

**Garant**
**Single tooth thread mill 3×D, TiAlN, M: M6**

**Order data**

Order number	139615 M6
GTIN	4045197585851
Item class	11J

**Description**
**Version:**

**Corrected thread profile** for milling **exact internal threads**, (ensure stable clamping conditions). Very sturdy **single-tooth** thread mills, **highly suitable especially for GRP, CRP and graphite**. Also suitable for **Ti-based and Ni-based alloys** and **hardened steels up to 58 HRC**.

**Advantage:**

**Significantly less radial pressure than with multi-tooth thread mills.**

**Note:**

Single-tooth thread mill **exclusively** for **milling internal threads**. **The tapping hole (and where necessary the countersinking) has to be prepared beforehand!**

**Because of the tooth profile only the thread nominal  $\varnothing$  (= size) with the corresponding thread pitch (see table) may be generated.**

Through-coolant: no

No. of teeth Z: 4

Thread pitch: 1 mm

Nominal  $\varnothing D_c$ : 4.8 mm

Shank length  $L_s$ : 36 mm

Overhang  $L_1$ : 18 mm

Overall length L: 59 mm

Shank  $\varnothing D_s$ : 6 mm

**Technical description**

maximum insertion depth $L_c$	18 mm
Thread pitch	1 mm
Number of clamping slots	4

No. of teeth Z	4
Feed $f_z$ in steel < 1400 N/mm <sup>2</sup>	0.035 mm
Shank $\varnothing D_s$	6 mm
Overall length L	59 mm
Feed $f_z$ in CRP	0.06 mm
Shank length $L_s$	36 mm
Through-coolant	no
Thread depth	18 mm
Thread size	M6
Nominal $\varnothing D_c$	4.8 mm
Overhang $L_1$	18 mm
Coating	TiAlN
Thread type	M
Thread type	M-LH
Flank angle	60°
Tool material	Solid carbide
Thread standard	DIN 13
Shank	DIN 6535 HA with h6
Application for type of drilling	up to 3×D for blind holes
Application for type of drilling	up to 3×D for through holes
Shank tolerance	h6
Colour ring	green
Internal/external application	Internal
Type of product	thread milling cutter

## User data

	Suitability	$V_c$	ISO code
Alu plastics	suitable	300 m/min	N

Aluminium (short chipping)	suitable	300 m/min	N
Alu > 10% Si	suitable	200 m/min	N
Steel < 500 N/mm <sup>2</sup>	suitable	200 m/min	P
Steel < 750 N/mm <sup>2</sup>	suitable	150 m/min	P
Steel < 900 N/mm <sup>2</sup>	suitable	120 m/min	P
Steel < 1100 N/mm <sup>2</sup>	suitable	80 m/min	P
Steel < 1400 N/mm <sup>2</sup>	suitable	60 m/min	P
Steel < 55 HRC	suitable	50 m/min	H
Steel < 60 HRC	suitable only under restricted conditions	30 m/min	H
INOX < 900 N/mm <sup>2</sup>	suitable	80 m/min	M
INOX > 900 N/mm <sup>2</sup>	suitable	60 m/min	M
Ti > 850 N/mm <sup>2</sup>	suitable	50 m/min	S
GRP	suitable	100 m/min	N
CRP	suitable	100 m/min	N
Graphite	suitable	150 m/min	N
Uni	suitable		
wet maximum	suitable		
wet minimum	suitable		
dry	suitable		
Air	suitable		