

## Garant

### GARANT Master Steel solid carbide high-performance reamer HPC blind hole, TiAlN, Nominal $\varnothing$ DC: 11mm



#### Order data

Order number	164425 11
GTIN	4062406284510
Item class	10P

#### Description

##### Version:

The latest generation of **universal** HPC reamers. Extra-short teeth for increased cutting performance values. Optimised cooling strategy with radially arranged coolant outlets aligned directly to the teeth. **For uncompromising applications in steel and stainless steel.** Reliable machining of high-tensile steels **up to 60 HRC. Version suitable for NC** with straight shank  $\varnothing$  for standard arbors especially in **hydraulic chucks** or **high precision collet chucks**.

Very high concentricity and process reliability due to unequal spacing.

##### Tolerance specifications:

**Configurable:** Reamers finish ground to match your specification.

**H7:** Version for H7 bore tolerance.

**0/0.005 mm:** Manufacturing or cutting tolerance of nominal  $\varnothing$  D<sub>c</sub>.

##### Application:

Special version for blind holes.

#### Technical description

Feed f in steel < 1100 N/mm <sup>2</sup>	1.4 mm/rev.
Nominal $\varnothing$ D <sub>c</sub>	11 mm
Number of cutting edges Z	6
Flute length L <sub>c</sub>	12 mm
$\varnothing$ range	10.701 - 11.2 mm
Overall length L	120 mm

Series	Master Steel
Shank $\varnothing D_s$	12 mm
Tolerance	Configurable
Overhang $L_1$	75 mm
Feed $f$ in stainless steel $< 900 \text{ N/mm}^2$	0.4 mm/rev.
Reaming oversize in diameter	0.2 mm
Coating	TiAlN
Tool material	Solid carbide
Standard	Manufacturer's standard
Through-coolant	yes, with 25 bar
Shank	DIN 6535 HA with h6
Machining strategy	HPC
Application for type of drilling	for blind holes
Colour ring	green
Type of product	Phillips bit

## User data

	Suitability	$V_c$	ISO code
Steel $< 500 \text{ N/mm}^2$	suitable only under restricted conditions	180 m/min	P
Steel $< 750 \text{ N/mm}^2$	suitable	180 m/min	P
Steel $< 900 \text{ N/mm}^2$	suitable	180 m/min	P
Steel $< 1100 \text{ N/mm}^2$	suitable	150 m/min	P
Steel $< 1400 \text{ N/mm}^2$	Suitable	100 m/min	P
Steel $< 55 \text{ HRC}$	Suitable	12 m/min	H
Steel $< 60 \text{ HRC}$	Suitable only under restricted conditions	8 m/min	H
INOX $< 900 \text{ N/mm}^2$	suitable	50 m/min	M
INOX $> 900 \text{ N/mm}^2$	suitable	30 m/min	M

GG	suitable	110 m/min	K
GGG	suitable	90 m/min	K
Uni	suitable		
wet maximum	suitable		
wet minimum	suitable		