Geometry -FT



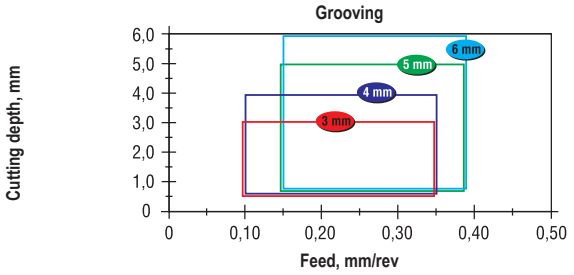


LCGF..-RP

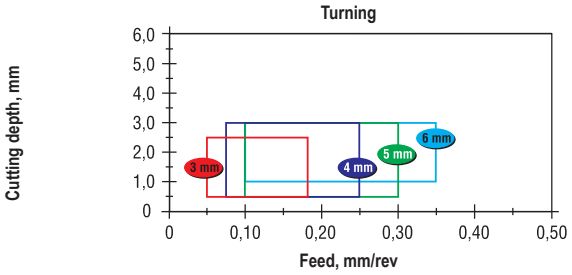


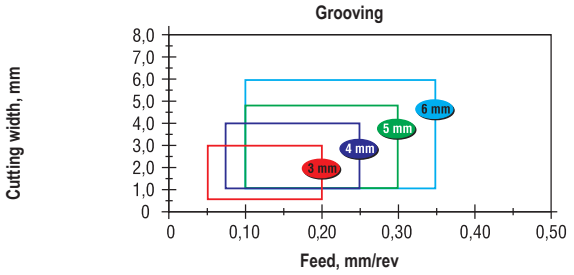


Geometry -MC

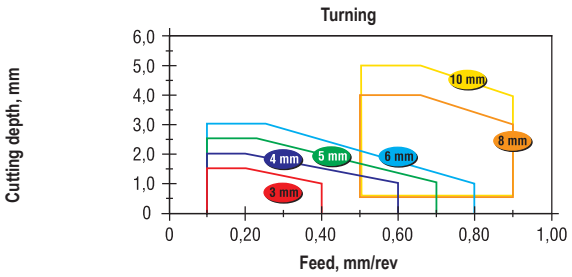


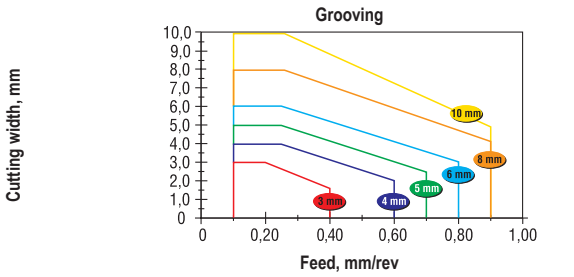
Geometry -MG



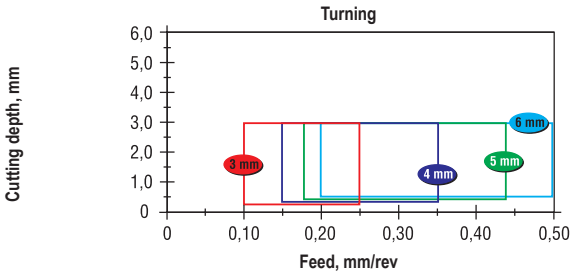


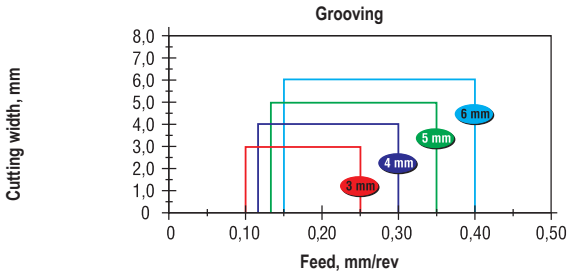
Geometry -MP





Geometry -MT

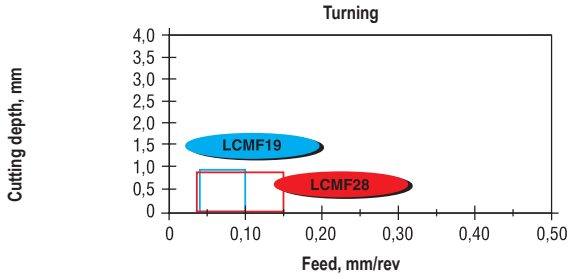


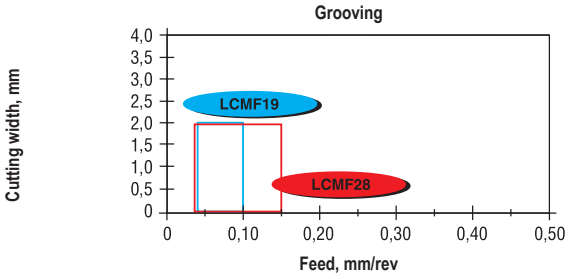


MDT 19 and 28

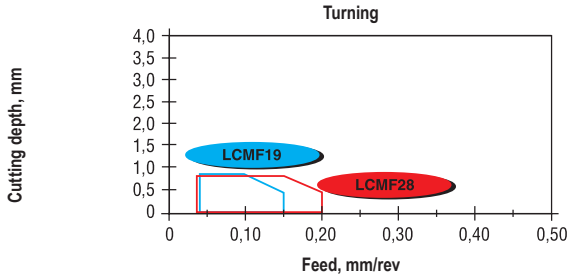
Recommended cutting depths and feed rates for the different insert geometries are found in the charts below.

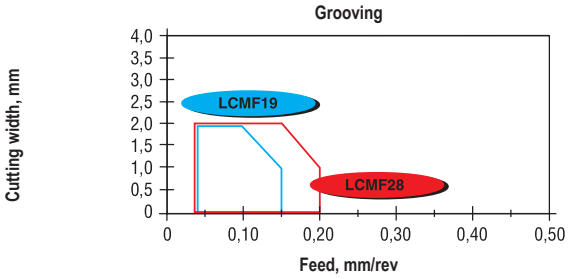
LCMF..-FT





LCMF..-MP





Grade CP500

SMG		CW = 2 *CW = 0.079*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*		CW = 8-10 *CW = 0.315-0.394*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	-FT CP500	0,085 *0.0034*	235 *770*	0,16 *0.0065*	185 *610*	0,19 *0.0075*	175 *570*	0,26 *0.010*	150 *490*	0,36 *0.014*	130 *425*
P2	-FT CP500	0,085 *0.0034*	230 *750*	0,16 *0.0065*	180 *590*	0,19 *0.0075*	170 *560*	0,26 *0.010*	145 *475*	0,36 *0.014*	125 *410*
P3	-FT CP500	0,085 *0.0034*	200 *660*	0,15 *0.0060*	160 *520*	0,18 *0.0070*	150 *490*	0,25 *0.010*	130 *425*	0,34 *0.013*	110 *360*
P4	-FT CP500	0,080 *0.0032*	175 *570*	0,15 *0.0060*	140 *460*	0,18 *0.0070*	130 *425*	0,24 *0.0095*	115 *375*	0,34 *0.013*	100 *330*
P5	-FT CP500	0,080 *0.0032*	170 *560*	0,14 *0.0055*	140 *460*	0,18 *0.0070*	125 *410*	0,24 *0.0095*	110 *360*	0,34 *0.013*	95 *310*
P6	-FT CP500	0,080 *0.0032*	190 *620*	0,14 *0.0055*	155 *510*	0,17 *0.0065*	145 *475*	0,24 *0.0095*	125 *410*	0,32 *0.013*	110 *360*
P7	-FT CP500	0,080 *0.0032*	180 *590*	0,14 *0.0055*	145 *475*	0,17 *0.0065*	135 *445*	0,24 *0.0095*	115 *375*	0,32 *0.013*	100 *330*
P8	-FT CP500	0,085 *0.0034*	165 *540*	0,15 *0.0060*	135 *445*	0,18 *0.0070*	125 *410*	0,25 *0.010*	110 *360*	0,34 *0.013*	95 *310*
P11	-FT CP500	0,080 *0.0032*	175 *570*	0,14 *0.0055*	140 *460*	0,17 *0.0065*	130 *425*	0,24 *0.0095*	115 *375*	0,32 *0.013*	100 *330*
P12	-FT CP500	0,055 *0.0022*	115 *375*	0,10 *0.0040*	95 *310*	0,12 *0.0048*	85 *280*	0,16 *0.0065*	80 *260*	0,22 *0.0085*	70 *230*
M1	-FT CP500	0,085 *0.0034*	265 *870*	0,16 *0.0065*	200 *660*	0,19 *0.0075*	170 *560*	0,26 *0.010*	125 *410*	0,36 *0.014*	80 *260*
M2	-FT CP500	0,080 *0.0032*	215 *710*	0,14 *0.0055*	175 *570*	0,18 *0.0070*	145 *475*	0,24 *0.0095*	110 *360*	0,34 *0.013*	70 *230*
M3	-FT CP500	0,065 *0.0026*	165 *540*	0,12 *0.0048*	145 *475*	0,14 *0.0055*	130 *425*	0,19 *0.0075*	100 *330*	0,26 *0.010*	75 *245*
M4	-FT CP500	0,055 *0.0022*	120 *395*	0,10 *0.0040*	115 *375*	0,12 *0.0048*	105 *345*	0,17 *0.0065*	85 *280*	0,24 *0.0095*	60 *195*
M5	-FT CP500	0,055 *0.0022*	100 *330*	0,10 *0.0040*	95 *310*	0,12 *0.0048*	90 *295*	0,17 *0.0065*	70 *230*	0,24 *0.0095*	50 *165*
K1	-FT CP500	0,085 *0.0034*	215 *710*	0,16 *0.0065*	165 *540*	0,19 *0.0075*	150 *490*	0,26 *0.010*	135 *445*	0,36 *0.014*	115 *375*
K2	-FT CP500	0,080 *0.0032*	190 *620*	0,14 *0.0055*	145 *475*	0,18 *0.0070*	125 *410*	0,24 *0.0095*	105 *345*	0,34 *0.013*	85 *280*
K3	-FT CP500	0,080 *0.0032*	160 *520*	0,14 *0.0055*	120 *395*	0,18 *0.0070*	105 *345*	0,24 *0.0095*	90 *295*	0,34 *0.013*	70 *230*
K4	-FT CP500	0,080 *0.0032*	150 *490*	0,14 *0.0055*	115 *375*	0,18 *0.0070*	100 *330*	0,24 *0.0095*	85 *280*	0,34 *0.013*	70 *230*
K5	-FT CP500	0,070 *0.0028*	95 *310*	0,13 *0.0050*	70 *230*	0,16 *0.0065*	65 *215*	0,22 *0.0085*	55 *180*	0,30 *0.012*	44 *145*
K6	-FT CP500	0,080 *0.0032*	135 *445*	0,14 *0.0055*	105 *345*	0,18 *0.0070*	95 *310*	0,24 *0.0095*	85 *280*	0,34 *0.013*	75 *245*
K7	-FT CP500	0,070 *0.0028*	120 *395*	0,13 *0.0050*	90 *295*	0,16 *0.0065*	80 *260*	0,22 *0.0085*	70 *230*	0,30 *0.012*	55 *180*
N11	-FT CP500	0,11 *0.0044*	140 *460*	0,20 *0.0080*	110 *360*	0,25 *0.010*	100 *330*	0,34 *0.013*	85 *280*	0,46 *0.018*	75 *245*
S1	-FT CP500	0,055 *0.0022*	29 *95*	0,10 *0.0040*	24 *80*	0,12 *0.0048*	22 *70*	0,17 *0.0065*	20 *65*	0,24 *0.0095*	17 *55*
S2	-FT CP500	0,055 *0.0022*	25 *80*	0,10 *0.0040*	21 *70*	0,12 *0.0048*	19 *60*	0,17 *0.0065*	17 *55*	0,24 *0.0095*	15 *49*
S3	-FT CP500	0,050 *0.0020*	22 *70*	0,095 *0.0038*	18 *60*	0,11 *0.0044*	17 *55*	0,15 *0.0060*	15 *49*	0,22 *0.0085*	13 *43*

Grade TGP25

SMG		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6 *CW = 0.236*		CW = 8-10 *CW = 0.315-0.394*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	-FT TGP25	0,16 *0.0065*	380 *1250*	0,19 *0.0075*	345 *1125*	0,24 *0.0095*	300 *980*	0,26 *0.010*	285 *940*	0,36 *0.014*	225 *740*
P2	-FT TGP25	0,16 *0.0065*	370 *1225*	0,19 *0.0075*	335 *1100*	0,24 *0.0095*	290 *950*	0,26 *0.010*	275 *900*	0,36 *0.014*	220 *720*
P3	-FT TGP25	0,15 *0.0060*	270 *890*	0,18 *0.0070*	245 *800*	0,22 *0.0085*	225 *740*	0,25 *0.010*	215 *710*	0,34 *0.013*	185 *610*
P4	-FT TGP25	0,15 *0.0060*	290 *950*	0,18 *0.0070*	260 *850*	0,22 *0.0085*	230 *750*	0,24 *0.0095*	220 *720*	0,34 *0.013*	175 *570*
P5	-FT TGP25	0,14 *0.0055*	230 *750*	0,18 *0.0070*	210 *690*	0,22 *0.0085*	190 *620*	0,24 *0.0095*	180 *590*	0,34 *0.013*	155 *510*
P6	-FT TGP25	0,14 *0.0055*	320 *1050*	0,17 *0.0065*	290 *950*	0,22 *0.0085*	250 *820*	0,24 *0.0095*	235 *770*	0,32 *0.013*	190 *620*
P7	-FT TGP25	0,14 *0.0055*	245 *800*	0,17 *0.0065*	225 *740*	0,22 *0.0085*	200 *660*	0,24 *0.0095*	195 *640*	0,32 *0.013*	170 *560*
P8	-FT TGP25	0,15 *0.0060*	225 *740*	0,18 *0.0070*	210 *690*	0,22 *0.0085*	190 *620*	0,25 *0.010*	180 *590*	0,34 *0.013*	155 *510*
P11	-FT TGP25	0,14 *0.0055*	235 *770*	0,17 *0.0065*	220 *720*	0,22 *0.0085*	195 *640*	0,24 *0.0095*	190 *620*	0,32 *0.013*	165 *540*
P12	-FT TGP25	0,10 *0.0040*	155 *510*	0,12 *0.0048*	145 *475*	0,15 *0.0060*	135 *445*	0,16 *0.0065*	130 *425*	0,22 *0.0085*	115 *375*
M1	-MC TGP25	0,16 *0.0065*	290 *950*	0,19 *0.0075*	265 *870*	0,24 *0.0095*	225 *740*	0,26 *0.010*	205 *670*	0,36 *0.014*	145 *475*
M2	-MC TGP25	0,14 *0.0055*	240 *790*	0,18 *0.0070*	220 *720*	0,22 *0.0085*	190 *620*	0,24 *0.0095*	180 *590*	0,34 *0.013*	125 *410*
M3	-MC TGP25	0,12 *0.0048*	185 *610*	0,14 *0.0055*	180 *590*	0,17 *0.0065*	170 *560*	0,19 *0.0075*	160 *520*	0,26 *0.010*	125 *410*
M4	-MC TGP25	0,10 *0.0040*	140 *460*	0,12 *0.0048*	140 *460*	0,15 *0.0060*	135 *445*	0,17 *0.0065*	125 *410*	0,24 *0.0095*	100 *330*
K1	-MT TGP25	0,18 *0.0070*	260 *850*	0,22 *0.0085*	230 *750*	0,25 *0.010*	215 *710*	0,28 *0.011*	200 *660*	0,38 *0.015*	160 *520*
K2	-MT TGP25	0,16 *0.0065*	175 *570*	0,19 *0.0075*	165 *540*	0,24 *0.0095*	150 *490*	0,25 *0.010*	145 *475*	0,34 *0.013*	125 *410*
K3	-MT TGP25	0,16 *0.0065*	150 *490*	0,19 *0.0075*	140 *460*	0,24 *0.0095*	125 *410*	0,25 *0.010*	125 *410*	0,34 *0.013*	105 *345*
K4	-MT TGP25	0,16 *0.0065*	140 *460*	0,19 *0.0075*	135 *445*	0,24 *0.0095*	120 *395*	0,25 *0.010*	120 *395*	0,34 *0.013*	105 *345*
K5	-MT TGP25	0,15 *0.0060*	85 *280*	0,18 *0.0070*	80 *260*	0,20 *0.0080*	75 *245*	0,22 *0.0085*	75 *245*	0,30 *0.012*	65 *215*
K6	-MT TGP25	0,16 *0.0065*	165 *540*	0,19 *0.0075*	155 *510*	0,24 *0.0095*	135 *445*	0,25 *0.010*	130 *425*	0,34 *0.013*	105 *345*
K7	-MT TGP25	0,15 *0.0060*	110 *360*	0,18 *0.0070*	105 *345*	0,20 *0.0080*	100 *330*	0,22 *0.0085*	95 *310*	0,30 *0.012*	85 *280*

Grade CP600

SMG		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6 *CW = 0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c
P1	-MC CP600	0,090 *0.0036*	215 *710*	0,18 *0.0070*	165 *540*	0,20 *0.0080*	155 *510*	0,22 *0.0085*	150 *490*
P2	-MC CP600	0,090 *0.0036*	210 *690*	0,18 *0.0070*	160 *520*	0,22 *0.0085*	145 *475*	0,24 *0.0095*	140 *460*
P3	-MC CP600	0,085 *0.0034*	185 *610*	0,17 *0.0065*	140 *460*	0,20 *0.0080*	130 *425*	0,22 *0.0085*	125 *410*
P4	-MC CP600	0,085 *0.0034*	160 *520*	0,17 *0.0065*	125 *410*	0,20 *0.0080*	115 *375*	0,22 *0.0085*	110 *360*
P5	-MC CP600	0,085 *0.0034*	155 *510*	0,16 *0.0065*	120 *395*	0,19 *0.0075*	110 *360*	0,22 *0.0085*	105 *345*
P6	-MC CP600	0,085 *0.0034*	175 *570*	0,16 *0.0065*	135 *445*	0,19 *0.0075*	125 *410*	0,22 *0.0085*	120 *395*
P7	-MC CP600	0,085 *0.0034*	165 *540*	0,16 *0.0065*	130 *425*	0,19 *0.0075*	120 *395*	0,22 *0.0085*	110 *360*
P8	-MC CP600	0,085 *0.0034*	155 *510*	0,17 *0.0065*	120 *395*	0,20 *0.0080*	110 *360*	0,22 *0.0085*	105 *345*
P11	-MC CP600	0,085 *0.0034*	160 *520*	0,16 *0.0065*	125 *410*	0,19 *0.0075*	115 *375*	0,22 *0.0085*	110 *360*
P12	-MC CP600	0,055 *0.0022*	105 *345*	0,11 *0.0044*	85 *280*	0,13 *0.0050*	80 *260*	0,14 *0.0055*	75 *245*
M1	-MC CP600	0,090 *0.0036*	245 *800*	0,18 *0.0070*	165 *540*	0,22 *0.0085*	135 *445*	0,24 *0.0095*	125 *410*
M2	-MC CP600	0,085 *0.0034*	200 *660*	0,16 *0.0065*	145 *475*	0,19 *0.0075*	125 *410*	0,22 *0.0085*	110 *360*
M3	-MC CP600	0,065 *0.0026*	155 *510*	0,13 *0.0050*	125 *410*	0,15 *0.0060*	115 *375*	0,17 *0.0065*	105 *345*
M4	-MC CP600	0,060 *0.0024*	115 *375*	0,11 *0.0044*	100 *330*	0,14 *0.0055*	90 *295*	0,15 *0.0060*	85 *280*
M5	-MC CP600	0,060 *0.0024*	95 *310*	0,11 *0.0044*	85 *280*	0,14 *0.0055*	75 *245*	0,15 *0.0060*	70 *230*
K1	-MC CP600	0,090 *0.0036*	195 *640*	0,18 *0.0070*	145 *475*	0,22 *0.0085*	135 *445*	0,24 *0.0095*	130 *425*
K2	-MC CP600	0,085 *0.0034*	170 *560*	0,16 *0.0065*	125 *410*	0,19 *0.0075*	115 *375*	0,22 *0.0085*	105 *345*
K3	-MC CP600	0,085 *0.0034*	145 *475*	0,16 *0.0065*	105 *345*	0,19 *0.0075*	95 *310*	0,22 *0.0085*	90 *295*
K4	-MC CP600	0,085 *0.0034*	140 *460*	0,16 *0.0065*	100 *330*	0,19 *0.0075*	90 *295*	0,22 *0.0085*	85 *280*
K5	-MC CP600	0,075 *0.0030*	85 *280*	0,15 *0.0060*	60 *195*	0,17 *0.0065*	55 *180*	0,19 *0.0075*	55 *180*
K6	-MC CP600	0,085 *0.0034*	120 *395*	0,16 *0.0065*	95 *310*	0,19 *0.0075*	85 *280*	0,22 *0.0085*	80 *260*
K7	-MC CP600	0,075 *0.0030*	110 *360*	0,15 *0.0060*	80 *260*	0,17 *0.0065*	75 *245*	0,19 *0.0075*	70 *230*
N11	-MC CP600	0,12 *0.0048*	130 *425*	0,22 *0.0085*	100 *330*	0,28 *0.011*	90 *295*	0,30 *0.012*	85 *280*
S1	-MC CP600	0,060 *0.0024*	26 *85*	0,11 *0.0044*	21 *70*	0,14 *0.0055*	20 *65*	0,15 *0.0060*	19 *60*
S2	-MC CP600	0,060 *0.0024*	23 *75*	0,11 *0.0044*	19 *60*	0,14 *0.0055*	17 *55*	0,15 *0.0060*	16 *50*
S3	-MC CP600	0,055 *0.0022*	20 *65*	0,11 *0.0044*	16 *50*	0,13 *0.0050*	15 *49*	0,14 *0.0055*	15 *49*

Grade CP600

SMG		CW = 2 *CW = 0.079*	
		f	v_c
P1	-FT CP600	0,085 *0.0034*	210 *690*
P2	-FT CP600	0,090 *0.0036*	200 *660*
P3	-FT CP600	0,085 *0.0034*	175 *570*
P4	-FT CP600	0,080 *0.0032*	160 *520*
P5	-FT CP600	0,080 *0.0032*	150 *490*
P6	-FT CP600	0,080 *0.0032*	170 *560*
P7	-FT CP600	0,080 *0.0032*	160 *520*
P8	-FT CP600	0,085 *0.0034*	150 *490*
P11	-FT CP600	0,080 *0.0032*	155 *510*
P12	-FT CP600	0,055 *0.0022*	100 *330*
M1	-FT CP600	0,090 *0.0036*	240 *790*
M2	-FT CP600	0,080 *0.0032*	195 *640*
M3	-FT CP600	0,065 *0.0026*	155 *510*
M4	-FT CP600	0,055 *0.0022*	115 *375*
M5	-FT CP600	0,055 *0.0022*	95 *310*
K1	-FT CP600	0,090 *0.0036*	185 *610*
K2	-FT CP600	0,080 *0.0032*	165 *540*
K3	-FT CP600	0,080 *0.0032*	140 *460*
K4	-FT CP600	0,080 *0.0032*	135 *445*
K5	-FT CP600	0,070 *0.0028*	85 *280*
K6	-FT CP600	0,080 *0.0032*	120 *395*
K7	-FT CP600	0,070 *0.0028*	105 *345*
N11	-FT CP600	0,11 *0.0044*	125 *410*
S1	-FT CP600	0,055 *0.0022*	26 *85*
S2	-FT CP600	0,055 *0.0022*	22 *70*
S3	-FT CP600	0,055 *0.0022*	19 *60*

Grade TGH1050

SMG		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6 *CW = 0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c
H3	-MP TGH1050	0,070 *0.0028*	48 *155*	0,080 *0.0032*	47 *155*	0,085 *0.0034*	47 *155*	0,085 *0.0034*	47 *155*
H5	-MP TGH1050	0,11 *0.0044*	85 *280*	0,12 *0.0048*	85 *280*	0,13 *0.0050*	80 *260*	0,13 *0.0050*	80 *260*
H7	-MP TGH1050	0,070 *0.0028*	48 *155*	0,080 *0.0032*	47 *155*	0,085 *0.0034*	47 *155*	0,085 *0.0034*	47 *155*
H8	-MP TGH1050	0,080 *0.0032*	90 *295*	0,090 *0.0036*	85 *280*	0,095 *0.0038*	85 *280*	0,10 *0.0040*	85 *280*
H11	-MP TGH1050	0,11 *0.0044*	110 *360*	0,12 *0.0048*	105 *345*	0,13 *0.0050*	105 *345*	0,13 *0.0050*	105 *345*
H12	-MP TGH1050	0,080 *0.0032*	100 *330*	0,090 *0.0036*	100 *330*	0,095 *0.0038*	100 *330*	0,10 *0.0040*	100 *330*
H21	-MP TGH1050	0,080 *0.0032*	90 *295*	0,090 *0.0036*	85 *280*	0,095 *0.0038*	85 *280*	0,10 *0.0040*	85 *280*
H31	-MP TGH1050	0,070 *0.0028*	65 *215*	0,080 *0.0032*	65 *215*	0,085 *0.0034*	65 *215*	0,085 *0.0034*	65 *215*

Grade TGK1500

SMG		CW = 2 *CW = 0.079*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6-8 *CW = 0.236-0.315*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
K1	-MT, -FT TGK1500	0,10 *0.0040*	295 *970*	0,18 *0.0070*	230 *750*	0,22 *0.0085*	205 *670*	0,26 *0.010*	185 *610*	0,30 *0.012*	165 *540*
K2	-MT, -FT TGK1500	0,095 *0.0038*	180 *590*	0,16 *0.0065*	155 *510*	0,20 *0.0080*	145 *475*	0,24 *0.0095*	135 *445*	0,28 *0.011*	125 *410*
K3	-MT, -FT TGK1500	0,095 *0.0038*	150 *490*	0,16 *0.0065*	130 *425*	0,20 *0.0080*	120 *395*	0,24 *0.0095*	110 *360*	0,28 *0.011*	105 *345*
K4	-MT, -FT TGK1500	0,095 *0.0038*	145 *475*	0,16 *0.0065*	125 *410*	0,20 *0.0080*	115 *375*	0,24 *0.0095*	105 *345*	0,28 *0.011*	100 *330*
K5	-MT, -FT TGK1500	0,085 *0.0034*	90 *295*	0,15 *0.0060*	75 *245*	0,19 *0.0075*	70 *230*	0,22 *0.0085*	65 *215*	0,25 *0.010*	60 *195*
K6	-MT, -FT TGK1500	0,095 *0.0038*	180 *590*	0,16 *0.0065*	150 *490*	0,20 *0.0080*	130 *425*	0,24 *0.0095*	120 *395*	0,28 *0.011*	105 *345*
K7	-MT, -FT TGK1500	0,085 *0.0034*	110 *360*	0,15 *0.0060*	95 *310*	0,19 *0.0075*	90 *295*	0,22 *0.0085*	85 *280*	0,25 *0.010*	80 *260*

Grade 883

SMG		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6 *CW = 0.236*		CW = 8-10 *CW = 0.315-0.394*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
K1	-MT 883, 890	0,19 *0.0075*	95 *310*	0,22 *0.0085*	90 *295*	0,26 *0.010*	80 *260*	0,28 *0.011*	80 *260*	0,38 *0.015*	65 *215*
K2	-MT 883, 890	0,17 *0.0065*	85 *280*	0,20 *0.0080*	80 *260*	0,24 *0.0095*	75 *245*	0,25 *0.010*	70 *230*	0,34 *0.013*	60 *195*
K3	-MT 883, 890	0,17 *0.0065*	70 *230*	0,20 *0.0080*	65 *215*	0,24 *0.0095*	60 *195*	0,25 *0.010*	60 *195*	0,34 *0.013*	50 *165*
K4	-MT 883, 890	0,17 *0.0065*	70 *230*	0,20 *0.0080*	65 *215*	0,24 *0.0095*	60 *195*	0,25 *0.010*	55 *180*	0,34 *0.013*	49 *160*
K5	-MT 883, 890	0,15 *0.0060*	43 *140*	0,18 *0.0070*	40 *130*	0,20 *0.0080*	37 *120*	0,22 *0.0085*	36 *120*	0,30 *0.012*	31 *100*
K6	-MT 883, 890	0,17 *0.0065*	60 *195*	0,20 *0.0080*	55 *180*	0,24 *0.0095*	50 *165*	0,25 *0.010*	50 *165*	0,34 *0.013*	43 *140*
K7	-MT 883, 890	0,15 *0.0060*	55 *180*	0,18 *0.0070*	50 *165*	0,20 *0.0080*	48 *155*	0,22 *0.0085*	46 *150*	0,30 *0.012*	40 *130*
N1	-MT 883, 890	0,24 *0.0095*	275 *900*	0,28 *0.011*	255 *840*	0,32 *0.013*	235 *770*	0,36 *0.014*	220 *720*	0,48 *0.019*	190 *620*
N2	-MT 883, 890	0,24 *0.0095*	220 *720*	0,28 *0.011*	205 *670*	0,32 *0.013*	190 *620*	0,36 *0.014*	180 *590*	0,48 *0.019*	155 *510*
N3	-MT 883, 890	0,24 *0.0095*	145 *475*	0,28 *0.011*	135 *445*	0,32 *0.013*	125 *410*	0,36 *0.014*	120 *395*	0,48 *0.019*	100 *330*
N11	-MT 883, 890	0,24 *0.0095*	170 *560*	0,28 *0.011*	155 *510*	0,32 *0.013*	145 *475*	0,36 *0.014*	135 *445*	0,48 *0.019*	115 *375*
S1	-MT 883, 890	0,12 *0.0048*	19 *60*	0,14 *0.0055*	18 *60*	0,16 *0.0065*	17 *55*	0,18 *0.0070*	16 *50*	0,24 *0.0095*	14 *46*
S2	-MT 883, 890	0,12 *0.0048*	15 *49*	0,14 *0.0055*	14 *46*	0,16 *0.0065*	14 *46*	0,18 *0.0070*	13 *43*	0,24 *0.0095*	11 *36*
S3	-MT 883, 890	0,11 *0.0044*	14 *46*	0,13 *0.0050*	13 *43*	0,15 *0.0060*	12 *39*	0,17 *0.0065*	11 *36*	0,22 *0.0085*	10 *33*
S11	-MT 883, 890	0,13 *0.0050*	27 *90*	0,16 *0.0065*	25 *80*	0,19 *0.0075*	23 *75*	0,20 *0.0080*	22 *70*	0,28 *0.011*	19 *60*
S12	-MT 883, 890	0,13 *0.0050*	21 *70*	0,16 *0.0065*	19 *60*	0,19 *0.0075*	18 *60*	0,20 *0.0080*	17 *55*	0,28 *0.011*	15 *49*
S13	-MT 883, 890	0,12 *0.0048*	16 *50*	0,14 *0.0055*	15 *49*	0,16 *0.0065*	15 *49*	0,18 *0.0070*	14 *46*	0,24 *0.0095*	12 *39*
H5	-MT 883, 890	0,11 *0.0044*	33 *110*	0,13 *0.0050*	31 *100*	0,16 *0.0065*	28 *90*	0,17 *0.0065*	28 *90*	0,24 *0.0095*	24 *80*

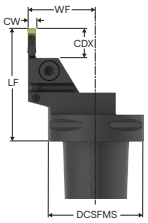
Grade CP200

SMG		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5 *CW = 0.197*		CW = 6 *CW = 0.236*		CW = 8 *CW = 0.315*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
M1	-FT CP200	0,16 *0.0065*	210 *690*	0,19 *0.0075*	180 *590*	0,24 *0.0095*	145 *475*	0,26 *0.010*	130 *425*	0,36 *0.014*	85 *280*
M2	-FT CP200	0,14 *0.0055*	185 *610*	0,18 *0.0070*	155 *510*	0,22 *0.0085*	125 *410*	0,24 *0.0095*	115 *375*	0,32 *0.013*	80 *260*
M3	-FT CP200	0,12 *0.0048*	150 *490*	0,14 *0.0055*	135 *445*	0,17 *0.0065*	120 *395*	0,19 *0.0075*	110 *360*	0,26 *0.010*	75 *245*
M4	-FT CP200	0,10 *0.0040*	120 *395*	0,12 *0.0048*	110 *360*	0,15 *0.0060*	95 *310*	0,17 *0.0065*	90 *295*	0,22 *0.0085*	70 *230*
M5	-FT CP200	0,10 *0.0040*	100 *330*	0,12 *0.0048*	95 *310*	0,15 *0.0060*	80 *260*	0,17 *0.0065*	75 *245*	0,22 *0.0085*	55 *180*
S1	-FT CP200	0,10 *0.0040*	28 *90*	0,12 *0.0048*	26 *85*	0,15 *0.0060*	24 *80*	0,17 *0.0065*	23 *75*	0,22 *0.0085*	20 *65*
S2	-FT CP200	0,10 *0.0040*	22 *70*	0,12 *0.0048*	21 *70*	0,15 *0.0060*	19 *60*	0,17 *0.0065*	18 *60*	0,22 *0.0085*	16 *50*
S3	-FT CP200	0,095 *0.0038*	19 *60*	0,11 *0.0044*	18 *60*	0,14 *0.0055*	17 *55*	0,15 *0.0060*	16 *50*	0,20 *0.0080*	15 *49*
S11	-FT CP200	0,12 *0.0048*	38 *125*	0,14 *0.0055*	35 *115*	0,17 *0.0065*	33 *110*	0,19 *0.0075*	31 *100*	0,26 *0.010*	27 *90*
S12	-FT CP200	0,12 *0.0048*	29 *95*	0,14 *0.0055*	27 *90*	0,17 *0.0065*	25 *80*	0,19 *0.0075*	24 *80*	0,26 *0.010*	21 *70*
S13	-FT CP200	0,10 *0.0040*	24 *80*	0,12 *0.0048*	22 *70*	0,15 *0.0060*	20 *65*	0,17 *0.0065*	19 *60*	0,22 *0.0085*	17 *55*

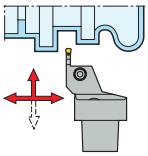
C.-CFIR/L...JETI – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



C.-CFIR/L...JETI



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFIR-27060-03JETI	03331345	C4	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFIL-27060-03JETI	03331342	C4	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFIR-27060-04JETI	03331346	C4	40,0 *1.575*	27,0 *1.063*	60 *2.362*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C4-CFIL-27060-04JETI	03331343	C4	40,0 *1.575*	27,0 *1.063*	60 *2.362*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C4-CFIR-27065-05JETI	03331347	C4	40,0 *1.575*	27,0 *1.063*	65 *2.559*	16,5 *0.650*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C4-CFIL-27065-05JETI	03331344	C4	40,0 *1.575*	27,0 *1.063*	65 *2.559*	16,5 *0.650*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFIR-35060-03JETI	03331368	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFIL-35060-03JETI	03331364	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFIR-35065-04JETI	03331369	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFIL-35065-04JETI	03331365	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFIR-35065-05JETI	03331370	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFIL-35065-05JETI	03331366	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFIR-35075-06JETI	03331371	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C5-CFIL-35075-06JETI	03331367	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFIR-45065-03JETI	03331397	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFIL-45065-03JETI	03331392	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFIR-45065-04JETI	03331398	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	1,0 *2.200*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFIL-45065-04JETI	03331393	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	150,0 bar *2175,6*	1,0 *2.200*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFIR-45070-05JETI	03331399	C6	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFIL-45070-05JETI	03331394	C6	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFIR-45075-06JETI	03331400	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	6,0 *53.1*	LC..1606..

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFIL-45075-06JETI	03331395	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFIR-45085-08JETI	03331401	C6	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	15,0 *132.8*	LC..3008..
C6-CFIL-45085-08JETI	03331396	C6	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	15,0 *132.8*	LC..3008..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CFIR/L..-03	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM
CFIR/L..-04	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFIR/L..-05	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFIR/L..-06	6SMS795	TCEI0815	P6SS4X4	JET-P1/16-5MM
CFIR/L..-08	6SMS795	TCEI1020	P6SS4X4	JET-P1/16-5MM

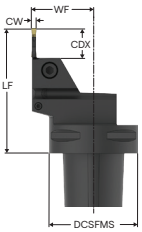
Accessories

For	DUO Coolant plug key	Key
		
CFIR/L..-03	2SMS795	–
CFIR/L..-04	2SMS795	4SMS795
CFIR/L..-05	2SMS795	4SMS795
CFIR/L..-06	2SMS795	4SMS795
CFIR/L..-08	2SMS795	4SMS795

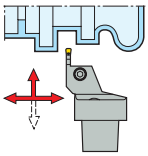
C.-CFMR/L...JETI – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



C.-CFMR/L...JETI



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFMR-27070-03JETI	03331350	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFML-27070-03JETI	03331348	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFMR-27070-04JETI	03331351	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C4-CFML-27070-04JETI	03331349	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFMR-35070-03JETI	03331376	C5	50,0 *1.969*	35,0 *1.378*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFML-35070-03JETI	03331372	C5	50,0 *1.969*	35,0 *1.378*	70 *2.756*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFMR-35075-04JETI	03331377	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFML-35075-04JETI	03331373	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFMR-35075-05JETI	03331378	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	25,0 *0.984*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFML-35075-05JETI	03331374	C5	50,0 *1.969*	35,0 *1.378*	75 *2.953*	25,0 *0.984*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFMR-35085-06JETI	03331379	C5	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C5-CFML-35085-06JETI	03331375	C5	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFMR-45080-03JETI	03331406	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFML-45080-03JETI	03331402	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	15,0 *0.591*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFMR-45080-04JETI	03331407	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFML-45080-04JETI	03331403	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	20,0 *0.787*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFMR-45080-05JETI	03331408	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	25,0 *0.984*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFML-45080-05JETI	03331404	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	25,0 *0.984*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFMR-45085-06JETI	03331409	C6	63,0 *2.480*	45,0 *1.772*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFML-45085-06JETI	03331405	C6	63,0 *2.480*	45,0 *1.772*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	6,0 *53.1*	LC..1606..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CFMR/L..-03	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM
CFMR/L..-04	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFMR/L..-05	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFMR/L..-06	6SMS795	TCEI0815	P6SS4X4	JET-P1/16-5MM

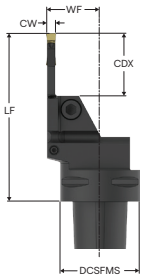
Accessories

For	DUO Coolant plug key	Key
		
CFMR/L..-03	2SMS795	–
CFMR/L..-04	2SMS795	4SMS795
CFMR/L..-05	2SMS795	4SMS795
CFMR/L..-06	2SMS795	4SMS795

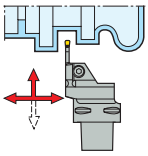
C.-CFOR/L...JETI – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



C.-CFOR/L...JETI



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFOR-27070-03-JETI	03331355	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	19,5 *0.768*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFOL-27070-03-JETI	03331352	C4	40,0 *1.575*	27,0 *1.063*	70 *2.756*	19,5 *0.768*	195,0 *7.677*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C4-CFOR-27080-04-JETI	03331356	C4	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C4-CFOL-27080-04-JETI	03331353	C4	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C4-CFOR-27085-05-JETI	03331357	C4	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C4-CFOL-27085-05-JETI	03331354	C4	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFOR-35070-03-JETI	03331384	C5	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFOL-35070-03-JETI	03331380	C5	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C5-CFOR-35080-04-JETI	03331385	C5	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFOL-35080-04-JETI	03331381	C5	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C5-CFOR-35085-05-JETI	03331386	C5	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFOL-35085-05-JETI	03331382	C5	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	0,9 *1.980*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C5-CFOR-35100-06-JETI	03331387	C5	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	195,0 *7.677*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C5-CFOL-35100-06-JETI	03331383	C5	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	195,0 *7.677*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFOR-45075-03-JETI	03331415	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFOL-45075-03-JETI	03331410	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CFOR-45080-04-JETI	03331416	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFOL-45080-04-JETI	03331411	C6	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CFOR-45090-05-JETI	03331417	C6	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFOL-45090-05-JETI	03331412	C6	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	195,0 *7.677*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CFOR-45100-06-JETI	03331418	C6	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	195,0 *7.677*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	6,0 *53.1*	LC..1606..

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFOL-45100-06-JETI	03331413	C6	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	195,0 *7.677*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CFOR-45115-08-JETI	03331419	C6	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	195,0 *7.677*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	15,0 *132.8*	LC..3008..
C6-CFOL-45115-08-JETI	03331414	C6	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	195,0 *7.677*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	15,0 *132.8*	LC..3008..

Spare Parts, included in delivery

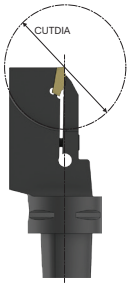
For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CFOR/L..-03	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM
CFOR/L..-04	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFOR/L..-05	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CFOR/L..-06	6SMS795	TCEI0815	P6SS4X4	JET-P1/16-5MM
CFOR/L..-08	6SMS795	TCEI1020	P6SS4X4	JET-P1/16-5MM

Accessories

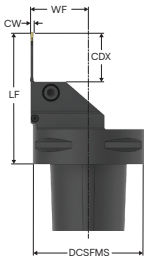
For	DUO Coolant plug key	Key
		
CFOR/L..-03	2SMS795	–
CFOR/L..-04	2SMS795	4SMS795
CFOR/L..-05	2SMS795	4SMS795
CFOR/L..-06	2SMS795	4SMS795
CFOR/L..-08	2SMS795	4SMS795

C.-CZFR/L...JETI – Toolholders for inserts LCMF – Metric/ Inch

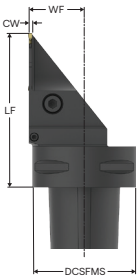




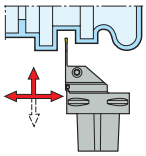
C.-CZFR/L...JETI



C.-CZFR/L...RBJETI



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	CUTDIA*	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFZR-22075-2802JETI	03331362	C4	40,0 *1.575*	22,0 *0.866*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	0,5 *1.100*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C4-CFZL-22075-2802JETI	03331359	C4	40,0 *1.575*	22,0 *0.866*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	0,5 *1.100*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C5-CFZR-27075-2802JETI	03331390	C5	50,0 *1.969*	27,0 *1.063*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	0,8 *1.760*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C5-CFZL-27075-2802JETI	03331388	C5	50,0 *1.969*	27,0 *1.063*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	0,7 *1.540*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C6-CFZR-33075-2802JETI	03331422	C6	63,0 *2.480*	33,0 *1.299*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	1,0 *2.200*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C6-CFZL-33075-2802JETI	03331420	C6	63,0 *2.480*	33,0 *1.299*	75,0 *2.953*	26,0 *1.024*	–	150,0 bar *2175,6*	1,0 *2.200*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C4-CFZR-22075-2802RBJETI	03331363	C4	40,0 *1.575*	22,0 *0.866*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	0,6 *1.320*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C4-CFZL-22075-2802RBJETI	03331360	C4	40,0 *1.575*	22,0 *0.866*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	0,6 *1.320*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C5-CFZR-27075-2802RBJETI	03331391	C5	50,0 *1.969*	27,0 *1.063*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	0,7 *1.540*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C5-CFZL-27075-2802RBJETI	03331389	C5	50,0 *1.969*	27,0 *1.063*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	0,8 *1.760*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C6-CFZR-33075-2802RBJETI	03331423	C6	63,0 *2.480*	33,0 *1.299*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	1,1 *2.430*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C6-CFZL-33075-2802RBJETI	03331421	C6	63,0 *2.480*	33,0 *1.299*	75,0 *2.953*	26,0 *1.024*	52,0 *2.047*	150,0 bar *2175,6*	1,2 *2.650*	2,0 *0.079*	6,0 *53.1*	LC..2802..

Spare Parts, included in delivery

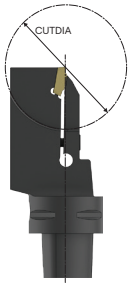
For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CFZR/L..-02	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM

Accessories

For	DUO Coolant plug key
	
CFZR/L..-02	2SMS795

C.-CF.N-.RBJETI – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch

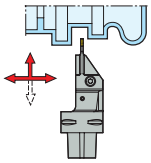




C.-CF.N



KAPR = 90,0 °



CTWS



—Neutral version shown
—For inserts program, see page(s) 845-859, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CUTDIA*	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFZN-00075-2802RBJETI	03331361	C4	40,0 *1.575*	1,0 *0.039*	75,0 *2.953*	52,0 *2.047*	150,0 bar *2175,6*	0,5 *1.100*	2,0 *0.079*	6,0 *53.1*	LC..2802..
C4-CFXN-00090-03RBJETI	03331358	C4	40,0 *1.575*	1,5 *0.059*	90,0 *3.543*	64,0 *2.520*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	6,0 *53.1*	LC..1603..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CFZN/CFXN	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM

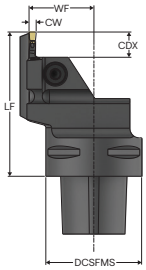
Accessories

For	DUO Coolant plug key
	
CFZN/CFXN	2SMS795

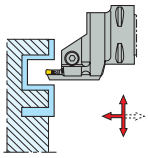
C.-CFIR...L...JET, C.-CFIL...R...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



CFIR...L...JET, CFIL...R...JET

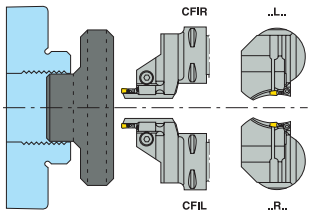


KAPR = 90,0 °



CTWS





—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFIR-27060-03L080055-JET	02718475	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIR-27060-03L100070-JET	02718476	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIR-27060-03L130090-JET	02718477	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIR-27060-03L170110-JET	02718478	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,4 *0.880*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIL-27060-03R080055-JET	02717469	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIL-27060-03R100070-JET	02718462	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIL-27060-03R130090-JET	02718463	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIL-27060-03R170110-JET	02718464	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,4 *0.880*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFIR-27065-04L080055-JET	02718479	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27065-04L100070-JET	02718480	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27065-04L130090-JET	02718481	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27065-04L170110-JET	02718482	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27065-04L230140-JET	02718483	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27065-04R080055-JET	02718465	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27065-04R100070-JET	02718466	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27065-04R130090-JET	02718467	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27065-04R170110-JET	02718468	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27065-04R230140-JET	02718469	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27065-05L080055-JET	02718484	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIR-27065-05L100070-JET	02718485	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIR-27065-05L130090-JET	02718486	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..

Designation	Item number	CTMS	INPLM mm *inch*	INPLX mm *inch*	DCSFMS mm *inch*	WF mm *inch*	LF mm *inch*	CDX mm *inch*	CP bar *psi*	Weight kg *lbs*	CW mm *inch*	TQ Nm *In/Lbs.*	CTWS
C4-CFIR-27065-05L170110-JET	02718487	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,4 *0.880*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIR-27065-05L230140-JET	02718488	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27065-05R080055-JET	02718470	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27065-05R100070-JET	02718471	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27065-05R130090-JET	02718472	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27065-05R170110-JET	02718473	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,4 *0.880*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27065-05R230140-JET	02718474	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,4 *0.880*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35060-03L080055-JET	02718508	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIR-35060-03L100070-JET	02718509	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIR-35060-03L130090-JET	02718510	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIR-35060-03L170110-JET	02718511	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIL-35060-03R080055-JET	02718489	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIL-35060-03R100070-JET	02718490	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIL-35060-03R130090-JET	02718491	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIL-35060-03R170110-JET	02718492	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFIR-35065-04L080055-JET	02718512	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35065-04L100070-JET	02718513	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35065-04L130090-JET	02718514	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35065-04L170110-JET	02718515	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35065-04L230140-JET	02718516	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35065-04R080055-JET	02718493	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35065-04R100070-JET	02718494	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35065-04R130090-JET	02718495	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35065-04R170110-JET	02718496	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35065-04R230140-JET	02718497	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35065-05L080055-JET	02718517	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35065-05L100070-JET	02718518	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35065-05L130090-JET	02718519	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35065-05L170110-JET	02718520	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35065-05L230140-JET	02718521	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35065-05R080055-JET	02718498	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35065-05R100070-JET	02718499	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35065-05R130090-JET	02718500	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35065-05R170110-JET	02718501	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,6 *1.320*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35065-05R230140-JET	02718502	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	65 *2.559*	15,0 *0.591*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..

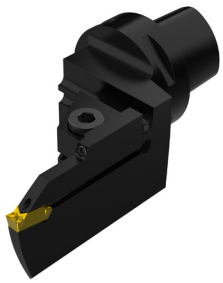
Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C5-CFIR-35075-06L080055-JET	02718522	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIR-35075-06L100070-JET	02718523	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIR-35075-06L130090-JET	02718524	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIR-35075-06L170110-JET	02718525	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,6 *1.320*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIR-35075-06L230140-JET	02718526	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIL-35075-06R080055-JET	02718503	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIL-35075-06R100070-JET	02718504	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,6 *1.320*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIL-35075-06R130090-JET	02718505	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIL-35075-06R170110-JET	02718506	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,6 *1.320*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFIL-35075-06R230140-JET	02718507	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	0,8 *1.760*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45065-03L080055-JET	02718550	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIR-45065-03L100070-JET	02718551	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIR-45065-03L130090-JET	02718552	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIR-45065-03L170110-JET	02718553	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIL-45065-03R080055-JET	02718527	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIL-45065-03R100070-JET	02718528	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIL-45065-03R130090-JET	02718529	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIL-45065-03R170110-JET	02718530	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFIR-45065-04L080055-JET	02718554	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45065-04L100070-JET	02718555	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45065-04L130090-JET	02718556	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45065-04L170110-JET	02718557	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45065-04L230140-JET	02718558	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04R080055-JET	02718531	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04R100070-JET	02718532	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04R130090-JET	02718533	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04R170110-JET	02718534	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04R230140-JET	02718535	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45070-05L080055-JET	02718559	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45070-05L100070-JET	02718560	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45070-05L130090-JET	02718561	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45070-05L170110-JET	02718562	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45070-05L230140-JET	02718563	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIL-45070-05R080055-JET	02718536	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIL-45070-05R100070-JET	02718537	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFIL-45070-05R130090-JET	02718538	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIL-45070-05R170110-JET	02718539	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIL-45070-05R230140-JET	02718540	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	70 *2.756*	15,0 *0.591*	150,0 bar *2175,6*	1,1 *2.430*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45075-06L080055-JET	02718564	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45075-06L100070-JET	02718565	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45075-06L130090-JET	02718566	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45075-06L170110-JET	02718567	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45075-06L230140-JET	02718568	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIL-45075-06R080055-JET	02718541	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIL-45075-06R100070-JET	02718542	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIL-45075-06R130090-JET	02718543	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIL-45075-06R170110-JET	02718544	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIL-45075-06R230140-JET	02718545	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFIR-45085-08L130090-JET	02718569	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	5,0 *44.3*	LC..3008..
C6-CFIR-45085-08L170110-JET	02718570	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	5,0 *44.3*	LC..3008..
C6-CFIR-45085-08L230140-JET	02718571	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	5,0 *44.3*	LC..3008..
C6-CFIR-45085-08L500200-JET	02718572	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	8,0 *0.315*	5,0 *44.3*	LC..3008..
C6-CFIL-45085-08R130090-JET	02718546	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFIL-45085-08R170110-JET	02718547	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFIL-45085-08R230140-JET	02718548	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFIL-45085-08R500200-JET	02718549	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	85 *3.346*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	8,0 *0.315*	10,0 *88.5*	LC..3008..

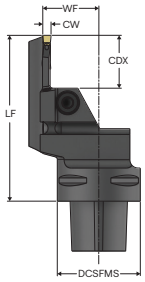
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFIR/L..-03	4SMS795	TCEI0513
CFIR/L..-04	5SMS795	TCEI0613
CFIR/L..-05	5SMS795	TCEI0613
CFIR/L..-06	6SMS795	TCEI0815
CFIR/L..-08	6SMS795	TCEI1020

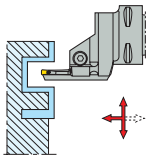
C.-CFOR...L...JET, C.-CFOL...R...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



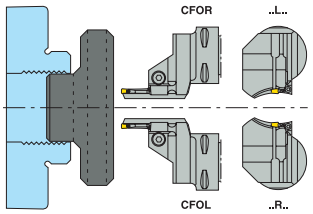
CFOR...L...JET, CFOL...R...JET



KAPR = 90,0 °



CTWS



—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFOR-27070-03L080055-JET	02718585	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03L100070-JET	02718586	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03L130090-JET	02718587	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03L170110-JET	02718588	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03L230140-JET	02718589	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03L500200-JET	02718590	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R080055-JET	02718573	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R100070-JET	02718574	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R130090-JET	02718575	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R170110-JET	02718576	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R230140-JET	02718577	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03R500200-JET	02718578	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27080-04L080055-JET	02718591	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04L100070-JET	02718592	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04L130090-JET	02718593	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04L170110-JET	02718594	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04L230140-JET	02718595	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04L500200-JET	02718596	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04R080055-JET	02714035	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04R100070-JET	02714037	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04R130090-JET	02714038	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFOL-27080-04R170110-JET	02714039	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04R230140-JET	02714041	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04R500200-JET	02714042	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27085-05L080055-JET	02718597	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05L100070-JET	02718598	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05L130090-JET	02718599	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05L170110-JET	02718600	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05L230140-JET	02718601	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05L500200-JET	02718602	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R080055-JET	02718579	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R100070-JET	02718580	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R130090-JET	02718581	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R170110-JET	02718582	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R230140-JET	02718583	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05R500200-JET	02718584	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35070-03L080055-JET	02718627	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03L100070-JET	02718628	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03L130090-JET	02718629	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03L170110-JET	02718630	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03L230140-JET	02718631	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03L500200-JET	02718632	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03R080055-JET	02718603	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03R100070-JET	02718604	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03R130090-JET	02718605	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03R170110-JET	02718606	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R230140-JET	02718607	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R500200-JET	02718608	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35080-04L080055-JET	02718633	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04L100070-JET	02718634	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04L130090-JET	02718635	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04L170110-JET	02718636	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04L230140-JET	02718637	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04L500200-JET	02718638	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04R080055-JET	02718609	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04R100070-JET	02718610	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C5-CFOL-35080-04R130090-JET	02718611	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04R170110-JET	02718612	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04R230140-JET	02718613	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04R500200-JET	02718614	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35085-05L080055-JET	02718639	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05L100070-JET	02718640	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05L130090-JET	02718641	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05L170110-JET	02718642	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05L230140-JET	02718643	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05L500200-JET	02718644	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R080055-JET	02718615	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R100070-JET	02718616	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R130090-JET	02718617	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R170110-JET	02718618	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R230140-JET	02718619	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05R500200-JET	02718620	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35100-06L080055-JET	02718645	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06L100070-JET	02718646	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06L130090-JET	02718647	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06L170110-JET	02718648	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06L230140-JET	02718649	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06L500200-JET	02718650	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R080055-JET	02718621	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R100070-JET	02718622	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R130090-JET	02718623	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R170110-JET	02718624	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R230140-JET	02718625	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06R500200-JET	02718626	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45075-03L080055-JET	02718679	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03L100070-JET	02718680	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03L130090-JET	02718681	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03L170110-JET	02718682	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03L230140-JET	02718683	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03L500200-JET	02718684	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03R080055-JET	02718651	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..

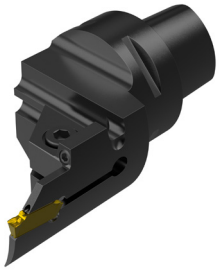
Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFOL-45075-03R100070-JET	02718652	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03R130090-JET	02718653	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03R170110-JET	02718654	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03R230140-JET	02718655	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03R500200-JET	02718656	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45080-04L080055-JET	02718685	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04L100070-JET	02718686	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04L130090-JET	02718687	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04L170110-JET	02718688	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04L230140-JET	02718689	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04L500200-JET	02718690	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R080055-JET	02718657	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R100070-JET	02718658	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R130090-JET	02718659	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R170110-JET	02718660	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R230140-JET	02718661	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04R500200-JET	02718662	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45090-05L080055-JET	02718691	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05L100070-JET	02718692	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05L130090-JET	02718693	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05L170110-JET	02718694	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	0,9 *1.980*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05L230140-JET	02718695	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	0,9 *1.980*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05L500200-JET	02718696	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R080055-JET	02718663	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R100070-JET	02718664	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R130090-JET	02718665	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R170110-JET	02718666	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	0,9 *1.980*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R230140-JET	02718667	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	0,9 *1.980*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05R500200-JET	02718668	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45100-06L080055-JET	02718697	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06L100070-JET	02718698	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06L130090-JET	02718699	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06L170110-JET	02718700	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06L230140-JET	02718701	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06L500200-JET	02718702	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFOL-45100-06R080055-JET	02718669	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06R100070-JET	02718670	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06R130090-JET	02718671	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06R170110-JET	02718672	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06R230140-JET	02718673	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06R500200-JET	02718674	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45115-08L130090-JET	02718703	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08L170110-JET	02718704	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08L230140-JET	02718705	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08L500200-JET	02718706	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08R130090-JET	02718675	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08R170110-JET	02718676	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,1 *2.430*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08R230140-JET	02718677	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08R500200-JET	02718678	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..

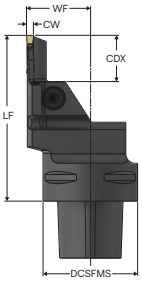
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..-03	4SMS795	TCEI0513
CFOR/L..-04	5SMS795	TCEI0613
CFOR/L..-05	5SMS795	TCEI0613
CFOR/L..-06	6SMS795	TCEI0815
CFOR/L..-08	6SMS795	TCEI1020

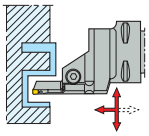
C.-CFOR...R...JET, C.-CFOL...L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



CFOR...R...JET, CFOL...L...JET

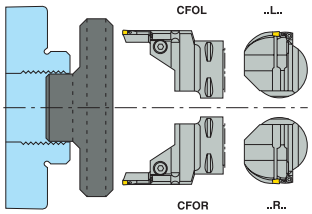


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846–851, 861–862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFOR-27070-03R080055-JET	02718725	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03R100070-JET	02718726	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03R130090-JET	02718727	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03R170110-JET	02718728	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03R230140-JET	02718729	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27070-03R500200-JET	02718730	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L080055-JET	02718707	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L100070-JET	02718708	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L130090-JET	02718709	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L170110-JET	02718710	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L230140-JET	02718711	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOL-27070-03L500200-JET	02718712	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CFOR-27080-04R080055-JET	02718731	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04R100070-JET	02718732	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04R130090-JET	02718733	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04R170110-JET	02718734	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04R230140-JET	02718735	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27080-04R500200-JET	02718736	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04L080055-JET	02718713	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04L100070-JET	02718714	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04L130090-JET	02718715	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFOL-27080-04L170110-JET	02718716	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04L230140-JET	02718717	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOL-27080-04L500200-JET	02718718	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFOR-27085-05R080055-JET	02718737	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05R100070-JET	02718738	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05R130090-JET	02718739	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05R170110-JET	02718740	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05R230140-JET	02718741	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOR-27085-05R500200-JET	02718742	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L080055-JET	02718719	C4	55,0 *2.165*	80,0 *3.150*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L100070-JET	02718720	C4	70,0 *2.756*	100,0 *3.937*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L130090-JET	02718721	C4	90,0 *3.543*	130,0 *5.118*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L170110-JET	02718722	C4	110,0 *4.331*	170,0 *6.693*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L230140-JET	02718723	C4	140,0 *5.512*	230,0 *9.055*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFOL-27085-05L500200-JET	02718724	C4	200,0 *7.874*	500,0 *19.685*	40,0 *1.575*	27,0 *1.063*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35070-03R080055-JET	02718767	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R100070-JET	02718768	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R130090-JET	02718769	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R170110-JET	02718770	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R230140-JET	02718771	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35070-03R500200-JET	02718772	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L080055-JET	02718743	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L100070-JET	02718744	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L130090-JET	02718745	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L170110-JET	02718746	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L230140-JET	02718747	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOL-35070-03L500200-JET	02718748	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	70 *2.756*	18,0 *0.709*	150,0 bar *2175,6*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CFOR-35080-04R080055-JET	02718773	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04R100070-JET	02718774	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04R130090-JET	02718775	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04R170110-JET	02718776	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04R230140-JET	02718777	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35080-04R500200-JET	02718778	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04L080055-JET	02718749	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04L100070-JET	02718750	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C5-CFOL-35080-04L130090-JET	02718751	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04L170110-JET	02718752	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04L230140-JET	02718753	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOL-35080-04L500200-JET	02718754	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFOR-35085-05R080055-JET	02718779	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05R100070-JET	02718780	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05R130090-JET	02718781	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05R170110-JET	02718782	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05R230140-JET	02718783	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35085-05R500200-JET	02718784	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L080055-JET	02718755	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L100070-JET	02718756	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L130090-JET	02718757	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L170110-JET	02718758	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L230140-JET	02718759	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOL-35085-05L500200-JET	02718760	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	85 *3.346*	30,0 *1.181*	150,0 bar *2175,6*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFOR-35100-06R080055-JET	02718785	C5	55,0 *2.165*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06R100070-JET	02718786	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06R130090-JET	02718787	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06R170110-JET	02718788	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06R230140-JET	02718789	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOR-35100-06R500200-JET	02718790	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L080055-JET	02718761	C5	50,0 *1.969*	80,0 *3.150*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L100070-JET	02718762	C5	70,0 *2.756*	100,0 *3.937*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L130090-JET	02718763	C5	90,0 *3.543*	130,0 *5.118*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L170110-JET	02718764	C5	110,0 *4.331*	170,0 *6.693*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L230140-JET	02718765	C5	140,0 *5.512*	230,0 *9.055*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	0,9 *1.980*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C5-CFOL-35100-06L500200-JET	02718766	C5	200,0 *7.874*	500,0 *19.685*	50,0 *1.969*	35,0 *1.378*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45075-03R080055-JET	02718819	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03R100070-JET	02718820	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03R130090-JET	02718821	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03R170110-JET	02718822	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03R230140-JET	02718823	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45075-03R500200-JET	02718824	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,2 *2.650*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03L080055-JET	02718791	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..

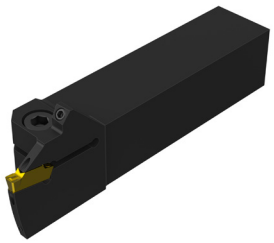
Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFOL-45075-03L100070-JET	02718792	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03L130090-JET	02718793	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03L170110-JET	02718794	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,0 *2.200*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03L230140-JET	02718795	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOL-45075-03L500200-JET	02718796	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	75 *2.953*	18,0 *0.709*	150,0 bar *2175,6*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CFOR-45080-04R080055-JET	02718825	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04R100070-JET	02718826	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04R130090-JET	02718827	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,0 *2.200*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04R170110-JET	02718828	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04R230140-JET	02718829	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45080-04R500200-JET	02718830	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L080055-JET	02718797	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L100070-JET	02718798	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L130090-JET	02718799	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L170110-JET	02718800	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L230140-JET	02718801	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOL-45080-04L500200-JET	02718802	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	80 *3.150*	24,0 *0.945*	150,0 bar *2175,6*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFOR-45090-05R080055-JET	02718831	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05R100070-JET	02718832	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05R130090-JET	02718833	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05R170110-JET	02718834	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05R230140-JET	02718835	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45090-05R500200-JET	02718836	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L080055-JET	02718803	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L100070-JET	02718804	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L130090-JET	02718805	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L170110-JET	02718806	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L230140-JET	02718807	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOL-45090-05L500200-JET	02718808	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	90 *3.543*	30,0 *1.181*	150,0 bar *2175,6*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFOR-45100-06R080055-JET	02718837	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06R100070-JET	02718838	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06R130090-JET	02718839	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06R170110-JET	02718840	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,0 *2.200*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06R230140-JET	02718841	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45100-06R500200-JET	02718842	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..

Designation	Item number	CTMS	INPLM	INPLX	DCSFMS	WF	LF	CDX	CP	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFOL-45100-06L080055-JET	02718809	C6	55,0 *2.165*	80,0 *3.150*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,2 *2.650*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06L100070-JET	02718810	C6	70,0 *2.756*	100,0 *3.937*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06L130090-JET	02718811	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,4 *3.090*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06L170110-JET	02718812	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06L230140-JET	02718813	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOL-45100-06L500200-JET	02718814	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	100 *3.937*	36,0 *1.417*	150,0 bar *2175,6*	1,3 *2.870*	6,0 *0.236*	5,0 *44.3*	LC..1606..
C6-CFOR-45115-08R130090-JET	02718843	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08R170110-JET	02718844	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08R230140-JET	02718845	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOR-45115-08R500200-JET	02718846	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08L130090-JET	02718815	C6	90,0 *3.543*	130,0 *5.118*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08L170110-JET	02718816	C6	110,0 *4.331*	170,0 *6.693*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,5 *3.310*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08L230140-JET	02718817	C6	140,0 *5.512*	230,0 *9.055*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,3 *2.870*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFOL-45115-08L500200-JET	02718818	C6	200,0 *7.874*	500,0 *19.685*	63,0 *2.480*	45,0 *1.772*	115 *4.528*	48,0 *1.890*	150,0 bar *2175,6*	1,4 *3.090*	8,0 *0.315*	10,0 *88.5*	LC..3008..

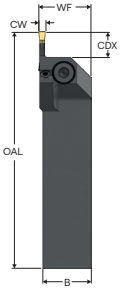
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..-03	4SMS795	TCEI0513
CFOR/L..-04	5SMS795	TCEI0613
CFOR/L..-05	5SMS795	TCEI0613
CFOR/L..-06	6SMS795	TCEI0815
CFOR/L..-08	6SMS795	TCEI1020

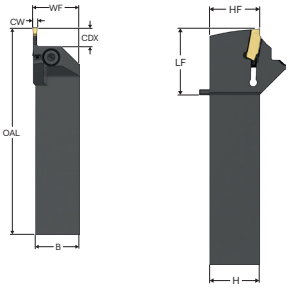
CFIR/L...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



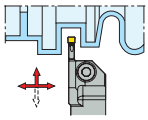
CFIR/L2020...JETI



CFIR/L2525...JETI



KAPR = 90,0 °



CTWS



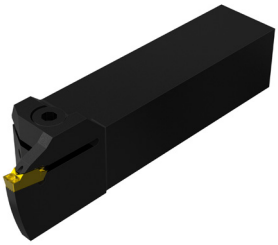
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR2020X03JETI	03244706	20	20	97	33	21,5	19,95	9,0	200,0 bar	0,3	3,0	6,0	LC..1603..
CFIR2525X03JETI	03244716	25	25	117	33	26,5	24,95	9,0	200,0 bar	0,5	3,0	6,0	LC..1603..
CFIL2020X03JETI	03244721	20	20	97	33	21,5	19,95	9,0	200,0 bar	0,3	3,0	6,0	LC..1603..
CFIL2525X03JETI	03244915	25	25	117	33	26,5	24,95	9,0	200,0 bar	0,5	3,0	6,0	LC..1603..
CFIR2020X04JETI	03244709	20	20	103	39	21,5	19,95	12,0	200,0 bar	0,4	4,0	8,0	LC..1604..
CFIR2525X04JETI	03244722	25	25	123	39	26,5	24,95	12,0	200,0 bar	0,6	4,0	8,0	LC..1604..
CFIL2020X04JETI	03244723	20	20	103	39	21,5	19,95	12,0	200,0 bar	0,3	4,0	8,0	LC..1604..
CFIL2525X04JETI	03244727	25	25	123	39	26,5	24,95	12,0	200,0 bar	0,6	4,0	8,0	LC..1604..
CFIR2020X05JETI	03244732	20	20	104	40	21,5	19,95	15,0	200,0 bar	0,3	5,0	8,0	LC..1605..
CFIR2525X05JETI	03244725	25	25	124	40	26,5	24,95	15,0	200,0 bar	0,6	5,0	8,0	LC..1605..
CFIL2020X05JETI	03244739	20	20	104	40	21,5	19,95	15,0	200,0 bar	0,4	5,0	8,0	LC..1605..
CFIL2525X05JETI	03244726	25	25	124	40	26,5	24,95	15,0	200,0 bar	0,6	5,0	8,0	LC..1605..
CFIR2020X06JETI	03244742	20	20	111	47	21,5	19,95	18,0	200,0 bar	0,4	6,0	8,0	LC..1606..
CFIR2525X06JETI	03244731	16	16	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	10,0	LC..1606..
CFIL2020X06JETI	03244745	20	20	111	47	21,5	19,95	18,0	200,0 bar	0,4	6,0	8,0	LC..1606..
CFIL2525X06JETI	03244737	16	16	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	10,0	LC..1606..
CFIR2525X08JETI	03244740	16	16	142	58	28,0	24,95	24,0	200,0 bar	0,7	8,0	15,0	LC..3008..
CFIL2525X08JETI	03244744	16	16	142	58	28,0	24,95	24,0	200,0 bar	0,7	8,0	15,0	LC..3008..

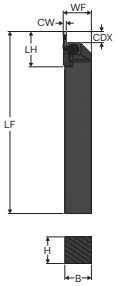
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug
				
CFIR/L..-03	4SMS795	TCEI0513	P6SS6X6	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	P6SS6X6	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	P6SS6X6	JET-P1/8-5MM
CFIR/L..-08	6SMS795	TCEI1020	P6SS6X6	JET-P1/8-5MM
CFIR/L20..-06	5SMS795	TCEI0613	P6SS6X6	JET-P1/8-5MM
CFIR/L25..-06	6SMS795	TCEI0815	P6SS6X6	JET-P1/8-5MM

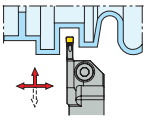
CFIR/L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFIR/L...JET



KAPR = 90,0 °



CTWS



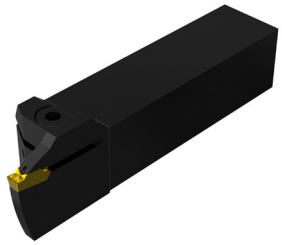
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR3225P03JET	02599873	32	25	170	26,5	33,0	9,0	275,0 bar	1,1	3,0	6,0	LC..1603..
CFIL3225P03JET	02599874	32	25	170	26,5	33,0	9,0	275,0 bar	1,0	3,0	6,0	LC..1603..
CFIR3225P04JET	02599879	32	25	170	26,5	39,0	12,0	275,0 bar	1,0	4,0	8,0	LC..1604..
CFIL3225P04JET	02599880	32	25	170	26,5	39,0	12,0	275,0 bar	1,0	4,0	8,0	LC..1604..
CFIR3225P05JET	02599886	32	25	170	26,5	40,0	15,0	275,0 bar	1,0	5,0	8,0	LC..1605..
CFIL3225P05JET	02599887	32	25	170	26,5	40,0	15,0	275,0 bar	1,0	5,0	8,0	LC..1605..
CFIR3225P06JET	02599892	32	25	170	26,5	47,0	18,0	275,0 bar	1,0	6,0	8,0	LC..1606..
CFIL3225P06JET	02599893	32	25	170	26,5	47,0	18,0	275,0 bar	1,0	6,0	8,0	LC..1606..
CFIR3225P08JET	02641519	32	25	170	28,0	57,0	24,0	275,0 bar	1,0	8,0	8,0	LC..3008..
CFIL3225P08JET	02641520	32	25	170	28,0	57,0	24,0	275,0 bar	1,0	8,0	8,0	LC..3008..

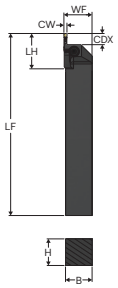
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFIR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM
CFIR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

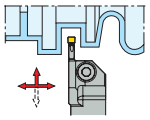
CFIR/L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFIR/L...JET



KAPR = 90,0 °



CTWS



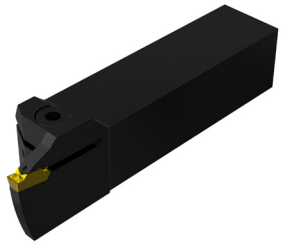
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFIR07503BJET	02610615	0.750	0.750	4.500	0.807	1.299	0.354	3988,5	0.880	0.118	53.1	LC..1603..
CFIR10003DJET	02610623	1.000	1.000	6.000	1.055	1.299	0.354	3988,5	1.760	0.118	53.1	LC..1603..
CFIR12503DJET	02610636	1.250	1.250	6.000	1.307	1.299	0.354	3988,5	2.650	0.118	53.1	LC..1603..
CFIL07503BJET	02610616	0.750	0.750	4.500	0.807	1.299	0.354	3988,5	0.880	0.118	53.1	LC..1603..
CFIL10003DJET	02610624	1.000	1.000	6.000	1.055	1.299	0.354	3988,5	1.760	0.118	53.1	LC..1603..
CFIL12503DJET	02610638	1.250	1.250	6.000	1.307	1.299	0.354	3988,5	2.650	0.118	53.1	LC..1603..
CFIR07504BJET	02610617	0.750	0.750	4.500	0.807	1.535	0.472	3988,5	0.880	0.157	70.8	LC..1604..
CFIR10004DJET	02610629	1.000	1.000	6.000	1.055	1.535	0.472	3988,5	1.760	0.157	70.8	LC..1604..
CFIR12504DJET	02610639	1.250	1.250	6.000	1.307	1.535	0.472	3988,5	2.650	0.157	70.8	LC..1604..
CFIL07504BJET	02610618	0.750	0.750	4.500	0.807	1.535	0.472	3988,5	0.880	0.157	70.8	LC..1604..
CFIL10004DJET	02610630	1.000	1.000	6.000	1.055	1.535	0.472	3988,5	1.760	0.157	70.8	LC..1604..
CFIL12504DJET	02610640	1.250	1.250	6.000	1.307	1.535	0.472	3988,5	2.650	0.157	70.8	LC..1604..
CFIR07505BJET	02610619	0.750	0.750	4.500	0.807	1.575	0.591	3988,5	0.880	0.197	70.8	LC..1605..
CFIR10005DJET	02610631	1.000	1.000	6.000	1.055	1.575	0.591	3988,5	1.760	0.197	70.8	LC..1605..
CFIR12505DJET	02610641	1.250	1.250	6.000	1.307	1.575	0.591	3988,5	2.650	0.197	70.8	LC..1605..
CFIL07505BJET	02610620	0.750	0.750	4.500	0.807	1.575	0.591	3988,5	0.880	0.197	70.8	LC..1605..
CFIL10005DJET	02610632	1.000	1.000	6.000	1.055	1.575	0.591	3988,5	1.760	0.197	70.8	LC..1605..
CFIL12505DJET	02610643	1.250	1.250	6.000	1.307	1.575	0.591	3988,5	2.650	0.197	70.8	LC..1605..
CFIR10006DJET	02610634	1.000	1.000	6.000	1.055	1.850	0.709	3988,5	1.760	0.236	88.5	LC..1606..
CFIR12506DJET	02610644	1.250	1.250	6.000	1.307	1.850	0.709	3988,5	2.430	0.236	88.5	LC..1606..
CFIL10006DJET	02610635	1.000	1.000	6.000	1.055	1.850	0.709	3988,5	1.760	0.236	88.5	LC..1606..
CFIL12506DJET	02610645	1.250	1.250	6.000	1.307	1.850	0.709	3988,5	2.650	0.236	88.5	LC..1606..
CFIR10008DJET	02641523	1.000	1.000	6.000	1.114	2.244	0.945	3988,5	1.760	0.315	132.8	LC..3008..
CFIR12508EJET	02641526	1.250	1.250	7.000	1.366	2.244	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIL10008DJET	02641524	1.000	1.000	6.000	1.114	2.244	0.945	3988,5	1.760	0.315	132.8	LC..3008..
CFIL12508EJET	02641527	1.250	1.250	7.000	1.366	2.244	0.945	3988,5	2.650	0.315	132.8	LC..3008..

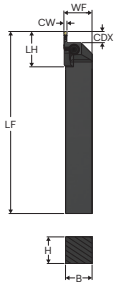
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFIR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM
CFIR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

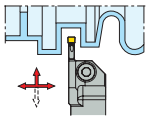
CFMR/L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFMR/L...JET



KAPR = 90,0 °



CTWS



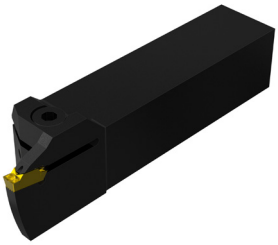
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFMR3225P03JET	02702825	32	25	170	26,5	41,0	15,0	275,0 bar	1,0	3,0	6,0	LC..1603..
CFML3225P03JET	02702829	32	25	170	26,5	41,0	15,0	275,0 bar	1,0	3,0	6,0	LC..1603..
CFMR3225P04JET	02702833	32	25	170	26,5	45,0	20,0	275,0 bar	1,0	4,0	8,0	LC..1604..
CFML3225P04JET	02702837	32	25	170	26,5	45,0	20,0	275,0 bar	1,0	4,0	8,0	LC..1604..
CFMR3225P05JET	02702840	32	25	170	26,5	56,0	25,0	275,0 bar	1,0	5,0	8,0	LC..1605..
CFML3225P05JET	02702843	32	25	170	26,5	56,0	25,0	275,0 bar	1,0	5,0	8,0	LC..1605..
CFMR3225P06JET	02702845	32	25	170	26,5	67,0	30,0	275,0 bar	1,0	6,0	10,0	LC..1606..
CFML3225P06JET	02702848	32	25	170	26,5	67,0	30,0	275,0 bar	0,9	6,0	10,0	LC..1606..

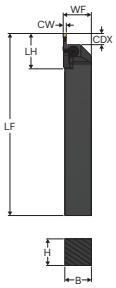
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFMR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFMR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFMR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFMR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM

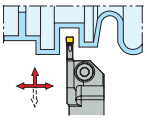
CFMR/L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFMR/L...JET



KAPR = 90,0 °



CTWS



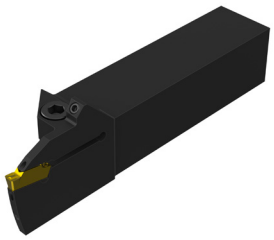
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFMR07503BJET	02722319	0.750	0.750	4.500	0.800	1.575	0.591	3988,5	0.880	0.118	53.1	LC..1603..
CFMR10003DJET	02722324	1.000	1.000	6.000	1.040	1.575	0.591	3988,5	1.540	0.118	53.1	LC..1603..
CFMR12503DJET	02722325	1.250	1.250	6.000	1.300	1.732	0.591	3988,5	2.430	0.118	53.1	LC..1603..
CFML07503BJET	02722326	0.750	0.750	4.500	0.800	1.575	0.591	3988,5	0.880	0.118	53.1	LC..1603..
CFML10003DJET	02722327	1.000	1.000	6.000	1.040	1.575	0.591	3988,5	1.540	0.118	53.1	LC..1603..
CFML12503DJET	02722328	1.250	1.250	6.000	1.300	1.732	0.591	3988,5	2.430	0.118	53.1	LC..1603..
CFMR07504BJET	02722329	0.750	0.750	4.500	0.800	1.732	0.787	3988,5	0.880	0.157	70.8	LC..1604..
CFMR10004DJET	02722330	1.000	1.000	6.000	1.040	1.732	0.787	3988,5	1.540	0.157	70.8	LC..1604..
CFMR12504DJET	02722331	1.250	1.250	6.000	1.300	1.732	0.787	3988,5	2.430	0.157	70.8	LC..1604..
CFML07504BJET	02722353	0.750	0.750	4.500	0.800	1.732	0.787	3988,5	0.880	0.157	70.8	LC..1604..
CFML10004DJET	02722354	1.000	1.000	6.000	1.040	1.732	0.787	3988,5	1.540	0.157	70.8	LC..1604..
CFML12504DJET	02722355	1.250	1.250	6.000	1.300	1.732	0.787	3988,5	1.980	0.157	70.8	LC..1604..
CFMR10005DJET	02722356	1.000	1.000	6.000	1.252	1.969	0.984	3988,5	1.320	0.197	70.8	LC..1605..
CFMR12505DJET	02722358	1.250	1.250	6.000	1.300	2.165	0.984	3988,5	2.430	0.197	70.8	LC..1605..
CFML10005DJET	02722359	1.000	1.000	6.000	1.252	1.969	0.984	3988,5	1.540	0.197	70.8	LC..1605..
CFML12505DJET	02722360	1.250	1.250	6.000	1.300	2.165	0.984	3988,5	2.430	0.197	70.8	LC..1605..
CFMR10006DJET	02722361	1.000	1.000	6.000	1.040	2.598	1.181	3988,5	1.540	0.236	88.5	LC..1606..
CFMR12506DJET	02722362	1.250	1.250	6.000	1.300	2.598	1.181	3988,5	2.430	0.236	88.5	LC..1606..
CFML10006DJET	02722363	1.000	1.000	6.000	1.040	2.598	1.181	3988,5	1.540	0.236	88.5	LC..1606..
CFML12506DJET	02722364	1.250	1.250	6.000	1.300	2.598	1.181	3988,5	2.430	0.236	88.5	LC..1606..

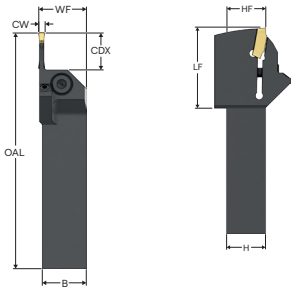
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
..03	4SMS795	TCEI0513	JET-P1/8-5MM
..04, ..05	5SMS795	TCEI0613	JET-P1/8-5MM
..-L12..06	5SMS795	TCEI0613	JET-P1/8-5MM
..-R10, -R12, -L10..06	6SMS795	TCEI0815	JET-P1/8-5MM

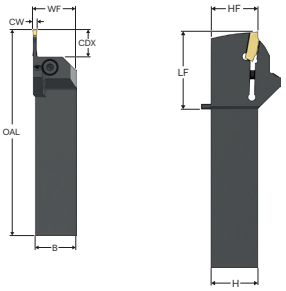
CFMR/L...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



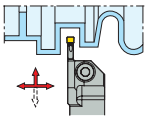
CFMR/L2020...JETI



CFMR/L2525...JETI



KAPR = 90,0 °



CTWS



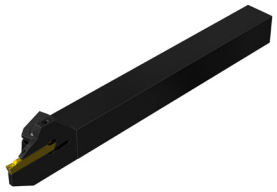
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFMR2020X03JETI	03244714	20	20	105	41	21,5	19,95	15,0	200,0 bar	0,3	3,0	6,0	LC..1603..
CFMR2525X03JETI	03244710	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	3,0	6,0	LC..1603..
CFML2020X03JETI	03244708	20	20	105	41	21,5	19,95	15,0	200,0 bar	0,3	3,0	6,0	LC..1603..
CFML2525X03JETI	03244728	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	3,0	6,0	LC..1603..
CFMR2020X04JETI	03244738	20	20	110	46	21,5	19,95	20,0	200,0 bar	0,4	4,0	8,0	LC..1604..
CFMR2525X04JETI	03244718	25	25	130	46	26,5	24,95	20,0	200,0 bar	0,6	4,0	8,0	LC..1604..
CFML2020X04JETI	03244741	20	20	110	46	21,5	19,95	20,0	200,0 bar	0,4	4,0	8,0	LC..1604..
CFML2525X04JETI	03244735	25	25	130	46	26,5	24,95	20,0	200,0 bar	0,5	4,0	8,0	LC..1604..
CFMR2525X05JETI	03244734	25	25	140	56	26,5	24,95	25,0	200,0 bar	0,6	5,0	8,0	LC..1605..
CFML2525X05JETI	03244736	25	25	140	56	26,5	24,95	25,0	200,0 bar	0,5	5,0	8,0	LC..1605..
CFMR2525X06JETI	03244743	25	25	151	67	26,5	24,95	30,0	200,0 bar	0,6	6,0	10,0	LC..1606..
CFML2525X06JETI	03244733	25	25	151	67	26,5	24,95	30,0	200,0 bar	0,6	6,0	10,0	LC..1606..

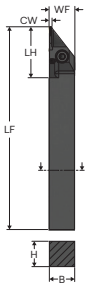
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug
				
CFMR/L..-03	4SMS795	TCEI0513	P6SS6X6	JET-P1/8-5MM
CFMR/L..-04	5SMS795	TCEI0613	P6SS6X6	JET-P1/8-5MM
CFMR/L..-05	5SMS795	TCEI0613	P6SS6X6	JET-P1/8-5MM
CFMR/L..-06	6SMS795	TCEI0815	P6SS6X6	JET-P1/8-5MM

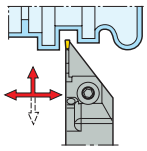
CFOR/L..RBJET – Toolholders for inserts LCMF – Metric



CFOR/L..RBJET



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOR1212K1902RBJET	02828753	12	12	125	12,0	27,0	25,4	275,0 bar	0,2	2,0	5,0	LC..1902..
CFOR1616K1902RBJET	02828755	16	16	125	16,0	27,0	25,4	275,0 bar	0,3	2,0	5,0	LC..1902..
CFOL1212K1902RBJET	02828754	12	12	125	12,0	27,0	25,4	275,0 bar	0,2	2,0	5,0	LC..1902..
CFOL1616K1902RBJET	02828766	16	16	125	16,0	27,0	25,4	275,0 bar	0,3	2,0	5,0	LC..1902..

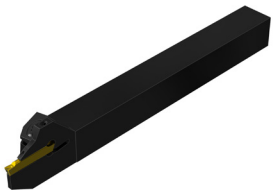
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..19	T15P-7S	L85012-T15P

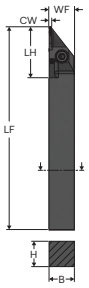
Accessories

For	Coolant adapter	Washer
		
CFOR/L..19	JET-ADM6	JET-CS0610

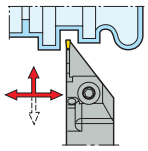
CFOR/L..RBJET – Toolholders for inserts LCMF – Inch



CFOR/L...JET



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFOR0501902CRBJET	02828756	0.500	0.500	4.921	0.500	1.063	1.000	3988,5	0.440	0.079	44.3	LC..1902..
CFOR0631902CRBJET	02828758	0.500	0.500	4.921	0.500	1.063	1.000	3988,5	0.660	0.079	44.3	LC..1902..
CFOL0501902CRBJET	02828757	0.500	0.500	4.921	0.500	1.063	1.000	3988,5	0.440	0.079	44.3	LC..1902..
CFOL0631902CRBJET	02828767	0.500	0.500	4.921	0.500	1.063	1.000	3988,5	0.660	0.079	44.3	LC..1902..

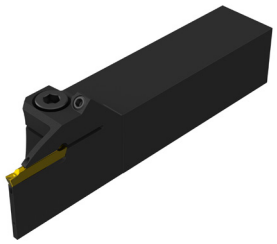
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..-02	T15P-7S	L85012-T15P

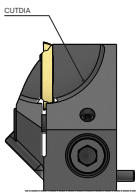
Accessories

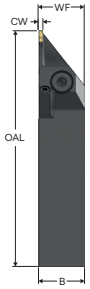
For	Coolant adapter	Washer
		
CFOR/L..-02	JET-ADM6	JET-CS0610

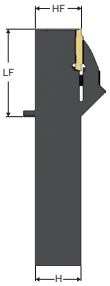
CFSR/L..RBJET – Toolholders for inserts LCMF – Metric



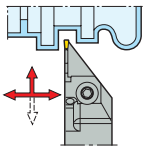
CFSR/L..RBJETI







KAPR = 90,0 °



CTWS



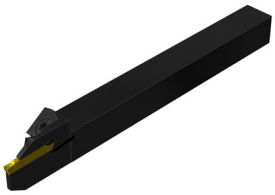
—Right-hand version shown
—For inserts program, see page(s) 845
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

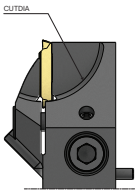
Designation	Item number	H	B	OAL	LF	WF	HF	CUTDIA*	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFSR2020X1902RBJETI	03244707	20	20	102	38	20,0	19,95	33,0	200,0 bar	0,3	2,0	6,0	LC..1902..
CFSL2020X1902RBJETI	03244713	20	20	102	38	20,0	19,95	33,0	200,0 bar	0,3	2,0	6,0	LC..1902..

