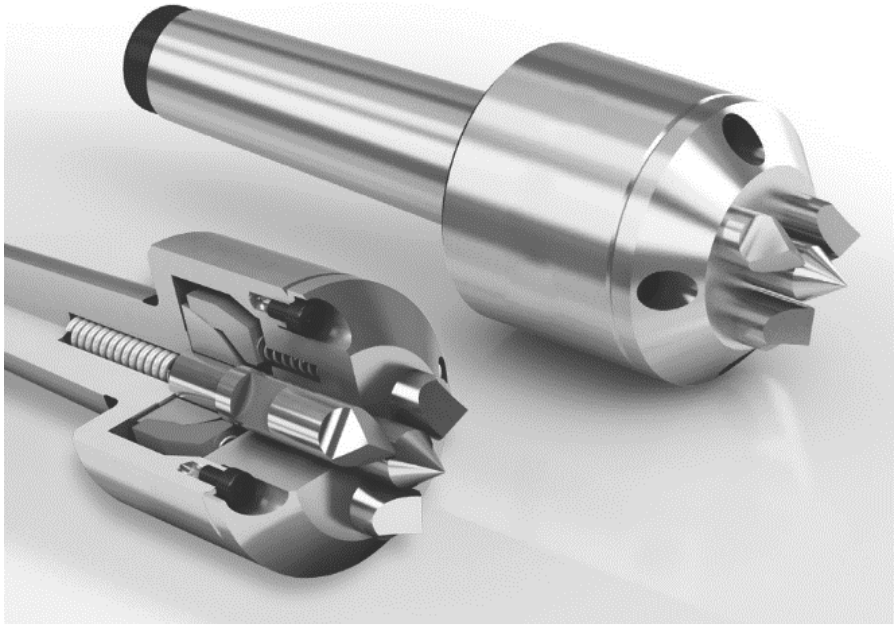
OPERATING MANUAL
Mechanical face driver



C o n t e n t s

1. Use and maintenance

1. INSTALLATION: Before mounting the face driver in its holder, make sure that the mounting parts are clean and carefully clean the taper coupling.

2. FIRST USE: After securing the driver, place the workpiece in its base. Make sure that the driver tip enters the central opening of the workpiece correctly. Apply the recommended load to the counter tip (see table on page 5).
   The tip of the driver allows the driver pins to penetrate the workpiece when the machine is retracted. Before starting machining, make sure that the workpiece is correctly clamped.

3. Each time the face driver is removed for a longer period of non-use, it must be carefully cleaned with a cloth, oiled and stored in its original container.

4. ATTENTION: If you notice unusual noises or excessive heat coming from the face driver or tip, turn the machine off immediately and consult a qualified technician.

2. Instructions for use

1. Replacement of the tip

   Loosen and remove the 4 screws of the support head (Fig. 1) and carefully pull the tip out of its seat (Fig. 2). Clean the parts, insert the new tip, lubricate and reassemble everything by carefully tightening the screws.

Fig./Abb. 1

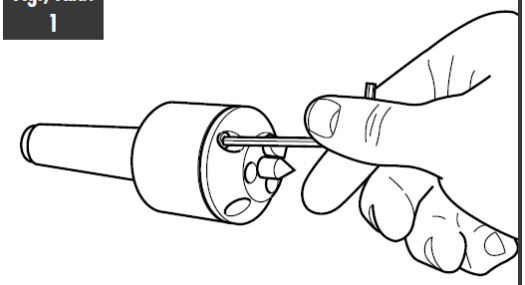
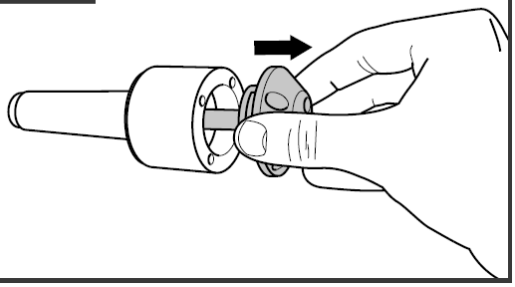


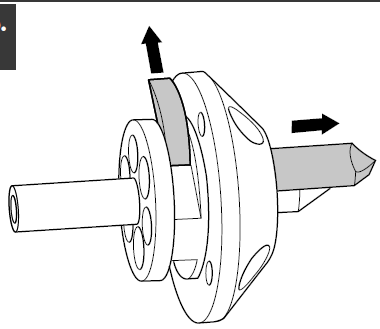
Fig./Abb. 2



2. Replacing the driving pins

Loosen and remove the 4 screws of the support head (Fig. 1), remove the safety wedges and carefully pull the driving pins out of their seats (Fig. 3). Clean the parts, insert the new driving pins, lubricate and reassemble everything by carefully tightening the screws.

