

Small-sized Compression Load Cell



*TEDS-installed models are available. Inquiries are welcome.

Ultra-small & lightweight
Moderate price
Suitable for load distribution measurement

Ultra-small and lightweight LMB-A series load cells are used by just putting or bonding on the measurement point or setting in a hollow.

Specifications

Performance

Rated Capacity	See table below.
Nonlinearity	Within $\pm 0.5\%$ RO
Hysteresis	Within $\pm 0.5\%$ RO
Repeatability	0.3% RO or less
Rated Output	1.4 mV/V or more 10N: 0.5 mV/V or more

Environmental Characteristics

Safe Temperature	-10 to 80°C (Non-condensing)
Compensated Temperature	0 to 70°C (Non-condensing)
Temperature Effect on Zero	Within $\pm 0.05\%$ RO/°C (10N: Within $\pm 0.2\%$ RO/°C) (50N: Within $\pm 0.1\%$ RO/°C)
Temperature Effect on Output	Within $\pm 0.05\%$ /°C (10N: Within $\pm 0.1\%$ /°C)

Electrical Characteristics

Safe Excitation	7 V AC or DC
Recommended Excitation	1 to 5 V AC or DC
Input Resistance	$350 \Omega \pm 2.5\%$
Output Resistance	$350 \Omega \pm 2.5\%$
Cable	4-conductor (0.035 mm ²) vinyl shielded cable, 1.7 mm diameter by 2 m long, bared at the tip (Shield wire is not connected to the case.)

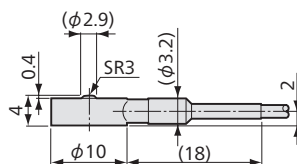
Mechanical Properties

Safe Overloads	150%
Natural Frequencies	See table below.
Material	Stainless steel
Weight	10N to 200N: Approx. 1.5 g (Excluding cable) 500N to 2kN: Approx. 6 g (Excluding cable)
Degree of Protection	IP64 (IEC 60529)
Compliance	Directive 2011/65/EU (RoHS)

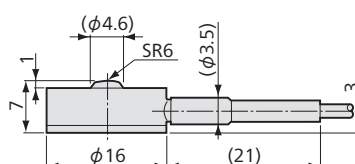
Optional Accessories Mount base CFM-B (Page 2-72)

Models	Rated Capacity	Natural Frequencies (Approx.)
LMB-A-10N	10 N	32 kHz
LMB-A-50N	50 N	40 kHz
LMB-A-100N	100 N	47 kHz
LMB-A-200N	200 N	59 kHz
LMB-A-500N	500 N	37 kHz
LMB-A-1kN	1 kN	45 kHz
LMB-A-2kN	2 kN	54 kHz

Dimensions

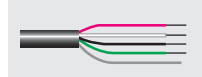


LMB-A-10N to 200N



LMB-A-500N to 2kN

Bared at the tip

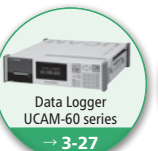


● Physical quantity indication

● Static measurement

● Dynamic measurement

LMB-A
Recommended
products for
combination



Load Cells
(Load Transducers)

Outline

Compressive

Tensile

Tensile & compressive

Component

Special

Other