Spare Parts, included in delivery

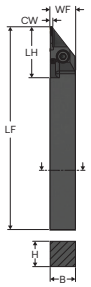
For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug
				
CFSR/L..-19	4SMS795	TCEI0513	P6SS6X6	JET-P1/8-5MM

CFSR/L..RBJET – Toolholders for inserts LCMF – Inch

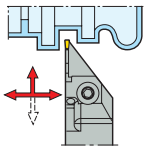




CFSR/L...RBJET



KAPR = 90,0 °



CTWS



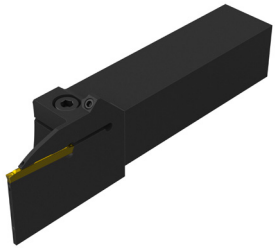
—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFSR0751902DRBJET	02748837	0.750	0.750	6.000	0.750	1.500	1.299	3988,5	1.100	0.079	53.1	LC..1902..
CFSL0751902DRBJET	02748840	0.750	0.750	6.000	0.750	1.500	1.299	3988,5	1.100	0.079	53.1	LC..1902..

Spare Parts, included in delivery

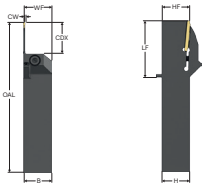
For	Clamp key	Clamp screw	Plug
			
CFSR/L..-02	4SMS795	TCEI0513	JET-P1/8-5MM

CFZR/L..JETI – Toolholders compatible with JETI adapters for inserts LCMF – Metric

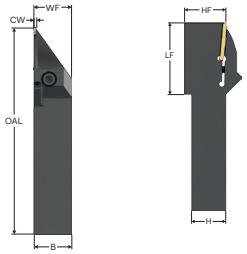


CFZR/L..JETI

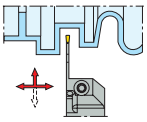




CFZR/L..RBJETI



KAPR = 90,0 °



CTWS



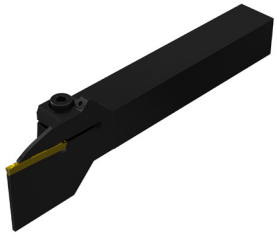
—Right-hand version shown
—For inserts program, see page(s) 845
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

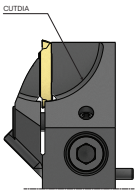
Designation	Item number	H	B	OAL	LF	WF	HF	CDX	CUTDIA*	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFZR2020X2802JETI	03244729	20	20	115	51	20,0	19,95	26,0	–	200,0 bar	0,3	2,0	6,0	LC..2802..
CFZR2525X2802JETI	03244712	25	25	135	51	25,0	24,95	26,0	–	200,0 bar	0,6	2,0	6,0	LC..2802..
CFZL2020X2802JETI	03244730	20	20	115	51	20,0	19,95	26,0	–	200,0 bar	0,3	2,0	6,0	LC..2802..
CFZL2525X2802JETI	03244719	25	25	135	51	25,0	24,95	26,0	–	200,0 bar	0,6	2,0	6,0	LC..2802..
CFZR2020X2802RBJETI	03244715	20	20	116	52	20,0	19,95	26,0	52,0	200,0 bar	0,4	2,0	6,0	LC..2802..
CFZR2525X2802RBJETI	03244711	25	25	136	52	25,0	24,95	26,0	52,0	200,0 bar	0,6	2,0	6,0	LC..2802..
CFZL2020X2802RBJETI	03244717	20	20	116	52	20,0	19,95	26,0	52,0	200,0 bar	0,4	2,0	6,0	LC..2802..
CFZL2525X2802RBJETI	03244720	25	25	136	52	25,0	24,95	26,0	52,0	200,0 bar	0,6	2,0	6,0	LC..2802..

Spare Parts, included in delivery

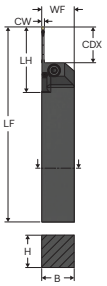
For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug
				
CFZR/L..-28	4SMS795	TCEI0513	P6SS6X6	JET-P1/8-5MM

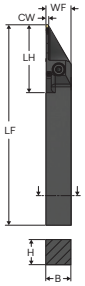
CFZR/L..JETI – Toolholders for inserts LCMF – Inch



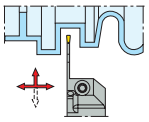


CFZR/L...JET/RBJET





KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFZR0752802DJET	02749013	0.750	0.750	6.000	0.750	1.969	–	3988,5	0.880	0.079	53.1	LC..2802..
CFZR1002802DJET	02749006	1.000	1.000	6.000	1.000	1.969	–	3988,5	1.540	0.079	53.1	LC..2802..
CFZL0752802DJET	02749008	0.750	0.750	6.000	0.750	1.969	–	3988,5	0.880	0.079	53.1	LC..2802..
CFZL1002802DJET	02749010	1.000	1.000	6.000	1.000	1.969	–	3988,5	1.540	0.079	53.1	LC..2802..
CFZR0752802DRBJET	02748941	0.750	0.750	6.000	0.750	2.028	2.047	3988,5	1.100	0.079	53.1	LC..2802..
CFZR1002802DRBJET	02749014	1.000	1.000	6.000	1.000	2.028	2.047	3988,5	1.540	0.079	53.1	LC..2802..
CFZL0752802DRBJET	02749016	0.750	0.750	6.000	0.750	2.028	2.047	3988,5	1.100	0.079	53.1	LC..2802..
CFZL1002802DRBJET	02749017	1.000	1.000	6.000	1.000	2.028	2.047	3988,5	1.540	0.079	53.1	LC..2802..

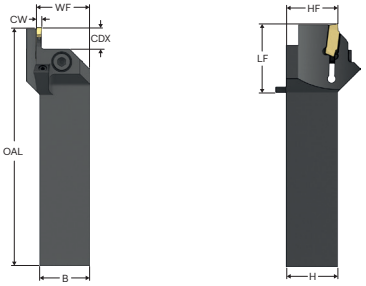
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFZR/L..02	4SMS795	TCEI0513	JET-P1/8-5MM

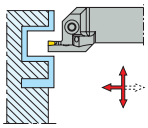
CFIR...L...JET, CFIL...R...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



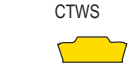
CFIR...L...JETI, CFIL...R...JETI

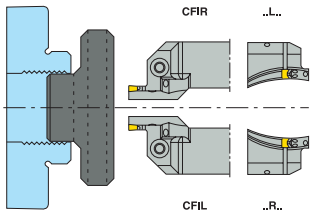


KAPR = 90,0 °



CTWS





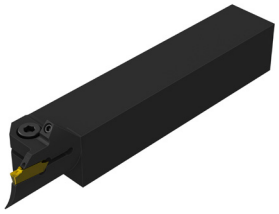
—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

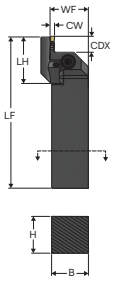
Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR2525X03L080055-JETI	03244842	55,0	80,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFIL2525X03R080055-JETI	03244787	55,0	80,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIL2525X04R080055-JETI	03244776	55,0	80,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X04L080055-JETI	03244808	55,0	80,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFIL2525X05R080055-JETI	03244758	55,0	80,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIR2525X05L080055-JETI	03244904	55,0	80,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIL2525X06R080055-JETI	03244850	55,0	80,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,5	6,0	5,0	LC..1606..
CFIR2525X06L080055-JETI	03244798	55,0	80,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..

Spare Parts, included in delivery

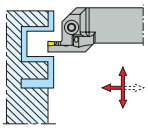
For	Clamp key	Clamp screw	Plug
			
CFIR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM

CFIR...L...JET, CFIL...R...JETI – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



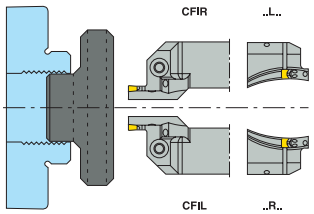


KAPR = 90,0 °



CTWS





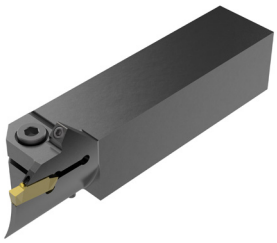
—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFIR10003D-L3.102.17-JET	02718983	2.165	3.150	1.000	1.000	6.000	1.043	–	1.299	0.354	3988,5	1.760	0.118	53.1	LC..1603..
CFIR10004D-L3.102.17-JET	02718984	2.165	3.150	1.000	1.000	6.000	1.043	–	1.417	0.472	3988,5	1.760	0.157	70.8	LC..1604..
CFIR10005D-L3.102.17-JET	02718985	2.165	3.150	1.000	1.000	6.000	1.043	–	1.575	0.591	3988,5	1.980	0.197	70.8	LC..1605..
CFIR10006D-L3.102.17-JET	02718986	2.165	3.150	1.000	1.000	6.000	1.043	–	1.811	0.709	3988,5	1.760	0.236	88.5	LC..1606..
CFIL10003D-R3.102.17-JET	02717498	2.165	3.150	1.000	1.000	6.000	1.043	–	1.299	0.354	3988,5	1.760	0.118	53.1	LC..1603..
CFIL10004D-R3.102.17-JET	02718958	2.165	3.150	1.000	1.000	6.000	1.043	–	1.417	0.472	3988,5	1.980	0.157	70.8	LC..1604..
CFIL10005D-R3.102.17-JET	02718981	2.165	3.150	1.000	1.000	6.000	1.043	–	1.575	0.591	3988,5	1.760	0.197	70.8	LC..1605..
CFIL10006D-R3.102.17-JET	02718982	2.165	3.150	1.000	1.000	6.000	1.043	–	1.811	0.709	3988,5	1.760	0.236	88.5	LC..1606..

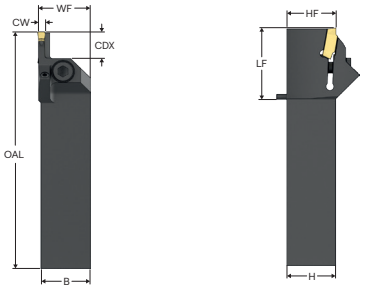
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
..3D	4SMS795	TCEI0513	JET-P1/8-5MM
..4D	5SMS795	TCEI0613	JET-P1/8-5MM
..5D	5SMS795	TCEI0613	JET-P1/8-5MM
..6D-L	5SMS795	TCEI0613	JET-P1/8-5MM
..6D-R	6SMS795	TCEI0815	JET-P1/8-5MM

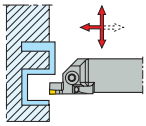
CFIR...R...JETI, CFIL...L...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFIR...R...JETI, CFIL...L...JETI

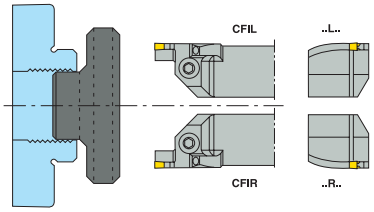


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

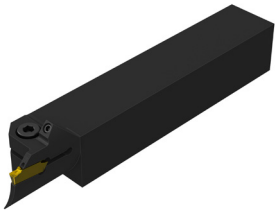
Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR2525X03R080055-JETI	03244862	55,0	80,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIR2525X03R100070-JETI	03244807	70,0	100,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIR2525X03R130090-JETI	03244843	90,0	130,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIR2525X03R170110-JETI	03244903	110,0	170,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIL2525X03L080055-JETI	03244846	55,0	80,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIL2525X03L100070-JETI	03244879	70,0	100,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIL2525X03L130090-JETI	03244910	90,0	130,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFIL2525X03L170110-JETI	03244911	110,0	170,0	25	25	118	34	26,5	24,95	9,0	200,0 bar	0,1	3,0	5,0	LC..1603..
CFIR2525X04R080055-JETI	03244809	55,0	80,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X04R100070-JETI	03244822	70,0	100,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X04R130090-JETI	03244810	90,0	130,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X04R170110-JETI	03244844	110,0	170,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X04R230140-JETI	03244781	140,0	230,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIL2525X04L080055-JETI	03244847	55,0	80,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIL2525X04L100070-JETI	03244912	70,0	100,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIL2525X04L130090-JETI	03244823	90,0	130,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIL2525X04L170110-JETI	03244848	110,0	170,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIL2525X04L230140-JETI	03244799	140,0	230,0	25	25	121	37	26,5	24,95	12,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFIR2525X05R080055-JETI	03244876	55,0	80,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,5	5,0	5,0	LC..1605..
CFIR2525X05R100070-JETI	03244863	70,0	100,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIR2525X05R130090-JETI	03244877	90,0	130,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,5	5,0	5,0	LC..1605..
CFIR2525X05R170110-JETI	03244786	110,0	170,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIR2525X05R230140-JETI	03244864	140,0	230,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIL2525X05L080055-JETI	03244913	55,0	80,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,5	5,0	5,0	LC..1605..
CFIL2525X05L100070-JETI	03244849	70,0	100,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,5	5,0	5,0	LC..1605..
CFIL2525X05L130090-JETI	03244812	90,0	130,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,5	5,0	5,0	LC..1605..
CFIL2525X05L170110-JETI	03244880	110,0	170,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIL2525X05L230140-JETI	03244788	140,0	230,0	25	25	125	41	26,5	24,95	15,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFIR2525X06R080055-JETI	03244905	55,0	80,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,1	6,0	5,0	LC..1606..
CFIR2525X06R100070-JETI	03244811	70,0	100,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIR2525X06R130090-JETI	03244906	90,0	130,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..

Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR2525X06R170110-JETI	03244878	110,0	170,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIR2525X06R230140-JETI	03244782	140,0	230,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIL2525X06L080055-JETI	03244813	55,0	80,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,5	6,0	5,0	LC..1606..
CFIL2525X06L100070-JETI	03244881	70,0	100,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIL2525X06L130090-JETI	03244914	90,0	130,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIL2525X06L170110-JETI	03244814	110,0	170,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFIL2525X06L230140-JETI	03244894	140,0	230,0	25	25	131	47	26,5	24,95	18,0	200,0 bar	0,6	6,0	5,0	LC..1606..

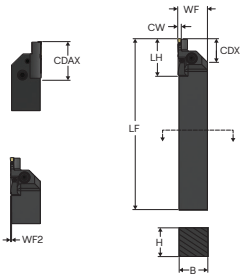
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFIR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM

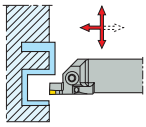
CFIR...R...JET, CFIL...L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



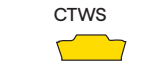
CFIR...R...JET, CFIL...L...JET

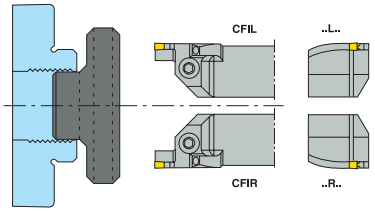


KAPR = 90,0 °



CTWS





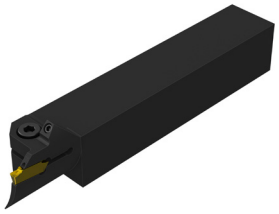
—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFIR3225P08R130090-JET	02703655	90,0	130,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIR3225P08R170110-JET	02703656	110,0	170,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIR3225P08R230140-JET	02703657	140,0	230,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIR3225P08R500200-JET	02703658	200,0	500,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIL3225P08L130090-JET	02703636	90,0	130,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIL3225P08L170110-JET	02703637	110,0	170,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIL3225P08L230140-JET	02703638	140,0	230,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFIL3225P08L500200-JET	02703639	200,0	500,0	32	25	170	26,5	1,5	56,0	24,0	275,0 bar	1,0	8,0	10,0	LC..3008..

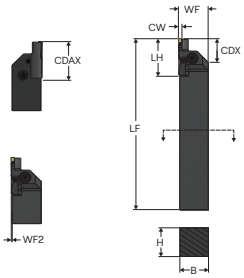
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFIR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

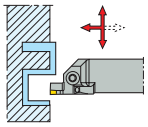
CFIR...R...JET, CFIL...L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFIR...R...JET, CFIL...L...JET

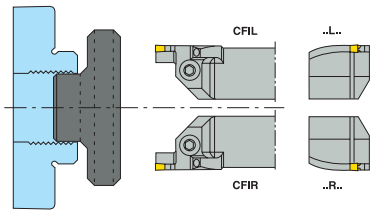


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFIR10003D-R3.102.17-JET	02718999	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIR10003D-R4.002.75-JET	02703515	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIR10003D-R5.003.50-JET	02703516	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIR10003D-R6.704.30-JET	02703517	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIL10003D-L3.102.17-JET	02718995	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.760	0.118	53.1	LC..1603..
CFIL10003D-L4.002.75-JET	02703496	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIL10003D-L5.003.50-JET	02703497	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIL10003D-L6.704.30-JET	02703498	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.299	0.354	3988,5	1.540	0.118	53.1	LC..1603..
CFIR10004D-R3.102.17-JET	02719000	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIR10004D-R4.002.75-JET	02703518	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIR10004D-R5.003.50-JET	02703519	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIR10004D-R6.704.30-JET	02703520	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIR10004D-R9.005.50-JET	02703521	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIL10004D-L3.102.17-JET	02718996	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIL10004D-L4.002.75-JET	02703499	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIL10004D-L5.003.50-JET	02703500	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIL10004D-L6.704.30-JET	02703501	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIL10004D-L9.005.50-JET	02703502	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.417	0.472	3988,5	1.540	0.157	70.8	LC..1604..
CFIR10005D-R3.102.17-JET	02719001	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.760	0.197	70.8	LC..1605..
CFIR10005D-R4.002.75-JET	02703522	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIR10005D-R5.003.50-JET	02703523	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIR10005D-R6.704.30-JET	02703524	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIR10005D-R9.005.50-JET	02703525	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIL10005D-L3.102.17-JET	02718997	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.760	0.197	70.8	LC..1605..
CFIL10005D-L4.002.75-JET	02703503	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIL10005D-L5.003.50-JET	02703504	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIL10005D-L6.704.30-JET	02703505	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIL10005D-L9.005.50-JET	02703506	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.575	0.591	3988,5	1.540	0.197	70.8	LC..1605..
CFIR10006D-R3.102.17-JET	02719002	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.760	0.236	88.5	LC..1606..
CFIR10006D-R4.002.75-JET	02703526	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIR10006D-R5.003.50-JET	02703527	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIR10006D-R6.704.30-JET	02703528	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFIR10006D-R9.005.50-JET	02703529	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIL10006D-L3.102.17-JET	02718998	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIL10006D-L4.002.75-JET	02703507	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIL10006D-L5.003.50-JET	02703508	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIL10006D-L6.704.30-JET	02703509	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIL10006D-L9.005.50-JET	02703510	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.811	0.709	3988,5	1.540	0.236	88.5	LC..1606..
CFIR12508E-R5.003.50-JET	02703530	3.543	5.118	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIR12508E-R6.704.30-JET	02703531	4.331	6.693	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIR12508E-R9.005.50-JET	02703532	5.512	9.055	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.870	0.315	132.8	LC..3008..
CFIR12508E-R19.78.00-JET	02703533	7.874	19.685	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIL12508E-L5.003.50-JET	02703511	3.543	5.118	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIL12508E-L6.704.30-JET	02703512	4.331	6.693	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIL12508E-L9.005.50-JET	02703513	5.512	9.055	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.870	0.315	132.8	LC..3008..
CFIL12508E-L19.78.00-JET	02765806	7.874	19.685	1.250	1.250	7.000	1.043	0.059	2.205	0.945	3988,5	2.650	0.315	132.8	LC..3008..
CFIL12508E-R19.78.00-JET	02703514	7.874	19.685	1.000	1.000	7.000	1.315	–	2.205	0.945	3988,5	2.870	0.315	132.8	LC..3008..

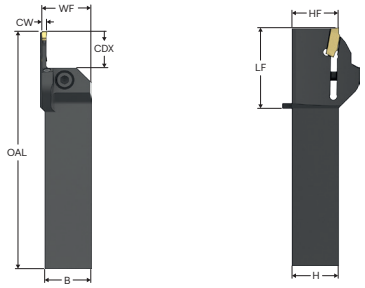
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFIR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFIR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFIR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM
CFIR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

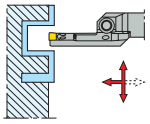
CFOR...L...JETI, CFOL...R...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFOR...L...JETI, CFOL...R...JETI

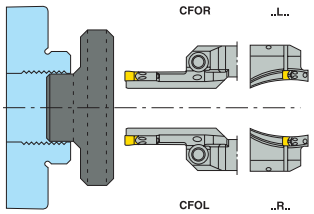


KAPR = 90,0 °



CTWS





—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

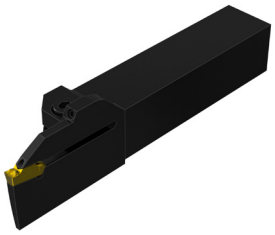
Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOR2525X03L080055-JETI	03244830	55,0	80,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03L100070-JETI	03244817	70,0	100,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03L130090-JETI	03244778	90,0	130,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOR2525X03L170110-JETI	03244818	110,0	170,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOR2525X03L230140-JETI	03244856	140,0	230,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOR2525X03L500200-JETI	03244779	200,0	500,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R080055-JETI	03244869	55,0	80,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R100070-JETI	03244824	70,0	100,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R130090-JETI	03244815	90,0	130,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R170110-JETI	03244896	110,0	170,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R230140-JETI	03244765	140,0	230,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOL2525X03R500200-JETI	03244753	200,0	500,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,6	3,0	5,0	LC..1603..
CFOR2525X04L080055-JETI	03244755	55,0	80,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04L100070-JETI	03244756	70,0	100,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04L130090-JETI	03244795	90,0	130,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04L170110-JETI	03244875	110,0	170,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04L230140-JETI	03244770	140,0	230,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04L500200-JETI	03244754	200,0	500,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R080055-JETI	03244816	55,0	80,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R100070-JETI	03244772	70,0	100,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R130090-JETI	03244777	90,0	130,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R170110-JETI	03244802	110,0	170,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R230140-JETI	03244826	140,0	230,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04R500200-JETI	03244747	200,0	500,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X05L080055-JETI	03244764	55,0	80,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05L100070-JETI	03244923	70,0	100,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05L130090-JETI	03244834	90,0	130,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05L170110-JETI	03244859	110,0	170,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05L230140-JETI	03244797	140,0	230,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05L500200-JETI	03244751	200,0	500,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05R080055-JETI	03244828	55,0	80,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..

Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOL2525X05R100070-JETI	03244899	70,0	100,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05R130090-JETI	03244870	90,0	130,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,1	5,0	5,0	LC..1605..
CFOL2525X05R170110-JETI	03244871	110,0	170,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05R230140-JETI	03244853	140,0	230,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05R500200-JETI	03244748	200,0	500,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X06L080055-JETI	03244752	55,0	80,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06L100070-JETI	03244780	70,0	100,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06L130090-JETI	03244760	90,0	130,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06L170110-JETI	03244757	110,0	170,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06L230140-JETI	03244761	140,0	230,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06L500200-JETI	03244762	200,0	500,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06R080055-JETI	03244900	55,0	80,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06R100070-JETI	03244804	70,0	100,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOL2525X06R130090-JETI	03244829	90,0	130,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06R170110-JETI	03244805	110,0	170,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06R230140-JETI	03244774	140,0	230,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06R500200-JETI	03244749	200,0	500,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..

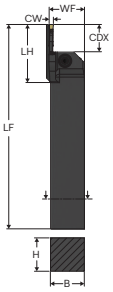
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFOR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM

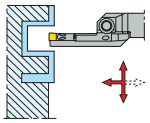
CFOR...L...JET, CFOL...R...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFOR...L...JET, CFOL...R...JET

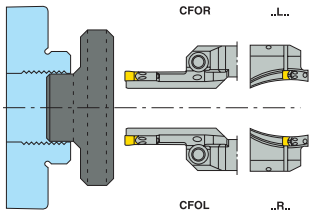


KAPR = 90,0 °



CTWS





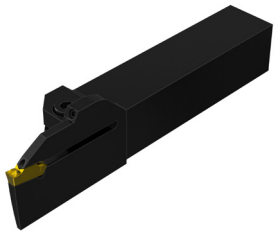
—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOR3225P08L130090-JET	02703569	90,0	130,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOR3225P08L170110-JET	02703570	110,0	170,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOR3225P08L230140-JET	02703571	140,0	230,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOR3225P08L500200-JET	02703572	200,0	500,0	32	25	170	28,0	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOL3225P08R130090-JET	02703548	90,0	130,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOL3225P08R170110-JET	02703549	110,0	170,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOL3225P08R230140-JET	02703550	140,0	230,0	32	25	170	28,0	83,0	48,0	275,0 bar	1,0	8,0	10,0	LC..3008..
CFOL3225P08R500200-JET	02703551	200,0	500,0	32	25	170	28,0	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..

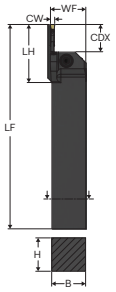
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

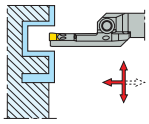
CFOR...L...JET, CFOL...R...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFOR...L...JET, CFOL...R...JET

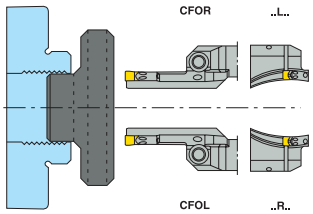


KAPR = 90,0 °



CTWS





—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

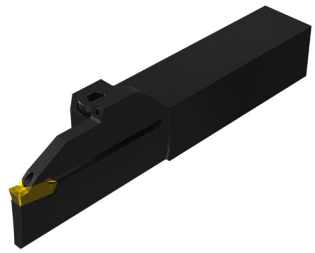
Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFOR10003D-L3.102.17-JET	02718991	2.165	3.150	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.760	0.118	53.1	LC..1603..
CFOR10003D-L4.002.75-JET	02703429	2.756	3.937	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-L5.003.50-JET	02703430	3.543	5.118	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-L6.704.30-JET	02703431	4.331	6.693	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-L9.005.50-JET	02703384	5.512	9.055	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.760	0.118	53.1	LC..1603..
CFOR10003D-L19.78.00-JET	02703385	7.874	19.685	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-R3.102.17-JET	02718987	2.165	3.150	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.760	0.118	53.1	LC..1603..
CFOL10003D-R4.002.75-JET	02701848	2.756	3.937	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-R5.003.50-JET	02703411	3.543	5.118	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-R6.704.30-JET	02703412	4.331	6.693	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-R9.005.50-JET	02703280	5.512	9.055	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.760	0.118	53.1	LC..1603..
CFOL10003D-R19.78.00-JET	02703379	7.874	19.685	1.000	1.000	6.000	1.043	1.693	0.748	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10004D-L3.102.17-JET	02718992	2.165	3.150	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.760	0.157	70.8	LC..1604..
CFOR10004D-L4.002.75-JET	02703432	2.756	3.937	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-L5.003.50-JET	02703433	3.543	5.118	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-L6.704.30-JET	02703434	4.331	6.693	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-L9.005.50-JET	02703435	5.512	9.055	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-L19.78.00-JET	02703386	7.874	19.685	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-R3.102.17-JET	02718988	2.165	3.150	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.760	0.157	70.8	LC..1604..
CFOL10004D-R4.002.75-JET	02703413	2.756	3.937	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-R5.003.50-JET	02703414	3.543	5.118	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-R6.704.30-JET	02703415	4.331	6.693	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-R9.005.50-JET	02703416	5.512	9.055	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-R19.78.00-JET	02703381	7.874	19.685	1.000	1.000	6.000	1.043	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10005D-L3.102.17-JET	02718993	2.165	3.150	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-L4.002.75-JET	02703436	2.756	3.937	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-L5.003.50-JET	02703437	3.543	5.118	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-L6.704.30-JET	02703438	4.331	6.693	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-L9.005.50-JET	02703439	5.512	9.055	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-L19.78.00-JET	02703387	7.874	19.685	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-R3.102.17-JET	02718989	2.165	3.150	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-R4.002.75-JET	02703417	2.756	3.937	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFOL10005D-R5.003.50-JET	02703418	3.543	5.118	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-R6.704.30-JET	02703419	4.331	6.693	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-R9.005.50-JET	02703420	5.512	9.055	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-R19.78.00-JET	02703382	7.874	19.685	1.000	1.000	6.000	1.043	2.299	1.122	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10006D-L3.102.17-JET	02718994	2.165	3.150	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-L4.002.75-JET	02703440	2.756	3.937	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-L5.003.50-JET	02703441	3.543	5.118	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-L6.704.30-JET	02703442	4.331	6.693	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-L19.78.00-JET	02703388	7.874	19.685	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R19.78.00-JET	02703383	7.874	19.685	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R3.102.17-JET	02718990	2.165	3.150	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R4.002.75-JET	02703421	2.756	3.937	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R5.003.50-JET	02703422	3.543	5.118	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R6.704.30-JET	02703423	4.331	6.693	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-R9.005.50-JET	02703424	5.512	9.055	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-L9.005.50-JET	02703443	5.512	9.055	1.000	1.000	6.000	1.043	2.811	1.496	3988,5	1.540	0.236	88.5	LC..1606..
CFOR12508E-L5.003.50-JET	02703444	3.543	5.118	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOR12508E-L6.704.30-JET	02703445	4.331	6.693	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOR12508E-L9.005.50-JET	02703446	5.512	9.055	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOR12508E-L19.78.00-JET	02703447	7.874	19.685	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOL12508E-R5.003.50-JET	02703425	3.543	5.118	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOL12508E-R6.704.30-JET	02703426	4.331	6.693	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOL12508E-R9.005.50-JET	02703427	5.512	9.055	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOL12508E-R19.78.00-JET	02703428	7.874	19.685	1.250	1.250	7.000	1.315	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..

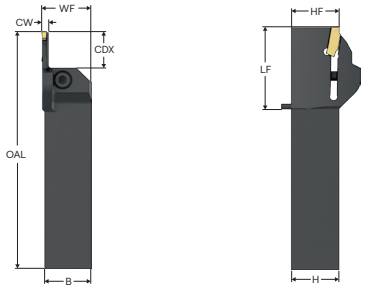
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFOR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM
CFOR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

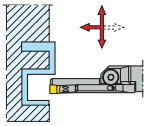
CFOR...R...JETI, CFOL...L...JETI – Toolholders compatible with JETI adapters for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFOR...R...JETI, CFOL...L...JETI

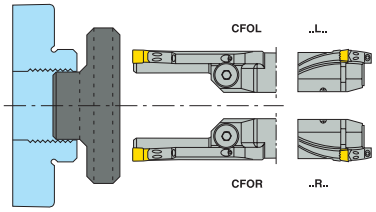


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

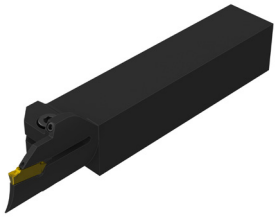
Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOR2525X03R080055-JETI	03244831	55,0	80,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03R100070-JETI	03244873	70,0	100,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03R130090-JETI	03244832	90,0	130,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03R170110-JETI	03244833	110,0	170,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03R230140-JETI	03244874	140,0	230,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X03R500200-JETI	03244794	200,0	500,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOL2525X03L080055-JETI	03244865	55,0	80,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOL2525X03L100070-JETI	03244907	70,0	100,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,1	3,0	5,0	LC..1603..
CFOL2525X03L130090-JETI	03244866	90,0	130,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOL2525X03L170110-JETI	03244908	110,0	170,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOL2525X03L230140-JETI	03244867	140,0	230,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOL2525X03L500200-JETI	03244895	200,0	500,0	25	25	127	43	26,5	24,95	18,0	200,0 bar	0,5	3,0	5,0	LC..1603..
CFOR2525X04R080055-JETI	03244796	55,0	80,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04R100070-JETI	03244857	70,0	100,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,5	4,0	5,0	LC..1604..
CFOR2525X04R130090-JETI	03244768	90,0	130,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04R170110-JETI	03244819	110,0	170,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04R230140-JETI	03244858	140,0	230,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X04R500200-JETI	03244763	200,0	500,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L080055-JETI	03244897	55,0	80,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L100070-JETI	03244851	70,0	100,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L130090-JETI	03244800	90,0	130,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L170110-JETI	03244825	110,0	170,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L230140-JETI	03244852	140,0	230,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOL2525X04L500200-JETI	03244801	200,0	500,0	25	25	135	51	26,5	24,95	24,0	200,0 bar	0,6	4,0	5,0	LC..1604..
CFOR2525X05R080055-JETI	03244775	55,0	80,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05R100070-JETI	03244860	70,0	100,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05R130090-JETI	03244901	90,0	130,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05R170110-JETI	03244820	110,0	170,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05R230140-JETI	03244861	140,0	230,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X05R500200-JETI	03244771	200,0	500,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05L080055-JETI	03244773	55,0	80,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..

Designation	Item number	INPLM	INPLX	H	B	OAL	LF	WF	HF	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOL2525X05L100070-JETI	03244909	70,0	100,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05L130090-JETI	03244767	90,0	130,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05L170110-JETI	03244898	110,0	170,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05L230140-JETI	03244827	140,0	230,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOL2525X05L500200-JETI	03244783	200,0	500,0	25	25	143	59	26,5	24,95	30,0	200,0 bar	0,6	5,0	5,0	LC..1605..
CFOR2525X06R080055-JETI	03244785	55,0	80,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06R100070-JETI	03244840	70,0	100,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOR2525X06R130090-JETI	03244841	90,0	130,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOR2525X06R170110-JETI	03244821	110,0	170,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06R230140-JETI	03244902	140,0	230,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOR2525X06R500200-JETI	03244750	200,0	500,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOL2525X06L080055-JETI	03244872	55,0	80,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOL2525X06L100070-JETI	03244854	70,0	100,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOL2525X06L130090-JETI	03244855	90,0	130,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,1	6,0	5,0	LC..1606..
CFOL2525X06L170110-JETI	03244803	110,0	170,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,6	6,0	5,0	LC..1606..
CFOL2525X06L230140-JETI	03244769	140,0	230,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..
CFOL2525X06L500200-JETI	03244759	200,0	500,0	25	25	154	70	26,5	24,95	36,0	200,0 bar	0,7	6,0	5,0	LC..1606..

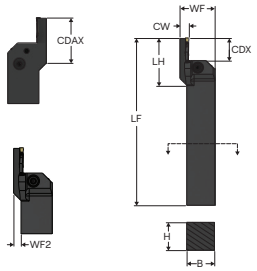
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFOR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM

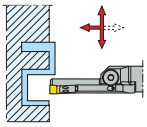
CFOR...R...JET, CFOL...L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFOR...R...JET, CFOL...L...JET

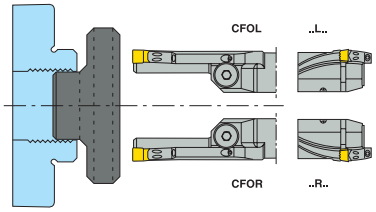


KAPR = 90,0 °



CTWS





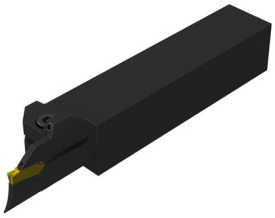
—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFOR3225P08R130090-JET	02703617	90,0	130,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOR3225P08R170110-JET	02703618	110,0	170,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOR3225P08R230140-JET	02703619	140,0	230,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOR3225P08R500200-JET	02703620	200,0	500,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOL3225P08L130090-JET	02703593	90,0	130,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOL3225P08L170110-JET	02703594	110,0	170,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOL3225P08L230140-JET	02703595	140,0	230,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..
CFOL3225P08L500200-JET	02703596	200,0	500,0	32	25	170	26,5	1,5	83,0	48,0	275,0 bar	0,9	8,0	10,0	LC..3008..

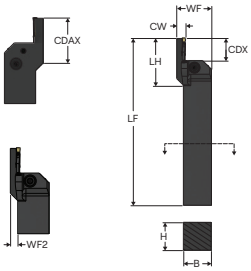
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

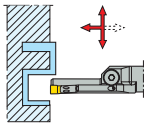
CFOR...R...JET, CFOL...L...JET – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFOR...R...JET, CFOL...L...JET

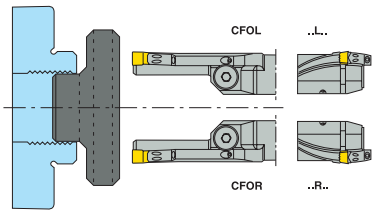


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846, 848, 849-851
—For holder code key, see page(s) 697-698
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFOR10003D-R3.102.17-JET	02719007	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-R4.002.75-JET	02703472	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-R5.003.50-JET	02703473	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-R6.704.30-JET	02703474	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-R9.005.50-JET	02703475	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10003D-R19.78.00-JET	02703476	7.874	19.685	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-L3.102.17-JET	02719003	2.165	3.150	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.760	0.118	53.1	LC..1603..
CFOL10003D-L4.002.75-JET	02703448	2.756	3.937	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-L5.003.50-JET	02703449	3.543	5.118	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-L6.704.30-JET	02703450	4.331	6.693	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-L9.005.50-JET	02703451	5.512	9.055	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOL10003D-L19.78.00-JET	02703452	7.874	19.685	1.000	1.000	6.000	1.043	0.059	1.693	0.709	3988,5	1.540	0.118	53.1	LC..1603..
CFOR10004D-R3.102.17-JET	02719008	2.165	3.150	1.000	1.004	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-R4.002.75-JET	02703477	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-R5.003.50-JET	02703478	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-R6.704.30-JET	02703479	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-R9.005.50-JET	02703480	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10004D-R19.78.00-JET	02703481	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L3.102.17-JET	02719004	2.165	3.150	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L4.002.75-JET	02703453	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L5.003.50-JET	02703454	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L6.704.30-JET	02703455	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L9.005.50-JET	02703456	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOL10004D-L19.78.00-JET	02703457	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.008	0.945	3988,5	1.540	0.157	70.8	LC..1604..
CFOR10005D-R3.102.17-JET	02719009	2.165	3.150	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-R4.002.75-JET	02703482	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-R5.003.50-JET	02703483	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-R6.704.30-JET	02703484	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-R9.005.50-JET	02703485	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10005D-R19.78.00-JET	02703486	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-L3.102.17-JET	02719005	2.165	3.150	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-L4.002.75-JET	02703458	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	WF2	LH	CDX	CP	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs	inch	In/Lbs.	
CFOL10005D-L5.003.50-JET	02703459	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-L6.704.30-JET	02703460	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-L9.005.50-JET	02703461	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOL10005D-L19.78.00-JET	02703462	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.283	1.181	3988,5	1.540	0.197	70.8	LC..1605..
CFOR10006D-R3.102.17-JET	02719010	2.165	3.150	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.760	0.236	88.5	LC..1606..
CFOR10006D-R4.002.75-JET	02703487	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-R5.003.50-JET	02703488	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-R6.704.30-JET	02703489	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-R9.005.50-JET	02703490	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOR10006D-R19.78.00-JET	02703491	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L3.102.17-JET	02719006	2.165	3.150	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L4.002.75-JET	02703463	2.756	3.937	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L5.003.50-JET	02703464	3.543	5.118	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L6.704.30-JET	02703465	4.331	6.693	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L9.005.50-JET	02703466	5.512	9.055	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOL10006D-L19.78.00-JET	02703467	7.874	19.685	1.000	1.000	6.000	1.043	0.059	2.756	1.417	3988,5	1.540	0.236	88.5	LC..1606..
CFOR12508E-R5.003.50-JET	02703492	3.543	5.118	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOR12508E-R6.704.30-JET	02703493	4.331	6.693	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOR12508E-R9.005.50-JET	02703494	5.512	9.055	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOR12508E-R19.78.00-JET	02703495	7.874	19.685	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..
CFOL12508E-L5.003.50-JET	02703468	3.543	5.118	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOL12508E-L6.704.30-JET	02703469	4.331	6.693	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOL12508E-L9.005.50-JET	02703470	5.512	9.055	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.430	0.315	132.8	LC..3008..
CFOL12508E-L19.78.00-JET	02703471	7.874	19.685	1.250	1.250	7.000	1.043	0.059	3.268	1.890	3988,5	2.650	0.315	132.8	LC..3008..

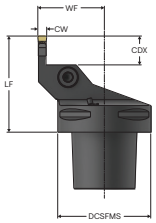
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
CFOR/L..-03	4SMS795	TCEI0513	JET-P1/8-5MM
CFOR/L..-04	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-05	5SMS795	TCEI0613	JET-P1/8-5MM
CFOR/L..-06	6SMS795	TCEI0815	JET-P1/8-5MM
CFOR/L..-08	6SMS795	TCEI1020	JET-P1/8-5MM

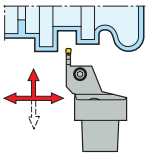
C.-CFIR/L – Toolholders for inserts LCGN, LCMF, LCMR – Metric/ Inch



C.-CFIR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 695
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

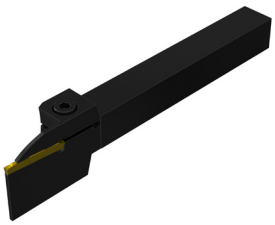
Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CFIR-27055-03	00091707	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	9,0 *0.354*	195,0 *7.677*	0,4 *0.880*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C4-CFIL-27055-03	00091706	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	9,0 *0.354*	195,0 *7.677*	0,4 *0.880*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C4-CFIR-27055-04	00091709	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	12,0 *0.472*	195,0 *7.677*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIL-27055-04	00091708	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	12,0 *0.472*	195,0 *7.677*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CFIR-27055-05	00091711	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	15,0 *0.591*	195,0 *7.677*	0,4 *0.880*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CFIL-27055-05	00091710	C4	40,0 *1.575*	27,0 *1.063*	55 *2.165*	15,0 *0.591*	195,0 *7.677*	0,4 *0.880*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35060-03	00091713	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	0,6 *1.320*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C5-CFIL-35060-03	00091712	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	9,0 *0.354*	195,0 *7.677*	0,6 *1.320*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C5-CFIR-35060-04	00091715	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	12,0 *0.472*	195,0 *7.677*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIL-35060-04	00091714	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	12,0 *0.472*	195,0 *7.677*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CFIR-35060-05	00092112	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	15,0 *0.591*	195,0 *7.677*	0,6 *1.320*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIL-35060-05	00092111	C5	50,0 *1.969*	35,0 *1.378*	60 *2.362*	15,0 *0.591*	195,0 *7.677*	0,6 *1.320*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CFIR-35065-06	02303613	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	18,0 *0.709*	195,0 *7.677*	0,7 *1.540*	6,0 *0.236*	10,0 *88.5*	LC..1606..
C5-CFIL-35065-06	02415000	C5	50,0 *1.969*	35,0 *1.378*	65 *2.559*	18,0 *0.709*	195,0 *7.677*	0,7 *1.540*	6,0 *0.236*	10,0 *88.5*	LC..1606..
C6-CFIR-45065-03	00094475	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	195,0 *7.677*	1,0 *2.200*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C6-CFIL-45065-03	00038098	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	9,0 *0.354*	195,0 *7.677*	1,0 *2.200*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C6-CFIR-45065-04	00094476	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIL-45065-04	00038100	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	12,0 *0.472*	195,0 *7.677*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CFIR-45065-05	00094477	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	15,0 *0.591*	195,0 *7.677*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIL-45065-05	00012730	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	15,0 *0.591*	195,0 *7.677*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CFIR-45065-06	00012338	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	18,0 *0.709*	195,0 *7.677*	1,1 *2.430*	6,0 *0.236*	10,0 *88.5*	LC..1606..
C6-CFIL-45065-06	00012340	C6	63,0 *2.480*	45,0 *1.772*	65 *2.559*	18,0 *0.709*	195,0 *7.677*	1,1 *2.430*	6,0 *0.236*	10,0 *88.5*	LC..1606..

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	DCINN3	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CFIR-45075-08	00038107	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	24,0 *0.945*	195,0 *7.677*	1,2 *2.650*	8,0 *0.315*	10,0 *88.5*	LC..3008..
C6-CFIL-45075-08	00038106	C6	63,0 *2.480*	45,0 *1.772*	75 *2.953*	24,0 *0.945*	195,0 *7.677*	1,2 *2.650*	8,0 *0.315*	10,0 *88.5*	LC..3008..

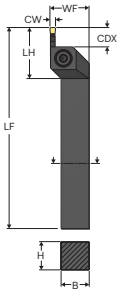
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Coolant nozzle
			
C4..-03	3SMS795	MC6S4X18	CN6
C4..-04	4SMS795	MC6S5X18	CN6
C4..-05	4SMS795	MC6S5X18	CN6
C5..-03	3SMS795	MC6S4X18	CN7
C5..-04	4SMS795	MC6S5X18	CN7
C5..-05	4SMS795	MC6S5X18	CN7
C5..-06	6SMS795	TCEI0815	CN7
CFIR/L..-03	3SMS795	MC6S4X18	CN7
CFIR/L..-04	4SMS795	MC6S5X18	CN7
CFIR/L..-05	4SMS795	MC6S5X18	CN7
CFIR/L..-06	6SMS795	TCEI0815	CN7
CFIR/L..-08	6SMS795	TCEI0825	CN7

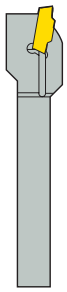
CFIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



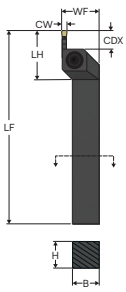
CFIR/L1212../1616..



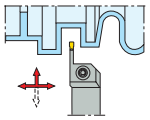
CFIR/L1212..



CFIR/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

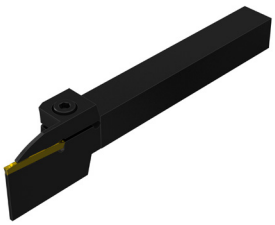
Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFIR1212M03	02435854	12	12	150	12,0	31,0	9,0	–	0,2	3,0	2,5	LC..1603..
CFIR1616H03	00091799	16	16	100	16,0	28,0	9,0	–	0,2	3,0	6,0	LC..1603..
CFIR2020K03	00068771	20	20	125	21,5	28,0	9,0	–	0,4	3,0	6,0	LC..1603..
CFIR2525M03	00068773	25	25	150	26,5	28,0	9,0	195,0	0,7	3,0	6,0	LC..1603..
CFIR3225P03	00013453	32	25	170	26,5	28,0	9,0	195,0	1,0	3,0	6,0	LC..1603..
CFIL1212M03	02435855	12	12	150	12,0	31,0	9,0	–	0,2	3,0	2,5	LC..1603..
CFIL1616H03	00091798	16	16	100	16,0	28,0	9,0	–	0,2	3,0	6,0	LC..1603..
CFIL2020K03	00068770	20	20	125	21,5	28,0	9,0	–	0,4	3,0	6,0	LC..1603..
CFIL2525M03	00068772	25	25	150	26,5	28,0	9,0	195,0	0,7	3,0	6,0	LC..1603..
CFIL3225P03	00013452	32	25	170	26,5	28,0	9,0	195,0	1,0	3,0	6,0	LC..1603..
CFIR1212M04	02435857	12	12	150	12,0	33,0	12,0	–	0,2	4,0	3,5	LC..1604..
CFIR1616H04	00091801	16	16	100	16,0	31,0	12,0	–	0,3	4,0	8,0	LC..1604..
CFIR2020K04	00068783	20	20	125	21,5	31,0	12,0	–	0,4	4,0	8,0	LC..1604..
CFIR2525M04	00068785	25	25	150	26,5	31,0	12,0	195,0	0,7	4,0	8,0	LC..1604..
CFIR3225P04	00091803	32	25	170	26,5	31,0	12,0	195,0	1,0	4,0	8,0	LC..1604..
CFIL1212M04	02435861	12	12	150	12,0	33,0	12,0	–	0,2	4,0	3,5	LC..1604..
CFIL1616H04	00091800	16	16	100	16,0	31,0	12,0	–	0,3	4,0	8,0	LC..1604..
CFIL2020K04	00068782	20	20	125	21,5	31,0	12,0	–	0,4	4,0	8,0	LC..1604..
CFIL2525M04	00068784	25	25	150	26,5	31,0	12,0	195,0	0,7	4,0	8,0	LC..1604..
CFIL3225P04	00091802	32	25	170	26,5	31,0	12,0	195,0	1,0	4,0	8,0	LC..1604..
CFIR2020K05	00068769	20	20	125	21,5	35,0	15,0	–	0,4	5,0	8,0	LC..1605..
CFIR2525M05	00068775	25	25	150	26,5	35,0	15,0	195,0	0,7	5,0	8,0	LC..1605..
CFIR3225P05	00091993	32	25	170	26,5	35,0	15,0	195,0	1,0	5,0	8,0	LC..1605..
CFIL2020K05	00068768	20	20	125	21,5	35,0	15,0	–	0,4	5,0	8,0	LC..1605..
CFIL2525M05	00068774	25	25	150	26,5	35,0	15,0	195,0	0,7	5,0	8,0	LC..1605..
CFIL3225P05	00091804	32	25	170	26,5	35,0	15,0	195,0	1,0	5,0	8,0	LC..1605..
CFIR2020K06	00068781	20	20	125	21,5	42,0	18,0	–	0,4	6,0	10,0	LC..1606..
CFIR2525M06	00068797	25	25	150	26,5	42,0	18,0	195,0	0,7	6,0	10,0	LC..1606..
CFIR3225P06	00068799	32	25	170	26,5	42,0	18,0	195,0	1,0	6,0	10,0	LC..1606..
CFIL2020K06	00068780	20	20	125	21,5	42,0	18,0	–	0,4	6,0	10,0	LC..1606..
CFIL2525M06	00068796	25	25	150	26,5	42,0	18,0	195,0	0,7	6,0	10,0	LC..1606..
CFIL3225P06	00068798	32	25	170	26,5	42,0	18,0	195,0	1,0	6,0	10,0	LC..1606..
CFIR2525M08	00023573	25	25	150	28,0	55,0	24,0	195,0	0,7	8,0	15,0	LC..3008..
CFIR3225P08	00004358	32	25	170	28,0	55,0	24,0	195,0	1,0	8,0	15,0	LC..3008..

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFIL2525M08	00023572	25	25	150	28,0	55,0	24,0	195,0	0,7	8,0	15,0	LC..3008..
CFIL3225P08	00004359	32	25	170	28,0	55,0	24,0	195,0	1,0	8,0	15,0	LC..3008..

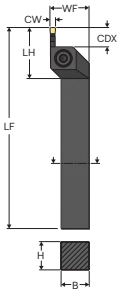
Spare Parts, included in delivery

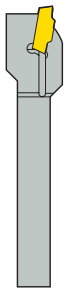
For	Clamp key	Clamp screw
		
..1212M03	3SMS795	TCEI0409
..1212M04	3SMS795	TCEI0409
..1616H03	4SMS795	TCEI0509
..1616H04	5SMS795	TCEI0609
..2020K03	4SMS795	TCEI0513
..2020K04	5SMS795	TCEI0613
..2525M03	4SMS795	TCEI0513
..2525M04	5SMS795	TCEI0613
..3225P03	4SMS795	TCEI0513
..3225P04	5SMS795	TCEI0613
CFIR/L..-05	5SMS795	TCEI0613
CFIR/L..-06	6SMS795	TCEI0815
CFIR/L..-08	6SMS795	TCEI1020

CFIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch

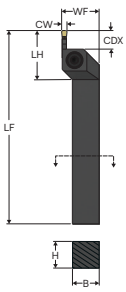


CFIR/L063..

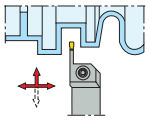




CFIR/L



KAPR = 90,0 °



CTWS



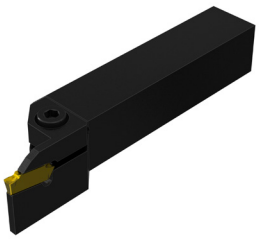
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFIR06303B	00002795	0.625	0.625	4.500	0.875	1.142	0.354	–	0.660	0.118	53.1	LC..1603..
CFIR07503B	00087626	0.750	0.750	4.500	1.000	1.142	0.354	–	0.880	0.118	53.1	LC..1603..
CFIR10003D	00087628	1.000	1.000	6.000	1.250	1.142	0.354	7.677	1.760	0.118	53.1	LC..1603..
CFIR12503D	00002809	1.250	1.250	6.000	1.500	1.142	0.354	7.677	2.650	0.118	53.1	LC..1603..
CFIL06303B	00002800	0.625	0.625	4.500	0.875	1.142	0.354	–	0.660	0.118	53.1	LC..1603..
CFIL07503B	00087627	0.750	0.750	4.500	1.000	1.142	0.354	–	0.880	0.118	53.1	LC..1603..
CFIL10003D	00087629	1.000	1.000	6.000	1.250	1.142	0.354	7.677	1.760	0.118	53.1	LC..1603..
CFIL12503D	00002811	1.250	1.250	6.000	1.500	1.142	0.354	7.677	2.650	0.118	53.1	LC..1603..
CFIR07504B	00087630	0.750	0.750	4.500	1.000	1.220	0.472	–	0.880	0.157	70.8	LC..1604..
CFIR10004D	00087632	1.000	1.000	6.000	1.250	1.220	0.472	7.677	1.760	0.157	70.8	LC..1604..
CFIR12504D	00002813	1.250	1.250	6.000	1.500	1.220	0.472	7.677	2.650	0.157	70.8	LC..1604..
CFIL07504B	00087631	0.750	0.750	4.500	1.000	1.220	0.472	–	0.880	0.157	70.8	LC..1604..
CFIL10004D	00087633	1.000	1.000	6.000	1.250	1.220	0.472	7.677	1.760	0.157	70.8	LC..1604..
CFIL12504D	00002817	1.250	1.250	6.000	1.500	1.220	0.472	7.677	2.650	0.157	70.8	LC..1604..
CFIR07505B	00089897	0.750	0.750	4.500	1.000	1.417	0.591	–	0.880	0.197	70.8	LC..1605..
CFIR10005D	00090975	1.000	1.000	6.000	1.250	1.299	0.591	7.677	1.760	0.197	70.8	LC..1605..
CFIR12505D	00002821	1.250	1.250	6.000	1.500	1.614	0.591	7.677	2.430	0.197	70.8	LC..1605..
CFIL07505B	00089896	0.750	0.750	4.500	1.000	1.417	0.591	–	0.880	0.197	70.8	LC..1605..
CFIL10005D	00090974	1.000	1.000	6.000	1.250	1.299	0.591	7.677	1.760	0.197	70.8	LC..1605..
CFIL12505D	00002822	1.250	1.250	6.000	1.500	1.614	0.591	7.677	2.430	0.197	70.8	LC..1605..
CFIR10006D	00087634	1.000	1.000	6.000	1.250	1.614	0.709	7.677	1.760	0.236	88.5	LC..1606..
CFIR12506D	00087636	1.250	1.250	6.000	1.500	1.614	0.709	7.677	2.430	0.236	88.5	LC..1606..
CFIL10006D	00087635	1.000	1.000	6.000	1.250	1.614	0.709	7.677	1.760	0.236	88.5	LC..1606..
CFIL12506D	00087637	1.250	1.250	6.000	1.500	1.614	0.709	7.677	2.430	0.236	88.5	LC..1606..
CFIR10008D	00057717	1.000	1.000	6.000	1.250	2.165	0.996	7.677	1.760	0.315	132.8	LC..3008..
CFIR12508E	00057719	1.250	1.250	7.000	1.500	2.165	0.945	7.677	2.870	0.315	132.8	LC..3008..
CFIL10008D	00057718	1.000	1.000	6.000	1.250	2.165	0.996	7.677	1.760	0.315	132.8	LC..3008..
CFIL12508E	00057720	1.250	1.250	7.000	1.500	2.165	0.945	7.677	2.870	0.315	132.8	LC..3008..

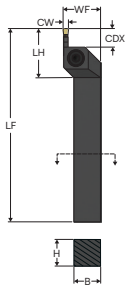
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0509
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613
..05	5SMS795	TCEI0613
..06	6SMS795	TCEI0815
..08	6SMS795	TCEI1020

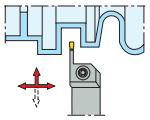
CFMR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFMR/L



KAPR = 90,0 °



CTWS



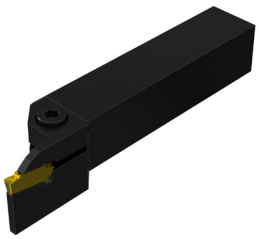
- Right-hand version shown
- For inserts program, see page(s) 846-859, 861-862
- For holder code key, see page(s) 697-698
- Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
- CW = indicative Cutting Width, may vary depending on the chosen insert
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFMR2020K03	00068777	20	20	125	21,5	36,0	15,0	–	0,4	3,0	6,0	LC..1603..
CFMR2525M03	00068779	25	25	150	26,5	36,0	15,0	195,0	0,7	3,0	6,0	LC..1603..
CFMR3225P03	00013460	32	25	170	26,5	36,0	15,0	195,0	1,0	3,0	6,0	LC..1603..
CFML2020K03	00068776	20	20	125	21,5	36,0	15,0	–	0,4	3,0	6,0	LC..1603..
CFML2525M03	00068778	25	25	150	26,5	36,0	15,0	195,0	0,7	3,0	6,0	LC..1603..
CFML3225P03	00013459	32	25	170	26,5	36,0	15,0	195,0	1,0	3,0	6,0	LC..1603..
CFMR2020K04	00068791	20	20	125	21,5	39,0	20,0	–	0,4	4,0	8,0	LC..1604..
CFMR2525M04	00068793	25	25	150	26,5	41,0	20,0	195,0	0,7	4,0	8,0	LC..1604..
CFMR3225P04	00091807	32	25	170	26,5	41,0	20,0	195,0	1,0	4,0	8,0	LC..1604..
CFML2020K04	00068790	20	20	125	21,5	39,0	20,0	–	0,4	4,0	8,0	LC..1604..
CFML2525M04	00068792	25	25	150	26,5	41,0	20,0	195,0	0,7	4,0	8,0	LC..1604..
CFML3225P04	00091806	32	25	170	26,5	41,0	20,0	195,0	1,0	4,0	8,0	LC..1604..
CFMR2020K05	00068789	20	20	125	21,5	50,0	25,0	–	0,4	5,0	8,0	LC..1605..
CFMR2525M05	00068787	25	25	150	26,5	50,0	25,0	195,0	0,7	5,0	8,0	LC..1605..
CFMR3225P05	00091809	32	25	170	26,5	50,0	25,0	195,0	0,9	5,0	8,0	LC..1605..
CFML2020K05	00068788	20	20	125	21,5	50,0	25,0	–	0,4	5,0	8,0	LC..1605..
CFML2525M05	00068786	25	25	150	26,5	50,0	25,0	195,0	0,7	5,0	8,0	LC..1605..
CFML3225P05	00091808	32	25	170	26,5	50,0	25,0	195,0	1,0	5,0	8,0	LC..1605..
CFMR2020M06	00068795	20	20	150	21,5	60,0	30,0	–	0,5	6,0	10,0	LC..1606..
CFMR2525M06	00068801	25	25	150	26,5	60,0	30,0	195,0	0,7	6,0	10,0	LC..1606..
CFMR3225P06	00068803	32	25	170	26,5	60,0	30,0	195,0	1,0	6,0	10,0	LC..1606..
CFML2020M06	00068794	20	20	150	21,5	60,0	30,0	–	0,4	6,0	10,0	LC..1606..
CFML2525M06	00068800	25	25	150	26,5	60,0	30,0	195,0	0,7	6,0	10,0	LC..1606..
CFML3225P06	00068802	32	25	170	26,5	60,0	30,0	195,0	1,0	6,0	10,0	LC..1606..
CFMR2525P08	00023576	25	25	170	28,0	74,0	40,0	195,0	0,8	8,0	15,0	LC..3008..
CFMR3225P08	00004360	32	25	170	28,0	74,0	40,0	195,0	1,0	8,0	15,0	LC..3008..
CFML2525P08	00023574	25	25	170	28,0	74,0	40,0	195,0	0,8	8,0	15,0	LC..3008..
CFML3225P08	00004362	32	25	170	28,0	74,0	40,0	195,0	1,0	8,0	15,0	LC..3008..

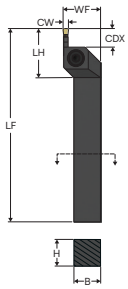
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFMR/L..-03	4SMS795	TCEI0513
CFMR/L..-04	5SMS795	TCEI0613
CFMR/L..-05	5SMS795	TCEI0613
CFMR/L..-06	6SMS795	TCEI0815
CFMR/L..-08	6SMS795	TCEI1020

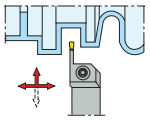
CFMR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFMR/L



KAPR = 90,0 °



CTWS



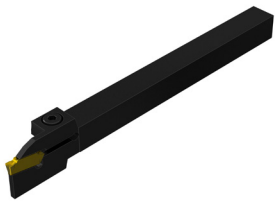
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFMR07503B	00002849	0.750	0.750	4.500	1.000	1.339	0.591	–	0.660	0.118	53.1	LC..1603..
CFML07503B	00002850	0.750	0.750	4.500	1.000	1.339	0.591	–	0.660	0.118	53.1	LC..1603..
CFMR10003D	00096174	1.000	1.000	6.000	1.250	1.378	0.591	7.677	1.540	0.118	53.1	LC..1603..
CFML10003D	00096175	1.000	1.000	6.000	1.250	1.378	0.591	7.677	1.540	0.118	53.1	LC..1603..
CFMR12503D	00002852	1.250	1.250	6.000	1.500	1.378	0.591	7.677	2.200	0.118	53.1	LC..1603..
CFML12503D	00002863	1.250	1.250	6.000	1.500	1.378	0.591	7.677	2.200	0.118	53.1	LC..1603..
CFML15003E	00059806	1.500	1.500	7.000	2.000	1.614	0.591	7.677	3.970	0.118	53.1	LC..1603..
CFMR07504B	00002918	0.750	0.750	4.500	1.000	1.575	0.787	–	0.660	0.157	70.8	LC..1604..
CFML07504B	00002919	0.750	0.750	4.500	1.000	1.575	0.787	–	0.660	0.157	70.8	LC..1604..
CFMR10004D	00096176	1.000	1.000	6.000	1.250	1.614	0.787	7.677	1.540	0.157	70.8	LC..1604..
CFML10004D	00096177	1.000	1.000	6.000	1.250	1.614	0.787	7.677	1.540	0.157	70.8	LC..1604..
CFMR12504D	00002920	1.250	1.250	6.000	1.500	1.614	0.787	7.677	2.430	0.157	70.8	LC..1604..
CFML12504D	00002922	1.250	1.250	6.000	1.500	1.614	0.787	7.677	2.430	0.157	70.8	LC..1604..
CFMR15004E	00059807	1.500	1.500	7.000	2.000	1.969	0.787	7.677	3.750	0.157	70.8	LC..1604..
CFMR10005D	00096178	1.000	1.000	6.000	1.250	2.008	0.984	7.677	1.540	0.197	70.8	LC..1605..
CFML10005D	00096179	1.000	1.000	6.000	1.250	2.008	0.984	7.677	1.540	0.197	70.8	LC..1605..
CFMR12505D	00002923	1.250	1.250	6.000	1.500	1.969	0.984	7.677	2.430	0.197	70.8	LC..1605..
CFML12505D	00002924	1.250	1.250	6.000	1.500	1.969	0.984	7.677	2.430	0.197	70.8	LC..1605..
CFMR15005E	00059809	1.500	1.500	7.000	2.000	2.244	0.984	7.677	3.750	0.197	70.8	LC..1605..
CFMR10006D	00096180	1.000	1.000	6.000	1.250	2.362	1.181	7.677	1.540	0.236	88.5	LC..1606..
CFML10006D	00096181	1.000	1.000	6.000	1.250	2.362	1.181	7.677	1.540	0.236	88.5	LC..1606..
CFMR12506D	00002970	1.250	1.250	6.000	1.500	2.362	1.181	7.677	2.200	0.236	88.5	LC..1606..
CFML12506D	00002972	1.250	1.250	6.000	1.500	2.362	1.181	7.677	2.200	0.236	88.5	LC..1606..
CFMR15006E	00059811	1.500	1.500	7.000	2.000	2.598	1.181	7.677	3.750	0.236	88.5	LC..1606..
CFML15006E	00059812	1.500	1.500	7.000	2.000	2.598	1.181	7.677	3.750	0.236	88.5	LC..1606..
CFMR10008D	00059847	1.000	1.000	6.000	1.250	2.795	1.575	7.677	1.540	0.315	132.8	LC..3008..
CFML10008D	00059848	1.000	1.000	6.000	1.250	2.795	1.575	7.677	1.540	0.315	132.8	LC..3008..
CFMR12508E	00059849	1.250	1.250	7.000	1.500	2.795	1.575	7.677	2.650	0.315	132.8	LC..3008..
CFML12508E	00059850	1.250	1.250	7.000	1.500	2.795	1.575	7.677	2.430	0.315	132.8	LC..3008..
CFMR15008E	00059813	1.500	1.500	7.000	2.000	2.795	1.575	7.677	3.750	0.315	132.8	LC..3008..
CFML15008E	00059814	1.500	1.500	7.000	2.000	2.795	1.575	7.677	3.530	0.315	132.8	LC..3008..

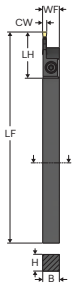
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613
..05	5SMS795	TCEI0613
..06	6SMS795	TCEI0815
..08	6SMS795	TCEI1020

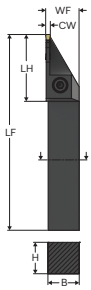
CF.R/L – Toolholders for inserts LCGN, LCMR – Metric



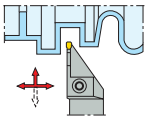
CF..1212, 1616



CF..2020, 2525



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFOR1212M03	00053367	12	12	150	12,0	32,1	37,0	0,2	3,0	3,5	LC..1603..
CFOL1212M03	00053357	12	12	150	12,0	32,1	37,0	0,2	3,0	3,5	LC..1603..
CFTR1616M03	00054058	16	16	150	16,0	42,0	50,0	0,3	3,0	6,0	LC..1603..
CFTR2020K03	00054060	20	20	125	21,5	43,0	50,0	0,4	3,0	6,0	LC..1603..
CFTR2525M03	00054066	25	25	150	26,5	42,5	50,0	0,7	3,0	6,0	LC..1603..
CFTL1616M03	00054057	16	16	150	16,0	42,0	50,0	0,3	3,0	6,0	LC..1603..
CFTL2020K03	00054059	20	20	125	21,5	43,0	50,0	0,4	3,0	6,0	LC..1603..
CFTL2525M03	00054063	25	25	150	26,5	42,5	50,0	0,7	3,0	6,0	LC..1603..
CFPR2020K04	00054073	20	20	125	21,5	43,0	50,0	0,4	4,0	8,0	LC..1604..
CFPR2525M04	00054078	25	25	150	26,5	43,0	50,0	0,7	4,0	8,0	LC..1604..
CFPL2020K04	00054071	20	20	125	21,5	43,0	50,0	0,4	4,0	8,0	LC..1604..
CFPL2525M04	00054074	25	25	150	26,5	43,0	50,0	0,7	4,0	8,0	LC..1604..

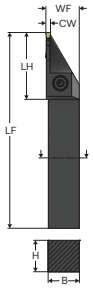
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..-03	3SMS795	TCEI0409
CFPR/L..-04	5SMS795	TCEI0613
CFTR/L..-03	4SMS795	TCEI0513

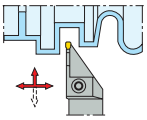
CF.R/L – Toolholders for inserts LCGN, LCMR – Inch



CFTR/L



KAPR = 90,0 °



CTWS



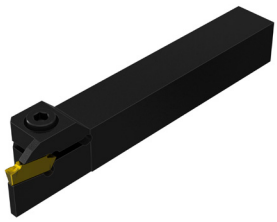
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFTR07503C	00086323	0.750	0.750	5.000	1.000	1.654	1.969	0.880	0.118	53.1	LC..1603..
CFTR10003D	00086326	1.000	1.000	6.000	1.250	1.654	1.969	1.540	0.118	53.1	LC..1603..
CFTL07503C	00086332	0.750	0.750	5.000	1.000	1.654	1.969	0.880	0.118	53.1	LC..1603..
CFTL10003D	00086333	1.000	1.000	6.000	1.250	1.654	1.969	1.760	0.118	53.1	LC..1603..
CFPR10004D	00086317	0.626	0.626	6.000	1.250	1.693	1.969	1.760	0.157	70.8	LC..1604..
CFPL10004D	00086320	0.626	0.626	6.000	1.250	1.693	1.969	1.760	0.157	70.8	LC..1604..

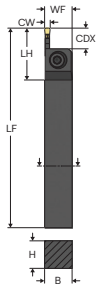
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613

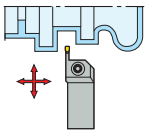
CF.R/L – Toolholders for inserts LCGN, LCMR – Inch



CIIR/L



KAPR = 90,0 °



CTWS



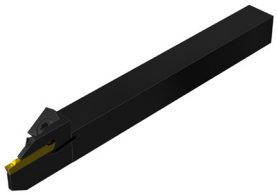
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CIIR05003D	00057794	0.500	0.500	6.000	0.500	1.142	0.433	0.440	0.118	53.1	LC..1603..
CIIR062503B	00057792	0.625	0.625	4.500	0.625	1.142	0.433	0.660	0.118	53.1	LC..1603..
CIIL05003D	00057795	0.500	0.500	6.000	0.500	1.142	0.433	0.440	0.118	53.1	LC..1603..
CIIL062503B	00057793	0.625	0.625	4.500	0.625	1.142	0.433	0.660	0.118	53.1	LC..1603..

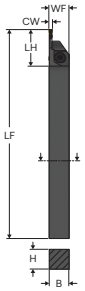
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0509

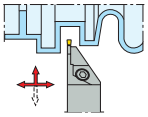
CF.R/L..RB – Toolholders for inserts LCMF – Metric



CF.R/L..RB



KAPR = 90,0 °



CTWS



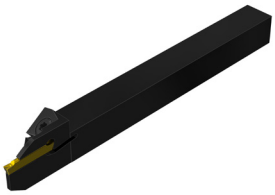
—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFOR1212K1902RB	02748517	12	12	125	12,0	22,0	25,4	0,2	2,0	5,0	LC..1902..
CFOR1616K1902RB	02748518	16	16	125	16,0	22,0	25,4	0,3	2,0	5,0	LC..1902..
CFOL1212K1902RB	02748520	12	12	125	12,0	22,0	25,4	0,2	2,0	5,0	LC..1902..
CFOL1616K1902RB	02748523	16	16	125	16,0	22,0	25,4	0,3	2,0	5,0	LC..1902..
CFSR1212K1902RB	02748524	12	12	125	12,0	25,0	33,0	0,2	2,0	5,0	LC..1902..
CFSR1616K1902RB	02748526	16	16	125	16,0	25,0	33,0	0,3	2,0	5,0	LC..1902..
CFSL1212K1902RB	02748528	12	12	125	12,0	25,0	33,0	0,2	2,0	5,0	LC..1902..
CFSL1616K1902RB	02748530	16	16	125	16,0	25,0	33,0	0,3	2,0	5,0	LC..1902..

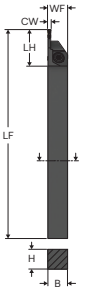
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFOR/L..19	T15P-7S	L85012-T15P
CFSR/L..19	T15P-7S	L85012-T15P

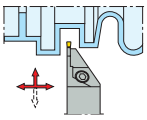
CF.R/L..RB – Toolholders for inserts LCMF – Inch



CF.R/L..RB



KAPR = 90,0 °



CTWS



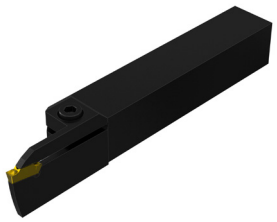
—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CUTDIA*	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFOR0501902CRB	02748812	0.500	0.500	5.000	0.500	0.866	1.000	0.440	0.079	44.3	LC..1902..
CFOR0631902CRB	02748816	0.625	0.625	5.000	0.625	0.866	1.000	0.660	0.079	44.3	LC..1902..
CFOL0501902CRB	02748814	0.500	0.500	5.000	0.500	0.866	1.000	0.440	0.079	44.3	LC..1902..
CFOL0631902CRB	02748817	0.625	0.625	5.000	0.625	0.866	1.000	0.660	0.079	44.3	LC..1902..
CFSR0501902CRB	02748820	0.500	0.500	5.000	0.500	0.984	1.299	0.440	0.079	44.3	LC..1902..
CFSR0631902CRB	02748826	0.625	0.625	5.000	0.625	0.984	1.299	0.660	0.079	44.3	LC..1902..
CFSL0501902CRB	02748823	0.500	0.500	5.000	0.500	0.984	1.299	0.440	0.079	44.3	LC..1902..
CFSL0631902CRB	02748828	0.625	0.625	5.000	0.625	0.984	1.299	0.660	0.079	44.3	LC..1902..

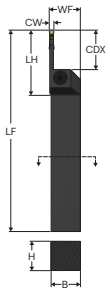
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CF.R/L	T15P-7S	L85012-T15P

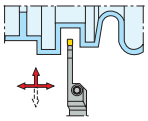
CFSR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CFSR/L



KAPR = 90,0 °



CTWS



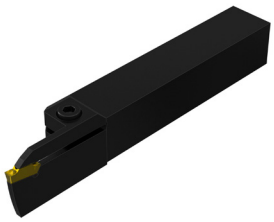
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFSR2525M03	02703367	25	25	150	26,5	46,0	24,0	195,0	0,7	3,0	6,0	LC..1603..
CFSR3225P03	02703375	32	25	170	26,1	46,0	24,0	195,0	1,0	3,0	6,0	LC..1603..
CFSL2525M03	02703363	25	25	150	26,5	46,0	24,0	195,0	0,7	3,0	6,0	LC..1603..
CFSL3225P03	02703371	32	25	170	26,1	46,0	24,0	195,0	1,0	3,0	6,0	LC..1603..
CFSR2525P04	00069914	25	25	170	26,5	55,0	32,0	195,0	0,7	4,0	8,0	LC..1604..
CFSR3225P04	02703376	32	25	170	26,5	55,0	32,0	195,0	0,9	4,0	8,0	LC..1604..
CFSL2525P04	02703364	25	25	170	26,5	55,0	32,0	195,0	0,8	4,0	8,0	LC..1604..
CFSL3225P04	02703372	32	25	170	26,5	55,0	32,0	195,0	0,9	4,0	8,0	LC..1604..
CFSR2525P05	02703368	25	25	170	26,5	66,0	40,0	195,0	0,7	5,0	8,0	LC..1605..
CFSR3225P05	02703377	32	25	170	26,5	66,0	40,0	195,0	0,9	5,0	8,0	LC..1605..
CFSL2525P05	02703365	25	25	170	26,5	66,0	40,0	195,0	0,7	5,0	8,0	LC..1605..
CFSL3225P05	02703373	32	25	170	26,5	66,0	40,0	195,0	0,9	5,0	8,0	LC..1605..
CFSR2525R06	02703370	25	25	200	26,5	81,0	48,0	195,0	0,9	6,0	10,0	LC..1606..
CFSR3225R06	02703378	32	25	200	26,5	81,0	48,0	195,0	1,1	6,0	10,0	LC..1606..
CFSL2525R06	02703366	25	25	200	26,5	81,0	48,0	195,0	0,9	6,0	10,0	LC..1606..
CFSL3225R06	02703374	32	25	200	26,5	81,0	48,0	195,0	1,1	6,0	10,0	LC..1606..
CFSR3225R08	02676893	32	25	200	28,0	104,0	64,0	195,0	1,1	8,0	15,0	LC..3008..
CFSL3225R08	02676892	32	25	200	28,0	104,0	64,0	195,0	1,0	8,0	15,0	LC..3008..

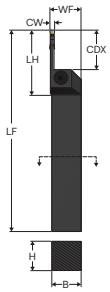
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFSR/L..03	4SMS795	TCEI0513
CFSR/L..04	5SMS795	TCEI0613
CFSR/L..05	5SMS795	TCEI0613
CFSR/L..06	6SMS795	TCEI0815
CFSR/L..08	6SMS795	TCEI1020

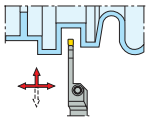
CFSR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFSR/L



KAPR = 90,0 °



CTWS



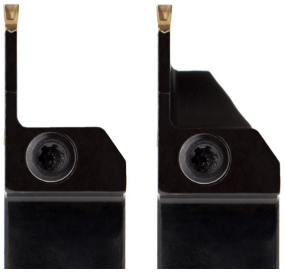
—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	DCINN3	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFSR10003D	02703393	1.000	1.000	6.000	1.250	1.811	0.945	7.677	1.540	0.118	53.1	LC..1603..
CFSR12503D	02703401	1.250	1.250	6.000	1.500	1.811	0.945	7.677	2.430	0.118	53.1	LC..1603..
CFSL10003D	02703389	1.000	1.000	6.000	1.250	1.811	0.945	7.677	1.540	0.118	53.1	LC..1603..
CFSL12503D	02703397	1.250	1.250	6.000	1.500	1.811	0.945	7.677	2.200	0.118	53.1	LC..1603..
CFSR10004E	02703394	1.000	1.000	7.000	1.250	2.165	1.260	7.677	1.760	0.157	70.8	LC..1604..
CFSR12504E	02703402	1.250	1.250	7.000	1.500	2.165	1.260	7.677	2.650	0.157	70.8	LC..1604..
CFSL10004E	02703390	1.000	1.000	7.000	1.250	2.165	1.260	7.677	1.980	0.157	70.8	LC..1604..
CFSL12504E	02703398	1.250	1.250	7.000	1.500	2.165	1.260	7.677	2.650	0.157	70.8	LC..1604..
CFSR10005E	02703395	1.000	1.000	7.000	1.250	2.598	1.575	7.677	1.760	0.197	70.8	LC..1605..
CFSR12505E	02703403	1.250	1.250	7.000	1.500	2.598	1.575	7.677	2.650	0.197	70.8	LC..1605..
CFSL10005E	02703391	1.000	1.000	7.000	1.250	2.598	1.575	7.677	1.760	0.197	70.8	LC..1605..
CFSL12505E	02703399	1.250	1.250	7.000	1.500	2.598	1.575	7.677	2.650	0.197	70.8	LC..1605..
CFSR10006F	02703396	1.000	1.000	8.000	1.250	3.189	1.890	7.677	2.200	0.236	88.5	LC..1606..
CFSR12506F	02703404	1.250	1.250	8.000	1.500	3.189	1.890	7.677	2.870	0.236	88.5	LC..1606..
CFSL10006F	02703392	1.000	1.000	8.000	1.250	3.189	1.890	7.677	2.200	0.236	88.5	LC..1606..
CFSL12506F	02703400	1.250	1.250	8.000	1.500	3.189	1.890	7.677	2.870	0.236	88.5	LC..1606..
CFSR12508F	02703406	1.250	1.250	8.000	1.500	4.094	2.520	7.677	2.650	0.315	132.8	LC..3008..
CFSL12508F	02703405	1.250	1.250	8.000	1.500	4.094	2.520	7.677	3.090	0.315	132.8	LC..3008..

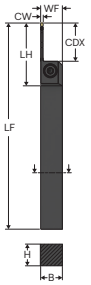
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613
..05	5SMS795	TCEI0613
..06	6SMS795	TCEI0815
..08	6SMS795	TCEI1020

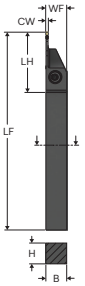
CFZR/L – Toolholders for inserts LCMF – Metric



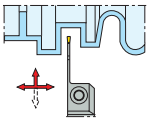
CFZR/L



CFZR/L..RB



KAPR = 90,0 °



CTWS



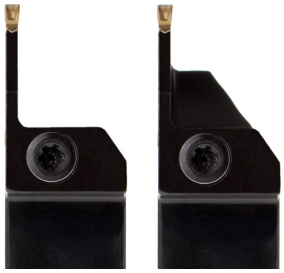
—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CUTDIA*	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFZR1616M2802	02748735	16	16	150	16,0	46,0	26,0	–	0,3	2,0	6,0	LC..2802..
CFZL1616M2802	02748737	16	16	150	16,0	46,0	26,0	–	0,3	2,0	6,0	LC..2802..
CFZR1616M2802RB	02748747	16	16	150	16,0	46,0	27,5	52,0	0,4	2,0	6,0	LC..2802..
CFZL1616M2802RB	02748749	16	16	150	16,0	46,0	27,5	52,0	0,4	2,0	6,0	LC..2802..

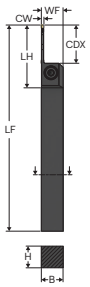
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFZR/L..02	4SMS795	TCEI0513

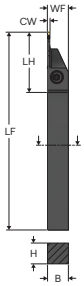
CFZR/L – Toolholders for inserts LCMF – Inch



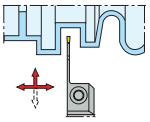
CFZR/L



CFZR/L..RB



KAPR = 90,0 °



CTWS



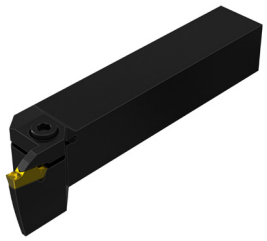
—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 697-698
—* Due to the design, grooving depth is limited, see page(s) 719
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CDX	CUTDIA*	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFZR0632802D	02748935	0.625	0.625	6.000	0.625	1.811	0.984	–	0.660	0.079	53.1	LC..2802..
CFZR0632802DRB	02749011	0.625	0.625	6.000	0.625	1.811	1.024	2.047	0.660	0.079	53.1	LC..2802..
CFZL0632802DRB	02749015	0.625	0.625	6.000	0.625	1.811	1.024	2.047	0.660	0.079	53.1	LC..2802..

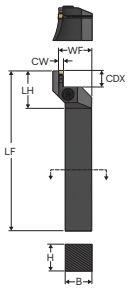
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFZR/L	4SMS795	TCEI0513

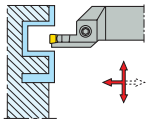
CFIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



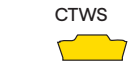
CFIR/L

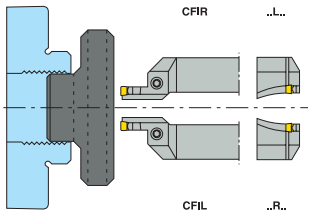


KAPR = 90,0 °



CTWS





—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

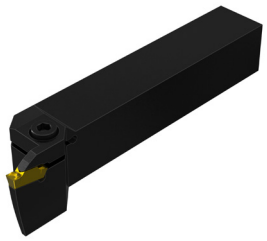
Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFIR2525M03L100070	00089733	70	100	25	25	150	26,5	28,0	9,0	0,8	3,0	6,0	LC..1603..
CFIR2525M03L130090	00089907	90	130	25	25	150	26,5	28,0	9,0	0,7	3,0	6,0	LC..1603..
CFIR2525M03L170110	00089735	110	170	25	25	150	26,5	28,0	9,0	0,7	3,0	6,0	LC..1603..
CFIL2525M03R100070	00089734	70	100	25	25	150	26,5	28,0	9,0	0,7	3,0	6,0	LC..1603..
CFIL2525M03R130090	00089906	90	130	25	25	150	26,5	28,0	9,0	0,7	3,0	6,0	LC..1603..
CFIL2525M03R170110	00089736	110	170	25	25	150	26,5	28,0	9,0	0,7	3,0	6,0	LC..1603..
CFIR2525M04L100070	00089899	70	100	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIR2525M04L130090	00089901	90	130	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIR2525M04L170110	00089903	110	170	25	25	150	26,5	31,0	12,0	0,7	4,0	8,0	LC..1604..
CFIR2525M04L230140	00089905	140	230	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIL2525M04R100070	00089898	70	100	25	25	150	26,5	31,0	12,0	0,7	4,0	8,0	LC..1604..
CFIL2525M04R130090	00089900	90	130	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIL2525M04R170110	00089902	110	170	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIL2525M04R230140	00089904	140	230	25	25	150	26,5	31,0	12,0	0,8	4,0	8,0	LC..1604..
CFIR2525M05L100070	00013448	70	100	25	25	150	26,5	35,0	15,0	0,8	5,0	8,0	LC..1605..
CFIR2525M05L130090	00091813	90	130	25	25	150	26,5	35,0	15,0	0,8	5,0	8,0	LC..1605..
CFIR2525M05L170110	00091815	110	170	25	25	150	26,5	35,0	15,0	0,7	5,0	8,0	LC..1605..
CFIR2525M05L230140	00091817	140	230	25	25	150	26,5	35,0	15,0	0,8	5,0	8,0	LC..1605..
CFIL2525M05R100070	00013447	70	100	25	25	150	26,5	35,0	15,0	0,7	5,0	8,0	LC..1605..
CFIL2525M05R130090	00091812	90	130	25	25	150	26,5	35,0	15,0	0,8	5,0	8,0	LC..1605..
CFIL2525M05R170110	00091814	110	170	25	25	150	26,5	35,0	15,0	0,8	5,0	8,0	LC..1605..
CFIL2525M05R230140	00091816	140	230	25	25	150	26,5	35,0	15,0	0,7	5,0	8,0	LC..1605..
CFIR2525M06L100070	00013451	70	100	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIR2525M06L130090	00084469	90	130	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIR2525M06L170110	00084471	110	170	25	25	150	26,5	42,0	18,0	0,7	6,0	10,0	LC..1606..
CFIR2525M06L230140	00084473	140	230	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIL2525M06R100070	00013449	70	100	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIL2525M06R130090	00084470	90	130	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIL2525M06R170110	00084472	110	170	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIL2525M06R230140	00084474	140	230	25	25	150	26,5	42,0	18,0	0,8	6,0	10,0	LC..1606..
CFIR3225P08L130090	00089160	90	130	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIR3225P08L170110	00089162	110	170	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIR3225P08L230140	00089164	140	230	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFIR3225P08L500200	00089166	200	500	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIL3225P08R130090	00089161	90	130	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIL3225P08R170110	00089163	110	170	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIL3225P08R230140	00089165	140	230	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..
CFIL3225P08R500200	00089167	200	500	32	25	170	28,0	50,0	24,0	1,0	8,0	15,0	LC..3008..

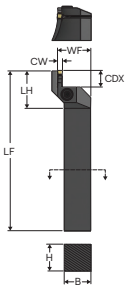
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CFIR/L..03	4SMS795	TCEI0513
CFIR/L..04	5SMS795	TCEI0613
CFIR/L..05	5SMS795	TCEI0613
CFIR/L..06	6SMS795	TCEI0815
CFIR/L..08	6SMS795	TCEI1020

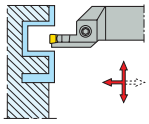
CFIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CFIR/L

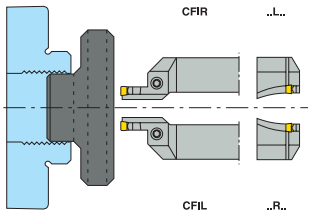


KAPR = 90,0 °



CTWS





—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 846-851, 861-862
—For holder code key, see page(s) 697-698
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

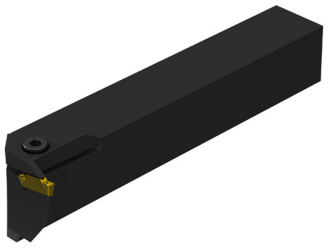
Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFIR10003D-L4.002.75	00087773	2.756	3.937	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIR10003D-L5.003.50	00087777	3.543	5.000	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIR10003D-L6.704.30	00002840	4.331	6.693	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIL10003D-R4.002.75	00087774	2.756	3.937	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIL10003D-R5.003.50	00087778	3.543	5.000	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIL10003D-R6.704.30	00002841	4.331	6.693	1.000	1.000	6.000	1.250	1.142	0.354	1.760	0.118	53.1	LC..1603..
CFIR10004D-L4.002.75	00087785	2.756	3.937	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIR10004D-L5.003.50	00087789	3.543	5.000	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIR10004D-L9.005.50	00002842	5.512	8.976	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIL10004D-R4.002.75	00087786	2.756	3.937	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIL10004D-R5.003.50	00087790	3.543	5.000	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIL10004D-R9.005.50	00002844	5.512	8.976	1.000	1.000	6.000	1.250	1.299	0.472	1.760	0.157	70.8	LC..1604..
CFIR10005D-L4.002.75	00057796	2.756	3.937	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIR10005D-L5.003.50	00002828	3.543	5.000	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIR10005D-L6.704.30	00002835	4.331	6.693	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIR10005D-L9.005.50	00002838	5.512	8.976	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIL10005D-R4.002.75	00057797	2.756	3.937	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIL10005D-R5.003.50	00002831	3.543	5.000	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIL10005D-R6.704.30	00002836	4.331	6.693	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIL10005D-R9.005.50	00002839	5.512	8.976	1.000	1.000	6.000	1.250	1.417	0.591	1.760	0.197	70.8	LC..1605..
CFIR10006D-L4.002.75	00059845	2.756	3.937	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIR10006D-L5.003.50	00087795	3.543	5.000	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIR10006D-L6.704.30	00087799	4.331	6.693	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIR10006D-L9.005.50	00092656	5.512	8.976	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIL10006D-R4.002.75	00059846	2.756	3.937	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIL10006D-R5.003.50	00087796	3.543	5.000	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIL10006D-R6.704.30	00092653	4.331	6.693	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIL10006D-R9.005.50	00092657	5.512	8.976	1.000	1.000	6.000	1.250	1.693	0.709	1.760	0.236	88.5	LC..1606..
CFIR10008D-L5.003.50	00064884	3.543	5.000	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIR10008D-L6.704.30	00064886	4.331	6.693	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIR10008D-L9.005.50	00064888	5.512	8.976	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIR10008D-L19.78.00	00064891	7.992	19.685	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIL10008D-R5.003.50	00064885	3.543	5.000	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CFIL10008D-R6.704.30	00064887	4.331	6.693	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIL10008D-R9.005.50	00064889	5.512	8.976	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..
CFIL10008D-R19.78.00	00064892	7.992	19.685	1.000	1.000	6.000	1.250	2.205	0.945	1.760	0.315	132.8	LC..3008..

