

MINIATURE LOW-PROFILE TENSION LINKS

LOW PROFILE 19 mm (0.75") TO 25 mm (1") HEIGHT

STANDARD AND METRIC MODELS

Tension/Compression
Calibrated in Tension
10 lb to 1000 lb
5 kg to 500 kgf

1 Newton = 0.2248 lb
 1 daNewton = 10 Newtons
 1 lb = 454 g
 1 t = 1000 kgf = 2204 lb

LC703/LCM703 Series



Standard

- ✓ Low Profile
- ✓ High Accuracy
- ✓ Rugged Industrial Design

The LC703/LCM703 Series comprises economical universal (tension/compression) load cells with a low profile. Ranges above 100 lb are stainless steel; ranges below 100 lb are aluminum. The low profile and rugged design make LC703 and LCM703 suitable for many industrial applications, including robotics, automated weighing systems, and batch-process control systems.

SPECIFICATIONS

Excitation: 10 Vdc (15V max)

Output: 2 mV/V nominal

5-Point Calibration:

0%, 50%, 100%, 50%, 0%

Linearity:

10 to 100 lb: $\pm 0.15\%$

>100 lb: ± 0.10 FSO

5 to 50 kgf: $\pm 0.15\%$

75 to 500 kgf: $\pm 0.10\%$

Hysteresis:

10 to 100 lb: $\pm 0.15\%$

>100 lb: ± 0.10 FSO

5 to 50 kgf: $\pm 0.15\%$

75 to 500 kgf: $\pm 0.10\%$

Repeatability: $\pm 0.05\%$

Zero Balance: $\pm 1.0\%$ FSO

Operating Temp Range:

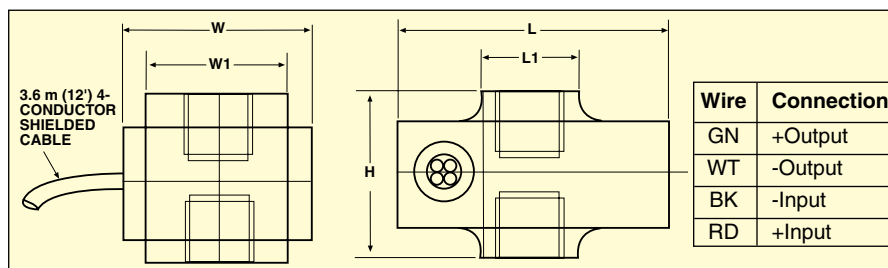
-40 to 82°C (-40 to 180°F)

STANDARD
 LC703-25,
 shown actual size.

METRIC
 LCM703-150,
 shown actual size.



LC703-100, enlarged view.



Dimensions: mm (in)

CAPACITY	L (MAX)	L1	W	W1	H	THREAD
10 lb	38 (1.50)	14 (0.56)	14 (0.54)	9.5 (0.38)	19 (0.75)	10-32 x 0.20
5 kgf						M5 x 0.8-6H
25 to 100 lb	41 (1.62)	14 (0.56)	17 (0.66)	13 (0.50)	19 (0.75)	¼-28 x 0.23
10 to 50 kgf						M6 x 1.00-6H
150 to 1K lb	44 (1.75)	14 (0.56)	24 (0.93)	19 (0.75)	25 (1.0)	¾-24 x 0.38
75 to 500 kgf						M10 x 1.5-6H

Compensated Temp Range:
 16 to 71°C (60 to 160°F)

Thermal Effects:

Zero: $\pm 0.005\%$ FSO/°F

Span: $\pm 0.005\%$ FSO/°F

Protection Class: IP54

Safe Overload: 150% of capacity

Ultimate Overload: 300% of capacity

Output Resistance: 350 ± 10 Ω

Input Resistance: 360 Ω minimum

Full Scale Deflection: 0.003" nominal

Construction:

≤ 100 lb: Aluminum

>100 lb: 17-4 PH stainless steel

≤ 50 kg: Aluminum

>50 kg: 17-4 PH stainless steel

Electrical: 3.6 m (12') shielded 4-conductor PVC cable

MINIATURE LOW-PROFILE TENSION LINKS

To Order				
CAPACITY		MODEL NO.	COMPATIBLE METERS*	ROD END
kgf	lb			
STANDARD MODELS				
4.5	10	LC703-10	DPIs, DP41-S, DP25B-S	REC-010M
11	25	LC703-25	DPIs, DP41-S, DP25B-S	REC-014M
23	50	LC703-50	DPIs, DP41-S, DP25B-S	REC-014M
34	75	LC703-75	DPIs, DP41-S, DP25B-S	REC-014M
45	100	LC703-100	DPIs, DP41-S, DP25B-S	REC-014M
68	150	LC703-150	DPIs, DP41-S, DP25B-S	REC-038M
91	200	LC703-200	DPIs, DP41-S, DP25B-S	REC-038M
136	300	LC703-300	DPIs, DP41-S, DP25B-S	REC-038M
227	500	LC703-500	DPIs, DP41-S, DP25B-S	REC-038M
341	750	LC703-750	DPIs, DP41-S, DP25B-S	REC-038M
455	1000	LC703-1K	DPIs, DP41-S, DP25B-S	REC-038M
METRIC MODELS				
5	11	LCM703-5	DPIs, DP41-S, DP25B-S	MREC-M5M
10	22	LCM703-10	DPIs, DP41-S, DP25B-S	MREC-M6M
25	55	LCM703-25	DPIs, DP41-S, DP25B-S	MREC-M6M
50	110	LCM703-50	DPIs, DP41-S, DP25B-S	MREC-M6M
75	165	LCM703-75	DPIs, DP41-S, DP25B-S	MREC-M10M
100	220	LCM703-100	DPIs, DP41-S, DP25B-S	MREC-M10M
150	331	LCM703-150	DPIs, DP41-S, DP25B-S	MREC-M10M
250	551	LCM703-250	DPIs, DP41-S, DP25B-S	MREC-M10M
500	1102	LCM703-500	DPIs, DP41-S, DP25B-S	MREC-M10M

Comes complete with 5-point NIST-traceable calibration and 59 kΩ shunt data.

* Visit us online for compatible meters. DPiS meter suitable for one direction measurement only.

Ordering Examples: LC703-200, 200 lb capacity universal link with 3.6 m (12') cable.

LCM703-100, 100 kgf capacity universal link with 3.6 m (12') cable, MREC-M10M, accessory rod ends.

COMPATIBLE METERS

DP25B/DP41-B



- ✓ mV, V, mA, Strain Gage Thermocouple, RTD Inputs
- ✓ Full Process Unit Scaling
- ✓ Built-In Transducer Power

MONOGRAM SERIES

To Order	
MODEL NO.	DESCRIPTION
DP25B-E	4-digit voltage/current input meter with excitation
DP25B-S	4-digit mV input meter with excitation
DP41-B	6-digit 1/8 DIN universal input meter with excitation

Comes complete with operator's manual.

Ordering Examples: DP25B-E, voltage/current input meter for use with 0 to 5 V, 0 to 10 V, 4 to 20 mA output transducers.

DP25B-S, mV input meter for use with mV/V output transducers, DP41-B, universal input meter for use with all standard transducer outputs.