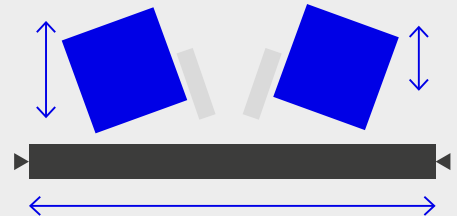
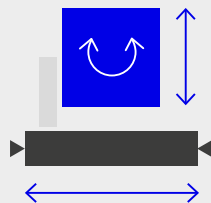


# UNIVERSAL HEAVY DUTY GRINDING WITH MOVING TABLE HG



## DESCRIPTION

These cylindrical grinding machines have been designed to fulfil the requirements of a wide range of applications from 78.74 in up to 196.85 in in length.

The most demanding industries can benefit from tailor-made configurations for turbine shafts, large transmissions, axles for rail units and landing gear components, among other examples.

Complex processes with in-process measuring, special dressing systems and custom enhancements have been developed accordingly. The structure of independent axes is ideal for a single or double wheelhead, to optimise versatility with sequential grinding operations.

# HG. UNIVERSAL HEAVY DUTY GRINDING WITH MOVING TABLE

## HG RANGE

		HG-72	HG-92
Max. distance between centers	mm	4000	5000
	in	157.48	196.85
Max. diameter to be ground	mm	840	1040
	in	33.07	40.94
Max. weight between centers	kg	1500	5000
	lb	3300	11020
Max. grinding wheel diameter	mm	915	1060
	in	36.02	41.73
Max. wheelhead power	kw	45	45
	hp	60.34	60.34
Max. wheel peripheral speed	m/s	60/100	60/100
	sfpm	11810/19680	11810/19680

## CORE TECHNOLOGY

### Machine structure

- Made of stress-relieved pearlitic cast iron.
- Optimized with finite element calculation.
- Stability and rigidity required for optimum grinding accuracy.
- Coolant channels especially designed to guarantee maximum thermal stability.

### X and Z axes

- Axes architecture design through the center of gravity for eliminating vibration.
- Moving slides with ground and hand-scraped V and flat slideways, including antifriction coating to avoid thermal expansion and stick slip effects.
- Driven by a ballscrew with direct coupling to CNC servomotor.
- High resolution linear scale to control the positioning.

### Swivelling B-axis

- Automatic wide range swivelling.
- Torque motor driven for zero backlash and lower maintenance.

- High resolution rotary scale to control perfect angular positioning.
- Continuous positioning with mechanical locking and pneumatic unlocking system.
- Repeatability on 26 in radius  $\pm 0.039$  mil.

### Workheads & tailstock

- Modular designs for best application adaptability.
- Selected materials and designs for stable temperature performance.
- Compressed air lifting systems for comfortable set ups.

### Grinding spindles

- First-class quality spindles customized for application.
- High-precision bearings with lifetime constant grease lubrication.
- Selected materials for stable temperature performance, driven by built-in motor.
- Cutting speeds automatically controlled with frequency drives.
- Independent temperature control and efficient liquid-cooling system.

## VERSATILITY