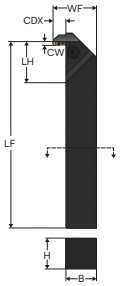
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613
..05	5SMS795	TCEI0613
..06	6SMS795	TCEI0815
..08	6SMS795	TCEI1020

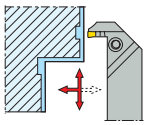
CGIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



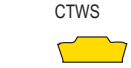
CGIR/L

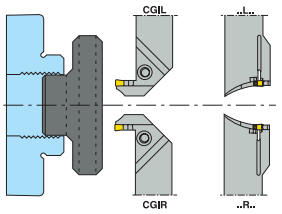


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846–851, 861–862
—For holder code key, see page(s) 697–698
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm, LCGF/LCMF30.. = 28 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

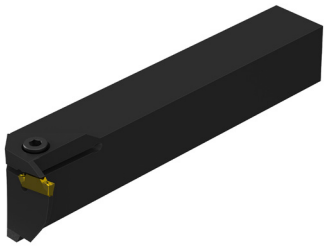
Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CGIR2525M03R100070	00035346	70	100	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIR2525M03R130090	00035347	90	130	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIR2525M03R170110	00035348	110	170	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIL2525M03L100070	00027656	70	100	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIL2525M03L130090	00027657	90	130	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIL2525M03L170110	00027658	110	170	25	25	150	35,4	33,0	9,0	0,8	3,0	6,0	LC..1603..
CGIR2525M04R100070	00035349	70	100	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIR2525M04R130090	00035350	90	130	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIR2525M04R170110	00035351	110	170	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIR2525M04R230140	00035352	140	230	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIL2525M04L100070	00027659	70	100	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIL2525M04L130090	00027660	90	130	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIL2525M04L170110	00027661	110	170	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIL2525M04L230140	00027662	140	230	25	25	150	38,4	33,0	12,0	0,8	4,0	8,0	LC..1604..
CGIR2525M05R100070	00035353	70	100	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIR2525M05R130090	00035354	90	130	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIR2525M05R170110	00035355	110	170	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIR2525M05R230140	00035356	140	230	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIL2525M05L100070	00027663	70	100	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIL2525M05L130090	00027664	90	130	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIL2525M05L170110	00027666	110	170	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIL2525M05L230140	00027668	140	230	25	25	150	41,4	33,0	15,0	0,8	5,0	8,0	LC..1605..
CGIR2525M06R100070	00035357	70	100	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIR2525M06R130090	00035358	90	130	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIR2525M06R170110	00035359	110	170	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIR2525M06R230140	00035360	140	230	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIL2525M06L100070	00027669	70	100	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIL2525M06L130090	00027670	90	130	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIL2525M06L170110	00027671	110	170	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIL2525M06L230140	00027672	140	230	25	25	150	44,4	34,0	18,0	0,8	6,0	10,0	LC..1606..
CGIR3225P08R130090	00089152	90	130	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIR3225P08R170110	00089154	110	170	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIR3225P08R230140	00089156	140	230	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CGIR3225P08R500200	00089158	200	500	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIL3225P08L130090	00089153	90	130	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIL3225P08L170110	00089155	110	170	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIL3225P08L230140	00089157	140	230	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..
CGIL3225P08L500200	00089159	200	500	32	25	170	50,4	56,7	24,0	1,2	8,0	15,0	LC..3008..

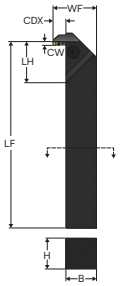
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CGIR/L..03	4SMS795	TCEI0513
CGIR/L..04	5SMS795	TCEI0613
CGIR/L..05	5SMS795	TCEI0613
CGIR/L..06	6SMS795	TCEI0815
CGIR/L..08	6SMS795	TCEI1020

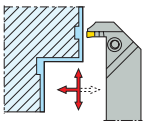
CGIR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



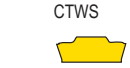
CGIR/L

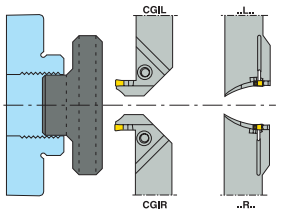


KAPR = 90,0 °



CTWS





—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 846–851, 861–862
—For holder code key, see page(s) 697–698
—Max depth of cut for double-sided LCGF/LCMF16.. = 0.551 inch, LCGF/LCMF30.. = 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	H	B	LF	WF	LH	CDX	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
CGIR10003D-R4.00-2.75	00096157	2.756	3.937	1.000	1.000	6.000	1.433	1.299	0.354	1.760	0.118	53.1	LC..1603..
CGIR10003D-R5.00-3.50	00096159	3.543	5.000	1.000	1.000	6.000	1.433	1.299	0.354	1.540	0.118	53.1	LC..1603..
CGIL10003D-L4.00-2.75	00096158	2.756	3.937	1.000	1.000	6.000	1.433	1.299	0.354	1.760	0.118	53.1	LC..1603..
CGIL10003D-L5.00-3.50	00096160	3.543	5.000	1.000	1.000	6.000	1.433	1.299	0.354	1.540	0.118	53.1	LC..1603..
CGIR10004D-R4.00-2.75	00096161	2.756	3.937	1.000	1.000	6.000	1.531	1.299	0.472	1.760	0.157	70.8	LC..1604..
CGIR10004D-R5.00-3.50	00096163	3.543	5.000	1.000	1.000	6.000	1.531	1.299	0.472	1.760	0.157	70.8	LC..1604..
CGIL10004D-L4.00-2.75	00096162	2.756	3.937	1.000	1.000	6.000	1.531	1.299	0.472	1.760	0.157	70.8	LC..1604..
CGIL10004D-L5.00-3.50	00096164	3.543	5.000	1.000	1.000	6.000	1.531	1.299	0.472	1.760	0.157	70.8	LC..1604..
CGIR10006D-R5.00-3.50	00096165	3.543	5.000	1.000	1.000	6.000	1.811	1.339	0.709	1.540	0.236	88.5	LC..1606..
CGIR10006D-R6.70-4.30	00096167	4.331	6.693	1.000	1.000	6.000	1.811	1.339	0.709	1.980	0.236	88.5	LC..1606..
CGIR10006D-R9.00-5.50	00096169	5.512	8.976	1.000	1.000	6.000	1.811	1.339	0.709	1.540	0.236	88.5	LC..1606..
CGIL10006D-L5.00-3.50	00096166	3.543	5.000	1.000	1.000	6.000	1.811	1.339	0.709	1.540	0.236	88.5	LC..1606..
CGIL10006D-L6.70-4.30	00096168	4.331	6.693	1.000	1.000	6.000	1.811	1.339	0.709	1.980	0.236	88.5	LC..1606..
CGIL10006D-L9.00-5.50	00096170	5.512	8.976	1.000	1.000	6.000	1.811	1.339	0.709	1.540	0.236	88.5	LC..1606..
CGIR10008D-R5.003.50	00064875	3.543	5.000	1.000	1.000	6.000	2.004	2.165	0.945	2.200	0.315	132.8	LC..3008..
CGIR10008D-R6.704.30	00064877	4.331	6.693	1.000	1.000	6.000	2.004	2.165	0.945	2.200	0.315	132.8	LC..3008..
CGIR10008D-R9.005.50	00064879	5.512	8.976	1.000	1.000	6.000	2.004	2.165	0.945	2.200	0.315	132.8	LC..3008..
CGIR10008D-R19.78.00	00064882	7.992	19.685	1.000	1.000	6.000	2.004	2.165	0.945	1.980	0.315	132.8	LC..3008..
CGIL10008D-L9.005.50	00064881	5.512	8.976	1.000	1.000	6.000	2.004	2.165	0.945	1.980	0.315	132.8	LC..3008..
CGIL10008D-L19.78.00	00064883	7.992	19.685	1.000	1.000	6.000	2.004	2.165	0.945	1.980	0.315	132.8	LC..3008..

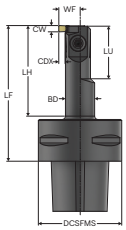
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	4SMS795	TCEI0513
..04	5SMS795	TCEI0613
..06	6SMS795	TCEI0815
..08	6SMS795	TCEI1020

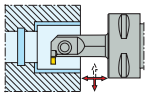
C.-CG.R/L – Toolholders for inserts LCGA, LCGF, LCGN, LCMF, LCMR – Metric/ Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 842–844, 860
—For holder code key, see page(s) 696
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	LU	CDX	DCINN	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CGER-11065-1303	00054084	C4	14,0 *0.551*	40,0 *1.575*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,3 *0.660*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C4-CGEL-11065-1303	00054080	C4	14,0 *0.551*	40,0 *1.575*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,3 *0.660*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C4-CGFR-15075-1303	00054085	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,4 *0.880*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C4-CGFL-15075-1303	00054083	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,4 *0.880*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C4-CGFR-15075-1304	00054095	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C4-CGFL-15075-1304	00054094	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGER-11065-1303	00054098	C5	14,0 *0.551*	50,0 *1.969*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGEL-11065-1303	00054097	C5	14,0 *0.551*	50,0 *1.969*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGFR-15075-1303	00054104	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGFL-15075-1303	00054101	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGHR-19080-1303	02718397	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGHL-19080-1303	02717402	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGJR-26110-1303	02718401	C5	30,0 *1.181*	50,0 *1.969*	25,5 *1.004*	110 *4.331*	88,0 *3.465*	50,5 *1.988*	10,5 *0.413*	32,0 *1.260*	0,8 *1.760*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGJL-26110-1303	02718400	C5	30,0 *1.181*	50,0 *1.969*	25,5 *1.004*	110 *4.331*	88,0 *3.465*	50,5 *1.988*	10,5 *0.413*	32,0 *1.260*	0,8 *1.760*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C5-CGFR-15075-1304	00054118	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGFL-15075-1304	00054115	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGHR-19080-1304	00054120	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGFL-19080-1304	00054119	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGHR-26110-1304	02718398	C5	30,0 *1.181*	50,0 *1.969*	25,5 *1.004*	110 *4.331*	88,0 *3.465*	50,5 *1.988*	10,5 *0.413*	32,0 *1.260*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C5-CGHL-26110-1304	02718396	C5	30,0 *1.181*	50,0 *1.969*	25,5 *1.004*	110 *4.331*	88,0 *3.465*	50,5 *1.988*	10,5 *0.413*	32,0 *1.260*	0,8 *1.760*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C6-CGER-11065-1303	00054130	C6	14,0 *0.551*	63,0 *2.480*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,8 *1.760*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGEL-11065-1303	00054129	C6	14,0 *0.551*	63,0 *2.480*	10,2 *0.402*	65 *2.559*	43,0 *1.693*	25,5 *1.004*	3,0 *0.118*	16,0 *0.630*	0,8 *1.760*	3,0 *0.118*	5,0 *44.3*	LC..1303..

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	LU	CDX	DCINN	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CGFR-15075-1303	00054134	C6	18,0 *0.709*	63,0 *2.480*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,9 *1.980*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGFL-15075-1303	00054131	C6	18,0 *0.709*	63,0 *2.480*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,8 *1.760*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGHR-19080-1303	02718404	C6	23,0 *0.906*	63,0 *2.480*	19,0 *0.748*	80 *3.150*	56,0 *2.205*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,9 *1.980*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGHL-19080-1303	02718402	C6	23,0 *0.906*	63,0 *2.480*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,0 *1.575*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGJR-26110-1303	02718407	C6	30,0 *1.181*	63,0 *2.480*	25,5 *1.004*	110 *4.331*	86,0 *3.386*	50,0 *1.969*	10,5 *0.413*	32,0 *1.260*	1,1 *2.430*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGJL-26110-1303	02718406	C6	30,0 *1.181*	63,0 *2.480*	25,5 *1.004*	110 *4.331*	86,0 *3.386*	50,0 *1.969*	10,5 *0.413*	32,0 *1.260*	1,5 *3.310*	3,0 *0.118*	5,0 *44.3*	LC..1303..
C6-CGFR-19080-1304	00054140	C6	23,0 *0.906*	63,0 *2.480*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,9 *1.980*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C6-CGFL-19080-1304	00054139	C6	23,0 *0.906*	63,0 *2.480*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	40,5 *1.594*	7,5 *0.295*	25,0 *0.984*	0,9 *1.980*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C6-CGHR-26110-1304	02718405	C6	30,0 *1.181*	63,0 *2.480*	25,5 *1.004*	110 *4.331*	86,0 *3.386*	50,5 *1.988*	10,5 *0.413*	32,0 *1.260*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1304..
C6-CGHL-26110-1304	02718403	C6	30,0 *1.181*	63,0 *2.480*	25,5 *1.004*	110 *4.331*	88,0 *3.465*	50,0 *1.969*	10,5 *0.413*	32,0 *1.260*	1,1 *2.430*	4,0 *0.157*	5,0 *44.3*	LC..1304..

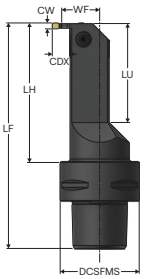
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CG.R/L..-1303	T15P-7	L85011-T15P
CG.R/L..-1304	T15P-7	L85011-T15P

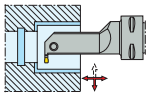
C.-CG.R/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 696
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	LU	CDX	DCINN	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CGIR-24090-1603	02718418	C4	30,0 *1.181*	40,0 *1.575*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CGIL-24090-1603	02718415	C4	30,0 *1.181*	40,0 *1.575*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,5 *1.100*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C4-CGGR-24090-1604	02718424	C4	30,0 *1.181*	40,0 *1.575*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,5 *1.100*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CGGL-24090-1604	02718421	C4	30,0 *1.181*	40,0 *1.575*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,4 *0.880*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CGIR-24090-1603	02718419	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CGIL-24090-1603	02718416	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	0,7 *1.540*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C5-CGGR-24090-1604	02718425	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,9 *1.980*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CGGL-24090-1604	02718422	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,6 *1.320*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CGFR-24090-1605	02718431	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,9 *1.980*	5,0 *0.197*	6,0 *53.1*	LC..1605..
C5-CGFL-24090-1605	02718428	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,9 *1.980*	5,0 *0.197*	6,0 *53.1*	LC..1605..
C5-CGFR-24090-1606	02718435	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,6 *1.320*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C5-CGFL-24090-1606	02718433	C5	30,0 *1.181*	50,0 *1.969*	24,0 *0.945*	90 *3.543*	68,0 *2.677*	49,9 *1.965*	9,0 *0.354*	32,0 *1.260*	0,9 *1.980*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CGIR-24095-1603	02718420	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,0 *2.200*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CGIL-24095-1603	02718417	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,0 *2.200*	3,0 *0.118*	5,0 *44.3*	LC..1603..
C6-CGGR-24095-1604	02718426	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,0 *2.200*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CGGL-24095-1604	02718423	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,0 *2.200*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CGFR-24095-1605	02718432	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,0 *2.200*	5,0 *0.197*	6,0 *53.1*	LC..1605..
C6-CGFL-24095-1605	02718429	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,5 *3.310*	5,0 *0.197*	6,0 *53.1*	LC..1605..
C6-CGFR-24095-1606	02718436	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,5 *3.310*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CGFL-24095-1606	02718434	C6	30,0 *1.181*	63,0 *2.480*	24,0 *0.945*	95 *3.740*	73,0 *2.874*	50,3 *1.980*	9,0 *0.354*	32,0 *1.260*	1,5 *3.310*	6,0 *0.236*	6,0 *53.1*	LC..1606..

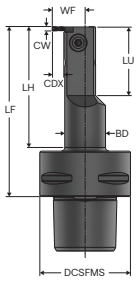
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CG.R/L..-1603	T15P-7	L85011-T15P
CG.R/L..-1604	T15P-7	L85011-T15P
CG.R/L..-1605	T20P-7	L86015-T20P
CG.R/L..-1606	T20P-7	L86015-T20P

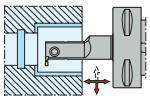
C.-CG.R/L – Toolholders for inserts LCMF – Metric/ Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 696
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	LU	CDX	DCINN	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CGHR-15075-1902	02749181	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,3 *0.660*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C4-CGHL-15075-1902	02749187	C4	18,0 *0.709*	40,0 *1.575*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,3 *0.660*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C5-CGHR-15075-1902	02749182	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C5-CGHL-15075-1902	02749188	C5	18,0 *0.709*	50,0 *1.969*	14,5 *0.571*	75 *2.953*	53,0 *2.087*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,5 *1.100*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C6-CGHR-15075-1902	02749183	C6	18,0 *0.709*	60,0 *2.362*	14,5 *0.571*	75 *2.953*	51,0 *2.008*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,9 *1.980*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C6-CGHL-15075-1902	02749189	C6	18,0 *0.709*	60,0 *2.362*	14,5 *0.571*	75 *2.953*	51,0 *2.008*	30,5 *1.201*	5,5 *0.217*	20,0 *0.787*	0,9 *1.980*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C4-CGJR-19080-1902	02749184	C4	23,0 *0.906*	40,0 *1.575*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,4 *0.880*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C4-CGJL-19080-1902	02749190	C4	23,0 *0.906*	40,0 *1.575*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,4 *0.880*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C5-CGJR-19080-1902	02749185	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C5-CGJL-19080-1902	02749191	C5	23,0 *0.906*	50,0 *1.969*	19,0 *0.748*	80 *3.150*	58,0 *2.283*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,6 *1.320*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C6-CGJR-19080-1902	02749186	C6	23,0 *0.906*	60,0 *2.362*	19,0 *0.748*	80 *3.150*	56,0 *2.205*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,9 *1.980*	2,0 *0.079*	5,0 *44.3*	LC..1902..
C6-CGJL-19080-1902	02749192	C6	23,0 *0.906*	60,0 *2.362*	19,0 *0.748*	80 *3.150*	56,0 *2.205*	30,5 *1.201*	7,5 *0.295*	25,0 *0.984*	0,9 *1.980*	2,0 *0.079*	5,0 *44.3*	LC..1902..

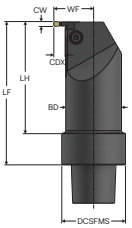
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CG.R/L..-1902	T15P-7	L85011-T15P

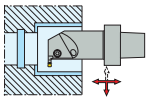
C.-CGGR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric/ Inch



CGGR/L



KAPR = 90,0 °



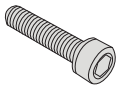
CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 696
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	CDX	DCINN	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C4-CGGR-25090-03	00038031	C4	35,0 *1.378*	40,0 *1.575*	25,0 *0.984*	90 *3.543*	70,0 *2.756*	6,0 *0.236*	45,0 *1.772*	0,7 *1.540*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C4-CGGL-25090-03	00038030	C4	35,0 *1.378*	40,0 *1.575*	25,0 *0.984*	90 *3.543*	70,0 *2.756*	6,0 *0.236*	45,0 *1.772*	0,7 *1.540*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C4-CGGR-27090-04	00038037	C4	35,0 *1.378*	40,0 *1.575*	27,0 *1.063*	90 *3.543*	70,0 *2.756*	8,0 *0.315*	45,0 *1.772*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CGGL-27090-04	00038036	C4	35,0 *1.378*	40,0 *1.575*	27,0 *1.063*	90 *3.543*	70,0 *2.756*	8,0 *0.315*	45,0 *1.772*	0,7 *1.540*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C4-CGGR-28090-05	02718413	C4	32,5 *1.280*	40,0 *1.575*	27,7 *1.091*	90 *3.543*	63,0 *2.480*	10,0 *0.394*	45,0 *1.772*	0,7 *1.540*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C4-CGGL-28090-05	02718408	C4	32,5 *1.280*	40,0 *1.575*	27,7 *1.091*	90 *3.543*	63,0 *2.480*	10,0 *0.394*	45,0 *1.772*	0,5 *1.100*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CGGR-25090-03	00038033	C5	35,0 *1.378*	50,0 *1.969*	25,0 *0.984*	90 *3.543*	70,0 *2.756*	6,0 *0.236*	45,0 *1.772*	0,9 *1.980*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C5-CGGL-25090-03	00038032	C5	35,0 *1.378*	50,0 *1.969*	25,0 *0.984*	90 *3.543*	70,0 *2.756*	6,0 *0.236*	45,0 *1.772*	0,8 *1.760*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C5-CGGR-27090-04	00038039	C5	35,0 *1.378*	50,0 *1.969*	27,0 *1.063*	90 *3.543*	70,0 *2.756*	8,0 *0.315*	45,0 *1.772*	0,9 *1.980*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CGGL-27090-04	00038038	C5	35,0 *1.378*	50,0 *1.969*	27,0 *1.063*	90 *3.543*	70,0 *2.756*	8,0 *0.315*	45,0 *1.772*	0,9 *1.980*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C5-CGGR-28090-05	00071960	C5	32,5 *1.280*	50,0 *1.969*	27,7 *1.091*	90 *3.543*	63,0 *2.480*	10,0 *0.394*	45,0 *1.772*	0,8 *1.760*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CGGL-28090-05	02718414	C5	32,5 *1.280*	50,0 *1.969*	27,7 *1.091*	90 *3.543*	63,0 *2.480*	10,0 *0.394*	45,0 *1.772*	0,9 *1.980*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C5-CGGR-29090-06	02719020	C5	30,5 *1.201*	50,0 *1.969*	28,7 *1.130*	90 *3.543*	62,0 *2.441*	12,0 *0.472*	45,0 *1.772*	0,9 *1.980*	6,0 *0.236*	8,0 *70.8*	LC..1606..
C5-CGGL-29090-06	02719019	C5	30,5 *1.201*	50,0 *1.969*	28,7 *1.130*	90 *3.543*	62,0 *2.441*	12,0 *0.472*	45,0 *1.772*	0,8 *1.760*	6,0 *0.236*	8,0 *70.8*	LC..1606..
C6-CGGR-25095-03	00038035	C6	35,0 *1.378*	63,0 *2.480*	25,0 *0.984*	95 *3.740*	73,0 *2.874*	6,0 *0.236*	45,0 *1.772*	1,2 *2.650*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C6-CGGL-25095-03	00038034	C6	35,0 *1.378*	63,0 *2.480*	25,0 *0.984*	95 *3.740*	73,0 *2.874*	6,0 *0.236*	45,0 *1.772*	1,2 *2.650*	3,0 *0.118*	3,5 *31.0*	LC..1603..
C6-CGGR-27095-04	00038041	C6	35,0 *1.378*	63,0 *2.480*	27,0 *1.063*	95 *3.740*	73,0 *2.874*	8,0 *0.315*	45,0 *1.772*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CGGL-27095-04	00038040	C6	35,0 *1.378*	63,0 *2.480*	27,0 *1.063*	95 *3.740*	73,0 *2.874*	8,0 *0.315*	45,0 *1.772*	1,2 *2.650*	4,0 *0.157*	5,0 *44.3*	LC..1604..
C6-CGGR-28095-05	00071964	C6	32,5 *1.280*	63,0 *2.480*	27,7 *1.091*	95 *3.740*	68,0 *2.677*	10,0 *0.394*	45,0 *1.772*	1,3 *2.870*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CGGL-28095-05	00071963	C6	32,5 *1.280*	63,0 *2.480*	27,7 *1.091*	95 *3.740*	68,0 *2.677*	10,0 *0.394*	45,0 *1.772*	1,2 *2.650*	5,0 *0.197*	5,0 *44.3*	LC..1605..
C6-CGGR-29095-06	00070149	C6	30,5 *1.201*	63,0 *2.480*	28,7 *1.130*	95 *3.740*	67,0 *2.638*	12,0 *0.472*	45,0 *1.772*	1,2 *2.650*	6,0 *0.236*	8,0 *70.8*	LC..1606..
C6-CGGL-29095-06	00044935	C6	30,5 *1.201*	63,0 *2.480*	28,7 *1.130*	95 *3.740*	67,0 *2.638*	12,0 *0.472*	45,0 *1.772*	1,1 *2.430*	6,0 *0.236*	8,0 *70.8*	LC..1606..

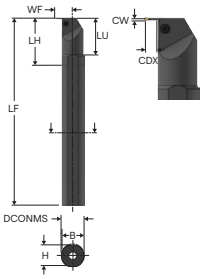
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CG.R/L..-03	3SMS795	MC6S4X14
CG.R/L..-04	4SMS795	MC6S5X14
CG.R/L..-05	4SMS795	MC6S5X14
CG.R/L..-06	5SMS795	TCEI0614

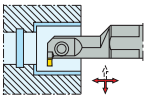
CG.R/L – Toolholders for inserts LCGA, LCGF, LCGN, LCMF, LCMR – Metric



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 842-844, 860
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
A16Q-CGER1303	00053891	16	15	15,5	180	40,0	25,0	10,2	3,0	16,0	0,3	3,0	5,0	LC..1303..
A16Q-CGEL1303	00053890	16	15	15,5	180	40,0	25,0	10,2	3,0	16,0	0,3	3,0	5,0	LC..1303..
A20R-CGFR1303	00053893	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,4	3,0	5,0	LC..1303..
A20R-CGFL1303	00053892	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,4	3,0	5,0	LC..1303..
A25S-CGHR1303	00053895	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,8	3,0	5,0	LC..1303..
A25S-CGHL1303	00053894	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,8	3,0	5,0	LC..1303..
A32T-CGJR1303	00053910	32	30	31,0	300	77,0	50,0	25,5	10,5	32,0	1,6	3,0	5,0	LC..1303..
A32T-CGJL1303	00053900	32	30	31,0	300	77,0	50,0	25,5	10,5	32,0	1,6	3,0	5,0	LC..1303..
A20R-CGFR1304	00053950	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,4	4,0	5,0	LC..1304..
A20R-CGFL1304	00053945	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,4	4,0	5,0	LC..1304..
A25S-CGFR1304	00053965	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,7	4,0	5,0	LC..1304..
A25S-CGFL1304	00053963	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,7	4,0	5,0	LC..1304..
A32T-CGHR1304	00077780	32	30	31,0	300	77,0	50,0	25,5	10,5	32,0	1,6	4,0	5,0	LC..1304..
A32T-CGHL1304	00053966	32	30	31,0	300	77,0	50,0	25,5	10,5	32,0	1,6	4,0	5,0	LC..1304..

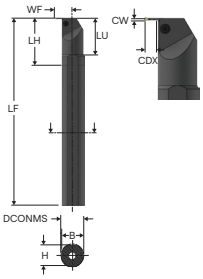
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
A16Q-..	T15P-7	L85011-T15P
A20R-..	T15P-7	L85011-T15P
A25S-..	T15P-7	L85011-T15P
A32T-..	T15P-7	L85011-T15P

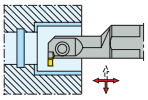
CG.R/L – Toolholders for inserts LCGA, LCGF, LCGN, LCMF, LCMR – Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 842-844, 860
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
A10-CGER1303	00061858	0.625	0.586	0.605	7.000	1.620	0.984	0.400	0.118	0.630	0.660	0.118	44.3	LC..1303..
A10-CGEL1303	00061859	0.625	0.586	0.605	7.000	1.620	0.984	0.400	0.118	0.630	0.660	0.118	44.3	LC..1303..
A12-CGFR1303	00061863	0.750	0.671	0.711	8.000	2.010	1.181	0.570	0.216	0.790	0.660	0.118	44.3	LC..1303..
A12-CGFL1303	00061865	0.750	0.671	0.711	8.000	2.010	1.181	0.570	0.216	0.790	0.660	0.118	44.3	LC..1303..
A16-CGHR1303	00061868	1.000	0.921	0.961	10.000	2.600	1.575	0.750	0.295	0.985	1.760	0.118	44.3	LC..1304..
A16-CGHL1303	00061869	1.000	0.921	0.961	10.000	2.600	1.575	0.750	0.295	0.985	1.760	0.118	44.3	LC..1304..
A20-CGJR1303	00061870	1.250	1.171	1.211	12.000	3.090	1.969	1.000	0.413	1.260	3.530	0.118	44.3	LC..1304..
A20-CGJL1303	00061871	1.250	1.171	1.211	12.000	3.090	1.969	1.000	0.413	1.260	3.530	0.118	44.3	LC..1304..
A12-CGFR1304	00061866	0.750	0.671	0.711	8.000	2.010	1.181	0.570	0.216	0.790	0.660	0.157	44.3	LC..1304..
A12-CGFL1304	00061867	0.750	0.671	0.711	8.000	2.010	1.181	0.570	0.216	0.790	1.100	0.157	44.3	LC..1304..
A16-CGFR1304	00055598	1.000	0.921	0.961	10.000	2.600	1.575	0.750	0.295	0.985	1.760	0.157	44.3	LC..1304..
A16-CGFL1304	00055604	1.000	0.921	0.961	10.000	2.600	1.575	0.750	0.295	0.985	1.760	0.157	44.3	LC..1304..
A20-CGHR1304	00061873	1.250	1.171	1.211	12.000	3.090	1.969	1.000	0.413	1.260	3.530	0.157	44.3	LC..1304..
A20-CGHL1304	00061875	1.250	1.171	1.211	12.000	3.090	1.969	1.000	0.413	1.260	3.310	0.157	44.3	LC..1304..

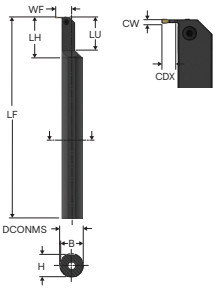
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
A10-..	T15P-7	L85011-T15P
A12-..	T15P-7	L85011-T15P
A16-..	T15P-7	L85011-T15P
A20-..	T15P-7	L85011-T15P

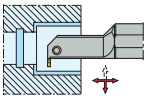
CG.R/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846–859, 861–862
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
A32T-CGIR1603	02717661	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,5	3,0	5,0	LC..1603..
A32T-CGIL1603	02718385	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,5	3,0	5,0	LC..1603..
A32T-CGGR1604	02718382	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	4,0	5,0	LC..1604..
A32T-CGGL1604	02718386	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	4,0	5,0	LC..1604..
A32T-CGFR1605	02718383	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	5,0	6,0	LC..1605..
A32T-CGFL1605	02718387	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	5,0	6,0	LC..1605..
A32T-CGFR1606	02718384	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	6,0	6,0	LC..1606..
A32T-CGFL1606	02718388	32	30	31,0	300	60,0	50,0	24,0	9,0	32,0	1,6	6,0	6,0	LC..1606..

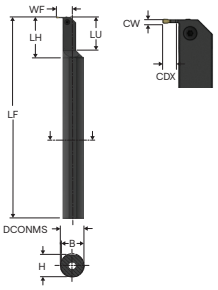
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
CG.R/L..03	T15P-7	L85011-T15P
CG.R/L..04	T15P-7	L85011-T15P
CG.R/L..05	T20P-7	L86015-T20P
CG.R/L..06	T20P-7	L86015-T20P

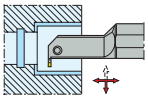
CG.R/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 846–859, 861–862
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
A20-CGIR03	02717401	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.354	1.260	3.310	0.118	44.3	LC..1603..
A20-CGIL03	02718392	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.354	1.260	3.310	0.118	44.3	LC..1603..
A20-CGGR04	02718389	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.394	1.260	3.310	0.157	44.3	LC..1604..
A20-CGGL04	02718393	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.394	1.260	3.530	0.157	44.3	LC..1604..
A20-CGFR05	02718390	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.295	1.260	3.310	0.197	53.1	LC..1605..
A20-CGFL05	02718394	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.295	1.260	3.530	0.197	53.1	LC..1605..
A20-CGFR06	02718391	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.295	1.260	3.310	0.236	53.1	LC..1606..
A20-CGFL06	02718395	1.250	1.171	1.211	12.000	2.362	1.969	0.929	0.295	1.260	3.310	0.236	53.1	LC..1606..

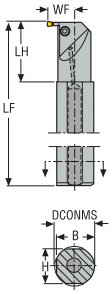
Spare Parts, included in delivery

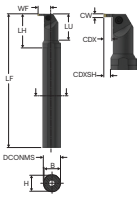
For	Clamp key	Clamp screw
		
..03	T15P-7	L85011-T15P
..04	T15P-7	L85011-T15P
..05	T20P-7	L86015-T20P
..06	T20P-7	L86015-T20P

CGGR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Metric

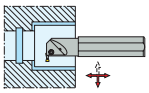


CGGR/L





KAPR = 90,0 °



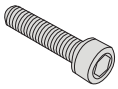
CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	WF	CDX	CDXSH	DCINN	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
A40T-CGGR03	00093896	40	37	39	300	60,0	26,0	6,0	5,5	45,0	2,5	3,0	3,5	LC..1603..
A40T-CGGL03	00093897	40	37	39	300	60,0	26,0	6,0	5,5	45,0	2,5	3,0	3,5	LC..1603..
A40T-CGGR04	00093898	40	37	39	300	60,0	27,0	8,0	6,5	45,0	2,4	4,0	5,0	LC..1604..
A40T-CGGL04	00093899	40	37	39	300	60,0	27,0	8,0	6,5	45,0	2,4	4,0	5,0	LC..1604..
A40T-CGGR05	00013456	40	37	39	300	60,0	28,0	10,0	7,5	45,0	2,4	5,0	5,0	LC..1605..
A40T-CGGL05	00013454	40	37	39	300	60,0	28,0	10,0	7,5	45,0	2,4	5,0	5,0	LC..1605..
A40T-CGGR06	00013458	40	37	39	300	60,0	29,0	12,0	8,5	45,0	2,4	6,0	8,0	LC..1606..
A40T-CGGL06	00013457	40	37	39	300	60,0	29,0	12,0	8,5	45,0	2,4	6,0	8,0	LC..1606..

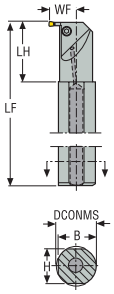
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
-..03	3SMS795	MC6S4X14
-..04	4SMS795	MC6S5X14
-..05	4SMS795	MC6S5X14
-..06	5SMS795	TCEI0614

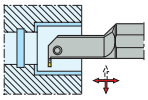
CGGR/L – Toolholders for inserts LCGF, LCGN, LCMF, LCMR – Inch



CGGR/L



KAPR = 90,0 °



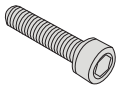
CTWS



—Right-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
A24-CGGR03	00003293	1.500	1.382	1.429	12.000	2.362	1.126	0.440	1.800	4.850	0.118	31.0	LC..1603..
A24-CGGL03	00003294	1.500	1.382	1.429	12.000	2.362	1.126	0.440	1.800	5.510	0.118	31.0	LC..1603..
A24-CGGR04	00003296	1.500	1.382	1.429	12.000	2.362	1.126	0.440	1.800	4.850	0.157	44.3	LC..1604..
A24-CGGL04	00003297	1.500	1.382	1.429	12.000	2.362	1.126	0.440	1.800	4.850	0.157	44.3	LC..1604..
A24-CGGR05	00059841	1.500	1.382	1.429	12.000	2.362	1.091	0.440	1.800	4.850	0.197	44.3	LC..1605..
A24-CGGL05	00059842	1.500	1.382	1.429	12.000	2.362	1.091	0.440	1.800	4.850	0.197	44.3	LC..1605..
A24-CGGR06	00059843	1.500	1.382	1.429	12.000	2.362	1.130	0.515	1.800	5.510	0.236	44.3	LC..1606..
A24-CGGL06	00059844	1.500	1.382	1.429	12.000	2.362	1.130	0.515	1.800	5.510	0.236	44.3	LC..1606..

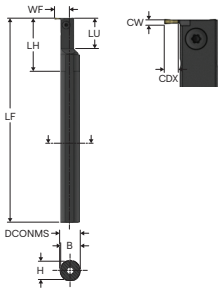
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
..03	3SMS795	MC6S4X14
..04	4SMS795	MC6S5X14
..05	4SMS795	MC6S5X14
..06	5SMS795	TCEI0614

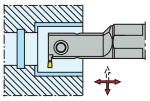
CG.R/L – Toolholders for inserts LCMF – Metric



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
A20R-CGHR1902	02748762	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,3	2,0	5,0	LC..1902..
A20R-CGHL1902	02748763	20	18	19,0	200	52,0	30,0	14,5	5,5	20,0	0,3	2,0	5,0	LC..1902..
A25S-CGJR1902	02748765	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,7	2,0	5,0	LC..1902..
A25S-CGJL1902	02748766	25	23	24,0	250	64,0	40,0	19,0	7,5	25,0	0,7	2,0	5,0	LC..1902..

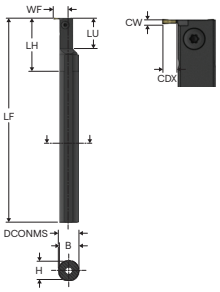
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
A20.-..	T15P-7	L85011-T15P
A25.-..	T15P-7	L85011-T15P

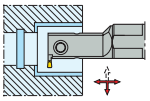
CG.R/L – Toolholders for inserts LCGA, LCGF, LCGN, LCMF, LCMR – Inch



CG.R/L



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 842-844, 860
—For holder code key, see page(s) 699-699
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	LH	LU	WF	CDX	DCINN	Weight	CW	TQ	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	lbs	inch	In/Lbs.	
A12-CGHL1902	02749019	0.750	0.671	0.711	8.000	1.535	1.181	0.551	0.197	0.790	0.660	0.079	44.3	LC..1902..
A12-CGHR1902	02749018	0.750	0.671	0.711	8.000	1.535	1.181	0.551	0.197	0.790	0.660	0.079	44.3	LC..1902..
A16-CGJL1902	02749021	1.000	0.921	0.961	10.000	1.732	1.575	0.748	0.276	0.985	1.760	0.079	44.3	LC..1902..
A16-CGJR1902	02749020	1.000	0.921	0.961	10.000	1.732	1.575	0.748	0.276	0.985	1.760	0.079	44.3	LC..1902..

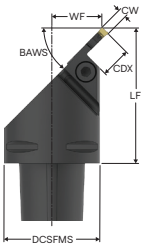
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
A12-..	T15P-7	L85011-T15P
A16-..	T15P-7	L85011-T15P

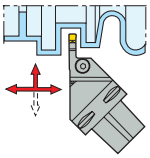
C.-CDIR/L – Toolholders for inserts LCGN, LCMF, LCMR – Metric/ Inch



C.-CFIR/L...JETI



KAPR



CTWS



—Left-hand version shown
—For inserts program, see page(s) 846-859, 861-862
—For holder code key, see page(s) 695
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm / 0.551 inch, LCGF/LCMF30.. = 28 mm / 1.102 inch
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CDX	BAWS°	Weight	CW	TQ	CTWS
			mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*	mm *inch*	Nm *In/Lbs.*	
C6-CDIR-33090-03JETI	03331429	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	9,0 *0.354*	45,0	1,6 *3.530*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CDIL-33090-03JETI	03331424	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	9,0 *0.354*	45,0	1,6 *3.530*	3,0 *0.118*	6,0 *53.1*	LC..1603..
C6-CDIR-33090-04JETI	03331432	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	12,0 *0.472*	45,0	1,6 *3.530*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CDIL-33090-04JETI	03331427	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	12,0 *0.472*	45,0	1,6 *3.530*	4,0 *0.157*	8,0 *70.8*	LC..1604..
C6-CDIR-33090-05JETI	03331431	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	15,0 *0.591*	45,0	1,7 *3.750*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CDIL-33090-05JETI	03331426	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	15,0 *0.591*	45,0	1,6 *3.530*	5,0 *0.197*	8,0 *70.8*	LC..1605..
C6-CDIR-33090-06JETI	03331430	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	18,0 *0.709*	45,0	1,6 *3.530*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CDIL-33090-06JETI	03331425	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	18,0 *0.709*	45,0	1,6 *3.530*	6,0 *0.236*	6,0 *53.1*	LC..1606..
C6-CDIR-33090-08JETI	03331433	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	24,0 *0.945*	45,0	1,5 *3.310*	8,0 *0.315*	15,0 *132.8*	LC..3008..
C6-CDIL-33090-08JETI	03331428	C6	63,0 *2.480*	33,0 *1.299*	90 *3.543*	24,0 *0.945*	45,0	1,6 *3.530*	8,0 *0.315*	15,0 *132.8*	LC..3008..

Spare Parts, included in delivery

For	Clamp key	Clamp screw	Duo Coolant Off plug screw	Plug screw
				
CDIR/L..-03	4SMS795	TCEI0513	P6SS4X4	JET-P1/16-5MM
CDIR/L..-04	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CDIR/L..-05	5SMS795	TCEI0613	P6SS4X4	JET-P1/16-5MM
CDIR/L..-06	6SMS795	TCEI0815	P6SS4X4	JET-P1/16-5MM
CDIR/L..-08	6SMS795	TCEI1020	P6SS4X4	JET-P1/16-5MM

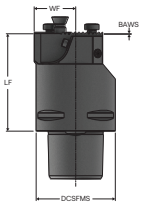
Accessories

For	DUO Coolant plug key	Key
		
CDIR/L..-03	2SMS795	–
CDIR/L..-04	2SMS795	4SMS795
CDIR/L..-05	2SMS795	4SMS795
CDIR/L..-06	2SMS795	4SMS795
CDIR/L..-08	2SMS795	4SMS795

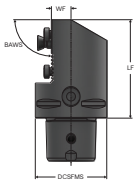
Toolholders
– Metric/ Inch



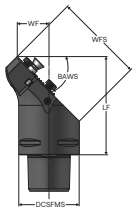
GR/L



FR/L



SR/L



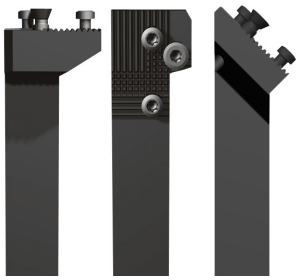
–Right-hand version shown
–For blades program, see page(s) 834-837, 838
–For modular assembly options, see page(s) 716-718
–For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	WFS	LF	BAWS°	Weight	TQ
			mm *inch*	mm *inch*	mm *inch*	mm *inch*		kg *lbs*	Nm *In/Lbs.*
C4-GR-21050-V21	00026919	C4	40,0 *1.575*	21,0 *0.827*	–	50 *1.969*	0,0	0,6 *1.320*	6,0 *53.1*
C4-GL-21050-V21	00026920	C4	40,0 *1.575*	21,0 *0.827*	–	50 *1.969*	0,0	0,6 *1.320*	6,0 *53.1*
C5-GR-29060-V21	00026921	C5	50,0 *1.969*	26,0 *1.024*	–	60 *2.362*	0,0	0,9 *1.980*	6,0 *53.1*
C5-GL-29060-V21	00026922	C5	50,0 *1.969*	26,0 *1.024*	–	60 *2.362*	0,0	0,9 *1.980*	6,0 *53.1*
C6-GR-39065-V21	00026923	C6	63,0 *2.480*	32,5 *1.280*	–	65 *2.559*	0,0	1,4 *3.090*	6,0 *53.1*
C6-GL-39065-V21	00026924	C6	63,0 *2.480*	32,5 *1.280*	–	65 *2.559*	0,0	1,4 *3.090*	6,0 *53.1*
C4-FR-11055-V21	00026912	C4	40,0 *1.575*	11,6 *0.457*	–	55 *2.165*	90,0	0,5 *1.100*	6,0 *53.1*
C4-FL-11055-V21	00026913	C4	40,0 *1.575*	11,6 *0.457*	–	55 *2.165*	90,0	0,5 *1.100*	6,0 *53.1*
C5-FR-16060-V21	00026914	C5	50,0 *1.969*	16,6 *0.654*	–	60 *2.362*	90,0	0,9 *1.980*	6,0 *53.1*
C5-FL-16060-V21	00026916	C5	50,0 *1.969*	16,6 *0.654*	–	60 *2.362*	90,0	0,9 *1.980*	6,0 *53.1*
C6-FR-23065-V21	00026917	C6	63,0 *2.480*	23,1 *0.909*	–	65 *2.559*	90,0	1,5 *3.310*	6,0 *53.1*
C6-FL-23065-V21	00026918	C6	63,0 *2.480*	23,1 *0.909*	–	65 *2.559*	90,0	1,5 *3.310*	6,0 *53.1*
C4-SR-21065-V21	02721138	C4	40,0 *1.575*	–	59,25 *2.333*	65 *2.559*	45,0	0,5 *1.100*	6,0 *53.1*
C4-SL-21065-V21	02721135	C4	40,0 *1.575*	–	59,25 *2.333*	65 *2.559*	45,0	0,5 *1.100*	6,0 *53.1*
C5-SR-26075-V21	02721139	C5	50,0 *1.969*	–	73,4 *2.890*	75 *2.953*	45,0	0,9 *1.980*	6,0 *53.1*
C5-SL-26075-V21	02721134	C5	50,0 *1.969*	–	73,4 *2.890*	75 *2.953*	45,0	0,9 *1.980*	6,0 *53.1*
C6-SR-33085-V21	02721140	C6	63,0 *2.480*	–	92,48 *3.641*	85 *3.346*	45,0	1,5 *3.310*	6,0 *53.1*
C6-SL-33085-V21	02721136	C6	63,0 *2.480*	–	92,48 *3.641*	85 *3.346*	45,0	1,5 *3.310*	6,0 *53.1*

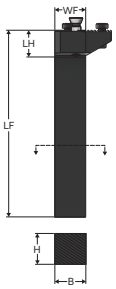
Spare Parts, included in delivery

For	Coolant nozzle	Key	Locking screw	Screw
				
..-V21	CN6	T20P-7L	F85015-T20P	C46017-T20P

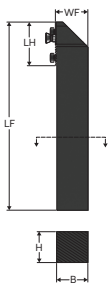
Toolholders
– Metric



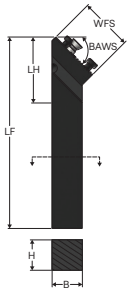
GR/L



FR/L



SR/L



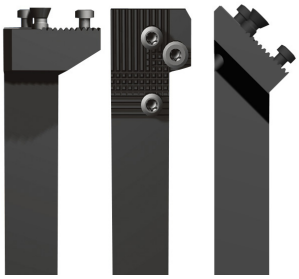
—Right-hand version shown
—For blades program, see page(s) 834–837, 838
—For modular assembly options, see page(s) 716–718
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	WFS	LH	BAWS°	Weight	TQ
		mm	mm	mm	mm	mm	mm		kg	Nm
GR2020K-V21	00089073	20	20	125	19,9	–	16,0	0,0	0,5	6,0
GL2020K-V21	00089074	20	20	125	19,9	–	16,0	0,0	0,5	6,0
GR2525M-V21	00089075	25	25	150	24,9	–	16,0	0,0	0,8	6,0
GL2525M-V21	00089076	25	25	150	24,9	–	16,0	0,0	0,8	6,0
GR3225P-V21	00089077	32	25	170	24,9	–	16,0	0,0	1,2	6,0
GL3225P-V21	00089078	32	25	170	24,9	–	16,0	0,0	1,2	6,0
FR2020K-V21	00089081	20	20	125	20,8	–	33,64	90,0	0,5	6,0
FL2020K-V21	00089082	20	20	125	20,8	–	33,64	90,0	0,4	6,0
FR2525M-V21	00089083	25	25	150	25,8	–	33,64	90,0	0,8	6,0
FL2525M-V21	00089084	25	25	150	25,8	–	33,64	90,0	0,8	6,0
FR3225P-V21	00089085	32	25	170	25,8	–	33,64	90,0	1,1	6,0
FL3225P-V21	00089086	32	25	170	25,8	–	33,64	90,0	1,1	6,0
SR2020K-V21	02701074	20	20	125	–	34,64	43,5	45,0	0,5	6,0
SL2020K-V21	02701065	20	20	125	–	34,64	43,5	45,0	0,4	6,0
SR2525M-V21	02701075	25	25	150	–	34,64	47,5	45,0	0,8	6,0
SL2525M-V21	02701070	25	25	150	–	34,64	47,5	45,0	0,8	6,0
SR3225P-V21	02701076	32	25	170	–	34,64	47,5	45,0	1,1	6,0
SL3225P-V21	02701072	32	25	170	–	34,64	47,5	45,0	1,1	6,0

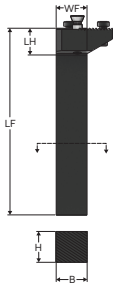
Spare Parts, included in delivery

For	Key	Locking screw	Screw
			
..-V21	T20P-7L	F85015-T20P	C46017-T20P

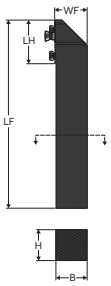
Toolholders – Inch



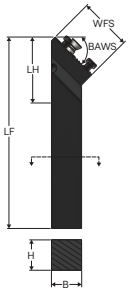
GR/L



FR/L



SR/L



—Right-hand version shown
—For blades program, see page(s) 834–837, 838
—For modular assembly options, see page(s) 716–718
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	WFS	LH	BAWS°	Weight	TQ
		inch	inch	inch	inch	inch	inch		lbs	In/Lbs.
GR075B-V21	00051869	0.750	0.750	4.500	0.750	–	0.630	0,0	0.880	53.1
GR100D-V21	00051907	1.000	1.000	6.000	1.000	–	0.630	0,0	1.980	53.1
GR125D-V21	00051927	1.250	1.250	6.000	1.250	–	0.630	0,0	2.870	53.1
GL075B-V21	00051879	0.750	0.750	4.500	0.750	–	0.630	0,0	1.100	53.1
GL100D-V21	00051909	1.000	1.000	6.000	1.000	–	0.630	0,0	1.980	53.1
GL125D-V21	00052403	1.250	1.250	6.000	1.250	–	0.630	0,0	2.650	53.1
FR100D-V21	00052447	1.000	1.000	6.000	1.035	–	1.330	90,0	1.760	53.1
FL100D-V21	00052454	1.000	1.000	6.000	1.035	–	1.330	90,0	1.760	53.1
SR075B-V21	02701110	0.750	0.750	4.500	–	1.648	1.648	45,0	0.880	53.1
SR100D-V21	02701111	1.000	1.000	6.000	–	2.002	2.002	45,0	1.760	53.1
SR125D-V21	02701112	1.250	1.250	6.000	–	2.355	2.355	45,0	2.650	53.1
SL075B-V21	02701081	0.750	0.750	4.500	–	1.648	1.648	45,0	0.880	53.1
SL100D-V21	02701107	1.000	1.000	6.000	–	2.002	2.002	45,0	1.760	53.1
SL125D-V21	02701108	1.250	1.250	6.000	–	2.355	2.355	45,0	2.650	53.1

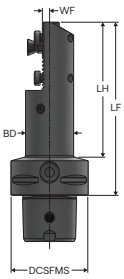
Spare Parts, included in delivery

For	Key	Locking screw	Screw
			
..-V21	T20P-7L	F85015-T20P	C46017-T20P

Toolholders
– Metric/ Inch



FR/L



—Right-hand version shown
—For blades program, see page(s) 834–837, 838
—For modular assembly options, see page(s) 716–718
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	BD	DCSFMS	WF	LF	LH	Weight	TQ
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	Nm *In/Lbs.*
C4-FR-04090-V21	00026925	C4	25,0 *0.984*	40,0 *1.575*	4,0 *0.157*	90 *3.543*	70,0 *2.756*	0,5 *1.100*	6,0 *53.1*
C4-FL-04090-V21	00026926	C4	25,0 *0.984*	40,0 *1.575*	4,0 *0.157*	90 *3.543*	70,0 *2.756*	0,5 *1.100*	6,0 *53.1*
C4-FR-07110-V21	00026927	C4	32,0 *1.260*	40,0 *1.575*	7,0 *0.276*	110 *4.331*	90,0 *3.543*	0,7 *1.540*	6,0 *53.1*
C4-FL-07110-V21	00026928	C4	32,0 *1.260*	40,0 *1.575*	7,0 *0.276*	110 *4.331*	90,0 *3.543*	0,7 *1.540*	6,0 *53.1*
C4-FR-11140-V21	00026929	C4	40,0 *1.575*	40,0 *1.575*	11,0 *0.433*	140 *5.512*	120,0 *4.724*	1,3 *2.870*	6,0 *53.1*
C4-FL-11140-V21	00026930	C4	40,0 *1.575*	40,0 *1.575*	11,0 *0.433*	140 *5.512*	120,0 *4.724*	1,3 *2.870*	6,0 *53.1*
C5-FR-04090-V21	00026931	C5	25,0 *0.984*	50,0 *1.969*	4,0 *0.157*	90 *3.543*	70,0 *2.756*	0,7 *1.540*	6,0 *53.1*
C5-FL-04090-V21	00026932	C5	25,0 *0.984*	50,0 *1.969*	4,0 *0.157*	90 *3.543*	70,0 *2.756*	0,7 *1.540*	6,0 *53.1*
C5-FR-07110-V21	00026933	C5	32,0 *1.260*	50,0 *1.969*	7,0 *0.276*	110 *4.331*	90,0 *3.543*	0,9 *1.980*	6,0 *53.1*
C5-FL-07110-V21	00026934	C5	32,0 *1.260*	50,0 *1.969*	7,0 *0.276*	110 *4.331*	90,0 *3.543*	0,9 *1.980*	6,0 *53.1*
C5-FR-11140-V21	00026935	C5	40,0 *1.575*	50,0 *1.969*	11,0 *0.433*	140 *5.512*	120,0 *4.724*	1,6 *3.530*	6,0 *53.1*
C5-FL-11140-V21	00026936	C5	40,0 *1.575*	50,0 *1.969*	11,0 *0.433*	140 *5.512*	120,0 *4.724*	1,6 *3.530*	6,0 *53.1*
C6-FR-04090-V21	00026937	C6	25,0 *0.984*	63,0 *2.480*	3,5 *0.138*	90 *3.543*	68,0 *2.677*	0,9 *1.980*	6,0 *53.1*
C6-FL-04090-V21	00026938	C6	25,0 *0.984*	63,0 *2.480*	3,5 *0.138*	90 *3.543*	68,0 *2.677*	0,9 *1.980*	6,0 *53.1*
C6-FR-07110-V21	00026939	C6	32,0 *1.260*	63,0 *2.480*	7,0 *0.276*	110 *4.331*	88,0 *3.465*	1,4 *3.090*	6,0 *53.1*
C6-FL-07110-V21	00026940	C6	32,0 *1.260*	63,0 *2.480*	7,0 *0.276*	110 *4.331*	88,0 *3.465*	1,4 *3.090*	6,0 *53.1*
C6-FR-11140-V21	00026941	C6	40,0 *1.575*	63,0 *2.480*	11,0 *0.433*	140 *5.512*	118,0 *4.646*	1,8 *3.970*	6,0 *53.1*
C6-FL-11140-V21	00026942	C6	40,0 *1.575*	63,0 *2.480*	11,0 *0.433*	140 *5.512*	118,0 *4.646*	1,8 *3.970*	6,0 *53.1*

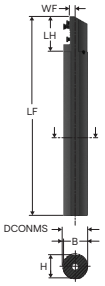
Spare Parts, included in delivery

For	Coolant nozzle	Key	Locking screw	Screw
				
..-V21	CN6	T20P-7L	F85015-T20P	C46017-T20P

Toolholders – Metric



FR/L



—Right-hand version shown
—For blades program, see page(s) 834–837, 838
—For modular assembly options, see page(s) 716–718
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	Weight	TQ
		mm	mm	mm	mm	mm	mm	kg	Nm
A25R-FR-V21	00089087	25	23	24,0	200	4,1	43,0	0,6	6,0
A25R-FL-V21	00089088	25	23	24,0	200	4,1	43,0	0,6	6,0
A32S-FR-V21	00089089	32	30	31,0	250	7,6	43,0	1,4	6,0
A32S-FL-V21	00089090	32	30	31,0	250	7,6	43,0	1,4	6,0
A40T-FR-V21	00089091	40	37	38,5	300	11,6	45,0	2,6	6,0
A40T-FL-V21	00089092	40	37	38,5	300	11,6	45,0	2,6	6,0

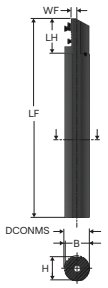
Spare Parts, included in delivery

For	Key	Locking screw	Screw
			
A25R-	T20P-7L	F85015-T20P	C46017-T20P
A32S-	T20P-7L	F85015-T20P	C46017-T20P
A40T-	T20P-7L	F85015-T20P	C46017-T20P

Toolholders
– Inch



FR/L



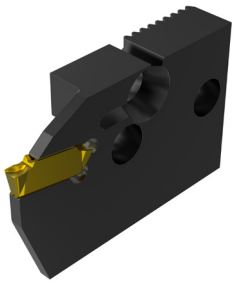
—Right-hand version shown
—For blades program, see page(s) 834–837, 838
—For modular assembly options, see page(s) 716–718
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	LH	Weight	TQ
		inch	inch	inch	inch	inch	inch	lbs	In/Lbs.
A16-FR-V21	00055205	1.000	0.921	0.961	8.000	0.169	1.693	1.320	53.1
A16-FL-V21	00055241	1.000	0.921	0.961	8.000	0.169	1.693	1.320	53.1
A20-FR-V21	00055242	1.250	1.171	1.211	10.000	0.294	1.693	2.870	53.1
A20-FL-V21	00055275	1.250	1.171	1.211	10.000	0.294	1.693	3.090	53.1
A24-FR-V21	00055356	1.500	1.339	1.441	12.000	0.420	1.693	5.070	53.1
A24-FL-V21	00055404	1.500	1.339	1.441	12.000	0.420	1.693	5.070	53.1

Spare Parts, included in delivery

For	Key	Locking screw	Screw
			
..-V21	T20P-7L	F85015-T20P	C46017-T20P

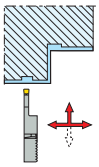
V21-C.R/L – Blades for inserts LCGF, LCGN, LCMF and LCMR – Metric



C.R/L



KAPR = 90,0 °



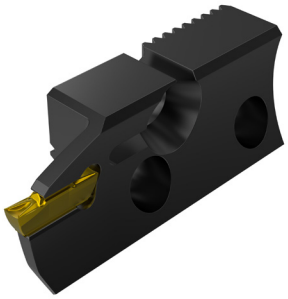
CTWS



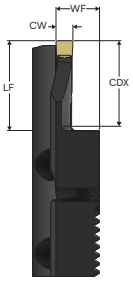
—Right-hand version shown
—For inserts program, see page(s) 842-844, 846-862
—For holders program, see page(s) 828-833
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	LF	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	kg	mm	Nm	
V21-CIR1303	02717485	10	9,2	9,0	0,1	3,0	6,0	LC..1303..
V21-CIL1303	02718916	10	9,2	9,0	0,1	3,0	6,0	LC..1303..
V21-CMR1303	02718924	16	9,2	15,0	0,1	3,0	6,0	LC..1303..
V21-CML1303	02719033	16	9,2	15,0	0,1	3,0	6,0	LC..1303..
V21-CMR1603	00030310	16	9,2	15,0	0,1	3,0	6,0	LC..1603..
V21-CML1603	02719038	16	9,2	15,0	0,1	3,0	6,0	LC..1603..
V21-CIR1304	02563710	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304	02718919	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304	02719034	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304	02719035	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1604	02719039	21	9,2	20,0	0,1	4,0	6,0	LC..1604..
V21-CML1604	02719040	21	9,2	20,0	0,1	4,0	6,0	LC..1604..
V21-CIR1605	02718920	16	9,2	15,0	0,1	5,0	6,0	LC..1605..
V21-CIL1605	02718921	16	9,2	15,0	0,1	5,0	6,0	LC..1605..
V21-CMR1605	02719041	26	9,2	25,0	0,1	5,0	6,0	LC..1605..
V21-CML1605	02719042	26	9,2	25,0	0,1	5,0	6,0	LC..1605..
V21-CIR1606	02718922	19	9,2	18,0	0,1	6,0	6,0	LC..1606..
V21-CIL1606	02718923	19	9,2	18,0	0,1	6,0	6,0	LC..1606..
V21-CMR1606	02719043	31	9,2	30,0	0,1	6,0	6,0	LC..1606..
V21-CML1606	02719044	31	9,2	30,0	0,1	6,0	6,0	LC..1606..

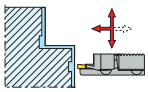
V21-C.R/L – Blades for inserts LCGF, LCGN, LCMF and LCMR – Metric



C.R/L



KAPR = 90,0 °



CTWS

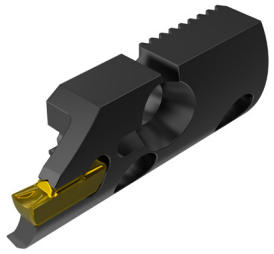


—Right-hand version with left-hand blade shown
—For inserts program, see page(s) 842–844, 860
—For holders program, see page(s) 828–833
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

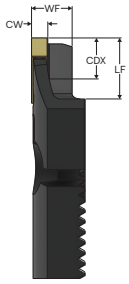
Designation	Item number	INPLM	INPLX	LF	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	kg	mm	Nm	
V21-CJR1303L030017	00089095	17	30	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CJR1303L039024	00089099	24	39	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CKR1303L050033	00089103	33	50	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKR1303L060043	00089107	43	60	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKR1303L076053	00089111	53	76	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L030017	02718887	17	30	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L039024	02718888	24	39	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L050033	02718889	33	50	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L060043	02718890	43	60	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L076053	02718891	53	76	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L100070	02718910	70	100	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L136094	02718911	94	136	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303L200130	02718912	130	200	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-CJL1303R030017	00089094	17	30	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CJL1303R039024	00089098	24	39	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CKL1303R050033	00089102	33	50	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKL1303R060043	00089106	43	60	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKL1303R076053	00089110	53	76	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R030017	02718882	17	30	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R039024	02718883	24	39	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R050033	02718884	33	50	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R060043	02718885	43	60	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R076053	02718886	53	76	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R100070	02718907	70	100	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R136094	02718908	94	136	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303R200130	02718909	130	200	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-CHR1304L030017	00089115	17	30	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CHR1304L034021	00089119	21	34	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304L040026	00089123	26	40	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304L050032	00089127	32	50	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304L060042	00089131	42	60	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304L075052	00089135	52	75	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304L100067	00089139	67	100	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L030017	02718867	17	30	21	9,2	20,0	0,1	4,0	6,0	LC..1304..

Designation	Item number	INPLM	INPLX	LF	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	kg	mm	Nm	
V21-CMR1304L034021	02718868	21	34	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L040026	02611685	26	40	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L050032	02718869	32	50	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L060042	02487944	42	60	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L075052	02718870	52	75	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L100067	02718871	67	100	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L135092	02718900	92	135	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304L200127	02718901	127	200	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CHL1304R030017	00089114	17	30	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CHL1304R034021	00089118	21	34	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304R040026	00089122	26	40	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304R050032	00089126	32	50	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304R060042	00089130	42	60	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304R075052	00089134	52	75	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304R100067	00089138	67	100	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R030017	00030305	17	30	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R034021	02531134	21	34	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R040026	02718861	26	40	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R050032	02718862	32	50	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R060042	02718864	42	60	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R075052	02718865	52	75	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R100067	02718866	67	100	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R135092	02718898	92	135	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304R200127	02718899	127	200	21	9,2	20,0	0,1	4,0	6,0	LC..1304..

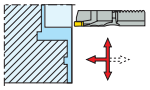
V21-C.R/L – Blades for inserts LCGF, LCGN, LCMF and LCMR – Metric



C.R/L



KAPR = 90,0 °



CTWS

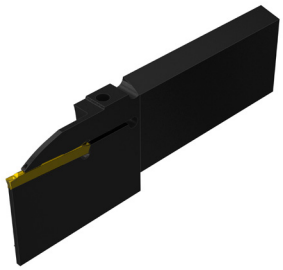


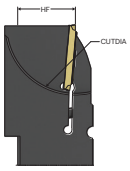
—Right-hand version with right-hand blade shown
—For inserts program, see page(s) 842–844, 860
—For holders program, see page(s) 828–833
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	INPLM	INPLX	LF	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	kg	mm	Nm	
V21-CJR1303R030017	00089093	17	30	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CJR1303R039024	00089097	24	39	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CKR1303R050033	00089101	33	50	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKR1303R060043	00089105	43	60	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKR1303R076053	00089109	53	76	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R030017	02469196	17	30	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R039024	02718892	24	39	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R050033	02718893	33	50	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R060043	02718894	43	60	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R076053	02718895	53	76	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R100070	02718913	70	100	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R136094	02718914	94	136	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COR1303R200130	02718915	130	200	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-CJL1303L030017	00089096	17	30	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CJL1303L039024	00089100	24	39	12	9,2	10,5	0,1	3,0	6,0	LC..1303..
V21-CKL1303L050033	00089104	33	50	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKL1303L060043	00089108	43	60	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-CKL1303L076053	00089112	53	76	13	9,2	12,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L030017	02718878	17	30	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L039024	02718879	24	39	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L050033	02579940	33	50	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L060043	02718880	43	60	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L076053	02718881	53	76	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L100070	02718904	70	100	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L136094	02718905	94	136	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-COL1303L200130	02718906	130	200	19	9,2	18,0	0,1	3,0	6,0	LC..1303..
V21-CHR1304R030017	00089113	17	30	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CHR1304R034021	00089117	21	34	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304R040026	00089121	26	40	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304R050032	00089125	32	50	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304R060042	00089129	42	60	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304R075052	00089133	52	75	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIR1304R100067	00089137	67	100	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R030017	02718872	17	30	21	9,2	20,0	0,1	4,0	6,0	LC..1304..

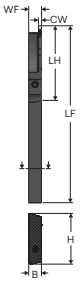
Designation	Item number	INPLM	INPLX	LF	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	kg	mm	Nm	
V21-CMR1304R034021	02718873	21	34	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R040026	02450834	26	40	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R050032	02718874	32	50	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R060042	02718875	42	60	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R075052	02718876	52	75	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R100067	02718877	67	100	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R135092	02718902	92	135	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CMR1304R200127	02718903	127	200	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CHL1304L030017	00089116	17	30	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CHL1304L034021	00089120	21	34	11	9,2	10,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304L040026	00089124	26	40	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304L050032	00089128	32	50	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304L060042	00089132	42	60	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304L075052	00089136	52	75	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CIL1304L100067	00089140	67	100	13	9,2	12,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L030017	02452926	17	30	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L034021	02717475	21	34	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L040026	02611687	26	40	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L050032	02718854	32	50	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L060042	02576753	42	60	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L075052	02718855	52	75	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L100067	02718856	67	100	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L135092	02718896	92	135	21	9,2	20,0	0,1	4,0	6,0	LC..1304..
V21-CML1304L200127	02718897	127	200	21	9,2	20,0	0,1	4,0	6,0	LC..1304..

CF..ITX-..LRBJET – Blades for inserts LCGF, LCGN, LCMF and LCMR – Metric

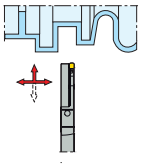




CF..ITX-..LRBJET



KAPR = 90,0 °



CTWS



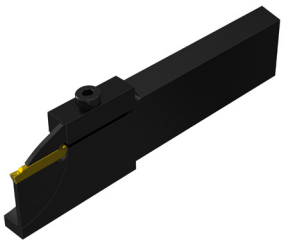
—Left-hand version shown
—For inserts program, see page(s) 845-859, 861-862
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—* Due to the design, grooving depth is limited, see page(s) 719
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	HF	CUTDIA*	CP	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	bar	kg	mm	Nm	
CFXL26ITX-1603LRBJET	02833866	26	8	117,5	8	50,5	21,4	65,0	275,0 bar	0,2	3,0	6,0	LC..1603..
CFXL32ITX-1603LRBJET	02833867	32	8	117,5	8	50,5	24,8	65,0	275,0 bar	0,2	3,0	6,0	LC..1603..
CFTL26ITX-1902LRBJET	02833868	26	8	110,0	8	43,0	21,4	36,0	275,0 bar	0,2	2,0	6,0	LC..1902..

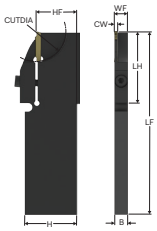
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
26-32	3SMS795	MC6S4X18

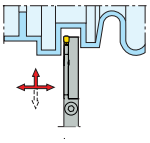
CF..ITX..RB – Blades for inserts LCGF, LCGN, LCMF and LCMR – Metric



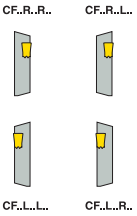
CF..ITX



KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 845-859, 861-862
—* Due to the design, grooving depth is limited, see page(s) 719
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	HF	CUTDIA*	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	mm	Nm	
CFTR26ITX1902RRB	02830353	26	7,85	110,0	8	44,0	20,9	34,0	0,2	2,0	6,0	LCMF1902..
CFTL26ITX1902LRB	02830352	26	7,85	110,0	8	44,0	20,9	34,0	0,2	2,0	6,0	LCMF1902..
CFZR32ITX2802LRB	02830370	32	7,85	119,1	8	52,5	32,0	54,0	0,2	2,0	6,0	LCMF2802..
CFXR32ITX1603RRB	02834803	32	7,85	117,5	8	50,5	24,5	65,0	0,2	3,0	6,0	LC..1603..
CFXR32ITX1603LRB	02834804	32	7,85	117,5	8	50,5	24,5	65,0	0,3	3,0	6,0	LC..1603..
CFXL32ITX1603RRB	02834801	32	7,85	117,5	8	50,5	24,5	65,0	0,3	3,0	6,0	LC..1603..
CFXL32ITX1603LRB	02834802	32	7,85	117,5	8	50,5	24,5	65,0	0,2	3,0	6,0	LC..1603..

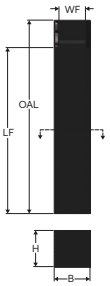
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
26-32	3SMS795	TCEI0416

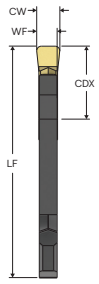
SFN, CF.N – Toolholder and blades for inserts LCGN, LCMF and LCMR – Metric



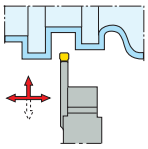
SFN



CF.N



KAPR = 90,0 °



CTWS



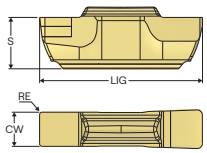
—For inserts program, see page(s) 846-859, 861-862
—Max depth of cut for double-sided LCGF/LCMF16.. = 14 mm
—CW = indicative Cutting Width, may vary depending on the chosen insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	OAL	WF	CDX	Weight	CW	TQ	CTWS
		mm	mm	mm	mm	mm	mm	kg	mm	Nm	
SFN2525N	00023587	25	25	101,2	134	21,7	–	0,7	–	6,0	Blade-GAD
CFLN-03	00036564	–	–	46,4	–	2,6	13,0	0,1	3,0	6,0	LC..1603..
CFKN-04	00027198	–	–	48,6	–	3,6	15,0	0,1	4,0	6,0	LC..1604..
CFNN-04	00027200	–	–	55,0	–	3,6	22,0	0,1	4,0	6,0	LC..1604..
CFIN-05	00027201	–	–	48,6	–	4,6	15,0	0,1	5,0	6,0	LC..1605..
CFHN-06	00027203	–	–	48,6	–	5,6	15,0	0,1	6,0	6,0	LC..1606..
CFJN-06	00027204	–	–	55,0	–	5,6	22,0	0,1	6,0	6,0	LC..1606..

Spare Parts, included in delivery

For	Key	Locking screw	Screw
			
SFN2525N	T20P-7	C46017-T20P	C45013-T20P

LCMF, LCMR

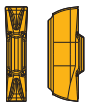


Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

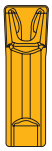
LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCMF-FT



LCMR-FT



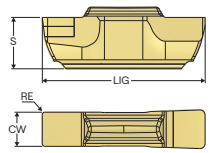


LCMF-MC



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF130302-0300-FT	0,2 *0.008*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■							
LCMF130304-0300-FT	0,4 *0.016*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■			■	■			
LCMF130402-0400-FT	0,2 *0.008*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■							
LCMF130404-0400-FT	0,4 *0.016*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■			■	■			
LCMR130302-0300-FT	0,2 *0.008*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■							
LCMR130304-0300-FT	0,4 *0.016*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■							
LCMR130404-0400-FT	0,4 *0.016*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■							
LCMF130304-0300-MC	0,4 *0.016*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■				■			
LCMF130404-0400-MC	0,4 *0.016*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■				■			

LCGF



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCGF-GG

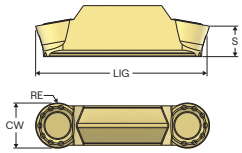


LCGF-GS



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGF130302-0300-GG	0,2 *0.008*	3,0 *0.118*	12,4 *0.488*	3,9 *0.154*		■							
LCGF130402-0400-GG	0,2 *0.008*	4,0 *0.157*	12,4 *0.488*	3,9 *0.154*		■							
LCGF130302-0300-GS	0,2 *0.008*	3,0 *0.118*	12,4 *0.488*	3,9 *0.154*								■	
LCGF130402-0400-GS	0,2 *0.008*	4,0 *0.157*	12,4 *0.488*	3,9 *0.154*								■	

LCGF, LCMF, LCMR

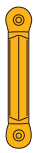


Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCGF-RP



LCMF-MP

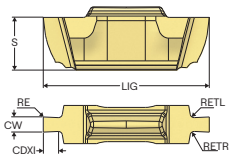


LCMR-MP



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGF1303M0-0300-RP	1,5 *0.059*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■					■		
LCMF1303M0-0300-MP	1,5 *0.059*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■			■	■			
LCMF1304M0-0400-MP	2,0 *0.079*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■			■	■			
LCMR1303M0-0300-MP	1,5 *0.059*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■							
LCMR1304M0-0400-MP	2,0 *0.079*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■							

LCGA



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82
* Toolholders have to be modified

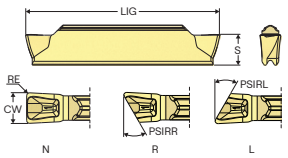
Standard
** =
DIN 471
DIN 472
SMS 1581
SMS 1582

LCGA-FG



Designation	RE	CW	LIG	S	RETR	RETL	CDXI	For circlip	Note	Standard	Grades								
											Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGA130300-0115-FG	–	1,15 *0.045*	12,4 *0.488*	4,0 *0.157*	0,3 *0.012*	0,3 *0.012*	1,4 *0.055*	1,00	*	**		■							
LCGA130300-0135-FG	–	1,35 *0.053*	12,4 *0.488*	4,0 *0.157*	0,3 *0.012*	0,3 *0.012*	1,6 *0.063*	1,20	*	**		■							
LCGA130301-0165-FG	0,1 *0.004*	1,65 *0.065*	12,4 *0.488*	4,0 *0.157*	0,3 *0.012*	0,3 *0.012*	1,9 *0.075*	1,50	*	**		■							
LCGA130301-0190-FG	0,1 *0.004*	1,9 *0.075*	12,4 *0.488*	4,0 *0.157*	0,3 *0.012*	0,3 *0.012*	2,15 *0.085*	1,75	*	**		■							
LCGA130301-0215-FG	0,15 *0.006*	2,15 *0.085*	12,4 *0.488*	4,0 *0.157*	0,3 *0.012*	0,3 *0.012*	2,4 *0.094*	2,00	*	**		■							
LCGA130302-0265-FG	0,2 *0.008*	2,65 *0.104*	12,4 *0.488*	4,0 *0.157*	0,2 *0.008*	0,2 *0.008*	2,9 *0.114*	2,50		**		■							
LCGA130301-0300-FG	0,1 *0.004*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*	–	–	12,39 *0.488*	–		**		■							
LCGA130302-0300-FG	0,2 *0.008*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*	–	–	12,39 *0.488*	–		**		■							
LCGA130402-0400-FG	0,2 *0.008*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*	–	–	12,39 *0.488*	–		**		■							

LCMF



Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

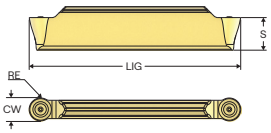
For ISO attribute explanation, see page 82

LCMF-FT



Designation	RE	CW	LIG	S	PSIRR°	PSIRL°	Grades								
							Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF190202-0200-FT	0,2 *0.008*	2,0 *0.079*	18,5 *0.728*	2,85 *0.112*	–	–		■	■						
LCMF190202-0200-FTR6	0,2 *0.008*	2,0 *0.079*	18,5 *0.728*	2,85 *0.112*	6,0	–			■						
LCMF190202-0200-FTL6	0,2 *0.008*	2,0 *0.079*	18,5 *0.728*	2,85 *0.112*	–	6,0			■						
LCMF280202-0200-FT	0,2 *0.008*	2,0 *0.079*	28,0 *1.102*	2,85 *0.112*	–	–		■	■						
LCMF280202-0200-FTR6	0,2 *0.008*	2,0 *0.079*	28,0 *1.102*	2,85 *0.112*	6,0	–			■						
LCMF280202-0200-FTL6	0,2 *0.008*	2,0 *0.079*	28,0 *1.102*	2,85 *0.112*	–	6,0			■						

LCMF



Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

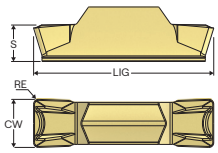
For ISO attribute explanation, see page 82

LCMF-MP



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF1902M0-0200-MP	1,0 *0.039*	2,0 *0.079*	18,5 *0.728*	2,85 *0.112*		■			■				
LCMF2802M0-0200-MP	1,0 *0.039*	2,0 *0.079*	28,0 *1.102*	2,85 *0.112*		■			■				

LCMF

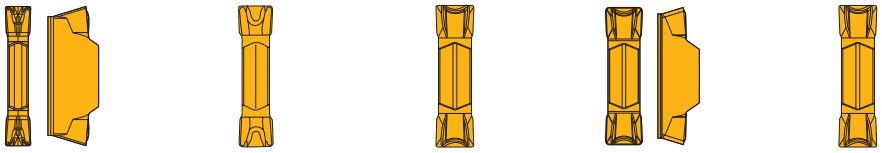


Tolerances: Size:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002* 16/*16*
S = ±0,08/*0.003* 30/*30*

LIG = Distance cutting edge-rear support

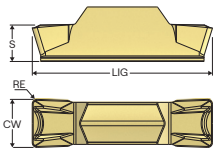
For ISO attribute explanation, see page 82

LCMF-FT



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF160302-0300-FT	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	■	■				■			
LCMF160302-0318-FT	0,2 *0.008*	3,18 *0.125*	15,9 *0.626*	4,5 *0.177*	■	■							
LCMF160304-0300-FT	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■		■		■			
LCMF160402-0400-FT	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160404-0400-FT	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	■	■		■		■			
LCMF160408-0400-FT	0,8 *0.031*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160504-0500-FT	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*	■	■		■		■			
LCMF160505-0476-FT	0,5 *0.020*	4,76 *0.187*	15,9 *0.626*	4,5 *0.177*	■	■							
LCMF160508-0500-FT	0,8 *0.031*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160604-0600-FT	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160605-0635-FT	0,5 *0.020*	6,35 *0.250*	15,9 *0.626*	4,5 *0.177*	■	■							
LCMF160608-0600-FT	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*	■	■				■			■
LCMF160610-0600-FT	1,0 *0.039*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF300804-0800-FT	0,4 *0.016*	8,0 *0.315*	29,1 *1.146*	5,57 *0.219*		■				■		■	
LCMF300808-0800-FT	0,8 *0.031*	8,0 *0.315*	29,1 *1.146*	5,57 *0.219*		■			■	■		■	
LCMF300808-1000-FT	0,8 *0.031*	10,0 *0.394*	29,2 *1.150*	5,57 *0.219*		■				■			
LCMF300812-0800-FT	1,2 *0.047*	8,0 *0.315*	29,1 *1.146*	5,57 *0.219*		■			■	■		■	
LCMF300812-1000-FT	1,2 *0.047*	10,0 *0.394*	29,2 *1.150*	5,57 *0.219*		■						■	

LCMF

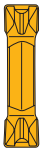


Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

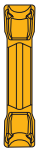
LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCMF-MT

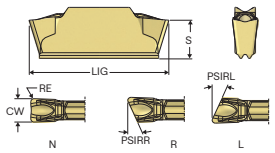


LCMF-MG



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF160302-0300-MT	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160302-0318-MT	0,2 *0.008*	3,18 *0.125*	15,9 *0.626*	4,5 *0.177*		■							
LCMF160304-0300-MT	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■			■	■		■	
LCMF160404-0400-MT	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■			■	■			
LCMF160408-0400-MT	0,8 *0.031*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■			■	■		■	
LCMF160504-0500-MT	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■			■	■			
LCMF160505-0476-MT	0,5 *0.020*	4,76 *0.187*	15,9 *0.626*	4,5 *0.177*		■							
LCMF160508-0500-MT	0,8 *0.031*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■			■	■		■	
LCMF160604-0600-MT	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■			■	■			
LCMF160605-0635-MT	0,5 *0.020*	6,35 *0.250*	15,9 *0.626*	4,5 *0.177*		■						■	
LCMF160608-0600-MT	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■			■	■		■	
LCMF160610-0600-MT	1,0 *0.039*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160304-0300-MG	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160404-0400-MG	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160504-0500-MG	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMF160608-0600-MG	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■				■			

LCMF, LCMR

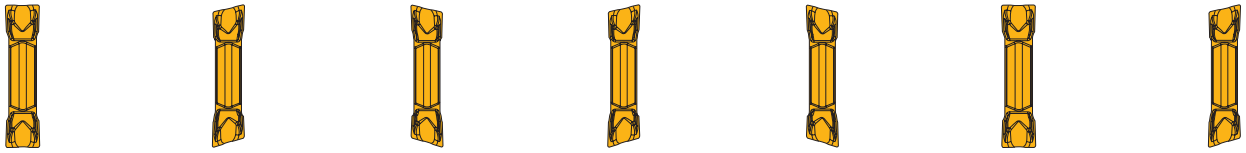


Tolerances:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002*

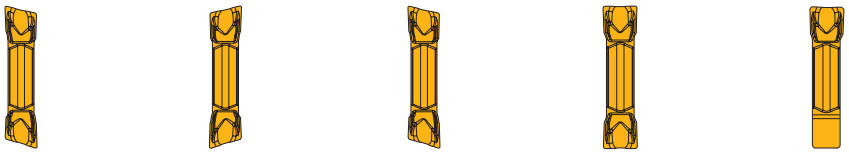
LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82
* Toolholders have to be modified

LCMF-MC

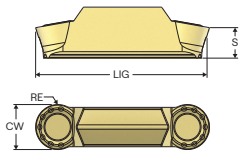


LCMR-MC



Designation	RE	CW	LIG	S	PSIRR°	PSIRL°	Note	Grades								
								Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*				CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF160302-0300-MC	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	–	–			■	■						
LCMF160302-0300-MCR6	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	6,0	–	*		■	■						
LCMF160302-0300-MCL6	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	–	6,0	*		■	■						
LCMF160302-0300-MCR15	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	15,0	–	*			■						
LCMF160302-0300-MCL15	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	–	15,0	*			■						
LCMF160304-0300-MC	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	–	–			■	■			■			
LCMF160402-0400-MC	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	–	–			■	■						
LCMF160402-0400-MCR6	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	6,0	–	*		■	■						
LCMF160402-0400-MCL6	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	–	6,0	*			■						
LCMF160402-0400-MCR15	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	15,0	–	*			■						
LCMF160402-0400-MCL15	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	–	15,0	*			■						
LCMF160404-0400-MC	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	–	–			■	■			■			
LCMF160504-0500-MC	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*	–	–			■	■			■			
LCMF160604-0600-MC	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*	–	–			■	■			■			
LCMF160608-0600-MC	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*	–	–			■				■			
LCMR160302-0300-MC	0,2 *0.008*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	–	–				■						
LCMR160404-0400-MC	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	–	–				■						
LCMR160504-0500-MC	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*	–	–				■						
LCMR160604-0600-MC	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*	–	–				■						

LCMF



Tolerances: Size:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002* 16/*16*
S = ±0,08/*0.003* 30/*30*

LIG = Distance cutting edge-rear support

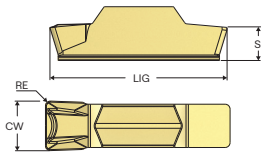
For ISO attribute explanation, see page 82

LCMF-MP



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMF1603M0-0300-MP	1,5 *0.059*	3,0 *0.118*	17,0 *0.669*	4,3 *0.169*	■	■		■	■	■		■	■
LCMF160300-0318-MP	1,59 *0.063*	3,18 *0.125*	16,6 *0.654*	4,36 *0.172*	■	■						■	
LCMF1604M0-0400-MP	2,0 *0.079*	4,0 *0.157*	17,1 *0.673*	4,25 *0.167*	■	■		■	■	■		■	■
LCMF1605M0-0500-MP	2,5 *0.098*	5,0 *0.197*	17,8 *0.701*	4,17 *0.164*	■	■		■	■	■		■	■
LCMF160500-0476-MP	2,38 *0.094*	4,76 *0.187*	17,7 *0.697*	4,17 *0.164*	■	■							■
LCMF1606M0-0600-MP	3,0 *0.118*	6,0 *0.236*	18,0 *0.709*	4,12 *0.162*	■	■		■	■	■		■	■
LCMF160600-0635-MP	3,18 *0.125*	6,35 *0.250*	17,6 *0.693*	4,19 *0.165*	■	■						■	
LCMF3008M0-0800-MP	4,0 *0.157*	8,0 *0.315*	30,1 *1.185*	5,42 *0.213*		■			■	■		■	■
LCMF3008M0-1000-MP	5,0 *0.197*	10,0 *0.394*	30,1 *1.185*	5,49 *0.216*	■	■				■			

LCMR



Tolerances: Size:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002* 16/*16*
S = ±0,08/*0.003* 30/*30*

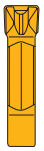
LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCMR-FT

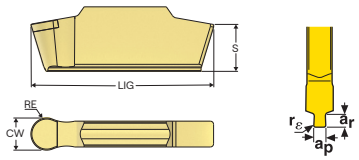


LCMR-MT



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMR160304-0300-FT	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*	■	■				■			
LCMR160402-0400-FT	0,2 *0.008*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■							
LCMR160404-0400-FT	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*	■	■				■			
LCMR160504-0500-FT	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*	■	■				■			
LCMR160608-0600-FT	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*	■	■				■			
LCMR300808-0800-FT	0,8 *0.031*	8,0 *0.315*	29,1 *1.146*	5,57 *0.219*		■				■		■	
LCMR300808-1000-FT	0,8 *0.031*	10,0 *0.394*	29,2 *1.150*	5,57 *0.219*		■							
LCMR300812-0800-FT	1,2 *0.047*	8,0 *0.315*	29,1 *1.146*	5,57 *0.219*		■							
LCMR300812-1000-FT	1,2 *0.047*	10,0 *0.394*	29,2 *1.150*	5,57 *0.219*		■							
LCMR160304-0300-MT	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■				■		■	
LCMR160404-0400-MT	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMR160408-0400-MT	0,8 *0.031*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*								■	
LCMR160504-0500-MT	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■				■			
LCMR160508-0500-MT	0,8 *0.031*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*								■	
LCMR160608-0600-MT	0,8 *0.031*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■				■		■	

