HORN

boehlerit

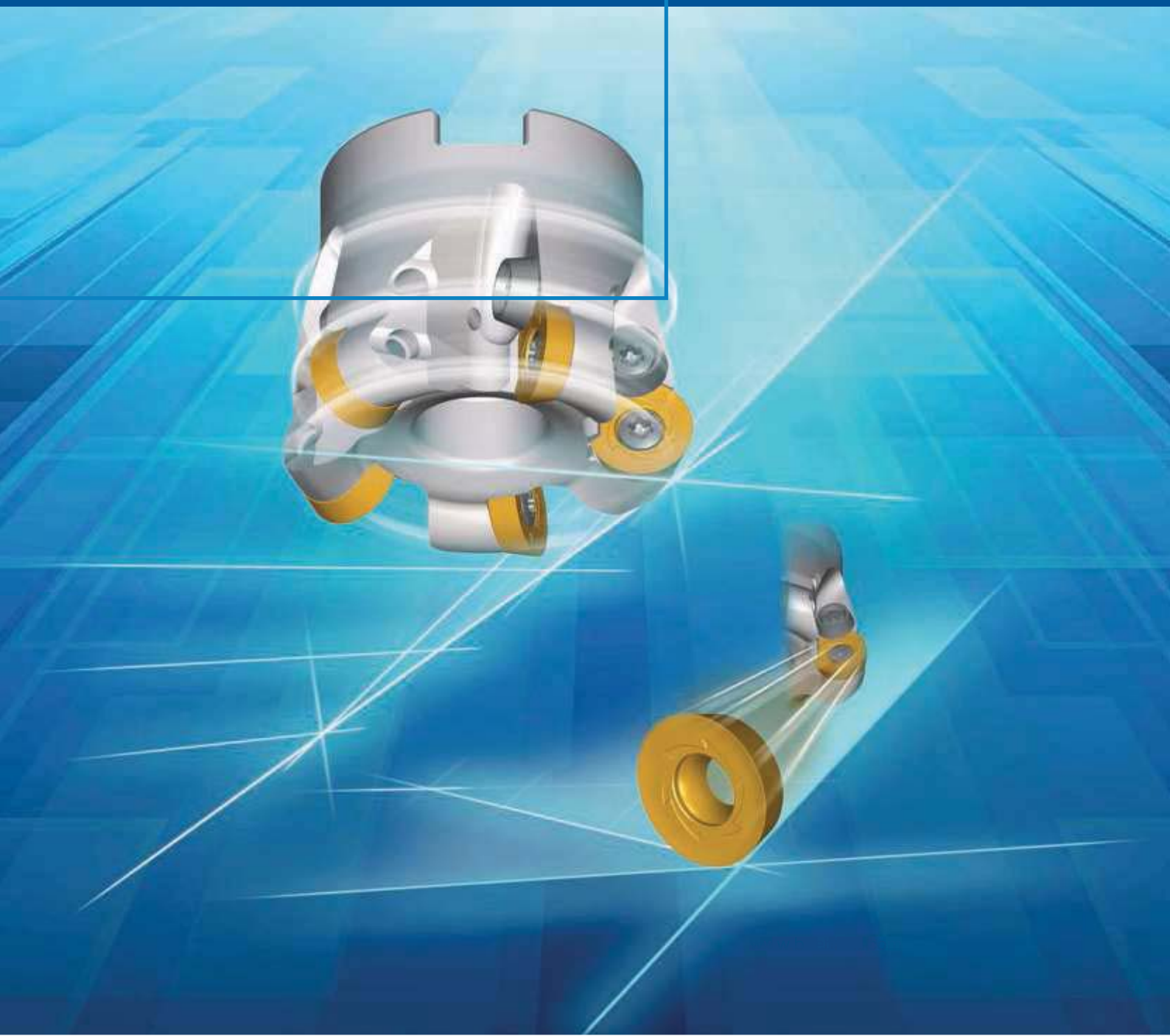
# BOEHLERIT FRÄSEN

BOEHLERIT MILLING

2020/2021

# DAS WERKZEUG
# HORN TOOLS

# 3D-Fräsen
# 3D-Milling



# ISO 00P

Ø 40 - 160 mm Aufsteckfräser
Ø 40 - 160 mm Face milling cutter
Plattengröße 10, 12, und 16
Insert size 10, 12 and 16

Ø 15 - 20 mm Schaftfräser
Ø 15 - 20 mm End milling cutter
Plattengröße 07 und 10
Insert size 07 and 10

Ø 10 - 42 mm Einschraubfräser
Ø 10 - 42 mm Screw on type
Plattengröße 05, 07, 10, 12 und 16
Insert size 05, 07, 10, 12 and 16

**Besondere Merkmale:**

- Universell einsatzbares Werkzeugsystem für den allgemeinen Maschinenbau und dem Formenbau
- Neutrale Einbaulage der Wendeschneidplatten in den Trägerwerkzeugen für eine optimale Konturgenauigkeit
- Spezieller Schutz im Plattensitz der Wendeplattenkante vor Spanschlag
- Hohe Sortimentstiefe bei Wendeplatten und Trägerwerkzeugen
- Sanftes Schnittverhalten, durch spezielle Wendeschneidplatten Geometrie, trotz neutraler Einbaulage

**Special features:**

- Universal applicable tool system for general machining and mould construction
- Neutral mounting position of the insert in the tool for an optimal contour precision
- Special protection against chip impact on the insert seat of the insert's cutting edge
- Big assortment depth of inserts and tools
- Smooth cutting behaviour due to special geometry of inserts, despite neutral mounting position

# ISO 00P

### RD.. 0501..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **RD.. 0501** | Vorschub Feed [mm] $f_z$ **RD.. 0501** |
|---|---|---|
| MP | 0,25 **0,70** 1,20 | 0,14 0,**26** 0,50 |
| MM | 0,25 **0,70** 1,20 | 0,13 **0,23** 0,45 |
| MK | 0,25 **0,70** 1,20 | 0,15 **0,27** 0,53 |
| FH | 0,10 **0,18** 0,45 | 0,10 **0,20** 0,36 |
| MH | 0,10 **0,18** 0,45 | 0,10 **0,20** 0,36 |
| RH | 0,12 **0,24** 0,60 | 0,10 **0,22** 0,40 |

### RD.. 0702..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **RD.. 0701** | Vorschub Feed [mm] $f_z$ **RD.. 0701** |
|---|---|---|
| MP | 0,25 **1,00** 1,70 | 0,14 **0,27** 0,60 |
| MM | 0,25 **1,00** 1,70 | 0,13 **0,24** 0,52 |
| MK | 0,25 **1,00** 1,70 | 0,15 **0,28** 0,63 |
| FH | 0,10 **0,20** 0,65 | 0,11 **0,22** 0,42 |
| MH | 0,10 **0,20** 0,65 | 0,11 **0,22** 0,42 |
| RH | 0,12 **0,25** 0,85 | 0,11 **0,25** 0,46 |

### RD.. 1003..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **RD.. 1003** | Vorschub Feed [mm] $f_z$ **RD.. 1003** |
|---|---|---|
| MP | 0,28 **1,50** 2,50 | 0,15 **0,28** 0,64 |
| MM | 0,26 **1,50** 2,50 | 0,14 **0,25** 0,55 |
| MK | 0,28 **1,50** 2,50 | 0,16 **0,30** 0,67 |
| FH | 0,12 **0,22** 0,90 | 0,12 **0,28** 0,45 |
| MH | 0,12 **0,22** 0,90 | 0,12 **0,28** 0,45 |
| RH | 0,14 **0,28** 1,20 | 0,12 **0,30** 0,50 |

### RD.. 12T3..

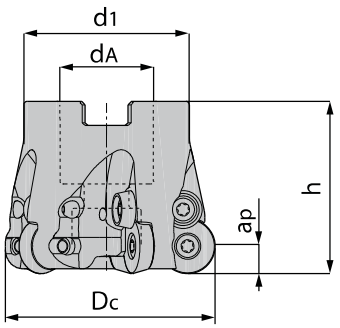
| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **RD.. 12T3** | Vorschub Feed [mm] $f_z$ **RD.. 12T3** |
|---|---|---|
| MP | 0,30 **1,80** 3,00 | 0,16 **0,29** 0,70 |
| MM | 0,27 **1,80** 3,00 | 0,15 **0,25** 0,60 |
| MK | 0,30 **1,80** 3,00 | 0,18 **0,32** 0,75 |
| FH | 0,12 **0,25** 1,10 | 0,13 **0,28** 0,50 |
| MH | 0,12 **0,25** 1,10 | 0,13 **0,28** 0,50 |
| RH | 0,14 **0,30** 1,50 | 0,13 **0,30** 0,56 |

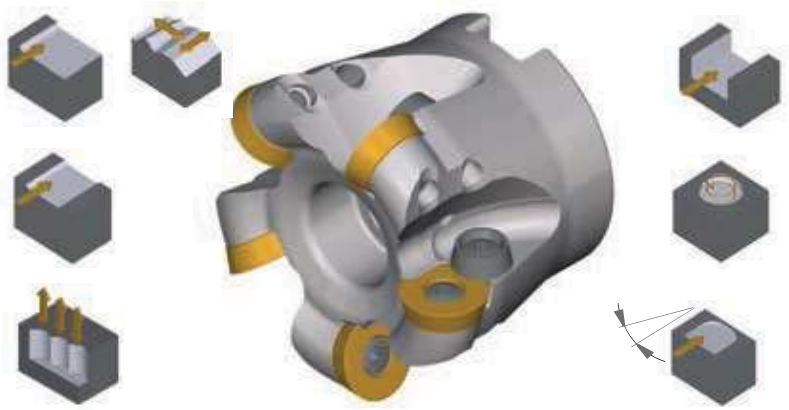
### RD.. 1604..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **RD.. 1604** | Vorschub Feed [mm] $f_z$ **RD.. 1604** |
|---|---|---|
| MP | 0,30 **2,40** 4,00 | 0,18 **0,30** 0,75 |
| MM | 0,27 **2,40** 4,00 | 0,16 **0,25** 0,64 |
| MK | 0,30 **2,40** 4,00 | 0,18 **0,33** 0,80 |
| FH | 0,12 **0,28** 1,60 | 0,14 **0,28** 0,50 |
| MH | 0,12 **0,28** 1,60 | 0,14 **0,28** 0,50 |
| RH | 0,15 **0,35** 2,00 | 0,14 **0,30** 0,56 |

Schnittgeschwindigkeiten siehe Seite 118-119
Cutting data recommendations page 118-119

