

Garant**GARANT Uni Hero solid carbide drill plain shank DIN 6535 HA, TiAlSiN, Ø DC h7: 16mm****Order data**

Order number	123020 16
GTIN	4069515013505
Item class	13M

Description**Version:**

The ultimate in universality and profitability in one tool. **Robust tool design** and **convex-concave curved cutting edge design** for optimum tool stability and chip breakage behaviour in a wide range of materials. **Special flute geometry** and **polished flutes** for ideal chip evacuation and maximum process reliability. **Ultra-smooth TiAlSiN high-performance coating** to effectively reduce wear and the formation of built-up edges.

Note:

Flute length $L_c = L_2 + 1.5 \times D_c$.

HB and HE shanks are available at the same price as HA.

For **HB shanks**: use order **no. 123021**.

HE shank: order with **No. 123020** and **129100HE**.

Items with prices in brackets: Differing delivery time and minimum order quantity 3 pieces.

Technical description

Shank Ø D_s	16 mm
Flute length L_c	152 mm
Number of cutting edges Z	2
Standard	Works standard
Tolerance nominal Ø	h7
Overall length L	203 mm
recommended maximum drilling depth L_2	128 mm
Nominal Ø D_c	16 mm

Data sheet

Feed f in steel < 1100 N/mm ²	0.24 mm/rev.
Series	Uni
Coating	TiAlSiN
Tool material	Solid carbide
Version	8×D
Point angle	140 degrees
Shank	DIN 6535 HA to h6
Through-coolant	yes, with 25 bar
Machining strategy	HPC
Semi-Standard	yes
Colour ring	orange
Type of product	Mono jobber drills

User data

	Suitability	V _c	ISO code
Alu plastics	suitable only under restricted conditions	140 m/min	N
Aluminium (short chipping)	suitable	150 m/min	N
Steel < 500 N/mm ²	suitable	120 m/min	P
Steel < 750 N/mm ²	suitable	115 m/min	P
Steel < 900 N/mm ²	suitable	110 m/min	P
Steel < 1100 N/mm ²	suitable	80 m/min	P
Steel < 1400 N/mm ²	suitable	70 m/min	P
INOX < 900 N/mm ²	suitable	65 m/min	M
INOX > 900 N/mm ²	suitable	60 m/min	M
Ti > 850 N/mm ²	suitable	35 m/min	S
GG(G)	suitable	95 m/min	K
Uni	suitable		

wet maximum	suitable
wet minimum	suitable
Air	suitable only under restricted conditions

Suitable products

<https://www.hoffmann-group.com/GB/en/hom/p/123020-16>