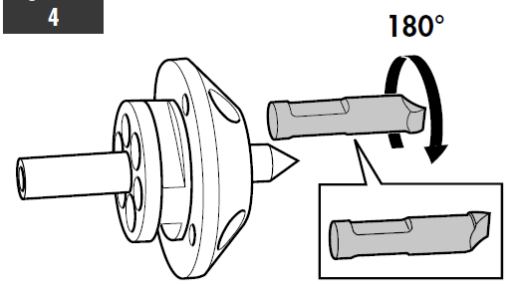
Fig./Abb. 3



3. Increase the pulling radius

First proceed as for the replacement of the driving pins (Fig. 1 / 3). However, in the assembly phase, turn the driving pins 180° into their seat to insert them (Fig. 4).

Fig./Abb. 4

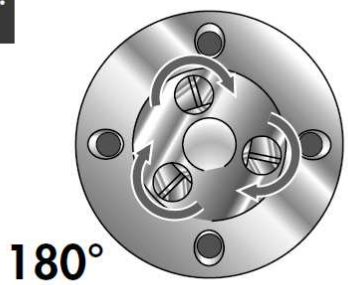


4. ATTENTION:

The use of the directional pulling bolt is recommended for particularly severe interventions.

- The driver is supplied as standard with bolts rotating in both directions (type S1).
- If these bolts are rotated 180°, the max. rotatable ø increases by up to 20 % (Fig. 5).

Fig./Abb. 5



3. Technical data

1. General data

A = Avanzamento mm. per giro
Feed, mm per revolution
Vorschub in mm. je Drehung
Avancement en mm par tour

B = Profondità di passata
Depth of cut
Schnittiefe
Profondeur de coupe

C = ø max. di tornitura
max. turning diameter
Höchstdrehdurchmesser
Diamètre maxi à tourner

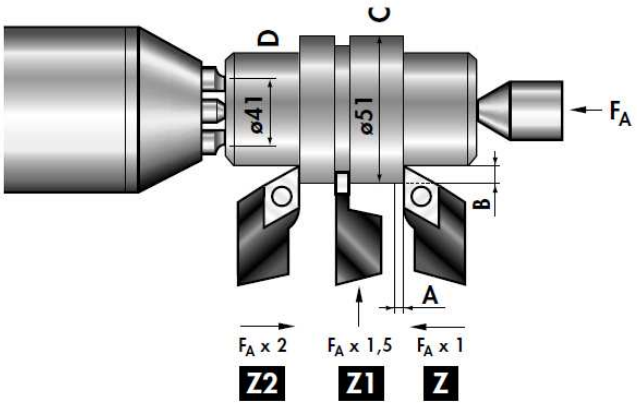
D = ø di trascinamento
clamping diameter
Spannkreisdurchmesser
Diamètre d'entraînement

Esempio
Example
Beispiel
Exemple:

B x A = Sezione di truciolo
Cutting capacity
Spanquerschnitt
Section de coupure

RESISTENZA MATERIALE
MATERIAL STRENGTH
WERKSTÜCKFESTIGKEIT
RESISTANCE MATERIAU
daN/mm²

C : D = Rapporto di trascinamento
Clamping ratio
Spannverhältnis
Rapport d'entraînement



▶ **Esempio:**

Z Tornitura opposta al mandrino
1. Capacità di taglio **B** x **A**: 6 x 0,4 = 2,4 mm²
2. Resistenza materiale: = 63 daN/mm²
3. Rapporto di trascinamento **C** : **D** 51 : 41 = 1,24
4. Forza assiale contropunta (vedi grafico): F_A = 450 daN

** Fattore di conversione per:
Z1 Esecuzione radiale gole F_A x 1,5
Z2 Tornitura opposta alla contropunta F_A x 2

▶ **Example:**

Z Turning against the headstock
1. Cutting capacity **B** x **A**: 6 x 0,4 = 2,4 mm²
2. Workpiece strength: = 63 daN/mm²
3. Clamping ratio **C** : **D** 51 : 41 = 1,24
4. Tailstock loading (from graph): F_A = 450 daN

** Conversion factor for:
Z1 Radial recessing F_A x 1,5
Z2 Turning against tailstock F_A x 2

▶ **Beispiel:**

Z Drehen gegen den Spindelstock
1. Spanquerschnitt **B** x **A**: 6 x 0,4 = 2,4 mm²
2. Werkstückfestigkeit: = 63 daN/mm²
3. Spannverhältnis **C** : **D** 51 : 41 = 1,24
4. Reitstockkraft (nach Schaubild): F_A = 450 daN