**Aufsteckfräser**
**Face milling cutter**



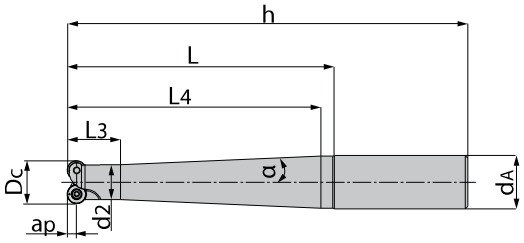



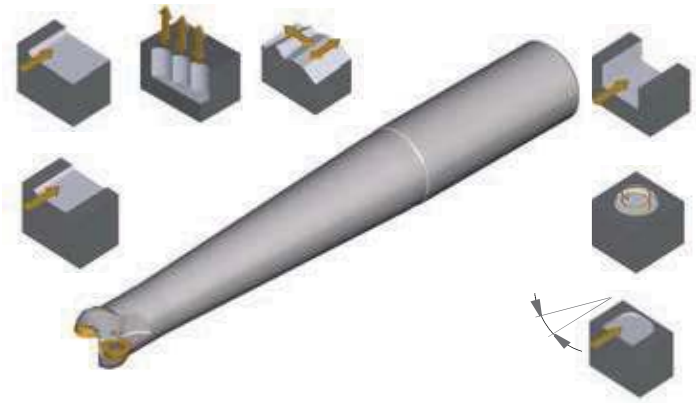
| Abmessungen [mm] Dimension [mm] | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d1 | h | ap | z | | | | | | | |
| 40 | 16 | 32 | 40 | 5 | 5 | **BF00 RD10.040 Z05** | 5116928 | ● | RD.. 10 | **AP13-35072** 5118118 $M_A$ = 3,5Nm | **IP15** 5088520 | - |
| 42 | 16 | 32 | 40 | 5 | 5 | **BF00 RD10.042 Z05** | 5116932 | ● | RD.. 10 | | | |
| 52 | 22 | 40 | 50 | 5 | 5 | **BF00 RD10.052 Z05** | 5116934 | ● | RD.. 10 | | | |
| 52 | 22 | 40 | 50 | 5 | 7 | **BF00 RD10.052 Z07** | 5116935 | ● | RD.. 10 | | | |
| 42 | 16 | 32 | 40 | 6 | 4 | **BF00 RD12.042 Z04** | 5116929 | ● | RD.. 12 | **AP13-35086** 5118120 $M_A$ = 3,5Nm | **IP15** 5088520 | Spann-schraube- Clamping screw **RD12** 5125841 |
| 48 | 22 | 40 | 50 | 6 | 4 | **BF00 RD12.048 Z04** | 5116930 | ● | RD.. 12 | | | |
| 50 | 22 | 40 | 50 | 6 | 5 | **BF00 RD12.050 Z05** | 5091167 | ● | RD.. 12 | | | |
| 52 | 22 | 40 | 50 | 6 | 5 | **BF00 RD12.052 Z05** | 5100776 | ● | RD.. 12 | | | |
| 63 | 27 | 48 | 50 | 6 | 6 | **BF00 RD12.063 Z06** | 5113559 | ● | RD.. 12 | | | |
| 66 | 27 | 48 | 50 | 6 | 6 | **BF00 RD12.066 Z06** | 5116878 | ● | RD.. 12 | | | |
| 80 | 27 | 60 | 52 | 6 | 7 | **BF00 RD12.080 Z07** | 5112570 | ● | RD.. 12 | | | |
| 50 | 22 | 40 | 50 | 8 | 4 | **BF00 RD16.050 Z04** | 5116881 | ● | RD.. 16 | **AP13-45105** 5118121 $M_A$ = 5Nm | **IP20** 5088521 | Spannsystem Clamping system: Klemmplatte Clamp **5125842** Spann-schraube Clamping screw **5118121** |
| 52 | 22 | 40 | 50 | 8 | 4 | **BF00 RD16.052 Z04** | 5116883 | ● | RD.. 16 | | | |
| 63 | 27 | 48 | 50 | 8 | 5 | **BF00 RD16.063 Z05** | 5116884 | ● | RD.. 16 | | | |
| 66 | 27 | 48 | 50 | 8 | 5 | **BF00 RD16.066 Z05** | 5098414 | ● | RD.. 16 | | | |
| 66 | 27 | 48 | 50 | 8 | 6 | **BF00 RD16.066 Z06** | 5117184 | ○ | RD.. 16 | | | |
| 80 | 27 | 60 | 52 | 8 | 6 | **BF00 RD16.080 Z06** | 5095955 | ● | RD.. 16 | | | |
| 80 | 27 | 60 | 52 | 8 | 7 | **BF00 RD16.080 Z07** | 5115222 | ● | RD.. 16 | | | |
| 100 | 32 | 75 | 52 | 8 | 7 | **BF00 RD16.100 Z07** | 5116885 | ● | RD.. 16 | | | |
| 125 | 40 | 90 | 63 | 8 | 8 | **BF00 RD16.125 Z08** | 5116886 | ● | RD.. 16 | | | |
| 160 | 40 | 120 | 63 | 8 | 9 | **BF00 RD16.160 Z09** | 5116887 | ● | RD.. 16 | | | |

Bestellbeispiel Order example: 1 Stück piece BF00 RD10.040 Z05 oder or 5116928

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

## Schaftfräser konisch Form A
End milling cutter conical form A

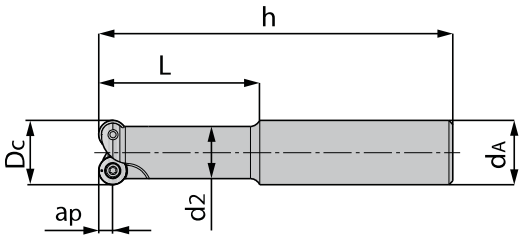


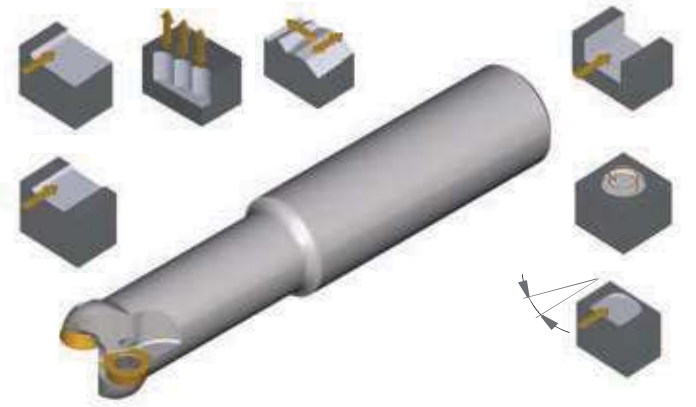



| Abmessungen [mm] Dimension [mm] | | | | | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d2 | L | h | ap | z | α | L3 | L4 | | | | | | |
| 15 | 16 | 13 | 60 | 108 | 3,5 | 2 | 2,0° | 20 | 55 | **BEA00 RD07.015 Z02 108** | 5116865 | ● | RD.. 07 | **AP13-25055** 5118117 $M_A$ = 2Nm | **IP7** 5118123 |
| 15 | 20 | 13 | 80 | 130 | 3,5 | 2 | 3,4° | 20 | 75 | **BEA00 RD07.015 Z02 130** | 5116866 | ● | RD.. 07 | | |
| 15 | 20 | 13 | 100 | 150 | 3,5 | 2 | 2,5° | 20 | 95 | **BEA00 RD07.015 Z02 150** | 5116867 | ● | RD.. 07 | | |
| 15 | 25 | 13 | 120 | 176 | 3,5 | 2 | 3,5° | 20 | 115 | **BEA00 RD07.015 Z02 176** | 5116868 | ● | RD.. 07 | | |
| 16 | 16 | 13 | 60 | 108 | 3,5 | 2 | 2,0° | 20 | 55 | **BEA00 RD07.016 Z02 108** | 5116870 | ● | RD.. 07 | | |
| 16 | 20 | 13 | 80 | 130 | 3,5 | 2 | 3,4° | 20 | 75 | **BEA00 RD07.016 Z02 130** | 5116871 | ● | RD.. 07 | | |
| 16 | 20 | 13 | 100 | 150 | 3,5 | 2 | 2,5° | 20 | 95 | **BEA00 RD07.016 Z02 150** | 5116872 | ● | RD.. 07 | | |
| 16 | 25 | 13 | 120 | 176 | 3,5 | 2 | 3,5° | 20 | 115 | **BEA00 RD07.016 Z02 176** | 5116873 | ● | RD.. 07 | | |
| 20 | 20 | 18 | 40 | 90 | 5 | 2 | 2,9° | 20 | 35 | **BEA00 RD10.020 Z02 090** | 5116874 | ● | RD.. 10 | **AP13-35072** 5118118 $M_A$ = 3,5Nm | **IP15** 5088520 |
| 20 | 20 | 18 | 60 | 110 | 5 | 2 | 1,3° | 20 | 55 | **BEA00 RD10.020 Z02 110** | 5110337 | ● | RD.. 10 | | |
| 20 | 25 | 18 | 80 | 136 | 5 | 2 | 3,4° | 20 | 75 | **BEA00 RD10.020 Z02 136** | 5116875 | ● | RD.. 10 | | |
| 20 | 25 | 18 | 100 | 156 | 5 | 2 | 2,5° | 20 | 95 | **BEA00 RD10.020 Z02 156** | 5116876 | ● | RD.. 10 | | |
| 20 | 25 | 18 | 120 | 176 | 5 | 2 | 2,0° | 20 | 115 | **BEA00 RD10.020 Z02 176** | 5116877 | ● | RD.. 10 | | |

Bestellbeispiel Order example: 1 Stück piece BEA00 RD07.015 Z02 108 oder or 5116865

## Schaftfräser zylindrisch Form B
End milling cutter cylindrical form B



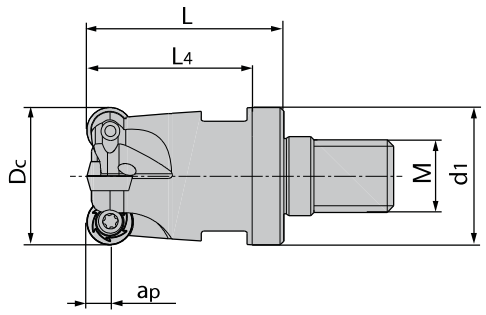



| Abmessungen [mm] Dimension [mm] | | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d2 | L | h | ap | z | | | | | | |
| 15 | 16 | 13 | 40 | 88 | 3,5 | 2 | **BEB00 RD07.015 Z02 088** | 5116864 | ● | RD.. 07 | **AP13-25055** 5118117 $M_A$ = 2Nm | **IP7** 5118123 |
| 16 | 16 | 13 | 40 | 88 | 3,5 | 2 | **BEB00 RD07.016 Z02 088** | 5116869 | ● | RD.. 07 | | |

Bestellbeispiel Order example: 1 Stück piece BEB00 RD07.015 Z02 088 oder or 5116864

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Einschraubfräser konisch Form A**
**Screw on type conical form A**

