

**Garant**
**Semi-roughing end mill, uncoated, Ø k10 DC: 12mm**

**Order data**

Order number	191640 12
GTIN	4045197104342
Item class	11W

**Description**
**Version:**
**Universal end mill with relief ground semi-roughing profile.**

Centre cutting teeth for plunging.

**Eccentric relief ground.**

Universal cutting edge geometry.

**Technical description**

Feed $f_z$ for slot milling in steel < 750 N/mm <sup>2</sup>	0.05 mm
Cutting edge Ø $D_c$	12 mm
Corner chamfer width at 45°	0.5 mm
No. of teeth Z	3
Shank Ø $D_s$	12 mm
Overall length L	83 mm
Flute length $L_c$	26 mm
Direction of infeed	horizontal, oblique and vertical
Shank	DIN 1835 B to h6
Tolerance nominal Ø	k10
Helix angle	25 degrees
Corner chamfer angle	45 degrees
Coating	uncoated

Tool material	HSS Co 8
Standard	DIN 844 B
Milling profile	NF
Through-coolant	no
Colour ring	without
Type of product	End / face mill

### User data

	Suitability	V <sub>c</sub>	ISO code
Aluminium (short chipping)	suitable only under restricted conditions	83 m/min	N
Steel < 500 N/mm <sup>2</sup>	suitable	30 m/min	P
Steel < 750 N/mm <sup>2</sup>	suitable	25 m/min	P
Steel < 900 N/mm <sup>2</sup>	suitable only under restricted conditions	25 m/min	P
CuZn	suitable only under restricted conditions	55 m/min	N
Uni	suitable		
wet maximum	suitable		