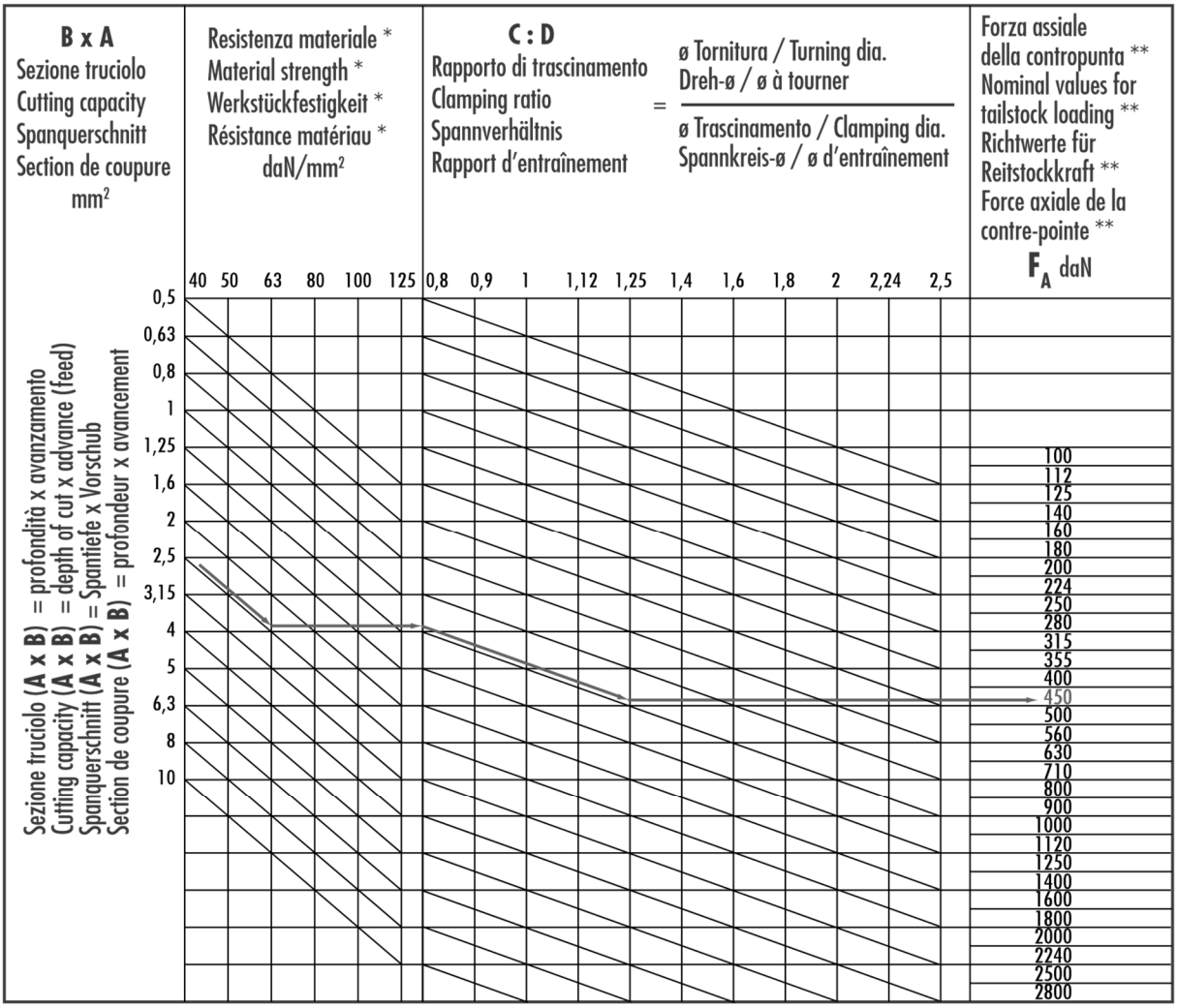
** Umrechnungsfaktor beim:
Z1 Radialeinstechen F_A x 1,5
Z2 Drehen gegen den Reitstock F_A x 2

▶ **Exemple:**

Z Tournage contre le mandrin
1. Capacité de coupe **B** x **A**: 6 x 0,4 = 2,4 mm²
2. Résistance matériau: = 63 daN/mm²
3. Rapport d'entraînement **C** : **D** 51 : 41 = 1,24
4. Force axiale contre-pointe (voir graphique): F_A = 450 daN

** Facteur de conversion pour:
Z1 Gorges frontales F_A x 1,5
Z2 Tournage contre la contre-pointe F_A x 2

2. Axial load for the face drivers



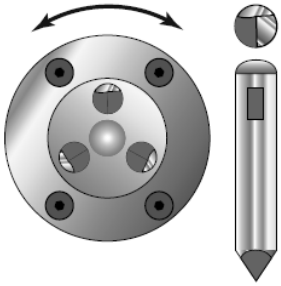
——— Esempio - Example - Beispiel - Exemple

*) RESISTENZA MATERIALE - MATERIAL STRENGTH - WERKSTÜCKFESTIGKEIT - RÉSISTANCE MATÉRIAU:

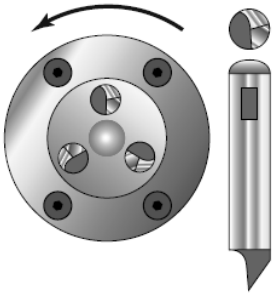
DaN/mm²	40	50	63	80	100	125
Materiale Material Werkstoff Matériau	St 34-37	St 42	St 50	St 60-70	20MnCr5	18CrNi8
	9-15S20	C 10	C 15-22	C 35-45	C 60	30CrMoV9
	GG 14-35	GG 40	22S20	16MnCr5	15CrNi6	55CrMo4
	GGG-38	GGG-42	GGG-50	GGG-60	GGG-80	105WCr6

3. Driving pins

Type S1
Rotation in both directions



Type S2
Counter clockwise rotation



Type S3
Clockwise rotation