LCMR



Tolerances: Size:
CW = ±0,05/*0.002*
LIG = ±0,08/*0.003*
S = ±0,05/*0.002* 16/*16*
S = ±0,08/*0.003* 30/*30*

LIG = Distance cutting edge-rear support

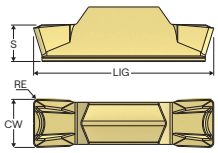
For ISO attribute explanation, see page 82

LCMR-MP



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCMR1603M0-0300-MP	1,5 *0.059*	3,0 *0.118*	17,0 *0.669*	4,3 *0.169*	■	■				■		■	
LCMR1604M0-0400-MP	2,0 *0.079*	4,0 *0.157*	17,1 *0.673*	4,25 *0.167*	■	■				■		■	
LCMR1605M0-0500-MP	2,5 *0.098*	5,0 *0.197*	17,8 *0.701*	4,17 *0.164*	■	■				■		■	
LCMR1606M0-0600-MP	3,0 *0.118*	6,0 *0.236*	18,0 *0.709*	4,12 *0.162*	■	■				■		■	
LCMR3008M0-0800-MP	4,0 *0.157*	8,0 *0.315*	30,1 *1.185*	5,42 *0.213*		■				■		■	
LCMR3008M0-1000-MP	5,0 *0.197*	10,0 *0.394*	30,1 *1.185*	5,49 *0.216*		■				■			

LCGF



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

LCGF-GG

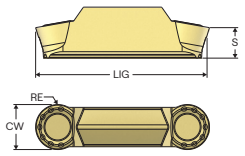


LCGF-GS



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGF160302-0300-GG	0,2 *0.008*	3,0 *0.118*	16,6 *0.654*	4,25 *0.167*		■							
LCGF160402-0400-GG	0,2 *0.008*	4,0 *0.157*	16,6 *0.654*	4,25 *0.167*		■							
LCGF160502-0500-GG	0,2 *0.008*	5,0 *0.197*	17,1 *0.673*	4,15 *0.163*		■							
LCGF160604-0600-GG	0,4 *0.016*	6,0 *0.236*	17,4 *0.685*	4,2 *0.165*		■							
LCGF300804-0800-GG	0,4 *0.016*	8,0 *0.315*	29,0 *1.142*	5,55 *0.219*		■							
LCGF160302-0300-GS	0,2 *0.008*	3,0 *0.118*	16,6 *0.654*	4,25 *0.167*								■	
LCGF160402-0400-GS	0,2 *0.008*	4,0 *0.157*	16,6 *0.654*	4,25 *0.167*								■	
LCGF160502-0500-GS	0,2 *0.008*	5,0 *0.197*	17,1 *0.673*	4,15 *0.163*								■	
LCGF160604-0600-GS	0,4 *0.016*	6,0 *0.236*	17,4 *0.685*	4,2 *0.165*								■	
LCGF300804-0800-GS	0,4 *0.016*	8,0 *0.315*	29,0 *1.142*	5,55 *0.219*								■	

LCGF

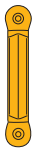


Tolerances: Size:
CW = ±0,02/*0.0008*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002* 16/*16*
S = ±0,08/*0.003* 30/*30*

LIG = Distance cutting edge-rear support

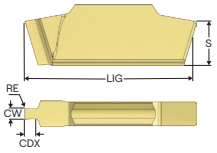
For ISO attribute explanation, see page 82

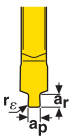
LCGF-RP



Designation	RE	CW	LIG	S	Grades								
					Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGF1603M0-0300-RP	1,5 *0.059*	3,0 *0.118*	17,0 *0.669*	4,3 *0.169*	■							■	
LCGF160300-0318-RP	1,59 *0.063*	3,18 *0.125*	16,6 *0.654*	4,36 *0.172*	■							■	
LCGF1604M0-0400-RP	2,0 *0.079*	4,0 *0.157*	17,1 *0.673*	4,25 *0.167*	■							■	
LCGF1605M0-0500-RP	2,5 *0.098*	5,0 *0.197*	17,8 *0.701*	4,17 *0.164*	■							■	
LCGF160500-0476-RP	2,38 *0.094*	4,76 *0.187*	17,7 *0.697*	4,17 *0.164*	■								
LCGF1606M0-0600-RP	3,0 *0.118*	6,0 *0.236*	18,0 *0.709*	4,12 *0.162*	■							■	
LCGF3008M0-0800-RP	4,0 *0.157*	8,0 *0.315*	30,1 *1.185*	5,42 *0.213*	■							■	

LCGN, LCGF – Radial grooves





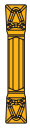
Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82
* Toolholders have to be modified

Standard
** =
DIN 471
DIN 472
SMS 1581
SMS 1582

LCGF-FG



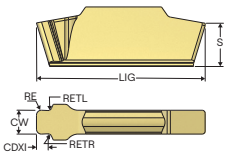
LCGN-FG





Designation	RE	CW	LIG	S	CDXI	For circlip	Note	Standard	Grades								
									Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN160300-0115-FG	–	1,15 *0.045*	16,6 *0.654*	4,5 *0.177*	1,4 *0.055*	1,00	*	**		■							
LCGN160300-0135-FG	–	1,35 *0.053*	16,6 *0.654*	4,5 *0.177*	1,6 *0.063*	1,20	*	**		■							
LCGN160301-0165-FG	0,1 *0.004*	1,65 *0.065*	16,6 *0.654*	4,5 *0.177*	1,85 *0.073*	1,50	*	**		■							
LCGN160301-0190-FG	0,1 *0.004*	1,9 *0.075*	16,6 *0.654*	4,5 *0.177*	2,1 *0.083*	1,75	*	**		■							
LCGN160301-0215-FG	0,1 *0.004*	2,15 *0.085*	16,6 *0.654*	4,5 *0.177*	2,3 *0.091*	2,00	*	**		■							
LCGN160302-0265-FG	0,2 *0.008*	2,65 *0.104*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	2,50		**		■							
LCGN160302-0300-FG	0,2 *0.008*	3,0 *0.118*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160302-0320-FG	0,2 *0.008*	3,2 *0.126*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	3,00		**		■							
LCGN160302-0340-FG	0,2 *0.008*	3,4 *0.134*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160402-0400-FG	0,2 *0.008*	4,0 *0.157*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160402-0420-FG	0,2 *0.008*	4,2 *0.165*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	4,00		**		■							
LCGN160402-0440-FG	0,2 *0.008*	4,4 *0.173*	16,6 *0.654*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160502-0500-FG	0,2 *0.008*	5,0 *0.197*	17,1 *0.673*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160502-0520-FG	0,2 *0.008*	5,2 *0.205*	17,1 *0.673*	4,5 *0.177*	8,0 *0.315*	5,00		**		■							
LCGN160602-0600-FG	0,2 *0.008*	6,0 *0.236*	17,6 *0.693*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGN160602-0635-FG	0,2 *0.008*	6,35 *0.250*	17,6 *0.693*	4,5 *0.177*	8,0 *0.315*	–		**		■							
LCGF160301-0300-FG	0,1 *0.004*	3,0 *0.118*	16,6 *0.654*	4,5 *0.177*	14,0 *0.551*	–				■							

LCGN – O-ring



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

For ISO attribute explanation, see page 82

Standard
* =
SMS 1588, BS 4518

** =
ISO 3601, DIN 3771, BS 1806

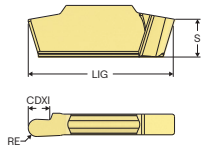
LCGN-DY
O-ring, dynamic

LCGN-ST
O-ring, static



Designation	RE	CW	LIG	S	RETR	RETL	CDXI	For O-ring	Standard	Grades								
										Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN160305-0180-DY	0,5 *0.020*	2,4 *0.094*	16,6 *0.654*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	1,55 *0.061*	1,80 *0.071*	**		■							
LCGN160410-0300-DY	1,0 *0.039*	4,1 *0.161*	16,6 *0.654*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	2,5 *0.098*	3,00 *0.118*	*		■							
LCGN160305-0160-ST	0,5 *0.020*	2,4 *0.094*	16,6 *0.654*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	1,2 *0.047*	1,60 *0.063*	*		■							
LCGN160305-0240-ST	0,5 *0.020*	3,2 *0.126*	16,6 *0.654*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	1,9 *0.075*	2,40 *0.094*	*		■							
LCGN160410-0300-ST	1,0 *0.039*	3,8 *0.150*	16,6 *0.654*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	2,4 *0.094*	3,00 *0.118*	*		■							
LCGN160507-0355-ST	0,75 *0.030*	4,8 *0.189*	17,1 *0.673*	4,5 *0.177*	0,3 *0.012*	0,3 *0.012*	2,8 *0.110*	3,55 *0.140*	**		■							

LCGN – Full radius grooving



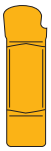
Tolerances:
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

Right-hand version shown

For ISO attribute explanation, see page 82
* Toolholders have to be modified

LCGN-R-R



LCGN-L-R

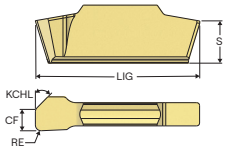


LCGN-R



Designation	RE	LIG	S	CDXI	For radius	Note	Grades								
							Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN1603M0-0100R-R	1,0 *0.039*	16,6 *0.654*	4,5 *0.177*	2,7 *0.106*	1,0 *0.039*	*		■							
LCGN1603M0-0120R-R	1,2 *0.047*	16,6 *0.654*	4,5 *0.177*	2,7 *0.106*	1,2 *0.047*	*		■							
LCGN1603M0-0100L-R	1,0 *0.039*	16,6 *0.654*	4,5 *0.177*	2,7 *0.106*	1,0 *0.039*	*		■							
LCGN1603M0-0120L-R	1,2 *0.047*	16,6 *0.654*	4,5 *0.177*	2,7 *0.106*	1,2 *0.047*	*		■							
LCGN1603M0-0150-R	1,5 *0.059*	16,6 *0.654*	4,5 *0.177*	–	1,5 *0.059*			■							
LCGN1604M0-0200-R	2,0 *0.079*	16,6 *0.654*	4,5 *0.177*	–	2,0 *0.079*			■							
LCGN1606M0-0300-R	3,0 *0.118*	17,6 *0.693*	4,5 *0.177*	–	3,0 *0.118*			■							

LCGN-D76



Tolerances:
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

LIG = Distance cutting edge-rear support

Right-hand version shown

For ISO attribute explanation, see page 82
* Toolholders have to be modified

LCGN..L-D76

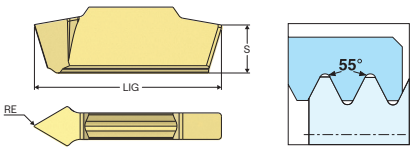


LCGN..R-D76



Designation	RE	CF	LIG	S	For max pitch	KCHR°	KCHL°	Note	Grades								
									Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN160306-0100R-D76	0,6 *0.024*	2,2 *0.087*	16,6 *0.654*	4,5 *0.177*	1,0 *0.039*	0,0	45,0	*		■							
LCGN160306-0100L-D76	0,6 *0.024*	2,2 *0.087*	16,6 *0.654*	4,5 *0.177*	1,0 *0.039*	45,0	0,0	*		■							
LCGN160507-0150R-D76	0,75 *0.030*	3,2 *0.126*	17,1 *0.673*	4,5 *0.177*	1,5 *0.059*	0,0	45,0			■							
LCGN160507-0150L-D76	0,75 *0.030*	3,2 *0.126*	17,1 *0.673*	4,5 *0.177*	1,5 *0.059*	45,0	0,0			■							
LCGN160610-0200R-D76	1,0 *0.039*	4,6 *0.181*	17,6 *0.693*	4,5 *0.177*	2,0 *0.079*	0,0	45,0			■							
LCGN160610-0200L-D76	1,0 *0.039*	4,6 *0.181*	17,6 *0.693*	4,5 *0.177*	2,0 *0.079*	45,0	0,0			■							

LCGN – Partial profile 55°



Tolerances:
LIG = ±0,025/*0.001*
RE = ±0,025/*0.001*

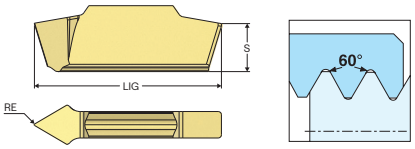
For ISO attribute explanation, see page 82

LCGN...-.55



Designation	RE	LIG	S	Pitch mm	TPI	Grades								
						Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*			CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN1603-A55	0,08 *0.003*	16,6 *0.654*	4,5 *0.177*	0,5-1,5	48,0-16,0		■							
LCGN1603-G55	0,18 *0.007*	16,6 *0.654*	4,5 *0.177*	1,75-3,0	14,0-8,0		■							

LCGN – Partial profile 60°



Tolerances:
LIG = ±0,025/*0.001*
RE = ±0,025/*0.001*

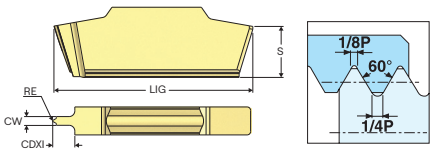
For ISO attribute explanation, see page 82

LCGN...-.60



Designation	RE	LIG	S	Pitch mm	TPI	Grades								
						Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*			CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN1603-A60	0,08 *0.003*	16,6 *0.654*	4,5 *0.177*	0,5-1,5	48,0-16,0		■							
LCGN1603-G60	0,18 *0.007*	16,6 *0.654*	4,5 *0.177*	1,75-3,0	14,0-8,0		■							

LCGN – ISO Metric



Tolerances:
LIG = ±0,025/*0.001*
S = ±0,05/*0.002*

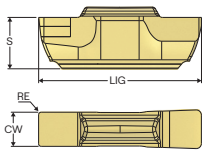
For ISO attribute explanation, see page 82
* Toolholders have to be modified

LCGN-ISO



Designation	RE	CW	LIG	S	CDXI	Pitch	Note	Grades								
								Coated							Uncoated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP200	CP500	CP600	TGH1050	TGK1500	TGP25	TGS2050	883	890
LCGN1603-E0.5ISO	0,07 *0.003*	0,75 *0.030*	16,6 *0.654*	4,5 *0.177*	1,9 *0.075*	0,5 *0.020*	*		■							
LCGN1603-E0.8ISO	0,11 *0.004*	1,2 *0.047*	16,6 *0.654*	4,5 *0.177*	3,0 *0.118*	0,8 *0.031*	*		■							
LCGN1603-E1.0ISO	0,13 *0.005*	1,5 *0.059*	16,6 *0.654*	4,5 *0.177*	3,75 *0.148*	1,0 *0.039*	*		■							
LCGN1603-E1.25ISO	0,17 *0.007*	1,88 *0.074*	16,6 *0.654*	4,5 *0.177*	4,2 *0.165*	1,25 *0.049*	*		■							
LCGN1603-E1.5ISO	0,21 *0.008*	2,4 *0.094*	16,6 *0.654*	4,5 *0.177*	0,92 *0.036*	1,5 *0.059*			■							

LCGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

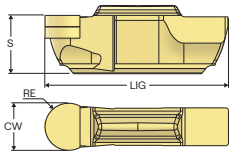
Tip sizes, see page(s) 136
Edge preparation, see page(s) 132
For ISO attribute explanation, see page 82

LCGN-LF



Designation	RE	CW	LIG	S	Grades			
					Coated	Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CBN170C	CBN010	CBN170	CBN200
LCGN130304-0300S-LF	0,4 *0.016*	3,0 *0.118*	12,3 *0.484*	4,0 *0.157*				■
LCGN1303040300S01025LF	0,4 *0.016*	3,0 *0.118*	12,3 *0.484*	4,0 *0.157*		■		
LCGN130404-0400S-LF	0,4 *0.016*	4,0 *0.157*	12,3 *0.484*	4,0 *0.157*				■

LCGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

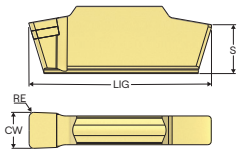
Tip sizes, see page(s) 136
Edge preparation, see page(s) 132
For ISO attribute explanation, see page 82

LCGN...M0-LF



Designation	RE	CW	LIG	S	Grades			
					Coated	Uncoated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CBN170C	CBN010	CBN170	CBN200
LCGN1303M00300S01025LF	1,5 *0.059*	3,0 *0.118*	12,4 *0.488*	4,0 *0.157*		■		
LCGN1304M00400S01025LF	2,0 *0.079*	4,0 *0.157*	12,4 *0.488*	4,0 *0.157*		■		

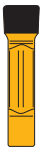
LCGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

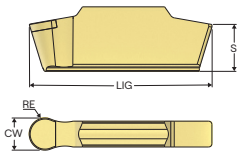
Tip sizes, see page(s) 136
Edge preparation, see page(s) 132
For ISO attribute explanation, see page 82

LCGN-LF



					Grades			
Designation	**RE**	**CW**	**LIG**	**S**	**Coated**	**Uncoated**		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CBN170C	CBN010	CBN170	CBN200
LCGN160304-0300E-LF	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■		
LCGN160304-0300S-LF	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*				■
LCGN160304-0300S01025LF	0,4 *0.016*	3,0 *0.118*	15,9 *0.626*	4,5 *0.177*		■		
LCGN160404-0400E-LF	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■		
LCGN160404-0400E25-LF	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*			■	
LCGN160404-0400S-LF	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*				■
LCGN160404-0400S01025LF	0,4 *0.016*	4,0 *0.157*	15,9 *0.626*	4,5 *0.177*		■		
LCGN160504-0500S-LF	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*				■
LCGN160504-0500S01025LF	0,4 *0.016*	5,0 *0.197*	15,9 *0.626*	4,5 *0.177*		■		
LCGN160604-0600S-LF	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*				■
LCGN160604-0600S01025LF	0,4 *0.016*	6,0 *0.236*	15,9 *0.626*	4,5 *0.177*		■		

LCGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

Tip sizes, see page(s) 136
Edge preparation, see page(s) 132
For ISO attribute explanation, see page 82

LCGN...M0-LF



					Grades			
Designation	**RE**	**CW**	**LIG**	**S**	**Coated**	**Uncoated**		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CBN170C	CBN010	CBN170	CBN200
LCGN1603M0-0300E25-LF	1,5 *0.059*	3,0 *0.118*	16,6 *0.654*	4,4 *0.173*	■	■	■	
LCGN1603M0-0300S-LF	1,5 *0.059*	3,0 *0.118*	16,6 *0.654*	4,4 *0.173*				■
LCGN1603M0-0300S01025LF	1,5 *0.059*	3,0 *0.118*	16,6 *0.654*	4,4 *0.173*		■		
LCGN1604M0-0400E25-LF	2,0 *0.079*	4,0 *0.157*	16,6 *0.654*	4,35 *0.171*		■	■	
LCGN1604M0-0400S-LF	2,0 *0.079*	4,0 *0.157*	16,6 *0.654*	4,35 *0.171*				■
LCGN1604M0-0400S01025LF	2,0 *0.079*	4,0 *0.157*	16,6 *0.654*	4,35 *0.171*		■		
LCGN1605M0-0500E25-LF	2,5 *0.098*	5,0 *0.197*	17,2 *0.677*	4,3 *0.169*	■	■	■	
LCGN1605M0-0500S-LF	2,5 *0.098*	5,0 *0.197*	17,2 *0.677*	4,3 *0.169*				■
LCGN1605M0-0500S01025LF	2,5 *0.098*	5,0 *0.197*	17,2 *0.677*	4,3 *0.169*		■		
LCGN1606M0-0600E25-LF	3,0 *0.118*	6,0 *0.236*	17,2 *0.677*	4,2 *0.165*		■		
LCGN1606M0-0600S-LF	3,0 *0.118*	6,0 *0.236*	17,2 *0.677*	4,2 *0.165*				■
LCGN1606M0-0600S01025LF	3,0 *0.118*	6,0 *0.236*	17,2 *0.677*	4,2 *0.165*		■		



Mini-Shaft™

The Seco Mini-Shaft™ system consists of holders and inserts for internal turning, grooving, precision grooving, profiling, backfacing and threading. It can be used in holes as small as ∅8 mm/ 0.315 inch (Mini-Shaft™ 08) or ∅11 mm/ 0.433 inch (Mini-Shaft™ 11). Seco Mini-Shaft™ also features a unique connection, with a double serration, making the connection both stable and secure. It also gives very good repeatability (±0.02 mm/ 0.0008 inch).

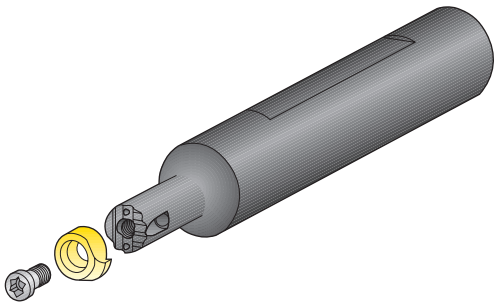
– All toolholders are used for both R and L-handed inserts
– To be used in holes as small as ∅8 mm/ 0.315 inch (Mini-Shaft™ 08) or ∅11 mm/ 0.433 inch (Mini-Shaft™ 11).
– Through coolant possibility.

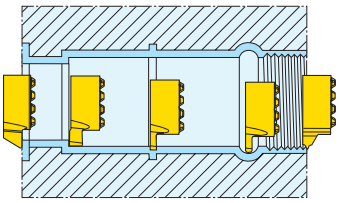
General information

Seco Mini-Shaft™ consists of holders and inserts for internal turning, grooving, precision grooving, profiling, backfacing and threading. To be used in holes as small as ∅8 mm *0.315 inch* (Mini-Shaft™ 08) or 11 mm *0.433 inch* (Mini-Shaft™ 11).

Seco Mini-Shaft™ features a new type of joint, with a double serration, which makes the connection both stable and secure.
It also gives very good repeatability (±0,02 mm *0.0008 inch*).

All toolholders are used for both R and L -handed inserts, and have through coolant possibility.





Toolholders



A	12	G	-	S	G	X	N	08	-	20	-	R
1	2	3		4	5	6	7	8		9		10

1. Toolholder type

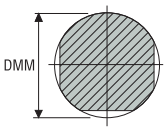
A = Steel with coolant passage

S = Solid steel

E = Solid carbide with brazed* cutting head and coolant passage

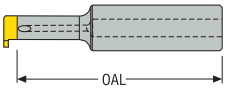
* Brazed or equivalent

2. Shank diameter



12 = 12 mm

3. Tool length

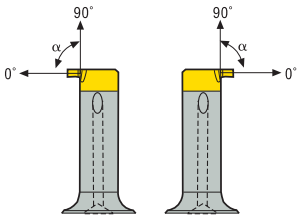


G = 90 mm
H = 100 mm

4. Insert clamping

S = Screw

5. Toolholder setting angle



G = 0°
F = 90°

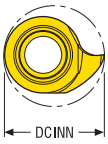
6. Maximum grooving/turning depth

X = Special

7. Version

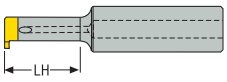
N = Neutral version

8. Insert size



08 = Insert size

9. Extension length

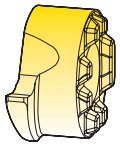


20 = 20 mm

10. Internal designation

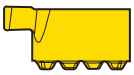
R = Round

Inserts, turning and grooving



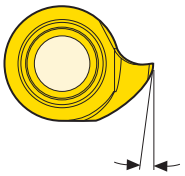
L	C	E	X	08	04	02	-	0150	R	-	FG
1	2	3	4	5	6	7		8	9		10

1. Shape



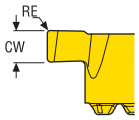
L = Insert shape

2. Front clearance angle



C = 7°

3. Tolerances



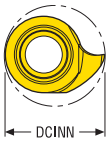
Tolerance class
E

Tolerance ± mm
CW 0,025
RE 0,025

4. Insert type

X = Special

5. Insert size

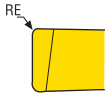


6. Thickness

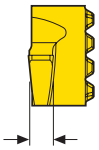


04 = 3,95 mm
05 = 4,85 mm

7. Corner radius



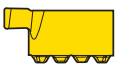
8. Cutting edge width



0075 = 0,75 mm
0080 = 0,80 mm
0090 = 0,90 mm
etc.

9. Version

R



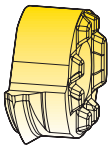
L



10. Insert type code

FG = For lockring
R = Full radius
etc.

Inserts, threading



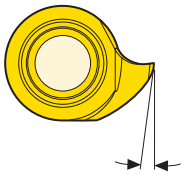
L	C	E	X	11	05	-	1.5	ISO	R
1	2	3	4	5	6		7	8	9

1. Shape



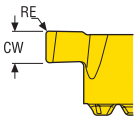
L = Insert shape

2. Front clearance angle



C = 7°

3. Tolerances

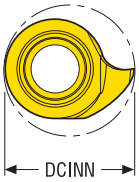


Tolerance class	Tolerance ± mm CW	RE
E	0,025	0,025

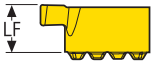
4. Insert type

X = Special

5. Insert size



6. Thickness



04 = 3,95 mm
05 = 4,85 mm

7. Pitch

Full profile (mm)	1.0	1.5	2.0	2.5	3.0
Part profile (mm)	A = 0,50 - 0,75 AG = 0,75 - 1,25 G = 1,25 - 1,75				
Full profile (TPI)	14	19			

etc.

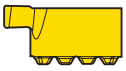
8. Thread profile

Thread =	
60	= V profile 60°
ISO	= ISO, metric
W	= Whitworth, BSW
TR	= Trapezoidal, DIN 103

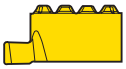
etc.

9. Version

R



L



Technical information

Tool blocks, adapters

Holders should be mounted in standard turrets. Sometimes there is a need for additional set-up devices, such as tool blocks and adapters.

Shown opposite is the Seco solution for bars to be mounted into a turret for standard square shanks 131-.. to be used together with fully cylindrical shanks (-R) and shanks with flats.

Adapters SL16.. to be used with shanks with flats.

Please see page(s) 1012.





Collet chucks

Fully cylindrical shanks (-R) can also be mounted in collet chucks.

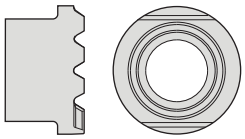
– Use collets or reduction sleeves for hydraulic chucks

– Round shanks combined with collets can prevent vibrations

– Shanks with flats may not be used in collets – as there is a risk of damaging the collet

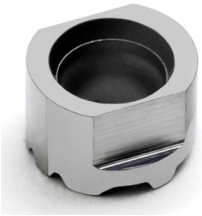


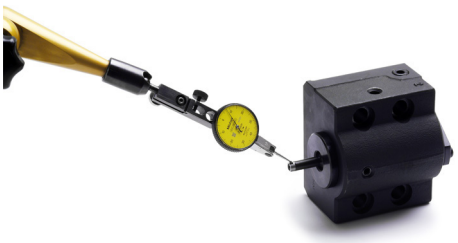
Accessories

Setting gauge	Part No.		
	LCEX	0804-N 1105-N	

Set-up device for cylindrical shanks

To obtain an accurate centering of the cutting edge use a set-up device.



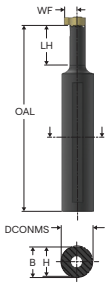


SMG		CW = 0,75-3,00 *CW = 0.028-0.118*	
		f	v_c
P1	CP500	0,022 *0.00085*	150 *490*
P2	CP500	0,022 *0.00085*	150 *490*
P3	CP500	0,020 *0.00080*	130 *425*
P4	CP500	0,020 *0.00080*	115 *375*
P5	CP500	0,020 *0.00080*	110 *360*
P6	CP500	0,020 *0.00080*	120 *395*
P7	CP500	0,020 *0.00080*	115 *375*
P8	CP500	0,020 *0.00080*	110 *360*
P11	CP500	0,020 *0.00080*	110 *360*
P12	CP500	0,014 *0.00055*	70 *230*
M1	CP500	0,022 *0.00085*	90 *295*
M2	CP500	0,020 *0.00080*	65 *215*
M3	CP500	0,016 *0.00065*	41 *135*
M4	CP500	0,014 *0.00055*	27 *90*
M5	CP500	0,014 *0.00055*	22 *70*
K1	CP500	0,022 *0.00085*	160 *520*
K2	CP500	0,020 *0.00080*	130 *425*
K3	CP500	0,020 *0.00080*	110 *360*
K4	CP500	0,020 *0.00080*	105 *345*
K5	CP500	0,018 *0.00070*	65 *215*
K6	CP500	0,020 *0.00080*	105 *345*
K7	CP500	0,018 *0.00070*	85 *280*
N11	CP500	0,028 *0.0011*	95 *310*
S1	CP500	0,014 *0.00055*	18 *60*
S2	CP500	0,014 *0.00055*	15 *49*
S3	CP500	0,013 *0.00050*	13 *43*

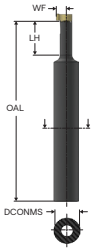
SGXN – Toolholders for inserts LCEX – Metric

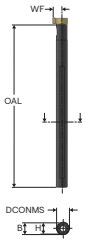


A..-SGXN

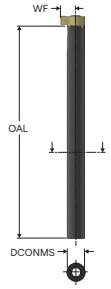


E..-SGXN

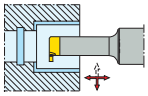




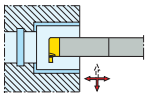
E..-SGXN-R



A..-SGXN
KAPR = 90,0 °



E..-SGXN
KAPR = 90,0 °



—For inserts program, see page(s) 872–883
—For holder code key, see page(s) 865
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	OAL	WF	LH	DCINN	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	
A12G-SGXN08-20	02411140	12	11,0	11,50	86,5	4,8	16,5	8,0	0,1	LCEX0804..
A12G-SGXN08-20-R	02511871	12	–	–	86,5	4,8	16,5	8,0	0,1	LCEX0804..
A16H-SGXN11-25	02411142	16	15,0	15,50	96,0	6,7	21,0	11,0	0,2	LCEX1105..
A16H-SGXN11-25-R	02511872	16	–	–	96,0	6,7	21,0	11,0	0,2	LCEX1105..
E06G-SGXN08	02411141	6	5,5	5,75	86,5	4,8	–	8,0	0,1	LCEX0804..
E06G-SGXN08-R	02513692	6	–	–	86,5	4,8	–	8,0	0,1	LCEX0804..
E08H-SGXN11	02411143	8	7,3	7,65	96,0	6,7	–	11,0	0,1	LCEX1105..
E08H-SGXN11-R	02513696	8	–	–	96,0	6,7	–	11,0	0,1	LCEX1105..

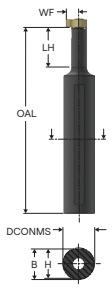
Spare Parts, included in delivery

For	Insert key	Insert screw
		
A12G-..	T08P-2	C02506-T08P
A16H-..	T10P-2	C03509-T10P
E06G-..	T08P-2	C02506-T08P
E08H-..	T10P-2	C03509-T10P

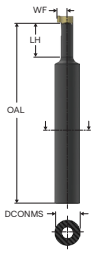
SGXN – Toolholders for inserts LCEX – Inch



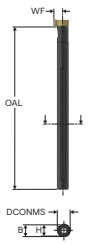
A..-SGXN



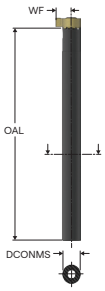
A..-SGXN-R



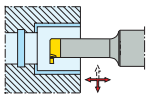
E..-SGXN



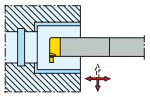
E..-SGXN-R



..-SGXN
KAPR = 90,0 °



..-SGXN
KAPR = 90,0 °



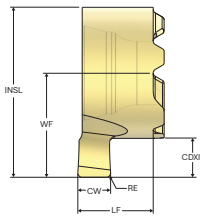
—For inserts program, see page(s) 872–883
—For holder code key, see page(s) 865
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	OAL	WF	LH	DCINN	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	
A10G-SGXN08-078	02450441	0.625	0.586	0.605	3.406	0.188	0.650	0.315	0.440	LCEX0804..
A10G-SGXN08-078-R	02511873	0.625	–	–	3.406	0.188	0.650	0.315	0.220	LCEX0804..
A10H-SGXN11-098	02450443	0.625	0.586	0.605	3.780	0.264	0.827	0.433	0.440	LCEX1105..
A10H-SGXN11-098-R	02511874	0.625	–	–	3.780	0.264	0.827	0.433	0.440	LCEX1105..
E04G-SGXN08	02450442	0.250	0.217	0.233	3.406	0.189	–	0.315	0.220	LCEX0804..
E04G-SGXN08-R	02513700	0.250	–	–	3.406	0.189	–	0.315	0.220	LCEX0804..
E05H-SGXN11	02450445	0.312	0.287	0.300	3.780	0.264	–	0.433	0.220	LCEX1105..
E05H-SGXN11-R	02513704	0.312	–	–	3.780	0.264	–	0.433	0.220	LCEX1105..

Spare Parts, included in delivery

For	Insert key	Insert screw
		
A10G-../E04G-..	T08P-2	C02506-T08P
A10H-../E05H-..	T10P-2	C03509-T10P

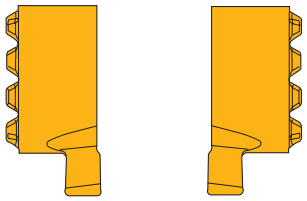
Turning



Tolerances:
CW = ±0,02/*0.0008*
WF = ±0,01/*0.0004*
LF = ±0,02/*0.0008*
RE = ±0,02/*0.0008*

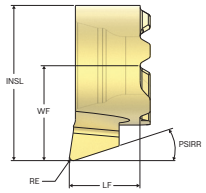
For ISO attribute explanation, see page 82

..L ..R



Designation	RE	CW	WF	INSL	CDXI	LF	Grades
							Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500
LCEX080401-0200L	0,1 *0.004*	2,0 *0.079*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080401-0200R	0,1 *0.004*	2,0 *0.079*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080402-0150L	0,2 *0.008*	1,5 *0.059*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080402-0150R	0,2 *0.008*	1,5 *0.059*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX110501-0200L	0,1 *0.004*	2,0 *0.079*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110501-0200R	0,1 *0.004*	2,0 *0.079*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110502-0150L	0,2 *0.008*	1,5 *0.059*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110502-0150R	0,2 *0.008*	1,5 *0.059*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■

Profiling



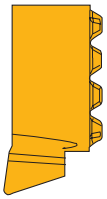
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,02/*0.0008*
RE = ±0,02/*0.0008*

For ISO attribute explanation, see page 82

..L-R

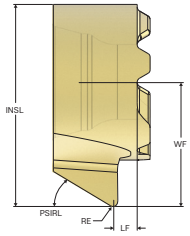


..R-L



							Grades
Designation	**RE**	**WF**	**INSL**	**LF**	**PSIRR°**	**PSIRL°**	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP500
LCEX080402-0250L-R18	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	3,55 *0.140*	0,0	18,0	■
LCEX080402-0250L-R47	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	3,45 *0.136*	0,0	47,0	■
LCEX080402-0250R-L18	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	3,55 *0.140*	18,0	0,0	■
LCEX080402-0250R-L47	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	3,45 *0.136*	47,0	0,0	■
LCEX110502-0250L-R47	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	4,15 *0.163*	0,0	47,0	■
LCEX110502-0250R-L47	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	4,15 *0.163*	47,0	0,0	■
LCEX110502-0270L-R18	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	4,25 *0.167*	0,0	18,0	■
LCEX110502-0270R-L18	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	4,25 *0.167*	18,0	0,0	■

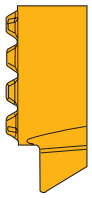
Back facing



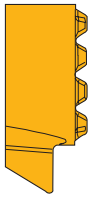
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,02/*0.0008*
RE = ±0,02/*0.0008*

For ISO attribute explanation, see page 82

..L-L

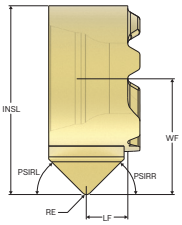


..R-R



Designation	RE	WF	INSL	LF	PSIRR°	PSIRL°	Grades Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP500
LCEX080402-0250L-L30	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	0,75 *0.030*	30,0	0,0	■
LCEX080402-0250R-R30	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	0,75 *0.030*	0,0	30,0	■
LCEX110502-0270L-L30	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	1,25 *0.049*	30,0	0,0	■
LCEX110502-0270R-R30	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	1,25 *0.049*	0,0	30,0	■

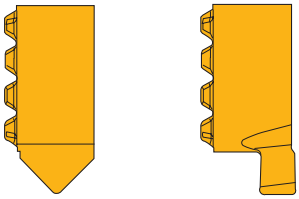
Chamfering



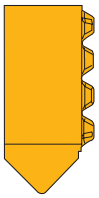
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*
RE = ±0,02/*0.0008*

For ISO attribute explanation, see page 82

..L

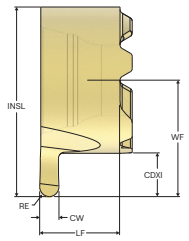


..R



Designation	RE	WF	INSL	LF	PSIRR°	PSIRL°	Grades Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP500
LCEX080402-0310L-N45	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	45,0	45,0	■
LCEX080402-0310R-N45	0,2 *0.008*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	45,0	45,0	■
LCEX110502-0350L-N45	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	2,2 *0.087*	45,0	45,0	■
LCEX110502-0350R-N45	0,2 *0.008*	6,7 *0.264*	10,7 *0.421*	2,2 *0.087*	45,0	45,0	■

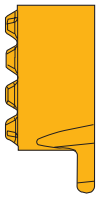
Full radius grooves



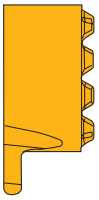
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,02/*0.0008*
RE = ±0,02/*0.0008*

For ISO attribute explanation, see page 82

..L-R

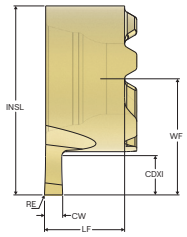


..R-R



							Grades
Designation	**RE**	**CW**	**WF**	**INSL**	**CDXI**	**LF**	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500
LCEX080404-0080L-R	0,4 *0.016*	0,8 *0.031*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080404-0080R-R	0,4 *0.016*	0,8 *0.031*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080406-0120L-R	0,6 *0.024*	1,2 *0.047*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080406-0120R-R	0,6 *0.024*	1,2 *0.047*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080409-0180L-R	0,9 *0.035*	1,8 *0.071*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX080409-0180R-R	0,9 *0.035*	1,8 *0.071*	4,78 *0.188*	7,78 *0.306*	1,7 *0.067*	3,3 *0.130*	■
LCEX110504-0080L-R	0,4 *0.016*	0,8 *0.031*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110504-0080R-R	0,4 *0.016*	0,8 *0.031*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110506-0120L-R	0,6 *0.024*	1,2 *0.047*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110506-0120R-R	0,6 *0.024*	1,2 *0.047*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110509-0180L-R	0,9 *0.035*	1,8 *0.071*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110509-0180R-R	0,9 *0.035*	1,8 *0.071*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110510-0200L-R	1,0 *0.039*	2,0 *0.079*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110510-0200R-R	1,0 *0.039*	2,0 *0.079*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110515-0300L-R	1,5 *0.059*	3,0 *0.118*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■
LCEX110515-0300R-R	1,5 *0.059*	3,0 *0.118*	6,7 *0.264*	10,7 *0.421*	2,6 *0.102*	4,0 *0.157*	■

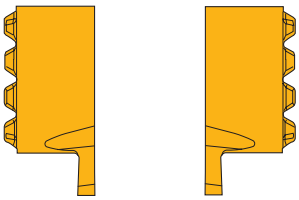
Circlip grooves



Tolerances:
CW = ±0,02/*0.0008*
WF = ±0,01/*0.0004*
LF = ±0,02/*0.0008*
RE = ±0,02/*0.0008*

For ISO attribute explanation, see page 82

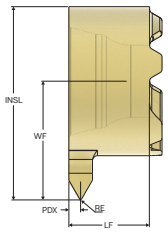
..L ..R



Designation	RE	CW	WF	INSL	CDXI	LF	For lock-ring	Grades
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	Coated CP500
LCEX080400-0075L-FG	–	0,75 *0.030*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,70 *0.028*	■
LCEX080400-0075R-FG	–	0,75 *0.030*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,70 *0.028*	■
LCEX080400-0085L-FG	–	0,85 *0.033*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,80 *0.031*	■
LCEX080400-0085R-FG	–	0,85 *0.033*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,80 *0.031*	■
LCEX080400-0095L-FG	–	0,95 *0.037*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,90 *0.035*	■
LCEX080400-0095R-FG	–	0,95 *0.037*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	0,90 *0.035*	■
LCEX080400-0115L-FG	–	1,15 *0.045*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,00 *0.039*	■
LCEX080400-0115R-FG	–	1,15 *0.045*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,00 *0.039*	■
LCEX080400-0135L-FG	–	1,35 *0.053*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,20 *0.047*	■
LCEX080400-0135R-FG	–	1,35 *0.053*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,20 *0.047*	■
LCEX080401-0165L-FG	0,1 *0.004*	1,65 *0.065*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,50 *0.059*	■
LCEX080401-0165R-FG	0,1 *0.004*	1,65 *0.065*	4,78 *0.188*	7,78 *0.306*	1,70 *0.067*	3,30 *0.130*	1,50 *0.059*	■
LCEX110500-0075L-FG	–	0,75 *0.030*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,70 *0.028*	■
LCEX110500-0075R-FG	–	0,75 *0.030*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,70 *0.028*	■
LCEX110500-0085L-FG	–	0,85 *0.033*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,80 *0.031*	■
LCEX110500-0085R-FG	–	0,85 *0.033*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,80 *0.031*	■
LCEX110500-0095L-FG	–	0,95 *0.037*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,90 *0.035*	■
LCEX110500-0095R-FG	–	0,95 *0.037*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	0,90 *0.035*	■
LCEX110500-0115L-FG	–	1,15 *0.045*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,00 *0.039*	■
LCEX110500-0115R-FG	–	1,15 *0.045*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,00 *0.039*	■
LCEX110500-0135L-FG	–	1,35 *0.053*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,20 *0.047*	■
LCEX110500-0135R-FG	–	1,35 *0.053*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,20 *0.047*	■

Designation	RE	CW	WF	INSL	CDXI	LF	For lock-ring	Grades
								Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500
LCEX110501-0165L-FG	0,1 *0.004*	1,65 *0.065*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,50 *0.059*	■
LCEX110501-0165R-FG	0,1 *0.004*	1,65 *0.065*	6,7 *0.264*	10,7 *0.421*	2,60 *0.102*	4,00 *0.157*	1,50 *0.059*	■

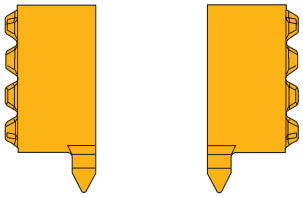
Threading – Partial profile 60°



Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

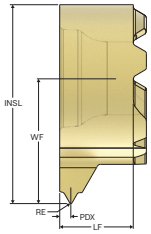
For ISO attribute explanation, see page 82

..L ..R



Designation	RE	WF	INSL	LF	PDX	Pitch	Pitch	Grades
								Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX0804-A60L	0,03 *0.001*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,48 *0.019*	0,5-0,75	36-48	■
LCEX0804-A60R	0,03 *0.001*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,48 *0.019*	0,5-0,75	36-48	■
LCEX0804-AG60L	0,07 *0.003*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,73 *0.029*	0,75-1,25	20-36	■
LCEX0804-AG60R	0,07 *0.003*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,73 *0.029*	0,75-1,25	20-36	■
LCEX0804-G60L	0,12 *0.005*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,98 *0.039*	1,25-1,75	16-20	■
LCEX0804-G60R	0,12 *0.005*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,98 *0.039*	1,25-1,75	16-20	■
LCEX1105-A60L	0,03 *0.001*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,48 *0.019*	0,5-0,75	36-48	■
LCEX1105-A60R	0,03 *0.001*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,48 *0.019*	0,5-0,75	36-48	■
LCEX1105-AG60L	0,07 *0.003*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,73 *0.029*	0,75-1,25	20-36	■
LCEX1105-AG60R	0,07 *0.003*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,73 *0.029*	0,75-1,25	20-36	■
LCEX1105-G60L	0,12 *0.005*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,98 *0.039*	1,25-1,75	16-20	■
LCEX1105-G60R	0,12 *0.005*	6,7 *0.264*	10,7 *0.421*	4,00 *0.157*	0,98 *0.039*	1,25-1,75	20-16	■

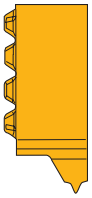
Threading – ISO Metric



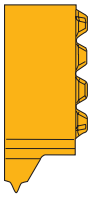
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

For ISO attribute explanation, see page 82

..L

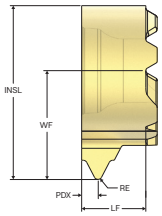


..R



								Grades
Designation	**RE**	**WF**	**INSL**	**LF**	**PDX**	**Pitch**	**Pitch**	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX1105-1.0ISOL	0,07 *0.003*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,60 *0.024*	1,0	–	■
LCEX1105-1.0ISOR	0,07 *0.003*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,60 *0.024*	1,0	–	■
LCEX1105-1.5ISOL	0,12 *0.005*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,80 *0.031*	1,5	–	■
LCEX1105-1.5ISOR	0,12 *0.005*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,85 *0.033*	1,5	–	■
LCEX1105-2.0ISOL	0,17 *0.007*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,10 *0.043*	2,0	–	■
LCEX1105-2.0ISOR	0,17 *0.007*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,10 *0.043*	2,0	–	■
LCEX1105-2.5ISOL	0,18 *0.007*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,35 *0.053*	2,5	–	■
LCEX1105-2.5ISOR	0,18 *0.007*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,35 *0.053*	2,5	–	■
LCEX1105-3.0ISOL	0,21 *0.008*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,60 *0.063*	3,0	–	■
LCEX1105-3.0ISOR	0,21 *0.008*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,60 *0.063*	3,0	–	■

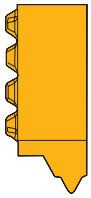
Threading – Whitworth, BSW



Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

For ISO attribute explanation, see page 82

..L

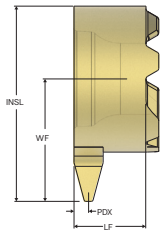


..R



Designation	RE	WF	INSL	LF	PDX	Pitch	Pitch	Grades Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX1105-14WL	0,24 *0.009*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,00 *0.039*	–	14,0	■
LCEX1105-14WR	0,24 *0.009*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,00 *0.039*	–	14,0	■
LCEX1105-19WL	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,77 *0.030*	–	19,0	■
LCEX1105-19WR	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,77 *0.030*	–	19,0	■

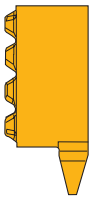
Threading – TR-DIN103



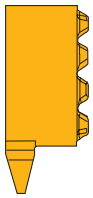
Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

For ISO attribute explanation, see page 82

..RL



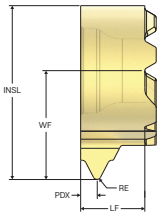
..RR



Designation	RE	WF	INSL	LF	PDX	Pitch	Pitch	Grades Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX1105-1.5TRL	0,1 *0.004*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,80 *0.031*	1,5	–	■
LCEX1105-1.5TRR	0,1 *0.004*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	0,80 *0.031*	1,5	–	■
LCEX1105-2.0TRL	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,10 *0.043*	2,0	–	■
LCEX1105-2.0TRR	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,10 *0.043*	2,0	–	■

Designation	RE	WF	INSL	LF	PDX	Pitch	Pitch	Grades
								Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX1105-3.0TRL	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,60 *0.063*	3,0	–	■
LCEX1105-3.0TRR	0,15 *0.006*	6,7 *0.264*	10,70 *0.421*	4,00 *0.157*	1,60 *0.063*	3,0	–	■

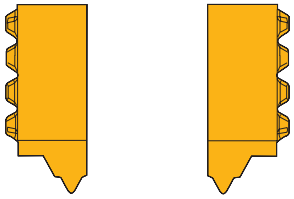
Threading – UN



Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

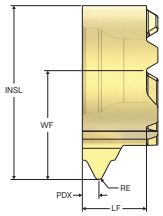
For ISO attribute explanation, see page 82

..L ..R



Designation	RE	WF	INSL	LF	PDX	Pitch	Pitch	Grades
								Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX0804-16UNR	0,13 *0.005*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,90 *0.035*	–	16,0	■
LCEX0804-20UNL	0,09 *0.004*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,70 *0.028*	–	20,0	■
LCEX0804-20UNR	0,09 *0.004*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,70 *0.028*	–	20,0	■
LCEX0804-24UNL	0,07 *0.003*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,60 *0.024*	–	24,0	■
LCEX0804-24UNR	0,07 *0.003*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,60 *0.024*	–	24,0	■
LCEX0804-32UNL	0,04 *0.002*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,50 *0.020*	–	32,0	■
LCEX0804-32UNR	0,04 *0.002*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,50 *0.020*	–	32,0	■

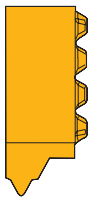
Threading – NPT



Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

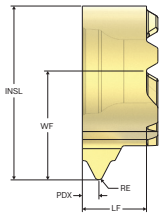
For ISO attribute explanation, see page 82

..R



								Grades
Designation	**RE**	**WF**	**INSL**	**LF**	**PDX**	**Pitch**	**Pitch**	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX0804-27NPTR	0,03 *0.001*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,57 *0.022*	–	27,0	■

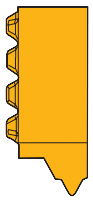
Threading – NPTF



Tolerances:
WF = ±0,01/*0.0004*
LF = ±0,05/*0.002*

For ISO attribute explanation, see page 82

..L



								Grades
Designation	**RE**	**WF**	**INSL**	**LF**	**PDX**	**Pitch**	**Pitch**	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	TPI	CP500
LCEX0804-27NPTFL	0,04 *0.002*	4,78 *0.188*	7,78 *0.306*	3,30 *0.130*	0,57 *0.022*	–	27,0	■



Grooving

The Seco K-Style system is intended for radial and axial as well as external and internal precision grooving. The range of grooving inserts includes inserts for most groove profiles, such as circlip profiles, O-ring profiles, thread undercut and radius grooves.

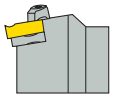
- All toolholders are used for both R and L-handed inserts
- Radial external, radial internal and axial grooving.
- Toolholders have replaceable shims designed to protect the insert seat.

Toolholders



C	E	R	25	25	M	14	Q	HD
1	2	3	4	5	6	7	8	9

1. Insert clamping



C
Clamp

2. External/Internal

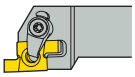
E = External

N = Internal

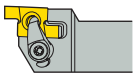
EA = External axial

3. Version

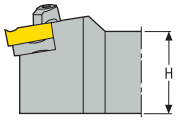
R



L

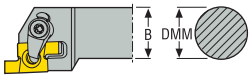


4. Shank height



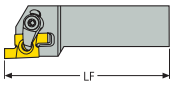
12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

5. Shank width/diameter



12 = 12 mm
16 = 16 mm
20 = 20 mm
etc.

6. Tool length



H = 100 mm
K = 125 mm
M = 150 mm
P = 170 mm
R = 200 mm

H = 100 mm
K = 125 mm
M = 150 mm
P = 170 mm
R = 200 mm

7. Cutting edge length



If the cutting edge length consists of only one digit, the designation should start with a 0.

8. Other information

A = Steel with coolant passage

D = Holder for deep grooving

Q = Toolholder/cranked

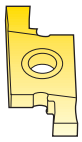
9. Internal designation

HD = Heavy Duty

Example:
Cutting edge length (LIG) = 9,525 mm
Symbol = 09

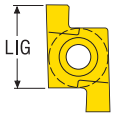
Inserts





14	E	R	3.4	FG
1	2	3	4	5

1. Cutting edge length



If the cutting edge length consists of only one digit, the designation should start with a 0.

Example:
Cutting edge length (LIG) = 9,525 mm
Symbol = 09

2. External/Internal

E = External

N = Internal

EA = External axial

3. Version

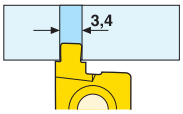
R



L



4. Groove width



Example:
3.4 = 3,4 mm

5. Standard grooves

FG = For radial grooves (CW x 1)

FD = For radial deep grooves (CW x 2)

D76 = For thread undercuts

R = For radius

ST = For static O-rings

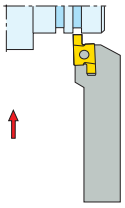
DY = For dynamic O-rings

AX = For axial O-rings

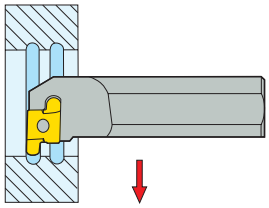
FA = For axial grooves (CW x 1)

Grooving – Precision grooves, depth/width ratio 1:1 (2:1)

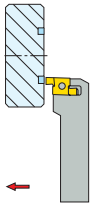
Radial external



Radial internal



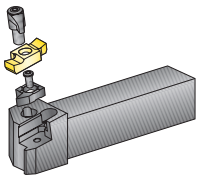
Axial



Toolholders

The toolholder system is based on the Snap Tap threading system. The toolholders have replaceable shims designed to protect the insert seat.

The system is intended for radial external and internal grooving and for axial grooving. The system enables axial grooves from 16 mm outside diameter and internal radial grooves down to 13 mm diameter to be turned.

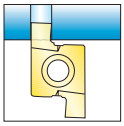


Inserts

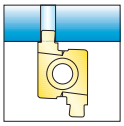
The range of grooving inserts includes inserts for most groove profi les, such as circlip profi les, O-ring profi les, thread undercut and radius grooves. The range of grooving inserts can be used for grooves with a depth/width ratio of up to 1:1.

Inserts with designation FD can be used for grooves with a depth/width ratio of up to 2:1.

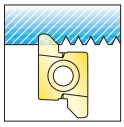
Lockring



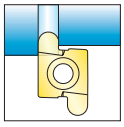
O-ring



Thread undercut

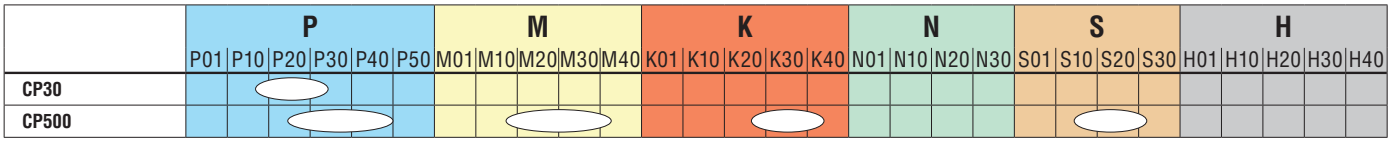


Radius



Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30



CP30
Wear resistant CVD-coated grade intended for grooving in a variety of workpiece materials. Provides good wear resistance and cutting speed capability in steel and cast iron.

CP500
Tough versatile PVD-coated micrograin grade intended for grooving in a variety of workpiece materials. Universal choice.

Ordering specification for custom made K-inserts

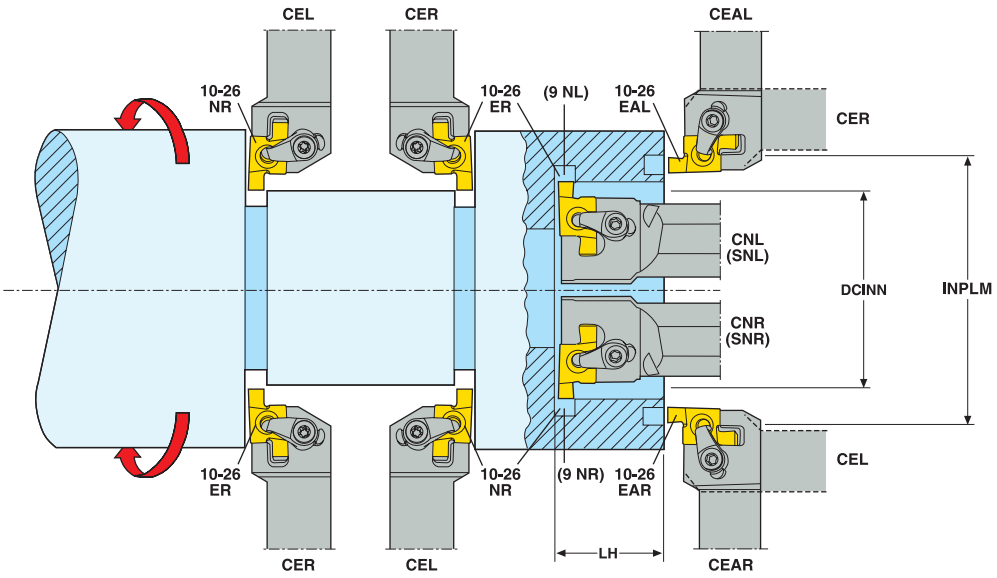
Ordering specification for custom made K-inserts

Internal grooving:

When considering operation NR and NL illustrated below (holder CNR and CNL), always state the diameter of the hole as well as the axial position of the groove = LH. In the case of small hole diameters, however, use holder SNR and SNL with insert 9NR and 9NL respectively.

Axial grooving:

With operation type EAR and EAL (holder CEAR and CEAL) the outer dimension of the groove (INPLM) must be stated.



Set-up machining recommendations

Set-up

– The mounting should be stable.
– The tool should be securely clamped and the overhang should be as small as possible.
– The centre height should never deviate by more than ±0,1 mm from the workpiece centre.

Internal grooving

– Decisive factors for ensuring vibration-free machining are the relationship between the toolholder overhang and its diameter, and the width of the grooving insert.
– In unfavourable circumstances, the cutting speed and feed rate should be reduced below the recommended values

Grooving of radius grooves and grooves with trapezoidal cross-section

In this type of grooving, different forms of chip problems often occur. The feed rate should therefore be reduced to obtain thin chips and avoid chip build-up and insert fracture.

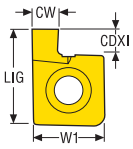
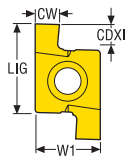
Formulae for cutting data calculation are found in page(s) 101.

Special inserts for precision grooves

– Ground to specification using the insert blanks shown.
– Blanks available for grade CP30 and CP500.
– Please contact your local representative for price and delivery.

Tolerances for different groove profiles:

CDXI	CW	RE
±0,025	±0,025	±0,03

Inserts	Dimensions				Shim	Inserts
	LIG	W1	CW	CDXI	Standard KX	
	9,0	6,350	2,7	2,70	–	9NR/NL
	9,0	6,350	2,7	2,70	KX10	10ER/NR 10EAR/EAL
	12,0	6,350	2,7	5,65	KX12	12ER/NR 12EAR/EAL
	14,0	9,525	4,2	4,40	KX14	14ER/NR 14EAR/EAL
	20,0	12,700	6,3	7,30	KX20	20ER/NR 20EAR/EAL
	26,0	15,875	10,0	10,10	KX26	26ER/NR 26EAR/EAL

Cutting speed, v_c (m/min)

In this section a recommended cutting speed is indicated under specified conditions.
Use the tables beginning on page(s) 1034 to classify the workpiece material into a SMG
The cutting data tables provide a start value for feed rate (f) and cutting speed (v_c) for the selected cutting width (CW).
The cutting data tables are based on grooving with full cutting width.
The recommended cutting speeds in the tables are calculated for 15 minutes tool life with use of external flood coolant.
In order to increase the accuracy towards the actual cutting conditions and requirements of the applications the recommendation is to use My Pages – Suggest on www.secotools.com

v_c = cutting speed (m/min)

CW = cutting width (mm)

f = feed rate (mm/rev)

Grade CP30

SMG		CW = 0,5-2,0 *CW = 0.020-0.079*		CW = 2,0-4,0 *CW =0.079-0.157*		CW = 4,0-6,0 *CW = 0.157-0.236*		CW = 6,0-8,0 *CW = 0.236-0.315*		CW = 8,0-10,0 *CW = 0.315-0.394*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	CP30	0,095 *0.0038*	195 *640*	0,15 *0.0060*	165 *540*	0,17 *0.0065*	160 *520*	0,20 *0.0080*	150 *490*	0,22 *0.0085*	140 *460*
P2	CP30	0,10 *0.0040*	190 *620*	0,16 *0.0065*	160 *520*	0,17 *0.0065*	155 *510*	0,20 *0.0080*	145 *475*	0,22 *0.0085*	140 *460*
P3	CP30	0,095 *0.0038*	165 *540*	0,15 *0.0060*	140 *460*	0,17 *0.0065*	135 *445*	0,19 *0.0075*	125 *410*	0,20 *0.0080*	125 *410*
P4	CP30	0,090 *0.0036*	145 *475*	0,14 *0.0055*	125 *410*	0,16 *0.0065*	120 *395*	0,19 *0.0075*	110 *360*	0,20 *0.0080*	110 *360*
P5	CP30	0,090 *0.0036*	140 *460*	0,14 *0.0055*	120 *395*	0,16 *0.0065*	115 *375*	0,18 *0.0070*	110 *360*	0,20 *0.0080*	105 *345*
P6	CP30	0,090 *0.0036*	160 *520*	0,14 *0.0055*	135 *445*	0,16 *0.0065*	130 *425*	0,18 *0.0070*	120 *395*	0,20 *0.0080*	115 *375*
P7	CP30	0,090 *0.0036*	150 *490*	0,14 *0.0055*	125 *410*	0,16 *0.0065*	120 *395*	0,18 *0.0070*	115 *375*	0,20 *0.0080*	110 *360*
P8	CP30	0,095 *0.0038*	140 *460*	0,15 *0.0060*	115 *375*	0,17 *0.0065*	110 *360*	0,19 *0.0075*	105 *345*	0,20 *0.0080*	105 *345*
P11	CP30	0,090 *0.0036*	145 *475*	0,14 *0.0055*	125 *410*	0,16 *0.0065*	115 *375*	0,18 *0.0070*	110 *360*	0,20 *0.0080*	105 *345*
P12	CP30	0,060 *0.0024*	95 *310*	0,095 *0.0038*	85 *280*	0,11 *0.0044*	80 *260*	0,12 *0.0048*	75 *245*	0,14 *0.0055*	70 *230*
M1	CP30	0,10 *0.0040*	220 *720*	0,16 *0.0065*	165 *540*	0,17 *0.0065*	155 *510*	0,20 *0.0080*	135 *445*	0,22 *0.0085*	120 *395*
M2	CP30	0,090 *0.0036*	185 *610*	0,14 *0.0055*	145 *475*	0,16 *0.0065*	130 *425*	0,18 *0.0070*	120 *395*	0,20 *0.0080*	105 *345*
M3	CP30	0,070 *0.0028*	150 *490*	0,11 *0.0044*	130 *425*	0,13 *0.0050*	115 *375*	0,15 *0.0060*	105 *345*	0,16 *0.0065*	100 *330*
M4	CP30	0,065 *0.0026*	115 *375*	0,10 *0.0040*	100 *330*	0,11 *0.0044*	95 *310*	0,13 *0.0050*	85 *280*	0,14 *0.0055*	80 *260*
M5	CP30	0,065 *0.0026*	95 *310*	0,10 *0.0040*	85 *280*	0,11 *0.0044*	80 *260*	0,13 *0.0050*	70 *230*	0,14 *0.0055*	70 *230*

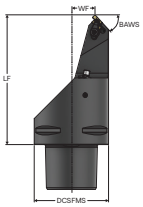
Grade CP500

SMG		CW = 0,5-2,0 *CW = 0.020-0.079*		CW = 2,0-4,0 *CW =0.079-0.157*		CW = 4,0-6,0 *CW = 0.157-0.236*		CW = 6,0-8,0 *CW = 0.236-0.315*		CW = 8,0-10,0 *CW = 0.315-0.394*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	CP500	0,095 *0.0038*	150 *490*	0,15 *0.0060*	125 *410*	0,17 *0.0065*	120 *395*	0,20 *0.0080*	115 *375*	0,22 *0.0085*	110 *360*
P2	CP500	0,10 *0.0040*	145 *475*	0,16 *0.0065*	120 *395*	0,17 *0.0065*	120 *395*	0,20 *0.0080*	110 *360*	0,22 *0.0085*	105 *345*
P3	CP500	0,095 *0.0038*	125 *410*	0,15 *0.0060*	105 *345*	0,17 *0.0065*	100 *330*	0,19 *0.0075*	95 *310*	0,20 *0.0080*	95 *310*
P4	CP500	0,090 *0.0036*	115 *375*	0,14 *0.0055*	95 *310*	0,16 *0.0065*	90 *295*	0,19 *0.0075*	85 *280*	0,20 *0.0080*	85 *280*
P5	CP500	0,090 *0.0036*	105 *345*	0,14 *0.0055*	90 *295*	0,16 *0.0065*	85 *280*	0,18 *0.0070*	85 *280*	0,20 *0.0080*	80 *260*
P6	CP500	0,090 *0.0036*	120 *395*	0,14 *0.0055*	105 *345*	0,16 *0.0065*	100 *330*	0,18 *0.0070*	95 *310*	0,20 *0.0080*	90 *295*
P7	CP500	0,090 *0.0036*	115 *375*	0,14 *0.0055*	95 *310*	0,16 *0.0065*	90 *295*	0,18 *0.0070*	90 *295*	0,20 *0.0080*	85 *280*
P8	CP500	0,095 *0.0038*	105 *345*	0,15 *0.0060*	90 *295*	0,17 *0.0065*	85 *280*	0,19 *0.0075*	80 *260*	0,20 *0.0080*	80 *260*
P11	CP500	0,090 *0.0036*	110 *360*	0,14 *0.0055*	95 *310*	0,16 *0.0065*	90 *295*	0,18 *0.0070*	85 *280*	0,20 *0.0080*	80 *260*
P12	CP500	0,060 *0.0024*	75 *245*	0,095 *0.0038*	65 *215*	0,11 *0.0044*	60 *195*	0,12 *0.0048*	60 *195*	0,14 *0.0055*	55 *180*
M1	CP500	0,10 *0.0040*	170 *560*	0,16 *0.0065*	125 *410*	0,17 *0.0065*	120 *395*	0,20 *0.0080*	100 *330*	0,22 *0.0085*	95 *310*
M2	CP500	0,090 *0.0036*	140 *460*	0,14 *0.0055*	110 *360*	0,16 *0.0065*	100 *330*	0,18 *0.0070*	90 *295*	0,20 *0.0080*	80 *260*
M3	CP500	0,070 *0.0028*	115 *375*	0,11 *0.0044*	100 *330*	0,13 *0.0050*	90 *295*	0,15 *0.0060*	80 *260*	0,16 *0.0065*	75 *245*
M4	CP500	0,065 *0.0026*	85 *280*	0,10 *0.0040*	75 *245*	0,11 *0.0044*	75 *245*	0,13 *0.0050*	65 *215*	0,14 *0.0055*	65 *215*
M5	CP500	0,065 *0.0026*	70 *230*	0,10 *0.0040*	65 *215*	0,11 *0.0044*	60 *195*	0,13 *0.0050*	55 *180*	0,14 *0.0055*	50 *165*
K1	CP500	0,10 *0.0040*	130 *425*	0,16 *0.0065*	110 *360*	0,17 *0.0065*	105 *345*	0,20 *0.0080*	100 *330*	0,22 *0.0085*	95 *310*
K2	CP500	0,090 *0.0036*	115 *375*	0,14 *0.0055*	95 *310*	0,16 *0.0065*	90 *295*	0,18 *0.0070*	85 *280*	0,20 *0.0080*	80 *260*
K3	CP500	0,090 *0.0036*	100 *330*	0,14 *0.0055*	80 *260*	0,16 *0.0065*	75 *245*	0,18 *0.0070*	70 *230*	0,20 *0.0080*	65 *215*
K4	CP500	0,090 *0.0036*	95 *310*	0,14 *0.0055*	75 *245*	0,16 *0.0065*	70 *230*	0,18 *0.0070*	65 *215*	0,20 *0.0080*	65 *215*
K5	CP500	0,080 *0.0032*	60 *195*	0,13 *0.0050*	47 *155*	0,14 *0.0055*	45 *150*	0,16 *0.0065*	42 *140*	0,18 *0.0070*	40 *130*
K6	CP500	0,090 *0.0036*	85 *280*	0,14 *0.0055*	70 *230*	0,16 *0.0065*	65 *215*	0,18 *0.0070*	65 *215*	0,20 *0.0080*	60 *195*
K7	CP500	0,080 *0.0032*	75 *245*	0,13 *0.0050*	60 *195*	0,14 *0.0055*	60 *195*	0,16 *0.0065*	55 *180*	0,18 *0.0070*	50 *165*
N11	CP500	0,13 *0.0050*	90 *295*	0,20 *0.0080*	75 *245*	0,22 *0.0085*	70 *230*	0,26 *0.010*	65 *215*	0,28 *0.011*	65 *215*
S1	CP500	0,065 *0.0026*	18 *60*	0,10 *0.0040*	16 *50*	0,11 *0.0044*	15 *49*	0,13 *0.0050*	15 *49*	0,14 *0.0055*	14 *46*
S2	CP500	0,065 *0.0026*	16 *50*	0,10 *0.0040*	14 *46*	0,11 *0.0044*	13 *43*	0,13 *0.0050*	13 *43*	0,14 *0.0055*	12 *39*
S3	CP500	0,060 *0.0024*	14 *46*	0,090 *0.0036*	12 *39*	0,10 *0.0040*	12 *39*	0,12 *0.0048*	11 *36*	0,13 *0.0050*	11 *36*

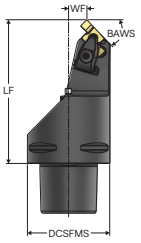
C.-CEL – Toolholders for Shallow Grooves – Metric/ Inch



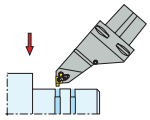
CEL



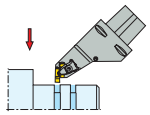
CER/L-..HD



C.-CEL
KAPR = 90,0 °



C.-CEL-HD
KAPR = 90,0 °



—Left-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—Shim KX12-2 for insert 12..
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	CTMS	DCSFMS	WF	LF	Weight	BAWS°	CTWS
			mm *inch*	mm *inch*	mm *inch*	kg *lbs*		
C6-CEL-20110-10	02509305	C6	63,0 *2.480*	20,0 *0.787*	110 *4.331*	1,6 *3.530*	45,0	10/12NR
C6-CEL-18110-14	02509306	C6	63,0 *2.480*	18,0 *0.709*	110 *4.331*	1,7 *3.750*	45,0	14NR
C6-CEL-14110-20HD	02509308	C6	63,0 *2.480*	14,0 *0.551*	110 *4.331*	1,7 *3.750*	45,0	20
C6-CEL-07110-26HD	02509309	C6	63,0 *2.480*	7,0 *0.276*	110 *4.331*	1,7 *3.750*	45,0	26

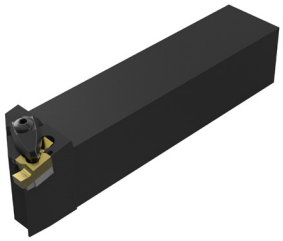
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Coolant nozzle	Insert shim (K)	Shim screw	Spring
								
-10	–	T15P-2	CSP16-T15P	–	CN8	KX10-2	CS2507-T07P	–
-14	–	T15P-2	CSP16-T15P	–	CN8	KX14-2	CS3507-T09P	–
-20	CHD22	T20P-7	–	L86025-T20P	CN8	KX20-2	CS4009-T15P	S7616
-26	CHD27	T20P-7	–	L86025-T20P	CN8	KX26-2	C05012-T15P	S7616

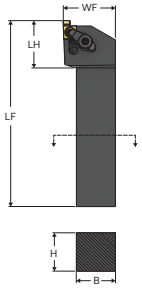
Accessories

For	Insert shim (K) 1	Insert shim (K) 2	Insert shim (K) 3	Insert shim (K) 4	Insert shim (K) 5	Insert shim (K) 6	Insert shim (K) 7	Shim key
								
-10	KX12-2	KX10-99	KX10-0	KX10-1	KX10-3	KX10-4	KX10-5	T07P-2
-14	KX14-0	KX14-1	KX14-3	KX14-4	KX14-5	–	–	T09P-2
-20	KX20-99	KX20-0	KX20-1	KX20-3	KX20-4	KX20-5	–	T15P-2
-26	KX26-99	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	–	T15P-2

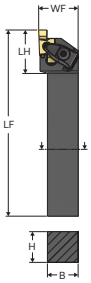
CER/L. – Toolholders for Precision Grooves – Metric



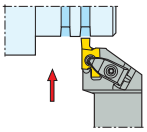
CER/L...D



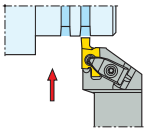
CER/L...QHD



CER/L...D
KAPR = 90,0 °



CER/L...QHD
KAPR



CTWS



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—Shim KX12-2 for insert 12..
—For use with 12 size insert please refer to values in LF2 / LH2 columns
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF 10/14/20/26	LF2 12	WF	LH 10/14/20/26	LH2 12	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	kg	
CER1212M10D	02435850	12	12	150	153,0	16	21,5	24,5	0,2	10/12ER
CER1616H10D	02411427	16	16	100	103,0	16	21,5	24,5	0,3	10/12ER
CER2020K10D	02411428	20	20	125	128,0	25	21,5	24,5	0,4	10/12ER
CER2525M10D	02411430	25	25	150	153,0	32	21,5	24,5	0,8	10/12ER
CER3225P10D	02411432	32	25	170	173,0	32	22,5	25,5	1,1	10/12ER
CEL1212M10D	02435852	12	12	150	153,0	16	21,5	24,5	0,2	10/12NR
CEL1616H10D	02411436	16	16	100	103,0	16	21,5	24,5	0,3	10/12NR
CEL2020K10D	02411437	20	20	125	128,0	25	21,5	24,5	0,4	10/12NR
CEL2525M10D	02411438	25	25	150	153,0	32	21,5	24,5	0,8	10/12NR
CEL3225P10D	02411440	32	25	170	173,0	32	22,5	25,5	1,1	10/12NR
CER2525M14QHD	02538606	25	25	150	–	32	26,0	–	0,8	14ER
CER3225P14QHD	02627519	32	25	170	–	32	26,0	–	1,1	14ER
CER3232P14QHD	02627520	32	32	170	–	32	26,0	–	1,4	14ER
CEL2525M14QHD	02627518	25	25	150	–	32	26,0	–	0,8	14NR
CER2525M20QHD	02528502	25	25	150	–	32	34,0	–	0,8	20ER
CER3225P20QHD	02528504	32	25	170	–	32	34,0	–	1,1	20ER
CER3232P20QHD	02528507	32	32	170	–	40	34,0	–	1,4	20ER
CEL2525M20QHD	02528503	25	25	150	–	32	34,0	–	0,8	20NR
CEL3225P20QHD	02528505	32	25	170	–	32	34,0	–	1,1	20NR
CEL3232P20QHD	02528508	32	32	170	–	40	34,0	–	1,4	20NR
CER2525M26QHD	02528509	25	25	150	–	40	44,0	–	0,9	26ER
CER3225P26QHD	02528512	32	25	170	–	40	44,0	–	1,2	26ER
CER3232P26QHD	02528516	32	32	170	–	40	44,0	–	1,4	26ER
CEL2525M26QHD	02528511	25	25	150	–	40	44,0	–	0,9	26NR
CEL3225P26QHD	02528513	32	25	170	–	40	44,0	–	1,2	26NR
CEL3232P26QHD	02528517	32	32	170	–	40	44,0	–	1,4	26NR

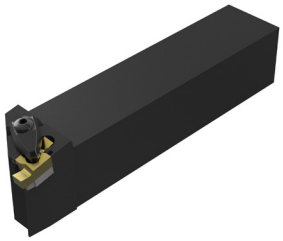
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Insert shim (K)	Shim screw	Spring
							
..10	–	T15P-2	CSP16-T15P	–	KX10-2	CS2507-T07P	–
..14	CHD16	T15P-2	–	L85020-T15P	KX14-2	CS3507-T09P	S6912
..20	CHD22	T20P-7	–	L86025-T20P	KX20-2	CS4009-T15P	S7616
..26	CHD27	T20P-7	–	L86025-T20P	KX26-2	C05012-T15P	S7616

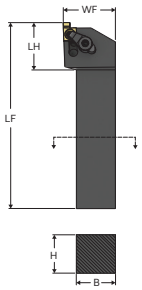
Accessories

For	Insert shim (K)	Insert shim (K) 1	Insert shim (K) 2	Insert shim (K) 3	Insert shim (K) 4	Insert shim (K) 5	Insert shim (K) 6	Shim key
								
..10	KX12-2	–	–	–	–	–	–	T07P-2
..14	–	KX14-0	KX14-1	KX14-3	KX14-4	KX14-5	–	T09P-2
..20	–	KX20-99	KX20-0	KX20-1	KX20-3	KX20-4	KX20-5	T15P-2
..26	–	KX26-99	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	T15P-2

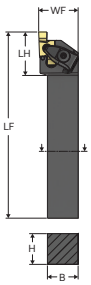
CER/L. – Toolholders for Precision Grooves – Inch



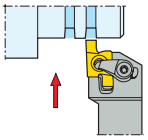
CER/L...D



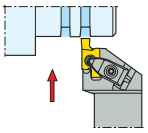
CER/L...QHD



CER/L-Q



CER/L-QHD



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—For use with 12 size insert please refer to values in LF2 / LH2 columns
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF 10/14/20/26	LF2 12	WF	LH 10/14/20/26	LH2 12	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	lbs	
CER0504-10Q	00072566	0.500	0.500	4.000	4.118	0.625	0.900	1.018	0.440	10/12ER
CER0755-10Q	00072564	0.750	0.750	5.000	5.118	1.000	0.900	1.018	0.880	10/12ER
CER1006-10Q	00072600	1.000	1.000	6.000	6.118	1.250	0.900	1.018	1.760	10/12ER
CEL0755-10Q	00072559	0.750	0.750	5.000	5.118	1.000	0.900	1.018	1.100	10/12NR
CEL1006-10Q	00072596	1.000	1.000	6.000	6.118	1.250	0.900	1.018	1.760	10/12NR
CER1006-14Q	00072634	1.000	1.000	6.000	–	1.250	1.100	–	1.760	14ER
CER1006-20QHD	02529045	1.000	1.000	6.000	–	1.250	1.300	–	1.760	20ER
CER1256-20QHD	02529057	1.250	1.250	6.000	–	1.500	1.417	–	2.650	20ER
CEL1006-20QHD	02529053	1.000	1.000	6.000	–	1.250	1.300	–	1.760	20NR
CEL1256-20QHD	02529061	1.250	1.250	6.000	–	1.500	1.300	–	2.870	20NR
CER1006-26QHD	02529063	1.000	1.000	6.000	–	1.250	1.800	–	1.980	26ER
CER1256-26QHD	02529066	1.250	1.250	6.000	–	1.500	1.800	–	2.870	26ER
CER1506-26QHD	02529069	1.500	1.500	6.000	–	1.750	1.800	–	3.970	26ER
CEL1006-26QHD	02529064	1.000	1.000	6.000	–	1.250	1.800	–	2.200	26NR

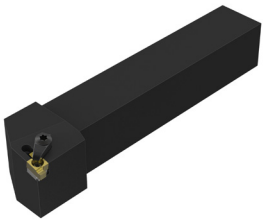
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Insert shim (K)	Shim screw	Spring
							
..-10	–	T15P-2	CSP16-T15P	–	KX10-2	CS2507-T07P	–
..-14	–	T15P-2	CSP16-T15P	–	KX14-2	CS3507-T09P	–
..-20	CHD22	T20P-7	–	L86025-T20P	KX20-2	CS4009-T15P	S7616
..-26	CHD27	T20P-7	–	L86025-T20P	KX26-2	C05012-T15P	S7616

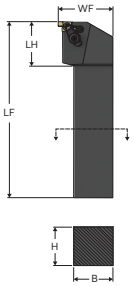
Accessories

For	Insert shim (K)	Insert shim (K) 1	Insert shim (K) 2	Insert shim (K) 3	Insert shim (K) 4	Insert shim (K) 5	Insert shim (K) 6	Shim key
								
..-10	KX12-2	–	–	–	–	–	–	T07P-2
..-14	–	–	–	–	–	–	–	T09P-2
..-20	–	KX20-99	KX20-0	KX20-1	KX20-3	KX20-4	KX20-5	T15P-2
..-26	–	KX26-99	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	T15P-2

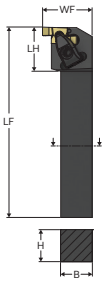
CEAR/L – Toolholders for Precision Axial Grooves – Metric



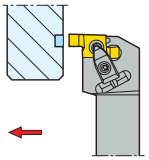
CEAR/L...D



CEAR/L...HD/QHD



CEAR/L..D/HD/QHD
KAPR = 90,0 °



CTWS



–Right-hand version shown
–For inserts program, see page(s) 906-916
–For holder code key, see page(s) 885
–Shim KX12-2 for insert 12..
–For use with 12 size insert please refer to values in WF2 / INPLM2 columns
–For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF 10../14../20..	WF2 12	LH	INPLM 10../14../20..	INPLM 12..	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	
CEAR2525M10D	02411447	25	25	150	35,4	38,4	22	16	18,0	0,8	10/12EAR
CEAL2525M10D	02411448	25	25	150	35,4	38,4	22	16	18,0	0,8	10/12EAL
CEAR2525M14HD	02627517	25	25	150	36,9	–	31	22	–	0,8	14EAR
CEAL2525M14HD	02627516	25	25	150	36,9	–	31	22	–	0,9	14EAL
CEAR2525M20QHD	02528518	25	25	150	39,4	–	35	28	–	0,9	20EAR
CEAL2525M20QHD	02528519	25	25	150	39,4	–	35	28	–	0,9	20EAL

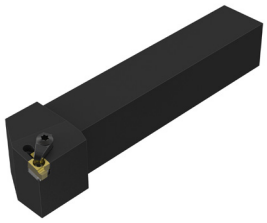
Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Insert shim (KL)	Insert shim (KR)	Shim screw	Spring
								
CEAL..10	–	T15P-2	CSP16-T15P	–	AKL10	–	CS2507-T07P	–
CEAL..14	CHD16	T15P-2	–	L85020-T15P	AKL14	–	CS3507-T09P	S6912
CEAL..20	CHD22	T20P-7	–	L86025-T20P	AKL20	–	CS4009-T15P	S7616
CEAR..10	–	T15P-2	CSP16-T15P	–	–	AKR10	CS2507-T07P	–
CEAR..14	CHD16	T15P-2	–	L85020-T15P	–	AKR14	CS3507-T09P	S6912
CEAR..20	CHD22	T20P-7	–	L86025-T20P	–	AKR20	CS4009-T15P	S7616

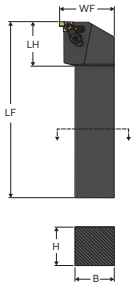
Accessories

For	Insert shim (K)	Shim key
		
CEAL..10	KX12-2	T07P-2
CEAL..14	–	T09P-2
CEAL..20	–	T15P-2
CEAR..10	KX12-2	T07P-2
CEAR..14	–	T09P-2
CEAR..20	–	T15P-2

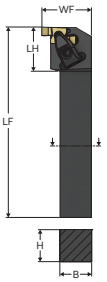
CEAR/L – Toolholders for Precision Axial Grooves – Inch



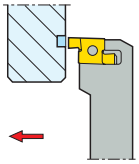
CEAR/L...D



CEAR/L...HD/QHD



CEAR/L
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—Shim KX12-2 for insert 12..
—For use with 12 size insert please refer to values in WF2 / INPLM2 columns
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF 10/14	WF2 12	LH	INPLM 10/14	INPLM 12..	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	
CEAR1006-10	00072625	1.000	1.000	6.000	1.392	1.510	1.110	0.630	0.709	1.980	10/12EAR
CEAL1006-10	00072613	1.000	1.000	6.000	1.392	1.510	1.110	0.630	0.709	1.980	10/12EAL
CEAR1006-14	00072623	1.000	1.000	6.000	1.451	–	1.110	0.866	–	2.200	14EAR

Spare Parts, included in delivery

For	Clamp key	Clamp kit	Insert shim	Insert shim (KL)	Insert shim (KR)	Shim key	Shim screw
							
CEAL..-10	T15P-2	CSP16-T15P	–	AKL10	–	–	CS2507-T07P
CEAR..-10	T15P-2	CSP16-T15P	–	–	AKR10	–	CS2507-T07P
CEAR..-14	T15P-2	CSP16-T15P	AKR14	–	–	T09P-2	CS3507-T09P

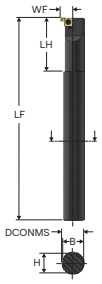
Accessories

For	Insert shim (K)	Shim key
		
CEAL..-10	KX12-2	T07P-2
CEAR..-10	–	T07P-2
CEAR..-14	–	–

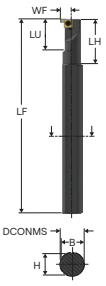
SNR/L – Toolholders for Precision Grooves – Metric



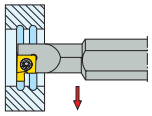
SNR/L..H09



SNR/L



SNR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	LU	DCINN	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	
SNR0010H9	75025330	10	9,5	9,5	100	7,5	20	–	14	0,1	9NR
SNR0010K9	75025332	16	15,5	15,5	125	6,5	25	23	14	0,2	9NR
SNR0013L9	75025334	16	15,5	15,5	140	8,0	32	30	17	0,2	9NR
SNR0016M9	75025336	16	15,5	15,5	150	9,5	40	38	20	0,3	9NR
SNL0010H9	75025331	10	9,5	9,5	100	7,5	20	–	14	0,1	9NL
SNL0010K9	75025333	16	15,5	15,5	125	6,5	25	23	14	0,2	9NL
SNL0013L9	75025335	16	15,5	15,5	140	8,0	32	30	17	0,2	9NL
SNL0016M9	75025337	16	15,5	15,5	150	9,5	40	38	20	0,3	9NL

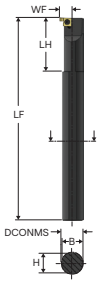
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..9	T07P-2	C02506-T07P

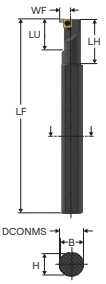
SNR/L – Toolholders for Precision Grooves – Inch



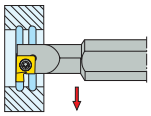
SNR/L..H09



SNR/L



SNR/L



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	DCONMS	H	B	LF	WF	LH	LU	DCINN	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	
SNR000375-50-9	00072560	0.375	0.625	0.654	5.000	0.266	1.000	–	0.550	0.440	9..
SNR00050-55-9	00072586	0.500	0.441	0.470	5.500	0.319	1.250	–	0.700	0.440	9..
SNR000625-60-9	00072588	0.625	0.566	0.587	6.000	0.378	1.500	–	0.800	0.660	9..
SNL00037540-9	00072552	0.375	0.336	0.350	4.000	0.299	–	–	0.550	0.220	9..
SNL00037550-9	00072595	0.375	0.336	0.350	5.000	0.259	1.000	–	0.550	0.440	9..
SNR000375-60-9H	00072562	0.375	0.441	0.350	6.000	0.299	–	–	0.550	0.440	9..

