

Garant
GARANT Master Steel solid carbide finishing cutter HPC, TiAlN, Ø f8 DC: 12mm

Order data

Order number	204014 12
GTIN	4045197886729
Item class	11X

Description
Version:

For **finishing operations**.

Special geometry for optimum chip evacuation.

Unequal spacing gives high **intrinsic stability and smooth cutting action**.

For **profile milling as a finishing operation**.

Suitable for machining titanium and titanium alloys.

Note:

$$a_{e\max} = 0.1 \times D$$

Can be reground from Ø $D_c = 6$ mm.

Technical description

Feed f_z for side milling in steel < 900 N/mm ²	0.1 mm
Overall length L	93 mm
Cutting edge Ø D_c	12 mm
Balance quality with shank	G 2.5 with HA
Flute length L_c	36 mm
Shank Ø D_s	12 mm
Corner chamfer width at 45°	0.12 mm
Shank	DIN 6535 HA to h6
Tolerance nominal Ø	f8

Direction of infeed	horizontal
No. of teeth Z	7
Helix angle	45 degrees
Corner chamfer angle	45 degrees
Series	Master Steel
Coating	TiAlN
Tool material	Solid carbide
Standard	Manufacturer's standard
Type	N
Spacing of the cutters	unequal spacing
Cutting width a_e for milling operation	$0.1 \times D$ for side milling
Through-coolant	no
Machining strategy	HPC
Colour ring	green
Type of product	End / face mill

User data

	Suitability	V_c	ISO code
Steel < 500 N/mm ²	suitable	360 m/min	P
Steel < 750 N/mm ²	suitable	340 m/min	P
Steel < 900 N/mm ²	suitable	300 m/min	P
Steel < 1100 N/mm ²	suitable	290 m/min	P
Steel < 1400 N/mm ²	suitable	200 m/min	P
INOX < 900 N/mm ²	suitable	130 m/min	M
INOX > 900 N/mm ²	suitable	120 m/min	M
Ti > 850 N/mm ²	suitable only under restricted conditions	100 m/min	S
GG(G)	suitable	300 m/min	K

wet maximum	suitable only under restricted conditions
wet minimum	suitable only under restricted conditions
dry	suitable only under restricted conditions
Air	suitable
Services	
Shank grinding Type HB	129100 HB