

LGS10A

HIGH PRECISION Air Bearing Spindle



HIGH PRECISION Air Bearing Spindle

Your best partner for the next generation of machine tools



www.airbearings.co.uk

Air Bearings Limited

1 Witney Road, Nuffield Industrial Estate, Poole, Dorset. BH17 0GH
Tel: +44 (0) 1202 680 805 Fax: +44 (0) 1202 680 809
Email: sales@airbearings.co.uk



Air Bearings Limited Via Mechanics Group

LGS10A

HIGH PRECISION Air Bearing Spindle

LGS10A		Spindle Model	LGS10A
		Speed Range	0-12,000 (40,000) RPM
	Asynchronous 4 pole motor	Motor Power	550 W
		Air Pressure	5.5 - 6.5 kgf/cm²
		Air Flow Rate	70 - 80 NI/min
	Rear Mount Service Ports	Coolant	Water
		Coolant Flow	0.5 - 1.0 l/min
	Low Axial Thermal Growth	Coolant Inlet Temp	15 - 19 ℃
		Radial Load Capacity	450 N
		Radial Stiffness	30 N/μm
	Adjustable Collet Grip	Radial & Axial Error Motion	Sync <50 nm Async <50 nm
	Interchangeable Collet	Axial Load Capacity	450 N
		Axial Stiffness	40 N/ μm
		Collet Clamping Torque	Adjustable
	Automatic Tool Change	Run Out (Dynamic)	<1 μm
	(pneumatic actuation)	Mass	8.8 kg
		Collet Size (⊘)	3/8", 1/2"

Specifically designed to meet the demands of the optical machining industry, the LGS10A offers exceptional rotational accuracy suited to any high precision machining or finishing operations. The LGS10A, optimised for use at 12,000 rpm without the aid of coolant, has proved to be very popular in precision lathe manufacture of contact and intraocular (IOL) lenses.

The spindle can be liquid cooled to further control thermal growth. The LGS10A provides high stiffness and very low & synchronous and asynchronous error motion vital to achieving high precision surface finishes (<50 nanometres).

High load capacity bearings and exceptional tilt stiffness together with a wide variety of collet sizes makes this spindle ideal for micro-machining operations. The LGS10A spindle is capable of operating up to speeds of 40,000 rpm with coolant and suitable drive unit.

www.airbearings.co.uk

Air Bearings Limited 1 Witney Road, Nuffield Industrial Estate, Poole, Dorset. BH17 0GH Tel: +44 (0) 1202 680 805 Fax: +44 (0) 1202 680 809

Email: sales@airbearings.co.uk