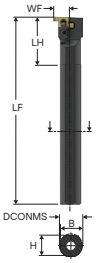
Spare Parts, included in delivery

For	Insert key	Insert screw
		
..-9	T07P-2	C02506-T07P

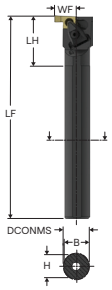
CNR/L – Toolholders for Precision Grooves – Metric



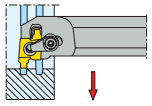
CNR/L...A/DA



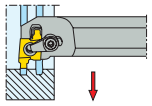
CNR/L...AHD



CNR/L...DA
KAPR = 90,0 °



CNR/L...A/AHD
KAPR



CTWS



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—Shim KX12-2 for insert 12..
—For use with 12 size insert please refer to values in WF2 / DCINN2 columns
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	WF2 12	LH	DCINN	DCINN2	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	mm	kg	
CNR0020P10DA	02411454	20	18	19	170	13,5	16,5	26	26	29	0,4	10/12NR
CNR0025R10DA	02411459	25	23	24	200	16,0	19,0	28	31	34	0,6	10/12NR
CNR0032S10DA	02411467	32	30	31	250	19,5	22,5	31	38	41	1,4	10/12NR
CNL0020P10DA	02411456	20	18	19	170	13,5	16,5	26	26	29	0,4	10/12ER
CNL0025R10DA	02411464	25	23	24	200	16,0	19,0	28	31	34	0,6	10/12ER
CNL0032S10DA	02411468	32	30	31	250	19,5	22,5	31	38	41	1,4	10/12ER
CNR0020P14A	00040041	20	18	19	170	15,0	–	32	30	–	0,4	14..
CNR0025R14A	00040042	25	23	24	200	17,5	–	45	34	–	0,7	14..
CNR0032S14A	00040043	32	30	31	250	21,0	–	48	40	–	1,4	14..
CNR0040T14A	00040044	40	37	39	300	25,0	–	50	48	–	2,6	14..
CNL0020P14A	00040045	20	18	19	170	15,0	–	32	30	–	0,4	14..
CNL0025R14A	00040046	25	23	24	200	17,5	–	45	34	–	0,7	14..
CNL0032S14A	00040047	32	30	31	250	21,0	–	48	40	–	1,4	14..
CNR0025R20AHD	02556131	25	23	24	200	20,5	–	50	38	–	0,7	20..
CNR0032S20AHD	02556132	32	30	31	250	24,0	–	50	44	38	1,4	20..
CNR0040T20AHD	02556133	40	37	39	300	28,0	–	50	51	40	2,6	20..
CNL0025R20AHD	02556134	25	23	24	200	20,5	–	50	38	–	0,7	20..
CNL0032S20AHD	02556135	32	30	31	250	24,0	–	50	44	38	1,4	20..
CNR0032S26AHD	02556136	32	30	31	250	27,0	–	61	50	50	1,5	26..
CNR0040T26AHD	02556137	40	37	39	300	31,0	–	60	55	50	2,6	26..
CNR0050U26AHD	02556138	50	47	49	350	36,0	–	62	65	–	4,9	26..
CNR0063V26AHD	02556139	63	60	62	400	42,5	–	64	80	63	8,9	26..
CNL0040T26AHD	02556140	40	37	39	300	31,0	–	60	55	50	2,5	26..

Spare Parts, included in delivery

For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Insert shim (K)	Plug screw	Shim screw	Spring
								
..10	–	T15P-2	CSP16-T15P	–	KX10-2	–	CS2507-T07P	–
..14	–	T15P-2	CSP16-T15P	–	KX14-2	–	CS3507-T09P	–
..20	CHD22	T20P-7L	–	L86025-T20P	KX20-2	P6SS4X4G	CS4009-T15P	S7616
..26	CHD27	T20P-7L	–	L86025-T20P	KX26-2	P6SS4X4G	C05012-T15P	S7616

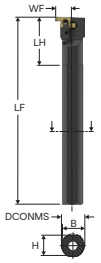
Accessories

For	Insert shim (K)	Insert shim (K) 1	Insert shim (K) 2	Insert shim (K) 3	Insert shim (K) 4	Insert shim (K) 5	Insert shim (K) 6	Shim key
								
..10	KX12-2	–	–	–	–	–	–	T07P-2
..14	–	–	–	–	–	–	–	T09P-2
..20	–	KX20-99	KX20-0	KX20-1	KX20-3	KX20-4	KX20-5	T15P-2
..26	–	KX26-99	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	T15P-2
..26	KX26-99	–	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	T15P-2

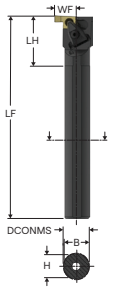
CNR/L – Toolholders for Precision Grooves – Inch



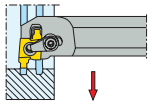
CNR/L...A/DA



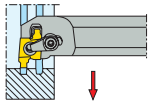
CNR/L...AHD



-10
KAPR = 90,0 °



-10-H / -14 / -AHD
KAPR



CTWS



—Right-hand version shown
—For inserts program, see page(s) 906-916
—For holder code key, see page(s) 885
—Shim KX12-2 for insert 12..
—For use with 12 size insert please refer to values in WF2 / DCINN2 columns
—For ISO attribute explanation, see page 82

Designation	Item number	DCONMS	H	B	LF	WF	WF2 12	LH	DCINN	DCINN2	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	inch	lbs	
CNR000757-10	00072573	0.750	0.691	0.707	7.000	0.490	0.608	1.480	0.950	0.950	0.880	10/12NR
CNR001008-10	00072569	1.000	0.921	0.957	8.000	0.618	0.736	2.500	1.200	1.000	1.760	10/12NR
CNR0012510-10	00072563	1.250	1.150	1.209	10.000	0.750	0.868	1.772	1.500	1.250	3.310	10/12NR
CNR0015012-10	00072592	1.500	1.339	1.427	12.008	0.858	0.976	1.772	1.800	1.600	0.440	10/12NR
CNL000757-10	00072624	0.750	0.650	0.707	7.000	0.490	0.608	1.480	0.950	0.950	0.880	10/12ER
CNL001008-10	00072610	1.000	0.902	0.957	8.000	0.620	0.738	1.559	1.200	1.000	1.760	10/12ER
CNR00075010-10-H	00072583	0.750	0.691	0.730	10.000	0.490	–	1.480	0.950	0.950	2.200	10/12NR
CNR000757-14	00072571	0.750	0.691	0.707	7.000	0.570	–	1.693	1.050	1.050	0.880	14..
CNR001008-14	00072567	1.000	0.921	0.957	8.000	0.700	–	1.732	1.300	1.050	1.760	14..
CNL001008-14	00072582	1.000	1.000	0.961	8.000	0.704	–	–	1.182	1.050	1.760	14..
CNR001008-20AHD	02562823	1.000	0.902	0.957	7.992	0.705	–	1.969	1.400	–	1.760	20..
CNR0012510-20AHD	02562824	1.250	1.150	1.209	10.000	0.945	–	2.165	1.700	1.400	3.310	20..
CNR0015012-20AHD	02562825	1.500	1.268	1.268	12.008	1.063	–	2.165	2.000	1.600	5.510	20..
CNL001008-20AHD	02562826	1.000	1.268	1.268	7.992	0.705	–	1.969	1.400	–	1.540	20..
CNL0012510-20AHD	02562827	1.250	1.268	1.268	10.000	0.945	–	2.165	1.700	1.400	2.870	20..
CNL0015012-20AHD	02562828	1.500	1.339	1.427	12.008	1.063	–	2.165	2.000	1.600	5.070	20..
CNR0012510-26AHD	02562830	1.250	1.150	1.209	10.000	1.063	–	2.323	2.000	1.600	2.870	26..
CNR0015012-26AHD	02562831	1.500	1.339	1.427	12.008	1.183	–	2.323	2.100	2.100	5.070	26..
CNR0017514-26AHD	02562832	1.750	1.591	1.677	13.976	1.307	–	2.283	2.300	1.800	8.160	26..
CNR0020014-26AHD	02562833	2.000	1.843	1.933	13.976	1.433	–	2.283	2.500	2.000	11.460	26..
CNR0025016-26AHD	02562834	2.500	2.343	2.429	15.984	1.683	–	2.283	3.000	2.500	20.720	26..
CNL0012510-26AHD	02564043	1.250	1.268	1.268	10.000	1.063	–	2.323	2.000	1.600	3.090	26..
CNL0015012-26AHD	02563555	1.500	1.268	1.268	12.008	1.177	–	2.323	2.100	2.100	4.850	26..
CNL0017514-26AHD	02563563	1.750	1.268	1.268	13.976	1.307	–	2.283	2.300	1.800	8.380	26..
CNL0025016-26AHD	02563564	2.500	1.268	1.268	15.984	1.683	–	2.283	3.000	2.500	20.720	26..

Spare Parts, included in delivery

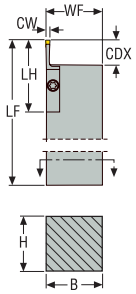
For	Cantilever clamp	Clamp key	Clamp kit	Clamp screw	Insert shim (K)	Plug screw	Shim screw	Spring
								
..-10	–	T15P-2	CSP16-T15P	–	KX10-2	–	CS2507-T07P	–
..-10-10-H	–	T15P-2	CSP16-T15P	–	KX10-2	–	CS2507-T07P	–
..-14	–	T15P-2	CSP16-T15P	–	KX14-2	–	CS3507-T09P	–
..-20	CHD22	T20P-7	–	L86025-T20P	KX20-2	P6SS4X4G	CS4009-T15P	S7616
..-26	CHD27	T20P-7	–	L86025-T20P	KX26-2	P6SS4X4G	C05012-T15P	S7616

Accessories

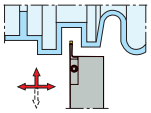
For	Insert shim (K)	Insert shim (K) 1	Insert shim (K) 2	Insert shim (K) 3	Insert shim (K) 4	Insert shim (K) 5	Insert shim (K) 6	Shim key
								
..-10	KX12-2	–	–	–	–	–	–	T07P-2
..-10-10-H	–	–	–	–	–	–	–	T07P-2
..-14	–	–	–	–	–	–	–	–
..-20	–	KX20-99	KX20-0	KX20-1	KX20-3	KX20-4	KX20-5	T15P-2
..-26	–	KX26-99	KX26-0	KX26-1	KX26-3	KX26-4	KX26-5	T15P-2

CF.R/L-..C – Toolholders for ceramic inserts LPGN – Metric

CF.R/L-..C



CF.R/L-..C
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 917
—For ISO attribute explanation, see page 82

CTWS

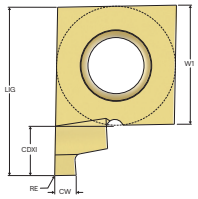


Designation	Item number	H	B	LF	WF	LH	CDX	Weight	CW	CTWS
		mm	mm	mm	mm	mm	mm	kg	mm	
CFOR3244M-0317C	02927353	32	44	150	44,2	56,4	19,4	1,5	3,17	LPGN1204..
CFOL3244M-0317C	02927354	32	44	150	44,2	56,4	19,4	1,6	3,17	LPGN1204..
CFLR3244M-0635C	02464154	32	44	150	44,6	66,6	29,1	1,5	6,35	LPGN1906..
CFLL3244M-0635C	02464113	32	44	150	44,6	66,6	29,1	1,5	6,35	LPGN1906..
CFKR3244M-0952C	02464109	32	44	150	45,0	76,8	38,5	1,5	9,52	LPGN2508..
CFKL3244M-0952C	02544163	32	44	150	45,0	76,8	38,5	1,4	9,52	LPGN2508..

Spare Parts, included in delivery

For	Clamp	Clamp key
		
-0317C	CER024	T30P-7
-0317C	CEL024	T30P-7
-0635C	CER055	T30P-7
-0635C	CEL055	T30P-7
-0952C	CER087	T30P-7
-0952C	CEL087	T30P-7

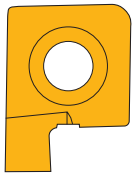
Inserts – Precision Grooves, Radial Grooves



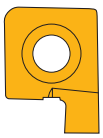
Tolerances:
CW = +0,05/0 / *+0.002/0*
Toolholder range, see page(s) 899, 900

For ISO attribute explanation, see page 82

9

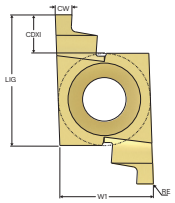


Designation Internal right	CW	W1	LIG	CDXI	RE	For circlip	Pitch TPI	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP30	CP500
9NR1.15FG	1,15 *0.045*	6,35 *0.250*	9,0 *0.354*	1,15 *0.045*	0.0	1,00 *0.039*	–	■	■
9NR1.35FG	1,35 *0.053*	6,35 *0.250*	9,0 *0.354*	1,35 *0.053*	0.0	1,20 *0.047*	–	■	■
9NR1.65FG	1,65 *0.065*	6,35 *0.250*	9,0 *0.354*	1,65 *0.065*	0.0	1,50 *0.059*	–	■	■
9NR1.9FG	1,9 *0.075*	6,35 *0.250*	9,0 *0.354*	1,9 *0.075*	0.0	1,75 *0.069*	–	■	■
9NR2.15FG	2,15 *0.085*	6,35 *0.250*	9,0 *0.354*	2,15 *0.085*	0.0	2,00 *0.079*	6TPI	■	■
9NR2.65FG	2,65 *0.104*	6,35 *0.250*	9,0 *0.354*	2,65 *0.104*	0.0	2,50 *0.098*	–	■	■



Designation Internal left	CW	W1	LIG	CDXI	RE	For circlip	Pitch TPI	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP30	CP500
9NL1.15FG	1,15 *0.045*	6,35 *0.250*	9,0 *0.354*	1,15 *0.045*	0.0	1,00 *0.039*	–	■	■
9NL1.35FG	1,35 *0.053*	6,35 *0.250*	9,0 *0.354*	1,35 *0.053*	0.0	1,20 *0.047*	–		■
9NL1.65FG	1,65 *0.065*	6,35 *0.250*	9,0 *0.354*	1,65 *0.065*	0.0	1,50 *0.059*	–		■
9NL1.9FG	1,9 *0.075*	6,35 *0.250*	9,0 *0.354*	1,9 *0.075*	0.0	1,75 *0.069*	–		■
9NL2.15FG	2,15 *0.085*	6,35 *0.250*	9,0 *0.354*	2,15 *0.085*	0.0	2,00 *0.079*	6TPI		■
9NL2.65FG	2,65 *0.104*	6,35 *0.250*	9,0 *0.354*	2,65 *0.104*	0.0	2,50 *0.098*	–	■	■

Inserts – Precision Grooves, Radial Grooves



Tolerances:
CW = +0,05/0 / *+0.002/0*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

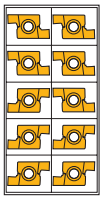
For ISO attribute explanation, see page 82

Toolset 10FG, CP500 contents:
1 pce 10ER1.15FG, 1 pce 10ER1.35FG
1 pce 10ER1.65FG, 1 pce 10ER1.9FG
1 pce 10ER2.15FG, 1 pce 10NR1.15FG
1 pce 10NR1.35FG, 1 pce 10NR1.65FG
1 pce 10NR1.9FG, 1 pce 10NR2.15FG

10/14
20/26



Toolset:
10FG

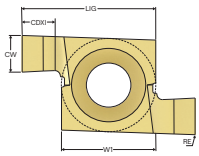


Designation External right Internal left	CW	W1	LIG	CDXI	RE	For circlip	Pitch TPI	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP30	CP500
10ER1.15FG	1,15 *0.045*	6,35 *0.250*	9,0 *0.354*	1,15 *0.045*	0.0	1,00 *0.039*	–	■	■
10ER1.35FG	1,35 *0.053*	6,35 *0.250*	9,0 *0.354*	1,35 *0.053*	0.0	1,20 *0.047*	–	■	■
10ER1.65FG	1,65 *0.065*	6,35 *0.250*	9,0 *0.354*	1,65 *0.065*	0.0	1,50 *0.059*	–	■	■
10ER1.9FG	1,9 *0.075*	6,35 *0.250*	9,0 *0.354*	1,9 *0.075*	0.0	1,75 *0.069*	–	■	■
10ER2.15FG	2,15 *0.085*	6,35 *0.250*	9,0 *0.354*	2,15 *0.085*	0.0	2,00 *0.079*	6TPI	■	■
10ER2.65FG	2,65 *0.104*	6,35 *0.250*	9,0 *0.354*	2,65 *0.104*	0.0	2,50 *0.098*	–	■	■
14ER3.0FG	3,0 *0.118*	9,525 *0.375*	14,0 *0.551*	3,0 *0.118*	0.0	–	–	■	■
14ER3.2FG	3,2 *0.126*	9,525 *0.375*	14,0 *0.551*	3,2 *0.126*	0.0	3,00 *0.118*	–		■
14ER3.4FG	3,4 *0.134*	9,525 *0.375*	14,0 *0.551*	3,4 *0.134*	0.0	–	4TPI		■
14ER4.0FG	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,0 *0.157*	0.0	–	–	■	■
14ER4.2FG	4,2 *0.165*	9,525 *0.375*	14,0 *0.551*	4,2 *0.165*	0.0	4,00 *0.157*	–		■
20ER4.4FG	4,4 *0.173*	12,7 *0.500*	20,0 *0.787*	4,4 *0.173*	0.0	–	3TPI		■
20ER5.0FG	5,0 *0.197*	12,7 *0.500*	20,0 *0.787*	5,0 *0.197*	0.0	–	–		■
20ER5.2FG	5,2 *0.205*	12,7 *0.500*	20,0 *0.787*	5,2 *0.205*	0.0	5,00 *0.197*	–		■
20ER6.0FG	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,0 *0.236*	0.0	–	–		■
20ER6.35FG	6,35 *0.250*	12,7 *0.500*	20,0 *0.787*	6,35 *0.250*	0.0	–	–		■
26ER8.0FG	8,0 *0.315*	15,875 *0.625*	26,0 *1.024*	8,0 *0.315*	0.0	–	–		■
26ER10.0FG	10,0 *0.394*	15,875 *0.625*	26,0 *1.024*	10,0 *0.394*	0.0	–	–		■
	–	–	–	–	0.0 *0.0*	–	–		



Designation Internal right External left	CW	W1	LIG	CDXI	RE	For circlip	Pitch TPI	Grades	
								Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		CP30	CP500
10NR1.15FG	1,15 *0.045*	6,35 *0.250*	9,0 *0.354*	1,15 *0.045*	0.0	1,00 *0.039*	–	■	■
10NR1.35FG	1,35 *0.053*	6,35 *0.250*	9,0 *0.354*	1,35 *0.053*	0.0	1,20 *0.047*	–	■	■
10NR1.65FG	1,65 *0.065*	6,35 *0.250*	9,0 *0.354*	1,65 *0.065*	0.0	1,50 *0.059*	–	■	■
10NR1.9FG	1,9 *0.075*	6,35 *0.250*	9,0 *0.354*	1,9 *0.075*	0.0	1,75 *0.069*	–	■	■
10NR2.15FG	2,15 *0.085*	6,35 *0.250*	9,0 *0.354*	2,15 *0.085*	0.0	2,00 *0.079*	6TPI	■	■
10NR2.65FG	2,65 *0.104*	6,35 *0.250*	9,0 *0.354*	2,65 *0.104*	0.0	2,50 *0.098*	–	■	■
14NR3.0FG	3,0 *0.118*	9,525 *0.375*	14,0 *0.551*	3,0 *0.118*	0.0	–	–	■	■
14NR3.2FG	3,2 *0.126*	9,525 *0.375*	14,0 *0.551*	3,2 *0.126*	0.0	3,00 *0.118*	–		■
14NR3.4FG	3,4 *0.134*	9,525 *0.375*	14,0 *0.551*	3,4 *0.134*	0.0	–	4TPI		■
14NR4.0FG	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,0 *0.157*	0.0	–	–	■	■
14NR4.2FG	4,2 *0.165*	9,525 *0.375*	14,0 *0.551*	4,2 *0.165*	0.0	4,00 *0.157*	–		■
20NR4.4FG	4,4 *0.173*	12,7 *0.500*	20,0 *0.787*	4,4 *0.173*	0.0	–	3TPI		■
20NR5.0FG	5,0 *0.197*	12,7 *0.500*	20,0 *0.787*	5,0 *0.197*	0.0	–	–	■	■
20NR5.2FG	5,2 *0.205*	12,7 *0.500*	20,0 *0.787*	5,2 *0.205*	0.0	5,00 *0.197*	–		■
20NR6.0FG	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,0 *0.236*	0.0	–	–		■
26NR8.0FG	8,0 *0.315*	15,875 *0.625*	26,0 *1.024*	8,0 *0.315*	0.0	–	–		■
20NR6.35FG	6,35 *0.250*	12,7 *0.500*	20,0 *0.787*	6,35 *0.250*	0.0	–	–		■
26NR10.0FG	10,0 *0.394*	15,875 *0.625*	26,0 *1.024*	10,0 *0.394*	0.0	–	–		■

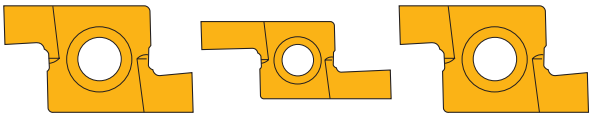
Inserts – Precision Grooves, Axial Grooves



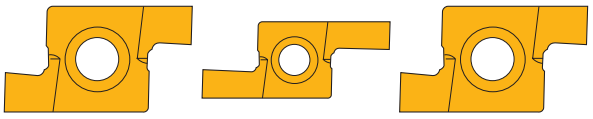
Tolerances:
CW = +0,05/0 / *+0.002/0*
Toolholder range and INPLM, see page(s) 897, 898

For ISO attribute explanation, see page 82

10 12 14/20

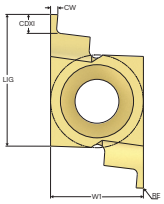


Designation External right	CW	W1	LIG	CDXI	RE	INPLM	For width	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10EAR2.5FA	2,5 *0.098*	6,35 *0.250*	9,0 *0.354*	2,5 *0.098*	–	16,0 *0.630*	2,5 *0.098*	■	■
12EAR2.5FD	2,5 *0.098*	6,35 *0.250*	12,0 *0.472*	5,0 *0.197*	0,2 *0.008*	18,0 *0.709*	2,5 *0.098*		■
14EAR4.0FA	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,0 *0.157*	–	22,0 *0.866*	4,0 *0.157*	■	■
20EAR6.0FA	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,0 *0.236*	–	28,0 *1.102*	6,0 *0.236*	■	■



Designation External left	CW	W1	LIG	CDXI	RE	INPLM	For width	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10EAL2.5FA	2,5 *0.098*	6,35 *0.250*	9,0 *0.354*	2,5 *0.098*	–	16,0 *0.630*	2,5 *0.098*		■
12EAL2.5FD	2,5 *0.098*	6,35 *0.250*	12,0 *0.472*	5,0 *0.197*	0,2 *0.008*	18,0 *0.709*	2,5 *0.098*		■
14EAL4.0FA	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,0 *0.157*	–	22,0 *0.866*	4,0 *0.157*		■
20EAL6.0FA	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,0 *0.236*	–	28,0 *1.102*	6,0 *0.236*		■

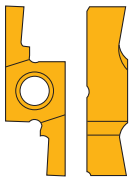
Inserts – Precision Grooves, Deep Radial Grooves



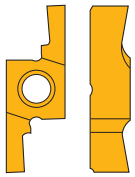
Tolerances:
CW = ±0,025/*0.001*
CDXI = +0,10/0 / *+0.004/0*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

For ISO attribute explanation, see page 82

..FD

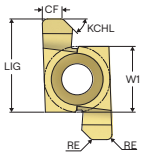


Designation External right Internal left	CW	W1	LIG	CDXI	RE	Grades	
						Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10ER0.50FD	0,5 *0.020*	6,35 *0.250*	9,0 *0.354*	1,0 *0.039*	–		■
10ER0.80FD	0,8 *0.031*	6,35 *0.250*	9,0 *0.354*	1,6 *0.063*	–		■
10ER1.00FD	1,0 *0.039*	6,35 *0.250*	9,0 *0.354*	2,0 *0.079*	–		■
12ER1.04FD	1,04 *0.041*	6,35 *0.250*	12,0 *0.472*	2,08 *0.082*	–		■
12ER1.20FD	1,2 *0.047*	6,35 *0.250*	12,0 *0.472*	2,4 *0.094*	0,1 *0.004*		■
12ER1.40FD	1,4 *0.055*	6,35 *0.250*	12,0 *0.472*	2,8 *0.110*	0,1 *0.004*		■
12ER1.47FD	1,47 *0.058*	6,35 *0.250*	12,0 *0.472*	2,94 *0.116*	0,1 *0.004*		■
12ER1.50FD	1,5 *0.059*	6,35 *0.250*	12,0 *0.472*	3,0 *0.118*	0,1 *0.004*		■
12ER1.57FD	1,57 *0.062*	6,35 *0.250*	12,0 *0.472*	3,14 *0.124*	0,15 *0.006*		■
12ER1.70FD	1,7 *0.067*	6,35 *0.250*	12,0 *0.472*	3,4 *0.134*	0,15 *0.006*		■
12ER1.96FD	1,96 *0.077*	6,35 *0.250*	12,0 *0.472*	3,92 *0.154*	0,15 *0.006*		■
12ER2.00FD	2,0 *0.079*	6,35 *0.250*	12,0 *0.472*	4,0 *0.157*	0,2 *0.008*		■
12ER2.24FD	2,24 *0.088*	6,35 *0.250*	12,0 *0.472*	4,48 *0.176*	0,2 *0.008*		■
12ER2.30FD	2,3 *0.091*	6,35 *0.250*	12,0 *0.472*	4,6 *0.181*	0,2 *0.008*		■
12ER2.39FD	2,39 *0.094*	6,35 *0.250*	12,0 *0.472*	4,78 *0.188*	0,2 *0.008*		■
12ER2.65FD	2,65 *0.104*	6,35 *0.250*	12,0 *0.472*	5,3 *0.209*	0,2 *0.008*		■



Designation Internal right External left	CW	W1	LIG	CDXI	RE	Grades	
						Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10NR0.50FD	0,5 *0.020*	6,35 *0.250*	9,0 *0.354*	1,0 *0.039*	–		■
10NR0.80FD	0,8 *0.031*	6,35 *0.250*	9,0 *0.354*	1,6 *0.063*	–		■
10NR1.00FD	1,0 *0.039*	6,35 *0.250*	9,0 *0.354*	2,0 *0.079*	–		■
12NR1.04FD	1,04 *0.041*	6,35 *0.250*	12,0 *0.472*	2,08 *0.082*	–		■
12NR1.20FD	1,2 *0.047*	6,35 *0.250*	12,0 *0.472*	2,4 *0.094*	0,1 *0.004*		■
12NR1.40FD	1,4 *0.055*	6,35 *0.250*	12,0 *0.472*	2,8 *0.110*	0,1 *0.004*		■
12NR1.47FD	1,47 *0.058*	6,35 *0.250*	12,0 *0.472*	2,94 *0.116*	0,1 *0.004*		■
12NR1.50FD	1,5 *0.059*	6,35 *0.250*	12,0 *0.472*	3,0 *0.118*	0,1 *0.004*		■
12NR1.57FD	1,57 *0.062*	6,35 *0.250*	12,0 *0.472*	3,14 *0.124*	0,15 *0.006*		■
12NR1.70FD	1,7 *0.067*	6,35 *0.250*	12,0 *0.472*	3,4 *0.134*	0,15 *0.006*		■
12NR1.96FD	1,96 *0.077*	6,35 *0.250*	12,0 *0.472*	3,92 *0.154*	0,15 *0.006*		■
12NR2.00FD	2,0 *0.079*	6,35 *0.250*	12,0 *0.472*	4,0 *0.157*	0,2 *0.008*		■
12NR2.24FD	2,24 *0.088*	6,35 *0.250*	12,0 *0.472*	4,48 *0.176*	0,2 *0.008*		■
12NR2.30FD	2,3 *0.091*	6,35 *0.250*	12,0 *0.472*	4,6 *0.181*	0,2 *0.008*		■
12NR2.39FD	2,39 *0.094*	6,35 *0.250*	12,0 *0.472*	4,78 *0.188*	0,2 *0.008*		■
12NR2.65FD	2,65 *0.104*	6,35 *0.250*	12,0 *0.472*	5,3 *0.209*	0,2 *0.008*		■

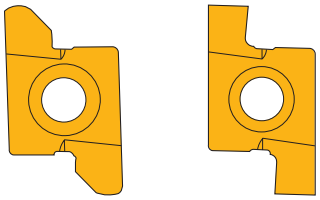
Inserts – Precision Grooves, DIN76



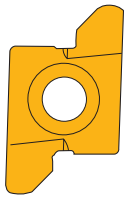
Tolerances:
RE = ±0,05/*0.002*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

For ISO attribute explanation, see page 82

..D76

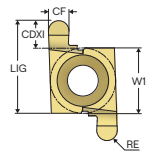


Designation External right Internal left	CF	W1	LIG	RE	For max pitch	KCHR°	KCHL°	Grades	
								Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP30	CP500
10ER1.0D76	2,0 *0.079*	6,35 *0.250*	9,0 *0.354*	0,5 *0.020*	1,0 *0.039*	0	45		■
14ER1.5D76	3,1 *0.122*	9,525 *0.375*	14,0 *0.551*	0,75 *0.030*	1,5 *0.059*	0	45	■	■
20ER2.0D76	4,5 *0.177*	12,7 *0.500*	20,0 *0.787*	1,0 *0.039*	2,0 *0.079*	0	45		■



Designation Internal right External left	CF	W1	LIG	RE	For max pitch	KCHR°	KCHL°	Grades	
								Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP30	CP500
10NR1.0D76	2,0 *0.079*	6,35 *0.250*	9,0 *0.354*	0,5 *0.020*	1,0 *0.039*	45	0		■
14NR1.5D76	3,1 *0.122*	9,525 *0.375*	14,0 *0.551*	0,75 *0.030*	1,5 *0.059*	45	0		■
20NR2.0D76	4,5 *0.177*	12,7 *0.500*	20,0 *0.787*	1,0 *0.039*	2,0 *0.079*	45	0		■

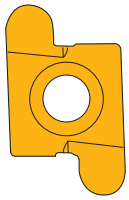
Inserts – Precision Grooves, Radius



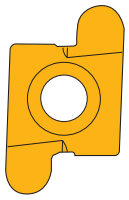
Tolerances:
RE = ±0,05/*0.002*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

For ISO attribute explanation, see page 82

..R

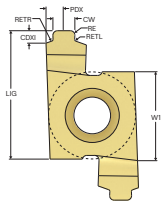


Designation External right Internal left	CW	W1	LIG	CDXI	RE	For radius	Grades	
							Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10ER1.0R	2,0 *0.079*	6,35 *0.250*	9,0 *0.354*	2,4 *0.094*	1,0 *0.039*	1,0 *0.039*		■
10ER1.2R	2,4 *0.094*	6,35 *0.250*	9,0 *0.354*	2,4 *0.094*	1,2 *0.047*	1,2 *0.047*		■
14ER1.5R	3,0 *0.118*	9,525 *0.375*	14,0 *0.551*	4,0 *0.157*	1,5 *0.059*	1,5 *0.059*	■	■
14ER2.0R	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,28 *0.169*	2,0 *0.079*	2,0 *0.079*	■	■
20ER3.0R	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,9 *0.272*	3,0 *0.118*	3,0 *0.118*	■	■
26ER4.0R	8,0 *0.315*	15,875 *0.625*	26,0 *1.024*	9,8 *0.386*	4,0 *0.157*	4,0 *0.157*		■
26ER5.0R	10,0 *0.394*	15,875 *0.625*	26,0 *1.024*	9,8 *0.386*	5,0 *0.197*	5,0 *0.197*		■



Designation Internal right External left	CW	W1	LIG	CDXI	RE	For radius	Grades	
							Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP30	CP500
10NR1.0R	2,0 *0.079*	6,35 *0.250*	9,0 *0.354*	2,4 *0.094*	1,0 *0.039*	1,0 *0.039*		■
10NR1.2R	2,4 *0.094*	6,35 *0.250*	9,0 *0.354*	2,4 *0.094*	1,2 *0.047*	1,2 *0.047*	■	■
14NR1.5R	3,0 *0.118*	9,525 *0.375*	14,0 *0.551*	4,28 *0.169*	1,5 *0.059*	1,5 *0.059*	■	■
14NR2.0R	4,0 *0.157*	9,525 *0.375*	14,0 *0.551*	4,28 *0.169*	2,0 *0.079*	2,0 *0.079*		■
20NR3.0R	6,0 *0.236*	12,7 *0.500*	20,0 *0.787*	6,9 *0.272*	3,0 *0.118*	3,0 *0.118*	■	■
26NR4.0R	8,0 *0.315*	15,875 *0.625*	26,0 *1.024*	9,8 *0.386*	4,0 *0.157*	4,0 *0.157*		■
26NR5.0R	10,0 *0.394*	15,875 *0.625*	26,0 *1.024*	9,8 *0.386*	5,0 *0.197*	5,0 *0.197*		■

Inserts – Precision Grooves, O-ring Static



Tolerances:
CW = +0,07/-0,03 / *+0.003/-0.0012*
RETR/RETL = ±0,05/*0.002*
RE = ±0,15/*0.006*
CDXI = ±0,025/*0.001*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

For ISO attribute explanation, see page 82

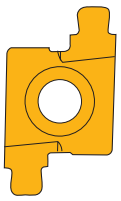
Standard
* =
SMS 1588, BS 4518

** =
ISO 3601, DIN 3771, BS 1806

..ST

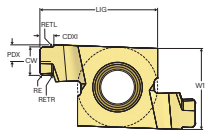


Designation External right Internal left	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14ER1.6ST	2,4 *0.094*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,11 *0.044*	0,5 *0.020*	1,60	–	*		■
14ER2.4ST	3,2 *0.126*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,23 *0.009*	0,23 *0.009*	1,78 *0.070*	0,5 *0.020*	2,40	–	*		■
20ER3.0ST	3,8 *0.150*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,3 *0.012*	0,3 *0.012*	2,25 *0.089*	1,0 *0.039*	3,00	–	*		■
20ER3.55ST	4,8 *0.189*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,3 *0.012*	0,3 *0.012*	2,64 *0.104*	0,75 *0.030*	3,55	0.140	**		■
20ER4.1ST	5,1 *0.201*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,4 *0.016*	0,4 *0.016*	3,19 *0.126*	1,0 *0.039*	4,10	–	*		■
26ER5.7ST	6,5 *0.256*	5,0 *0.197*	15,875 *0.625*	26,0 *1.024*	0,4 *0.016*	0,4 *0.016*	4,56 *0.180*	1,0 *0.039*	5,70	–	*		■



Designation Internal right External left	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14NR1.6ST	2,4 *0.094*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,11 *0.044*	0,5 *0.020*	1,60	–	*		■
20NR3.0ST	3,8 *0.150*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,3 *0.012*	0,3 *0.012*	2,25 *0.089*	1,0 *0.039*	3,00	–	*		■
26NR5.7ST	6,5 *0.256*	5,0 *0.197*	15,875 *0.625*	26,0 *1.024*	0,4 *0.016*	0,4 *0.016*	4,56 *0.180*	1,0 *0.039*	5,70	–	*		■

Inserts – Precision Grooves, O-ring Axial



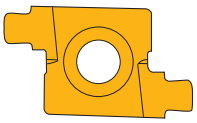
Tolerances:
CW = +0,07/-0,03 / *+0.003/-0.0012*
RETR/RETL = ±0,05/*0.002*
RE = ±0,15/*0.006*
CDXI = ±0,025/*0.001*
Toolholder range, see page(s) 897, 898

For ISO attribute explanation, see page 82

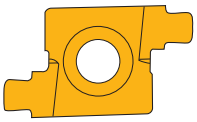
Standard
* =
SMS 1588, BS 4518

** =
ISO 3601, DIN 3771, BS 1806

..AX

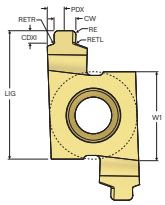


Designation External right	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades: Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14EAR2.4AX	3,4 *0.134*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,6 *0.063*	0,5 *0.020*	2,40	–	*		■
14EAR2.65AX	3,6 *0.142*	2,1 *0.083*	9,525 *0.375*	14,0 *0.551*	0,25 *0.010*	0,25 *0.010*	2,07 *0.081*	0,5 *0.020*	2,65	–	*		■
20EAR3.0AX	4,2 *0.165*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,25 *0.010*	0,25 *0.010*	2,07 *0.081*	1,0 *0.039*	3,00	0.104	**		■
20EAR3.55AX	4,9 *0.193*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,3 *0.012*	0,3 *0.012*	2,79 *0.110*	0,75 *0.030*	3,55	0.140	**		■



Designation External left	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades: Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14EAL2.4AX	3,4 *0.134*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,6 *0.063*	0,5 *0.020*	2,40	–	*		■

Inserts – Precision Grooves, O-ring Dynamic



Tolerances:
CW = +0,07/-0,03 / *+0.003/-0.0012*
RETR/RETL = ±0,05/*0.002*
RE = ±0,15/*0.006*
CDXI = ±0,025/*0.001*
Toolholder range, see page(s) 893, 894, 895, 896, 901, 902, 903, 904

For ISO attribute explanation, see page 82

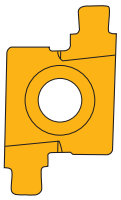
Standard
* =
SMS 1588, BS 4518

** =
ISO 3601, DIN 3771, BS 1806

..DY

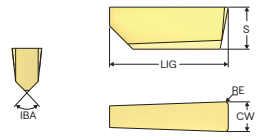


Designation External right Internal left	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades	
												Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14ER2.4DY	3,3 *0.130*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,25 *0.010*	0,25 *0.010*	1,87 *0.074*	0,5 *0.020*	2,40	–	*		■
20ER3.0DY	4,1 *0.161*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,25 *0.010*	0,25 *0.010*	2,36 *0.093*	1,0 *0.039*	3,00	–	*		■
14ER1.8DY	2,4 *0.094*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,45 *0.057*	0,5 *0.020*	1,80	0.071	**		■
14ER2.65DY	3,6 *0.142*	2,1 *0.083*	9,525 *0.375*	14,0 *0.551*	0,3 *0.012*	0,3 *0.012*	2,16 *0.085*	0,5 *0.020*	2,65	0.104	**		■
20ER3.55DY	4,8 *0.189*	3,2 *0.126*	12,7 *0.500*	20,0 *0.787*	0,3 *0.012*	0,3 *0.012*	2,97 *0.117*	0,65 *0.026*	3,55	0.140	**		■



Designation Internal right External left	CW	PDX	W1	LIG	RETR	RETL	CDXI	RE	For O-ring		Standard	Grades	
												Coated	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm	*inch*		CP30	CP500
14NR2.4DY	3,3 *0.130*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,25 *0.010*	0,25 *0.010*	1,87 *0.074*	0,5 *0.020*	2,40	–	*		■
14NR1.8DY	2,4 *0.094*	2,0 *0.079*	9,525 *0.375*	14,0 *0.551*	0,2 *0.008*	0,2 *0.008*	1,45 *0.057*	0,5 *0.020*	1,80	0.071	**		■

LPGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

For ISO attribute explanation, see page 82
Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

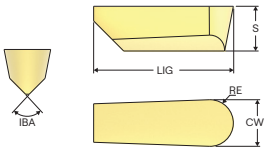
IBA = 90°

LPGN



Designation	RE	CW	LIG	S	Grades
					Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CW100
LPGN120404-03175E	0,381 *0.015*	3,175 *0.125*	12,7 *0.500*	4,5 *0.177*	■
LPGN190608-0635E	0,787 *0.031*	6,35 *0.250*	19,1 *0.752*	6,1 *0.240*	■

LPGN



Tolerances:
CW = ±0,025/*0.001*
LIG = ±0,04/*0.0016*
S = ±0,05/*0.002*
RE = ±0,025/*0.001*

For ISO attribute explanation, see page 82
Tip sizes, see page(s) 136
Edge preparation, see page(s) 132

IBA = 90°

LPGN



Designation	RE	CW	LIG	S	Grades
					Coated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CW100
LPGN1906M0-0635E	3,175 *0.125*	6,35 *0.250*	19,1 *0.752*	6,1 *0.240*	■



Parting-off

Optimized for parting-off applications, the Seco 150.10 consists of a high-speed steel blade that holds the insert and a holder that retains the blade. This setup provides maximum stability, while the heat resistance of the high-speed steel ensures the insert will be securely retained especially when the blade is hot.

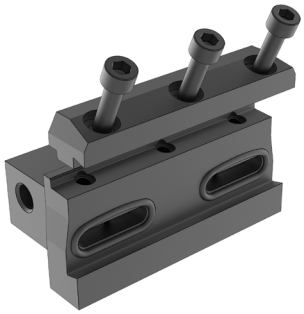
– Inserts in neutral version N are first choice.
– R/L-inserts have a setting angle of 6° in order to eliminate burrs.
– Three different chipbreakers, -12, -14 and -16 depending on workpiece material.

Parting-off

System Designation | Shank width | Jetstream Tooling® integrated coolant inlet

150.10 - 20 20 - 20 JETI

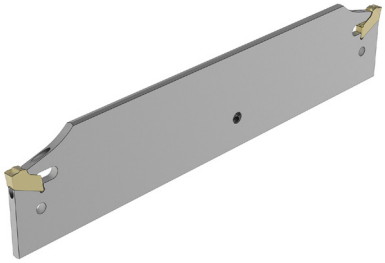
Shank height | Blade height



System Designation | Insert size | Jetstream Tooling® Duo integrated coolant inlet

150.10A - 20 - 4 R JETI

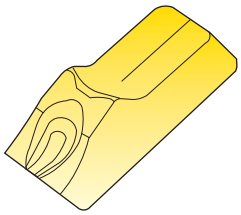
Blade height | R = Right, L = Left



System Designation | Neutral version

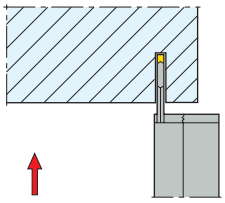
150.10 - 4 N - 14

Insert size | Chipbreaker



For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029

Parting-off, up to ∅160 mm



General

Use the highest blade possible (size 25) for maximum stability.

Use the shortest overhang possible for maximum stability and low risk of vibrations.

Make sure that the tool is at 90° to the centre-line of the component to ensure part quality and good tool life.

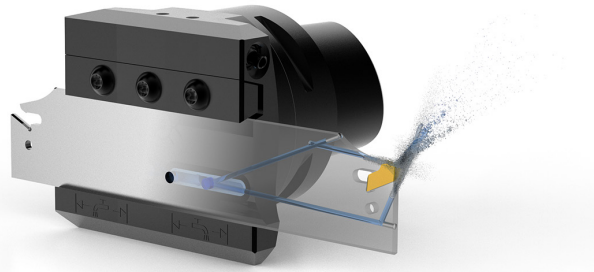
Ideally, parting-off is run with a sub-spindle or part-catcher. In this case the cutting edge will be protected by having the second spindle or a fixture picking up the workpiece.

Parting-off without sub-spindle requires the feed rate to be reduced as the tool approaches centre (by up to 75% about 2 mm before the component centre – depending on workpiece diameter). May also be applied on tubes to reduce burr.

A well-aimed and sufficient flow of coolant, ideally through the blades 150.10JETI, will give long tool life and good surface finish.

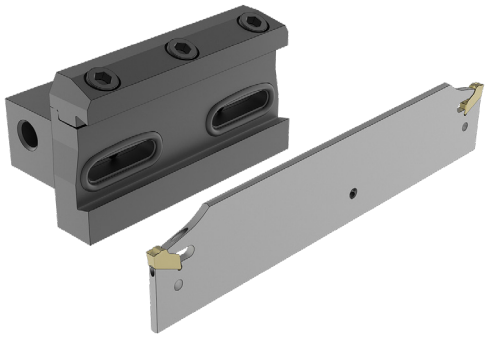
Smaller inserts reduce the material waste and thus reduce material cost. On the other hand wider inserts allow higher feed rates, which increases productivity. The optimum depends on the customer

Seco Jetstream Tooling® Duo holders, yet another innovation introduced to market, feature both a rake face and flank face jet, that may provide even better chip control and significantly longer tool life.



Toolholders

The Seco 150.10A parting-off system consists of a high speed steel blade which holds the insert and a holder which retains the blade. This provides maximum stability, while the hot strength of the high speed steel ensures that the insert will be securely retained even when the blade is hot.

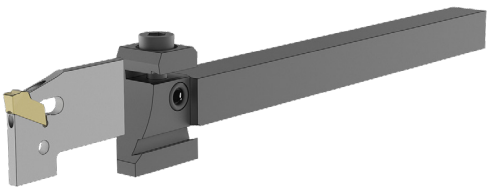


Type 150.10..-20/25JETI basic holder

Intended for long, reversible high speed steel blades with a depth of cut of up to 160 mm diameter. The same holder is suitable for both right-hand and left-hand versions. JETI functionality with integrated coolant delivery straight to the cutting edge.

Type 150.10..-15JETI blade holder

Intended for short high speed steel blades for cutting depths up to 38 mm diameter. The high speed steel blade ensures excellent stability and, due to the compact design, is suitable for machines with limited space, such as automatic lathes. JETI functionality with integrated coolant delivery straight to the cutting edge.



Inserts

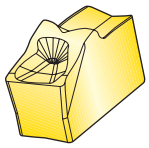
Inserts N-/ R- /L-

Inserts in neutral version N are first choice since they normally achieve increased tool life, better chip control, high surface quality and allow higher cutting data compared to the handed (R-/L-) version.

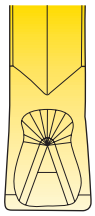
The R-/L-inserts have a setting angle of 6° in order to eliminate burrs and minimize the parting-off pip left on the workpiece. To reduce pip size with N-inserts, use the smallest width possible. The correct centre height is another major factor to avoid pips (control to ±0,1 mm).

When using R-/L-inserts, the feed rate should be reduced by approximately 30%.

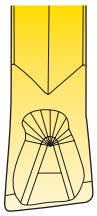
Convex or concave surfaces will be avoided, when using right or left hand inserts, by reducing the feed rate.



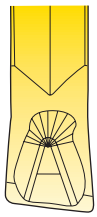
N



R



L



Chipbreakers

Chipbreakers

First choice for steel at low feed rates.

24° positive cutting rake angle.

Excellent chipbreaking.

-12

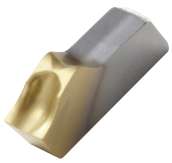


First choice for stainless steel.

First choice for steel at medium-high feed rates.

15° positive cutting rake angle with sharp edge.

-14



First choice for steel and cast iron in difficult conditions and/or high feed rates.

20° positive cutting rake angle.

Strong protection chamfer.

-16



Recommended feed rates

Radial infeed, f (mm/rev)

		Type N insert				Type R/L insert			
Insert width CW (mm)	Chip-breaker	Recom. initial value	Recom. limit value			Recom. initial value	Recom. limit value		
			min	–	max		min	–	max
1,40	-12	–	–		–	–	–		–
	-14	0,05	0,04		0,12	–	–		–
	-16	0,06	0,04		0,12	–	–		–
2,0	-12	–	–		–	–	–		–
	-14	0,07	0,05		0,14	–	–		–
	-16	0,08	0,05		0,15	–	–		–
2,25	-12	–	–		–	–	–		–
	-14	0,09	0,05		0,16	–	–		–
	-16	0,10	0,05		0,20	–	–		–
2,5	-12	0,09	0,05		0,18	0,06	0,04		0,13
	-14	0,10	0,07		0,20	0,07	0,05		0,14
	-16	0,13	0,10		0,24	0,09	0,07		0,17
3,1	-12	0,10	0,05		0,20	0,07	0,04		0,14
	-14	0,13	0,08		0,24	0,09	0,06		0,17
	-16	0,18	0,12		0,28	0,13	0,08		0,20
4,1	-12	0,13	0,07		0,22	0,09	0,05		0,15
	-14	0,15	0,09		0,26	0,11	0,06		0,18
	-16	0,20	0,14		0,32	0,14	0,10		0,22
5,1	-12	0,15	0,08		0,26	0,11	0,06		0,18
	-14	0,18	0,10		0,34	0,13	0,07		0,24
	-16	0,23	0,16		0,40	0,16	0,11		0,28
6,3	-12	0,17	0,10		0,30	0,12	0,07		0,21
	-14	0,20	0,14		0,38	0,14	0,10		0,27
	-16	0,25	0,18		0,42	0,18	0,13		0,29

Grades

TGP35
Wear-resistant **Duratomic**® CVD-coated grade intended for parting-off of steel and cast iron at high cutting speeds.

TGP45
Wear-resistant **Duratomic**® CVD-coated grade intended for parting-off of steel and stainless steel at moderate to high cutting speeds.

T25M
Tough versatile CVD-coated grade intended for parting-off of steel, stainless steel and cast iron at moderate cutting speeds.

T350M
Tough versatile CVD-coated grade intended for parting-off in a variety of workpiece materials at moderate cutting speeds.

TGS2050
Hard and wear-resistant PVD-coated micrograin grade intended for parting-off of superalloys. First choice for ISO-S materials and CoCr-alloys.

CP500
Tough, versatile PVD-coated micrograin grade intended for parting-off of steel, stainless steel, superalloys and titanium at low to moderate cutting speeds. First choice in stainless steel. Provides more wear resistance compared to CP600

CP600
Very tough PVD-coated fine-grain grade intended for parting-off of steel, stainless steel, superalloys and titanium at low cutting speeds. Well-suited in interrupted cuts. Universal choice.

HX
Uncoated wear-resistant hard grade intended for parting-off of hardened steels, superalloys, titanium alloys and non-ferrous materials.

Application recommendations

Easy conditions: pre-machined surface, shallow grooves etc.

Difficult conditions: raw surface, deep grooves etc.

To centre

Easy conditions	Difficult conditions
I2 CP500	I6 CP600
I4 CP500	I6 CP600
I2 TGP35	I6 T25M
I4 HX	I6 HX
I6 TGS2050	I4 CP600
I6 TGS2050	I6 T350M

Tube

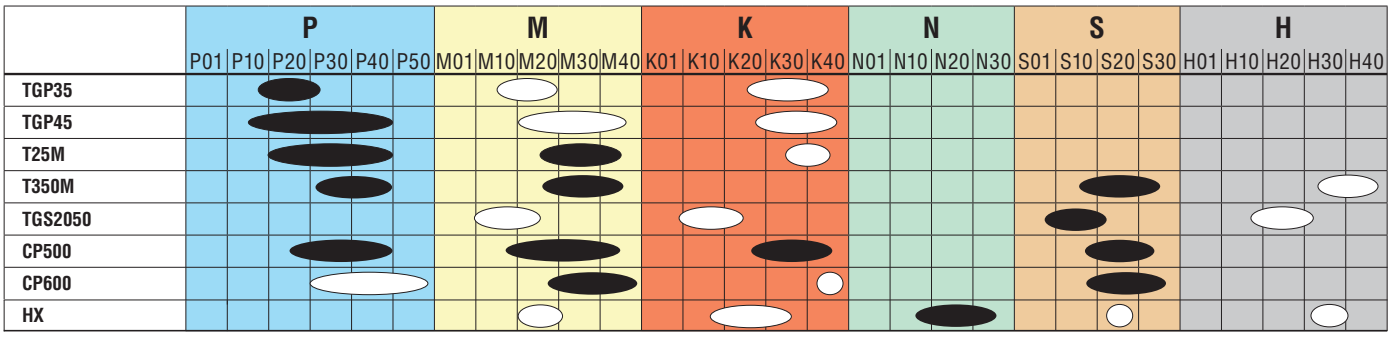
Easy conditions	Difficult conditions
I6 TGP45	I6 CP600
I4 CP500	I6 CP600
I2 TGP35	I6 TGP45
I4 HX	I6 HX
I6 TGS2050	I6 CP600
I6 TGS2050	I6 T350M

Parting-off – Grades Secolor

The chart belows shows application areas for grades available in the Parting-off system 150.10.
The black areas in the chart indicate a grade's main ISO application groups and the white areas indicate other supplementary application groups.

Indicative ISO classification of the grades

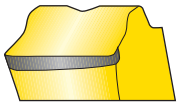
Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30



Troubleshooting

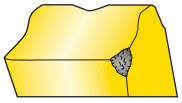
Flank wear

Reduce the cutting speed.
Select a more wear resistant grade.



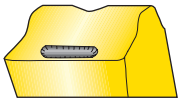
Insert fracture

Reduce the feed rate.
Select a tougher grade.
Select a stronger chipbreaker.



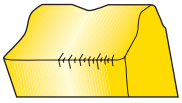
Crater wear

Use a coolant.
Select a more wear resistant grade.
Reduce the cutting speed.
Reduce the feed rate.



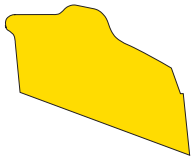
Comb cracks

Reduce the cutting speed.
Reduce the feed rate.
Ensure that the coolant flow is adequate and constant. If not, shut off the coolant.



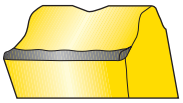
Plastic deformation

Use a coolant.
Select a more wear resistant grade.
Reduce the cutting speed.
Reduce the feed rate.



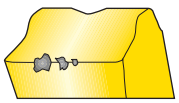
Built-up edge

Increase the cutting speed.
Increase the feed rate.
Do not use coolant.



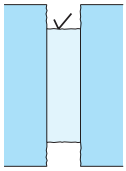
Edge chipping

Select a tougher grade.
Check the workpiece mounting.
Check the cutting speed.



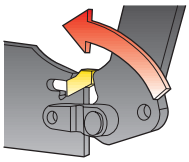
Poor finish

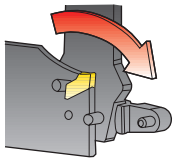
Reduce the feed rate.
Increase the cutting speed.
Use a coolant.
Improve the stability.
Check the alignment of the tool.



Change of insert

Inserts are changed with the aid of key 150.10A-150.





Cutting speed, v_c (m/min)

In this section a recommended cutting speed is indicated under specified conditions.
Use the tables beginning on page(s) 1034 to classify the workpiece material into a SMG.
The cutting data tables provide a recommendation of chipbreaker and a start value for feed rate (f) and cutting speed (v_c) for selected cutting width (CW).
The recommended cutting speeds in the tables are calculated for 15 minutes tool life with use of external flood coolant.
In order to increase the accuracy towards the actual cutting conditions and requirements of the applications the recommendation is to use
My Pages – Suggest on www.secotools.com

v_c = cutting speed (m/min)

CW = cutting width (mm)

f = feed rate (mm/rev)

Grade TGP35

SMG		CW = 2,5 *CW = 0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c
P1	-16 TGP35	0,14 *0.0055*	310 *1025*	0,19 *0.0075*	265 *870*	0,22 *0.0085*	235 *770*	0,28 *0.011*	190 *620*
P2	-16 TGP35	0,14 *0.0055*	305 *1000*	0,20 *0.0080*	250 *820*	0,22 *0.0085*	230 *750*	0,28 *0.011*	185 *610*
P3	-16 TGP35	0,14 *0.0055*	260 *850*	0,19 *0.0075*	220 *720*	0,22 *0.0085*	200 *660*	0,26 *0.010*	170 *560*
P4	-16 TGP35	0,13 *0.0050*	235 *770*	0,18 *0.0070*	200 *660*	0,20 *0.0080*	185 *610*	0,26 *0.010*	150 *490*
P5	-16 TGP35	0,13 *0.0050*	225 *740*	0,18 *0.0070*	190 *620*	0,20 *0.0080*	180 *590*	0,26 *0.010*	140 *460*
P6	-16 TGP35	0,13 *0.0050*	255 *840*	0,18 *0.0070*	215 *710*	0,20 *0.0080*	200 *660*	0,25 *0.010*	165 *540*
P7	-16 TGP35	0,13 *0.0050*	240 *790*	0,18 *0.0070*	205 *670*	0,20 *0.0080*	190 *620*	0,25 *0.010*	155 *510*
P8	-16 TGP35	0,14 *0.0055*	220 *720*	0,19 *0.0075*	185 *610*	0,22 *0.0085*	165 *540*	0,26 *0.010*	140 *460*
P11	-16 TGP35	0,13 *0.0050*	230 *750*	0,18 *0.0070*	200 *660*	0,20 *0.0080*	185 *610*	0,25 *0.010*	150 *490*
P12	-16 TGP35	0,090 *0.0036*	145 *475*	0,12 *0.0048*	140 *460*	0,14 *0.0055*	130 *425*	0,17 *0.0065*	120 *395*
M1	-14 TGP35	0,10 *0.0040*	180 *590*	0,13 *0.0050*	160 *520*	0,15 *0.0060*	145 *475*	0,19 *0.0075*	120 *395*
M2	-14 TGP35	0,090 *0.0036*	150 *490*	0,12 *0.0048*	135 *445*	0,13 *0.0050*	130 *425*	0,18 *0.0070*	100 *330*
M3	-14 TGP35	0,075 *0.0030*	120 *395*	0,095 *0.0038*	110 *360*	0,11 *0.0044*	105 *345*	0,14 *0.0055*	90 *295*
M4	-14 TGP35	0,065 *0.0026*	90 *295*	0,080 *0.0032*	85 *280*	0,095 *0.0038*	85 *280*	0,12 *0.0048*	75 *245*
M5	-14 TGP35	0,065 *0.0026*	75 *245*	0,080 *0.0032*	75 *245*	0,095 *0.0038*	70 *230*	0,12 *0.0048*	65 *215*

Grade TGP45

SMG		CW = 1,4 *CW = 0.055*		CW = 2,0-2,5 *CW = 0.079-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	-16 TGP45	0,080 *0.0032*	300 *980*	0,12 *0.0048*	290 *950*	0,19 *0.0075*	235 *770*	0,22 *0.0085*	210 *690*	0,28 *0.011*	165 *540*
P2	-16 TGP45	0,080 *0.0032*	290 *950*	0,13 *0.0050*	275 *900*	0,20 *0.0080*	220 *720*	0,22 *0.0085*	205 *670*	0,28 *0.011*	165 *540*
P3	-16 TGP45	0,075 *0.0030*	250 *820*	0,12 *0.0048*	245 *800*	0,19 *0.0075*	195 *640*	0,22 *0.0085*	175 *570*	0,26 *0.010*	150 *490*
P4	-16 TGP45	0,075 *0.0030*	220 *720*	0,12 *0.0048*	215 *710*	0,18 *0.0070*	180 *590*	0,20 *0.0080*	165 *540*	0,26 *0.010*	130 *425*
P5	-16 TGP45	0,075 *0.0030*	210 *690*	0,11 *0.0044*	210 *690*	0,18 *0.0070*	170 *560*	0,20 *0.0080*	160 *520*	0,26 *0.010*	125 *410*
P6	-16 TGP45	0,070 *0.0028*	230 *750*	0,11 *0.0044*	235 *770*	0,18 *0.0070*	190 *620*	0,20 *0.0080*	175 *570*	0,25 *0.010*	145 *475*
P7	-16 TGP45	0,070 *0.0028*	220 *720*	0,11 *0.0044*	220 *720*	0,18 *0.0070*	180 *590*	0,20 *0.0080*	165 *540*	0,25 *0.010*	140 *460*
P8	-16 TGP45	0,075 *0.0030*	210 *690*	0,12 *0.0048*	205 *670*	0,19 *0.0075*	165 *540*	0,22 *0.0085*	145 *475*	0,26 *0.010*	125 *410*
P11	-16 TGP45	0,070 *0.0028*	210 *690*	0,11 *0.0044*	215 *710*	0,18 *0.0070*	175 *570*	0,20 *0.0080*	160 *520*	0,25 *0.010*	135 *445*
P12	-16 TGP45	0,050 *0.0020*	110 *360*	0,080 *0.0032*	130 *425*	0,12 *0.0048*	125 *410*	0,14 *0.0055*	115 *375*	0,17 *0.0065*	105 *345*
M1	-14 TGP45	0,075 *0.0030*	170 *560*	0,095 *0.0038*	165 *540*	0,13 *0.0050*	140 *460*	0,15 *0.0060*	130 *425*	0,19 *0.0075*	105 *345*
M2	-14 TGP45	0,065 *0.0026*	140 *460*	0,085 *0.0034*	135 *445*	0,12 *0.0048*	120 *395*	0,13 *0.0050*	115 *375*	0,18 *0.0070*	90 *295*
M3	-14 TGP45	0,055 *0.0022*	105 *345*	0,070 *0.0028*	105 *345*	0,095 *0.0038*	100 *330*	0,11 *0.0044*	95 *310*	0,14 *0.0055*	80 *260*
M4	-14 TGP45	0,046 *0.0018*	75 *245*	0,060 *0.0024*	80 *260*	0,080 *0.0032*	75 *245*	0,095 *0.0038*	75 *245*	0,12 *0.0048*	65 *215*
M5	-14 TGP45	0,046 *0.0018*	60 *195*	0,060 *0.0024*	65 *215*	0,080 *0.0032*	65 *215*	0,095 *0.0038*	60 *195*	0,12 *0.0048*	55 *180*

Grade TGS2050

SMG		CW = 1,4 *CW = 0.055*		CW = 2,0-2,5 *CW = 0.079-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*	
		f	v_c	f	v_c	f	v_c	f	v_c
M1	-14 TGS2050	0,075 *0.0030*	200 *660*	0,095 *0.0038*	195 *640*	0,13 *0.0050*	170 *560*	0,15 *0.0060*	155 *510*
M2	-14 TGS2050	0,065 *0.0026*	160 *520*	0,085 *0.0034*	160 *520*	0,12 *0.0048*	145 *475*	0,13 *0.0050*	135 *445*
M3	-14 TGS2050	0,055 *0.0022*	115 *375*	0,070 *0.0028*	125 *410*	0,095 *0.0038*	120 *395*	0,11 *0.0044*	115 *375*
M4	-14 TGS2050	0,046 *0.0018*	80 *260*	0,060 *0.0024*	90 *295*	0,080 *0.0032*	90 *295*	0,095 *0.0038*	90 *295*
M5	-14 TGS2050	0,046 *0.0018*	70 *230*	0,060 *0.0024*	75 *245*	0,080 *0.0032*	75 *245*	0,095 *0.0038*	75 *245*
S1	-16 TGS2050	0,050 *0.0020*	36 *120*	0,080 *0.0032*	31 *100*	0,13 *0.0050*	27 *90*	0,14 *0.0055*	26 *85*
S2	-16 TGS2050	0,046 *0.0018*	29 *95*	0,060 *0.0024*	27 *90*	0,080 *0.0032*	25 *80*	0,095 *0.0038*	24 *80*
S3	-16 TGS2050	0,044 *0.0017*	26 *85*	0,055 *0.0022*	24 *80*	0,075 *0.0030*	22 *70*	0,085 *0.0034*	21 *70*
S11	-16 TGS2050	0,055 *0.0022*	50 *165*	0,070 *0.0028*	47 *155*	0,095 *0.0038*	43 *140*	0,11 *0.0044*	41 *135*
S12	-16 TGS2050	0,055 *0.0022*	39 *130*	0,070 *0.0028*	36 *120*	0,095 *0.0038*	33 *110*	0,11 *0.0044*	31 *100*
S13	-16 TGS2050	0,046 *0.0018*	31 *100*	0,060 *0.0024*	29 *95*	0,080 *0.0032*	27 *90*	0,095 *0.0038*	25 *80*

Grade T25M

SMG		CW = 2,25-2,5 *CW = 0.089-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c
P1	-16 T25M	0,14 *0.0055*	250 *820*	0,19 *0.0075*	210 *690*	0,22 *0.0085*	190 *620*	0,28 *0.011*	150 *490*
P2	-16 T25M	0,14 *0.0055*	245 *800*	0,20 *0.0080*	200 *660*	0,22 *0.0085*	185 *610*	0,28 *0.011*	145 *475*
P3	-16 T25M	0,14 *0.0055*	210 *690*	0,19 *0.0075*	175 *570*	0,22 *0.0085*	160 *520*	0,26 *0.010*	135 *445*
P4	-16 T25M	0,13 *0.0050*	190 *620*	0,18 *0.0070*	160 *520*	0,20 *0.0080*	150 *490*	0,26 *0.010*	120 *395*
P5	-16 T25M	0,13 *0.0050*	180 *590*	0,18 *0.0070*	155 *510*	0,20 *0.0080*	140 *460*	0,26 *0.010*	115 *375*
P6	-16 T25M	0,13 *0.0050*	200 *660*	0,18 *0.0070*	170 *560*	0,20 *0.0080*	160 *520*	0,25 *0.010*	130 *425*
P7	-16 T25M	0,13 *0.0050*	190 *620*	0,18 *0.0070*	165 *540*	0,20 *0.0080*	150 *490*	0,25 *0.010*	125 *410*
P8	-16 T25M	0,14 *0.0055*	175 *570*	0,19 *0.0075*	150 *490*	0,22 *0.0085*	135 *445*	0,26 *0.010*	115 *375*
P11	-16 T25M	0,13 *0.0050*	185 *610*	0,18 *0.0070*	160 *520*	0,20 *0.0080*	145 *475*	0,25 *0.010*	120 *395*
P12	-16 T25M	0,090 *0.0036*	115 *375*	0,12 *0.0048*	110 *360*	0,14 *0.0055*	105 *345*	0,17 *0.0065*	95 *310*
M1	-14 T25M	0,10 *0.0040*	145 *475*	0,13 *0.0050*	125 *410*	0,15 *0.0060*	115 *375*	0,19 *0.0075*	95 *310*
M2	-14 T25M	0,090 *0.0036*	120 *395*	0,12 *0.0048*	105 *345*	0,13 *0.0050*	100 *330*	0,18 *0.0070*	80 *260*
M3	-14 T25M	0,075 *0.0030*	95 *310*	0,095 *0.0038*	90 *295*	0,11 *0.0044*	85 *280*	0,14 *0.0055*	75 *245*
M4	-14 T25M	0,065 *0.0026*	70 *230*	0,080 *0.0032*	70 *230*	0,095 *0.0038*	65 *215*	0,12 *0.0048*	60 *195*
M5	-14 T25M	0,065 *0.0026*	60 *195*	0,080 *0.0032*	60 *195*	0,095 *0.0038*	55 *180*	0,12 *0.0048*	50 *165*

Grade T350M

SMG		CW = 2,0-2,25 *CW = 0.079-0.089*		CW = 2,5 *CW = 0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*	
		f	v_c	f	v_c	f	v_c	f	v_c
P1	-16 T350M	0,12 *0.0048*	245 *800*	0,14 *0.0055*	230 *750*	0,19 *0.0075*	195 *640*	0,22 *0.0085*	175 *570*
P2	-16 T350M	0,13 *0.0050*	230 *750*	0,14 *0.0055*	225 *740*	0,20 *0.0080*	185 *610*	0,22 *0.0085*	170 *560*
P3	-16 T350M	0,12 *0.0048*	205 *670*	0,14 *0.0055*	195 *640*	0,19 *0.0075*	165 *540*	0,22 *0.0085*	145 *475*
P4	-16 T350M	0,12 *0.0048*	180 *590*	0,13 *0.0050*	175 *570*	0,18 *0.0070*	150 *490*	0,20 *0.0080*	140 *460*
P5	-16 T350M	0,11 *0.0044*	175 *570*	0,13 *0.0050*	165 *540*	0,18 *0.0070*	145 *475*	0,20 *0.0080*	130 *425*
P6	-16 T350M	0,11 *0.0044*	195 *640*	0,13 *0.0050*	190 *620*	0,18 *0.0070*	160 *520*	0,20 *0.0080*	150 *490*
P7	-16 T350M	0,11 *0.0044*	185 *610*	0,13 *0.0050*	175 *570*	0,18 *0.0070*	150 *490*	0,20 *0.0080*	140 *460*
P8	-16 T350M	0,12 *0.0048*	170 *560*	0,14 *0.0055*	165 *540*	0,19 *0.0075*	140 *460*	0,22 *0.0085*	125 *410*
P11	-16 T350M	0,11 *0.0044*	180 *590*	0,13 *0.0050*	170 *560*	0,18 *0.0070*	145 *475*	0,20 *0.0080*	135 *445*
P12	-16 T350M	0,080 *0.0032*	110 *360*	0,090 *0.0036*	110 *360*	0,12 *0.0048*	105 *345*	0,14 *0.0055*	95 *310*
M1	-14 T350M	0,095 *0.0038*	135 *445*	0,10 *0.0040*	135 *445*	0,13 *0.0050*	120 *395*	0,15 *0.0060*	110 *360*
M2	-14 T350M	0,085 *0.0034*	115 *375*	0,090 *0.0036*	110 *360*	0,12 *0.0048*	100 *330*	0,13 *0.0050*	95 *310*
M3	-14 T350M	0,070 *0.0028*	90 *295*	0,075 *0.0030*	90 *295*	0,095 *0.0038*	85 *280*	0,11 *0.0044*	80 *260*
M4	-14 T350M	0,060 *0.0024*	65 *215*	0,065 *0.0026*	65 *215*	0,080 *0.0032*	65 *215*	0,095 *0.0038*	60 *195*
M5	-14 T350M	0,060 *0.0024*	55 *180*	0,065 *0.0026*	55 *180*	0,080 *0.0032*	55 *180*	0,095 *0.0038*	50 *165*

Grade CP500

SMG		CW = 1,4 *CW = 0.055*		CW = 2,0-2,5 *CW = 0.079-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
P1	-16 CP500	0,080 *0.0032*	205 *670*	0,12 *0.0048*	180 *590*	0,19 *0.0075*	150 *490*	0,22 *0.0085*	140 *460*	0,28 *0.011*	125 *410*
P2	-16 CP500	0,080 *0.0032*	200 *660*	0,13 *0.0050*	170 *560*	0,20 *0.0080*	145 *475*	0,22 *0.0085*	140 *460*	0,28 *0.011*	125 *410*
P3	-16 CP500	0,075 *0.0030*	175 *570*	0,12 *0.0048*	150 *490*	0,19 *0.0075*	125 *410*	0,22 *0.0085*	120 *395*	0,26 *0.010*	110 *360*
P4	-16 CP500	0,075 *0.0030*	155 *510*	0,12 *0.0048*	130 *425*	0,18 *0.0070*	115 *375*	0,20 *0.0080*	110 *360*	0,26 *0.010*	95 *310*
P5	-16 CP500	0,075 *0.0030*	145 *475*	0,11 *0.0044*	130 *425*	0,18 *0.0070*	110 *360*	0,20 *0.0080*	105 *345*	0,26 *0.010*	90 *295*
P6	-16 CP500	0,070 *0.0028*	170 *560*	0,11 *0.0044*	145 *475*	0,18 *0.0070*	120 *395*	0,20 *0.0080*	115 *375*	0,25 *0.010*	105 *345*
P7	-16 CP500	0,070 *0.0028*	160 *520*	0,11 *0.0044*	140 *460*	0,18 *0.0070*	115 *375*	0,20 *0.0080*	110 *360*	0,25 *0.010*	100 *330*
P8	-16 CP500	0,075 *0.0030*	145 *475*	0,12 *0.0048*	125 *410*	0,19 *0.0075*	105 *345*	0,22 *0.0085*	100 *330*	0,26 *0.010*	90 *295*
P11	-16 CP500	0,070 *0.0028*	155 *510*	0,11 *0.0044*	135 *445*	0,18 *0.0070*	110 *360*	0,20 *0.0080*	105 *345*	0,25 *0.010*	95 *310*
P12	-16 CP500	0,050 *0.0020*	100 *330*	0,080 *0.0032*	85 *280*	0,12 *0.0048*	75 *245*	0,14 *0.0055*	70 *230*	0,17 *0.0065*	65 *215*
M1	-14 CP500	0,075 *0.0030*	235 *770*	0,095 *0.0038*	225 *740*	0,13 *0.0050*	190 *620*	0,15 *0.0060*	175 *570*	0,19 *0.0075*	145 *475*
M2	-14 CP500	0,065 *0.0026*	190 *620*	0,085 *0.0034*	185 *610*	0,12 *0.0048*	160 *520*	0,13 *0.0050*	155 *510*	0,18 *0.0070*	120 *395*
M3	-14 CP500	0,055 *0.0022*	145 *475*	0,070 *0.0028*	145 *475*	0,095 *0.0038*	135 *445*	0,11 *0.0044*	130 *425*	0,14 *0.0055*	110 *360*
M4	-14 CP500	0,046 *0.0018*	105 *345*	0,060 *0.0024*	110 *360*	0,080 *0.0032*	105 *345*	0,095 *0.0038*	100 *330*	0,12 *0.0048*	90 *295*
M5	-14 CP500	0,046 *0.0018*	90 *295*	0,060 *0.0024*	90 *295*	0,080 *0.0032*	90 *295*	0,095 *0.0038*	85 *280*	0,12 *0.0048*	75 *245*
K1	-16 CP500	0,080 *0.0032*	190 *620*	0,13 *0.0050*	165 *540*	0,20 *0.0080*	140 *460*	0,22 *0.0085*	135 *445*	0,28 *0.011*	125 *410*
K2	-16 CP500	0,075 *0.0030*	165 *540*	0,11 *0.0044*	140 *460*	0,18 *0.0070*	115 *375*	0,20 *0.0080*	105 *345*	0,26 *0.010*	90 *295*
K3	-16 CP500	0,075 *0.0030*	140 *460*	0,11 *0.0044*	120 *395*	0,18 *0.0070*	95 *310*	0,20 *0.0080*	90 *295*	0,26 *0.010*	80 *260*
K4	-16 CP500	0,075 *0.0030*	130 *425*	0,11 *0.0044*	115 *375*	0,18 *0.0070*	90 *295*	0,20 *0.0080*	85 *280*	0,26 *0.010*	75 *245*
K5	-16 CP500	0,065 *0.0026*	80 *260*	0,10 *0.0040*	70 *230*	0,16 *0.0065*	55 *180*	0,18 *0.0070*	55 *180*	0,22 *0.0085*	48 *155*
K6	-16 CP500	0,075 *0.0030*	120 *395*	0,11 *0.0044*	105 *345*	0,18 *0.0070*	90 *295*	0,20 *0.0080*	85 *280*	0,26 *0.010*	80 *260*
K7	-16 CP500	0,065 *0.0026*	105 *345*	0,10 *0.0040*	90 *295*	0,16 *0.0065*	75 *245*	0,18 *0.0070*	70 *230*	0,22 *0.0085*	60 *195*
N11	-14 CP500	0,095 *0.0038*	125 *410*	0,12 *0.0048*	115 *375*	0,16 *0.0065*	105 *345*	0,19 *0.0075*	95 *310*	0,25 *0.010*	85 *280*
S1	-14 CP500	0,046 *0.0018*	26 *85*	0,060 *0.0024*	24 *80*	0,080 *0.0032*	22 *70*	0,095 *0.0038*	21 *70*	0,12 *0.0048*	19 *60*
S2	-14 CP500	0,046 *0.0018*	22 *70*	0,060 *0.0024*	21 *70*	0,080 *0.0032*	19 *60*	0,095 *0.0038*	18 *60*	0,12 *0.0048*	17 *55*
S3	-14 CP500	0,044 *0.0017*	20 *65*	0,055 *0.0022*	18 *60*	0,075 *0.0030*	17 *55*	0,085 *0.0034*	16 *50*	0,12 *0.0048*	14 *46*

Grade CP600

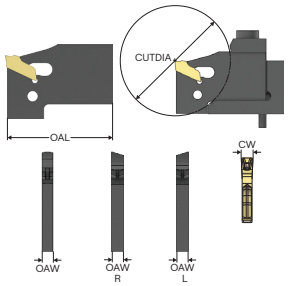
SMG		CW = 1,4 *CW = 0.055*		CW = 2,0-2,5 *CW = 0.079-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
M1	-14 CP600	0,075 *0.0030*	240 *790*	0,095 *0.0038*	220 *720*	0,13 *0.0050*	180 *590*	0,16 *0.0065*	150 *490*	0,19 *0.0075*	130 *425*
M2	-14 CP600	0,065 *0.0026*	200 *660*	0,085 *0.0034*	185 *610*	0,12 *0.0048*	155 *510*	0,15 *0.0060*	130 *425*	0,18 *0.0070*	110 *360*
M3	-14 CP600	0,055 *0.0022*	155 *510*	0,070 *0.0028*	150 *490*	0,095 *0.0038*	135 *445*	0,12 *0.0048*	115 *375*	0,14 *0.0055*	105 *345*
M4	-14 CP600	0,046 *0.0018*	110 *360*	0,060 *0.0024*	115 *375*	0,085 *0.0034*	105 *345*	0,10 *0.0040*	95 *310*	0,12 *0.0048*	85 *280*
M5	-14 CP600	0,046 *0.0018*	95 *310*	0,060 *0.0024*	95 *310*	0,085 *0.0034*	90 *295*	0,10 *0.0040*	80 *260*	0,12 *0.0048*	70 *230*

Grade HX

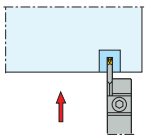
SMG		CW = 1,4 *CW = 0.055*		CW = 2,0-2,5 *CW = 0.079-0.098*		CW = 3 *CW = 0.118*		CW = 4 *CW = 0.157*		CW = 5-6 *CW = 0.197-0.236*	
		f	v_c	f	v_c	f	v_c	f	v_c	f	v_c
M1	-14 HX	0,075 *0.0030*	140 *460*	0,095 *0.0038*	125 *410*	0,13 *0.0050*	115 *375*	0,15 *0.0060*	110 *360*	0,19 *0.0075*	100 *330*
M2	-14 HX	0,065 *0.0026*	115 *375*	0,085 *0.0034*	105 *345*	0,12 *0.0048*	95 *310*	0,13 *0.0050*	90 *295*	0,18 *0.0070*	80 *260*
M3	-14 HX	0,055 *0.0022*	90 *295*	0,070 *0.0028*	85 *280*	0,095 *0.0038*	75 *245*	0,11 *0.0044*	75 *245*	0,14 *0.0055*	65 *215*
M4	-14 HX	0,046 *0.0018*	70 *230*	0,060 *0.0024*	65 *215*	0,080 *0.0032*	60 *195*	0,095 *0.0038*	60 *195*	0,12 *0.0048*	55 *180*
M5	-14 HX	0,046 *0.0018*	60 *195*	0,060 *0.0024*	55 *180*	0,080 *0.0032*	50 *165*	0,095 *0.0038*	48 *155*	0,12 *0.0048*	44 *145*
K1	-16 HX	0,080 *0.0032*	140 *460*	0,13 *0.0050*	115 *375*	0,20 *0.0080*	100 *330*	0,22 *0.0085*	95 *310*	0,28 *0.011*	85 *280*
K2	-16 HX	0,075 *0.0030*	120 *395*	0,11 *0.0044*	105 *345*	0,18 *0.0070*	90 *295*	0,20 *0.0080*	85 *280*	0,26 *0.010*	75 *245*
K3	-16 HX	0,075 *0.0030*	105 *345*	0,11 *0.0044*	90 *295*	0,18 *0.0070*	75 *245*	0,20 *0.0080*	70 *230*	0,26 *0.010*	65 *215*
K4	-16 HX	0,075 *0.0030*	100 *330*	0,11 *0.0044*	85 *280*	0,18 *0.0070*	70 *230*	0,20 *0.0080*	70 *230*	0,26 *0.010*	60 *195*
K5	-16 HX	0,065 *0.0026*	60 *195*	0,10 *0.0040*	55 *180*	0,16 *0.0065*	45 *150*	0,18 *0.0070*	43 *140*	0,22 *0.0085*	39 *130*
K6	-16 HX	0,075 *0.0030*	85 *280*	0,11 *0.0044*	75 *245*	0,18 *0.0070*	65 *215*	0,20 *0.0080*	60 *195*	0,26 *0.010*	55 *180*
K7	-16 HX	0,065 *0.0026*	75 *245*	0,10 *0.0040*	70 *230*	0,16 *0.0065*	55 *180*	0,18 *0.0070*	55 *180*	0,22 *0.0085*	50 *165*
N1	-14 HX	0,095 *0.0038*	410 *1350*	0,12 *0.0048*	380 *1250*	0,16 *0.0065*	340 *1125*	0,19 *0.0075*	315 *1025*	0,25 *0.010*	280 *920*
N2	-14 HX	0,095 *0.0038*	330 *1075*	0,12 *0.0048*	305 *1000*	0,16 *0.0065*	275 *900*	0,19 *0.0075*	255 *840*	0,25 *0.010*	225 *740*
N3	-14 HX	0,095 *0.0038*	220 *720*	0,12 *0.0048*	205 *670*	0,16 *0.0065*	180 *590*	0,19 *0.0075*	170 *560*	0,25 *0.010*	150 *490*
N11	-14 HX	0,095 *0.0038*	255 *840*	0,12 *0.0048*	230 *750*	0,16 *0.0065*	210 *690*	0,19 *0.0075*	195 *640*	0,25 *0.010*	170 *560*
S1	-14 HX	0,046 *0.0018*	27 *90*	0,060 *0.0024*	25 *80*	0,080 *0.0032*	23 *75*	0,095 *0.0038*	22 *70*	0,12 *0.0048*	20 *65*
S2	-14 HX	0,046 *0.0018*	22 *70*	0,060 *0.0024*	20 *65*	0,080 *0.0032*	19 *60*	0,095 *0.0038*	18 *60*	0,12 *0.0048*	16 *50*
S3	-14 HX	0,044 *0.0017*	19 *60*	0,055 *0.0022*	18 *60*	0,075 *0.0030*	16 *50*	0,085 *0.0034*	16 *50*	0,12 *0.0048*	14 *46*
S11	-14 HX	0,055 *0.0022*	38 *125*	0,070 *0.0028*	35 *115*	0,095 *0.0038*	32 *105*	0,11 *0.0044*	30 *100*	0,14 *0.0055*	28 *90*
S12	-14 HX	0,055 *0.0022*	29 *95*	0,070 *0.0028*	27 *90*	0,095 *0.0038*	25 *80*	0,11 *0.0044*	23 *75*	0,14 *0.0055*	21 *70*
S13	-14 HX	0,046 *0.0018*	23 *75*	0,060 *0.0024*	22 *70*	0,080 *0.0032*	20 *65*	0,095 *0.0038*	19 *60*	0,12 *0.0048*	18 *60*
H5	-16 HX	0,050 *0.0020*	45 *150*	0,080 *0.0032*	40 *130*	0,12 *0.0048*	35 *115*	0,14 *0.0055*	33 *110*	0,17 *0.0065*	30 *100*

HSS-blade 150.10A-15 JETI for Parting-off – Metric/ Inch





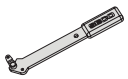
R/L150.10
KAPR = 90,0 °



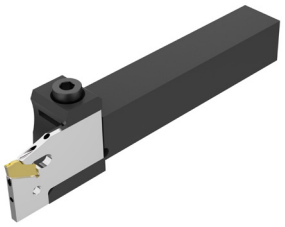
—Right-hand version shown
—For inserts program, see page(s) 947, 948
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand holder
—For Jetstream function Left-hand blade must only be used with Left-hand holder
—For ISO attribute explanation, see page 82

Designation	Item number	OAL	OAW	CUTDIA	CP	Weight	CW	CTWS
		mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	
150.10A-15-2RJETI	02885702	33 *1.303*	1,8 *0.071*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-15-2LJETI	02885696	33 *1.303*	1,8 *0.071*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-15-2.5RJETI	02885690	33 *1.303*	2,0 *0.079*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-15-2.5LJETI	02884781	33 *1.303*	2,0 *0.079*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-15-3RJETI	02885689	33 *1.303*	2,4 *0.094*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
150.10A-15-3LJETI	02884780	33 *1.303*	2,4 *0.094*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
R150.10A-15-4JETI	02885688	33 *1.303*	3,4 *0.134*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	4,0 *0.157*	150.10-4
L150.10A-15-4JETI	02884779	33 *1.303*	3,4 *0.134*	38,0 *1.496*	200 bar *2901*	0,1 *0.220*	4,0 *0.157*	150.10-4

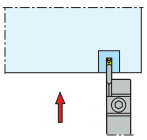
Accessories

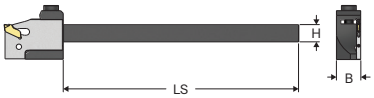
For	Key
	
150.10A-..	150.10A-150
R/L150.10A-..	150.10A-150

Toolblock R/L150.10-..15 JETI for HSS-blade 150.10A-..15JETI for Parting-off – Metric



R/L150.10

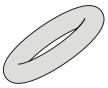
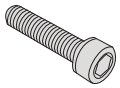




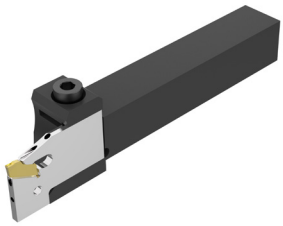
—Right-hand version shown
—For blades program, see page(s) 931
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand holder
—For Jetstream function Left-hand blade must only be used with Left-hand holder
—For ISO attribute explanation, see page 82

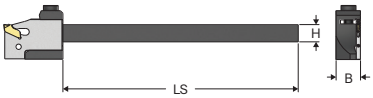
Designation	Item number	H	B	LS	CP	Weight
		mm	mm	mm	bar	kg
R150.10-1010-15JETI	03002477	10	10	136	200 bar	0,2
R150.10-1212-15JETI	03002478	12	12	136	200 bar	0,2
R150.10-1616-15JETI	03002479	16	16	81	200 bar	0,3
L150.10-1010-15JETI	03002482	10	10	136	200 bar	0,2
L150.10-1212-15JETI	03002483	12	12	136	200 bar	0,2
L150.10-1616-15JETI	03002484	16	16	81	200 bar	0,3

Spare Parts, included in delivery

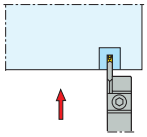
For	Key	Ring	Screw
			
R/L150.10-..	4SMS795	ORING-4X1.5	MC6S5X18

Toolblock R/L150.10-..15 JETI for HSS-blade 150.10A-..15JETI for Parting-off – Inch





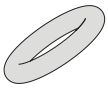
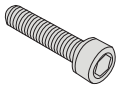
R/L150.10



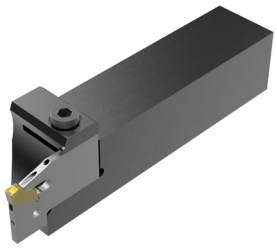
—Right-hand version shown
—For blades program, see page(s) 931
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand holder
—For Jetstream function Left-hand blade must only be used with Left-hand holder
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LS	CP	Weight
		inch	inch	inch	psi	lbs
R150.10-0500-15JETI	03128625	0.500	0.500	3.150	2901	0.440
R150.10-0625-15JETI	03128627	0.625	0.625	3.150	2901	0.660
R150.10-0750-15JETI	03128629	0.750	0.750	3.150	2901	0.660
R150.10-1000-15JETI	03128631	1.000	1.000	4.646	2901	1.540
L150.10-0500-15JETI	03128626	0.500	0.500	3.150	2901	0.440
L150.10-0625-15JETI	03128628	0.625	0.625	3.150	2901	0.660
L150.10-0750-15JETI	03128630	0.750	0.750	3.150	2901	0.660
L150.10-1000-15JETI	03128632	1.000	1.000	4.646	2901	1.540

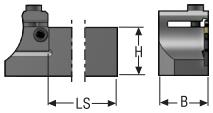
Spare Parts, included in delivery

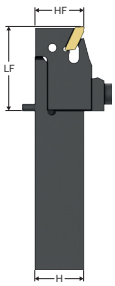
For	Clamp key	Plug	Ring	Screw
				
...-0500/0625	3/16SMS875	–	ORING-4X1.5	UC6S1/4UNFX1
...-0750/1000	3/16SMS875	JET-P1/8-5MM	ORING-4X1.5	UC6S1/4UNFX1

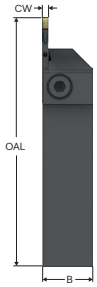
Toolblock R/L150.10-..15JETI for HSS-blade 150.10A..15JETI for Parting-off, compatible with JETI adapters – Metric

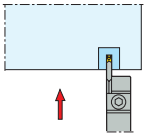


Toolblock R/L 150.10-15-.JETI





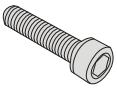
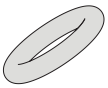




—Right-hand version shown
—For blades program, see page(s) 931
—For suitable adapter, see page(s) 989-1000
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand holder
—For Jetstream function Left-hand blade must only be used with Left-hand holder
—For ISO attribute explanation, see page 82

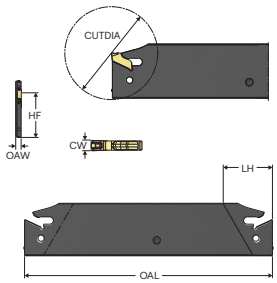
Designation	Item number	H	B	LS	OAL	LF	CP	Weight
		mm	mm	mm	mm	mm	bar	kg
R150.10-2020X-15JETI	03245886	20	20	64	98	34	200 bar	0,3
R150.10-2525X-15JETI	03245888	25	25	84	118	34	200 bar	0,5
L150.10-2020X-15JETI	03245885	20	20	64	98	34	200 bar	0,3
L150.10-2525X-15JETI	03245887	25	25	84	118	34	200 bar	0,5