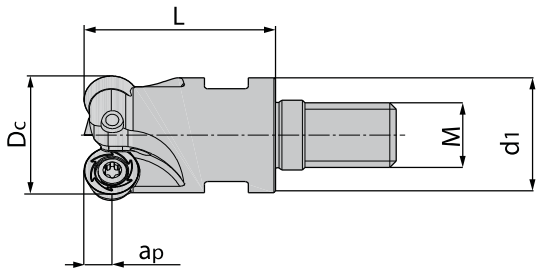


| Abmessungen [mm] Dimension [mm] | | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | d1 | L | L4 | ap | z | M | | | | | | | |
| 10 | 13 | 23 | 17 | 2,5 | 2 | 8 | **BSA00 RD05.010 Z02 M8** | 5116889 | ● | RD.. 05.. | **AP13-18037** 5118116 $M_A$ = 0,5Nm | **IP6** 5126412 | - |
| 12 | 13 | 23 | 17 | 2,5 | 3 | 8 | **BSA00 RD05.012 Z03 M8** | 5116890 | ● | | | | |
| 30 | 29 | 43 | 38 | 3,5 | 5 | 16 | **BSA00 RD07.030 Z05 M16** | 5116909 | ● | RD.. 07.. | **AP13-25055** 5118117 $M_A$ = 2Nm | **IP7** 5118123 | - |
| 30 | 29 | 43 | 38 | 5 | 4 | 16 | **BSA00 RD10.030 Z04 M16** | 5116913 | ● | RD.. 10.. | **AP13-35072** 5118118 $M_A$ = 3,5Nm | **IP15** 5088520 | - |
| 32 | 29 | 43 | 38 | 5 | 4 | 16 | **BSA00 RD10.032 Z04 M16** | 5116914 | ● | | | | |
| 32 | 29 | 43 | 38 | 6 | 3 | 16 | **BSA00 RD12.032 Z03 M16** | 5116925 | ● | RD.. 12.. | **A13-35086** 5118120 $M_A$ = 3,5Nm | **IP15** 5088520 | Spann-schraube- Clamping screw **RD12** 5125841 |
| 32 | 29 | 43 | 38 | 8 | 2 | 16 | **BSA00 RD16.032 Z02 M16** | 5100845 | ● | RD.. 16.. | **AP13-45105** 5118121 $M_A$ = 5Nm | **IP20** 5088521 | Spannsystem Clamping system: Klemmplatte Clamp **5125842** Spann-schraube Clamping screw **5118121** |

Bestellbeispiel Order example: 1 Stück piece BSA00 RD05.010 Z02 M8 oder or 5116889

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Einschraubfräser zylindrisch Form B**
**Screw on type cylindrical form B**



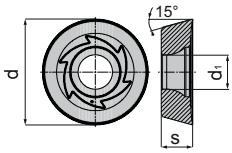
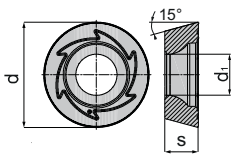
| Abmessungen [mm] Dimension [mm] | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | d1 | L | ap | z | M | | | | | | | |
| 15 | 13 | 23 | 2,5 | 4 | 8 | **BSB00 RD05.015 Z04 M8** | 5116891 | ● | RD.. 05.. | **AP13-18037** 5118116 $M_A$ = 0,5Nm | **IP6** 5126412 | - |
| 16 | 13 | 23 | 2,5 | 4 | 8 | **BSB00 RD05.016 Z04 M8** | 5116894 | ● | | | | |
| 20 | 18 | 30 | 2,5 | 5 | 10 | **BSB00 RD05.020 Z05 M10** | 5116896 | ● | | | | |
| 25 | 21 | 35 | 2,5 | 6 | 12 | **BSB00 RD05.025 Z06 M12** | 5116897 | ● | | | | |
| 15 | 13 | 23 | 3,5 | 2 | 8 | **BSB00 RD07.015 Z02 M8** | 5116899 | ● | RD.. 07.. | **AP13-25055** 5118117 $M_A$= 2Nm | **IP7** 5118123 | - |
| 15 | 13 | 23 | 3,5 | 3 | 8 | **BSB00 RD07.015 Z03 M8** | 5116901 | ● | | | | |
| 16 | 13 | 23 | 3,5 | 2 | 8 | **BSB00 RD07.016 Z02 M8** | 5116902 | ● | | | | |
| 16 | 13 | 23 | 3,5 | 3 | 8 | **BSB00 RD07.016 Z03 M8** | 5116904 | ● | | | | |
| 20 | 18 | 30 | 3,5 | 4 | 10 | **BSB00 RD07.020 Z04 M10** | 5116905 | ● | | | | |
| 25 | 21 | 35 | 3,5 | 5 | 12 | **BSB00 RD07.025 Z05 M12** | 5116906 | ● | | | | |
| 32 | 29 | 43 | 3,5 | 6 | 16 | **BSB00 RD07.032 Z06 M16** | 5116910 | ● | | | | |
| 35 | 29 | 43 | 3,5 | 6 | 16 | **BSB00 RD07.035 Z06 M16** | 5116911 | ● | | | | |
| 20 | 18 | 30 | 5 | 2 | 10 | **BSB00 RD10.020 Z02 M10** | 5110310 | ● | RD.. 10.. | **AP13-35072** 5118118 $M_A$= 3,5Nm | **IP15** 5088520 | - |
| 25 | 21 | 35 | 5 | 3 | 12 | **BSB00 RD10.025 Z03 M12** | 5116912 | ● | | | | |
| 35 | 29 | 43 | 5 | 4 | 16 | **BSB00 RD10.035 Z04 M16** | 5111523 | ● | | | | |
| 35 | 29 | 43 | 5 | 5 | 16 | **BSB00 RD10.035 Z05 M16** | 5111524 | ● | | | | |
| 40 | 29 | 43 | 5 | 5 | 16 | **BSB00 RD10.040 Z05 M16** | 5116915 | ● | | | | |
| 42 | 29 | 43 | 5 | 5 | 16 | **BSB00 RD10.042 Z05 M16** | 5116916 | ● | | | | |
| 42 | 29 | 43 | 5 | 6 | 16 | **BSB00 RD10.042 Z06 M16** | 5116917 | ● | | | | |
| 24 | 21 | 33 | 6 | 2 | 12 | **BSB00 RD12.024 Z02 M12** | 5151371 | ○ | RD.. 12.. | **AP13-35086** 5118120 $M_A$ = 3,5Nm | **IP15** 5088520 | Spann-schraub Clamping screw **RD12** 5125841 |
| 25 | 21 | 35 | 6 | 2 | 12 | **BSB00 RD12.025 Z02 M12** | 5116924 | ● | | | | |
| 35 | 29 | 43 | 6 | 3 | 16 | **BSB00 RD12.035 Z03 M16** | 5116926 | ● | | | | |
| 40 | 29 | 43 | 6 | 2 | 16 | **BSB00 RD12.040 Z04 M16** | 5108612 | ● | | | | |
| 42 | 29 | 43 | 6 | 4 | 16 | **BSB00 RD12.042 Z04 M16** | 5117020 | ● | | | | |
| 32 | 29 | 43 | 8 | 2 | 16 | **BSB00 RD16.032 Z02 M16** | 5146580 | ○ | RD.. 16 | **AP13-45105** 5118121 $M_A$ = 5Nm | **IP20** 5088521 | Spannsystem Clamping system: Klemmplatte Clamp **5125842** Spann-schraube Clamping screw **5118121** |
| 40 | 29 | 43 | 8 | 2 | 16 | **BSB00 RD16.040 Z02 M16** | 5116927 | ● | | | | |

Bestellbeispiel Order example: 1 Stück piece BSB00 RD05.015 Z04 M8 oder or 5116891

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

# ISO 00P

Wendeschneidplatten / Inserts

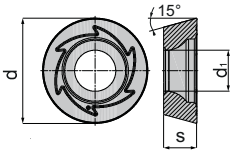
| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | |
|---|---|---|---|---|---|---|---|
| | | | | | d | s | $d_1$ |
|  <br> | **RDKT 12T3 MOS-MP** | BCP20M | 5117644 | ● | 12 | 3,97 | 3,9 |
| | **RDKT 12T3 MOS-MP** | BCP25M | 5117645 | ● | 12 | 3,97 | 3,9 |
| | **RDKT 12T3 MOS-MP** | BCP30M | 5117648 | ● | 12 | 3,97 | 3,9 |
| | **RDKT 12T3 MOS-MP** | BCP35M | 5117646 | ● | 12 | 3,97 | 3,9 |
| | **RDHT 12T3 MO-MM** | BCM35M | 5107513 | ● | 12 | 3,97 | 4,4 |
| | **RDHT 12T3 MO-MM** | BCM40M | 5107512 | ● | 12 | 3,97 | 4,4 |
| | **RDKT 12T3 MOS-MM** | BCM35M | 5117650 | ● | 12 | 3,97 | 3,9 |
| | **RDKT 12T3 MOS-MM** | BCM40M | 5117651 | ● | 12 | 3,97 | 3,9 |
| | | | | | | | |
| | **RDKT 1604 MOS-MP** | BCP20M | 5117666 | ● | 16 | 4,76 | 5,2 |
| | **RDKT 1604 MOS-MP** | BCP25M | 5117667 | ● | 16 | 4,76 | 5,2 |
| | **RDKT 1604 MOS-MP** | BCP30M | 5117668 | ● | 16 | 4,76 | 5,2 |
| | **RDKT 1604 MOS-MP** | BCP35M | 5117669 | ● | 16 | 4,76 | 5,2 |
| | **RDKT 1604 MOS-MM** | BCM35M | 5117670 | ● | 16 | 4,76 | 5,2 |
| | **RDKT 1604 MOS-MM** | BCM40M | 5117671 | ● | 16 | 4,76 | 5,2 |
| | | | | | | | |
|  <br> | **RDKW 0501 MOS-MP** | BCP20M | 5117486 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MP** | BCP25M | 5117495 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MM** | BCM35M | 5117482 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MM** | BCM40M | 5117483 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MK** | BCK15M | 5117479 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MK** | BCK20M | 5117481 | ● | 5 | 1,5 | 2,2 |
| | **RDHW 0501 MOS-FH** | BCH03M | 5117408 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MH** | BCH05M | 5117414 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-MH** | BCH10M | 5117477 | ● | 5 | 1,5 | 2,2 |
| | **RDKW 0501 MOS-RH** | BCH30M | 5117537 | ● | 5 | 1,5 | 2,2 |
| | | | | | | | |
| | **RDKW 0702 MOS-MP** | BCP20M | 5117535 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MP** | BCP25M | 5117529 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MP** | BCP30M | 5117509 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MP** | BCP35M | 5117510 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MM** | BCM35M | 5117538 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MM** | BCM40M | 5117539 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MK** | BCK15M | 5117504 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MK** | BCK20M | 5117507 | ● | 7 | 2,38 | 2,7 |
| | **RDHW 0702 MOS-FH** | BCH03M | 5117498 | ● | 7 | 2,38 | 2,7 |
| | **RDHW 0702 MOS-MH** | BCH05M | 5147192 | ● | 7 | 2,38 | 2,7 |
| | **RDHW 0702 MOS-MH** | BCH10M | 5147195 | ● | 7 | 2,38 | 2,7 |
| | **RDHW 0702 MOS-RH** | BCH30M | 5147198 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MH** | BCH05M | 5117501 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-MH** | BCH10M | 5117503 | ● | 7 | 2,38 | 2,7 |
| | **RDKW 0702 MOS-RH** | BCH30M | 5117622 | ● | 7 | 2,38 | 2,7 |
| | | | | | | | |

