

**Garant**
**GARANT Master Alu solid carbide milling cutter HPC, DLC, Ø h6 DC: 16mm**

**Order data**

Order number	203205 16
GTIN	4062406120016
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.

**Note:**

Order the **uncoated version** using **No. 203209**.

**Technical description**

Overhang length $L_1$ incl. recess	88 mm
Balance quality with shank	G 2.5 with HA
No. of teeth Z	5
Tolerance nominal $\varnothing$	h6
Overall length L	134 mm
Cutting edge $\varnothing D_c$	16 mm
Recess $\varnothing D_1$	15.5 mm
Shank $\varnothing D_s$	16 mm
Flute length $L_c$	80 mm
Direction of infeed	horizontal
Shank	DIN 6535 HA to h6

Feed $f_z$ for side milling in short-chipping aluminium	0.06 mm
Helix angle	38 degrees
Corner chamfer angle	90 degrees
Series	Master Alu
Coating	DLC
Tool material	Solid carbide
Standard	Manufacturer's standard
Type	W
Spacing of the cutters	unequal spacing
Cutting width $a_e$ for milling operation	$0.05 \times D$ for side milling
Through-coolant	no
Machining strategy	HPC
Colour ring	yellow
Type of product	End / face mill

## User data

	Suitability	$V_c$	ISO code
Aluminium	Suitable	500 m/min	N
Aluminium (short chipping)	suitable	450 m/min	N
Alu > 10% Si	suitable	400 m/min	N
PMMA acrylic	Suitable	180 m/min	N
PE-HD	Suitable	140 m/min	N
PA 66	Suitable	180 m/min	N
PEEK	Suitable	130 m/min	N
PF 31	Suitable	110 m/min	N
PVDF GF20	Suitable	160 m/min	N
POM GF25	Suitable	140 m/min	N
PA 66 GF30	Suitable	140 m/min	N

PEEK GF30	Suitable	120 m/min	N
PTFE CF25	Suitable	140 m/min	N
Honeycomb sandwich	suitable only under restricted conditions	260 m/min	N
Cu	Suitable	140 m/min	N
CuZn	suitable	120 m/min	N
wet maximum	suitable		
wet minimum	suitable only under restricted conditions		
dry	suitable		
Air	suitable		

### Services

Shank grinding Type HB

129100 HB