Spare Parts, included in delivery

For	Clamp key	Clamp screw	O-ring	Plug	Plug screw
					
R/L150.10-..X	4SMS795	MC6S5X18	ORING-4X1.5	JET-P1/8-5MM	P6SS6X6

HSS-blade 150.10A-20/25 JETI for Parting-off – Metric/ Inch





—Right-hand version of blade shown
—For inserts program, see page(s) 947, 948
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand holder
—For Jetstream function Left-hand blade must only be used with Left-hand holder
—For ISO attribute explanation, see page 82

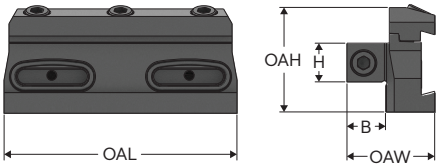
Designation	Item number	OAL	OAW	HF	LH	CUTDIA	CP	Weight	CW	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	mm *inch*	
150.10A-20-2RJETI	03002649	120 *4.724*	1,8 *0.071*	21,4 *0.843*	24,0 *0.945*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-20-2.5RJETI	03002651	120 *4.724*	2,0 *0.079*	21,4 *0.843*	24,0 *0.945*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-20-3RJETI	03002653	120 *4.724*	2,4 *0.094*	21,4 *0.843*	–	92,0 *3.622*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
150.10A-20-4RJETI	03002655	120 *4.724*	3,4 *0.134*	21,4 *0.843*	–	98,0 *3.858*	200 bar *2901*	0,1 *0.220*	4,0 *0.157*	150.10-4
150.10A-20-2LJETI	03002650	120 *4.724*	1,8 *0.071*	21,4 *0.843*	24,0 *0.945*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-20-2.5LJETI	03002652	120 *4.724*	2,0 *0.079*	21,4 *0.843*	24,0 *0.945*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-20-3LJETI	03002654	120 *4.724*	2,4 *0.094*	21,4 *0.843*	–	98,0 *3.858*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
150.10A-20-4LJETI	03002656	120 *4.724*	3,4 *0.134*	21,4 *0.843*	–	98,0 *3.858*	200 bar *2901*	0,1 *0.220*	4,0 *0.157*	150.10-4
150.10A-25-2RJETI	03002661	150 *5.906*	1,8 *0.071*	25,0 *0.984*	25,0 *0.984*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-25-2.5RJETI	03002663	150 *5.906*	2,0 *0.079*	25,0 *0.984*	25,0 *0.984*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-25-3RJETI	03002665	150 *5.906*	2,4 *0.094*	24,96 *0.983*	25,0 *0.984*	122,0 *4.803*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
150.10A-25-4RJETI	03002667	150 *5.906*	3,4 *0.134*	25,0 *0.984*	25,0 *0.984*	122,0 *4.803*	200 bar *2901*	0,1 *0.220*	4,0 *0.157*	150.10-4
150.10A-25-5RJETI	03002669	150 *5.906*	4,4 *0.173*	25,0 *0.984*	–	122,0 *4.803*	200 bar *2901*	0,2 *0.440*	5,0 *0.197*	150.10-5
150.10A-25-6RJETI	03002671	150 *5.906*	5,7 *0.222*	25,0 *0.984*	–	122,0 *4.803*	200 bar *2901*	0,2 *0.440*	6,0 *0.236*	150.10-6
150.10A-25-2LJETI	03002662	150 *5.906*	1,8 *0.071*	25,0 *0.984*	25,0 *0.984*	35,0 *1.378*	200 bar *2901*	0,08 *0.180*	2,0 *0.079*	150.10-2
150.10A-25-2.5LJETI	03002664	150 *5.906*	2,0 *0.079*	25,0 *0.984*	25,0 *0.984*	35,0 *1.378*	200 bar *2901*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-25-3LJETI	03002666	150 *5.906*	2,4 *0.094*	24,96 *0.983*	25,0 *0.984*	122,0 *4.803*	200 bar *2901*	0,1 *0.220*	3,0 *0.118*	150.10-3
150.10A-25-4LJETI	03002668	150 *5.906*	3,4 *0.134*	25,0 *0.984*	25,0 *0.984*	122,0 *4.803*	200 bar *2901*	0,2 *0.440*	4,0 *0.157*	150.10-4
150.10A-25-5LJETI	03002670	150 *5.906*	4,4 *0.173*	25,0 *0.984*	–	122,0 *4.803*	200 bar *2901*	0,2 *0.440*	5,0 *0.197*	150.10-5
150.10A-25-6LJETI	03002672	150 *5.906*	5,7 *0.222*	25,0 *0.984*	–	122,0 *4.803*	200 bar *2901*	0,2 *0.440*	6,0 *0.236*	150.10-6

Accessories

For	Key
	
150.10A-..	150.10A-150

Toolblock R/L150.10-..20/25JETI for HSS-blade 150.10A-..20/25JETI for Parting-off – Metric

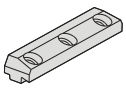
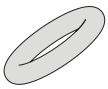




—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

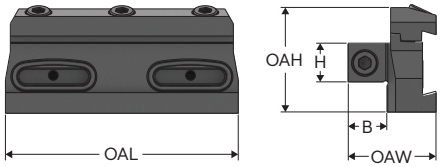
Designation	Item number	H	B	OAH	OAL	OAW	CP	Weight	CTWS
		mm	mm	mm	mm	mm	bar	kg	
150.10-1616-20JETI	03191913	16,0	16,0	32,0	95	35,9	200 bar	0,6	Blade-20
150.10-2020-20JETI	03002495	20,0	20,0	32,0	95	39,8	120 bar	0,7	Blade-20
150.10-2020-25JETI	03002498	20,0	20,0	39,0	95	40,8	120 bar	0,8	Blade-25
150.10-2520-25JETI	03191914	25,0	20,0	42,0	95	39,8	120 bar	0,9	Blade-25
150.10-2525-25JETI	03002500	25,0	25,0	42,0	95	44,8	120 bar	1,0	Blade-25
150.10-3232-25JETI	03002502	32,0	32,0	49,0	95	51,8	120 bar	1,4	Blade-25

Spare Parts, included in delivery

For	Clamp	Key	O-ring	Plug	Screw
					
150.10-..	150.10-260	5SMS795	ORING-20X2	JET-P1/8-5MM	TCEI0620

Toolblock R/L150.10-..20/25JETI for HSS-blade 150.10A-..20/25JETI for Parting-off – Inch

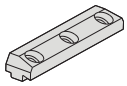
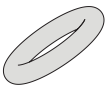




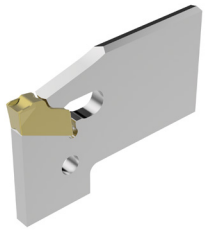
—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	OAH	OAL	OAW	CP	Weight	CTWS
		inch	inch	inch	inch	inch	psi	lbs	
150.10-10-20JETI	10005704	0.625	0.625	1.260	3.740	1.409	1741	1.320	Blade-20
150.10-12-20JETI	03002496	0.750	0.750	1.260	3.740	1.528	1741	1.540	Blade-20
150.10-12-25JETI	03002499	0.750	0.750	1.535	3.740	1.567	1741	1.760	Blade-25
150.10-16-20JETI	10005705	1.000	1.000	1.417	3.740	1.772	1741	2.200	Blade-20
150.10-16-25JETI	03002501	1.000	1.000	1.654	3.740	1.780	1741	2.200	Blade-25
150.10-20-25JETI	03002503	1.250	1.250	1.929	3.740	2.031	1741	3.090	Blade-25

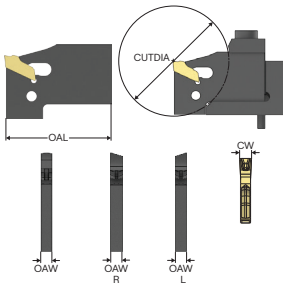
Spare Parts, included in delivery

For	Clamp	Key	O-ring	Plug	Screw
					
150.10-..	150.10-260	5SMS795	ORING-20X2	JET-P1/8-5MM	TCEI0620

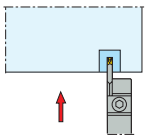
HSS-blade 150.10A-15 for Parting-off – Metric/ Inch



HSS-blade 150.10A-15



R/L150.10
KAPR = 90,0 °



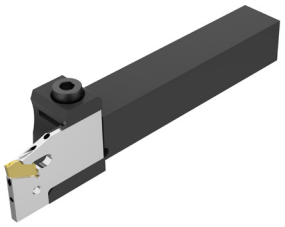
—For inserts program, see page(s) 947, 948
—For holder code key, see page(s) 919
—For ISO attribute explanation, see page 82

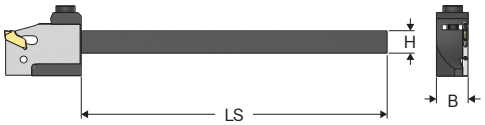
Designation	Item number	OAL	OAW	CUTDIA	Weight	CW	CTWS
		mm *inch*	mm *inch*	mm *inch*	kg *lbs*	mm *inch*	
150.10A-15-1.4	02578572	33 *1.299*	1,2 *0.047*	38,0 *1.496*	0,1 *0.220*	1,4 *0.055*	150.10-1.4
150.10A-15-2	02578575	33 *1.299*	1,8 *0.071*	38,0 *1.496*	0,1 *0.220*	2,0 *0.079*	150.10-2
150.10A-15-2.5	02578577	33 *1.299*	2,0 *0.079*	38,0 *1.496*	0,1 *0.220*	2,5 *0.098*	150.10-2.5
150.10A-15-3	02578578	33 *1.299*	2,4 *0.094*	38,0 *1.496*	0,1 *0.220*	3,0 *0.118*	150.10-3
R150.10A-15-4	02578596	33 *1.299*	3,4 *0.134*	38,0 *1.496*	0,1 *0.220*	4,0 *0.157*	150.10-4
L150.10A-15-4	02578594	33 *1.299*	3,4 *0.134*	38,0 *1.496*	0,1 *0.220*	4,0 *0.157*	150.10-4

Accessories

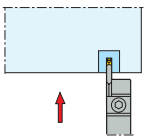
For	Key
	
150.10A	150.10A-150

Toolblock R/L150.10-..15 for HSS-blade 150.10A-..15 for Parting-off – Inch





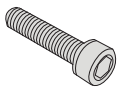
R/L150.10



—Right-hand version shown
—For blades program, see page(s) 939
—For holder code key, see page(s) 919
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LS	Weight
		inch	inch	inch	lbs
R150.10-0375-15	00047748	0.375	0.375	3.228	0.440
R150.10-0500-15	00047749	0.500	0.500	3.228	0.440
R150.10-0625-15	00048456	0.625	0.625	3.228	0.660
R150.10-0750-15	00048457	0.750	0.750	3.228	0.880
R150.10-1000-15	00048458	1.000	1.000	4.724	1.760
L150.10-0625-15	00048462	0.625	0.625	3.228	0.880
L150.10-0750-15	00048463	0.750	0.750	3.228	0.660
L150.10-1000-15	00048464	1.000	1.000	4.724	1.760

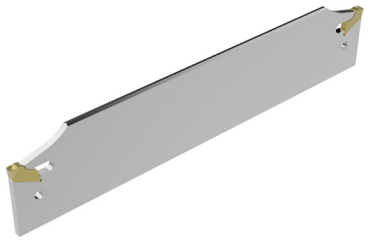
Spare Parts, included in delivery

For	Locking screw
	
R/L150.10-	UC6S1/4UNFX1

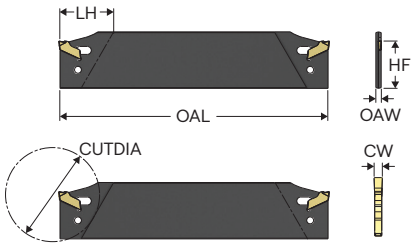
Accessories

For	Key
	
R/L150.10-	150.10A-150

HSS-blade 150.10A-20/25 for Parting-off – Metric/ Inch



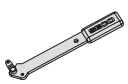
HSS-blade



—For inserts program, see page(s) 947, 948
—For holder code key, see page(s) 919
—For ISO attribute explanation, see page 82

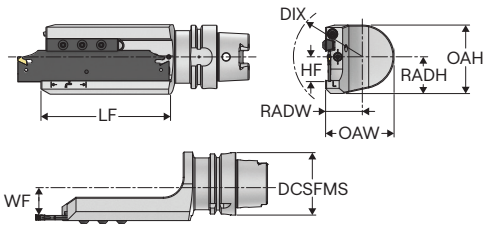
Designation	Item number	OAL	OAW	CUTDIA	HF	LH	Weight	CTWS
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*	
150.10A-20-1.4	02578579	120 *4.724*	1,2 *0.047*	35,0 *1.378*	21,4 *0.843*	24,0 *0.945*	0,1 *0.220*	150.10-1.4
150.10A-20-2	02578580	120 *4.724*	1,8 *0.071*	35,0 *1.378*	21,4 *0.843*	24,0 *0.945*	0,1 *0.220*	150.10-2
150.10A-20-2.5	02578581	120 *4.724*	2,0 *0.079*	35,0 *1.378*	21,4 *0.843*	24,0 *0.945*	0,1 *0.220*	150.10-2.5
150.10A-20-3	02578582	120 *4.724*	2,4 *0.094*	90,0 *3.543*	21,4 *0.843*	– –	0,1 *0.220*	150.10-3
150.10A-20-4	02578583	120 *4.724*	3,4 *0.134*	100,0 *3.937*	21,4 *0.843*	– –	0,1 *0.220*	150.10-4
150.10A-20-5	02578584	120 *4.724*	4,4 *0.173*	120,0 *4.724*	21,4 *0.843*	– –	0,1 *0.220*	150.10-5
150.10A-20-6	02578585	120 *4.724*	5,7 *0.222*	120,0 *4.724*	21,4 *0.843*	– –	0,2 *0.440*	150.10-6
150.10A-25-1.4	02578586	150 *5.906*	1,2 *0.047*	35,0 *1.378*	25,0 *0.984*	24,0 *0.945*	0,1 *0.220*	150.10-1.4
150.10A-25-2	02578587	150 *5.906*	1,8 *0.071*	35,0 *1.378*	25,0 *0.984*	24,0 *0.945*	0,1 *0.220*	150.10-2
150.10A-25-2.5	02578588	150 *5.906*	2,0 *0.079*	35,0 *1.378*	25,0 *0.984*	24,0 *0.945*	0,1 *0.220*	150.10-2.5
150.10A-25-3	02578589	150 *5.906*	2,4 *0.094*	120,0 *4.724*	25,0 *0.984*	– –	0,1 *0.220*	150.10-3
150.10A-25-4	02578590	150 *5.906*	3,4 *0.134*	140,0 *5.512*	25,0 *0.984*	– –	0,2 *0.440*	150.10-4
150.10A-25-5	02578592	150 *5.906*	4,4 *0.173*	160,0 *6.299*	25,0 *0.984*	– –	0,2 *0.440*	150.10-5
150.10A-25-6	02578593	150 *5.906*	5,7 *0.222*	160,0 *6.299*	25,0 *0.984*	– –	0,2 *0.440*	150.10-6
L150.10A-25-1.4	02578595	150 *5.906*	1,2 *0.047*	35,0 *1.378*	24,9 *0.980*	24,0 *0.945*	0,1 *0.220*	150.10-1.4

Accessories

For	Key
	
150.10A	150.10A-150

Adapters C.-R/L150.10-..20/25JETI for Parting-off – Metric/ Inch

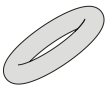
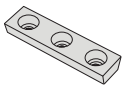




—Right-hand version shown
—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand adapter
—For Jetstream function Left-hand blade must only be used with Left-hand adapter
—For ISO attribute explanation, see page 82

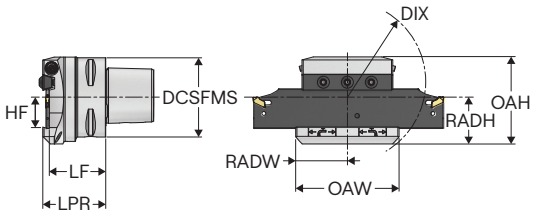
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-R150.10-122-20JETI	03134584	C5	50,0 *1.969*	85,0 *3.346*	122,0 *4.803*	20,0 *0.787*	26,0 *1.024*	56,0 *2.205*	58,5 *2.303*	31,0 *1.220*	32,0 *1.260*	70,0 *1015,3*	1,4 *3.090*
C5-L150.10-122-20JETI	03134583	C5	50,0 *1.969*	85,0 *3.346*	122,0 *4.803*	20,0 *0.787*	26,0 *1.024*	56,0 *2.205*	58,5 *2.303*	31,0 *1.220*	32,0 *1.260*	70,0 *1015,3*	1,4 *3.090*
C6-R150.10-160-25JETI	03134586	C6	63,0 *2.480*	100,0 *3.937*	160,0 *6.299*	25,0 *0.984*	32,0 *1.260*	69,5 *2.736*	69,0 *2.717*	37,0 *1.457*	37,0 *1.457*	70,0 *1015,3*	2,5 *5.510*
C6-L150.10-160-25JETI	03134585	C6	63,0 *2.480*	100,0 *3.937*	160,0 *6.299*	25,0 *0.984*	32,0 *1.260*	69,5 *2.736*	69,0 *2.717*	37,0 *1.457*	37,0 *1.457*	70,0 *1015,3*	2,5 *5.510*
C8-R150.10-160-25JETI	03134591	C8	80,0 *3.150*	111,0 *4.370*	160,0 *6.299*	25,0 *0.984*	40,5 *1.594*	85,5 *3.366*	69,0 *2.717*	45,5 *1.791*	37,0 *1.457*	70,0 *1015,3*	3,7 *8.160*
C8-L150.10-160-25JETI	03134590	C8	80,0 *3.150*	111,0 *4.370*	160,0 *6.299*	25,0 *0.984*	40,5 *1.594*	85,5 *3.366*	69,0 *2.717*	45,5 *1.791*	37,0 *1.457*	70,0 *1015,3*	3,5 *7.720*

Spare Parts, included in delivery

For	Coolant nozzle	O-ring	Wedge clamp	Wedge screw
				
C5	CN6	ORING-20X2	5431080-04	5512031-09
C6 / C8	CN7	5641005-74	5431080-02	5512031-09

Adapters C.-150.10-..20/25JETI for Parting-off – Metric/ Inch

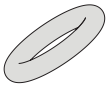
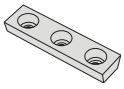




—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

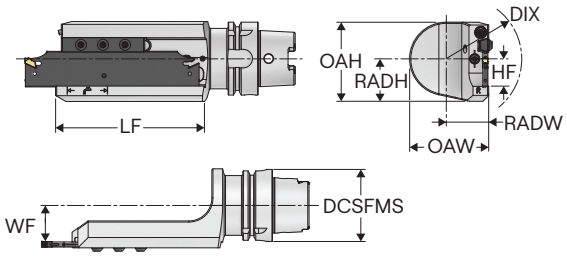
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-150.10-040-20JETI	03134581	C5	50,0 *1.969*	96,0 *3.780*	35,0 *1.378*	20,0 *0.787*	80,0 *3.150*	80,0 *3.150*	40,0 *1.575*	30,0 *1.181*	70,0 *1015,3*	0,9 *1.980*
C6-150.10-050-25JETI	03134582	C6	63,0 *2.480*	103,0 *4.055*	45,0 *1.772*	25,0 *0.984*	82,0 *3.228*	82,0 *3.228*	41,0 *1.614*	37,0 *1.457*	70,0 *1015,3*	1,6 *3.530*
C8-150.10-050-25JETI	03134589	C8	80,0 *3.150*	103,0 *4.055*	45,0 *1.772*	25,0 *0.984*	82,0 *3.228*	82,0 *3.228*	41,0 *1.614*	37,0 *1.457*	70,0 *1015,3*	2,6 *5.730*

Spare Parts, included in delivery

For	Coolant nozzle	O-ring	Wedge clamp	Wedge screw
				
C5	CN6	ORING-20X2	5431080-04	5512031-09
C6 / C8	CN7	ORING-20X2	5431080-02	5512031-09

Adapters E9364-R/L150.10..-25JETI for Parting-off – Metric/ Inch

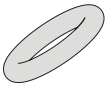
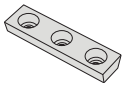




—Right-hand version shown
—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand adapter
—For Jetstream function Left-hand blade must only be used with Left-hand adapter
—For ISO attribute explanation, see page 82

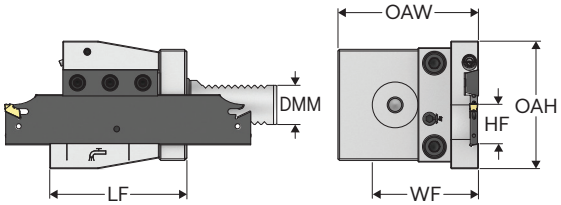
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
E9364-R150.10-175-25JETI	03134588	HSK-T63	63,0 *2.480*	100,0 *3.937*	175,0 *6.890*	25,0 *0.984*	32,0 *1.260*	69,5 *2.736*	69,0 *2.717*	37,0 *1.457*	37,0 *1.457*	70,0 *1015,3*	2,5 *5.510*
E9364-L150.10-175-25JETI	03134587	HSK-T63	63,0 *2.480*	100,0 *3.937*	175,0 *6.890*	25,0 *0.984*	32,0 *1.260*	69,5 *2.736*	69,0 *2.717*	37,0 *1.457*	37,0 *1.457*	70,0 *1015,3*	2,5 *5.510*

Spare Parts, included in delivery

For	Coolant nozzle	O-ring	Wedge clamp	Wedge screw
				
E9364-R/L	CN7	5641005-74	5431080-02	5512031-09

Adapters R/L150.10...20/25 for Parting-off – Metric

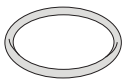
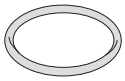
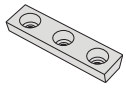




—Right-hand version shown
—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Right-hand adapter
—For Jetstream function Left-hand blade must only be used with Left-hand adapter
—For ISO attribute explanation, see page 82

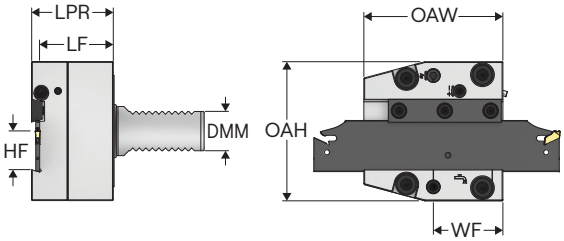
Designation	Item number	DMM	LF	HF	WF	OAW	OAH	CP	Weight
		mm	mm	mm	mm	mm	mm	bar	kg
R150.10-F-VDI25-20JETI	03070436	25,0	83,0	20,0	43,0	73,0	74,0	80,0	1,4
R150.10-F-VDI30-20JETI	03070438	30,0	90,0	20,0	50,0	85,0	74,0	80,0	1,6
R150.10-F-VDI30-25JETI	03070440	30,0	84,0	25,0	51,0	86,0	78,0	80,0	1,8
R150.10-F-VDI40-25JETI	03070442	40,0	80,0	25,0	76,0	118,5	100,0	80,0	3,0
L150.10-F-VDI25-20JETI	03070437	25,0	83,0	20,0	43,0	73,0	74,0	80,0	1,4
L150.10-F-VDI30-20JETI	03070439	30,0	90,0	20,0	50,0	85,0	74,0	80,0	1,6
L150.10-F-VDI30-25JETI	03070441	30,0	84,0	25,0	51,0	86,0	78,0	80,0	1,8
L150.10-F-VDI40-25JETI	03070443	40,0	80,0	25,0	76,0	118,5	100,0	80,0	2,9

Spare Parts, included in delivery

For	Adjusting screw	Coolant nozzle	Coolant ring	Locking screw	Locking screw 2	O-ring	Pin	Wedge clamp	Wedge screw
									
.-F-..25-20	5333011-01	CN6	5641005-133	MC6S8X16	–	5641005-103	3111020-557	5431115-05	5513015-12
.-F-..30-20	5333011-01	CN6	5641005-133	MC6S8X20	–	5641005-134	3111020-557	5431115-05	5513015-12
.-F-..30-25	5333011-01	CN6	5641005-100	MC6S8X20	–	5641005-134	3111020-557	5431115-05	5513015-12
.-F-..40-25	5333011-01	CN6	5641005-100	MC6S8X25	5512031-10	5641005-135	3111050-609	5431115-09	5513015-12

Adapters R/L150.10...20/25 for Parting-off – Metric

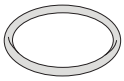
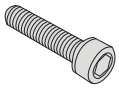
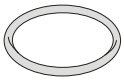
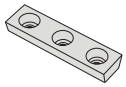




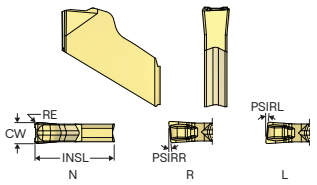
—Right-hand version shown
—For blades program, see page(s) 935, 936
—For holder code key, see page(s) 919
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For Jetstream function Right-hand blade must only be used with Left-hand adapter
—For Jetstream function Left-hand blade must only be used with Right-hand adapter
—For ISO attribute explanation, see page 82

Designation	Item number	DMM	LF	HF	WF	LPR	OAW	OAH	CP	Weight
		mm	mm	mm	mm	mm	mm	mm	bar	kg
R150.10-G-VDI30-20JETI	03070428	30,0	45,5	20,0	35,0	50,5	70,0	66,0	80,0	2,0
R150.10-G-VDI30-25JETI	03070430	30,0	45,5	25,0	42,5	50,5	85,0	85,0	80,0	2,9
R150.10-G-VDI40-25JETI	03070432	40,0	45,5	25,0	42,5	50,5	85,0	85,0	80,0	3,2
R150.10-G-VDI50-25JETI	03070434	50,0	45,5	25,0	42,5	50,5	85,0	90,0	80,0	3,8
L150.10-G-VDI30-20JETI	03070429	30,0	45,5	20,0	35,0	50,5	70,0	66,0	80,0	2,0
L150.10-G-VDI30-25JETI	03070431	30,0	45,5	25,0	42,5	50,5	85,0	85,0	80,0	2,9
L150.10-G-VDI40-25JETI	03070433	40,0	45,5	25,0	42,5	50,5	85,0	85,0	80,0	3,2
L150.10-G-VDI50-25JETI	03070435	50,0	45,5	25,0	42,5	50,5	85,0	90,0	80,0	3,8

Spare Parts, included in delivery

For	Adjusting screw	Coolant nozzle	Coolant ring	Locking screw	Locking screw 2	O-ring	Pin	Wedge clamp	Wedge screw
									
.-G-..30-20	5333011-01	CN6	5641005-133	MC6S6X20	MC6S6X25	5641005-134	3111050-611	5431115-09	5513015-12
.-G-..30-25	5333011-01	CN6	5641005-100	MC6S8X25	–	5641005-134	3111050-611	5431115-09	5513015-12
.-G-..40-25	5333011-01	CN6	5641005-100	MC6S8X25	–	5641005-135	3111050-611	5431115-09	5513015-12
.-G-..50-25	5333011-01	CN6	5641005-100	MC6S8X25	–	5641001-119	3111050-611	5431115-09	5513015-12

Inserts – Parting-off, 150.10...-12, -14 and -16

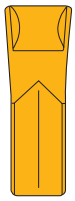


Tolerances: Size:
CW = ±0,05/*0.002* 1,4-2,5/*0.055-0.098*
CW = ±0,08/*0.003* 3-6/*0.120-0.240*

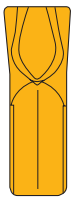
Toolholder range, see page(s) 931, 935, 936, 939, 941

For ISO attribute explanation, see page 82

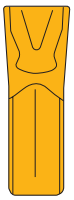
150.10-12



150.10-14



150.10-16



Designation	RE	CW	INSL	PSIRR°	PSIRL°	Grades							
						Coated							Uncoated
	mm *inch*	mm *inch*	mm *inch*			T25M	T350M	CP500	CP600	TGP35	TGP45	TGS2050	HX
150.10-2.5L6-12	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	6,0	■			■				
150.10-2.5N-12	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	–	■	■	■	■	■	■		
150.10-2.5R6-12	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	6,0	–	■			■			■	
150.10-3L6-12	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	–	6,0	■			■			■	
150.10-3N-12	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	
150.10-3R6-12	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	6,0	–	■			■			■	
150.10-4L6-12	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	6,0	■							
150.10-4N-12	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	
150.10-4R6-12	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	6,0	–	■							
150.10-5N-12	0,26 *0.010*	5,1 *0.201*	9,0 *0.354*	–	–	■				■			
150.10-6N-12	0,3 *0.012*	6,35 *0.250*	9,0 *0.354*	–	–	■				■			
150.10-1.4N-14	0,15 *0.006*	1,4 *0.055*	9,0 *0.354*	–	–			■	■			■	■
150.10-2.0N-14	0,15 *0.006*	2,0 *0.079*	9,0 *0.354*	–	–		■	■	■		■	■	■
150.10-2.25N-14	0,15 *0.006*	2,25 *0.089*	9,0 *0.354*	–	–		■	■	■		■		■
150.10-2.5L6-14	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	6,0	■			■				
150.10-2.5N-14	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	–	■		■	■		■		■
150.10-2.5R6-14	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	6,0	–	■			■		■	■	
150.10-3N-14	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	■
150.10-3R6-14	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	6,0	–	■		■	■		■	■	
150.10-4L6-14	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	6,0	■							
150.10-4N-14	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	■
150.10-4R6-14	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	6,0	–	■							
150.10-5N-14	0,26 *0.010*	5,1 *0.201*	9,0 *0.354*	–	–	■		■	■				

Designation	RE	CW	INSL	PSIRR°	PSIRL°	Grades							
						Coated							Uncoated
	mm *inch*	mm *inch*	mm *inch*			T25M	T350M	CP500	CP600	TGP35	TGP45	TGS2050	HX
150.10-6N-14	0,3 *0.012*	6,35 *0.250*	9,0 *0.354*	–	–	■		■	■				
150.10-1.4N-16	0,15 *0.006*	1,4 *0.055*	9,0 *0.354*	–	–			■	■		■	■	
150.10-2.0N-16	0,15 *0.006*	2,0 *0.079*	9,0 *0.354*	–	–		■	■	■		■	■	
150.10-2.25N-16	0,15 *0.006*	2,25 *0.089*	9,0 *0.354*	–	–	■	■	■	■		■		■
150.10-2.5L6-16	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	6,0	■			■				
150.10-2.5N-16	0,17 *0.007*	2,5 *0.098*	9,0 *0.354*	–	–	■	■	■	■		■		■
150.10-3L6-16	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	–	6,0	■			■		■	■	
150.10-3N-16	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	■
150.10-3R6-16	0,19 *0.007*	3,1 *0.122*	9,0 *0.354*	6,0	–	■			■	■	■	■	
150.10-4L6-16	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	6,0	■							
150.10-4N-16	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	–	–	■	■	■	■	■	■	■	■
150.10-4R6-16	0,23 *0.009*	4,1 *0.161*	9,0 *0.354*	6,0	–	■					■		■
150.10-5L6-16	0,26 *0.010*	5,1 *0.201*	9,0 *0.354*	–	6,0	■							
150.10-5N-16	0,26 *0.010*	5,1 *0.201*	9,0 *0.354*	–	–	■		■	■	■	■		■
150.10-5R6-16	0,26 *0.010*	5,1 *0.201*	9,0 *0.354*	6,0	–	■							
150.10-6N-16	0,3 *0.012*	6,35 *0.250*	9,0 *0.354*	–	–	■		■	■	■	■		■



X2

The Seco X2 System with a 2-cutting-edge insert is optimized for parting-off, grooving, turning and back turning primarily small parts on sliding-head machines. It consists of indexable tangential inserts and a highly stable clamp design. This strong dependable system achieves high accuracy, repeatability, productivity, and surface quality in external operations involving small parts such as medical components, slim bars and tubes made from a wide variety of work materials with high precision standards.

– Inserts with 2 cutting edges
– Good insert repeatability up to +/- 0,025 mm / 0.001 inch

X2 QC-heads
– Good repeatability of QC-Interface +/- 0,003 mm / 0.0001 inch
– Jetstream Tooling® Duo – improves chip control and tool life of cutting edge
– The Quick Change Modular Toolholders maximise machining time



X2 – General information

The Seco X2 System comprises of toolholders and inserts for sliding-head machines and can be used for:

– Turning
– Back turning
– Grooving
– Parting-off

The X2 system provides several features:

– 2 cutting edges
– Insert clamping screw with accessibility from both sides
– Easy insert indexing in all type of machines
– Insert nose radius from 0,03 mm / 0.001 inch
– One toolholder for all inserts
– Toolholder design to maintain intact in case of insert breakage
– Blanks for individual needs

Set-up machining recommendations:

– The mounting should be stable
– The tool should be securely clamped, and the overhang should be as small as possible
– The centre height should never deviate by more than ±0,1 mm / ±0.0039 inch from the workpiece centre

Parting-off:

– An insert with a neutral edge (N) normally results in a longer tool life
– The tool life of an insert can be increased by reducing the feed rate or stopping the feed entirely before breakthrough
–Formulae for cutting data calculation can be found in page(s) 101

External toolholders

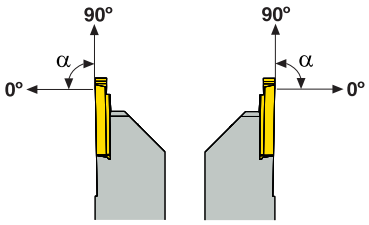


X2	-	F	R	16	16	K	25	03	-
1		2	3	4	5	6	7	8	9

1. Toolholder type

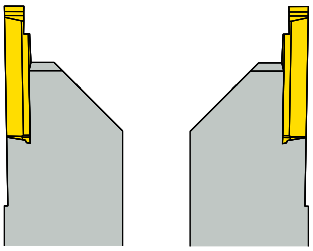
X2 = Swiss machining

2. Toolholder setting angle

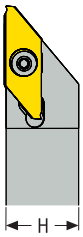


a
F = 90°

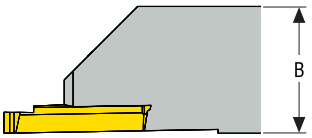
3. Version



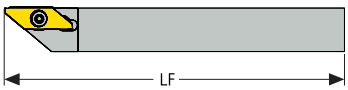
4. Shank height



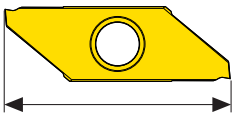
5. Shank width



6. Tool length



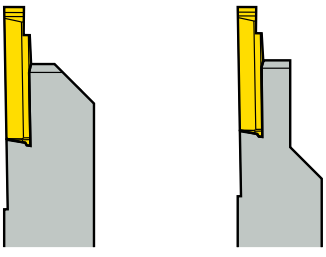
7. Insert size



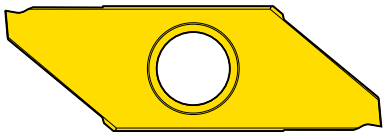
8. Insert thickness



9. Toolholder clearance



Inserts



X2	-	G	A	25	03	005	-	0150	R	N	-	CG
1		2	3	4	5	6		7	8	9		10

1. Toolholder type

X2 = Swiss machining

2. Tolerances

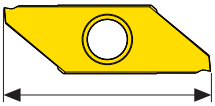
G = Tolerance class

3. Insert type



A = 2 cutting edges

4. Insert size



5. Insert thickness



6. Nose radius

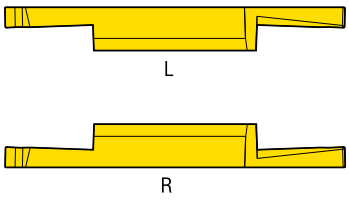


M0 = Round profile

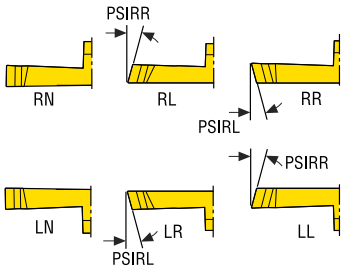
7. Insert width



8. Insert hand



9. Cutting edge orientation



N = Neutral version
Left/Right 15° or 20°

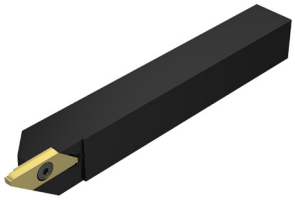
10. Insert type code

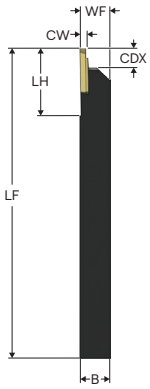
CG	= Parting-off with chipformer
BTG	= Back turning
FG	= Grooving without chipformer
GG	= Grooving with chipformer
T	= Turning
B	= Blanks

Representative insert: X2GA2503010-RT

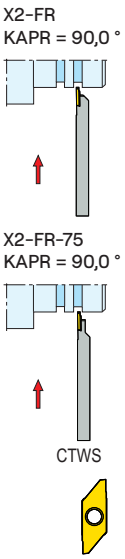
SMG	TGS3010 f (mm/r) (in/rev)			TGP4050 f (mm/r) (in/rev)		
	0,03 *0.001*	**0,05** *0.002*	**0,12** *0.005*	**0,03** *0.001*	**0,05** *0.002*	**0,12** *0.005*
P1	—	—	—	335	300	230
	—	—	—	*1125*	*980*	*750*
P2	—	—	—	325	290	225
	—	—	—	*1100*	*950*	*720*
P3	—	—	—	280	250	195
	—	—	—	*950*	*820*	*620*
P4	—	—	—	245	220	170
	—	—	—	*840*	*720*	*560*
P5	—	—	—	235	210	165
	—	—	—	*800*	*690*	*520*
P6	—	—	—	265	235	185
	—	—	—	*900*	*770*	*590*
P7	—	—	—	250	225	175
	—	—	—	*850*	*740*	*560*
P8	—	—	—	235	210	165
	—	—	—	*800*	*690*	*520*
P11	—	—	—	165	135	95
	—	—	—	*570*	*445*	*295*
M1	150	125	85	195	160	110
	520	*410*	*280*	*670*	*520*	*360*
M2	125	100	70	155	130	90
	425	*330*	*230*	*540*	*425*	*280*
M3	95	80	55	120	100	70
	330	*245*	*165*	*410*	*330*	*215*
M4	70	60	40	90	75	50
	245	*195*	*130*	*310*	*245*	*165*
M5	60	49	34	75	60	43
	195	*155*	*110*	*260*	*195*	*140*
K1	220	185	135	305	260	185
	750	*610*	*425*	*1025*	*850*	*590*
K2	175	150	105	240	205	150
	590	*475*	*345*	*820*	*670*	*475*
K3	145	125	90	200	175	125
	510	*410*	*295*	*690*	*560*	*410*
K4	140	120	85	195	165	120
	475	*395*	*280*	*660*	*540*	*375*
K5	85	70	50	115	100	70
	280	*230*	*165*	*395*	*330*	*230*
K6	135	115	85	185	160	115
	460	*375*	*260*	*640*	*520*	*360*
K7	105	90	65	145	125	90
	360	*295*	*215*	*510*	*410*	*295*
N1	1100	980	760	495	440	345
	3700	*3225*	*2450*	*1675*	*1450*	*1100*
N2	710	630	490	320	285	220
	2400	*2075*	*1575*	*1075*	*940*	*710*
N3	470	420	325	210	190	145
	1600	*1375*	*1050*	*720*	*620*	*475*
N11	630	560	435	280	255	195
	2125	*1825*	*1400*	*950*	*820*	*620*
S1	29	26	20	44	39	31
	100	*85*	*60*	*150*	*130*	*100*
S2	23	21	16	35	32	25
	80	*70*	*50*	*120*	*105*	*80*
S3	20	18	14	31	27	21
	65	*60*	*46*	*105*	*90*	*70*
S11	41	37	29	65	55	44
	140	*120*	*90*	*215*	*180*	*140*

X2FR/L – Toolholders for inserts X2GA – Metric









—Right-hand version shown
—For inserts program, see page(s) 957-963
—For holder code key, see page(s) 952
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	HF	LF	WF	LH	CW	CDX	Weight	CTWS
		mm	mm	mm	mm	mm	mm	mm	mm	kg	
X2-FR1010K2503	10221618	10,0	10,0	10,0	125,0	10,0	27,0	3,0	8,5	0,2	X2..25..
X2-FR1212K2503	10221621	12,0	12,0	12,0	125,0	12,0	27,0	3,0	8,5	0,2	X2..25..
X2-FR1616K2503	10221925	16,0	16,0	16,0	125,0	16,0	27,0	3,0	8,5	0,3	X2..25..
X2-FL1010K2503	10221612	10,0	10,0	10,0	125,0	10,0	27,0	3,0	8,5	0,2	X2..25..
X2-FL1212K2503	10221614	12,0	12,0	12,0	125,0	12,0	27,0	3,0	8,5	0,2	X2..25..
X2-FL1616K2503	10221615	16,0	16,0	16,0	125,0	16,0	27,0	3,0	8,5	0,3	X2..25..
X2-FR1010K2503-75	10221619	10,0	10,0	10,0	125,0	10,0	27,0	3,0	8,5	0,2	X2..25..
X2-FR1212K2503-75	10221622	12,0	12,0	12,0	125,0	12,0	27,0	3,0	8,5	0,2	X2..25..

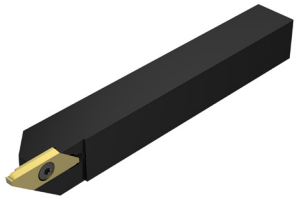
Spare Parts, included in delivery

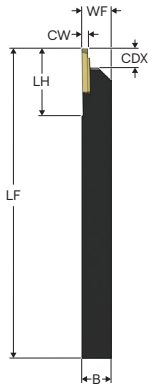
For	Insert key	Insert screw
		
X2-FR/L	1/4HEX-T08PX50	C04010-T08P
X2-FR/L...-75	1/4HEX-T08PX50	C04007-T08P

Accessories

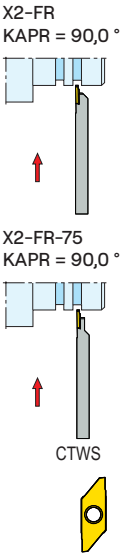
For	Adjustable Torque key	Bit holder	Replacement blade	Torque key
				
X2-FR/L	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	T00-08P	T00-08P12
X2-FR/L...-75	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	T00-08P	T00-08P12

X2FR/L – Toolholders for inserts X2GA – Inch









—Right-hand version shown
—For inserts program, see page(s) 957-963
—For holder code key, see page(s) 952
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	HF	LF	WF	LH	CW	CDX	Weight	CTWS
		inch	inch	inch	inch	inch	inch	inch	inch	lbs	
X2-FR050K2503	10221617	0.500	0.500	0.500	5.000	0.500	1.063	0.118	0.335	0.440	X2..25..
X2-FR063K2503	10221620	0.625	0.625	0.625	5.000	0.625	1.063	0.118	0.335	0.660	X2..25..
X2-FL050K2503	10221611	0.500	0.500	0.500	5.000	0.500	1.063	0.118	0.335	0.440	X2..25..
X2-FL063K2503	10221613	0.625	0.625	0.625	5.000	0.625	1.063	0.118	0.335	0.660	X2..25..
X2-FR050K2503-75	10221616	0.500	0.500	0.500	5.000	0.500	1.063	0.118	0.335	0.440	X2..25..

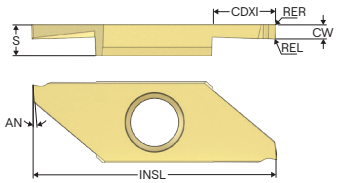
Spare Parts, included in delivery

For	Insert key	Insert screw
		
X2-FR/L	1/4HEX-T08PX50	C04010-T08P
X2-FR/L...-75	1/4HEX-T08PX50	C04007-T08P

Accessories

For	Adjustable Torque key	Bit holder	Replacement blade	Torque key
				
X2-FR/L	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	T00-08P	T00-08P12
X2-FR/L...-75	1/4HEX-S-HANDLE-0.8-5.0NM	1/4HEX-S-HANDLE	T00-08P	T00-08P12

X2GA



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RER/REL = ±0,03/*0.0012*

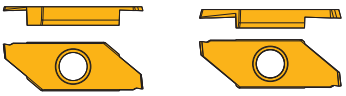
Right-hand insert (RN/RR/RL) must only be used with Right-hand holder

For ISO attribute explanation, see page 82

RNCG



RR.CG

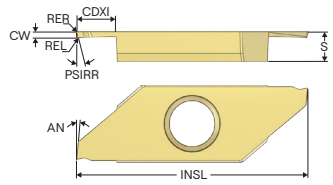


RL.CG



								Grades	
Designation	**RER**	**REL**	**CW**	**INSL**	**S**	**CDXI**	**AN°**	**Coated**	**Uncoated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		TGP4050	TGS3010
X2GA2503005-0070RNCG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	6,0	■	
X2GA2503005-0100RNCG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0150RNCG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0200RNCG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	
X2GA2503005-0070RR15CG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	6,0	■	
X2GA2503005-0100RR15CG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	■
X2GA2503005-0150RR15CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	■
X2GA2503005-0150RR20CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0200RR15CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	■
X2GA2503005-0200RR20CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	
X2GA2503005-0070RL15CG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	6,0	■	
X2GA2503005-0100RL15CG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0150RL15CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0200RL15CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	

X2GA



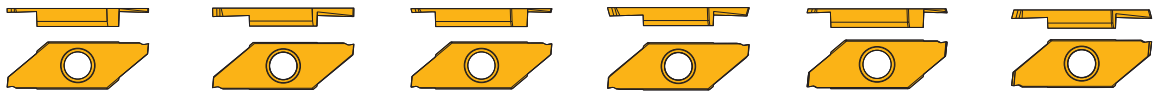
Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RER/REL = ±0,03/*0.0012*

PSIRR/PSIRL = ±0,25°

Left-hand insert (LN/LR/LL) must only be used with Left-hand holder

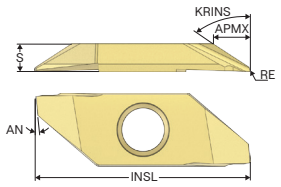
For ISO attribute explanation, see page 82

LNCG **LR.CG** **LL.CG**



Designation	RER	REL	CW	INSL	S	CDXI	PSIRR°	PSIRL°	AN°	Grades	
										Coated	Uncoated
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*				TGP4050	TGS3010
X2GA2503005-0070LNCG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	0	0	6,0	■	
X2GA2503005-0100LNCG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	0	0	6,0	■	
X2GA2503005-0150LNCG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	0	0	6,0	■	
X2GA2503005-0200LNCG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	0	0	6,0	■	
X2GA2503005-0070LR15CG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	15,0	0	6,0	■	
X2GA2503005-0100LR15CG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	15,0	0	6,0	■	■
X2GA2503005-0150LR15CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	15,0	0	6,0	■	■
X2GA2503005-0150LR20CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	20,0	0	6,0	■	
X2GA2503005-0200LR15CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	15,0	0	6,0	■	
X2GA2503005-0200LR20CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	20,0	0	6,0	■	
X2GA2503005-0070LL15CG	0,05 *0.002*	0,05 *0.002*	0,7 *0.028*	25,0 *0.984*	3,175 *0.125*	4,3 *0.169*	0	15,0	6,0	■	
X2GA2503005-0100LL15CG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	0	15,0	6,0	■	
X2GA2503005-0150LL15CG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	0	15,0	6,0	■	
X2GA2503005-0200LL15CG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	0	15,0	6,0	■	

X2GA



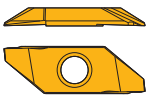
Tolerances:
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

PSIRR/PSIRL = ±0,25°

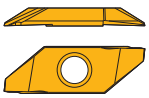
Right-hand insert (RB) must only be used with Right-hand holder
Left-hand insert (LB) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RBTG

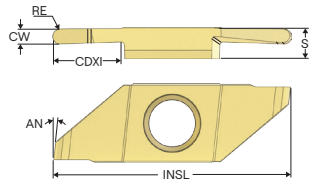


LBTG



							Grades	
Designation	**RE**	**INSL**	**S**	**APMX**	**KRINS**	**AN°**	**Coated**	**Uncoated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TGP4050	TGS3010
X2GA2503003-RBTG	0,03 *0.001*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	■
X2GA2503005-RBTG	0,05 *0.002*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	■
X2GA2503010-RBTG	0,1 *0.004*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	■
X2GA2503020-RBTG	0,2 *0.008*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	■
X2GA2503003-LBTG	0,03 *0.001*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	■
X2GA2503005-LBTG	0,05 *0.002*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	
X2GA2503020-LBTG	0,2 *0.008*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	59,0	6,0	■	

X2GA

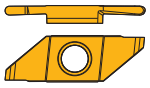


Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

Left-hand insert (LF) must only be used with Left-hand holder

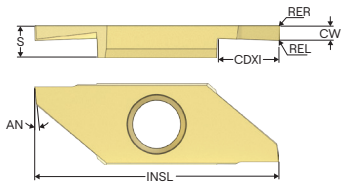
For ISO attribute explanation, see page 82

LFG



Designation	RE	CW	INSL	S	CDXI	AN°	Grades	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		Coated TGP4050	Uncoated TGS3010
X2GA2503M0-0080LFG	0,4 *0.016*	0,8 *0.031*	25,0 *0.984*	3,175 *0.125*	3,8 *0.150*	6,0	■	
X2GA2503M0-0125LFG	0,625 *0.025*	1,25 *0.049*	25,0 *0.984*	3,175 *0.125*	5,0 *0.197*	6,0	■	
X2GA2503M0-0160LFG	0,8 *0.031*	1,6 *0.063*	25,0 *0.984*	3,175 *0.125*	7,5 *0.295*	6,0	■	
X2GA2503M0-0250LFG	1,25 *0.049*	2,5 *0.098*	25,0 *0.984*	3,175 *0.125*	7,5 *0.295*	6,0	■	

X2GA

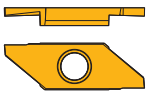


Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RER/REL = ±0,03/*0.0012*

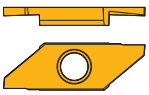
Right-hand insert (RF) must only be used with Right-hand holder
Left-hand insert (LF) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RFG

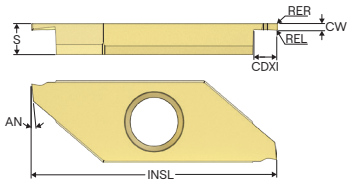


LFG



								Grades	
Designation	**RER**	**REL**	**CW**	**INSL**	**S**	**CDXI**	**AN°**	**Coated**	**Uncoated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		TGP4050	TGS3010
X2GA2503005-0100RFG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0150RFG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0200RFG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	
X2GA2503005-0250RFG	0,05 *0.002*	0,05 *0.002*	2,5 *0.098*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	
X2GA2503005-0100LFG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0150LFG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	6,3 *0.248*	6,0	■	
X2GA2503005-0200LFG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	
X2GA2503005-0250LFG	0,05 *0.002*	0,05 *0.002*	2,5 *0.098*	25,0 *0.984*	3,175 *0.125*	8,5 *0.335*	6,0	■	

X2GA

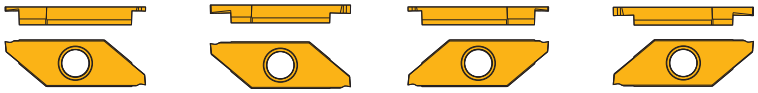


Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RER/REL = ±0,03/*0.0012*

Right-hand insert (RG) must only be used with Right-hand holder
Left-hand insert (LG) must only be used with Left-hand holder

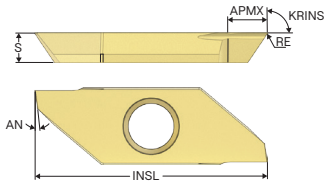
For ISO attribute explanation, see page 82

RGG **LGG**



Designation	RER	REL	CW	INSL	S	CDXI	AN°	Grades	
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		Coated TGP4050	Uncoated TGS3010
X2GA2503005-0050RGG	0,05 *0.002*	0,05 *0.002*	0,5 *0.020*	25,0 *0.984*	3,175 *0.125*	1,3 *0.051*	6,0	■	■
X2GA2503005-0075RGG	0,05 *0.002*	0,05 *0.002*	0,75 *0.030*	25,0 *0.984*	3,175 *0.125*	2,5 *0.098*	6,0	■	■
X2GA2503005-0100RGG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	2,7 *0.106*	6,0	■	■
X2GA2503005-0125RGG	0,05 *0.002*	0,05 *0.002*	1,25 *0.049*	25,0 *0.984*	3,175 *0.125*	2,7 *0.106*	6,0	■	■
X2GA2503005-0150RGG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	■
X2GA2503005-0175RGG	0,05 *0.002*	0,05 *0.002*	1,75 *0.069*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	■
X2GA2503005-0200RGG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	■
X2GA2503005-0250RGG	0,05 *0.002*	0,05 *0.002*	2,5 *0.098*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	
X2GA2503005-0050LGG	0,05 *0.002*	0,05 *0.002*	0,5 *0.020*	25,0 *0.984*	3,175 *0.125*	1,3 *0.051*	6,0	■	■
X2GA2503005-0075LGG	0,05 *0.002*	0,05 *0.002*	0,75 *0.030*	25,0 *0.984*	3,175 *0.125*	2,5 *0.098*	6,0	■	
X2GA2503005-0100LGG	0,05 *0.002*	0,05 *0.002*	1,0 *0.039*	25,0 *0.984*	3,175 *0.125*	2,7 *0.106*	6,0	■	■
X2GA2503005-0125LGG	0,05 *0.002*	0,05 *0.002*	1,25 *0.049*	25,0 *0.984*	3,175 *0.125*	2,7 *0.106*	6,0	■	
X2GA2503005-0150LGG	0,05 *0.002*	0,05 *0.002*	1,5 *0.059*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	■
X2GA2503005-0175LGG	0,05 *0.002*	0,05 *0.002*	1,75 *0.069*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	
X2GA2503005-0200LGG	0,05 *0.002*	0,05 *0.002*	2,0 *0.079*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	
X2GA2503005-0250LGG	0,05 *0.002*	0,05 *0.002*	2,5 *0.098*	25,0 *0.984*	3,175 *0.125*	3,7 *0.146*	6,0	■	

X2GA

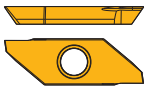


Tolerances:
CW = ±0,025/*0.001*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

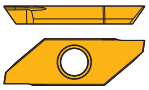
Right-hand insert (RT) must only be used with Right-hand holder
Left-hand insert (LT) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RT

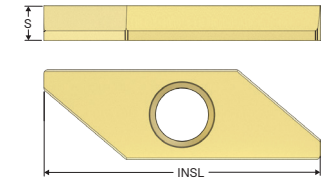


LT



							Grades	
Designation	**RE**	**INSL**	**S**	**APMX**	**KRINS**	**AN°**	**Coated**	**Uncoated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*			TGP4050	TGS3010
X2GA2503003-RT	0,03 *0.001*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	■
X2GA2503005-RT	0,05 *0.002*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	■
X2GA2503010-RT	0,1 *0.004*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	■
X2GA2503020-RT	0,2 *0.008*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	■
X2GA2503003-LT	0,03 *0.001*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	
X2GA2503005-LT	0,05 *0.002*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	
X2GA2503010-LT	0,1 *0.004*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	
X2GA2503020-LT	0,2 *0.008*	25,0 *0.984*	3,175 *0.125*	4,0 *0.157*	90,0	9,0	■	

X2GA

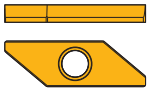


Tolerances:
S = ±0,025/*0.001*

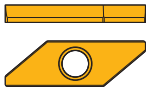
Right-hand insert (RB) must only be used with Right-hand holder
Left-hand insert (LB) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RB



LB



			Grades
Designation	**INSL**	**S**	**Uncoated**
	mm *inch*	mm *inch*	TGP4010
X2GA2503-RB	– –	3,18 *0.125*	■
X2GA2503-LB	– –	3,18 *0.125*	■



X4

The Seco X4 system with a 4-cutting-edge insert is optimized for parting-off and grooving primarily small parts. It consists of indexable tangential inserts and a highly stable clamp design. These strong, dependable system components achieve high accuracy, repeatability, productivity and surface quality in external grooving and parting-off operations involving small parts and slim bars and tubes made from a wide variety of work materials.

– Inserts with four cutting edges.
– Easy double access clamping system.
– Good repeatability (±0,025 mm / 0.001 inch).
– Jetstream Tooling® Duo – improves chip control and tool life of cutting edge.

X4 – General information

The Seco X4 system (multi edge solution) comprises toolholders and inserts for external radial machining.

The system can be used for:

– Grooving

– Parting off

Seco X4 comes in combination with the unique Jetstream Tooling® Duo. A high pressure cooling system which provides directed coolant supply to the cutting edge by two streams: the first to the rake surface and the second to the clearance surface.



The X4 system provides several features:

– Four cutting edges

– Ability to pass free along a shoulder down to the centre

– Easy double access clamping system

– Easy indexing without total extraction of the screw

– Integrity safe in case of edge failure. The inserts can still be used with three broken passive edges

– Good repeatability (±0,025 mm / *0.001 inch*)

– Jetstream Tooling® Duo – improves chip control and tool life of cutting edge



Set-up machining recommendations

The mounting should be stable.

The tool should be securely clamped and the overhang should be as small as possible.

The centre height should never deviate by more than ±0,1 mm / ±*0.0039 inch* from the workpiece centre.

Parting-off

An insert with a neutral edge (N) normally results in a longer useful life of the insert.

The useful life of the insert can be increased by reducing the feed rate or stopping the feed entirely before break-through.

Formulae for cutting data calculation can be found in page(s) 101.

Seco Jetstream Tooling® Duo

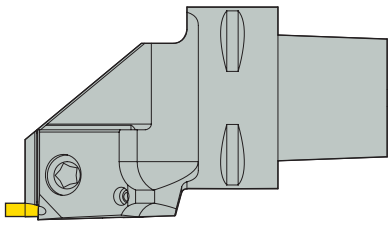
Seco Jetstream Tooling® Duo holders, yet another innovation introduced to market, feature both a rake face and flank face jet, that may provide even better chip control and signif cantly longer tool life. For more information on Jetstream Tooling® and accessories, please see page(s) 85-[XXX], 1029.



Troubleshooting

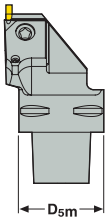
Troubleshooting for X4 inserts, see page(s) 925.

Seco-Capto™ – External toolholders



C4	-	X4	F	R	27	060	-	25	03	JET
1		2	3	4	5	6		7	8	9

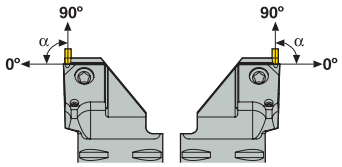
1. Seco-Capto™ size



2. Tool system

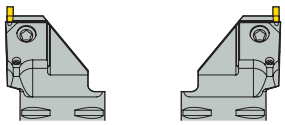
X4

3. Toolholder setting angle



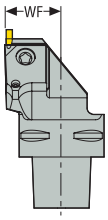
F = 90°
G = 0°

4. Version

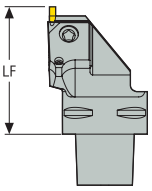


R = Right
L = Left

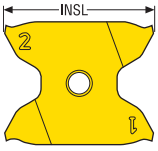
5. WF-dimension



6. LF-dimension



7. Insert length



25 = 25 mm / *0.984 inch*

8. Seat size



03 = 3,1 mm / *0.122 inch*

9. Cooling system

JET = Jetstream Tooling® Duo
JETI/JETI2 = Jetstream Tooling® integrated coolant inlet

External toolholders

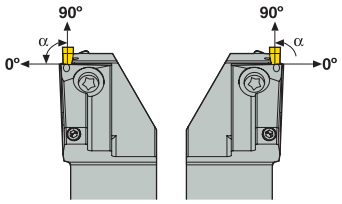


C4	F	R	25	25	M	25	03	JET
1	2	3	4	5	6	7	8	9

1. Tool system

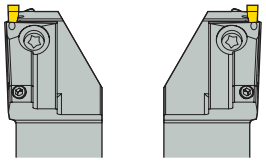
X4

2. Toolholder setting angle



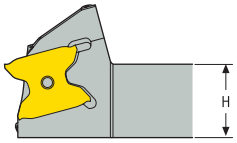
F = 90°
G = 0°

3. Version

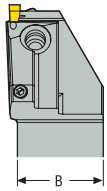


R = Right
L = Left

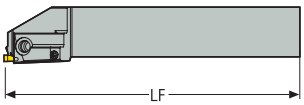
4. Shank height



5. Shank width

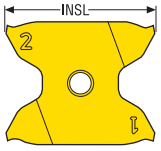


6. Tool length



H = 100 mm / *3.937 inch*
K = 125 mm / *4.921 inch*
M = 150 mm / *5.906 inch*

7. Insert length



25 = 25 mm / *0.984 inch*

8. Seat size

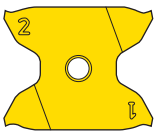


03 = 3,1 mm / *0.122 inch*

9. Cooling system

JET = Jetstream Tooling® Duo

Inserts

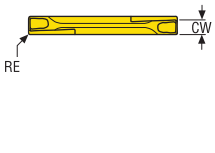


X4	G	K	25	03	010	-	0150	RR15	-	MC
1	2	3	4	5	6		7	8		9

1. Tool system

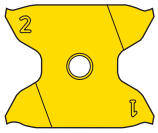
X4

2. Tolerances



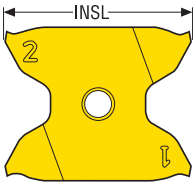
Tolerance ± mm			
Tolerance class	CW	RE	LIG
G	0,025 / *0.001*	0,03 / *0.0012*	0,025 / *0.001*

3. Insert type



K = four edges with chipbreaker

4. Insert length



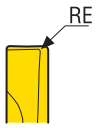
25 = 25 mm / *0.984 inch*

5. Seat size



03 = 3,1 mm / *0.122 inch*

6. Corner radius



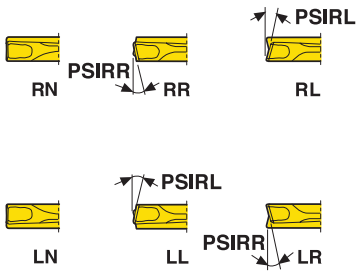
005 = 0,05 mm / *0.0020 inch*
010 = 0,10 mm / *0.0039 inch*
015 = 0,15 mm / *0.0059 inch*
M0 = round

7. Cutting edge width



0050 = 0,5 mm / *0.020 inch*
0300 = 3 mm / *0.120 inch*

8. Cutting edge orientation



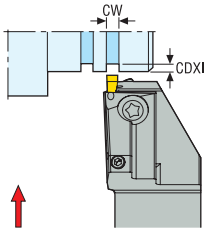
9. Chipbreaker or geometry code

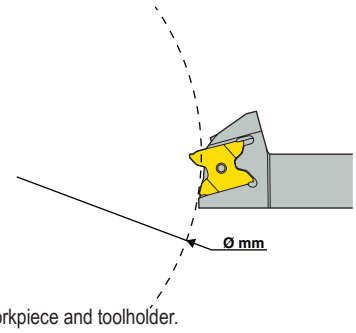
MC = Chipbreaker for medium Parting-off and Grooving
FG = Radial groove
R = Round

X4 – Application overview

Grooving

CDXI / Workpiece diameter





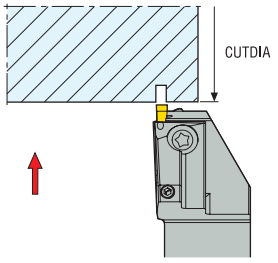
Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder.

X4 Grooving – Cutting depth CDXI

Cutting edge width CW, mm / *inch*	Workpiece diameter, ∅ mm / *inch*									
	0-130 *0-5.118*	130-140 *5.118-5.512*	140-160 *5.512-6.299*	160-180 *6.299-7.087*	180-200 *7.087-7.874*	200-250 *7.874-9.843*	250-300 *9.843-11.811*	300-400 *11.811-15.748*	400-500 *15.748-19.686*	500-1000 *19.686-39.370*
0,5 / *0.020*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*	2,6 / *0.100*
1,0 / *0.040*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,3 / *0.169*	4,0 / *0.160*
1,5 / *0.060*	6,5 / *0.256*	6,4 / *0.252*	6,1 / *0.240*	5,9 / *0.232*	5,5 / *0.217*	5,0 / *0.200*	5,0 / *0.200*	4,5 / *0.177*	4,5 / *0.177*	4,0 / *0.160*
2,0 / *0.080*	6,5 / *0.256*	6,4 / *0.252*	6,1 / *0.240*	5,9 / *0.232*	5,5 / *0.217*	5,0 / *0.200*	5,0 / *0.200*	4,5 / *0.177*	4,5 / *0.177*	4,0 / *0.160*
2,5 / *0.098*	6,5 / *0.256*	6,4 / *0.252*	6,1 / *0.240*	5,9 / *0.232*	5,5 / *0.217*	5,0 / *0.200*	5,0 / *0.200*	4,5 / *0.177*	4,5 / *0.177*	4,0 / *0.160*
3,0 / *0.120*	6,5 / *0.256*	6,4 / *0.252*	6,1 / *0.240*	5,9 / *0.232*	5,5 / *0.217*	5,0 / *0.200*	5,0 / *0.200*	4,5 / *0.177*	4,5 / *0.177*	4,0 / *0.160*

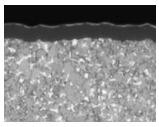
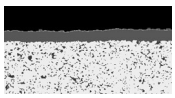
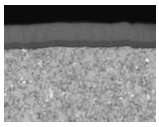
Parting-off

CUTDIA

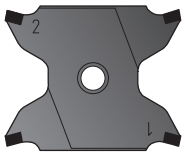


Maximum workpiece diameter, CUTDIA	
Cutting edge width CW mm / *inch*	Workpiece diameter, CUTDIA mm / *inch*
0,5 / *0.020*	5,2 / *0.205*
1,0 / *0.040*	8,6 / *0.339*
1,5 / *0.060*	13,0 / *0.512*
2,0 / *0.080*	13,0 / *0.512*
2,5 / *0.098*	13,0 / *0.512*
3,0 / *0.120*	13,0 / *0.512*

X4 grades, coated

CP500		Tough PVD-coated micrograin grade intended for grooving, profiling and parting-off at moderate cutting speeds. Provides more wear resistance compared to CP600. (Ti,Al)N + TiN
CP600		Very tough PVD-coated fine-grain grade, universal choice intended for grooving and parting-off at low to moderate cutting speeds. Well-suited in stainless steel and in interrupted cuts. Tougher alternative to CP500. (Ti,Al)N + TiN
TGH1050		Very hard supermicrograin grade intended for partly hardened steel components as well as generally workpiece materials such as superalloys and cast-iron and due to remarkable edge toughness it also provides high performance in interrupted cuts and hard-surface removal. Ti-Al-Si-N nanolaminate coating

X4 grades, PCBN

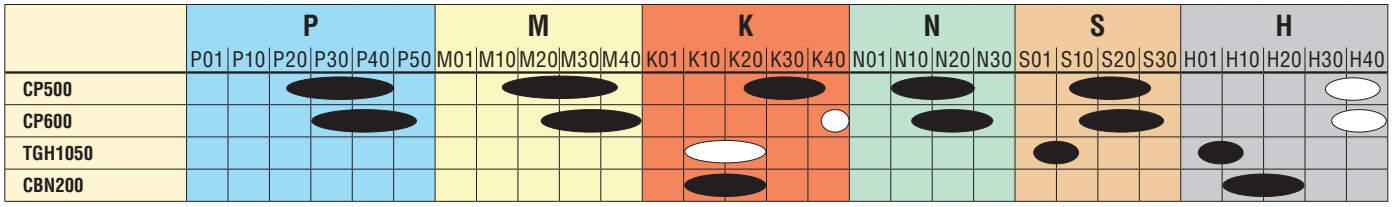
CBN200		Inserts with brazed tips, intended for hardened steels and pearlitic cast iron. Composition: 90% cBN content grade with an average grain size of 3-6 µm and a Al ceramic binder. Coating: No coating.

Indicative ISO classification of the grades

Steel **P**	All kinds of steel and cast steels except stainless steels with austenitic structure.	P01, P10, P20, P30, P40, P50
Stainless steel **M**	Stainless austenitic and austenitic/ferritic steel and cast steel.	M01, M10, M20, M30, M40
Cast iron **K**	Grey cast iron, cast iron with spheroidal graphite, malleable cast iron.	K01, K10, K20, K30, K40
Non-ferrous metals **N**	Aluminium and other nonferrous metals.	N01, N10, N20, N30
Superalloys and titanium **S**	Heat resistant special alloys based on iron, nickel and cobalt, titanium and titanium alloys.	S01, S10, S20, S30
Hard materials **H**	Hardened stel and cast iron materials, chilled cast iron.	H01, H10, H20, H30

The application area for each grade is shown in the chart below.

The black areas in the chart indicate a grade's main ISO application groups and the white areas indicate other supplementary application groups.



Cutting data

Cutting speed v_c (m/min)

In this section a recommended cutting speed is indicated under specified conditions.

Use the tables beginning on page(s) 1034 to classify the workpiece material into a SMG.

The cutting data tables provide a recommendation of chipbreaker and a start value for feed rate (f) and cutting speed (v_c).

The cutting data tables are based on grooving with full cutting width (CW).

The recommended cutting speeds in the tables are calculated for 15 minutes tool life with use of external flood coolant.

In order to increase the accuracy towards the actual cutting conditions and requirements of the applications the recommendation is to use My Pages – Suggest on www.secotools.com

v_c = cutting speed (m/min / *sf/min*)

CW = cutting width (mm / *inch*)

f = feed rate (mm/rev / *in/rev*)

Grade CP500

SMG		CW = 0,5-1,0 *CW = 0.020-0.039*		CW = 1,5-2,0 *CW = 0.059-0.079*		CW = 2,5-3,0 *CW = 0.098-0.118*	
		f	v_c	f	v_c	f	v_c
P1	-MC CP500	0,075 *0.0030*	185 *610*	0,12 *0.0048*	155 *510*	0,15 *0.0060*	140 *460*
P2	-MC CP500	0,075 *0.0030*	180 *590*	0,12 *0.0048*	150 *490*	0,15 *0.0060*	135 *445*
P3	-MC CP500	0,075 *0.0030*	155 *510*	0,11 *0.0044*	130 *425*	0,14 *0.0055*	120 *395*
P4	-MC CP500	0,070 *0.0028*	135 *445*	0,11 *0.0044*	115 *375*	0,14 *0.0055*	105 *345*
P5	-MC CP500	0,070 *0.0028*	130 *425*	0,11 *0.0044*	110 *360*	0,14 *0.0055*	100 *330*
P6	-MC CP500	0,070 *0.0028*	145 *475*	0,11 *0.0044*	125 *410*	0,13 *0.0050*	115 *375*
P7	-MC CP500	0,070 *0.0028*	140 *460*	0,11 *0.0044*	120 *395*	0,13 *0.0050*	110 *360*
P8	-MC CP500	0,075 *0.0030*	130 *425*	0,11 *0.0044*	110 *360*	0,14 *0.0055*	100 *330*
P11	-MC CP500	0,070 *0.0028*	135 *445*	0,11 *0.0044*	115 *375*	0,13 *0.0050*	105 *345*
P12	-MC CP500	0,048 *0.0019*	85 *280*	0,075 *0.0030*	75 *245*	0,095 *0.0038*	70 *230*
M1	-MC CP500	0,075 *0.0030*	205 *670*	0,12 *0.0048*	175 *570*	0,15 *0.0060*	150 *490*
M2	-MC CP500	0,070 *0.0028*	165 *540*	0,11 *0.0044*	145 *475*	0,14 *0.0055*	125 *410*
M3	-MC CP500	0,055 *0.0022*	125 *410*	0,085 *0.0034*	120 *395*	0,11 *0.0044*	110 *360*
M4	-MC CP500	0,050 *0.0020*	90 *295*	0,075 *0.0030*	95 *310*	0,095 *0.0038*	85 *280*
M5	-MC CP500	0,050 *0.0020*	75 *245*	0,075 *0.0030*	80 *260*	0,095 *0.0038*	75 *245*
K1	-MC CP500	0,075 *0.0030*	170 *560*	0,12 *0.0048*	145 *475*	0,15 *0.0060*	130 *425*
K2	-MC CP500	0,070 *0.0028*	145 *475*	0,11 *0.0044*	120 *395*	0,14 *0.0055*	110 *360*
K3	-MC CP500	0,070 *0.0028*	125 *410*	0,11 *0.0044*	100 *330*	0,14 *0.0055*	90 *295*
K4	-MC CP500	0,070 *0.0028*	115 *375*	0,11 *0.0044*	100 *330*	0,14 *0.0055*	85 *280*
K5	-MC CP500	0,065 *0.0026*	70 *230*	0,10 *0.0040*	60 *195*	0,12 *0.0048*	55 *180*
K6	-MC CP500	0,070 *0.0028*	105 *345*	0,11 *0.0044*	90 *295*	0,14 *0.0055*	85 *280*
K7	-MC CP500	0,065 *0.0026*	90 *295*	0,10 *0.0040*	75 *245*	0,12 *0.0048*	70 *230*
N11	-MC CP500	0,10 *0.0040*	110 *360*	0,15 *0.0060*	90 *295*	0,19 *0.0075*	85 *280*
S1	-MC CP500	0,050 *0.0020*	22 *70*	0,075 *0.0030*	19 *60*	0,095 *0.0038*	18 *60*
S2	-MC CP500	0,050 *0.0020*	19 *60*	0,075 *0.0030*	17 *55*	0,095 *0.0038*	16 *50*
S3	-MC CP500	0,046 *0.0018*	17 *55*	0,070 *0.0028*	15 *49*	0,090 *0.0036*	14 *46*

Grade CP600

SMG		CW = 0,5-1,0 *CW = 0.020-0.039*		CW = 1,5-2,0 *CW = 0.059-0.079*		CW = 2,5-3,0 *CW = 0.098-0.118*	
		f	v_c	f	v_c	f	v_c
P1	-MC CP600	0,075 *0.0030*	170 *560*	0,12 *0.0048*	145 *475*	0,15 *0.0060*	130 *425*
P2	-MC CP600	0,075 *0.0030*	165 *540*	0,12 *0.0048*	140 *460*	0,15 *0.0060*	130 *425*
P3	-MC CP600	0,075 *0.0030*	145 *475*	0,11 *0.0044*	125 *410*	0,14 *0.0055*	115 *375*
P4	-MC CP600	0,070 *0.0028*	130 *425*	0,11 *0.0044*	110 *360*	0,14 *0.0055*	100 *330*
P5	-MC CP600	0,070 *0.0028*	125 *410*	0,11 *0.0044*	105 *345*	0,14 *0.0055*	95 *310*
P6	-MC CP600	0,070 *0.0028*	140 *460*	0,11 *0.0044*	115 *375*	0,13 *0.0050*	110 *360*
P7	-MC CP600	0,070 *0.0028*	130 *425*	0,11 *0.0044*	110 *360*	0,13 *0.0050*	105 *345*
P8	-MC CP600	0,075 *0.0030*	120 *395*	0,11 *0.0044*	105 *345*	0,14 *0.0055*	95 *310*
P11	-MC CP600	0,070 *0.0028*	125 *410*	0,11 *0.0044*	105 *345*	0,13 *0.0050*	100 *330*
P12	-MC CP600	0,048 *0.0019*	80 *260*	0,075 *0.0030*	70 *230*	0,095 *0.0038*	65 *215*
M1	-MC CP600	0,075 *0.0030*	190 *620*	0,12 *0.0048*	165 *540*	0,15 *0.0060*	140 *460*
M2	-MC CP600	0,070 *0.0028*	155 *510*	0,11 *0.0044*	140 *460*	0,14 *0.0055*	120 *395*
M3	-MC CP600	0,055 *0.0022*	115 *375*	0,085 *0.0034*	115 *375*	0,11 *0.0044*	105 *345*
M4	-MC CP600	0,050 *0.0020*	85 *280*	0,075 *0.0030*	85 *280*	0,095 *0.0038*	80 *260*
M5	-MC CP600	0,050 *0.0020*	70 *230*	0,075 *0.0030*	75 *245*	0,095 *0.0038*	70 *230*
K1	-MC CP600	0,075 *0.0030*	160 *520*	0,12 *0.0048*	135 *445*	0,15 *0.0060*	125 *410*
K2	-MC CP600	0,070 *0.0028*	135 *445*	0,11 *0.0044*	115 *375*	0,14 *0.0055*	100 *330*
K3	-MC CP600	0,070 *0.0028*	115 *375*	0,11 *0.0044*	95 *310*	0,14 *0.0055*	85 *280*
K4	-MC CP600	0,070 *0.0028*	110 *360*	0,11 *0.0044*	90 *295*	0,14 *0.0055*	80 *260*
K5	-MC CP600	0,065 *0.0026*	65 *215*	0,10 *0.0040*	55 *180*	0,12 *0.0048*	50 *165*
K6	-MC CP600	0,070 *0.0028*	100 *330*	0,11 *0.0044*	85 *280*	0,14 *0.0055*	80 *260*
K7	-MC CP600	0,065 *0.0026*	85 *280*			0,12 *0.0048*	65 *215*
N11	-MC CP600						
S1	-MC CP600						
S2	-MC CP600						
S3	-MC CP600						

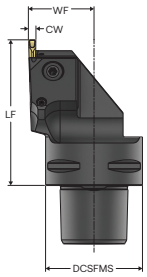
Grade TGH1050

SMG		CW = 0,5-1,0 *CW = 0.020-0.039*		CW = 1,5-2,0 *CW = 0.059-0.079*		CW = 2,5-3,0 *CW = 0.098-0.118*	
		f	v_c	f	v_c	f	v_c
K1	-MC TGH1050	— —	— —	— —	— —	— —	— —
K2	-MC TGH1050	— —	— —	— —	— —	— —	— —
K3	-MC TGH1050	— —	— —	— —	— —	— —	— —
S1	-MC TGH1050	— —	— —	— —	— —	— —	— —
S2	-MC TGH1050	— —	— —	— —	— —	— —	— —
S3	-MC TGH1050	— —	— —	— —	— —	— —	— —
H3	-MC TGH1050	0,032 *0.0013*	49 *160*	0,050 *0.0020*	50 *165*	0,060 *0.0024*	50 *165*
H5	-MC TGH1050	0,048 *0.0019*	95 *310*	0,075 *0.0030*	90 *295*	0,095 *0.0038*	85 *280*
H7	-MC TGH1050	0,032 *0.0013*	49 *160*	0,050 *0.0020*	50 *165*	0,060 *0.0024*	50 *165*
H8	-MC TGH1050	0,036 *0.0014*	90 *295*	0,055 *0.0022*	95 *310*	0,070 *0.0028*	90 *295*
H11	-MC TGH1050	0,048 *0.0019*	120 *395*	0,075 *0.0030*	115 *375*	0,095 *0.0038*	110 *360*
H12	-MC TGH1050	0,036 *0.0014*	105 *345*	0,055 *0.0022*	110 *360*	0,070 *0.0028*	105 *345*
H21	-MC TGH1050	0,036 *0.0014*	90 *295*	0,055 *0.0022*	95 *310*	0,070 *0.0028*	90 *295*
H31	-MC TGH1050	0,032 *0.0013*	70 *230*	0,050 *0.0020*	70 *230*	0,060 *0.0024*	70 *230*

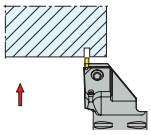
C.-X4FR/L...JET – Toolholders for inserts X4GK – Metric/ Inch



C.-X4FR/L...JET



X4FR/L...JET
KAPR = 90,0 °



CTWS



—Right-hand version shown
—For inserts program, see page(s) 982-986
—For holder code key, see page(s) 967
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	WF	LF	CP	Weight	CTWS
			mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*	
C4-X4FR-27060-2503JET	02823293	C4	40,0 *1.575*	27,0 *1.063*	60,0 *2.362*	150,0 bar *2175,6*	0,5 *1.100*	X42503R
C4-X4FL-27060-2503JET	02823290	C4	40,0 *1.575*	27,0 *1.063*	60,0 *2.362*	150,0 bar *2175,6*	0,5 *1.100*	X42503L
C5-X4FR-35060-2503JET	02823294	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	150,0 bar *2175,6*	0,7 *1.540*	X42503R
C5-X4FL-35060-2503JET	02823291	C5	50,0 *1.969*	35,0 *1.378*	60,0 *2.362*	150,0 bar *2175,6*	0,9 *1.980*	X42503L
C6-X4FR-45065-2503JET	02823295	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	150,0 bar *2175,6*	1,3 *2.870*	X42503R
C6-X4FL-45065-2503JET	02823292	C6	63,0 *2.480*	45,0 *1.772*	65,0 *2.559*	150,0 bar *2175,6*	1,3 *2.870*	X42503L

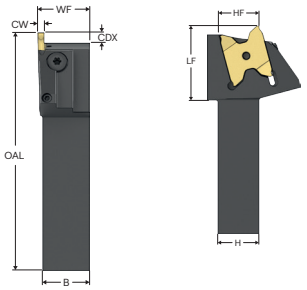
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
-2503	T15P-7	L85020-T15P

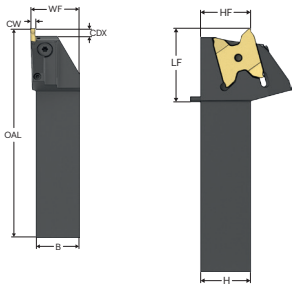
X4FR/L...JETI – Toolholders compatible with JETI adapters for inserts X4GK – Metric



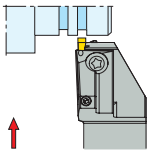
X4FR/L2020...JETI



X4FR/L2525...JETI



X4FR/L...JETI
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 982-986
—For holder code key, see page(s) 968
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

CTWS

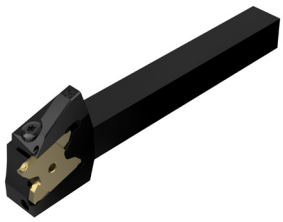


Designation	Item number	H	B	OAL	LF	WF	HF	CP	Weight	CTWS
		mm	mm	mm	mm	mm	mm	bar	kg	
X4FR2020X2503JETI	03244928	20	20	100	36	22,0	20,0	200,0 bar	0,4	X4GK25..RN/RR/RL..
X4FR2525X2503JETI	03244929	25	25	121	37	28,0	25,0	200,0 bar	0,6	X4GK25..RN/RR/RL..
X4FL2020X2503JETI	03244926	20	20	100	36	22,0	20,0	200,0 bar	0,4	X4GK25..LN/LR/LL..
X4FL2525X2503JETI	03244927	25	25	121	37	28,0	25,0	200,0 bar	0,6	X4GK25..LN/LR/LL..

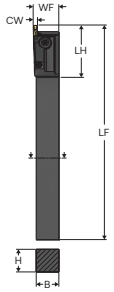
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
-2503	T15P-7	L85020-T15P	JET-P1/8-5MM

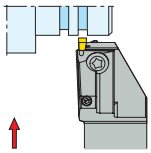
X4FR/L...JET – Toolholders for inserts X4GK – Metric



X4FR/L...JET



X4FR/L...JET
KAPR = 90,0 °



CTWS



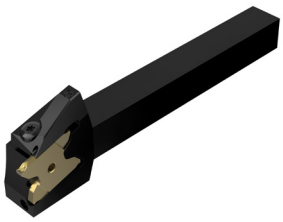
- Right-hand version shown
- For inserts program, see page(s) 982-986
- For holder code key, see page(s) 968
- For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
- Right-hand holder must only be used with Right-hand insert
- Left-hand holder must only be used with Left-hand insert
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CP	Weight	CTWS
		mm	mm	mm	mm	mm	bar	kg	
X4FR1616M2503JET	02823286	16	16	150	18,0	36,0	275,0 bar	0,4	X4GK25..RN/RR/RL..
X4FL1616M2503JET	02823245	16	16	150	18,0	36,0	275,0 bar	0,4	X4GK25..LN/LR/LL..

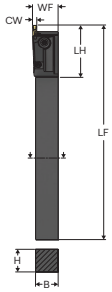
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
-2503	T15P-7	L85020-T15P	JET-P1/8-5MM

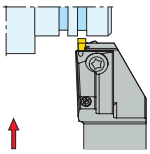
X4FR/L...JET – Toolholders for inserts X4GK – Inch



X4FR/L...JET



KAPR = 90,0 °



CTWS



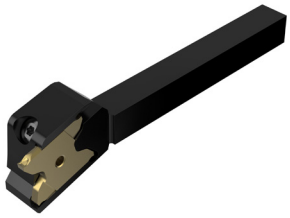
- Right-hand version shown
- For inserts program, see page(s) 982-986
- For holder code key, see page(s) 968
- For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
- Right-hand holder must only be used with Right-hand insert
- Left-hand holder must only be used with Left-hand insert
- For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	LH	CP	Weight	CTWS
		inch	inch	inch	inch	inch	psi	lbs	
X4FR0632503DJET	02823299	0.625	0.625	6.000	0.750	1.441	3988,5	0.880	X42503R
X4FR0752503DJET	02823300	0.750	0.750	6.000	0.866	1.441	3988,5	1.100	X42503R
X4FR1002503DJET	02823301	1.000	1.000	6.000	1.102	1.441	3988,5	1.760	X42503R
X4FL0632503DJET	02823296	0.625	0.625	6.000	0.750	1.441	3988,5	0.880	X42503L
X4FL0752503DJET	02823297	0.750	0.750	6.000	0.866	1.441	3988,5	1.100	X42503L
X4FL1002503DJET	02823298	1.000	1.000	6.000	1.102	1.441	3988,5	1.760	X42503L

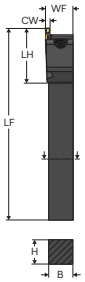
Spare Parts, included in delivery

For	Clamp key	Clamp screw	Plug
			
-2503	T15P-7	L85020-T15P	JET-P1/8-5MM

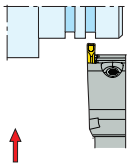
X4FR/L – Toolholders for inserts X4GK – Metric



X4FR/L...JET



X4FR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 982-986
—For holder code key, see page(s) 968
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

CTWS

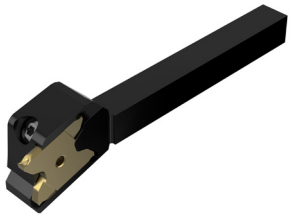


Designation	Item number	H	B	LF	WF	LH	Weight	CTWS
		mm	mm	mm	mm	mm	kg	
X4FR1212K2503	02919944	12	12	125	11,9	36,6	0,2	X4GK25..RN/RR/RL..
X4FR1616K2503	02919937	16	16	125	18,0	36,6	0,3	X4GK25..RN/RR/RL..
X4FR2020M2503	02968134	20	20	150	22,0	36,0	0,5	X4GK25..RN/RR/RL..
X4FR2525M2503	02953258	25	25	150	28,0	36,0	0,8	X4GK25..RN/RR/RL..
X4FL1212K2503	02919935	12	12	125	11,9	36,6	0,2	X4GK25..LN/LR/LL..
X4FL1616K2503	02919936	16	16	125	18,0	36,6	0,3	X4GK25..LN/LR/LL..
X4FL2020M2503	02968135	20	20	150	22,0	36,0	0,5	X4GK25..LN/LR/LL..
X4FL2525M2503	02953259	25	25	150	28,0	36,0	0,8	X4GK25..LN/LR/LL..