Bestellbeispiel Order example: 10 Stück pieces RDKT 12T3 MOS-MP BCP20M oder or 5117644

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

# ISO 00P

Wendeschneidplatten / Inserts

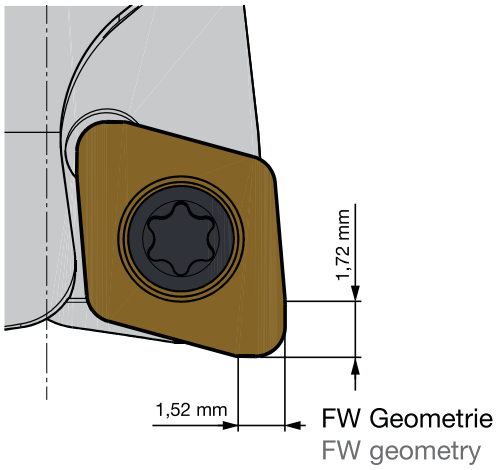
| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | |
|---|---|---|---|---|---|---|---|
| | | | | | d | s | $d_1$ |
|  <br> | **RDKW 1003 MOS-MP** | BCP20M | 5086933 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MP** | BCP25M | 5086932 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MP** | BCP30M | 5086935 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MP** | BCP35M | 5086934 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MM** | BCM35M | 5117626 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MM** | BCM40M | 5117628 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MK** | BCK15M | 5086814 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MK** | BCK20M | 5079553 | ● | 10 | 3,18 | 3,9 |
| | **RDHW 1003 MOS-FH** | BCH03M | 5117540 | ● | 10 | 3,18 | 3,9 |
| | **RDHW 1003 MOS-MH** | BCH05M | 5147200 | ● | 10 | 3,18 | 3,9 |
| | **RDHW 1003 MOS-MH** | BCH10M | 5147201 | ● | 10 | 3,18 | 3,9 |
| | **RDHW 1003 MOS-RH** | BCH30M | 5147202 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MH** | BCH05M | 5117541 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-MH** | BCH10M | 5117542 | ● | 10 | 3,18 | 3,9 |
| | **RDKW 1003 MOS-RH** | BCH30M | 5117630 | ● | 10 | 3,18 | 3,9 |
| | | | | | | | |
| | **RDKW 12T3 MOS-MP** | BCP20M | 5086939 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MP** | BCP25M | 5086938 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MP** | BCP30M | 5087036 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MP** | BCP35M | 5086940 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MK** | BCK15M | 5086937 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MK** | BCK20M | 5079554 | ● | 12 | 3,97 | 3,9 |
| | **RDHW 12T3 MOS-FH** | BCH03M | 5147203 | ● | 12 | 3,97 | 3,9 |
| | **RDHW 12T3 MOS-MH** | BCH05M | 5147204 | ● | 12 | 3,97 | 3,9 |
| | **RDHW 12T3 MOS-MH** | BCH10M | 5147205 | ● | 12 | 3,97 | 3,9 |
| | **RDHW 12T3 MOS-RH** | BCH30M | 5147207 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MH** | BCH05M | 5117633 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-MH** | BCH10M | 5117636 | ● | 12 | 3,97 | 3,9 |
| | **RDKW 12T3 MOS-RH** | BCH30M | 5117641 | ● | 12 | 3,97 | 3,9 |
| | | | | | | | |
| | **RDKW 1604 MOS-MP** | BCP20M | 5087042 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MP** | BCP25M | 5087040 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MP** | BCP30M | 5087050 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MP** | BCP35M | 5087044 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MK** | BCK15M | 5087039 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MK** | BCK20M | 5079555 | ● | 16 | 4,76 | 5,2 |
| | **RDHW 1604 MOS-FH** | BCH03M | 5147208 | ● | 16 | 4,76 | 5,2 |
| | **RDHW 1604 MOS-MH** | BCH05M | 5147209 | ● | 16 | 4,76 | 5,2 |
| | **RDHW 1604 MOS-MH** | BCH10M | 5147210 | ● | 16 | 4,76 | 5,2 |
| | **RDHW 1604 MOS-RH** | BCH30M | 5147211 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MH** | BCH05M | 5117662 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-MH** | BCH10M | 5117663 | ● | 16 | 4,76 | 5,2 |
| | **RDKW 1604 MOS-RH** | BCH30M | 5117665 | ● | 16 | 4,76 | 5,2 |
| | | | | | | | |

Bestellbeispiel Order example: 10 Stück pieces RDKW 1003 MOS-MP BCP20M oder or 5086933

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

# RHOMBIC*tec* 95P

Ø 16 - 42 mm Einschraubfräser
Ø 16 - 42 mm Screw on type
Plattengröße 06
Insert size 06



**Besondere Merkmale:**

- Universal einsatzbares Schlichtwerkzeug für alle gängigen Werkstoffe und Anwendungen
- Besonders verschleißfeste und exakt gefertigte Wendeschneidplatten
- Axiale & radiale Wiper Geometrie FW für höhere Produktivität (mehr $a_p$ & $f_z$ möglich)
- Vibrationsfreies Schlichten auch in großen Tiefen

**Special features:**

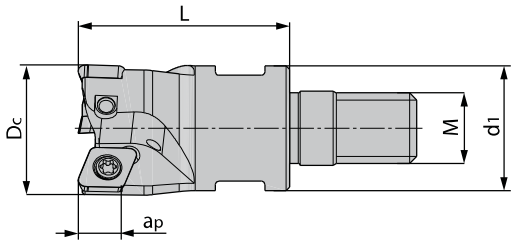
- Universal applicable finishing tool for all current materials and applications
- Especially wear resistant and exact produced inserts
- Axial & radial wiper geometry FW for high productivity (bigger $a_p$ & $f_z$ possible)
- Vibration free finishing, also with big depths

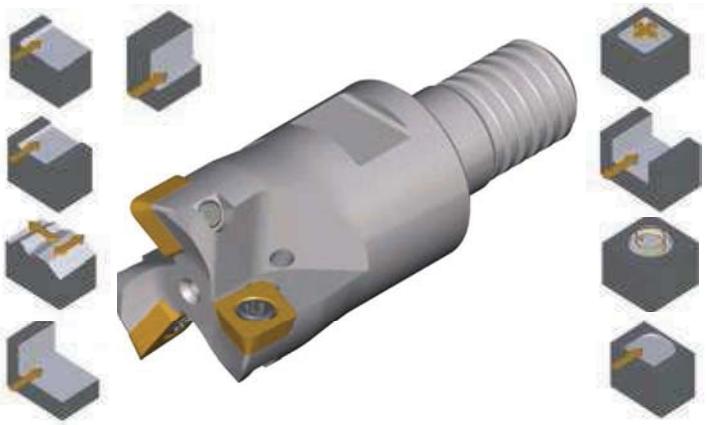
**CD.. 06..**

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max | Vorschub Feed [mm] $f_z$ |
|---|---|---|
| FH | 0,10 **0,25** 1,00 | 0,08 **0,22** 0,33 |
| FW | 0,12 **0,25** 1,80 | 0,10 **0,25** 0,40 |

Schnittgeschwindigkeiten siehe Seite 118-119
Cutting data recommendations page 118-119

**Einschraubfräser 95°**
**Screw on type 95°**

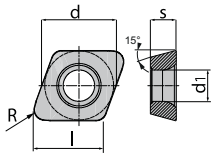
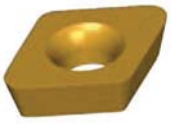


| Abmessungen [mm] Dimension in [mm] | | | | | | **Bestellbezeichnung** **Ordering code** | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | $d_1$ | L | $a_p$ | z | M | | | | | | |
| 16 | 12,7 | 23 | 6 | 2 | 8 | **BS95 CD06.016 Z02 M8** | 5117381 | ● | CDGX 06.. | **AP17-25056** 5150331 $M_A$ = 1,2Nm | **IP7** 5118123 |
| 16 | 15,5 | 23 | 6 | 2 | 10 | **BS95 CD06.016 Z02 M10** | 5117405 | ● | | | |
| 20 | 17,7 | 30 | 6 | 3 | 10 | **BS95 CD06.020 Z03 M10** | 5117383 | ● | | | |
| 25 | 20,7 | 35 | 6 | 3 | 12 | **BS95 CD06.025 Z03 M12** | 5117385 | ● | | | |
| 25 | 20,7 | 35 | 6 | 4 | 12 | **BS95 CD06.025 Z04 M12** | 5117386 | ● | | | |
| 35 | 28,7 | 43 | 6 | 5 | 16 | **BS95 CD06.035 Z05 M16** | 5131668 | ● | | | |
| 42 | 28,7 | 43 | 6 | 6 | 16 | **BS95 CD06.042 Z06 M16** | 5131669 | ● | | | |
| | | | | | | | | | | | |
| | | | | | | | | | | | |

Bestellbeispiel Order example: 1 Stück piece BS95 CD06.016 Z02 M8 oder or 5117381

## Wendeschneidplatten / Inserts

| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung** **Ordering code** | Schneidstoffsorte Cutting materials | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | Abmessungen [mm] Dimensions [mm] | | | | |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | l | d | s | $d_1$ | R |
|  | **CDGX 060210 SR-FH** | BCH03M | 5117602 | ● | 5,8 | 6,5 | 2,38 | 2,9 | 1 |
| | **CDGX 060210 SR-FH** | BCH10M | 5117603 | ● | 5,8 | 6,5 | 2,38 | 2,9 | 1 |
| | **CDGX 060210 SR-FH** | BCH23M | 5117604 | ● | 5,8 | 6,5 | 2,38 | 2,9 | 1 |
| | **CDGX 060210 SR-FH** | BCH30M | 5117605 | ● | 5,8 | 6,5 | 2,38 | 2,9 | 1 |
| | | | | | | | | | |
| | **CDGX 060210 SR-FW** | BCH03M | 5117606 | ● | 1,72 | 6,5 | 2,38 | 2,9 | 1 |
| | **CDGX 060210 SR-FW** | BCH10M | 5117608 | ● | 1,72 | 6,5 | 2,38 | 2,9 | 1 |
|  | | | | | | | | | |
| N = 2 | | | | | | | | | |

