

A452 Series Cutting Data

2 Flute 45° Helix Carbide Slot Drill Cutting Data



STÄRKE



A452 SERIES													
VDI Material Group		Type of cut		Size (mm)									
				3.0	4.0	5.0	6.0	8.0	10.0	12.0	16.0	20.0	
N	21- 25	Slotting	v_c (m/min)	95	125	155	190	200	250	300	300	250	
			n	10000	10000	10000	10000	8000	8000	8000	6000	4000	
			f_z	0.035	0.045	0.05	0.06	0.088	0.106	0.131	0.158	0.2	
			f (mm/min)	700	900	1000	1200	1400	1700	2100	1900	1600	
		Side cutting	v_c (m/min)	95	125	155	190	200	250	300	300	250	
			n	10000	10000	10000	10000	8000	8000	8000	6000	4000	
			f_z	0.035	0.045	0.05	0.06	0.088	0.106	0.131	0.158	0.2	
			f (mm/min)	700	900	1000	1200	1400	1700	2100	1900	1600	

Slotting

0.5 x DC

DC

Side Cutting

1.0 x DC

a_e

$a_e : \text{ø}3.0\text{mm} - \text{ø}10.0\text{mm} = 0.25 \times \text{DC}$
 $a_e : \text{ø}12.0\text{mm} - \text{ø}20.0\text{mm} = 0.15 \times \text{DC}$

Recommended cutting depths are **maximum** depths, and **speeds and feeds are a starting point** based on these depths.

All recommendations are based on ideal machining conditions. Adjustments may need to be made according to your set-up.

For long series and long necked tools it may be necessary to reduce feed rate by up to 50%.

v_c - cutting speed (m/min)
 n - RPM (rev/min)
 f_z - feed per tooth (mm)
 f - feed rate (mm/min)
 a_p - axial depth of cut
 a_e - radial depth of cut