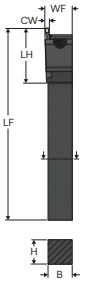
Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
-2503	T15P-7	L85020-T15P

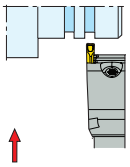
X4FR/L – Toolholders for inserts X4GK – Inch



X4FR/L...JET



X4FR/L
KAPR = 90,0 °



—Right-hand version shown
—For inserts program, see page(s) 982-986
—For holder code key, see page(s) 968
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

CTWS



Designation	Item number	H	B	LF	WF	LH	Weight	CTWS
		inch	inch	inch	inch	inch	lbs	
X4FR050C2503	02933930	0.500	0.500	4.961	0.500	1.441	0.440	X42503R
X4FR063C2503	02933932	0.625	0.625	4.961	0.709	1.441	0.660	X42503R
X4FR0752503D	02968139	0.750	0.750	6.000	0.866	1.417	1.100	X42503R
X4FR1002503D	02968136	1.000	1.000	6.000	1.102	1.417	1.760	X42503R
X4FL050C2503	02933931	0.500	0.500	4.961	0.500	1.441	0.440	X42503L
X4FL063C2503	02933933	0.625	0.625	4.961	0.709	1.441	0.660	X42503L
X4FL0752503D	02968140	0.750	0.750	6.000	0.866	1.417	1.100	X42503L
X4FL1002503D	02968137	1.000	1.000	6.000	1.102	1.417	1.760	X42503L

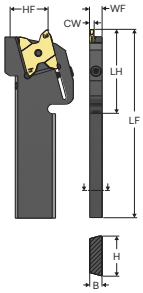
Spare Parts, included in delivery

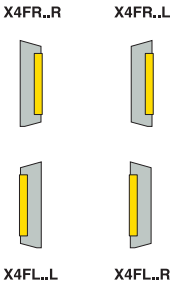
For	Clamp key	Clamp screw
		
-2503	T15P-7	L85020-T15P

X4FR/L...ITX – Toolholders for inserts X4GK – Metric

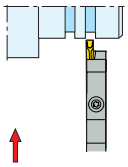


X4FR/L...ITX





X4FR/L..ITX
KAPR = 90,0 °



CTWS



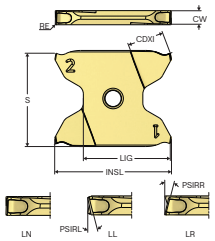
—Right-hand version shown
—For inserts program, see page(s) 982-987
—For holder code key, see page(s) 968
—Right-hand holder must only be used with Right-hand insert
—Left-hand holder must only be used with Left-hand insert
—For ISO attribute explanation, see page 82

Designation	Item number	H	B	LF	WF	HF	LH	Weight	CTWS
		mm	mm	mm	mm	mm	mm	kg	
X4FR26ITX2503R	02866967	16	16,00	119,5	7,85	21,4	47,0	0,2	X4GK25..RN/RR/RL..
X4FR32ITX2503R	02877941	16	16,00	119,5	7,85	25,0	47,0	0,3	X4GK25..RN/RR/RL..
X4FL26ITX2503R	02870671	16	16,00	119,5	7,85	21,4	47,0	0,2	X4GK25..LN/LR/LL..
X4FL32ITX2503R	02877939	16	16,00	119,5	7,85	25,0	47,0	0,3	X4GK25..LN/LR/LL..
X4FR26ITX2503L	02870670	16	16,00	119,5	7,85	21,4	47,0	0,2	X4GK25..RN/RR/RL..
X4FR32ITX2503L	02877940	16	16,00	119,5	7,85	25,0	47,0	0,3	X4GK25..RN/RR/RL..
X4FL26ITX2503L	02870672	16	16,00	119,5	7,85	21,4	47,0	0,2	X4GK25..LN/LR/LL..
X4FL32ITX2503L	02877938	16	16,00	119,1	7,85	25,0	47,0	0,3	X4GK25..LN/LR/LL..

Spare Parts, included in delivery

For	Clamp key	Clamp screw
		
26-32	T10P-2	L84017-T10P

X4GK



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

PSIRR/PSIRL = ±0,25°

* Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder, see guide page(s) 970

Right-hand insert (RN/RR/RL) must only be used with Right-hand holder

For ISO attribute explanation, see page 82

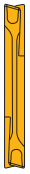
RN-MC



RR-MC

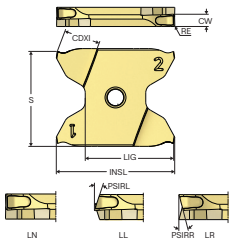


RL-MC



Designation	RE	CW	LIG	INSL	S	CDXI*	PSIRR°	PSIRL°	Grades Coated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP500	CP600	TGH1050
X4GK2503005-0050RN-MC	0,05 *0.002*	0,5 *0.020*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	2,6 *0.102*	0	0		■	■
X4GK2503005-0100RN-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	4,3 *0.169*	0	0		■	■
X4GK2503010-0150RN-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503010-0200RN-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503015-0250RN-MC	0,15 *0.006*	2,5 *0.098*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503015-0300RN-MC	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503020-0150RN-MC	0,2 *0.008*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■		
X4GK2503030-0200RN-MC	0,3 *0.012*	2,0 *0.079*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	6,5 *0.256*	0	0	■		■
X4GK2503030-0250RN-MC	0,3 *0.012*	2,5 *0.098*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■		■
X4GK2503030-0300RN-MC	0,3 *0.012*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■		■
X4GK2503005-0100RR15-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,40 *1.000*	20,36 *0.802*	4,3 *0.169*	15	0		■	
X4GK2503005-0150RR15-MC	0,05 *0.002*	1,5 *0.059*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	15	0	■		
X4GK2503010-0150RR15-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	15	0	■	■	
X4GK2503010-0200RR15-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,35 *0.998*	20,32 *0.800*	6,5 *0.256*	15	0		■	
X4GK2503015-0250RR15-MC	0,15 *0.006*	2,5 *0.098*	18,9 *0.744*	25,32 *0.997*	20,30 *0.799*	6,5 *0.256*	15	0		■	
X4GK2503015-0300RR06-MC	0,15 *0.006*	3,0 *0.118*	18,9 *0.744*	25,31 *0.996*	20,28 *0.798*	6,5 *0.256*	6	0		■	
X4GK2503005-0100RL15-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	4,3 *0.169*	0	15		■	
X4GK2503010-0150RL15-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	15	■	■	
X4GK2503010-0200RL15-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	15		■	
X4GK2503015-0250RL15-MC	0,15 *0.006*	2,5 *0.098*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	15		■	
X4GK2503015-0300RL06-MC	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	6		■	

X4GK



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

PSIRR/PSIRL = ±0,25°

* Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder, see guide page(s) 970

Left-hand insert (LN/LR/LL) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

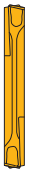
LN-MC



LR-MC

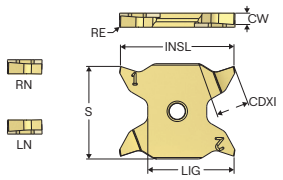


LL-MC



Designation	RE	CW	LIG	INSL	S	CDXI*	PSIRR°	PSIRL°	Grades Coated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*			CP500	CP600	TGH1050
X4GK2503005-0050LN-MC	0,05 *0.002*	0,5 *0.020*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	2,6 *0.102*	0	0		■	■
X4GK2503005-0100LN-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	4,3 *0.169*	0	0		■	■
X4GK2503010-0150LN-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503010-0200LN-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503015-0250LN-MC	0,15 *0.006*	2,5 *0.098*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503015-0300LN-MC	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■	■	■
X4GK2503020-0150LN-MC	0,2 *0.008*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■		
X4GK2503020-0200LN-MC	0,2 *0.008*	2,0 *0.079*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	0	0	■		
X4GK2503030-0250LN-MC	0,3 *0.012*	2,5 *0.098*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■		
X4GK2503030-0300LN-MC	0,3 *0.012*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	0	0	■		
X4GK2503005-0100LR15-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.002*	20,40 *0.803*	4,3 *0.169*	15	0		■	
X4GK2503010-0150LR15-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	15	0	■	■	
X4GK2503010-0200LR15-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	15	0		■	
X4GK2503015-0300LR06-MC	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	6	0		■	
X4GK2503005-0100LL15-MC	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,40 *1.000*	20,36 *0.802*	4,3 *0.169*	0	15		■	
X4GK2503005-0150LL15-MC	0,05 *0.002*	1,5 *0.059*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	0	15	■		
X4GK2503010-0150LL15-MC	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	0	15	■		
X4GK2503010-0200LL15-MC	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,35 *0.998*	20,32 *0.800*	6,5 *0.256*	0	15		■	
X4GK2503015-0250LL15-MC	0,15 *0.006*	2,5 *0.098*	18,9 *0.744*	25,32 *0.997*	20,30 *0.799*	6,5 *0.256*	0	15		■	
X4GK2503015-0300LL06-MC	0,15 *0.006*	3,0 *0.118*	18,9 *0.744*	25,31 *0.996*	20,28 *0.798*	6,5 *0.256*	0	6		■	

X4GK



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

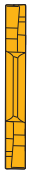
* Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder, see guide page(s) 970

Right-hand insert (RN/RR/RL) must only be used with Right-hand holder

Left-hand insert (LN/LR/LL) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RN-FG



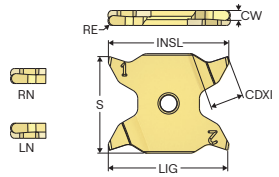
LN-FG



Designation	RE	CW	LIG	INSL	S	CDXI*	Grades Coated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500	CP600	TGH1050
X4GK2503005-0050RN-FG	0,05 *0.002*	0,5 *0.020*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	2,6 *0.102*			■
X4GK2503005-0100RN-FG	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*			■
X4GK2503010-0115RN-FG	0,1 *0.004*	1,15 *0.045*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*	■		
X4GK2503010-0135RN-FG	0,1 *0.004*	1,35 *0.053*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*	■		
X4GK2503010-0150RN-FG	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503010-0165RN-FG	0,1 *0.004*	1,65 *0.065*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	■		
X4GK2503010-0190RN-FG	0,1 *0.004*	1,9 *0.075*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	■		
X4GK2503010-0200RN-FG	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503015-0215RN-FG	0,15 *0.006*	2,15 *0.085*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	■		
X4GK2503015-0250RN-FG	0,15 *0.006*	2,5 *0.098*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503015-0265RN-FG	0,15 *0.006*	2,65 *0.104*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	■		
X4GK2503015-0300RN-FG	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503005-0050LN-FG	0,05 *0.002*	0,5 *0.020*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	2,6 *0.102*			■
X4GK2503005-0100LN-FG	0,05 *0.002*	1,0 *0.039*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*			■
X4GK2503010-0115LN-FG	0,1 *0.004*	1,15 *0.045*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*	■		
X4GK2503010-0135LN-FG	0,1 *0.004*	1,35 *0.053*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	4,3 *0.169*	■		
X4GK2503010-0150LN-FG	0,1 *0.004*	1,5 *0.059*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503010-0165LN-FG	0,1 *0.004*	1,65 *0.065*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	■		
X4GK2503010-0190LN-FG	0,1 *0.004*	1,9 *0.075*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*	■		
X4GK2503010-0200LN-FG	0,1 *0.004*	2,0 *0.079*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503015-0215LN-FG	0,15 *0.006*	2,15 *0.085*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	■		
X4GK2503015-0250LN-FG	0,15 *0.006*	2,5 *0.098*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■
X4GK2503015-0265LN-FG	0,15 *0.006*	2,65 *0.104*	19,0 *0.748*	25,43 *1.001*	20,39 *0.803*	6,5 *0.256*	■		

Designation	RE	CW	LIG	INSL	S	CDXI*	Grades		
							Coated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500	CP600	TGH1050
X4GK2503015-0300LN-FG	0,15 *0.006*	3,0 *0.118*	19,0 *0.748*	25,44 *1.001*	20,40 *0.803*	6,5 *0.256*			■

X4GK



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

* Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder, see guide page(s) 970

Right-hand insert (RN/RR/RL) must only be used with Right-hand holder

Left-hand insert (LN/LR/LL) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RN-R

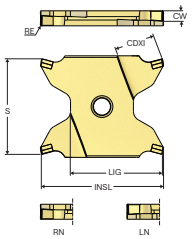


LN-R



Designation	RE	CW	LIG	INSL	S	CDXI*	Grades		
							Coated		
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CP500	CP600	TGH1050
X4GK2503M0-0100RN-R	0,5 *0.020*	1,0 *0.039*	19,0 *0.748*	25,24 *0.994*	20,38 *0.802*	4,3 *0.169*	■		
X4GK2503M0-0120RN-R	0,6 *0.024*	1,2 *0.047*	19,0 *0.748*	25,29 *0.996*	20,37 *0.802*	4,3 *0.169*	■		
X4GK2503M0-0150RN-R	0,75 *0.030*	1,5 *0.059*	19,0 *0.748*	25,36 *0.998*	20,37 *0.802*	6,5 *0.256*	■		
X4GK2503M0-0200RN-R	1,0 *0.039*	2,0 *0.079*	19,0 *0.748*	25,39 *1.000*	20,36 *0.801*	6,5 *0.256*	■		
X4GK2503M0-0300RN-R	1,5 *0.059*	3,0 *0.118*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	■		
X4GK2503M0-0100LN-R	0,5 *0.020*	1,0 *0.039*	19,0 *0.748*	25,24 *0.994*	20,38 *0.802*	4,3 *0.169*	■		
X4GK2503M0-0120LN-R	0,6 *0.024*	1,2 *0.047*	19,0 *0.748*	25,29 *0.996*	20,37 *0.802*	4,3 *0.169*	■		
X4GK2503M0-0150LN-R	0,75 *0.030*	1,5 *0.059*	19,0 *0.748*	25,36 *0.998*	20,37 *0.802*	6,5 *0.256*	■		
X4GK2503M0-0200LN-R	1,0 *0.039*	2,0 *0.079*	19,0 *0.748*	25,39 *1.000*	20,36 *0.801*	6,5 *0.256*	■		
X4GK2503M0-0300LN-R	1,5 *0.059*	3,0 *0.118*	19,0 *0.748*	25,37 *0.999*	20,34 *0.801*	6,5 *0.256*	■		

X4G



Tolerances:
CW = ±0,025/*0.001*
CDXI = ±0,1/*0.004*
S = ±0,025/*0.001*
RE = ±0,03/*0.0012*

* Maximum cutting depth CDXI is limited relative to workpiece diameter to avoid contact between workpiece and toolholder, see guide page(s) 970

Right-hand insert (RN/RR/RL) must only be used with Right-hand holder

Left-hand insert (LN/LR/LL) must only be used with Left-hand holder

For ISO attribute explanation, see page 82

RN-D



LN-D



							Grades
Designation	**RE**	**CW**	**LIG**	**INSL**	**S**	**CDXI***	**Coated**
	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	CBN200
X4G2503015S-0215RN-D	0,15 *0.006*	2,15 *0.085*	19,0 *0.748*	25,0 *0.984*	20,361 *0.802*	6,5 *0.256*	■
X4G2503015S-0215LN-D	0,15 *0.006*	2,15 *0.085*	19,0 *0.748*	25,0 *0.984*	20,361 *0.802*	6,5 *0.256*	■



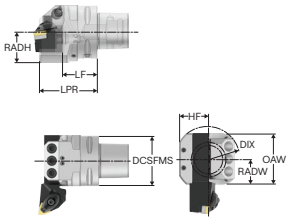
Adapters

Seco offers a comprehensive product range of stationary adapters that can be used in horizontal or vertical lathes, machining centers and sliding-head and multi-tasking machines. These products can be used in spindles, turrets, sub-spindles and half-turrets.

– Shank tools adapters offer a very popular connection for square-shank turning toolholders.
– Boring bars adapters offer several flexible tool sizes in a wide diameter range for rough and fine boring.

C.-ASHA-..JETI
– Metric/ Inch





—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

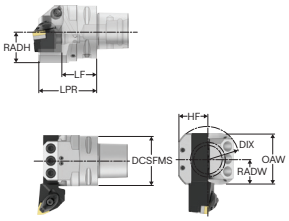
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-ASHA-065-20JETI	03142918	C5	50,0 *1.969*	85,0 *3.346*	45,0 *1.772*	20,0 *0.787*	65,0 *2.559*	64,0 *2.520*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	1,5 *3.310*
C6-ASHA-070-20JETI	03142926	C6	63,0 *2.480*	85,0 *3.346*	50,0 *1.969*	20,0 *0.787*	70,0 *2.756*	64,0 *2.520*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	1,9 *4.190*
C6-ASHA-080-25JETI	03142927	C6	63,0 *2.480*	100,0 *3.937*	55,0 *2.165*	25,0 *0.984*	80,0 *3.150*	76,0 *2.992*	38,0 *1.496*	46,0 *1.811*	150,0 *2175,6*	2,5 *5.510*
C8-ASHA-075-25JETI	03142941	C8	80,0 *3.150*	103,0 *4.055*	50,0 *1.969*	25,0 *0.984*	75,0 *2.953*	80,0 *3.150*	38,0 *1.496*	46,0 *1.811*	150,0 *2175,6*	3,1 *6.830*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
Cx-ASHA	T6SS12X20	CN8

C.-ASHA-..JETI – Inch





—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

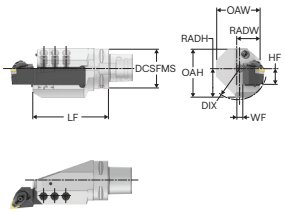
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	RADW	RADH	CP	Weight
			inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs
C5-ASHA-065-12AJETI	10008680	C5	1.969	3.346	1.809	0.750	2.559	2.520	1.260	1.457	2175,6	3.310
C6-ASHA-070-12AJETI	10008679	C6	2.480	3.346	2.006	0.750	2.756	2.520	1.260	1.457	2175,6	4.190
C6-ASHA-080-16AJETI	10008681	C6	2.480	3.937	2.150	1.000	3.150	2.992	1.496	1.811	2175,6	5.510

Spare Parts, included in delivery

For	Clamp screw	Nozzle
		
C.-ASHA	T6SS12X20	CN8

C.-ASHR/L-..JETI
– Metric/ Inch





—Right-hand version shown
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

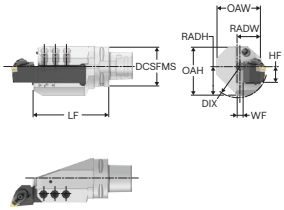
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-ASHR-095-20JETI	03142924	C5	50,0 *1.969*	85,0 *3.346*	95,0 *3.740*	20,0 *0.787*	10,0 *0.394*	69,0 *2.717*	30,0 *1.181*	37,0 *1.457*	150,0 *2175,6*	1,7 *3.750*
C5-ASHL-095-20JETI	03142921	C5	50,0 *1.969*	85,0 *3.346*	95,0 *3.740*	20,0 *0.787*	10,0 *0.394*	69,0 *2.717*	30,0 *1.181*	37,0 *1.457*	150,0 *2175,6*	1,7 *3.750*
C6-ASHR-105-20JETI	03142932	C6	63,0 *2.480*	85,0 *3.346*	105,0 *4.134*	20,0 *0.787*	10,0 *0.394*	69,0 *2.717*	30,0 *1.181*	37,0 *1.457*	150,0 *2175,6*	2,3 *5.070*
C6-ASHR-122-25JETI	03142933	C6	63,0 *2.480*	100,0 *3.937*	122,0 *4.803*	25,0 *0.984*	13,0 *0.512*	78,0 *3.071*	38,0 *1.496*	46,0 *1.811*	150,0 *2175,6*	3,0 *6.610*
C6-ASHL-105-20JETI	03142928	C6	63,0 *2.480*	85,0 *3.346*	105,0 *4.134*	20,0 *0.787*	10,0 *0.394*	69,0 *2.717*	30,0 *1.181*	37,0 *1.457*	150,0 *2175,6*	2,4 *5.290*
C6-ASHL-122-25JETI	03142929	C6	63,0 *2.480*	100,0 *3.937*	122,0 *4.803*	25,0 *0.984*	13,0 *0.512*	78,0 *3.071*	38,0 *1.496*	46,0 *1.811*	150,0 *2175,6*	2,9 *6.390*
C8-ASHR-122-25JETI	03142943	C8	80,0 *3.150*	103,0 *4.055*	122,0 *4.803*	25,0 *0.984*	15,0 *0.591*	86,0 *3.386*	40,0 *1.575*	46,0 *1.811*	150,0 *2175,6*	3,9 *8.600*
C8-ASHL-122-25JETI	03142942	C8	80,0 *3.150*	103,0 *4.055*	122,0 *4.803*	25,0 *0.984*	15,0 *0.591*	86,0 *3.386*	40,0 *1.575*	46,0 *1.811*	150,0 *2175,6*	3,9 *8.600*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
...-095, -105	T6SS10X20	CN8
...-122	T6SS12X20	CN8

C.-ASHR/L-..JETI – Inch





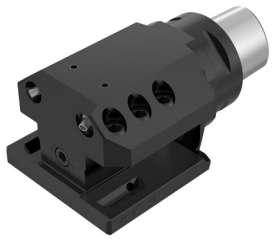
—Right-hand version shown
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

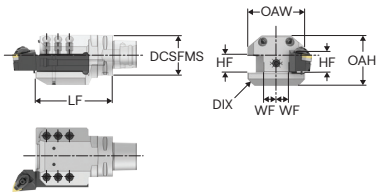
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAH	RADW	RADH	CP	Weight
			inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs
C5-ASHR-095-12AJETI	10008687	C5	1.969	3.346	3.740	0.750	0.431	2.717	1.181	1.457	2175,6	3.750
C5-ASHL-095-12AJETI	10008688	C5	1.969	3.346	3.740	0.750	0.431	2.717	1.181	1.457	2175,6	3.750
C6-ASHR-105-12AJETI	10008685	C6	2.480	3.346	4.134	0.750	0.431	2.717	1.260	1.457	2175,6	5.290
C6-ASHR-122-16AJETI	10008689	C6	2.480	3.937	4.803	1.000	0.496	3.071	1.496	1.811	2175,6	6.610
C6-ASHL-105-12AJETI	10008686	C6	2.480	3.346	4.134	0.750	0.431	2.717	1.260	1.457	2175,6	5.290
C6-ASHL-122-16AJETI	10008690	C6	2.480	3.937	4.803	1.000	0.496	3.071	1.496	1.811	2175,6	6.610

Spare Parts, included in delivery

For	Clamp screw	Nozzle
		
...-095/105	T6SS10X20	CN8
...-122	T6SS12X20	CN8

C.-ASHS-..JETI
– Metric/ Inch





—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

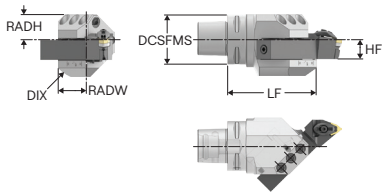
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAW	OAH	RADW	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C6-ASHS-122-25JETI	03142936	C6	63,0 *2.480*	114,0 *4.488*	122,0 *4.803*	25,0 *0.984*	20,0 *0.787*	90,0 *3.543*	78,0 *3.071*	45,0 *1.772*	150,0 *2175,6*	4,2 *9.260*
C8-ASHS-122-25JETI	03142944	C8	80,0 *3.150*	128,0 *5.039*	122,0 *4.803*	25,0 *0.984*	30,0 *1.181*	110,0 *4.331*	78,0 *3.071*	55,0 *2.165*	150,0 *2175,6*	4,8 *10.580*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
Cx-ASHS	T6SS12X20	CN8

C.-ASHR/L-..JETI – Metric/ Inch





—Right-hand version shown
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

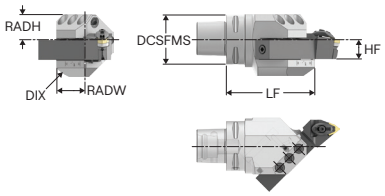
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-ASHR45-085-20JETI	03142925	C5	50,0 *1.969*	85,0 *3.346*	85,0 *3.346*	20,0 *0.787*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	1,6 *3.530*
C5-ASHL45-085-20JETI	03142923	C5	50,0 *1.969*	85,0 *3.346*	85,0 *3.346*	20,0 *0.787*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	1,5 *3.310*
C6-ASHR45-095-20JETI	03142934	C6	63,0 *2.480*	85,0 *3.346*	95,0 *3.740*	20,0 *0.787*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	2,2 *4.850*
C6-ASHR45-114-25JETI	03142935	C6	63,0 *2.480*	100,0 *3.937*	114,0 *4.488*	25,0 *0.984*	36,0 *1.417*	46,0 *1.811*	150,0 *2175,6*	2,9 *6.390*
C6-ASHL45-095-20JETI	03142930	C6	63,0 *2.480*	85,0 *3.346*	95,0 *3.740*	20,0 *0.787*	32,0 *1.260*	37,0 *1.457*	150,0 *2175,6*	2,1 *4.630*
C6-ASHL45-114-25JETI	03142931	C6	63,0 *2.480*	100,0 *3.937*	114,0 *4.488*	25,0 *0.984*	36,0 *1.417*	46,0 *1.811*	150,0 *2175,6*	2,8 *6.170*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
...-085, -095	T6SS10X20	CN8
...114	T6SS12X20	CN8

C.-ASHR/L-..JETI
– Inch





—Right-hand version shown
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

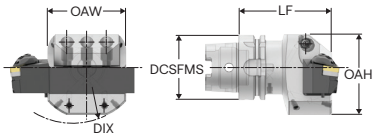
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	RADW	RADH	CP	Weight
			inch	inch	inch	inch	inch	inch	psi	lbs
C5-ASHR45-085-12AJETI	10008693	C5	1.969	3.346	3.346	0.750	1.260	1.457	2175,6	3.530
C5-ASHL45-085-12AJETI	10008694	C5	1.969	3.346	3.346	0.750	1.260	1.457	2175,6	3.530
C6-ASHR45-095-12AJETI	10008691	C6	2.480	3.346	3.740	0.750	1.260	1.457	2175,6	4.850
C6-ASHR45-114-16AJETI	10008682	C6	2.480	3.937	4.488	1.000	1.417	1.811	2175,6	6.390
C6-ASHL45-095-12AJETI	10008692	C6	2.480	3.346	3.740	0.750	1.260	1.457	2175,6	5.290
C6-ASHL45-114-16AJETI	10008683	C6	2.480	3.937	4.488	1.000	1.417	1.811	2175,6	6.390

Spare Parts, included in delivery

For	Clamp screw	Nozzle
		
...-085/095	T6SS10X20	CN8
...-114	T6SS12X20	CN8

E9364-ASHA-..JETI – Metric/ Inch





—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

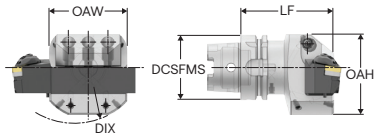
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
E9364-ASHA-090-25JETI	03142937	HSK-T63	63,0 *2.480*	100,0 *3.937*	65,0 *2.559*	25,0 *0.984*	90,0 *3.543*	76,0 *2.992*	78,0 *3.071*	38,0 *1.496*	46,0 *1.811*	150,0 *2175,6*	2,3 *5.070*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
E9364-ASHA	T6SS12X20	CN8

E9364-ASHA-..JETI – Inch





—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

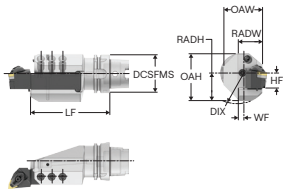
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	OAH	RADW	RADH	CP	Weight
			inch	inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs
E9364-ASHA-090-16AJETI	10008684	HSK-T63	2.478	3.937	2.543	1.000	3.543	2.992	3.071	1.496	1.811	2175,6	5.070

Spare Parts, included in delivery

For	Clamp screw	Nozzle
		
E9364	T6SS12X20	CN8

E9364-ASHR/L-..JETI – Metric/ Inch





—Right-hand version shown
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

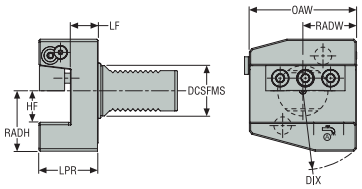
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
E9364-ASHR-132-25JETI	03142939	HSK-T63	63,0 *2.480*	100,0 *3.937*	132,0 *5.197*	25,0 *0.984*	69,47 *2.735*	78,0 *3.071*	48,0 *1.890*	46,0 *1.811*	150,0 *2175,6*	2,7 *5.950*
E9364-ASHL-132-25JETI	03142938	HSK-T63	63,0 *2.480*	100,0 *3.937*	132,0 *5.197*	25,0 *0.984*	69,47 *2.735*	78,0 *3.071*	48,0 *1.890*	46,0 *1.811*	150,0 *2175,6*	2,8 *6.170*

Spare Parts, included in delivery

For	Clamp screw	Coolant nozzle
		
E9364-ASHR/L	T6SS12X20	CN8

ASHA-R/L-..-JETI – Metric/ Inch

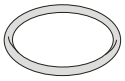
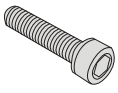
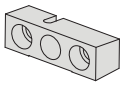




—Right-hand version shown
—Face mounting turret position
—Double sided VDI shank grinding
—Right combined design B1 and B4
—Left combined design B2 and B3
—Left combined design B2 and B3
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85–[XXX], 1029
—For ISO attribute explanation, see page 82

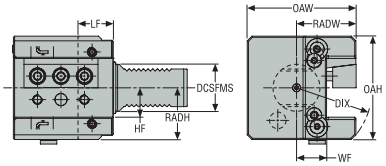
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
ASHA-R-VDI30-20-JETI	03200452	VDI30	30,0 *1.181*	103,0 *4.055*	22,0 *0.866*	20,0 *0.787*	42,0 *1.654*	70,0 *2.756*	35,0 *1.378*	38,0 *1.496*	80,0 *1160,3*	1,6 *3.530*
ASHA-L-VDI30-20-JETI	03200455	VDI30	30,0 *1.181*	103,0 *4.055*	22,0 *0.866*	20,0 *0.787*	42,0 *1.654*	70,0 *2.756*	35,0 *1.378*	38,0 *1.496*	80,0 *1160,3*	1,6 *3.530*
ASHA-R-VDI40-25-JETI	03200453	VDI40	40,0 *1.575*	128,0 *5.039*	22,0 *0.866*	25,0 *0.984*	47,0 *1.850*	85,0 *3.346*	42,5 *1.673*	48,0 *1.890*	80,0 *1160,3*	2,6 *5.730*
ASHA-L-VDI40-25-JETI	03200456	VDI40	40,0 *1.575*	128,0 *5.039*	22,0 *0.866*	25,0 *0.984*	47,0 *1.850*	85,0 *3.346*	42,5 *1.673*	48,0 *1.890*	80,0 *1160,3*	2,7 *5.950*
ASHA-R-VDI50-25-JETI	03200454	VDI50	50,0 *1.969*	142,0 *5.591*	30,0 *1.181*	25,0 *0.984*	55,0 *2.165*	100,0 *3.937*	50,0 *1.969*	50,0 *1.969*	80,0 *1160,3*	4,4 *9.700*
ASHA-L-VDI50-25-JETI	03200457	VDI50	50,0 *1.969*	142,0 *5.591*	30,0 *1.181*	25,0 *0.984*	55,0 *2.165*	100,0 *3.937*	50,0 *1.969*	50,0 *1.969*	80,0 *1160,3*	4,4 *9.700*

Spare Parts, included in delivery

For	Clamp screw	Coolant adapter	Nozzle	O-ring	Screw	Screw 2	Washer	Wedge
								
L-VDI50	MC6S8X30	JET-CFP1/8	CN13	5641001-119	MF6S6X12	MC6S8X16	JET-CS1013	5431115-08
R-VDI50	MC6S8X30	JET-CFP1/8	CN13	5641001-119	MF6S6X12	MC6S8X16	JET-CS1013	5431115-08
VDI30	MC6S6X25	JET-CFP1/8	CN14	5641005-134	MF6S5X12	MC6S6X14	JET-CS1013	5431115-07
VDI40	MC6S8X25	JET-CFP1/8	CN14	5641005-135	MF6S5X12	MC6S8X16	JET-CS1013	5431115-08

ASHN-...-JETI – Metric/ Inch

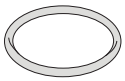
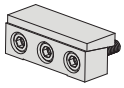




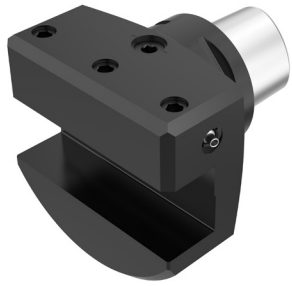
—Neutral version shown
—Star mounting turret position
—Double sided VDI shank grinding
—Neutral combined design C1, C2, C3, C4
—For more information on Jetstream Tooling® and accessories, see page(s) 39, 85-[XXX], 1029
—For ISO attribute explanation, see page 82

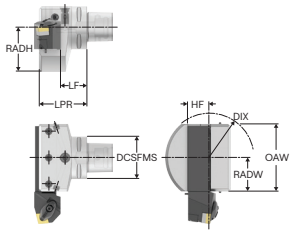
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	OAW	OAH	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
ASHN-VDI30-20-JETI	03200450	VDI30	30,0 *1.181*	65,0 *2.559*	22,0 *0.866*	20,0 *0.787*	85,5 *3.366*	70,0 *2.756*	55,5 *2.185*	35,0 *1.378*	80,0 *1160,3*	2,1 *4.630*
ASHN-VDI40-25-JETI	03200451	VDI40	40,0 *1.575*	64,0 *2.520*	30,0 *1.181*	25,0 *0.984*	92,5 *3.642*	88,0 *3.465*	50,5 *1.988*	44,0 *1.732*	80,0 *1160,3*	3,5 *7.720*

Spare Parts, included in delivery

For	Coolant adapter	Nozzle	O-ring	Screw	Washer	Wedge set
						
..-20	JET-CFP1/8	CN14	5641005-134	MF6S5X12	JET-CS1013	5431130-02
..-25	JET-CFP1/8	CN13	5641005-135	MF6S6X12	JET-CS1013	5431130-03

C.-ASHA – Metric/ Inch

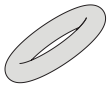




—Neutral version shown
—For ISO attribute explanation, see page 82

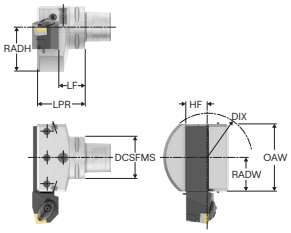
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	RADW	RADH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C6-ASHA-50071-32M	02690506	C6	63,0 *2.480*	130,0 *5.118*	45,0 *1.772*	32,0 *1.260*	71,0 *2.795*	100,0 *3.937*	50,0 *1.969*	65,0 *2.559*	80,0 *1160,3*	3,3 *7.280*

Spare Parts, included in delivery

For	Bolt	Circlip	Coolant nozzle	O-ring
				
C6	VB23	SGH1510	CN7	ORING-9X2

C.-ASHA – Inch





—Neutral version shown
—For ISO attribute explanation, see page 82

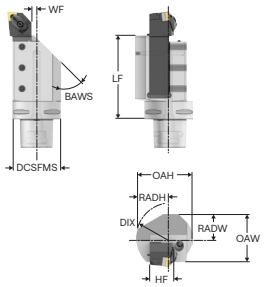
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	LPR	OAW	RADW	RADH	CP	Weight
			inch	inch	inch	inch	inch	inch	inch	inch	psi	lbs
C8-ASHA-55085-20-A	02594533	C8	3.150	5.591	2.087	1.250	3.346	4.331	2.165	2.559	1160,3	10.360

Spare Parts, included in delivery

For	Coolant nozzle
	
C8	CN7

C.-ASHR/L – Metric/ Inch





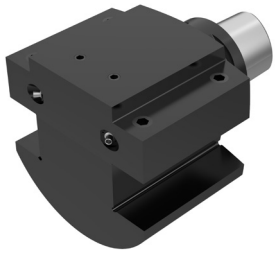
—Right-hand version shown
—For ISO attribute explanation, see page 82

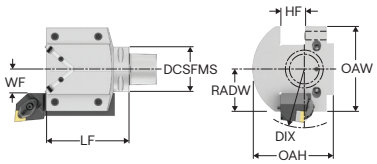
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAW	OAH	RADW	RADH	BAWS°	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		bar *psi*	kg *lbs*
C8-ASHR-40140-32	02548913	C8	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	32,0 *1.260*	8,0 *0.315*	80,0 *3.150*	85,0 *3.346*	40,0 *1.575*	55,0 *2.165*	30,0	80,0 *1160,3*	5,1 *11.240*
C8-ASHL-40140-32	02545526	C8	80,0 *3.150*	110,0 *4.331*	140,0 *5.512*	32,0 *1.260*	8,0 *0.315*	80,0 *3.150*	85,0 *3.346*	40,0 *1.575*	55,0 *2.165*	30,0	80,0 *1160,3*	5,1 *11.240*

Spare Parts, included in delivery

For	Coolant nozzle
	
C8	CN8

C.-ASHS – Metric/ Inch





—Neutral version shown
—For ISO attribute explanation, see page 82

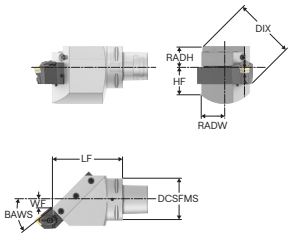
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	OAW	OAH	RADW	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C6-ASHS-58115-32	00024834	C6	63,0 *2.480*	140,0 *5.512*	115,0 *4.528*	32,0 *1.260*	33,0 *1.299*	116,0 *4.567*	110,0 *4.331*	58,0 *2.283*	80,0 *1160,3*	7,2 *15.870*

Spare Parts, included in delivery

For	Coolant nozzle
	
C6	CN7

C.-ASHR/L – Metric/ Inch





—Right-hand version shown
—For ISO attribute explanation, see page 82

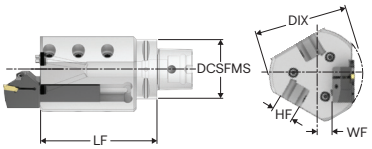
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	RADW	RADH	BAWS°	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		bar *psi*	kg *lbs*
C8-ASHR45-50135-32	02548915	C8	80,0 *3.150*	140,0 *5.512*	115,0 *4.528*	32,0 *1.260*	45,0 *1.772*	40,0 *1.575*	45,0	80,0 *1160,3*	6,6 *14.550*
C8-ASHL45-50135-32	02590034	C8	80,0 *3.150*	140,0 *5.512*	135,0 *5.315*	32,0 *1.260*	45,0 *1.772*	40,0 *1.575*	45,0	80,0 *1160,3*	6,6 *14.550*

Spare Parts, included in delivery

For	Coolant nozzle
	
C8	CN7

C.-ASHR/L – Metric/ Inch





—Right-hand version shown
—For ISO attribute explanation, see page 82

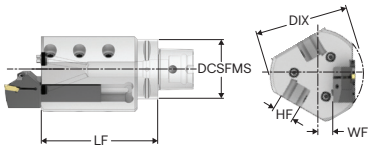
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-ASHR3-36123-20	02590021	C5	50,0 *1.969*	90,0 *3.543*	123,0 *4.843*	20,0 *0.787*	16,0 *0.630*	80,0 *1160,3*	3,7 *8.160*
C6-ASHR3-36125-20	02437460	C6	63,0 *2.480*	90,0 *3.543*	125,0 *4.921*	20,0 *0.787*	16,0 *0.630*	80,0 *1160,3*	3,8 *8.380*
C6-ASHL3-36125-20	02204131	C6	63,0 *2.480*	90,0 *3.543*	125,0 *4.921*	20,0 *0.787*	16,0 *0.630*	80,0 *1160,3*	3,8 *8.380*

Spare Parts, included in delivery

For	Coolant nozzle
	
C5 / C6	CN7

C.-ASHR/L – Inch





—Right-hand version shown
—For ISO attribute explanation, see page 82

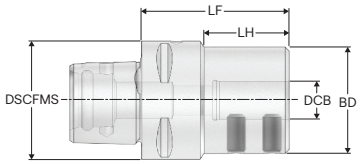
Designation	Item number	CTMS	DCSFMS	DIX	LF	HF	WF	CP	Weight
			inch	inch	inch	inch	inch	psi	lbs
C6-ASHR3-36125-12-A	02594601	C6	2.480	3.543	4.843	0.750	0.614	1160,3	9.040

Spare Parts, included in delivery

For	Coolant nozzle
	
C6	CN7

C.-131 – Metric/ Inch





—For ISO attribute explanation, see page 82

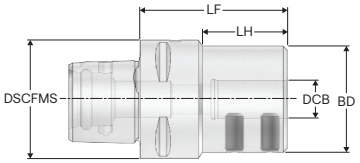
Designation	Item number	CTMS	DCSFMS	DCB	BD	LF	LH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C3-131-00035-10	00094677	C3	32,0 *1.260*	10,0 *0.394*	36,0 *1.417*	35,0 *1.378*	20,0 *0.787*	80,0 *1160,3*	0,24 *0.530*
C3-131-00040-12	00094678	C3	32,0 *1.260*	12,0 *0.472*	36,0 *1.417*	40,0 *1.575*	24,0 *0.945*	80,0 *1160,3*	0,1 *0.220*
C4-131-00040-10	00072826	C4	40,0 *1.575*	10,0 *0.394*	36,0 *1.417*	40,0 *1.575*	19,0 *0.748*	80,0 *1160,3*	0,5 *1.100*
C4-131-00045-12	00094679	C4	40,0 *1.575*	12,0 *0.472*	36,0 *1.417*	45,0 *1.772*	24,0 *0.945*	80,0 *1160,3*	0,42 *0.930*
C4-131-00050-16	00094680	C4	40,0 *1.575*	16,0 *0.630*	36,0 *1.417*	50,0 *1.969*	29,0 *1.142*	80,0 *1160,3*	0,4 *0.880*
C5-131-00045-10	00094681	C5	50,0 *1.969*	10,0 *0.394*	36,0 *1.417*	45,0 *1.772*	21,0 *0.827*	80,0 *1160,3*	0,62 *1.370*
C5-131-00045-12	00094682	C5	50,0 *1.969*	12,0 *0.472*	36,0 *1.417*	45,0 *1.772*	22,5 *0.886*	80,0 *1160,3*	0,6 *1.320*
C5-131-00055-16	00094683	C5	50,0 *1.969*	16,0 *0.630*	36,0 *1.417*	55,0 *2.165*	31,0 *1.220*	80,0 *1160,3*	0,65 *1.430*

Spare Parts, included in delivery

For	Key	Screw
		
...-10	3SMS795	951C0610
...-12	3SMS795	951C0610
...-16	4SMS795	951C0810

C.-131 – Inch



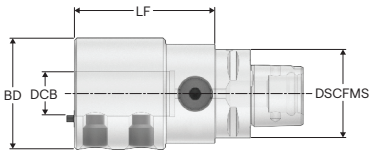


—For ISO attribute explanation, see page 82

Designation	Item number	CTMS	DCSFMS	DCB	BD	LF	LH	CP	Weight
			inch	inch	inch	inch	inch	psi	lbs
C4-131-00050-375	00077762	C4	1.575	0.375	1.417	1.969	1.130	1160,3	1.100
C4-131-00050-500	00077765	C4	1.575	0.500	1.417	1.969	1.130	1160,3	1.010
C4-131-00050-625	00077771	C4	1.575	0.625	1.417	1.969	1.134	1160,3	1.100
C4-131-00060-750	00077772	C4	1.575	0.750	1.417	2.362	1.417	1160,3	1.100
C5-131-00060-500	00077773	C5	1.969	0.500	1.417	2.362	1.575	1160,3	1.610
C5-131-00060-625	00077774	C5	1.969	0.625	1.417	2.362	1.575	1160,3	1.570
C5-131-00060-750	00077775	C5	1.969	0.750	1.417	2.362	1.575	1160,3	1.480
C5-131-00070-1000	00077777	C5	1.969	1.000	2.126	2.756	1.969	1160,3	2.450
C6-131-00065-375	00061733	C6	2.480	0.375	1.417	2.559	0.787	1160,3	2.650
C6-131-00065-500	00061734	C6	2.480	0.500	1.417	1.102	1.020	1160,3	2.650
C6-131-00065-625	00061735	C6	2.480	0.625	1.417	2.559	1.260	1160,3	2.650
C6-131-00065-750	00077778	C6	2.480	0.750	1.417	2.559	1.539	1160,3	2.250
C6-131-00075-1000	00077779	C6	2.480	1.000	2.126	2.953	2.039	1160,3	3.310

C.-131 – Metric/ Inch





—Sleeves, see page(s) 1011
—For ISO attribute explanation, see page 82

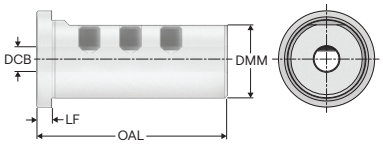
Designation	Item number	CTMS	DCSFMS	DCB	BD	LF	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C5-131-00100-25	02466940	C5	50,0 *1.969*	25,0 *0.984*	63,0 *2.480*	100,0 *3.937*	80,0 *1160,3*	2,1 *4.630*
C6-131-00098-25	02435607	C6	63,0 *2.480*	25,0 *0.984*	63,0 *2.480*	98,0 *3.858*	80,0 *1160,3*	2,3 *5.070*
C8-131-00098-25	02590011	C8	80,0 *3.150*	25,0 *0.984*	63,0 *2.480*	98,0 *3.858*	80,0 *1160,3*	3,5 *7.720*
C8-131-00112-40	02590013	C8	80,0 *3.150*	40,0 *1.575*	80,0 *3.150*	112,0 *4.409*	80,0 *1160,3*	4,2 *9.260*

Spare Parts, included in delivery

For	Locking key	Locking screw
		
C5...-25	8SMS795	LH16020
C6...-25	8SMS795	LH16020
C8...-25	8SMS795	LH16020
C8...-40	10SMS795	LH20020

Reduction sleeves 132N – Metric/ Inch





—Holders, see page(s) 1010
—For ISO attribute explanation, see page 82

Designation	Item number	DMM	DCB	LF	OAL	Weight
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*
132N-2506	02583296	25,0 *0.984*	6,0 *0.236*	5,0 *0.197*	61,0 *2.402*	0,3 *0.660*
132N-2508	02583300	25,0 *0.984*	8,0 *0.315*	5,0 *0.197*	61,0 *2.402*	0,3 *0.660*
132N-2510	02583301	25,0 *0.984*	10,0 *0.394*	5,0 *0.197*	61,0 *2.402*	0,3 *0.660*
132N-2512	02583302	25,0 *0.984*	12,0 *0.472*	5,0 *0.197*	61,0 *2.402*	0,2 *0.440*
132N-2516	02435623	25,0 *0.984*	16,0 *0.630*	5,0 *0.197*	61,0 *2.402*	0,1 *0.220*
132N-2520	02435624	25,0 *0.984*	20,0 *0.787*	5,0 *0.197*	61,0 *2.402*	0,1 *0.220*
132N-4020	02533449	40,0 *1.575*	20,0 *0.787*	5,0 *0.197*	75,0 *2.953*	0,6 *1.320*
132N-4025	02583362	40,0 *1.575*	25,0 *0.984*	5,0 *0.197*	75,0 *2.953*	0,5 *1.100*
132N-4032	02435628	40,0 *1.575*	32,0 *1.260*	5,0 *0.197*	75,0 *2.953*	0,3 *0.660*

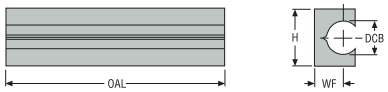
Spare Parts, included in delivery

For	Key	Screw
		
-2506	3SMS795	P6SS6X8
-2508	4SMS795	P6SS8X8
-2510	4SMS795	P6SS8X6
-2512	4SMS795	P6SS8X6
-2516/-2520/4032	–	–
-4020	5SMS795	P6SS10X8
-4025	5SMS795	P6SS10X8

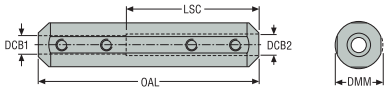
131-, SL Holders and sleeves for boring tools – Metric/ Inch



131-..



SL16..



–For ISO attribute explanation, see page 82

Designation	Item number	DMM	DCB	DCB1	DCB2	WF	H	OAL	LSC	Weight
		mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	kg *lbs*
131-408	75003148	8,0 *0.315*	8,0 *0.315*	–	–	–	13,0 *0.512*	110,0 *4.331*	–	0,2 *0.440*
131-410	75003149	10,0 *0.394*	10,0 *0.394*	–	–	–	16,0 *0.630*	110,0 *4.331*	–	0,2 *0.440*
131-412	75003150	12,0 *0.472*	12,0 *0.472*	–	–	–	20,0 *0.787*	110,0 *4.331*	–	0,2 *0.440*
131-416	75003151	16,0 *0.630*	16,0 *0.630*	–	–	–	25,0 *0.984*	110,0 *4.331*	–	0,3 *0.660*
131-420	75003152	20,0 *0.787*	20,0 *0.787*	–	–	–	32,0 *1.260*	110,0 *4.331*	–	0,328 *0.720*
SL160506	00026511	16,0 *0.630*	–	5,0 *0.197*	6,0 *0.236*	–	–	75,0 *2.953*	45,0 *1.772*	0,1 *0.220*
SL160608	00040435	16,0 *0.630*	–	6,0 *0.236*	8,0 *0.315*	–	–	75,0 *2.953*	45,0 *1.772*	0,09 *0.200*

Spare Parts, included in delivery

For	Locking screw
	
131-	–
SL16..	P6SS4X4

Accessories

For	Locking key
	
131-	–
SL16..	2SMS795

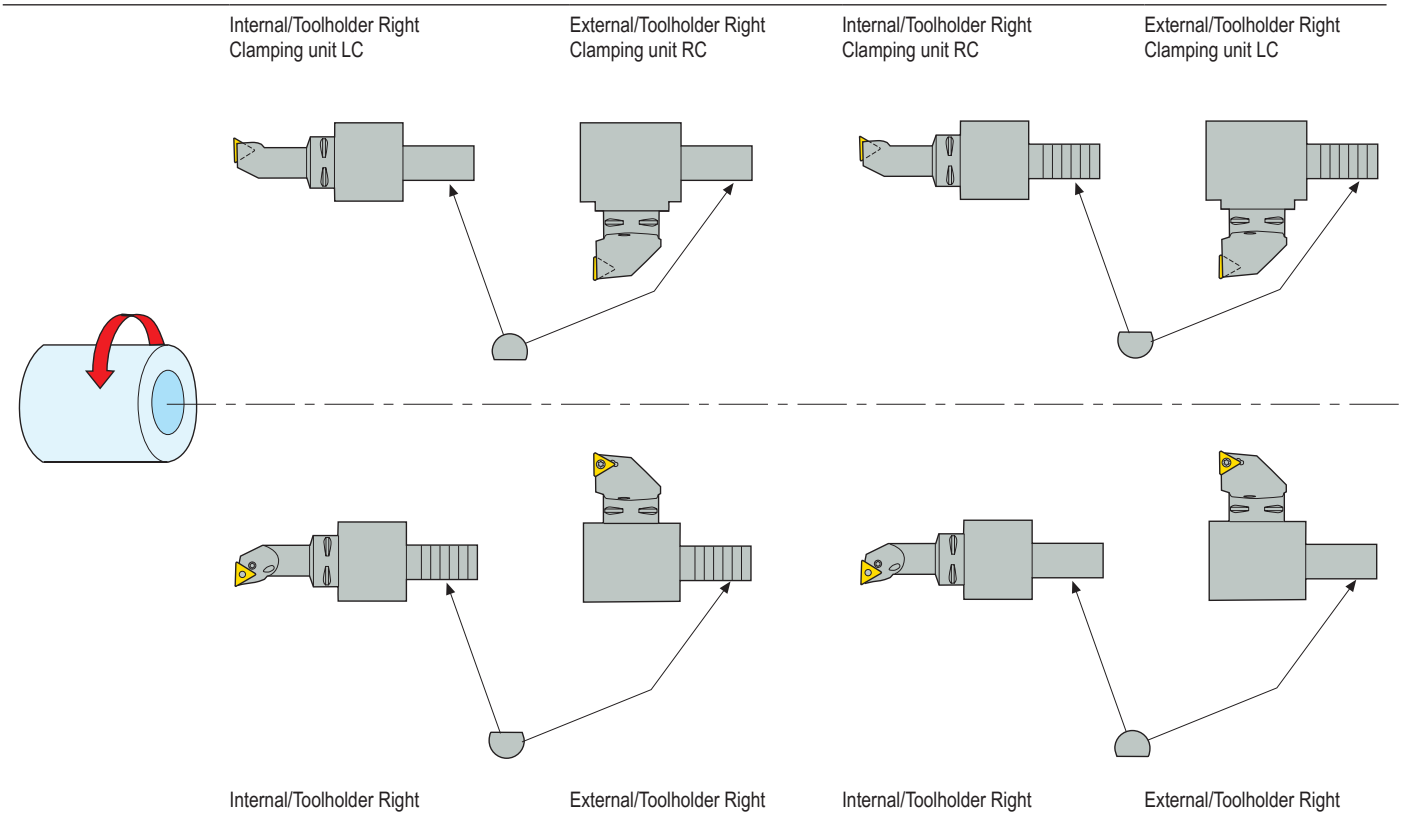


Seco-Capto™ clamping units

Seco-Capto™ clamping units provide a flexible and modular system, whereby the same adapters can be used across different machines and tool assemblies can be built with extensions. The Seco-Capto systems offers high torque transmission, rigidity and accuracy with a strong, self-centering joint within 2 µm. Seco-Capto back ends are available on rotating tools, as well as stationary tools for turning, boring, threading and grooving applications.

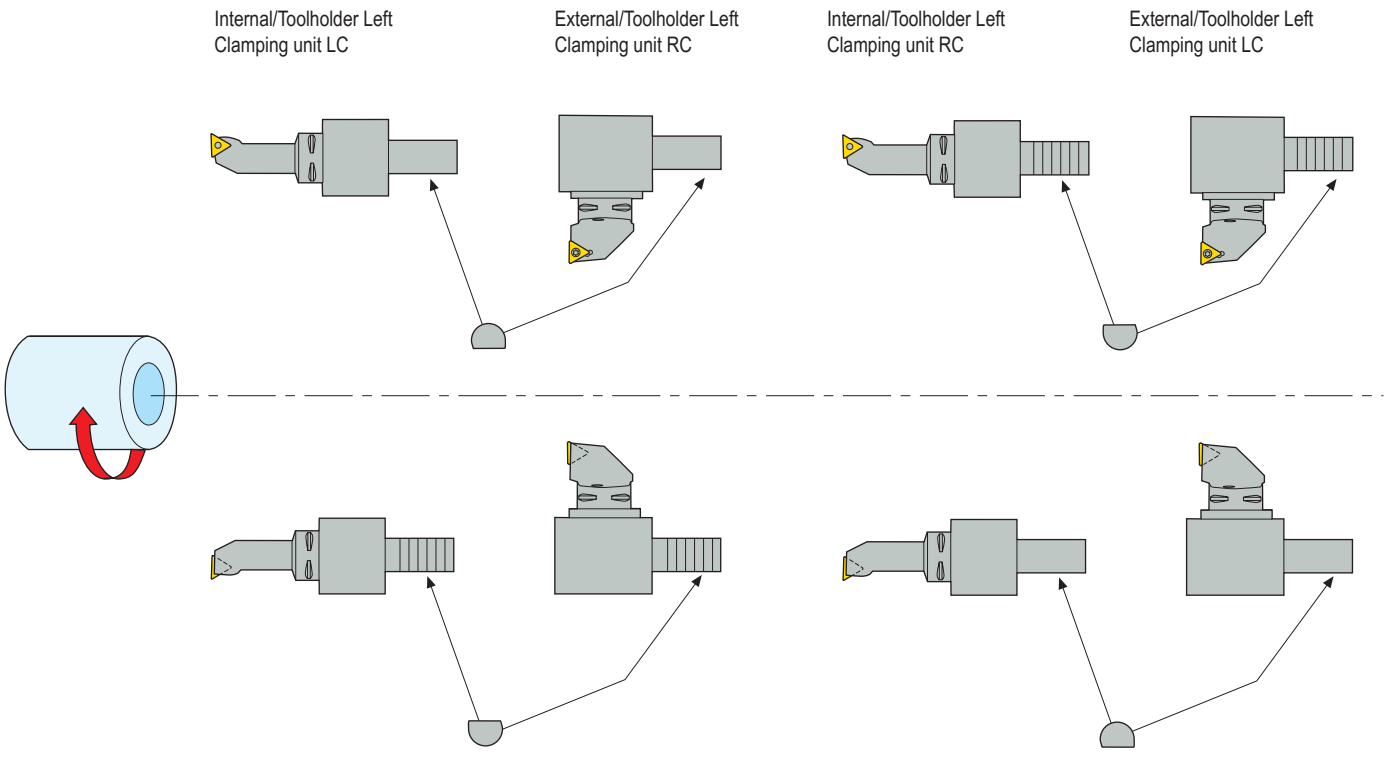
– Type 2085 with straight-shank-type machine-side connection
– Type 2000/3000 with cylindrical machine-side connection.
– VDI Clamping units
– Type 2090 clamping units adapters provide a specific mounting system.

Selection of VDI clamping unit



Note: The polygon socket has to be rotated 180°

Selection of VDI clamping unit

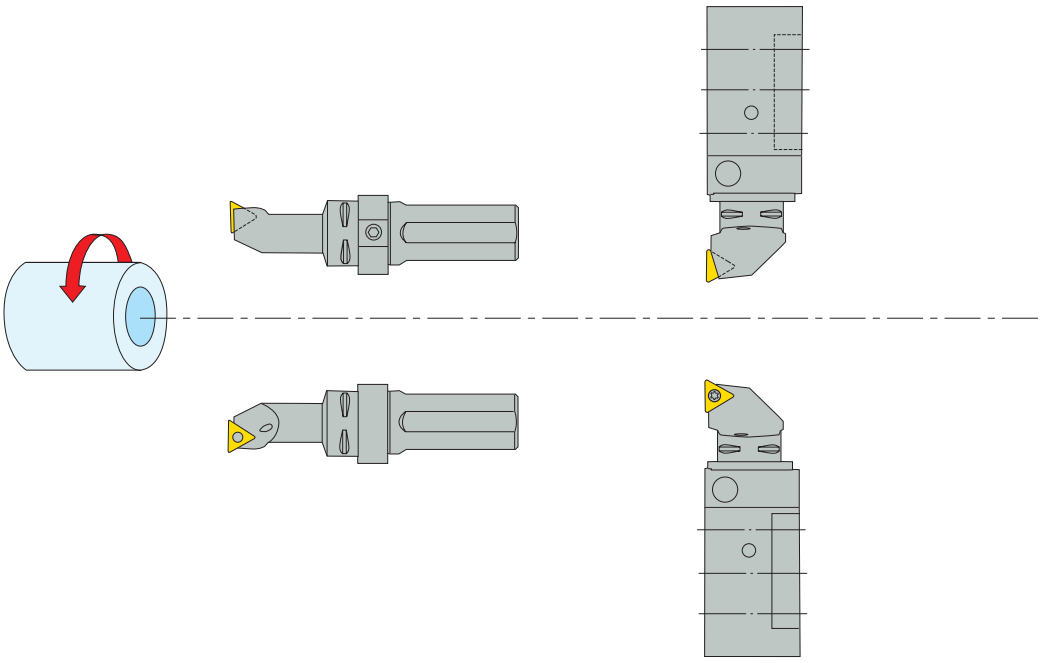


Note: The polygon socket has to be rotated 180°

Selection of clamping unit 2000/3000/2085

Internal/Toolholder Right
NC 2000/3000
Upside-down

External/Toolholder Left
Clamping unit RC



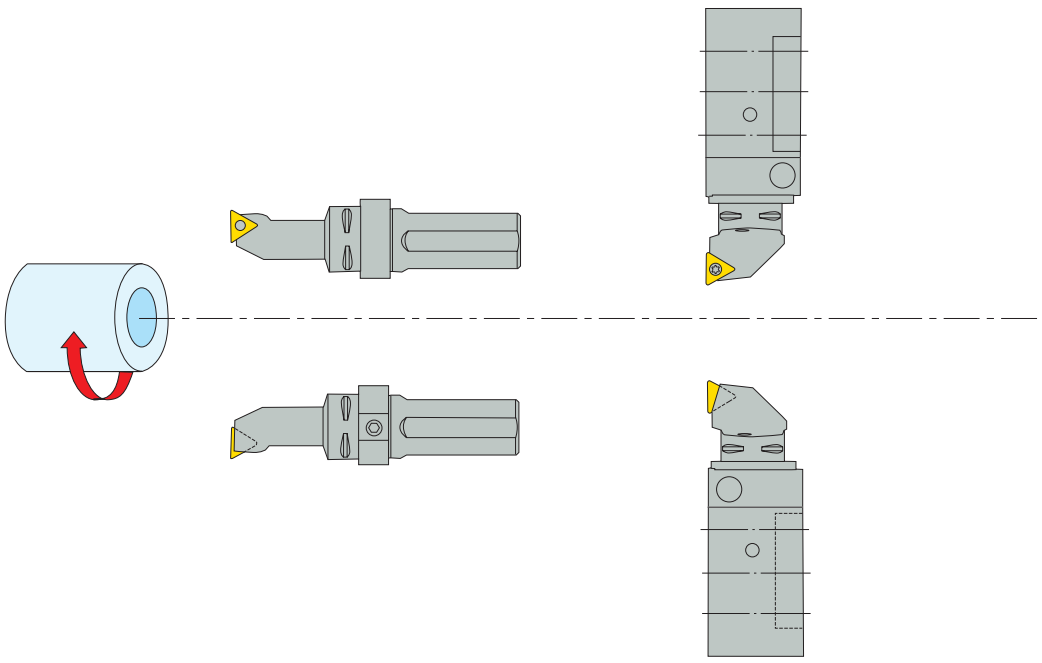
Internal/Toolholder Right
NC 2000/3000

Internal/Toolholder Right
NC 2000/3000

Selection of VDI clamping unit

Internal/Toolholder Left
NC 2000/3000

External/Toolholder Left
LC 2085

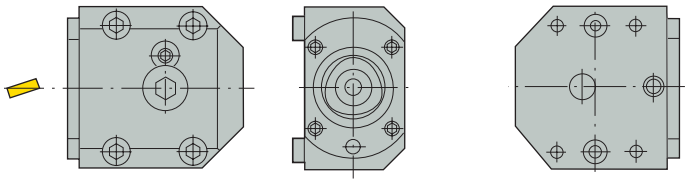


Internal/Toolholder Left
NC 2000/3000
Upside-down

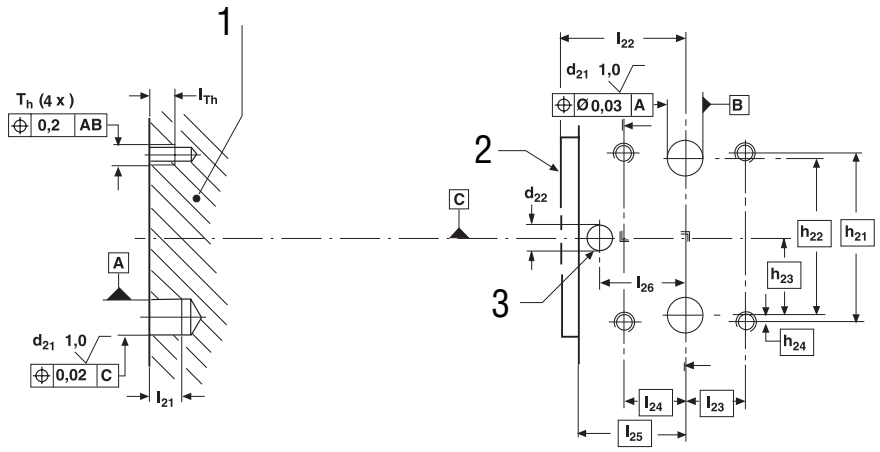
External/Toolholder Left
LC 2085
Upside-down

2000 = cylindrical type with drawbar, 3000 = cylindrical type with screw, 2085 = shank type.

Clamping unit 2090 for special applications



Design instruction for application of clamping unit RC/LC 2090



1. Material hardness = 270 HB min
2. Front of clamping unit
3. Coolant outlet

Seco-Capto™ size	Designation	Dimensions in mm/inch													
		d_{21} H7	d_{22}	h_{21}	h_{22}	h_{23}	h_{24}	l_{21} min	l_{22}	l_{23}	l_{24}	l_{25}	l_{26}	l_{Th} min	T_h
C3	C3-R/LC2090-19039M	12 *0.470*	5 *0.200*	42 *1.654*	39 *1.535*	19,5 *0.768*	1,5 *0.060*	8,5 *0.335*	39 *1.535*	19,0 *0.748*	19,0 *0.748*	33,5 *1.319*	28 *1.102*	7,5 *0.295*	M6
C4	C4-R/LC2090-24043A	16 *0.630*	7 *0.280*	60 *2.362*	5 *0.200*	27,5 *1.083*	2,5 *0.098*	11,0 *0.433*	43 *1.693*	19,0 *0.748*	19,0 *0.748*	36,5 *1.437*	30 *1.180*	11,0 *0.433*	M8
C5	C5-R/LC2090-32048A	20 *0.787*	7 *0.280*	70 *2.756*	62 *2.441*	31,0 *1.220*	4,0 *0.160*	12,0 *0.470*	48 *1.890*	21,0 *0.827*	21,0 *0.827*	39,5 *1.555*	33 *1.299*	13,0 *0.512*	M10
C6	C6-R/LC2090-42060	25 *0.984*	10 *0.400*	82 *3.228*	71 *2.795*	35,5 *1.398*	5,5 *0.217*	20,0 *0.787*	60 *2.362*	24,5 *0.965*	24,5 *0.965*	50,0 *1.969*	41 *1.614*	12,0 *0.470*	M10
C8	C8-R/LC2090-50088	32 *1.260*	11 *0.433*	110 *4.331*	92 *3.622*	46,0 *1.811*	9,0 *0.354*	20,0 *0.787*	88 *3.465*	43,0 *1.693*	43,0 *1.693*	76,0 *2.992*	63 *2.480*	14,5 *0.571*	M12

Toolholders

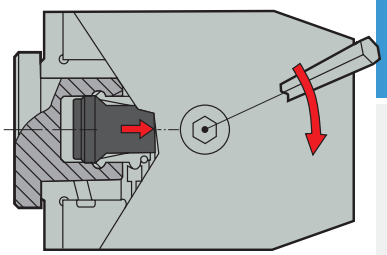
A large range of Seco-Capto™ toolholders is available:

– For external and internal turning with negative inserts.
– For external and internal turning with positive inserts.
– For external and internal turning with MDT inserts.
– For external and internal threading.

For selection of toolholder use the guidelines for conventional tools.

Cover plug

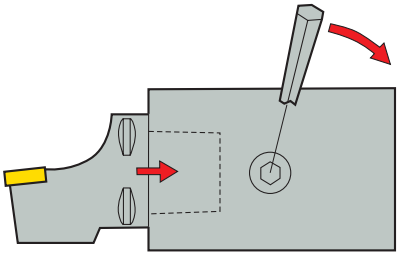
A cover plug should always be used to protect the ground surfaces of the connecting sleeve from dirt or damage to the clamping units when they do not have a cutting unit inserted.



Clamping force

In order to obtain the necessary clamping force (F) the clamping unit should be tightened to the torque value (Mv) as recommended in the table below.

Torque Mv	
Size	**Nm**
C3	35
C4	50
C5	70
C6	90
C8	130



Turning the cutting tool 180°

If the entire clamping unit has to be rotated 180°, the polygon socket should be rotated 180°.

1. Loosen the screws (2).
2. Dismantle the polygon socket. Use the special tool as described on page(s) 1031 (ordered separately).
3. Move the guiding pin to the opposite side of the clamping unit.
4. Rotate the polygon socket 180° and reassemble. Tap carefully with a plastic mallet.

Lubrication

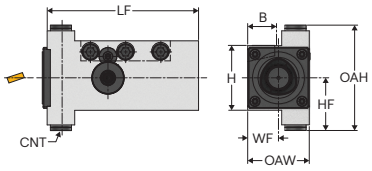
All manual clamping units are lubricated with BP Energrease ACS-2 prior to delivery (Alternative MOBIL Temp Shc 32 or STATOIL Beacon 325). The lubrication should be checked every six months. New grease can be applied via the cam.

1. Remove the screw (1).
2. Assemble grease nipple 5692 012-01.
3. Pump in grease with grease gun until it begins to seep out around the key handle at the cam.
4. Remove grease nipple.
5. Replace screw (1) into the cam.

Note: Clamping unit must be clamped during lubrication.

Straight shank type
– Metric/ Inch



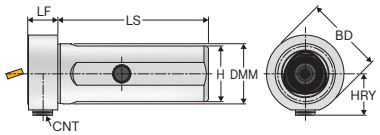


—Right-hand version shown
—Spare Parts, see page(s) 1024
—How to select Clamping unit, see page(s) 1015
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	Shank	LF	HF	WF	H	B	OAW	OAH	CNT	CP	Weight
				mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		bar *psi*	kg *lbs*
C3-LC2085-4038M	00093954	C3	2020	95,0 *3.740*	20,0 *0.787*	19,0 *0.748*	40,0 *1.575*	20,0 *0.787*	38,0 *1.496*	62,0 *2.441*	G1/8	80,0 *1160,3*	1,05 *2.310*
C3-RC2085-4038M	00093966	C3	2020	95,0 *3.740*	20,0 *0.787*	19,0 *0.748*	40,0 *1.575*	20,0 *0.787*	38,0 *1.496*	62,0 *2.441*	G1/8	80,0 *1160,3*	1,05 *2.310*
C4-LC2085-5048	00093977	C4	2525	125,0 *4.921*	25,0 *0.984*	24,0 *0.945*	50,0 *1.969*	25,0 *0.984*	48,0 *1.890*	58,0 *2.283*	G1/8	80,0 *1160,3*	2,1 *4.630*
C4-RC2085-5048	75079661	C4	2525	125,0 *4.921*	25,0 *0.984*	24,0 *0.945*	50,0 *1.969*	25,0 *0.984*	48,0 *1.890*	58,0 *2.283*	G1/8	80,0 *1160,3*	2,1 *4.630*
C5-LC2085-6464	00093997	C5	3232	145,0 *5.709*	32,0 *1.260*	32,0 *1.260*	64,0 *2.520*	32,0 *1.260*	64,0 *2.520*	72,0 *2.835*	G1/8	80,0 *1160,3*	4,1 *9.040*
C5-RC2085-6464	75069018	C5	3232	145,0 *5.709*	32,0 *1.260*	32,0 *1.260*	64,0 *2.520*	32,0 *1.260*	64,0 *2.520*	72,0 *2.835*	G1/8	80,0 *1160,3*	4,1 *9.040*

Cylindrical type
– Metric/ Inch



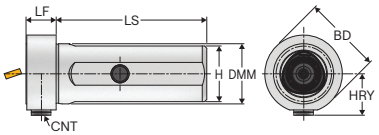


—Neutral version shown
—Spare Parts, see page(s) 1025
—How to select Clamping unit, see page(s) 1015
—Type 2000 locking with drawbar and segment
—Type 3000 locking with centre bolt
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	DMM	BD	LF	LS	HRY	H	CNT	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*		bar *psi*	kg *lbs*
C3-NC2000-08018-32	00094035	C3	32,0 *1.260*	45,5 *1.791*	18,0 *0.709*	80,0 *3.150*	26,0 *1.024*	30,0 *1.181*	G1/8	80,0 *1160,3*	0,7 *1.540*
C3-NC3000-08018-32	00094037	C3	32,0 *1.260*	45,5 *1.791*	18,0 *0.709*	80,0 *3.150*	26,0 *1.024*	30,0 *1.181*	G1/8	80,0 *1160,3*	0,64 *1.410*
C3-NC3000-10018-40	00093956	C3	32,0 *1.260*	45,5 *1.791*	18,0 *0.709*	100,0 *3.937*	26,0 *1.024*	37,0 *1.457*	G1/8	80,0 *1160,3*	1,11 *2.450*
C4-NC2000-10020-40	00094039	C4	40,0 *1.575*	51,5 *2.028*	20,0 *0.787*	100,0 *3.937*	28,0 *1.102*	37,0 *1.457*	G1/8	80,0 *1160,3*	1,1 *2.430*
C5-NC2000-12024-50	00094045	C5	50,0 *1.969*	61,5 *2.421*	24,0 *0.945*	120,0 *4.724*	33,0 *1.299*	47,0 *1.850*	G1/8	80,0 *1160,3*	2,1 *4.630*
C4-NC3000-10020-40	00094041	C4	40,0 *1.575*	51,5 *2.028*	20,0 *0.787*	100,0 *3.937*	28,0 *1.102*	37,0 *1.457*	G1/8	80,0 *1160,3*	1,1 *2.430*
C5-NC3000-12024-50	00090845	C5	50,0 *1.969*	61,5 *2.421*	24,0 *0.945*	120,0 *4.724*	33,0 *1.299*	47,0 *1.850*	G1/8	80,0 *1160,3*	2,1 *4.630*

Cylindrical type – Inch



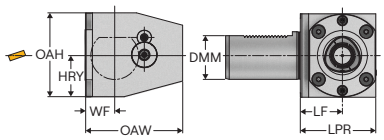


—Neutral version shown
—Spare Parts, see page(s) 1025
—How to select Clamping unit, see page(s) 1015
—Type 2000 locking with drawbar and segment
—Type 3000 locking with centre bolt
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	DMM	BD	LF	LS	HRY	H	CNT	CP	Weight
			inch	inch	inch	inch	inch	inch		psi	lbs
C4-NC2000-10020-A24	00077739	C4	1.500	2.028	0.787	3.937	1.024	1.457	G1/8	1160,3	2.200
C4-NC2000-12020-A32	00077741	C4	2.000	2.028	0.787	4.724	1.024	1.850	G1/8	1160,3	3.570
C5-NC2000-12024-A32	00077743	C5	2.000	2.421	0.945	4.724	1.220	1.850	G1/8	1160,3	4.630
C4-NC3000-10020-A24	00077745	C4	1.500	2.028	0.787	3.937	1.024	1.378	G1/8	1160,3	2.250
C4-NC3000-12020-A32	00077749	C4	2.000	2.028	0.787	4.724	1.024	1.850	G1/8	1160,3	4.230
C5-NC3000-12024-A32	00077757	C5	2.000	2.421	0.945	4.724	1.220	1.850	G1/8	1160,3	4.670

VDI type angled DIN69880 – Metric/ Inch



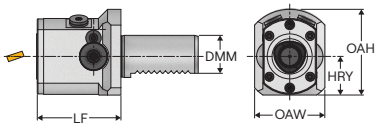


—Right-hand version shown
—Spare Parts, see page(s) 1026
—How to select Clamping unit, see page(s) 1014
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	DMM	LF	WF	HRY	LPR	OAW	OAH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C3-RC2030-41020M	00093958	C3	30,0 *1.181*	41,0 *1.614*	20,0 *0.787*	30,0 *1.181*	60,0 *2.362*	74,0 *2.913*	57,0 *2.244*	80,0 *1160,3*	1,9 *4.190*
C3-LC2030-41020M	00093946	C3	30,0 *1.181*	41,0 *1.614*	20,0 *0.787*	30,0 *1.181*	60,0 *2.362*	74,0 *2.913*	57,0 *2.244*	80,0 *1160,3*	2,1 *4.630*
C3-RC2030-41030M	00093959	C3	30,0 *1.181*	41,0 *1.614*	30,0 *1.181*	30,0 *1.181*	60,0 *2.362*	73,0 *2.874*	57,0 *2.244*	80,0 *1160,3*	2,0 *4.410*
C3-LC2030-41030M	00093947	C3	30,0 *1.181*	41,0 *1.614*	30,0 *1.181*	30,0 *1.181*	60,0 *2.362*	73,0 *2.874*	57,0 *2.244*	80,0 *1160,3*	2,0 *4.410*
C4-RC2040-51030M	75065642	C4	40,0 *1.575*	51,0 *2.008*	30,0 *1.181*	38,0 *1.496*	75,0 *2.953*	86,0 *3.386*	75,0 *2.953*	80,0 *1160,3*	3,9 *8.600*
C4-LC2040-51030M	00093969	C4	40,0 *1.575*	51,0 *2.008*	30,0 *1.181*	38,0 *1.496*	75,0 *2.953*	86,0 *3.386*	75,0 *2.953*	80,0 *1160,3*	3,8 *8.380*
C4-RC2040-51040M	00093982	C4	40,0 *1.575*	51,0 *2.008*	40,0 *1.575*	38,0 *1.496*	75,0 *2.953*	86,0 *3.386*	75,0 *2.953*	80,0 *1160,3*	4,0 *8.820*
C4-LC2040-51040M	00093970	C4	40,0 *1.575*	51,0 *2.008*	40,0 *1.575*	38,0 *1.496*	75,0 *2.953*	86,0 *3.386*	75,0 *2.953*	80,0 *1160,3*	4,2 *9.260*
C5-RC2040-53030M	00094003	C5	40,0 *1.575*	53,0 *2.087*	30,0 *1.181*	41,0 *1.614*	85,0 *3.346*	99,0 *3.898*	82,0 *3.228*	80,0 *1160,3*	4,9 *10.800*
C5-LC2040-53030M	00093986	C5	40,0 *1.575*	53,0 *2.087*	30,0 *1.181*	41,0 *1.614*	85,0 *3.346*	99,0 *3.898*	82,0 *3.228*	80,0 *1160,3*	4,9 *10.800*
C5-RC2040-53040M	00090846	C5	40,0 *1.575*	53,0 *2.087*	40,0 *1.575*	41,0 *1.614*	85,0 *3.346*	99,0 *3.898*	82,0 *3.228*	80,0 *1160,3*	5,0 *11.020*
C5-LC2040-53040M	00093987	C5	40,0 *1.575*	53,0 *2.087*	40,0 *1.575*	41,0 *1.614*	85,0 *3.346*	99,0 *3.898*	82,0 *3.228*	80,0 *1160,3*	5,0 *11.020*
C5-RC2050-53030M	00094005	C5	50,0 *1.969*	53,0 *2.087*	30,0 *1.181*	43,0 *1.693*	85,0 *3.346*	99,0 *3.898*	86,0 *3.386*	80,0 *1160,3*	6,1 *13.450*
C5-LC2050-53030M	00093989	C5	50,0 *1.969*	53,0 *2.087*	30,0 *1.181*	43,0 *1.693*	85,0 *3.346*	99,0 *3.898*	86,0 *3.386*	80,0 *1160,3*	5,8 *12.790*
C5-RC2050-53040M	00092175	C3	50,0 *1.969*	53,0 *2.087*	40,0 *1.575*	43,0 *1.693*	85,0 *3.346*	99,0 *3.898*	86,0 *3.386*	80,0 *1160,3*	6,0 *13.230*
C5-LC2050-53040M	00093990	C5	50,0 *1.969*	53,0 *2.087*	40,0 *1.575*	43,0 *1.693*	85,0 *3.346*	99,0 *3.898*	86,0 *3.386*	80,0 *1160,3*	6,0 *13.230*
C5-RC2060-43040M	00094011	C5	60,0 *2.362*	43,0 *1.693*	40,0 *1.575*	53,0 *2.087*	75,0 *2.953*	99,0 *3.898*	94,0 *3.701*	80,0 *1160,3*	7,0 *15.430*
C5-LC2060-43040M	00093993	C5	60,0 *2.362*	43,0 *1.693*	40,0 *1.575*	53,0 *2.087*	75,0 *2.953*	99,0 *3.898*	94,0 *3.701*	80,0 *1160,3*	7,2 *15.870*
C6-RC2060-53040	00094025	C6	60,0 *2.362*	53,0 *2.087*	40,0 *1.575*	53,0 *2.087*	95,0 *3.740*	122,0 *4.803*	105,0 *4.134*	80,0 *1160,3*	9,7 *21.380*
C6-LC2060-53040	00094018	C6	60,0 *2.362*	53,0 *2.087*	40,0 *1.575*	53,0 *2.087*	95,0 *3.740*	122,0 *4.803*	105,0 *4.134*	80,0 *1160,3*	9,6 *21.160*

VDI type straight DIN69880 – Metric/ Inch

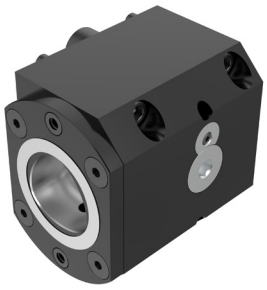


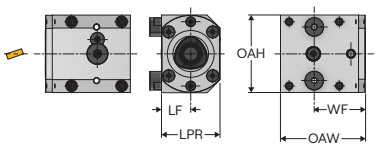


—Right-hand version shown
—Spare Parts, see page(s) 1027
—How to select Clamping unit, see page(s) 1014
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	DMM	LF	HRY	OAW	OAH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C3-RC2030-00060M	00093957	C3	30,0 *1.181*	60,0 *2.362*	34,0 *1.339*	50,0 *1.969*	61,0 *2.402*	80,0 *1160,3*	1,1 *2.430*
C3-LC2030-00060M	00093945	C3	30,0 *1.181*	60,0 *2.362*	34,0 *1.339*	50,0 *1.969*	61,0 *2.402*	80,0 *1160,3*	1,1 *2.430*
C4-RC2040-00075M	75069447	C4	40,0 *1.575*	75,0 *2.953*	41,0 *1.614*	75,0 *2.953*	75,0 *2.953*	80,0 *1160,3*	2,3 *5.070*
C4-LC2040-00075M	75065641	C4	40,0 *1.575*	75,0 *2.953*	41,0 *1.614*	75,0 *2.953*	75,0 *2.953*	80,0 *1160,3*	2,2 *4.850*
C4-RC2050-00065M	75068269	C4	50,0 *1.969*	65,0 *2.559*	49,0 *1.929*	70,0 *2.756*	83,0 *3.268*	80,0 *1160,3*	2,8 *6.170*
C4-LC2050-00065M	00093972	C4	50,0 *1.969*	65,0 *2.559*	49,0 *1.929*	70,0 *2.756*	83,0 *3.268*	80,0 *1160,3*	2,6 *5.730*
C5-RC2040-00085M	00094001	C5	40,0 *1.575*	85,0 *3.346*	41,0 *1.614*	75,0 *2.953*	82,0 *3.228*	80,0 *1160,3*	3,3 *7.280*
C5-LC2040-00085M	75079704	C5	40,0 *1.575*	85,0 *3.346*	41,0 *1.614*	75,0 *2.953*	82,0 *3.228*	80,0 *1160,3*	3,3 *7.280*
C5-RC2060-00075M	00094007	C5	60,0 *2.362*	75,0 *2.953*	58,0 *2.283*	80,0 *3.150*	100,0 *3.937*	80,0 *1160,3*	5,2 *11.460*
C5-LC2060-00075M	00093992	C5	60,0 *2.362*	75,0 *2.953*	58,0 *2.283*	80,0 *3.150*	100,0 *3.937*	80,0 *1160,3*	5,2 *11.460*
C5-RC2050-00085M	00091790	C5	50,0 *1.969*	85,0 *3.346*	49,0 *1.929*	83,0 *3.268*	90,0 *3.543*	80,0 *1160,3*	4,0 *8.820*
C5-LC2050-00085M	00093988	C5	50,0 *1.969*	85,0 *3.346*	49,0 *1.929*	83,0 *3.268*	90,0 *3.543*	80,0 *1160,3*	4,0 *8.820*
C6-RC2060-00095	00094024	C6	60,0 *2.362*	95,0 *3.740*	58,0 *2.283*	84,0 *3.307*	111,0 *4.370*	80,0 *1160,3*	6,9 *15.210*
C6-LC2060-00095	00094017	C6	60,0 *2.362*	95,0 *3.740*	58,0 *2.283*	84,0 *3.307*	111,0 *4.370*	80,0 *1160,3*	6,9 *15.210*

For special applications – Metric/ Inch



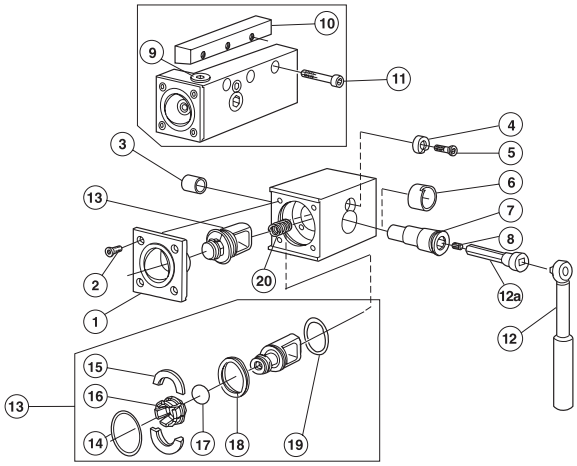


—Right-hand version shown
—Spare Parts, see page(s) 1028
—Mounting dimension / Bolt pattern, see page(s) 1016
—For ISO attribute explanation, see page 82

Designation	Item number	CTWS	LF	WF	LPR	OAW	OAH	CP	Weight
			mm *inch*	mm *inch*	mm *inch*	mm *inch*	mm *inch*	bar *psi*	kg *lbs*
C3-RC2090-19039M	00093967	C3	19,0 *0.748*	39,0 *1.535*	38,0 *1.496*	73,0 *2.874*	54,0 *2.126*	80,0 *1160,3*	1,0 *2.200*
C3-LC2090-19039M	00093955	C3	19,0 *0.748*	39,0 *1.535*	38,0 *1.496*	73,0 *2.874*	54,0 *2.126*	80,0 *1160,3*	1,0 *2.200*
C4-RC2090-24043A	00093984	C4	24,0 *0.945*	43,0 *1.693*	48,0 *1.890*	86,0 *3.386*	77,0 *3.031*	80,0 *1160,3*	1,9 *4.190*
C4-LC2090-24043A	00093978	C4	24,0 *0.945*	43,0 *1.693*	48,0 *1.890*	86,0 *3.386*	77,0 *3.031*	80,0 *1160,3*	1,9 *4.190*
C5-RC2090-32048A	00094015	C5	32,0 *1.260*	48,0 *1.890*	64,0 *2.520*	100,0 *3.937*	92,0 *3.622*	80,0 *1160,3*	3,6 *7.940*
C5-LC2090-32048A	00093998	C5	32,0 *1.260*	48,0 *1.890*	64,0 *2.520*	100,0 *3.937*	92,0 *3.622*	80,0 *1160,3*	3,5 *7.720*
C6-RC2090-42060	00094029	C6	42,0 *1.654*	60,0 *2.362*	84,0 *3.307*	122,0 *4.803*	105,0 *4.134*	80,0 *1160,3*	6,4 *14.110*
C6-LC2090-42060	00094021	C6	42,0 *1.654*	60,0 *2.362*	84,0 *3.307*	122,0 *4.803*	105,0 *4.134*	80,0 *1160,3*	6,4 *14.110*
C8-RC2090-50088	00094034	C8	50,0 *1.969*	88,0 *3.465*	100,0 *3.937*	146,0 *5.748*	133,0 *5.236*	80,0 *1160,3*	12,4 *27.340*
C8-LC2090-50088	00094032	C8	50,0 *1.969*	88,0 *3.465*	100,0 *3.937*	146,0 *5.748*	133,0 *5.236*	80,0 *1160,3*	12,4 *27.340*

Manually operated clamping units

Type 2085



Size	1 Sleeve	2 Screw (4x)	3 Bushing	4 Locking washer	5 Screw
C3	5252015-01	416.1-834	3823010-101	5541030-01	416.1-834
C4	5252015-02	5513020-26	3823010-122	5541030-02	416.1-834
C5	5252015-03	5513020-14	3823010-162	5541030-03	5513020-14

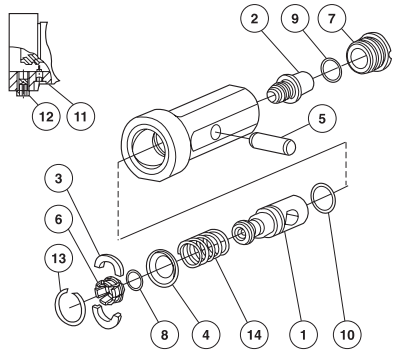
Size	6 Bushing	7 Cam shaft	8 Screw	9 Plug	10 Metric wedge
C3	5638022-01	5333025-01	3214010-355	3611005-180	5431115-01
C4	5638022-02	5333025-02	3214010-355	3611005-180	5431115-02
C5	5638022-03	5333025-03	3214010-355	3611005-180	5431115-03

Size	11 Screw	12 Torque wrench	12a Adapter	20 Compression spring
C3	3212010-362	BT-TK-02	5680035-05	5561001-71
C4	3212010-364	C-TK-01	5680035-06	5561001-41
C5	3212010-416	C-TK-01	5680035-07	5561001-41

