



Bore Clamp

Eccentric version, for bore diameter 9.3-12.3 mm,
3 different clamping inserts, double acting, max. operating pressure 250 bar



Advantages

- Axial clamping in simple bore holes
- Eccentric arrangement of the clamping insert
- Small dimensions at the effective point
- 3 different clamping inserts ("fixed, floating, sword") are possible
- Oil supply optionally by pipe threads or drilled channels
- Connection for positive air pressure protection
- Optional pneumatic seat check
- Optional prolongation of the clamping insert

Application

The patented bore clamp is particularly suitable for clamping in workpieces with bore holes in the support surface ranging from 9.3 to 12.3 mm in diameter. Due to the small dimensions at the effective point and the compact design clamping of workpieces with raised parts right next to the bore to be clamped is possible. An adaptation to different clamping heights is optionally possible by prolongation of the clamping insert.

Technical characteristics

Clamping range \varnothing	[mm]	9.3-12.3
Min. clamping diameter (special version)	[mm]	6.7
Radial compensation stroke (for version "sword" and "floating")	[mm]	$\pm 0,25$
Expansion force of the clamping ring at 250 bar	[kN]	approx. 14
Axial retention force at 250 bar (dependent on the design of the clamping ring and the material of the workpiece)	[kN]	approx. 0.8 to 1.3

Description

The hydraulic bore clamp is a double-acting pull-type cylinder of modular design. The piston operates via a mechanical redirection a clamping insert. Due to the modular design the clamp can be equipped with three different clamping inserts.

1. Clamping insert with centring (version "fixed")
2. Clamping insert - compensation 1 axial direction (version "floating")
3. Clamping insert without centring (version "sword")

Thereby fixed positioning and floating clamping of the workpieces is possible. Force transmission is made by a clamping ring expanded through a cone in the clamping insert.

To avoid penetration of swarf into the clamping insert, air sealing can be connected. A pneumatic seat check is optionally possible.

Application example

Clamping fixture for machining of cast covers from several sides