Bestellbeispiel Order example: 10 Stück pieces CDGX 060210 SR-FH BCH03M oder or 5117602

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

# BALL*tec* / TORRO*tec*

Multifunktional Multifunctional

Ø 8 - 25 mm Schaftfräser Stahlschaft
Ø 8 - 25 mm End milling cutter steel shank
Plattengröße 08 bis 25
Insert size 08 to 25

Ø 8 - 32 mm Schaftfräser Vollhartmetallschaft
Ø 8 - 32 mm End milling cutter solid Carbide Shank
Plattengröße 08 bis 32
Insert size 08 to 32

Ø 8 - 32 mm Einschraubfräser Stahlschaft
Ø 8 - 32 mm Screw on type steel shank
Plattengröße 08 bis 32
Insert size 08 to 32

**Besondere Merkmale:**

- Multifunktionales Werkzeugsystem für höchste Produktivität
- 1 Grundkörper für 2 Bearbeitungsverfahren = Multifunktional
- Einsparung von Trägerwerkzeugen durch multifunktionales Werkzeugsystem
- TORRO*tec*: Bei höchsten Anforderungen hinsichtlich Präzision und Prozessstabilität wird empfohlen TORRO*tec* WSP mit den neuen speziell designten Trägerwerkzeugen zu kombinieren (siehe Seite 57-58)
- Kugelkopierwerkzeuge für die Semifinish- und die Finishbearbeitung
- Variantenvielfalt bei Wendeplatten und Trägerwerkzeugen
- Schwingungsdämpfende, gelötete VHM Werkzeuge bei der Finishbearbeitung für hochqualitative Oberflächen
- Präzise Rotationstoleranzen
- Verwendung von Ultrafeinkorn-Hartmetallen für hohe Verschleißbeständigkeit bei gleichzeitig hoher Bruchbeständigkeit – für mehr Prozesssicherheit.
- Innere Kühlmittelzufuhr mit jeder Platten / Trägerwerkzeugkombination sichergestellt
- Hohe Plattenstärke für gute Stabilität und Vibrationsresistenz

**Special features:**

- Multifunctional tool system for highest productivity
- 1 basic body for 2 machining processes = multifunctional
- Saving of tool holders due to multifunctional tool system
- TORRO*tec*: for highest requirements concerning precision and process stability we recommend to combine TORRO*tec* inserts with the new special designed tools (see page 57-58)
- Ball nose copying tool for semi finishing and finishing
- Wide variety of inserts and tools
- Vibrations reducing, soldered solid carbide tools for finishing of high quality surfaces
- Specific rotation tolerances
- Application of ultrafine grain carbides for high wear resistance and at the same time high fracture resistance – for more process security
- Internal coolant supply wih each insert / cutter body guaranted
- Higher thickness on inserts for more stability and vibration resistance

### BE 08..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 08** | Vorschub Feed [mm] $f_z$ **BE 08** |
|---|---|---|
| MHN | 0,10 **0,15** 0,20 | 0,10 **0,15** 0,20 |
| MHN2 | 0,10 **0,15** 0,20 | 0,10 **0,15** 0,20 |
| SHN2 | 0,10 **0,12** 0,15 | 0,08 **0,12** 0,15 |

### BE 10..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 10** | Vorschub Feed [mm] $f_z$ **BE 10** |
|---|---|---|
| MHN | 0,12 **0,20** 0,24 | 0,15 **0,20** 0,25 |
| MHN2 | 0,12 **0,20** 0,24 | 0,15 **0,20** 0,25 |
| SHN2 | 0,10 **0,15** 0,20 | 0,10 **0,15** 0,20 |

### BE 12..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 12** | Vorschub Feed [mm] $f_z$ **BE 12** |
|---|---|---|
| FHF | 0,06 **0,12** 0,18 | 0,08 **0,14** 0,20 |
| MHF | 0,10 **0,15** 0,24 | 0,15 **0,22** 0,30 |
| SHF | 0,15 **0,25** 0,30 | 0,15 **0,25** 0,30 |
| FHN2 | 0,06 **0,12** 0,18 | 0,08 **0,14** 0,20 |
| MHN | 0,15 **0,30** 0,40 | 0,15 **0,25** 0,35 |
| MHN2 | 0,15 **0,30** 0,40 | 0,15 **0,25** 0,35 |
| SHN | 0,10 **0,16** 0,22 | 0,10 **0,16** 0,22 |
| SHN2 | 0,10 **0,16** 0,22 | 0,10 **0,16** 0,22 |

### BE 16..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 16** | Vorschub Feed [mm] $f_z$ **BE 16** |
|---|---|---|
| FHF | 0,08 **0,15** 0,22 | 0,12 **0,18** 0,24 |
| FHN2 | 0,08 **0,15** 0,22 | 0,12 **0,18** 0,24 |
| MHF | 0,13 **0,20** 0,32 | 0,18 **0,25** 0,30 |
| SHF | 0,20 **0,30** 0,35 | 0,20 **0,30** 0,35 |
| MHN | 0,20 **0,35** 0,45 | 0,20 **0,30** 0,35 |
| MHN2 | 0,20 **0,35** 0,45 | 0,20 **0,30** 0,35 |
| SHN | 0,12 **0,18** 0,24 | 0,14 **0,20** 0,26 |
| SHN2 | 0,12 **0,18** 0,24 | 0,14 **0,20** 0,26 |

### BE 20..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 20** | Vorschub Feed [mm] $f_z$ **BE 20** |
|---|---|---|
| FHF | 0,12 **0,20** 0,28 | 0,18 **0,24** 0,30 |
| MHF | 0,20 **0,25** 0,40 | 0,22 **0,30** 0,38 |
| SHF | 0,20 **0,35** 0,45 | 0,30 **0,40** 0,45 |
| FHN2 | 0,12 **0,20** 0,28 | 0,18 **0,24** 0,30 |
| MHN | 0,25 **0,40** 0,50 | 0,30 **0,40** 0,45 |
| MHN2 | 0,25 **0,40** 0,50 | 0,30 **0,40** 0,45 |
| SHN | 0,16 **0,24** 0,32 | 0,20 **0,28** 0,36 |
| SHN2 | 0,16 **0,24** 0,32 | 0,20 **0,28** 0,36 |

### BE 25..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 25** | Vorschub Feed [mm] $f_z$ **BE 25** |
|---|---|---|
| MHF | 0,25 **0,31** 0,50 | 0,22 **0,32** 0,42 |
| SHF | 0,25 **0,40** 0,50 | 0,30 **0,40** 0,45 |
| MHN | 0,30 **0,45** 0,55 | 0,30 **0,40** 0,45 |
| MHN2 | 0,30 **0,45** 0,55 | 0,30 **0,40** 0,45 |
| SHN2 | 0,22 **0,30** 0,38 | 0,20 **0,30** 0,40 |

### BE 32..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **BE 32** | Vorschub Feed [mm] $f_z$ **BE 32** |
|---|---|---|
| MHF | 0,32 **0,40** 0,64 | 0,25 **0,35** 0,45 |
| SHF | 0,30 **0,45** 0,55 | 0,40 **0,50** 0,55 |
| MHN | 0,35 **0,50** 0,60 | 0,40 **0,50** 0,55 |

Schnittgeschwindigkeiten siehe Seite 118-119
Cutting data recommendations page 118-119

### TE 08..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 08** | Vorschub Feed [mm] $f_z$ **TE 08** |
|---|---|---|
| SHF | 0,10 **0,20** * | 0,05 **0,15** 0,25 |
| MHN | 0,10 **0,25** * | 0,10 **0,20** 0,3 |

### TE 10..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 10** | Vorschub Feed [mm] $f_z$ **TE 10** |
|---|---|---|
| SHF | 0,10 **0,25** * | 0,08 **0,17** 0,25 |
| MHN | 0,10 **0,30** * | 0,10 **0,20** 0,30 |

### TE 12..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 12** | Vorschub Feed [mm] $f_z$ **TE 12** |
|---|---|---|
| SHF | 0,10 **0,30** * | 0,10 **0,20** 0,30 |
| MHN | 0,10 **0,30** * | 0,10 **0,20** 0,35 |

### TE 16..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 16** | Vorschub Feed [mm] $f_z$ **TE 16** |
|---|---|---|
| SHF | 0,15 **0,30** * | 0,10 **0,22** 0,35 |
| MHN | 0,15 **0,35** * | 0,10 **0,25** 0,40 |

### TE 20..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 20** | Vorschub Feed [mm] $f_z$ **TE 20** |
|---|---|---|
| SHF | 0,20 **0,35** * | 0,12 **0,26** 0,40 |
| MHN | 0,20 **0,40** * | 0,20 **0,27** 0,45 |

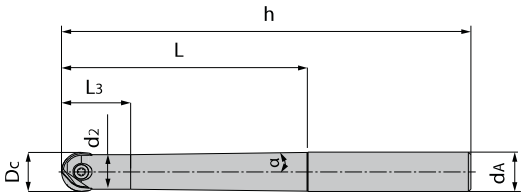
### TE 25..

| WSP Geometrie Insert geometry | Schnitttiefe Cutting depth [mm] $a_p$ max **TE 25** | Vorschub Feed [mm] $f_z$ **TE 25** |
|---|---|---|
| SHF | 0,20 **0,4** * | 0,20 **0,30** 0,45 |
| MHN | 0,20 **0,45** * | 0,20 **0,35** 0,50 |

* $a_p$ max. = Maß "l" ist aus der Tabelle auf Seite 117 zu entnehmen
* $a_p$ max. = please find dimension "l" on table page 117

Schnittgeschwindigkeiten siehe Seite 118-119
Cutting data recommendations page 118-119

