



# INTERNAL AND UNIVERSAL GRINDING MACHINE

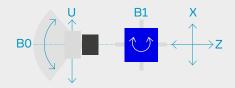




#### ILD CONFIGURATION

 $B1 \qquad X \\ \longrightarrow Z$ 

## ILD-U CONFIGURATION



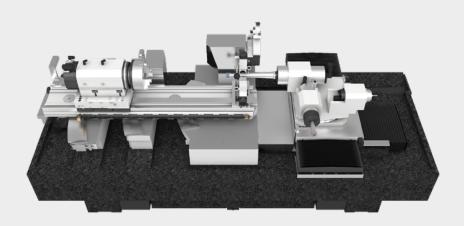
## **DESCRIPTION**

ILD internal universal grinding machines provide highprecision machining for internal, external and face grinding of large workpieces.

Depending on the requirements, the machines can be equipped with up to four grinding spindles and a measuring probe. Spindle housings, shafts, tool holders, roller bearings, hydraulic components, aerospace components or machine-tool components can be machined with the ILD series using the latest technology.

## **ILD. INTERNAL AND UNIVERSAL GRINDING MACHINE**

ILD RANGE	ILD-400	ILD-600	ILD-700	ILD-700 U
Max. internal grinding diameter	420 mm	420 mm	500 mm	450 mm
Max. internal grinding length	400 mm	400 mm	400 mm	400 mm
Max. external grinding length	150 mm	150 mm	400 mm	400 mm
Max. workpiece swing diameter	600 mm	600 mm	700 mm	760 mm
Max. workpiece length incl. clamping system	800 mm	1300 mm	500 mm	500 mm
Max. workpiece weight incl. clamping system	500/500 kg/Nm	500/500 kg/Nm	500/500 kg/Nm	500/500 kg/Nm
B0-axis swivelling angle	+20°/-10°	+20°/-10°	+25°/-25° +90°/-15°	+25°/-25° +90°/-15°
X and Z axis stroke	450/550 mm	450/550 mm	700/700 mm	420/700 U700 mm



## **CORE TECHNOLOGY**

# Natural granite machine bed

- Machine bed made of natural granite, the optimal material for achieving the highest accuracy and the best surface quality.
- Natural granite offers considerable advantages over cast iron or polymer composites in terms of precision for many grinding applications.

#### Linear motors

- Linear motors ensure highly dynamic transmission of power. This means, for example, that precise results can be obtained in non-round grinding.
- Fast, precise movements assure the highest productivity and quality.
- No wear parts, maintenance-free.
- High precision through active cooling.

### Workheads

- Danobat-Overbeck design, built in house components for highest precision and a long life.
- Modular designs for best application.
- Selected materials and designs for stable temperature performance.
- Easy integration of clamping cylinders.

#### Grinding spindles

- Top quality spindles.
- High-precision bearings with oil-air lubrication or constant lifetime grease lubrication.
- Selected materials for stable temperature performance, driven by a built-in motor.
- Cutting speeds automatically controlled with frequency drives.
- Independent temperature control and efficient liquidcooling system.