

**Garant**
**GARANT Master INOX solid carbide milling cutter HPC, TiAlN, Ø h10 DC: 6mm**

**Order data**

|              |               |
|--------------|---------------|
| Order number | 202389 6      |
| GTIN         | 4045197875310 |
| Item class   | 11X           |

**Description**
**Version:**
**For roughing and finishing**

HPC milling cutters with **newly developed high-performance coating** for **outstanding service life** and **optimum metal removal rates** in a wide range of stainless steels.

**Greater oxidation resistance** and **high-temperature hardness**.

Can be used at **high cutting speeds**, particularly suitable even for TOOLOX®.

**Technical description**

|   |                                  |
|---|----------------------------------|
| Shank   | DIN 6535 HB to h6                |
| Feed $f_z$ for slot milling in stainless steel $> 900 \text{ N/mm}^2$ | 0.04 mm                          |
| No. of teeth Z  | 3                                |
| Overhang length $L_1$ incl. recess                                    | 24 mm                            |
| Corner chamfer width at $45^\circ$                                    | 0.1 mm                           |
| Overall length L  | 62 mm                            |
| Recess $\varnothing D_1$  | 5.9 mm                           |
| Flute length $L_c$  | 18 mm                            |
| Cutting edge $\varnothing D_c$  | 6 mm                             |
| Tolerance nominal $\varnothing$                                       | h10                              |
| Shank $\varnothing D_s$   | 6 mm                             |
| Direction of infeed   | horizontal, oblique and vertical |

|   |                             |
|---|-----------------------------|
| Feed $f_z$ for side milling in INOX > 900 N/mm <sup>2</sup> | 0.048 mm                    |
| Helix angle   | 40 degrees                  |
| Corner chamfer angle  | 45 degrees                  |
| Series  | Master INOX                 |
| 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                   | Full slot cutting depth 1×D |
| Cutting width $a_e$ for milling operation                   | 0.3×D for side milling      |
| Through-coolant   | no                          |
| Machining strategy  | HPC                         |
| Colour ring   | blue                        |
| Type of product   | End / face mill             |

## User data

|                                | Suitability                               | $V_c$     | ISO code |
|--------------------------------|---|-----------|----------|
| Steel < 500 N/mm <sup>2</sup>  | suitable                                  | 240 m/min | P        |
| Steel < 750 N/mm <sup>2</sup>  | suitable                                  | 220 m/min | P        |
| Steel < 900 N/mm <sup>2</sup>  | suitable                                  | 180 m/min | P        |
| Steel < 1100 N/mm <sup>2</sup> | suitable                                  | 150 m/min | P        |
| Steel < 1400 N/mm <sup>2</sup> | suitable only under restricted conditions | 150 m/min | P        |
| TOOLOX 33                      | suitable                                  | 115 m/min | H        |
| TOOLOX 44                      | suitable                                  | 80 m/min  | H        |
| INOX < 900 N/mm <sup>2</sup>   | suitable                                  | 100 m/min | M        |
| INOX > 900 N/mm <sup>2</sup>   | suitable                                  | 85 m/min  | M        |

|             |   |
|-------------|---|
| Uni         | suitable only under restricted conditions |
| wet maximum | suitable                                  |
| wet minimum | suitable                                  |
| dry         | suitable only under restricted conditions |
| Air         | suitable                                  |