**Schaftfräser konisch Form A**
**End milling cutter conical form A**

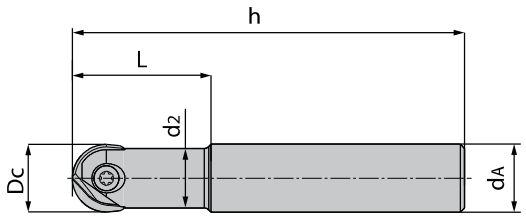


| Abmessungen [mm] Dimension [mm] | | | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d2 | h | α | L | L3 | z | | | | | | |
| 8 | 12 | 6,5 | 110 | 3°30' | 53 | 18,5 | 2 | **BEA00 BE08.008 Z02 110 NC** | 5117321 | ● | BE08.. TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | **IP7** 5118123 |
| 8 | 12 | 6,5 | 132 | 2° | 75 | 18,5 | 2 | **BEA00 BE08.008 Z02 132 NC** | 5117323 | ● | | | |
| 10 | 12 | 8 | 110 | 2°20' | 53 | 21 | 2 | **BEA00 BE10.010 Z02 110 NC** | 5117325 | ● | BE10.. TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | **IP8** 5088519 |
| 10 | 12 | 8 | 132 | 1°15' | 75 | 21 | 2 | **BEA00 BE10.010 Z02 132 NC** | 5117327 | ● | | | |
| 12 | 12 | 10 | 110 | 1°20' | 53 | 22 | 2 | **BEA00 BE12.012 Z02 110 NC** | 5117328 | ● | BE12.. TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | **IP10** 5118726 |
| 12 | 12 | 10 | 145 | 0°40' | 85 | 22 | 2 | **BEA00 BE12.012 Z02 145 NC** | 5117330 | ● | | | |
| 16 | 16 | 14 | 123 | 1°15' | 63 | 28 | 2 | **BEA00 BE16.016 Z02 123 NC** | 5117331 | ● | BE16.. TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | **IP15** 5088520 |
| 16 | 16 | 14 | 166 | 0°40' | 100 | 28 | 2 | **BEA00 BE16.016 Z02 166 NC** | 5117332 | ● | | | |
| 20 | 20 | 17 | 141 | 2° | 75 | 34 | 2 | **BEA00 BE20.020 Z02 141 NC** | 5117339 | ● | BE20.. TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | **IP20** 5088521 |
| 20 | 20 | 17 | 191 | 1° | 115 | 34 | 2 | **BEA00 BE20.020 Z02 191 NC** | 5117340 | ● | | | |
| 25 | 25 | 21 | 166 | 2° | 90 | 41 | 2 | **BEA00 BE25.025 Z02 166 NC** | 5117341 | ● | BE25.. TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | **IP25** 5118727 |
| 25 | 32 | 21 | 215 | 3° | 135 | 41 | 2 | **BEA00 BE25.025 Z02 215 NC** | 5117343 | ● | | | |

Bestellbeispiel Order example: 1 Stück piece BEA00 BE08.008.Z02 110 NC oder or 5117321
NC = Keine Kühlung / no coolant

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Schaftfräser zylindrisch Form B**
**End milling cutter cylindrical form B**

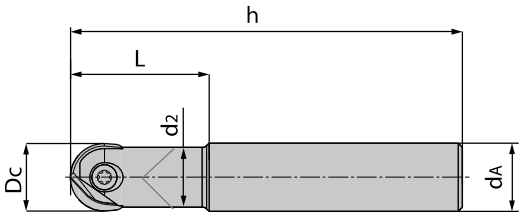


| Abmessungen [mm] Dimension [mm] | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d2 | h | L | z | | | | | | |
| 8 | 12 | 7 | 92 | 32 | 2 | **BEB00 BE08.008 Z02 092** | 5117302 | ● | BE08.. TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | **IP7** 5118123 |
| 10 | 12 | 9 | 92 | 32 | 2 | **BEB00 BE10.010 Z02 092** | 5117305 | ● | BE10.. TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | **IP8** 5088519 |
| 12 | 12 | 11 | 92 | 32 | 2 | **BEB00 BE12.012 Z02 092** | 5117310 | ● | BE12.. TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | **IP10** 5118726 |
| 12 | 12 | 11 | 145 | 45 | 2 | **BEB00 BE12.012 Z02 145 NC** | 5117311 | ● | | | |
| 16 | 16 | 14 | 92 | 32 | 2 | **BEB00 BE16.016 Z02 092** | 5117312 | ● | BE16.. TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | **IP15** 5088520 |
| 16 | 16 | 14 | 160 | 55 | 2 | **BEB00 BE16.016 Z02 160 NC** | 5117313 | ● | | | |
| 20 | 20 | 18 | 104 | 38 | 2 | **BEB00 BE20.020 Z02 104** | 5117315 | ● | BE20.. TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | **IP20** 5088521 |
| 20 | 20 | 18 | 190 | 65 | 2 | **BEB00 BE20.020 Z02 190 NC** | 5117317 | ● | | | |
| 25 | 25 | 21 | 121 | 45 | 2 | **BEB00 BE25.025 Z02 121** | 5117319 | ● | BE25.. TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | **IP25** 5118727 |
| 25 | 25 | 21 | 210 | 75 | 2 | **BEB00 BE25.025 Z02 210 NC** | 5117320 | ● | | | |

Bestellbeispiel Order example: 1 Stück piece BEB00 BE08.008 Z02 092 oder or 5117302
NC = Keine Kühlung / no coolant

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Schaftfräser zylindrisch Form B Vollhartmetall-Schaft**
**End milling cutter cylindrical form B solid carbide shank**

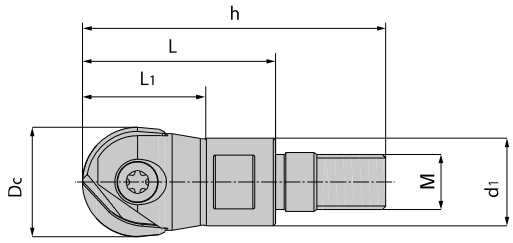


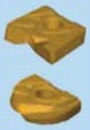
| Abmessungen [mm] Dimension [mm] | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | dA | d2 | h | L | z | | | | | | |
| 8 | 8 | 7 | 80 | 25 | 2 | **CEB00 BE08.008 Z02 80** | 5122820 | ● | BE08.. TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | **IP7** 5118123 |
| 8 | 8 | 7 | 100 | 25 | 2 | **CEB00 BE08.008 Z02 100** | 5122821 | ● | | | |
| 8 | 8 | 7 | 150 | 40 | 2 | **CEB00 BE08.008 Z02 150** | 5122822 | ○ | | | |
| 10 | 10 | 8,8 | 80 | 35 | 2 | **CEB00 BE10.010 Z02 80** | 5122823 | ○ | BE10.. TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | **IP8** 5088519 |
| 10 | 10 | 8,8 | 120 | 35 | 2 | **CEB00 BE10.010 Z02 120** | 5122826 | ● | | | |
| 10 | 10 | 8,8 | 150 | 50 | 2 | **CEB00 BE10.010 Z02 150** | 5122827 | ● | | | |
| 12 | 12 | 10,5 | 80 | 35 | 2 | **CEB00 BE12.012 Z02 80** | 5122828 | ● | BE12.. TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | **IP10** 5118726 |
| 12 | 12 | 10,5 | 120 | 35 | 2 | **CEB00 BE12.012 Z02 120** | 5122829 | ● | | | |
| 12 | 12 | 10,5 | 160 | 50 | 2 | **CEB00 BE12.012 Z02 160** | 5122830 | ● | | | |
| 16 | 16 | 14 | 100 | 40 | 2 | **CEB00 BE16.016 Z02 100** | 5122831 | ● | BE16.. TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | **IP15** 5088520 |
| 16 | 16 | 14 | 140 | 40 | 2 | **CEB00 BE16.016 Z02 140** | 5122832 | ● | | | |
| 16 | 16 | 14 | 140 | 55 | 2 | **CEB00 BE16.016 Z02 140 55** | 5136613 | ○ | | | |
| 16 | 16 | 14 | 175 | 55 | 2 | **CEB00 BE16.016 Z02 175** | 5122833 | ● | | | |
| 20 | 20 | 18 | 100 | 50 | 2 | **CEB00 BE20.020 Z02 100** | 5122834 | ○ | BE20.. TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | **IP20** 5088521 |
| 20 | 20 | 18 | 140 | 50 | 2 | **CEB00 BE20.020 Z02 140** | 5122835 | ● | | | |
| 20 | 20 | 18 | 190 | 75 | 2 | **CEB00 BE20.020 Z02 190** | 5122836 | ● | | | |
| 25 | 25 | 22,4 | 160 | 60 | 2 | **CEB00 BE25.025 Z02 160** | 5122837 | ○ | BE25.. TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | **IP25** 5118727 |
| 25 | 25 | 22,4 | 210 | 90 | 2 | **CEB00 BE25.025 Z02 210** | 5122838 | ● | | | |
| 32 | 32 | 28,6 | 190 | 65 | 2 | **CEB00 BE32.032 Z02 190** | 5122839 | ○ | BE32.. TE32.. | **AP12-80250** 5118709 $M_A$ = 20Nm | **IP40** 5118728 |
| 32 | 32 | 28,6 | 240 | 105 | 2 | **CEB00 BE32.032 Z02 240** | 5122840 | ○ | | | |

Bestellbeispiel Order example: 1 Stück piece CEB00 BE08.008 Z02 80 oder or 5122820

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Einschraubfräser**
**Screw on type**



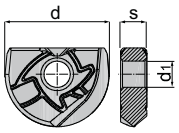
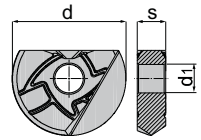
| Abmessungen [mm] Dimension [mm] | | | | | | | **Bestellbezeichnung** Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability |  | Ersatzteile Spare parts | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | d1 | h | L | L1 | M | z | | | | | | | |
| 8 | 7,7 | 36 | 23 | 23 | 4,5 | 2 | **BS00 BE08.008 Z02 077 M4.5** | 5136986 | ● | BE08.. TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | | **IP7** 5118123 |
| 8 | 9,7 | 36,5 | 23 | 16 | 6 | 2 | **BS00 BE08.008 Z02 M6** | 5117344 | ● | | | | |
| 10 | 9,7 | 36,5 | 23 | 23 | 6 | 2 | **BS00 BE10.010 Z02 M6** | 5117345 | ● | BE10.. TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | | **IP8** 5088519 |
| 12 | 9,7 | 36,5 | 23 | 23 | 6 | 2 | **BS00 BE12.012 Z02 M6** | 5117347 | ● | BE12.. TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | | **IP10** 5118726 |
| 12 | 12,7 | 44 | 28 | 19 | 8 | 2 | **BS00 BE12.012 Z02 M8** | 5117348 | ● | | | | |
| 16 | 12,7 | 44 | 28 | 28 | 8 | 2 | **BS00 BE16.016 Z02 M8** | 5117349 | ● | BE16.. TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | | **IP15** 5088520 |
| 16 | 15,4 | 46 | 28 | 28 | 10 | 2 | **BS00 BE16.016 Z02 M10** | 5117350 | ● | | | | |
| 20 | 17,7 | 46 | 28 | 28 | 10 | 2 | **BS00 BE20.020 Z02 M10** | 5117351 | ● | BE20.. TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | | **IP20** 5088521 |
| 25 | 20,7 | 55 | 35 | 35 | 12 | 2 | **BS00 BE25.025 Z02 M12** | 5117372 | ● | BE25.. TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | | **IP25** 5118727 |
| 32 | 28,7 | 65 | 43 | 35 | 16 | 2 | **BS00 BE32.032 Z02 M16** | 5117373 | ● | BE32.. TE32.. | **AP12-80250** 5118709 $M_A$ = 20Nm | | **IP40** 5118728 |

Bestellbeispiel Order example: 1 Stück piece BS00 BE08.008 Z02 077 M4.5 oder or 5136986