Draw bar set — **Parts included in draw bar set**

Size	13 Draw bar set	14 Spiral retaining ring	15 Holder ring (set of 2)	16 Segment (set of 6)	17 O-ring	18 Flat wire spring	19 O-ring
C3	5461100-101	5545039-01	5546001-16	5549120-08	5641005-01	5561015-02	5641005-15
C4	5461100-111	5545039-03	5546001-20	5549120-06	5641005-05	5561015-03	5641005-19
C5	5461100-121	5545039-02	5546001-17	5549120-07	5641005-06	5561015-04	5641005-16

Type 2000

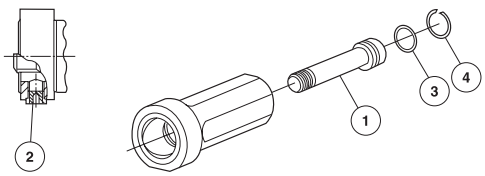


Size	1 Drawbar	2 Clamping screw	3 Holder ring (set of 2)	4 Ring	5 Support pin
C3	5461105-01	5519105-01	5546002-01	5541028-01	5552032-01
C4	5461105-02	5519105-02	5546002-02	5541028-02	5552032-02
C5	5461105-03	5519105-03	5546002-03	5541028-03	5552032-03

Size	6 Segment (set of 6)	7 Thread ring	8 O-ring	9 O-ring	10 O-ring
C3	5549120-08	5512091-03	5641005-01	3671010-118	3671010-124
C4	5549120-06	5512091-01	5641005-05	3671010-120	3671010-126
C5	5549120-07	5512091-02	5641005-06	3671010-124	3671010-128

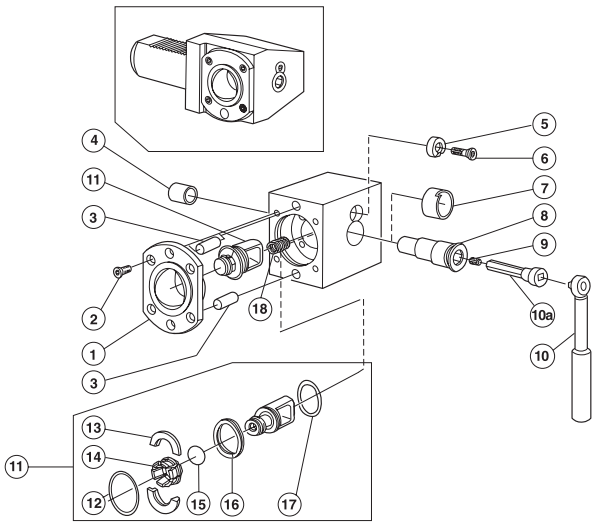
Size	11 Holder ring (set of 2)	12 Ring	13 Support pin	14 Segment (set of 6)	Key (size, mm)
C3	3214020-204	3611005-180	5545042-01	5561001-52	3021013-080 (8,0)
C4	3214020-255	3611005-180	3421105-026	5561001-53	5680010-03 (10,0)
C5	3214020-255	3611005-180	3421105-032	5561001-54	12SMS795 (12,0)

Type 3000



Size	1 Clamping screw	2 Blind plug	3 O-ring	4 Retaining ring	Key (size, mm)
C3	5512096-01	3611005-180	3671010-020	5545040-03	3021013-080 (8,0)
C4	5512096-02	3611005-180	3671010-022	5545040-05	5680010-03 (10,0)
C5	5512096-03	3611005-180	3671010-024	5545040-06	12SMS795 (12,0)

VDI angled design, DIN 69880



Size	1 Sleeve	2 Screw (4x)	3 Pin	4 Bushing	5 Locking washer
C3	5252010-01	416.1-834	3111050-558	3823010-101	5541030-01
C4	5252010-02	5513020-26	3111050-610	3823010-122	5541030-02
C5	5252010-03	5513020-14	3111050-661	3823010-162	5541030-03
C6	5252010-04	3213010-410	3111050-715	3823010-183	5541030-04

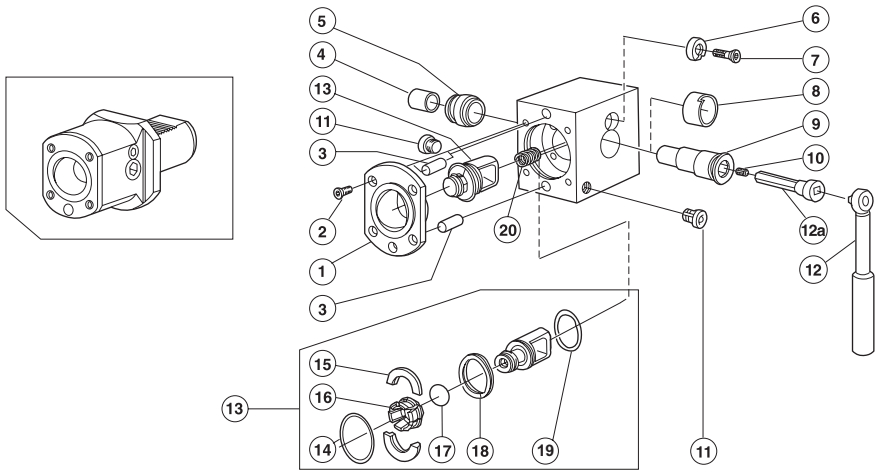
Size	6 Screw	7 Bushing	8 Cam shaft	9 Screw	10 Torque wrench
C3	416.1-834	5638022-01	5333025-01	3214010-355	BT-TK-02
C4	416.1-834	5638022-02	5333025-02	3214010-355	C-TK-01
C5	5513020-14	5638022-03	5333025-03	3214010-355	C-TK-01
C6	5513020-14	5638022-04	5333025-04	3214010-355	C-TK-01

Size	10a Adapter	18 Compression spring
C3	5680035-05	5561001-71
C4	5680035-06	5561001-41
C5	5680035-07	5561001-41
C6	5680035-07	5561001-41

Draw bar set — **Parts included in draw bar set**

Size	11 Draw bar set	12 Spiral retaining ring	13 Holder ring (set of 2)	14 Segment (set of 6)	15 O-ring	16 Flat wire spring	17 O-ring
C3	5461100-101	5545039-01	5546001-16	5549120-08	5641005-01	5561015-02	5641005-15
C4	5461100-111	5545039-03	5546001-20	5549120-06	5641005-05	5561015-03	5641005-19
C5	5461100-121	5545039-02	5546001-17	5549120-07	5641005-06	5561015-04	5641005-16
C6	5461100-131	5545039-04	5546001-18	5549120-04	5641005-04	5561015-05	5641005-17

VDI straight design, DIN 69880



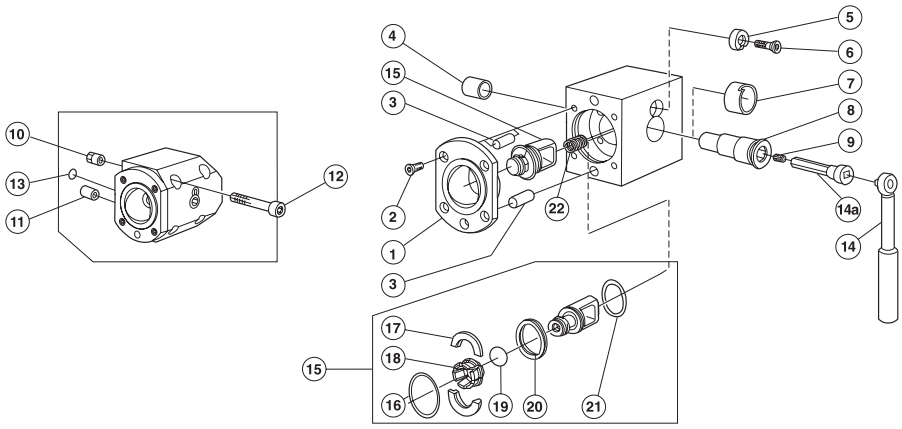
Size	1 Sleeve	2 Screw (4x)	3 Pin	4 Bushing	5 Sleeve
C3	5252010-01	416.1-834	3111050-558	3823010-101	5638024-01
C4	5252010-02	5513020-26	3111050-610	3823010-122	5638024-02
C5	5252010-03	5513020-14	3111050-661	3823010-162	5638024-03
C6	5252010-04	3213010-410	3111050-715	3823010-183	5638024-04

Size	6 Locking washer	7 Screw	8 Bushing	9 Cam shaft	10 Screw
C3	5541030-01	416.1-834	5638022-01	5333025-01	3214010-355
C4	5541030-02	416.1-834	5638022-02	5333025-02	3214010-355
C5	5541030-03	5513020-14	5638022-03	5333025-03	3214010-355
C6	5541030-04	5513020-14	5638022-04	5333025-04	3214010-355

Size	11 Plug	12 Torque wrench	12a Adapter	20 Compression spring
C3	3611005-180	BT-TK-02	5680035-05	5561001-71
C4	3611005-180	C-TK-01	5680035-06	5561001-41
C5	3611005-180	C-TK-01	5680035-07	5561001-41
C6	3611005-140	C-TK-01	5680035-07	5561001-41

Draw bar set	Parts included in draw bar set						
Size	13 Draw bar set	14 Spiral retaining ring	15 Holder ring (set of 2)	16 Segment (set of 6)	17 O-ring	18 Flat wire spring	19 O-ring
C3	5461100-101	5545039-01	5546001-16	5549120-08	5641005-01	5561015-02	5641005-15
C4	5461100-111	5545039-03	5546001-20	5549120-06	5641005-05	5561015-03	5641005-19
C5	5461100-121	5545039-02	5546001-17	5549120-07	5641005-06	5561015-04	5641005-16
C6	5461100-131	5545039-04	5546001-18	5549120-04	5641005-04	5561015-05	5641005-17

Type 2090



Size	1 Sleeve	2 Screw (4x)	3 Pin	4 Bushing	5 Locking washer	6 Screw
C3	5252010-01	416.1-834	3111050-558	3823010-101	5541030-01	416.1-834
C4	5252010-02	5513020-26	3111050-610	3823010-122	5541030-02	416.1-834
C5	5252010-03	5513020-14	3111050-661	3823010-162	5541030-03	5513020-14
C6	5252010-04	3213010-410	3111050-715	3823010-183	5541030-04	5513020-14
C8	5252010-05	3213010-462	3111050-769	3823010-225	5541030-05	5513020-14

Size	7 Bushing	8 Cam shaft	9 Screw	10 Locating pin	11 Dowel pin	12 Screw
C3	5638022-01	5333025-01	3214010-355	5552063-05	5552061-07	3212010-363
C4	5638022-02	5333025-02	3214010-355	5552063-07	5552061-09	3212010-414
C5	5638022-03	5333025-03	3214010-355	5552063-06	5552061-08	3212010-466
C6	5638022-04	5333025-04	3214010-355	5552063-03	5552061-05	3212010-469
C8	5638022-05	5333025-05	3214010-355	5552063-04	5552061-06	3212010-521

Size	13 O-ring	14 Torque wrench	14a Adapter	22 Compression spring
C3	5641001-22	BT-TK-02	5680035-05	5561001-71
C4	3671010-114	C-TK-01	5680035-06	5561001-41
C5	3671010-114	C-TK-01	5680035-07	5561001-41
C6	3671010-119	C-TK-01	5680035-07	5561001-41
C8	3671010-119	C-TK-02	5680035-07	5561001-41

Draw bar set — **Parts included in draw bar set**

Size	15 Draw bar set	16 Spiral retaining ring	17 Holder ring (set of 2)	18 Segment (set of 6)	19 O-ring	20 Flat wire spring	21 O-ring
C3	5461100-101	5545039-01	5546001-16	5549120-08	5641005-01	5561015-02	5641005-15
C4	5461100-111	5545039-03	5546001-20	5549120-06	5641005-05	5561015-03	5641005-19
C5	5461100-121	5545039-02	5546001-17	5549120-07	5641005-06	5561015-04	5641005-16
C6	5461100-131	5545039-04	5546001-18	5549120-04	5641005-04	5561015-05	5641005-17
C8	5461100-141	5545039-05	5546001-19	5549120-05	5641005-07	5561015-06	5641005-18

Hoses, Designation ordering code includes spare parts

Connection type	Designation	Length mm / inch
Straight fitting 	JET-HOSE100SS	100 / *3.937*
	JET-HOSE150SS	150 / *5.906*
	JET-HOSE200SS	200 / *7.874*
	JET-HOSE250SS	250 / *9.843*
	JET-HOSE300SS	300 / *11.811*
Banjo fitting 	JET-HOSE100BS	100 / *3.937*
	JET-HOSE150BS	150 / *5.906*
	JET-HOSE200BS	200 / *7.874*
	JET-HOSE250BS	250 / *9.843*
	JET-HOSE300BS	300 / *11.811*
Banjo-to-Banjo fitting 	JET-HOSE100BB	100 / *3.937*
	JET-HOSE150BB	150 / *5.906*
	JET-HOSE200BB	200 / *7.874*
	JET-HOSE250BB	250 / *9.843*
	JET-HOSE300BB	300 / *11.811*

All hoses are pressure rated to a maximum of 275 bar / *3990 psi*

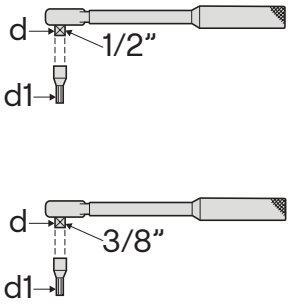
Spare Parts, included in delivery

Designation		...SS	...BS	...BB
JET-CFP1/8BSP		■	■	■
JET-CBP15		■	■	■
JET-AD1/8BSP		■	■	
JET-ADM6		■	■	
JET-ADM10		■		
JET-BBM06			■	■
JET-BBM10			■	■
JET-BB1/8BSP			■	■
JET-C1/4-1/8BSP			■	■
JET-P1/8-5MM		■	■	■
JET-WM10*		■	■	■
JET-CS0610		■	■	
JET-ORING10X1*/**		■	■	■

Pack of 2, except *Pack of 20
** Not suitable for use in inducer
For assembly instructions, see page(s) [XXX]

Designation	
JET-CFP0611	
JET-CFP0613	
JET-CFP0614	
JET-CFP0615	
JET-CLS0608	
JET-CS1115	
JET-CFP1/8BSP14	
JET-CFP1/8BSP12.7	
JET-CFP1/8BSP12	
JET-CFP1/8BSP10	

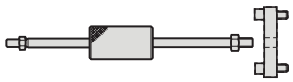
Torque wrench



Size	Nm / *In/Lbs.*	Designation	Spare Parts		
			Adapter*	d	d_1
C3	35 / *309.8*	BT-TK-02	5680035-05	3/8”	8
C4	50 / *442.5*	C-TK-01	5680035-06	1/2”	10
C5	70 / *619.6*	C-TK-01	5680035-07	1/2”	12
C6	90 / *796.6*	C-TK-01	5680035-07	1/2”	12
C8	130 / *1150.6*	C-TK-02	5680035-07	1/2”	12

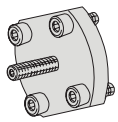
* To be ordered separately

Sliding hammer for dismounting the polygon socket



Size	Designation
C3	CC-ET-01
C4	CC-ET-01
C5	CC-ET-02
C6	CC-ET-02
C8	CC-ET-02

Tool for dismantling the polygon socket on manual clamping unit



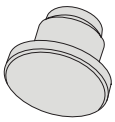
Spare Parts			
Size	Designation	Centre	Peripheral insert
C3	C3-WDT-01M	3214030-463	5512040-03
C4	C4-WDT-02	3214030-464	5512040-04
C5	C5-WDT-02	3214030-516	5512040-05
C6	C6-WDT-02	3214030-516	5512040-06
C8	C-TK-02	3214030-516	5512072-01

Grease nipple



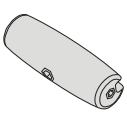
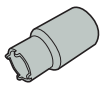
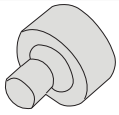
Designation	
Size	Designation
C3	5692012-01
C4	5692012-01
C5	5692012-01
C6	5692012-01
C8	5692012-01

Cover plug



Designation		
Size	Type 3000	Other types
C3	C3-CP-11	C3-CP-01
C4	C4-CP-11	C4-CP-01
C5	C5-CP-11	C5-CP-01
C6	–	C6-CP-01
C8	–	C8-CP-01

Key’s for changing nozzle

	Parts included in set			Not included
Nozzle key set	Key (T-handle)	Blade	Socket	Use for nozzle
				
NK-CN6	DOUBLE-T	H4B-H5.0	NK07.25-H5.0	CN6
NK-CN7	DOUBLE-T	H4B-H5.0	NK09.25-H5.0	CN7
NK-CN8	DOUBLE-T	H4B-H5.0	NK11.25-H5.0	CN8

Maximum Torque value for clamping screws

Screw designation	Torque Nm / *In/Lbs.*	Torque key
110.26-655	10,0 / *88.5*	H00T-60100
117.26-655	5,0 / *44.3*	H00T-3050
117.26-657	3,0 / *26.6*	H00-2530
170.26-655	6,0 / *53.1*	H00T-4060
C02205-T07P	0,9 / *8.0*	T00-07P09
C02505-T07P	0,9 / *8.0*	T00-07P09
C02506-T07P	0,9 / *8.0*	T00-07P09
C03007-T09P	2,0 / *17.7*	T00-09P20
C03508-T15P	3,0 / *26.6*	T00-15P30
C03509-T15P	3,0 / *26.6*	T00-15P30
C03510-T15P	3,0 / *26.6*	T00-15P30
C03511-T09P	2,0 / *17.7*	T00-09P20
C03512-T15P	3,0 / *26.6*	T00-15P30
C04008-T15P	3,5 / *31.0*	T00-15P35
C04010-T15P	3,5 / *31.0*	T00-15P35
C04011-T15P	3,5 / *31.0*	T00-15P35
C04014-T15P	3,5 / *31.0*	T00-15P35
C04512-T15P	5,0 / *44.3*	T00-15P50
C04518-T15P	5,0 / *44.3*	T00-15P50
C05010-T20P	5,0 / *44.3*	T00-20P50
C05012-T15P	5,0 / *44.3*	T00-15P50
C05013-T20P	5,0 / *44.3*	T00-20P50
C05018-T20P	5,0 / *44.3*	T00-20P50
C11804-T06P	0,5 / *4.4*	T00-06P05
C46017-T20P	6,0 / *53.1*	T00T-20P60
C82204-T06P	0,5 / *4.4*	T00-06P05
CC05	0,9 / *8.0*	H00-1509
CC08P-V13	2,0 / *17.7*	T00-09P20
CC09P-D11	2,0 / *17.7*	T00-09P20
CC12P-S12	3,5 / *31.0*	T00-15P35
CC14	6,0 / *53.1*	H00T-4060
CC16	10,0 / *88.5*	–
CC17P	10,0 / *88.5*	–
CC17P-06	10,0 / *88.5*	–
CC17P-09	10,0 / *88.5*	–
CC20P	10,0 / *88.5*	–
CC20P-V13	10,0 / *88.5*	–
CD09-S09	2,0 / *17.7*	T00-09P20
CD12-S12	3,5 / *31.0*	T00-15P35
CD16-S16	5,0 / *44.3*	T00-20P50
CD19-S19	5,0 / *44.3*	T00-20P50
CD19-V16	5,0 / *44.3*	T00-20P50
CSC8015-T20P	5,0 / *44.3*	T00-20P50
CSC1015-T20P	5,0 / *44.3*	T00-20P50
CSP16-T15P	2,0 / *17.7*	T00-15P20
CSP22-T15P	3,0 / *26.6*	T00-15P30
CSP27-T25P	6,0 / *53.1*	T00T-25P60

Screw designation	Torque Nm / *In/Lbs.*	Torque key
L84017-T09P	2,0 / *17.7*	T00-09P20
L85011-T15P	5,0 / *44.3*	T00-15P50
L85012-T15P	5,0 / *44.3*	T00-15P50
L85017-T09P	2,0 / *17.7*	T00-09P20
L85020-T15P	3,5 / *31.0*	T00-15P35
L85021-T15P	3,5 / *31.0*	T00-15P35
L86015-T20P	6,0 / *53.1*	T00T-20P60
L86025-T20P	6,0 / *53.1*	T00T-20P60
LD1035-T25P	6,0 / *53.1*	T00T-25P60
LD5020-T09P	2,0 / *17.7*	T00-09P20
LD6020-T15P	3,0 / *26.6*	T00-15P30
LD6021-T09P	2,0 / *17.7*	T00-09P20
LD6024-T20P	3,0 / *26.6*	T00-15P30
LD6025-T15P	3,0 / *26.6*	T00-15P30
LD6026-T09P	2,0 / *17.7*	T00-09P20
LD8025-T25P	6,0 / *53.1*	T00T-25P60
LD8030-T25P	6,0 / *53.1*	T00T-25P60
LS0512	2,5 / *22.1*	–
LS0613	3,0 / *26.6*	H00-2530
LS0616	3,0 / *26.6*	H00-2530
LS0818	4,0 / *35.4*	–
LS0822	4,0 / *35.4*	–
LS1027	5,0 / *44.3*	H00T-4050
MC6S4X14	3,5 / *31.0*	–
MC6S4X18	3,5 / *31.0*	–
MC6S5X14	5,0 / *44.3*	H00T-4050
MC6S5X18	5,0 / *44.3*	H00T-4050
MN0909L-T09P	2,0 / *17.7*	T00-09P20
MN1215L-T15P	3,0 / *26.6*	T00-15P30
MN1215R-T15P	3,0 / *26.6*	T00-15P30
MN1215S-T15P	3,0 / *26.6*	T00-15P30
MN1215T-T15P	3,0 / *26.6*	T00-15P30
MN1515-T15P	3,0 / *26.6*	T00-15P30
MN1515SL-T15P	3,0 / *26.6*	T00-15P30
MN1520-T20P	6,0 / *53.1*	T00T-20P60
MN1920-T20P	6,0 / *53.1*	T00T-20P60
MN1925-T25P	5,0 / *44.3*	T00T-25P50
MN2525-T25P	6,0 / *53.1*	T00T-25P60
PL1403-T09P	2,5 / *22.1*	T00-09P20
TCEI0409	3,5 / *31.0*	–
TCEI0509	6,0 / *53.1*	H00T-4060
TCEI0513	6,0 / *53.1*	H00T-4060
TCEI0609	8,0 / *70.8*	H00T-5080
TCEI0613	8,0 / *70.8*	H00T-5080
TCEI0614	8,0 / *70.8*	H00T-5080
TCEI0620	8,0 / *70.8*	H00T-5080
TCEI0815	10,0 / *88.5*	H00T-60100
TCEI0825	10,0 / *88.5*	H00T-60100
TCEI1020	15,0 / *132.8*	–
WS1620-T20P	3,5 / *31.0*	T00-20P35
WS1920-T20P	3,5 / *31.0*	T00-20P35
WS2325-T25P	5,0 / *44.3*	T00T-25P50

For the Seco range of torque keys, please see next page

Torque key range

The range of torque keys with fi xed torque values are available, in combinations key grip/torque value for insert locking, for most of the Seco turning products. By using a torque key you always ensure the correct tightening force when mounting the insert. The torque value is given on page(s) 1032 for each screw. Torque keys are calibrated according to ISO 6789.

Code key: T00-15P35

T00 = Torque screwdriver type for Torx Plus blade
T00T = Torque T-handle type for Torx Plus blade
H00 = Torque screwdriver for hexagonal blade
H00T = Torque T-handle type for hexagonal blade

15P = Torx Plus size
35 = Torque value 3,5 Nm

Torque key*	Replaceable blade	Torx Plus size	Torque value Nm / *In/Lbs.*
T00-06P05	T00-06P	T06P	0,5 / *4.4*
T00-07P05	T00-07P	T07P	0,5 / *4.4*
T00-07P09	T00-07P	T07P	0,9 / *8.0*
T00-08P12	T00-08P	T08P	1,2 / *10.6*
T00-08P20	T00-08P	T08P	2,0 / *17.7*
T00-09P09	T00-09P	T09P	0,9 / *8.0*
T00-09P12	T00-09P	T09P	1,2 / *10.6*
T00-09P20	T00-09P	T09P	2,0 / *17.7*
T00-10P20	T00-10P	T10P	2,0 / *17.7*
T00-10P30	T00-10P	T10P	3,0 / *26.6*
T00-10P35	T00-10P	T10P	3,5 / *31.0*
T00-15P20	T00-15P	T15P	2,0 / *17.7*
T00-15P30	T00-15P	T15P	3,0 / *26.6*
T00-15P35	T00-15P	T15P	3,5 / *31.0*
T00-15P40	T00-15P	T15P	4,0 / *35.4*
T00-15P50	T00-15P	T15P	5,0 / *44.3*
T00-20P35	T00-20P	T20P	3,5 / *31.0*
T00-20P50	T00-20P	T20P	5,0 / *44.3*

*Including blade

Torque key*	Replaceable blade	Torx Plus size	Torque value Nm / *In/Lbs.*
T00T-15P50	T00T-15P	T15P	5,0 / *44.3*
T00T-20P50	T00T-20P	T20P	5,0 / *44.3*
T00T-20P60	T00T-20P	T20P	6,0 / *53.1*
T00T-20P80	T00T-20P	T20P	8,0 / *70.8*
T00T-25P50	T00T-25P	T25P	5,0 / *44.3*
T00T-25P60	T00T-25P	T25P	6,0 / *53.1*
T00T-25P80	T00T-25P	T25P	8,0 / *70.8*
T00T-30P80	T00T-30P	T30P	8,0 / *70.8*

*Including blade

Torque key*	Replaceable blade	Hexagonal size mm / *inch*	Torque value Nm / *In/Lbs.*
H00-1305	H00-1.3	1,3 / *0.050*	0,5 / *4.4*
H00-1505	H00-1.5	1,5 / *0.060*	0,5 / *4.4*
H00-1509	H00-1.5	1,5 / *0.060*	0,9 / *8.0*
H00-2009	H00-2.0	2,0 / *0.080*	0,9 / *8.0*
H00-2016	H00-2.0	2,0 / *0.080*	1,6 / *14.2*
H00-2020	H00-2.0	2,0 / *0.080*	2,0 / *17.7*
H00-2512	H00-2.5	2,5 / *0.098*	1,2 /*10.6*
H00-2530	H00-2.5	2,5 / *0.098*	3,0 / *26.6*
H00-2535	H00-2.5	2,5 / *0.098*	3,5 / *31.0*
H00-3020	H00-3.0	3,0 / *0.120*	2,0 / *17.7*
H00-3030	H00-3.0	3,0 / *0.120*	3,0 / *26.6*
H00-4030	H00-4.0	4,0 / *0.160*	3,0 / *26.6*

*Including blade

Torque key*	Replaceable blade	Hexagonal size mm / *inch*	Torque value Nm / *In/Lbs.*
H00T-3050	H00T-3.0	3,0 / *0.120*	5,0 / *44.3*
H00T-4050	H00T-4.0	4,0 / *0.160*	5,0 / *44.3*
H00T-4060	H00T-4.0	4,0 / *0.160*	5,0 / *44.3*
H00T-5050	H00T-5.0	5,0 / *0.200*	5,0 / *44.3*
H00T-5080	H00T-5.0	5,0 / *0.200*	8,0 / *70.8*
H00T-50100	H00T-5.0	5,0 / *0.200*	10,0 / *88.5*
H00T-60100	H00T-6.0	6,0 / *0.240*	10,0 / *88.5*

*Including blade

Please observe that the blades are not interchangeable between screwdriver type and T-handle type.

Torx Plus® is a registered trade mark belonging to Camcar-Textron (USA)

SMG – Introduction

Cutting speed v_c (m/min)

The foundation for SMG is a classification of workpiece materials based on their type rather than their relative machinability and consequently it contains workpiece materials like composites. It is comprehensive enough, but still easy to identify which SMG a particular material belongs.

Each SMG has a specific material standard in a specific condition assigned as reference to allow easy adjustment of cutting data for any actual material compared to any Seco reference material see page(s) 102, 103.

As example the reference materials EN C45E for SMG P4 and EN 42 CrMo 4 for both SMG P5 and SMG H5 see further details in the following tables.

Steels, ferritic and martensitic stainless steels

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
P1	Free-cutting steels	360 < R_m < 880	11 SMn30 R_m = 385 N/mm²	1500	0,14
P2	Low-alloy ferritic steels, C < 0.25%wt Low-alloy weldable general structural steels	320 < R_m < 600	S235JRG2 R_m = 420 N/mm²	1600	0,23
P3	Ferritic & ferritic/pearlitic steels, C < 0.25%wt Weldable general structural steels Case-hardening steels	430 < R_m < 610	16 MnCr 5 R_m = 550 N/mm²	1800	0,14
P4	Low-alloy general structural steels, 0.25% < C < 0.67%wt Low-alloy Quench & Temper steels	520 < R_m < 1200	C 45E R_m = 660 N/mm²	2000	0,15
P5	Structural steels, 0.25% < C < 0.67%wt Quench & Temper steels	550 < R_m < 1200	42 CrMo 4 R_m = 700 N/mm²	2020	0,18
P6	Low-alloy through-hardening steels, C > 0.67%wt Low-alloy spring and bearing steels	520 < R_m < 1200	C 100S R_m = 600 N/mm²	2100	0,17
P7	Through-hardening steels, C > 0.67%wt Spring and bearing steels	600 < R_m < 1200	100 Cr 6 R_m = 650 N/mm²	2160	0,17
P8	Tool steels High Speed Steels (HSS)	600 < R_m < 1200	X 40 CrMoV 5 1 R_m = 700 N/mm²	2400	0,20
P11	Ferritic & martensitic stainless steels	415 < R_m < 1200	X 20 Cr 13 R_m = 675 N/mm²	2000	0,15
P12	Maraging and precipitation-hardening stainless steels	500 < R_m < 1200	X 5 CrNiCuNb 16 4 R_m = 1100 N/mm²	2100	0,17

Free-cutting, austenitic and duplex stainless steels

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
M1	Free-cutting austenitic stainless steels		X 10 CrNiS 18 9	1700	0,14
M2	Low-alloy austenitic stainless steels		X 5 CrNi 18 10	1920	0,18
M3	Medium-alloy austenitic stainless steels		X 2 CrNiMo 18 14 3	2070	0,17
M4	High-alloy austenitic and duplex stainless steels		X 2 CrNiMoN 22 5 3	2230	0,16
M5	Difficult high-alloy austenitic and duplex stainless steels		X 2 CrNiMoN 25 7 4	2510	0,13

Cast irons

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
K1	Grey cast irons (GCI)		EN-GJL-250	930	0,32
K2	Compacted graphite irons (CGI)		EN-GJV-400	1000	0,35
K3	Malleable cast irons (MCI)		EN-GJMB-550-4	1050	0,37
K4	Nodular cast irons (SGI)		EN-GJS-500-7	1160	0,37
K5	Austempered ductile irons (ADI)		EN-GJS-1000-5	0	
K6	Austenitic lamellar cast irons		EN-GJLA-XNiCuCr15-6-2	0	
K7	Austenitic nodular cast irons		EN-GJSA-XNiMn23-4	0	

Non-ferrous metals

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
N1	Aluminium alloys, Si < 9%		AW-7075	0	
N2	Aluminium alloys, 9% < Si < 16%		AC-44200 Si = 12%	0	
N3	Aluminium alloys, Si >16%		AlSi17Cu5	0	
N11	Copper alloys		CW614N	740	0,26

Superalloys and titanium

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
S1	Iron-based superalloys		Discalloy	0	
S2	Cobalt-based superalloys		Stellite 21	0	
S3	Nickel-based superalloys		Inconel 718	2530	0,21
S11	Titanium, low alloyed, (α)		Ti	0	
S12	Titanium, medium alloyed, (α+β)		TiAl6V4	1500	0,24
S13	Titanium, high alloyed, (near β and β)		Ti10V2Fe3Al	0	

Hard materials

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
H3	Case-hardened steels	58 < HRC < 62	16 MnCr 5 60 HRC	2070	0,14
H5	Quenched & Tempered steels	38 < HRC < 56	42 CrMo 4 50 HRC	2320	0,18
H7	Quenched & Tempered steels Bearing steels	56 < HRC < 64	100 Cr 6 60 HRC	2480	0,17
H8	Tool steels High Speed Steels (HSS)	38 < HRC < 64	X 40 CrMoV 5 1 50 HRC	2750	0,20
H11	Martensitic stainless steels	38 < HRC < 50	X 20 Cr 13 45 HRC	2300	0,15
H12	Maraged and precipitation-hardened stainless steels	1200 < R_m < 1650	X 5 CrNiCuNb 16 4 R_m = 1450 N/mm^2	2410	0,17
H21	Manganese steels	23 < HRC < 64	X 120 Mn 12 50 HRC	0	
H31	White cast irons	50 < HRC < 64	EN-GJN-HV600(XCr11) 55 HRC	0	

Other difficult materials

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
PM1	Low-alloy PM-materials		F-0008 Fe-0.7C	0	
PM2	Medium-alloy PM-materials		FLC-4608 Fe2Cu1.8Ni 0.5Mo0.2Mn0.8C	0	
PM3	High-alloy PM-materials Exhaust valve seat materials, etc.			0	
HF1	Hardfacing alloys Welded or plasma-deposited iron-based alloys			0	
HF2	Hardfacing alloys Welded or plasma-deposited cobalt- and nickel-based alloys			0	
CC1	Sintered tungsten carbide		G50	0	

Plastics and Composites

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
TS1	Thermosetting polymers		Urea formaldehyde (UF)	0	
TS2	Thermosetting carbon-fibre composites		T300 T700 T800 HTA-S IMA - Epoxy (M21)...	0	
TS3	Thermosetting glass-fibre composites		Epoxy - HX..(42..)/E glass (7781...)...	0	
TS4	Thermosetting aramide-fibre composites		Kevlar 49	0	
TP1	Thermoplastic polymers		Polycarbonate (PC)	0	
TP2	Thermoplastic carbon-fibre composites		PPS/PEEK - T300..	0	
TP3	Thermoplastic glass-fibre composites		PPS/PEEK - E-glass or A-glass...	0	
TP4	Thermoplastic aramide-fibre composites			0	

Graphite

SMG	Description	Properties	Reference	$k_{c1.1}$	m_c
GR1	Graphite		R 8500	0	

SMG	EN	EN-Nr	W.-Nr	DIN	AFNOR	BS	UNI	JIS	SS	UNS
	11 SMn 30	1.0715	1.0715	9 SMn 28	S 250	230 M 07	CF 9 SMn 28	SUM 22	1912	G12130
	11 SMnPb 30	1.0718	1.0718	9 SMnPb 28	S 250 Pb		CF 9 SMnPb 28	SUM 22 L	1914	G12134
	10 S 20	1.0721	1.0721	10 S 20	10 F 1	210 M 15	CF 10 S 20			
			1.0722	10 SPb 20	10 PbF 2		CF 10 SPb 20			
P1	15 SMn 13	1.0725	1.0723	15 S 20		210 A 15		SUM 32	1922	
	35 S20	1.0726	1.0726	35 S 20	35 MF 4	212 M 36			1957	G11400
	46 S20	1.0727	1.0727	46 S 20	45 MF 4	212 M 44			1973	G11460
	11 SMn 37	1.0736	1.0736	9 SMn 36	S 300	240 M 07	CF 9 SMn 36			G12150
	11 SMn 37	1.0736	1.0736	9 SMn 36	S 300	240 M 07	CF 9 SMn 36			G12150
	S235JR	1.0037	1.0037	St 37-2	E 24-2		Fe 360 B	STKM 12 C	1311	
	S235JRG2	1.0038	1.0116	St 37-3	E 24-3, E 24-4	4360-40 C	Fe 360 D FF		1312, 1313	
	S275J2G3	1.0144	1.0144	St 44-3 N	E 28-3, E 28-4	4360-43 C	Fe 430 D FF	SM 41 C	1412, 1414	
	C 10	1.0301	1.0301	C 10	34 C 10, XC 10	045 M 10	C 10	S 10 C		G10100
P2			1.0401	C 15	37 C 12, XC 18	080 M 15	C 15, C 16		1350	G10170
	C22	1.0402	1.0402	C 22	C 20	050 A 20	C 20, C 21		1450	G10200
	S355JR	1.0570	1.0570	St 52-3	E 36-3, E 36-4	4360-50 C	Fe 510 B	SM 50 YA	2172, 2132	
	C 15R	1.1141	1.1141	Ck 15	XC 15, XC 18	080 M 15	C 15, C 16	S 15 C, S 15 CK	1370	G10170
			1.1158	Ck 25	XC 25	060 A 25	C 25	S 25 C		G10250
			1.2162	21 MnCr 5	20 NC 5			SCR 420 H		
	16 Mo 3	1.5415	1.5415	15 Mo 3	15 D 3	1501-240	16 Mo 3		2912	
			1.5423	16 Mo 5		1503-245-420	16 Mo 5	SB 450 M		G45200
	14 NiCr 14	1.5752	1.5752	14 NiCr 14	12 NC 15	655 M 13		SNC 815 (H)		G33106
			1.5919	15 CrNi 6	16 NC 6	S 107	16 CrNi 4			
	18 NiCrMo 7 6	1.6587	1.6587	18 CrNiMo 7 6	18 NCD 6	820 A 16	18 NiCrMo 7			
P3	16 MnCr 5	1.7131	1.7131	16 MnCr 5	16 MC 5	527 M 17	16 MnCr 5	SCR 415	2511	G51170
	16 MnCrS 5	1.7139	1.7139	16 MnCrS 5						
	20 MnCr 5	1.7147	1.7147	20 MnCr 5	20 MC 5		20 MnCr 5	SMnC 420 (H)		G51200
	20 MnCrS 5	1.7149	1.7149	20 MnCrS 5	20 MnCrS 5			SMnC 21 H		
	13 CrMo 4 5	1.7335	1.7335	13 CrMo 4 4	15 CD 3.5	1501-620 Gr. 27	14 CrMo 4 5		2216	
			1.7337	16 CrMo 4 4	15 CD 4.5	1501-620 Gr. 27	14 CrMo 4 5		2216	
	10 CrMo 9 10	1.7380	1.7380	10 CrMo 9 10	10 CD 9.10	1501-622 Gr. 31	12 CrMo 9 10		2218	J21890
	C35		1.0501	C 35	55 C 35	060 A 35	C 35		1550	G10350
	E 335	1.0503	1.0503	C 45	65 C 45	80 M 46	C 45	S 45 C	1650	G10430
	C40		1.0511	C 40	60 C 40	080 M 40	C 40	S 40 C		
	E 360	1.0070	1.0535	St 70-2	A 70-2		Fe 690		1655	
	C60	1.0601	1.0601	C 60	CC 55	080 A 62	C 60			G10600
P4			1.1157	40 Mn 4	35 M 5	150 M 36				G10390
	G 28 Mn6	1.1165	1.1165	30 Mn 5		120 M 36		SMn 1 H, SCMn 2		G13300
	C 35E	1.1181	1.1181	Ck 35	XC 38 H1	080 M 36	C 35	S 35 C	1572	G10340
	C 45E	1.1191	1.1191	Ck 45	XC 42	080 M 46	C 45	S 45 C	1672	G10420
	C 60E	1.1221	1.1221	Ck 60	XC 60	080 A 62	C 60	S 58 C	1665, 1678	G10640
			1.1740	C 60 W	Y3 55			SK 7		
	55 SiCr7	1.7100	1.0904	55 Si 7	55 S 7	250 A 53	55 Si 8		2085, 2090	
			1.2330	35 CrMo 4	34 CD 4	708 A 37	35 CrMo 4		2234	T51620
			1.2542	45 WCrV 7		BS 1	45 WCrV 8 KU		2710	T41901
		1.2714	1.2714	56 NiCrMoV 7		BH 224-5	56 NiCrMoV7-KU	SKT 4		T61206
			1.5121	46 MnSi 4						
			1.5710	36 NiCr 6	35 NC 6	640 A 35		SNC 236		
			1.5736	36 NiCr 10	35 NC 11		35 NiCr 9	SNC 631 (H)		
	36 CrNiMo 4		1.6511	36 CrNiMo 4	40 NCD 3	816 M 40	38 NiCrMo 4 (KB)			G98400
P5	34 CrNiMo 6	1.6582	1.6582	34 CrNiMo 6	35 NCD 6	817 M 40	35 NiCrMo 6 (KW)	SNCM 447	2541	G43400
	34 Cr 4	1.7033	1.7033	34 Cr 4	32 C 4	530 A 32	34 Cr 4 (KB)	SCR 430 (H)		G51320
	41 Cr 4	1.7035	1.7035	41 Cr 4	42 C 4	530 M 40	41 Cr 4	SCR 440 (H)		G51400
	25 CrMo 4	1.7218	1.7218	25 CrMo 4	25 CD 4 S	708 M 25	25 CrMo 4 (KB)	SCM 425	2225	G41300
	42 CrMo 4	1.7225	1.7225	42 CrMo 4	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	2244	G41400
	42 CrMo 4	1.7225	1.7225	42 CrMo 4	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	2244	G41400
			1.7361	32 CrMo 12	30 CD 12	722 M 24	32 CrMo 12		2240	
	50 CrV 4	1.8159	1.8159	50 CrV 4	50 CV 4	735 A 50	51 CrV 4	SUP 10	2230	H61500
	41 CrAlMo 7 10	1.8509	1.8509	41 CrAlMo 7	40 CAD 6.12	905 M 39	41 CrAlMo 7	SACM 645	2940	K24065
	C 67S	1.1231	1.1231	Ck 67	XC 68	060 A 67	C 70		1770	G10700
	C 100S	1.1274	1.1274	Ck 101		060 A 96		SUP 4	1870	G10950
P6	C 105U	1.1545	1.1545	C 105 W1	Y1 105		C 100 KU		1880	
			1.1645	C 105 W2	Y1 105		C 100 KU	SK 3		
			1.1663	C 125 W	Y2 120		C 120 KU	SK 2		

U.N.E./ I.H.A.	AISI / ASTM	GOST	CSN	Misc. Brands	Condition	Structure
	1213				Annealed	
	12 L 13				Annealed	
	1108				Annealed	
	11 L 08				Annealed	
					Annealed	
	1140	40			Annealed	
	1146				Annealed	
	1215				Annealed	
	12 L 14				Annealed	
		16D			Annealed	
	A573 Grade 58	18kp	11 378		Annealed	
	A573 Grade 70	St14kP	11 448		Annealed	
	1010	10			Annealed	
F.1110	1015	15			Annealed	
	1020, 1023	20	12 024		Annealed	
		17G1S	11 523		Annealed	
F.1511	1015	15			Annealed	
F.1120	1025	25			Annealed	
					Annealed	
	A204 Grade A		15 020		Annealed	
	4520				Annealed	
	3310, 9314	20X2H4A	16 420		Annealed	
	4320		16 220		Annealed	
					Annealed	
F.1516	5115	12KHN2	14 220		Annealed	
		18HG			Annealed	
	5120	20KH	14 221		Annealed	
	5120 H	20KH			Annealed	
	A182-F11, A182-F12	12KHM	15 121		Annealed	
	A387 Grade 12 Cl. 2				Annealed	
F.155	A182-F22	12KH8	15 313		Annealed	
F.1130	1035	35	12 040		Annealed	
F.5110	1045	45	12 050		Annealed	
	1040	40	12 041		Annealed	
F.1150	1055	55			Annealed	
	1060	60	12 061		Annealed	
	1039	40G			Annealed	
	1330	30G2			Annealed	
F.1135	1035	35			Annealed	
F.1140	1045	45	12 050		Annealed	
F.1150	1064	60			Annealed	
	1060	60			Annealed	
F.144	9255	55S2			Annealed	
F.1250	4135	35KHM			Annealed	
F.5241	S1	5KHV2S			Annealed	
	L6	5KHNV			Annealed	
	5045				Annealed	
	3135				Quenched & Tempered	
	3435				Annealed	
	9840				Quenched & Tempered	
F.1280	4340	38H2N2MA	16 343		Annealed	
	5132	35KH			Quenched & Tempered	
	5140	40H	14 140		Quenched & Tempered	
F.1251	4130	20KHM	15 130		Quenched & Tempered	
F.1252	4142, 4140	38HM	15 142		Annealed	
F.1252	4142, 4140	38HM	15 142		Quenched & Tempered	
					Quenched & Tempered	
F.143	6150	50KHFA	15 260		Quenched & Tempered	
F.1740	A355 Cl. A				Annealed	
F.5103	1070	70			Annealed	
F.5117	1095				Annealed	
F.5118	W1	U10A			Annealed	
		U10			Annealed	
	W1	U13			Annealed	

SMG	EN	EN-Nr	W.-Nr	DIN	AFNOR	BS	UNI	JIS	SS	UNS
P7	107 CrV 3	1.2210	1.2210	115 CrV 3	100 C 3		107 CrV 3 KU			T61202
			1.2510	100 MnCrW 4	90 MWCV 5	BO 1	95 MnWCr 5 KU	SKS 3	2140	T31501
	90 MnCrV 8	1.2842	1.2842	90 MnCrV 8	90 MV 8	BO 2	90 MnVCr 8 KU			T31502
	100 Cr 6	1.3505	1.3505	100 Cr 6	100 C 6	534 A 99	100 Cr 6	SUJ 2	2258	G51986
P8	X 210 Cr 12	1.2080	1.2080	X 210 Cr 12	Z 200 C 12	BD 3	X 210 Cr 13 KU	SKD 1		T30403
			1.2343	X 38 CrMoV 5 1	Z 38 CDV 5	BH 11	X 37 CrMoV 5 1 KU	SKD 6		T20811
	X 40 CrMoV 5 1	1.2344	1.2344	X 40 CrMoV 5 1	Z 40 CDV 5	BH 13	X 40 CrMo 5 1 1 KU	SKD 61	2242	T20813
	X 100 CrMoV 5	1.2363	1.2363	X 100 CrMoV 5 1	Z 100 CDV 5	BA 2	X 100 CrMoV 5 1 KU	SKD 12	2260	T30102
			1.2365	X 32 CrMoV 3 3	32 DCV 28	BH 10	30 CrMoV 12 27 KU	SKD 7		T20810
			1.2436	X 210 CrW 12			X 215 CrW 12 1 KU	SKD 2	2312	
			1.2601	X 165 CrMoV 12			X 165 CrMoW 12 KU		2310	
			1.2713	55 NiCrMoV 6	55 NCDV 7			SKT 4		T61206
	HS 6-5-2-5	1.3243	1.3243	S 6-5-2-5	Z 85 WDKCV 06-05-05-04-02		HS 6-5-2-5	SKH 55	2723	
	HS 2-10-1-8	1.3247	1.3247	S 2-10-1-8	Z 110 DKCWV 09-08-04	BM 42	HS 2-9-1-8	SKH 51		T11342
	HS 18-1-2-5	1.3255	1.3255	S 18-1-2-5	Z 80 WKCV 18-05-04-01	BT 4	HS 18-1-1-5	SKH 3		T12004
	HS 6-5-2	1.3343	1.3343	S 6-5-2	Z 85 WDCV 06-05-04-02	BM 2	HS 6-5-2	SKH 9, SKH 51	2722	T11302
	HS 2-9-2	1.3348	1.3348	S 2-9-2	Z 100 DCWV 09-04-02-02		HS 2-9-2	SKH 58	2782	T11307
	HS 18-0-1	1.3355	1.3355	S 18-0-1	Z 80 WCV 18-04-01	BT 1	HS 18-0-1	SKH 2		T12001
P11	X 6 Cr 13	1.4000	1.4000	X 6 Cr 13	Z 6 C 12	403 S 17	X 6 Cr 13	SUS 403	2301	S41008
	X 12 Cr 13	1.4006	1.4006	X 10 Cr 13	Z 10 C 13	410 S 21	X 12 Cr 13	SUS 410	2302	S41000
	X 6 Cr 17	1.4016	1.4016	X 6 Cr 17	Z 8 C 17	430 S 15	X 8 Cr 17	SUS 430	2320	S43000
	X 20 Cr 13	1.4021	1.4021	X 20 Cr 13	Z 20 C 13	420 S 37	X 20 Cr 13	SUS 420 J 1	2303	S42000
	X 39 Cr 13	1.4031	1.4031	X 40 Cr 13	Z 40 C 14	420 S 45	X 40 Cr 14	SUS 420	2304	S40280
	X 70 CrMo 15	1.4109	1.4109	X 65 CrMo 14	Z 70 D 14			SUS 440 A		S44002
	X 90 CrMoV 18	1.4112	1.4112	X 90 CrMoV 18	Z 2 CND 18 05	409 S 19	X CrTi 12	SUS 440 B	2327	S44003
	X 105 CrMo 17	1.4125	1.4125	X 105 CrMo 17	Z 100 CD 17		X 105 CrMo 17	SUS 440 C		S44004
	X 3 CrNIMo 13 3	1.4313	1.4313	X 5 CrNi 13 4	Z 5 CN 13.4	425 C 11	X 6 CrNi 13 04	SCS 5	2385	S41500
	X 18 CrN 28	1.4749	1.4749	X 18 CrN 28	Z 18 C 25				2322	S44600
P12	X 6 NiCrTiMoV 25 15	1.4534	1.4534	X 3 CrNiMoAl 13 8 2						S13800
	X 4 CrNiCuNb 16 4	1.4540	1.4540	X 4 CrNiCuNb 16 4						S15500
		1.4540	1.4540	X 4 CrNiCuNb 16 4	Z 4 CNUNb 16.4 M					S15500
	X 4 CrNiCuNb 16 4	1.4540	1.4540	X 4 CrNiCuNb 16 4						S15500
	X 5 CrNiCuNb 16 4	1.4542	1.4542	X 5 CrNiCuNb 16 4				SUS 630		S17400
	X 5 CrNiCuNb 17 4	1.4548	1.4542	X 5 CrNiCuNb 17 4	Z 6 CNU 17.4			SCS 24, SUS 630		S17400
	X 7 CrNiAl 17 7	1.4564	1.4564	X 7 CrNiAl 17 7	Z 9 CAN 17.7	301 S 81	X 7 CrNiAl 17 7	SUS 631	2388	S17700
	X 2 NiCoMoTi 18 12 4	1.6356	1.6356	X 2 NiCoMoTi 18 12 4						K93160
	X 2 NiCoMoTi 18 9 5	1.6358	1.6358	X 2 NiCoMoTi 18 9 5	Z 2 NKD 19-09					K93120
	X 2 NiCoMo 18 9 5	1.6358	1.6358	X 2 NiCoMoTi 18 9 5	Z 2 NKD 19-09					K93120
	X 2 NiCoMo 18 8 5	1.6359	1.6359	X 2 NiCoMo 18 8 5		S 162				K92890
	X 2 NiCoMo 18 8 5	1.6359	1.6359	X 2 NiCoMo 18 8 5		S 162				K92890
M1	X 10 CrNiS 18 9	1.4305	1.4305	X 10 CrNiS 18 9	Z 10 CNF 18.09	303 S 31	X 10 CrNi 18 09	SUS 303	2346	S30300
M2	X 2 CrNi 19 11	1.4306	1.4306	X 2 CrNi 19 11	Z 2 CN 18.10	304 S 12	X 3 Cr Ni 18 11	SUS 304 L	2352	S30403
	X 5 CrNi 18 10	1.4301	1.4301	X 5 CrNi 18 10	Z 6 CN 18.09	304 S 31	X 5 CrNi 18 11	SUS 304	2333	S30400
	X 5 CrNiMo 17 12 2	1.4401	1.4401	X 5 CrNiMo 17 12 2	Z 3 CND 17.11.1	316 S 31	X 5 CrNiMo 17 12	SUS 316	2347	S31600
	X 6 CrNiNb 18 10	1.4550	1.4550	X 6 CrNiNb 18 10	Z 6 CNNb 18.10	347 S 31	X 6 CrNiNb 18 11	SUS 347	2338	S34700
	X 9 CrNi 18 8	1.4310	1.4310	X 12 CrNi 17 7	Z 12 CN 17.07	301 S 21	X 12 CrNi 17 07	SUS 301	(2331)	S30100
	X 12 CrNi 18 8	1.4300	1.4300	X 12 CrNi 18 8	Z 12 CN 18	302 S 25		SUS 302	2331	S30200
M3	X 2 CrNiMo 18 14 3	1.4435	1.4435	X 2 CrNiMo 18 14 3	Z 2 CND 17.13	316 S 12	X 2 CrNiMo 17 13 2	SCS 16, SUS 316 L	2353	S31603
	X 2 CrNiMoN 17 13 3	1.4429	1.4429	X 2 CrNiMoN 17 13 3	Z 2 CND 17.13 Az	316 S 62	X 2 CrNiMoN 17 13 3	SUS 316 LN	2375	S31653
	X 2 CrNiN 18 10	1.4311	1.4311	X 2 CrNiN 19 11	Z 2 CN 18 .10 Az	304 S 62	X 2 CrNiN 18 11	SUS 304 LN	2371	S30453
	X 3 CrNiMo 18 12 3	1.4466	1.4466	X 5 CrNi 18 15		317 S 16	X 5 CrNi 18 15	SUS 317	2366	S31700
	X 9 CrNiSiNCe 21 11 2	1.4835	1.4893	X 9 CrNiSiNCe 21 11 2		310 S 31			2368	S30815
	X 12 CrNi 25 21	1.4335	1.4335	X 12 CrNi 25 21	Z 12 CN 25.20	310 S 24	X 6 CrNi 26 20	SUH 310, SUS 310 S	2361	S31008
M4	X 2 CrNiMoN 22 5 3	1.4462	1.4462	X 2 CrNiMoN 22 5	Z 2 CND 22.05 Az	332 S 15	X 2 CrNiMoN 22 5		2377	S31803
	X 2 CrNiMoSi 19 5	1.4424	1.4417	X 2 CrNiMoSi 19 5	Z 2 CND 18.05.03				2376	S31500
	X 2 NiCrMoCu 25 20 5	1.4539	1.4539	X 2 NiCrMoCu 25 20 5	Z 2 NCDU 25 20	904 S 13			2562	N08904
	X 3 CrNiMo 27 5 2	1.4460	1.4460	X 4 CrNiMo 27 5 2	Z 3 CND 25.7 Az		X 3 CrNiMo 27 5 2	SUS 329 J 1	2324	S32900
	X 5 CrNiCuNb 16 4	1.4980	1.4943	X 4 NiCrTi 25 15	Z 6 NCTDV 25.15	HR 51		SUH 660	2570	S66286
M5	X 1 CrNiMoN 20 18 7	1.4547	1.4529	X 1 CrNiMoN 20 18 7	Z 1 CNDU 20.18.05 Az		X 1 CrNiMoN 20 18 7		2778	S31254
	X 1 CrNiMoN 25 22 8	1.4652	1.4652	X 2 CrNiMoN 25 22 7						S32654
	X 10 NiCrAlTi 32 20	1.4876	1.4876	X 10 NiCrAlTi 32 20	Z 10 NC 32.21			NCF 800		N08800
	X 2 CrNiMoN 25 7 4	1.4410	1.4410	X 2 CrNiMoN 25 7 4	Z 3 CND 25.07 Az		X 2 CrNiMoN 25 7 4		2328	S32750

U.N.E./ I.H.A.	AISI / ASTM	GOST	CSN	Misc. Brands	Condition	Structure
F.520L	L2	11KHF			Annealed	
F.5220	O1	9KHVG			Annealed	
	O2	9G2F			Annealed	
F.5230	52100	SHKH15	14 109		Annealed	
F.5212	D3	KH12			Annealed	
	H11	4KH5MFS			Annealed	
F.5318	H13	4KH5MF1S			Annealed	
F.5227	A2	9KH5VF			Annealed	
	H10	3KH3M3F			Annealed	
F.5213		KH12			Annealed	
		KH12MF			Annealed	
F.520.S	L6	5KHNM			Annealed	
F.5613	M35	R6M5K5			Annealed	
	M42	R2AM9K5			Annealed	
	T4	R18K5F2			Annealed	
F.5603	M2	R6M5			Annealed	
	M7				Annealed	
	T1	R18			Annealed	
	403	08KH13			Annealed	Ferritic
F.3401	410, CA-15	12KH13, 08KH13			Annealed	Martensitic
F.3113	430	12KH17			Annealed	Ferritic
F.5261	420	20KH13	17 022		Annealed	Martensitic
F.3404	420	40KH13			Annealed	Martensitic
	440 A				Annealed	Martensitic
	440 B	95KH18			Annealed	Martensitic
	440 C	95KH18			Annealed	Martensitic
	A182 F6NM			F6NM	Annealed	Martensitic
	446	15KH28			Annealed	Ferritic
	XM-13			PH 13-8 Mo	Solution annealed	Austenitic
	XM-12			15-5 PH	H1150	Martensitic
	XM-12			15-5 PH	Solution annealed	Martensitic
	XM-12			15-5 PH	H1025	Martensitic
	SAE 630			17-4 PH	H1150	Martensitic
	630			17-4 PH	Solution annealed	Martensitic
	631	09KH17N7YU1		17-7 PH	Solution annealed	Austenitic/Ferritic
	AMS 6515			Marage 350	Solution annealed	Martensitic
	AMS 6521			Marage 300	Solution annealed	Martensitic
	AMS 6514			Marage 300, Vascomax C300	Solution annealed	Martensitic
	AMS 6512			Marage 250	Solution annealed	Martensitic
	AMS 6512			Marage 250, Vascomax C250	Solution annealed	Martensitic
F.3508	303	12KH19N9			Annealed	Austenitic
F.3504	304 L	03KH18N11			Annealed	Austenitic
F.3504	304	08KH18N10	17 240		Annealed	Austenitic
F.3534	316	08KH17H13M2T	17 346		Annealed	Austenitic
F.3524	347	08KH18N12B			Annealed	Austenitic
F.3517	301	07KH16N6			Annealed	Austenitic
	302	12KH18N9			Annealed	Austenitic
F.3533	(316 L)	03KH17N14M3	17 349		Annealed	Austenitic
	316 LN	03KH16N15M3			Annealed	Austenitic
F.3541	304 LN	03KH18N11			Annealed	Austenitic
	317	08KH17H15M3T			Annealed	Austenitic
				253 MA	Annealed	Austenitic
	310 S	12KH25N20			Annealed	Austenitic
	329 LN			SAF 2205	Annealed	Duplex
				3RE60	Annealed	Duplex
	904L				Annealed	Super austenitic
	329				Annealed	Duplex
	660			A286	Solution annealed	Austenitic
				254 SMO	Annealed	Super austenitic
				654 SMO	Annealed	Super austenitic
				Alloy 800	Annealed	Austenitic
	F 53			SAF 2507	Annealed	Super duplex

SMG	EN	EN-Nr	W.-Nr	DIN	AFNOR	BS	UNI	JIS	SS	UNS
K1	EN-GJL-150	0.6150	0.6150	GG-15	Ft 15 D	Grade 150	G15	FC 150	01 15-00	F11601
	EN-GJL-200	0.6200	0.6200	GG-20	Ft 20 D	Grade 220	G20	FC 200	01 20-00	F12101
	EN-GJL-250	0.6250	0.6250	GG-25	Ft 25 D	Grade 260	G25	FC 250	01 25-00	F12401
	EN-GJL-350	0.6350	0.6350	GG-35	Ft 35 D	Grade 350	G35	FC 350	01 35-00	F13502
	EN-GJL-215			GG-220 HB					02 19	
K2	EN-GJV-300			GJV-300						
	EN-GJV-350			GJV-350						
	EN-GJV-400			GJV-400						
	EN-GJV-450			GJV-450						
	EN-GJV-500			GJV-500						
K3	EN-GJMB-550-4	0.8155		GTS-55-04	P 540/5	P 540/5	P 55-04	PCMP55-04	08 54-00	F24130
K4	EN-GJS-350-22	0.7033	0.7033	GGG-35.3	FGS 370-17	Grade 350/22		FCD 350-22L	07 17-15	
	EN-GJS-400-15	0.7040	0.7040	GGG-40	FGS 400-12	Grade 420/12	GS 400-12	FCD 400-18L	07 17-02	F32800
	EN-GJS-400-18	0.7043	0.7043	GGG-40.3	FGS 370-17	Grade 370/17	GSO 42/17		07 17-12	F32800
	EN-GJS-500-7	0.7050	0.7050	GGG-50	FGS 500-7	Grade 500/7	GS 500-7	FCD 500-7	07 27-02	F33800
	EN-GJS-600-3	0.7060	0.7060	GGG-60	FGS 600-3	Grade 600/3	GS 600-3	FCD 600-3	07 32-03	F34100
	EN-GJS-700-2	0.7070	0.7070	GGG-70	FGS 700-2	Grade 700/2	GS 700-2	FCD 700-2	07 37-01	F34800
K5										ADI grade 5
	EN-GJS-1000-5			GJS-1000-5						ADI grade 2
	EN-GJS-1200-2			GJS-1200-2						ADI grade 3
	EN-GJS-1400-1			GJS-1400-1						ADI grade 4
	EN-GJS-800-8			GJS-800-8						ADI grade 1
K6	EN-GJLA-XNiCr 20-2	0.6660	0.6660	GGL-NiCr 20 2	FGL Ni20 Cr2	Grade F2			05 23-00	F41002
	EN-GJLA-XNiCr 30-3	0.6676	0.6676	GGL-NiCr 30 3	FGL Ni30 Cr3	Grade F3				F41004
	EN-GJLA-XNiCuCr 15-6-2	0.6655	0.6655	GGL-NiCuCr 15 6 2	FGL Ni15 Cu6 Cr2	Grade F1				F41000
K7	EN-GJSA-XNiMn 13-7	0.7652	0.7652	GGG-NiMn 13 7	FGS Ni13 Mn7	Grade S6			07 72-00	
	EN-GJSA-XNiCr 20-2	0.7660	0.7660	GGG-NiCr 20 2	FGS Ni20 Cr2	Grade S2				F43000
	EN-GJSA-XNiMn 23-4	0.7673	0.7673	GGG-NiMn 23 4	FGS Ni23 Mn4	Grade S2M				F43010
	EN-GJSA-XNiCr 30-3	0.7676	0.7676	GGG-NiCr 30 3	FGS Ni30 Cr3	Grade S3				F43003
	EN-GJSA-XNi 35	0.7683	0.7683	GGG-Ni 35	FGS Ni35					F43006
N1	AW-1050A	Al99.5	3.0255	Al99.5	A-5/1050A	1B		(A1050)	4007	AA1050A
	AW-2011	AlCuBiPb	3.1655	AlCuBiPb	A-U5PbBi/2011	FC1		A2011	4355	AA2011
	AW-2014	AlCuSiMn	3.1255	AlCuSiMn	A-U4SG/2014	H15			4338	AA2014
	AW-5005	AlMg1	3.3315	AlMg1	A-G0.6	N41			4106	AA5005
	AW-6060	AlMgSi0.5	3.3206	AlMgSi0.5	A-GS/6060	(H9)			4103	AA6060
	AW-6063	AlMgSi0.7	3.3210	AlMgSi0.7	A-GSUC/6061	(H10)		(A6063)	4104, 4107	AA6005
	AW-3103	AlMn1	3.0515	AlMn1		N3			4054	AA3103
	AW-3003	AlMn1Cu	3.0517	AlMn1Cu	A-M1/3003			A3003		AA3003
	AW-7020	AlZn4.5Mg1	3.4335	AlZn4.5Mg1	A-Z5G/7020	H17			4425	AA7020
	AW-7075		3.4365	AlZnMgCu1.5	A-Z5GU/7075	2L95/2L96		A7075		AA7075
	AC-42000		3.2341	G-AlSi5Mg	A-S7G	LM25	3599	AC 4C	4244	
	AC-46200	AlSi8Cu3(Si)	3.2161	G-AlSi8Cu3					4251	A13800
	MG-P-63	MgAl6Zn	3.5612	G-MgAl6Zn	G-A6-Z1	MAG-E-121				M11600
	MG-P-61	MgAl8Zn	3.5812	G-MgAl8Zn	(G-A7-Z1)					
	MN65120	MgSe3Zn2Zr1	3.5103	G-MgSe3Zn2Zr1	ZRE1	MAG6-TE				M12330
N2	AC-43400	AlSi10Mg(Fe)	3.2381	G-AlSi10Mg	A-S10G	LM9			4253	A13600
	AC-44200	AlSi12	3.2382	GD-AlSi12						
	AW-6082	AlMgSi1	3.2315	AlMgSi1	A-SGM0.7/6082	H30			4212	AA6082
N3		AlSi17Cu5						ADC14		
N11	CC331G		2.0940.01	CuAl10Fe	CuAl10Fe	AB1			5710	C95200
	CC333G		2.0975.01	CuAl10Ni	CuAl10Ni5Fe5	AB2			5716	C95500
		CuNi10Fe1Mn	2.0872	CuNi10Fe1Mn	CuNi10Fe1Mn	CN102			5667	C70600
				CuNi10Zn45						
		CW408J	2.0790	CuNi18Zn19Pb	CuNi18Zn19Pb1					C76300
	CW352H		2.1176	CuPb10Sn	CuSn10Pb10	LB2			5640	C93700
	CC480K		2.1050.01	CuSn10	CuSn10	CT1			5443	C90700
			2.1087	CuSn10Zn					5458	C90500
	CW452K	CuSn6	2.1020	CuSn6	CuSn6	PB103		C5191	5428	C51900
	CW502L	CuZn15	2.0240	CuZn15	CuZn15	CZ102		C2300	5112	C23000
	CW706R	CuZn28Sn1	2.0470	CuZn28Sn1	CuZn29Sn1				5220	C44300
	CW508L	CuZn37	2.0321	CuZn37	CuZn37	CZ108			5150	C27200
	CW717R	CuZn38Sn1	2.0530	CuZn38Sn1						C46400
	CW614N	CuZn39Pb3	2.0401	CuZn39Pb3	CuZn39Pb3	CZ121			5170	C38500
	CW612N	CuZn40Pb2	2.0402	CuZn40Pb2	CuZn39Pb2	CZ120			5168	C37800
	CW622N	CuZn44Pb2	2.0410	CuZn44Pb2		CZ104			5272	C68700

U.N.E./ I.H.A.	AISI / ASTM	GOST	CSN	Misc. Brands	Condition	Structure
	A48 25 B	Sc 15	422 415			Grey cast iron (GCI)
	A48 30 B	Sc 20	422 420			Grey cast iron (GCI)
	A48 35 B	Sc 25	422 425			Grey cast iron (GCI)
	A48 50 B	Sc 35				Grey cast iron (GCI)
	G 3500					Grey cast iron (GCI)
	Grade 350					Compacted graphite iron (CGI)
	Grade 400					Compacted graphite iron (CGI)
	Grade 400-15					Compacted graphite iron (CGI)
	Grade 450					Compacted graphite iron (CGI)
	Grade 500					Compacted graphite iron (CGI)
	A220 60004				Tempered	Malleable cast iron (MCI)
						Nodular cast iron (SGI)
FGE 38-17	60-40-18	Vc 42-12	422 304			Nodular cast iron (SGI)
	60-40-18	Vc 42-12				Nodular cast iron (SGI)
FGE 50-7	A536, 80-55-06	Vc 50-2	422 305			Nodular cast iron (SGI)
FGE 60-2	A476, 80-60-03	Vc 60-2	422 306			Nodular cast iron (SGI)
FGE 70-2	A536, 100-70-03	Vc 70-2				Nodular cast iron (SGI)
	1600/1300/-					Austempered ductile iron (ADI)
	1050/700/7					Austempered ductile iron (ADI)
	1200/850/4					Austempered ductile iron (ADI)
	1400/1100/1					Austempered ductile iron (ADI)
	850/550/10					Austempered ductile iron (ADI)
	A436 Type 2			Ni-Resist 2		Austenitic lamellar cast iron
	A436 Type 3			Ni-Resist 3		Austenitic lamellar cast iron
	A436 Type 1			Ni-Resist 1		Austenitic lamellar cast iron
				Nodumag		Austenitic nodular cast iron
	A436 Type D-2			Ni-Resist D-2		Austenitic nodular cast iron
	A439 Type D-2M			Ni-Resist D-2M		Austenitic nodular cast iron
	A436 Type D-3			Ni-Resist D-3		Austenitic nodular cast iron
	A439 Type D-5			Ni-Resist D-5		Austenitic nodular cast iron
	B26					
	A380					
	AZ61A					
	AZ80A					
	AMS 4442					
	B85					
	A413.2					
	B390.0					
	CA952	BrA9ZH3L				
	CA955	BrA10ZH4N4L				
	CA937					
		BrOF6.5-0.15				
		L90				
		LOMsh70-1-0.05				
		LO60-1				
		LAMsh77-2-0.05				

SMG	EN	EN-Nr	W.-Nr	DIN	AFNOR	BS	UNI	JIS	SS	UNS
S1										
S2										
S3	NiMo30		2.4810							N10002
	NiMo16Cr15W		2.4819							N10276
	NiCr19Fe19Nb5Mo3		2.4668							N07718
			2.4669							N07750
	NiCr20TiAl		2.4631							N07080
	NiCr19Co18Mo4Ti3Al3									N07500
	NiCr20Co13Mo4Ti3Al		2.4654							N07001
S11			3.7024							
										R54620
S12										R56320
	TiAl6V4		3.7164							R56400
S13				TiV10Fe2Al3						
H3	16 MnCr 5	1.7131	1.7131	16 MnCr 5	16 MC 5	527 M 17	16 MnCr 5	SCR 415	2511	G51170
H5	C 67S	1.1231	1.1231	Ck 67	XC 68	060 A 67	C 70		1770	G10700
	C 75S	1.1248	1.1248	Ck 75	XC 75	060 A 78	C 75		1774, 1778	G10780
	C 100S	1.1274	1.1274	Ck 101		060 A 96		SUP 4	1870	G10950
	C 105U	1.1545	1.1545	C 105 W1	Y1 105		C 100 KU		1880	
			1.2550	60 WCrV 7	55 WC 20		55 WCrV 8 KU			
	55 Cr 3	1.7176	1.7176	55 Cr 3	55 C 3	527 A 60	55 Cr 3	SUP 9 (A)	2253	G51550
	42 CrMo 4	1.7225	1.7225	42 CrMo 4	42 CD 4	708 M 40	42 CrMo 4	SCM 440 (H)	2244	G41400
H7	107 CrV 3	1.2210	1.2210	115 CrV 3	100 C 3		107 CrV 3 KU			T61202
			1.2510	100 MnCrW 4	90 MWCV 5	BO 1	95 MnWCr 5 KU	SKS 3	2140	T31501
	90 MnCrV 8	1.2842	1.2842	90 MnCrV 8	90 MV 8	BO 2	90 MnVCr 8 KU			T31502
	100 Cr 6	1.3505	1.3505	100 Cr 6	100 C 6	534 A 99	100 Cr 6	SUJ 2	2258	G51986
H8	X 40 CrMoV 5 1	1.2344	1.2344	X 40 CrMoV 5 1	Z 40 CDV 5	BH 13	X 40 CrMo 5 1 1 KU	SKD 61	2242	T20813
	X 100 CrMoV 5	1.2363	1.2363	X 100 CrMoV 5 1	Z 100 CDV 5	BA 2	X 100 CrMoV 5 1 KU	SKD 12	2260	T30102
	X 155 CrVMo 12 1		1.2379	X 155 CrVMo 12 1	Z 160 CDV 12	BD 2	X 155 CrVMo 12 1 KU	SKD 11		T30402
			1.2436	X 210 CrW 12			X 215 CrW 12 1 KU	SKD 2	2312	
			1.2601	X 165 CrMoV 12			X 165 CrMoW 12 KU		2310	
			1.2713	55 NiCrMoV 6	55 NCDV 7			SKT 4		T61206
	HS 6-5-2-5	1.3243	1.3243	S 6-5-2-5	Z 85 WDKCV 06-05-05-04-02		HS 6-5-2-5	SKH 55	2723	
	HS 2-10-1-8	1.3247	1.3247	S 2-10-1-8	Z 110 DKCWV 09-08-	BM 42	HS 2-9-1-8	SKH 51		T11342
	HS 18-0-1	1.3355	1.3355	S 18-0-1	Z 80 WCV 18-04-01	BT 1	HS 18-0-1	SKH 2		T12001
H11	X 20 Cr 13	1.4021	1.4021	X 20 Cr 13	Z 20 C 13	420 S 37	X 20 Cr 13	SUS 420 J 1	2303	S42000
	X 70 CrMo 15	1.4109	1.4109	X 65 CrMo 14	Z 70 D 14			SUS 440 A		S44002
	X 90 CrMoV 18	1.4112	1.4112	X 90 CrMoV 18	Z 2 CND 18 05	409 S 19	X CrTi 12	SUS 440 B	2327	S44003
	X 105 CrMo 17	1.4125	1.4125	X 105 CrMo 17	Z 100 CD 17		X 105 CrMo 17	SUS 440 C		S44004
H12	X 4 CrNiCuNb 16 4	1.4540	1.4540	X 4 CrNiCuNb 16 4						S15500
	X 5 CrNiCuNb 16 4	1.4542	1.4542	X 5 CrNiCuNb 16 4				SUS 630		S17400
	X 5 CrNiCuNb 16 4	1.4542	1.4542	X 5 CrNiCuNb 16 4				SUS 630		S17400
	X 7 CrNiAl 17 7	1.4568	1.4568	X 7 CrNiAl 17 7	Z 9 CAN 17.7	301 S 81	X 7 CrNiAl 17 7	SUS 631	2388	S17700
	X 8 CrNiMoAl 15 7 5	1.4574	1.4574	X 8 CrNiMoAl 15 7 5						S15700
	X 6 NiCrTiMoV 25 15	1.4980	1.4943	X 4 NiCrTi 25 15	Z 6 NCTDV 25.15	HR 51		SUH 660	2570	S66286
	X 2 NiCoMo 18 8 5	1.6359	1.6359	X 2 NiCoMo 18 8 5		S 162				K92890
	X 2 NiCoMoTi 18 9 5	1.6358	1.6358	X 2 NiCoMoTi 18 9 5	Z 2 NKD 19-09					K93120
	X 2 NiCoMoTi 18 9 5	1.6358	1.6358	X 2 NiCoMoTi 18 9 5	Z 2 NKD 19-09					K93120
	X 2 NiCoMoTi 18 12 4	1.6356	1.6356	X 2 NiCoMoTi 18 12 4						K93160
H21	X 120 Mn 12	1.3401	1.3401	X 120 Mn 12	Z 120 M 12	BW 10		SC MnH 1	2183	
H31	EN-GJN-HV520	0.9620	0.9620	G-X330 NiCr 4 2	FB Ni4 Cr2 BC	Grade 2 A			05 12-00	F45001
	EN-GJN-HV550	0.9625	0.9625	G-X260 NiCr 4 2	FB Ni4 Cr2 HC	Grade 2 B			05 13-00	F45000
	EN-GJN-HV600(XCr11)	0.9630	0.9630	G-X300 CrNiSi 9 5 2	FB Cr9 Ni5	Grade 2 C, D, E			04 57-00	F45003

U.N.E./ I.H.A.	AISI / ASTM	GOST	CSN	Misc. Brands	Condition	Structure
				Discalloy	Precipitation hardened	
				Haynes 25		
				Stellite 21		
				Hastelloy C		
		KHN65MV		Hastelloy C-276		
				IN 100		
				Inconel 718		
				Inconel X-750	Solution annealed	
				Nimonic 80A		
				René 41		
				Udimet 500		
				Waspalloy		
				Ti	Commercially pure	Ti (α)
	AMS 4919			Ti 6-2-4-2	Annealed	Ti (α)
	AMS 4943			Ti 3Al-2.5V (grd 9)	Annealed	Ti (α+β)
	AMS 4920, Grade 5	VT6		Ti 6Al-4V	Annealed	Ti (α+β)
	AMS 4986			Ti 10V-2Fe-3Al	Annealed	Ti (β)
F.1516	5115	12KHN2	14 220		Case hardened	
F.5103	1070	70			Quenched & Tempered	
F.5107	1078, 1080	75			Quenched & Tempered	
F.5117	1095				Quenched & Tempered	
F.5118	W1	U10A			Quenched & Tempered	
	S1	5KHV2SF			Quenched & Tempered	
	5155				Quenched & Tempered	
F.1252	4142, 4140	38HM	15 142		Quenched & Tempered	
F.520L	L2	11KHF			Quenched & Tempered	
F.5220	O1	9KHVG			Quenched & Tempered	
	O2	9G2F			Quenched & Tempered	
F.5230	52100	SHKH15	14 109		Quenched & Tempered	
F.5318	H13	4KH5MF1S			Quenched & Tempered	
F.5227	A2	9KH5VF			Quenched & Tempered	
F.5211	D2	KH12MF			Quenched & Tempered	
F.5213		KH12			Quenched & Tempered	
		KH12MF			Quenched & Tempered	
F.520.S	L6	5KHNM			Quenched & Tempered	
F.5613	M35	R6M5K5			Quenched & Tempered	
	M42	R2AM9K5			Quenched & Tempered	
	T1	R18			Quenched & Tempered	
F.5261	420	20KH13	17 022		Quenched & Tempered	Martensitic
	440 A				Quenched & Tempered	Martensitic
	440 B	95KH18			Quenched & Tempered	Martensitic
	440 C	95KH18			Quenched & Tempered	Martensitic
	XM-12			15-5 PH	H900	Martensitic
	SAE 630			17-4 PH	H1025	Martensitic
	SAE 630			17-4 PH	H900	Martensitic
	AMS 5528	09KH17N7YU1		17-7 PH	TH1050	Martensitic
	632			PH 15-7 Mo	TH1050	Martensitic
	660			A286	Precipitation hardened	Austenitic
	AMS 6512			Marage 250	Precipitation hardened	Martensitic
	AMS 6521			Marage 300	Precipitation hardened	Martensitic
	AMS 6521			Marage 300	Precipitation hardened	Martensitic
	AMS 6515			Marage 350	Precipitation hardened	Martensitic
	A128 Grade A			Hadfield		
	A532 IB (NiCr-LC			Ni-Hard 2		White cast iron
	A532 IA (NiCr-HC)			Ni-Hard 1		White cast iron
	A532 ID (Ni-HiCr)			Ni-Hard 4		White cast iron

Declaration of conformity

Cemented carbide inserts and insert carriers

Cemented carbide inserts and cemented carbide insert carriers from Seco Tools are not included in the product range intended for the following requirements.
Nevertheless Seco Tools can make the following declaration.
These products meet all requirements in RoHS (Restriction of the use of certain Hazardous Substances in electrical and electronic equipment), WEEE (Waste Electrical & Electronic Equipment) and ELV (End of Life Vehicles) requirements.
Products do not contain mercury, lead, hexavalent chromium, cadmium, CFC, HCFC, flame retardants or solvents in concentrations that exceed specifications in the regulations.

Regrinding:
Wet or dry grinding can produce potentially hazardous dusts or mists that can irritate skin, eyes, nose, throat and result in lung damage or disease. To avoid injury use proper safety precautions and protective equipment.

Disposal:
Seco Tools will buy back used inserts and solid carbide tools for recycling. Inserts and solid carbide tools should be separated from other metal waste (steel, aluminium, copper etc).
All packing material is fully recyclable.

CBN and PCD inserts

Inserts from Seco Tools are not included in the product range intended for the following requirements. Nevertheless Seco Tools can make the following declaration.
This product meets all requirements in RoHS (Restriction of the use of certain Hazardous Substances in electrical and electronic equipment), WEEE (Waste Electrical & Electronic Equipment) and ELV (End of Life Vehicles) requirements.
Products do not contain mercury, lead, hexavalent chromium, cadmium, CFC, HCFC, flame retardants or solvents in concentrations that exceed specifications in the regulations.

Regrinding:
Wet or dry grinding can produce potentially hazardous dusts or mists that can irritate skin, eyes, nose, throat and result in lung damage or disease. To avoid injury use proper safety precautions and protective equipment.

Disposal:
Seco Tools will buy back used CBN- or PCD-tipped inserts for recycling. Inserts should be separated from other metal waste (steel, aluminium, copper etc). Solid CBN-inserts may be discarded as landfill waste.
All packing material is fully recyclable.

Black oxide insert carriers

Insert carriers from Seco Tools are not included in the product range intended for the following requirements. Nevertheless Seco Tools can make the following declaration.
This product meets all requirements in RoHS (Restriction of the use of certain Hazardous Substances in electrical and electronic equipment), WEEE (Waste Electrical & Electronic Equipment) and ELV (End of Life Vehicles) requirements.
Products do not contain mercury, lead, hexavalent chromium, cadmium, CFC, HCFC, flame retardants or solvents in concentrations that exceed specifications in the regulations.

Disposal:
Used insert carriers may be sent for recycling together with ordinary steel waste (swarf and discarded steel scrap) for recycling.
All packing material is fully recyclable.

Cermet inserts

Inserts from Seco Tools are not included in the product range intended for the following requirements. Nevertheless Seco Tools can make the following declaration.
This product meets all requirements in RoHS (Restriction of the use of certain Hazardous Substances in electrical and electronic equipment), WEEE (Waste Electrical & Electronic Equipment) and ELV (End of Life Vehicles) requirements.
Cermet grade C15M inserts do contain nickel and will leach nickel when in contact with the skin. Amount of leaching is higher than specified in norm SS-EN 1811 Reference test method for release of nickel from products intended to come into direct and prolonged contact with the skin. These norms are intended for products that are in direct and prolonged contact with the skin and are therefore not directly applicable for cermet inserts. Persons with known allergic reactions to nickel are advised to wear protective gloves when handling cermet inserts.

Regrinding:
Wet or dry grinding can produce potentially hazardous dusts or mists that can irritate skin, eyes, nose, throat and result in lung damage or disease. To avoid injury use proper safety precautions and protective equipment.

Disposal:
Used inserts may be recycled. Inserts should be separated from other metal waste (steel, aluminium, copper, etc) including cemented carbide inserts.
All packing material is fully recyclable.

Nickel coated insert carriers

Insert carriers from Seco Tools are not included in the product range intended for the following requirements. Nevertheless Seco Tools can make the following declaration.
This product meets all requirements in RoHS (Restriction of the use of certain Hazardous Substances in electrical and electronic equipment), WEEE (Waste Electrical & Electronic Equipment) and ELV (End of Life Vehicles) requirements.
Products do not contain mercury, lead, hexavalent chromium, cadmium, CFC, HCFC, flame retardants or solvents in concentrations that exceed specifications in the regulations.
Insert carriers do contain nickel and will leach nickel when in contact with the skin. Amount of leaching is not higher then norm SS-EN 1811 Reference test method for release of nickel from products intended to come into direct and prolonged contact with the skin.
These norms are intended for products that are in direct and prolonged contact with the skin and are therefore not directly applicable for insert carriers.
Persons with known allergic reactions to nickel are advised to wear protective gloves when handling nickel coated insert carriers.

Disposal:
Used tools maybe sent for recycling together with ordinary steel waste (swarf and discarded steel scrap) for recycling.
All packing material is fully recyclable.

Intentionally added alloying elements

Grade	Cemented carbide											Coating						
	W	Ti	Ta	Nb	Co	Cr	Ni	Mo	C	N	Ru	Ti	Al	C	N	O	Si	Nb
CP20	■				■				■			■			■			
CP200	■				■	■			■			■	■		■			
CP300	■	■	■	■	■				■			■	■		■			
CP500	■				■	■			■			■	■		■			
CP600	■				■	■			■			■	■		■			
C15M	■	■	■	■	■		■	■	■	■								
CF	■		■		■		■	■	■									
CM	■		■		■		■	■	■									
DP2000	■		■	■	■				■			■	■	■	■	■		
DP2501	■	■	■	■	■				■	■		■	■	■	■	■		
DP3000	■	■	■	■	■				■	■		■	■	■	■	■		
DS2050	■				■	■			■			■	■		■			■
DS4050	■				■	■			■			■	■		■			■
F15M	■				■	■			■			■	■		■			
F25M	■	■	■	■	■				■			■	■		■			
F30M	■				■	■			■			■	■		■			
F40M	■				■	■			■			■	■		■			
HX	■		■		■				■									
H02	■		■		■	■			■									
H15	■				■	■			■									
H25	■				■	■			■									
KX	■				■	■			■									
MH1000	■				■	■			■			■	■		■			
MH1051	■				■	■			■			■	■		■		■	
MK1500	■		■		■				■			■	■	■	■	■		
MK1501	■		■		■				■			■	■	■	■	■		
MK2050	■		■		■	■			■			■	■		■		■	
MM4500	■				■	■			■			■	■	■	■	■		
MP1501	■		■	■	■				■			■	■	■	■	■		
MP2050	■				■						■	■	■		■		■	
MP2051	■				■	■			■			■	■		■		■	
MP2501	■		■	■	■				■			■	■	■	■	■		
MP3000	■				■	■			■			■	■		■			
MP3501	■		■	■	■				■			■	■	■	■	■		
MS2500	■		■	■	■				■			■	■	■	■	■		
MS2050	■				■	■			■			■	■		■			■
RX1500	■		■		■		■	■	■			■	■		■			
RX2000	■		■		■	■			■			■	■		■			
RM2020	■				■				■			■						
RM2090	■				■	■			■			■	■				■	
RN2010	■				■	■			■									
RS2090	■				■	■			■			■	■				■	
T350M	■		■	■	■				■			■	■	■	■	■		
T25M	■		■	■	■				■			■		■	■			
TGH1050	■				■	■			■			■	■		■		■	
TGK1500	■		■		■				■			■	■	■	■	■		
TGP25	■	■	■	■	■				■			■	■	■	■	■		
TGP35	■		■	■	■				■			■	■	■	■	■		
TGP45	■		■	■	■				■			■	■	■	■	■		
TGS2050	■				■	■			■			■	■		■		■	
TH1000	■				■	■			■			■	■		■		■	
TH1500	■				■	■			■			■	■	■	■	■		
TK0501	■				■	■			■			■	■	■	■	■		
TK1501	■		■		■	■			■			■	■	■	■	■		
TM1501	■	■	■	■	■	■			■	■		■	■	■	■	■		
TM2000	■	■	■	■	■				■	■		■	■	■	■	■		
TM2501	■	■	■	■	■				■	■		■	■	■	■	■		

Grade	Cemented carbide											Coating						
	W	Ti	Ta	Nb	Co	Cr	Ni	Mo	C	N	Ru	Ti	Al	C	N	O	Si	Nb
TM3501	■				■				■			■	■	■	■	■		
TM4000	■	■	■	■	■				■	■		■	■	■	■	■		
TP0501	■	■	■	■	■	■			■			■	■	■	■	■		
TP1020	■	■	■	■	■				■	■								
TP1030	■	■	■	■	■				■	■		■	■		■		■	
TP1501	■	■	■	■	■				■	■		■	■	■	■	■		
TP25	■	■	■	■	■	■			■	■		■	■	■	■	■		
TP200	■	■	■	■	■				■	■		■	■	■	■	■		
TP2501	■	■	■	■	■	■			■	■		■	■	■	■	■		
TP3501	■	■	■	■	■				■	■		■	■	■	■	■		
TP40	■		■	■	■				■			■		■	■			
TS2000	■				■	■			■			■	■		■			
TS2050	■				■	■			■			■	■		■		■	
TS2500	■		■		■				■			■	■		■			
TTP2050	■				■	■			■			■	■		■		■	
T250D	■				■	■			■			■	■		■			
T400D	■				■	■			■			■	■		■			
T100R	■		■		■	■			■			■	■		■			
T60M	■	■	■	■	■				■			■	■		■			
883	■		■		■				■									
890	■				■	■			■									

This work is published with the understanding that Seco Tools and its editors are supplying information aimed to present a general orientation and direction of metal cutting and related sciences. If professional services are required for specific applications, the assistance of an appropriate professional should be acquired. The information is provided "as is"; Seco Tools and its editors disclaim all representations and warranties, express or implied, of any kind, including, without limitations, any warranties of merchantability, fitness for a particular purpose, title, or non-infringement. In no event will Seco Tools or its editors be liable to any party for any direct, indirect, special or other consequential damages for any use of the information, even if Seco Tools or its editors are advised of the possibility of such damage. The information provided herein is for reference purposes only. Actual prices, specifications, and product descriptions are finalized at the time of sale and may vary by location. The information provided herein is subject to change without prior notice.

secotools.com
ST20266820 GB
© Seco Tools AB, 2026.
All rights reserved.

Technical specifications are subject to
change without notice.