

**Garant**
**Solid carbide milling cutter with chip separators TPC, TiAlN, Ø f8 DC: 4mm**

**Order data**

Order number	203019 4
GTIN	4045197778895
Item class	11X

**Description**
**Version:**

High-performance mills for machining stainless steels, **especially designed for TPC applications**. Strengthened core.

**Note:**

$h_{max}$ : The values stated in the table are maximum values.

$a_{e,max} = 0.08 \times D$  for TPC machining.

**NEW GENERATION AVAILABLE!**

**Recommended successor product is No. 203103**

**Technical description**

Shank Ø $D_s$	6 mm
Cutting edge Ø $D_c$	4 mm
Average chip thickness $h_{max}$ for TPC milling in INOX < 900 N/mm <sup>2</sup>	0.025 mm
Corner chamfer width at 45°	0.08 mm
No. of teeth Z	5
Shank	DIN 6535 HB to h6
Recess Ø $D_1$	3.9 mm
Balance quality with shank	G 2.5 with HB
Overhang length $L_1$ incl. recess	23 mm
Tolerance nominal Ø	f8

Direction of infeed	horizontal and oblique
Overall length L	62 mm
Average chip thickness $h_{\max}$ for TPC milling in INOX > 900 N/mm <sup>2</sup>	0.02 mm
Flute length $L_c$	16 mm
Helix angle	45 degrees
Corner chamfer angle	45 degrees
Coating	TiAlN
Tool material	Solid carbide
Standard	Manufacturer's standard
Type	N
Helix angle characteristic	unequal spacing
Spacing of the cutters	unequal spacing
Cutting width $a_e$ for milling operation	0.08×D
Through-coolant	no
Machining strategy	TPC
Colour ring	blue
Type of product	End / face mill

## User data

	Suitability	$V_c$	ISO code
Steel < 500 N/mm <sup>2</sup>	suitable	380 m/min	P
Steel < 750 N/mm <sup>2</sup>	suitable	340 m/min	P
Steel < 900 N/mm <sup>2</sup>	suitable	300 m/min	P
Steel < 1100 N/mm <sup>2</sup>	suitable	230 m/min	P
INOX < 900 N/mm <sup>2</sup>	suitable	240 m/min	M
INOX > 900 N/mm <sup>2</sup>	suitable	170 m/min	M
wet maximum	Suitable		

wet minimum	Suitable only under restricted conditions
Air	suitable