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

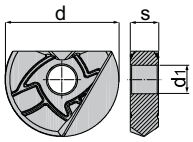
# BALL*tec*

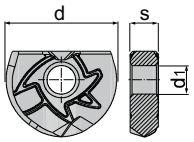
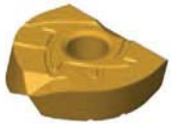
Wendeschneidplatten / Inserts

| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | |
|---|---|---|---|---|---|---|---|
| | | | | | d | s | $d_1$ |
|  <br> | **BE12-FHF** | BCH03M | 5117377 | ● | 12 | 2,99 | 3,5 |
| | **BE12-SHF** | BCH10M | 5117378 | ● | 12 | 2,99 | 3,5 |
| | **BE12-SHF** | BCH23M | 5117382 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHF** | BCH30M | 5117384 | ● | 12 | 2,99 | 3,5 |
| | | | | | | | |
| | **BE16-FHF** | BCH03M | 5117355 | ● | 16 | 3,99 | 4 |
| | **BE16-SHF** | BCH10M | 5117356 | ● | 16 | 3,99 | 4 |
| | **BE16-SHF** | BCH23M | 5117364 | ● | 16 | 3,99 | 4 |
| | **BE16-MHF** | BCH30M | 5117365 | ● | 16 | 3,99 | 4 |
| | | | | | | | |
| | **BE20-FHF** | BCH03M | 5117680 | ● | 20 | 4,99 | 5 |
| | **BE20-SHF** | BCH10M | 5117681 | ● | 20 | 4,99 | 5 |
| | **BE20-SHF** | BCH23M | 5117682 | ● | 20 | 4,99 | 5 |
| | **BE20-MHF** | BCH30M | 5117683 | ● | 20 | 4,99 | 5 |
| | | | | | | | |
| | **BE25-SHF** | BCH10M | 5117684 | ● | 25 | 5,99 | 6 |
| | **BE25-SHF** | BCH23M | 5117485 | ● | 25 | 5,99 | 6 |
| | **BE25-MHF** | BCH30M | 5117488 | ● | 25 | 5,99 | 6 |
| | | | | | | | |
| | **BE32-SHF** | BCH10M | 5117494 | ● | 32 | 6,99 | 8 |
| | **BE32-SHF** | BCH23M | 5117496 | ● | 32 | 6,99 | 8 |
| | **BE32-MHF** | BCH30M | 5117499 | ● | 32 | 6,99 | 8 |
| N = 2 | | | | | | | |
|  <br> | **BE08-MHN** | BCH10M | 5117502 | ● | 8 | 2,39 | 2,5 |
| | **BE08-MHN** | BCH23M | 5117505 | ● | 8 | 2,39 | 2,5 |
| | **BE08-MHN** | BCH30M | 5117506 | ● | 8 | 2,39 | 2,5 |
| | | | | | | | |
| | **BE10-MHN** | BCH10M | 5117511 | ● | 10 | 2,59 | 3 |
| | **BE10-MHN** | BCH23M | 5117513 | ● | 10 | 2,59 | 3 |
| | **BE10-MHN** | BCH30M | 5117514 | ● | 10 | 2,59 | 3 |
| | | | | | | | |
| | **BE12-SHN** | BCH03M | 5117388 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHN** | BCH10M | 5117389 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHN** | BCH23M | 5117390 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHN** | BCH30M | 5117391 | ● | 12 | 2,99 | 3,5 |
| | | | | | | | |
| | **BE16-SHN** | BCH03M | 5117366 | ● | 16 | 3,99 | 4 |
| | **BE16-MHN** | BCH10M | 5117367 | ● | 16 | 3,99 | 4 |
| | **BE16-MHN** | BCH23M | 5117368 | ● | 16 | 3,99 | 4 |
| | **BE16-MHN** | BCH30M | 5117369 | ● | 16 | 3,99 | 4 |
| | | | | | | | |
| | | | | | | | |
| N = 2 | | | | | | | |

Bestellbeispiel Order example: 10 Stück pieces BE12-FHF BCH03M oder or 5117377

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

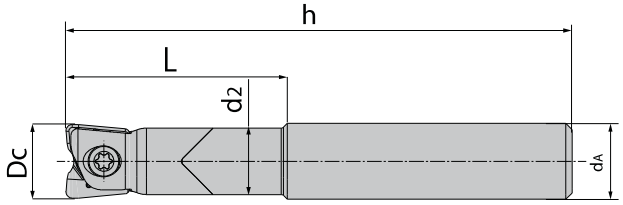
| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | |
|---|---|---|---|---|---|---|---|
| | | | | | d | s | $d_1$ |
|  | **BE20-SHN** | BCH03M | 5117519 | ● | 20 | 4,99 | 5 |
| | **BE20-MHN** | BCH10M | 5117520 | ● | 20 | 4,99 | 5 |
| | **BE20-MHN** | BCH23M | 5117522 | ● | 20 | 4,99 | 5 |
| | **BE20-MHN** | BCH30M | 5117524 | ● | 20 | 4,99 | 5 |
| | | | | | | | |
| | | | | | | | |
| | **BE25-MHN** | BCH10M | 5117526 | ● | 25 | 5,99 | 6 |
| | **BE25-MHN** | BCH23M | 5117527 | ● | 25 | 5,99 | 6 |
| | **BE25-MHN** | BCH30M | 5117528 | ● | 25 | 5,99 | 6 |
| | | | | | | | |
| | **BE32-MHN** | BCH10M | 5117530 | ● | 32 | 6,99 | 8 |
| | **BE32-MHN** | BCH23M | 5117532 | ● | 32 | 6,99 | 8 |
| | **BE32-MHN** | BCH30M | 5117533 | ● | 32 | 6,99 | 8 |
| N = 2 | | | | | | | |

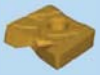
| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | |
|---|---|---|---|---|---|---|---|
| | | | | | d | s | $d_1$ |
|  | **BE08-MHN2** | BCH10M | 5133146 | ● | 8 | 2,39 | 2,5 |
| | **BE08-SHN2** | BCH23M | 5133147 | ● | 8 | 2,39 | 2,5 |
| | **BE08-MHN2** | BCH30M | 5133148 | ● | 8 | 2,39 | 2,5 |
| | | | | | | | |
| | **BE10-MHN2** | BCH10M | 5133149 | ● | 10 | 2,59 | 3 |
| | **BE10-SHN2** | BCH23M | 5133150 | ● | 10 | 2,59 | 3 |
| | **BE10-MHN2** | BCH30M | 5133151 | ● | 10 | 2,59 | 3 |
| | | | | | | | |
| | **BE12-FHN2** | BCH03M | 5131968 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHN2** | BCH10M | 5131970 | ● | 12 | 2,99 | 3,5 |
| | **BE12-SHN2** | BCH23M | 5131971 | ● | 12 | 2,99 | 3,5 |
| | **BE12-MHN2** | BCH30M | 5131973 | ● | 12 | 2,99 | 3,5 |
|  | | | | | | | |
| | **BE16-FHN2** | BCH03M | 5131969 | ● | 16 | 3,99 | 4 |
| | **BE16-MHN2** | BCH10M | 5131975 | ● | 16 | 3,99 | 4 |
| | **BE16-SHN2** | BCH23M | 5131976 | ● | 16 | 3,99 | 4 |
| | **BE16-MHN2** | BCH30M | 5131977 | ● | 16 | 3,99 | 4 |
| | | | | | | | |
| | **BE20-FHN2** | BCH03M | 5133145 | ● | 20 | 4,99 | 5 |
| | **BE20-MHN2** | BCH10M | 5133152 | ● | 20 | 4,99 | 5 |
| | **BE20-SHN2** | BCH23M | 5133153 | ● | 20 | 4,99 | 5 |
| | **BE20-MHN2** | BCH30M | 5133154 | ● | 20 | 4,99 | 5 |
| | | | | | | | |
| | **BE25-MHN2** | BCH10M | 5133155 | ● | 25 | 5,99 | 6 |
| | **BE25-SHN2** | BCH23M | 5133156 | ● | 25 | 5,99 | 6 |
| | **BE25-MHN2** | BCH30M | 5133157 | ● | 25 | 5,99 | 6 |
| | | | | | | | |
| | **BE32-MHN2** | BCH10M | 5144243 | ● | 32 | 6,99 | 8 |
| | **BE32-SHN2** | BCH23M | 5144244 | ● | 32 | 6,99 | 8 |
| | **BE32-MHN2** | BCH30M | 5144245 | ● | 32 | 6,99 | 8 |
| | | | | | | | |
| | | | | | | | |
| N = 2 | | | | | | | |

Bestellbeispiel Order example: 10 Stück pieces BE20-SHN BCH03M oder or 5117519

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Schaftfräser zylindrisch Form B Vollhartmetall-Schaft**
**End milling cutter cylindrical form B Solid carbide shank**



| Abmessungen [mm] Dimension [mm] | | | | | | Bestellbezeichnung Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability |  | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | | | | |  |
| Dc | dA | d2 | h | L | z | | | | | | |
| 8 | 8 | 7 | 80 | 25 | 2 | **CEB90 TE08.008 Z02 80** | 5149510 | ● | TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | **IP7** 5118123 |
| 8 | 8 | 7 | 100 | 25 | 2 | **CEB90 TE08.008 Z02 100** | 5149511 | ● | | | |
| 8 | 8 | 7 | 150 | 40 | 2 | **CEB90 TE08.008 Z02 150** | 5149512 | ○ | | | |
| 10 | 10 | 8,8 | 80 | 35 | 2 | **CEB90 TE10.010 Z02 80** | 5149528 | ○ | TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | **IP8** 5088519 |
| 10 | 10 | 8,8 | 120 | 35 | 2 | **CEB90 TE10.010 Z02 120** | 5149513 | ● | | | |
| 10 | 10 | 8,8 | 150 | 50 | 2 | **CEB90 TE10.010 Z02 150** | 5149514 | ● | | | |
| 12 | 12 | 10,5 | 80 | 35 | 2 | **CEB90 TE12.012 Z02 80** | 5149515 | ● | TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | **IP10** 5118726 |
| 12 | 12 | 10,5 | 120 | 35 | 2 | **CEB90 TE12.012 Z02 120** | 5149516 | ● | | | |
| 12 | 12 | 10,5 | 160 | 50 | 2 | **CEB90 TE12.012 Z02 160** | 5149517 | ● | | | |
| 16 | 16 | 14 | 100 | 40 | 2 | **CEB90 TE16.016 Z02 100** | 5149518 | ● | TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | **IP15** 5088520 |
| 16 | 16 | 14 | 140 | 40 | 2 | **CEB90 TE16.016 Z02 140** | 5149519 | ● | | | |
| 16 | 16 | 14 | 140 | 55 | 2 | **CEB90 TE16.016 Z02 140 55** | 5149529 | ○ | | | |
| 16 | 16 | 14 | 175 | 55 | 2 | **CEB90 TE16.016 Z02 175** | 5149520 | ● | | | |
| 20 | 20 | 18 | 100 | 50 | 2 | **CEB90 TE20.020 Z02 100** | 5149521 | ○ | TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | **IP20** 5088521 |
| 20 | 20 | 18 | 140 | 50 | 2 | **CEB90 TE20.020 Z02 140** | 5149522 | ● | | | |
| 20 | 20 | 18 | 190 | 75 | 2 | **CEB90 TE20.020 Z02 190** | 5149523 | ● | | | |
| 25 | 25 | 22,4 | 160 | 60 | 2 | **CEB90 TE25.025 Z02 160** | 5149524 | ○ | TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | **IP25** 5118727 |
| 25 | 25 | 22,4 | 210 | 90 | 2 | **CEB90 TE25.025 Z02 210** | 5149525 | ● | | | |

**Bezeichnung Wendeschneidplatte BALL*tec* / TORRO*tec***
**Description Insert BALL*tec* / TORRO*tec***

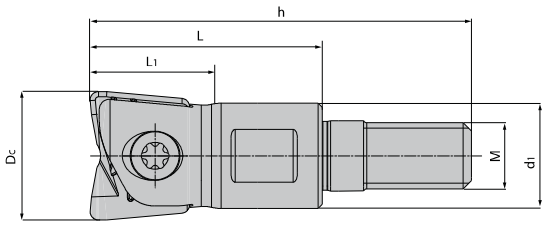
**FHF** = **F**inishing **H**ard **F**ine
**MHF** = **M**edium **H**ard **F**ine
**SHF** = **S**emifinishing **H**ard Fine

**FHN2** = **F**inishing **H**ard **N**eutral 2
**MHN** = **M**edium **H**ard **N**eutral
**MHN2** = **M**edium **H**ard **N**eutral 2
**SHN** = **S**emifinishing **H**ard **N**eutral
**SHN2** = **S**emifinishing **H**ard **N**eutral 2

Bestellbeispiel Order example: 1 Stück piece CEB90 TE08.008 Z02 80 oder or 5149510

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

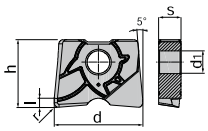
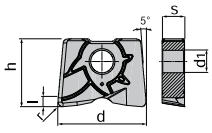
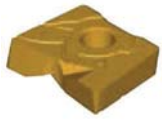
**Einschraubfräser**
**Screw on type**



| Abmessungen [mm] Dimension [mm] | | | | | | | **Bestellbezeichnung** Ordering code | Ident.-Nr. Ident.-No. | Verfügbarkeit Availability | | Ersatzteile Spare parts | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Dc | d1 | h | L | L1 | M | z | | | | | | |
| 8 | 7,7 | 36 | 23 | 23 | 4,5 | 2 | **BS90 TE08.008 Z02 077 M4.5** | 5149530 | ● | TE08.. | **AP12-25063** 5118702 $M_A$ = 1,4Nm | **IP7** 5118123 |
| 8 | 9,7 | 36,5 | 23 | 16 | 6 | 2 | **BS90 TE08.008 Z02 M6** | 5136370 | ○ | | | |
| 10 | 9,7 | 36,5 | 23 | 23 | 6 | 2 | **BS90 TE10.010 Z02 M6** | 5136372 | ● | TE10.. | **AP12-30077** 5118703 $M_A$ = 2,5Nm | **IP8** 5088519 |
| 12 | 9,7 | 36,5 | 23 | 23 | 6 | 2 | **BS90 TE12.012 Z02 M6** | 5136376 | ● | TE12.. | **AP12-35095** 5118704 $M_A$ = 3,5Nm | **IP10** 5118726 |
| 12 | 12,7 | 44,0 | 28 | 19 | 8 | 2 | **BS90 TE12.012 Z02 M8** | 5136377 | ● | | | |
| 16 | 12,7 | 44,0 | 28 | 28 | 8 | 2 | **BS90 TE16.016 Z02 M8** | 5136379 | ● | TE16.. | **AP12-40133** 5118705 $M_A$ = 5Nm | **IP15** 5088520 |
| 16 | 15,4 | 46,0 | 28 | 28 | 10 | 2 | **BS90 TE16.016 Z02 M10** | 5136513 | ● | | | |
| 20 | 17,7 | 46,0 | 28 | 28 | 10 | 2 | **BS90 TE20.020 Z02 M10** | 5136382 | ● | TE20.. | **AP12-50162** 5118706 $M_A$ = 7Nm | **IP20** 5088521 |
| 25 | 20,7 | 55,0 | 35 | 35 | 12 | 2 | **BS90 TE25.025 Z02 M12** | 5136384 | ● | TE25.. | **AP12-60200** 5118707 $M_A$ = 8Nm | **IP25** 5118727 |

Bestellbeispiel Order example: 1 Stück piece BS90 TE08.008 Z02 077 M4.5 oder or 5149530

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

| N = Anzahl der Schneidkanten<br>N = Number of cutting edges | **Bestellbezeichnung**<br>**Ordering code** | Schneidstoffsorte<br>Cutting materials | Ident.-Nr.<br>Ident.-No. | Verfügbarkeit<br>Availability | Abmessungen [mm]<br>Dimensions [mm] | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | | | | h | l | d | s | $d_1$ | r |
|  N = 2 | **TE 0810-SHF** | BCH10M | 5136374 | ● | 7 | 2 | 8 | 2,4 | 2,5 | 1 |
| | **TE 1005-SHF** | BCH10M | 5143786 | ● | 8,5 | 2 | 10 | 2,6 | 3 | 0,5 |
| | **TE 1010-SHF** | BCH10M | 5136385 | ● | 8,5 | 2 | 10 | 2,6 | 3 | 1 |
| | **TE 1015-SHF** | BCH10M | 5143787 | ○ | 8,5 | 2 | 10 | 2,6 | 3 | 1,5 |
| | **TE 1205-SHF** | BCH10M | 5143790 | ● | 10 | 2 | 12 | 3 | 3,5 | 0,5 |
| | **TE 1210-SHF** | BCH10M | 5136390 | ● | 10 | 2 | 12 | 3 | 3,5 | 1 |
| | **TE 1215-SHF** | BCH10M | 5143791 | ○ | 10 | 2 | 12 | 3 | 3,5 | 1,5 |
| | **TE 1220-SHF** | BCH10M | 5136391 | ● | 10 | 3 | 12 | 3 | 3,5 | 2 |
| | **TE 1605-SHF** | BCH10M | 5143793 | ○ | 12 | 2 | 16 | 4 | 4 | 0,5 |
| | **TE 1610-SHF** | BCH10M | 5136396 | ● | 12 | 2 | 16 | 4 | 4 | 1 |
| | **TE 1615-SHF** | BCH10M | 5143794 | ○ | 12 | 2 | 16 | 4 | 4 | 1,5 |
| | **TE 1630-SHF** | BCH10M | 5136397 | ● | 12 | 4 | 15 | 4 | 4 | 3 |
| | **TE 2010-SHF** | BCH10M | 5136402 | ● | 15 | 2 | 20 | 5 | 5 | 1 |
| | **TE 2040-SHF** | BCH10M | 5136403 | ○ | 15 | 5 | 20 | 5 | 5 | 4 |
| | **TE 2510-SHF** | BCH10M | 5136413 | ● | 18,5 | 2 | 25 | 6 | 6 | 1 |
| | **TE 2550-SHF** | BCH10M | 5136414 | ○ | 18,5 | 6 | 25 | 6 | 6 | 5 |
|   N = 2 | **TE 0805-MHN** | BCH10M | 5152007 | ○ | 7 | 1,5 | 8 | 2,4 | 2,5 | 0,5 |
| | **TE 0806-MHN** | BCH10M | 5136378 | ● | 7 | 1,6 | 8 | 2,4 | 2,5 | 0,6 |
| | **TE 0810-MHN** | BCH10M | 5136381 | ● | 7 | 2 | 8 | 2,4 | 2,5 | 1 |
| | **TE 0820-MHN** | BCH10M | 5152010 | ○ | 7 | 3 | 8 | 2,4 | 2,5 | 2,0 |
| | **TE 1005-MHN** | BCH10M | 5136386 | ● | 8,5 | 1,5 | 10 | 2,6 | 3 | 0,5 |
| | **TE 1008-MHN** | BCH10M | 5136387 | ● | 8,5 | 1,8 | 10 | 2,6 | 3 | 0,8 |
| | **TE 1010-MHN** | BCH10M | 5136388 | ● | 8,5 | 2 | 10 | 2,6 | 3 | 1 |
| | **TE 1015-MHN** | BCH10M | 5143789 | ○ | 8,5 | 2 | 10 | 2,6 | 3 | 1,5 |
| | **TE 1205-MHN** | BCH10M | 5136392 | ● | 10 | 1,5 | 12 | 3 | 3,5 | 0,5 |
| | **TE 1210-MHN** | BCH10M | 5136393 | ● | 10 | 2 | 12 | 3 | 3,5 | 1 |
| | **TE 1215-MHN** | BCH10M | 5143792 | ○ | 10 | 2 | 12 | 3 | 3,5 | 1,5 |
| | **TE 1220-MHN** | BCH10M | 5136394 | ● | 10 | 3 | 12 | 3 | 3,5 | 2 |
| | **TE 1605-MHN** | BCH10M | 5143795 | ○ | 12 | 2 | 16 | 4 | 4 | 0,5 |
| | **TE 1610-MHN** | BCH10M | 5136399 | ● | 12 | 2 | 16 | 4 | 4 | 1 |
| | **TE 1615-MHN** | BCH10M | 5143796 | ○ | 12 | 2 | 16 | 4 | 4 | 1,5 |
| | **TE 1630-MHN** | BCH10M | 5136400 | ● | 12 | 4 | 16 | 4 | 4 | 3 |
| | **TE 2010-MHN** | BCH10M | 5136404 | ● | 15 | 2 | 20 | 5 | 5 | 1 |
| | **TE 2040-MHN** | BCH10M | 5136409 | ● | 15 | 5 | 20 | 5 | 5 | 4 |
| | **TE 2510-MHN** | BCH10M | 5136415 | ● | 18,5 | 2 | 25 | 6 | 6 | 1 |
| | **TE 2550-MHN** | BCH10M | 5136417 | ● | 18,5 | 6 | 25 | 6 | 6 | 5 |

Bestellbeispiel Order example: 10 Stück pieces TE 0810-SHF BCH10M oder or 5136374

● Verfügbar ab Lager Available from stock
○ Auf Anfrage On request

**Bezeichnung Wendeschneidplatte TORRO*tec***
**Description insert TORRO*tec***

**SHF = S**emifinishing **H**ard Fine
**MHN = M**edium **H**ard **N**eutral