TEAC

Tension/Compression Load Cell

TU-BR□□N/KN-G

Features

1/2000 of High Precision

Tension/Compression Load Cell

Applications

For measurement of test equipement and conveyer tank scale

Type of Mounting

Fix with screws

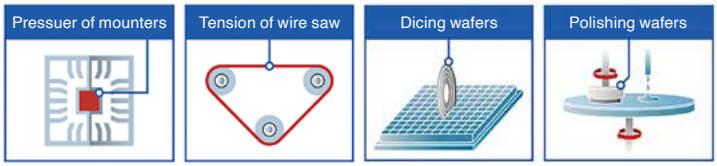
Advantages of the TEAC Load Cells

TEAC Load Cells

Since the 1980s, when TEAC started manufacturing and selling load cells, we have cultivated technologies to achieve higher precision and smaller size with our unique structures. With these technologies, a number of load cells that achieve high response, high accuracy, and high stability, as well as products that take environmental conservation into consideration have been developed to match customers' applications.

We also offer customization for specific conditions (usage environment, space) that are difficult to meet with standard ones. From one-off prototypes to mass production, we support engineers involved in research and development on manufacturing technology.

Examples of appplication

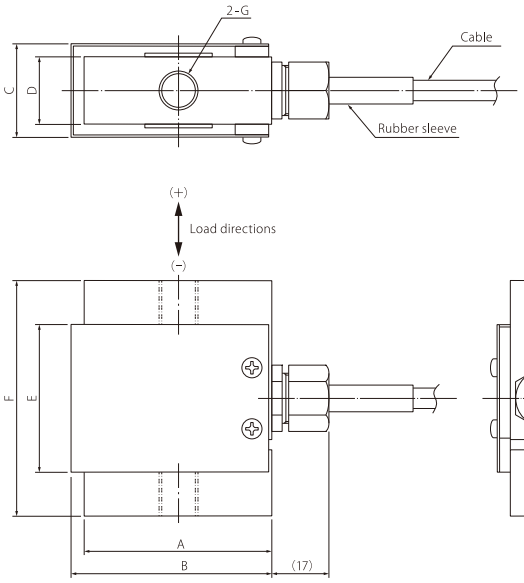


Specifications

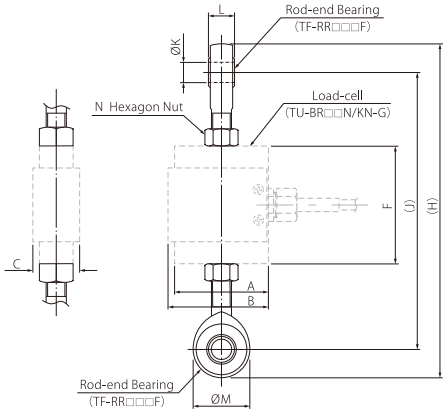
Type	Tension/Compression Load Cell						
Model	TU-BR□□N/KN-G RoHS (10 substances)						
Rated Capacity (R.C.)	200N	500N	1kN	2kN	5kN	10kN	20kN
Natural Frequency	0.6kHz	1.2kHz	1kHz	1.5kHz	2.7kHz	2.3kHz	2.2kHz
Weight (Approx.)	0.3kg	0.3kg	0.3kg	0.45kg	0.5kg	0.5kg	1.6kg
Safe overload rating	150% R.C.						
Rated Output (R.O.)	3mV/V ±1%						
Linearity	0.05% R.O.						
Hysterisis	0.05% R.O.						
Repeatability	0.03% R.O.						
Zero Balance	±10% R.O.						
Safe Excitation Voltage	20V						
Input Terminal Resistance	350 ±3.5Ω						
Output Terminal Resistance	350 ±5Ω						
Insulation Resistance	1000MΩ or more (DC 50V)						
Compensated Temperature Range	−10°C to 70°C						
Permissible Temperature Range	−30°C to 80°C						
Temperature Effect on Zero Balance	0.05% R.O./10°C						
Temperature Effect on Output	0.05% R.C. / 10°C						
Cable	Φ6mm, 4-core shield cable, 5m direct connection with bare lead wires						
Mounting Method	Screw holes						
Body Material	Aluminum				Steel		

Dimensional drawings (Units: mm)

Polarity: Tension (+), Compression (–)



Rod-end Bearing



Model	Capacity	A	B	C	D	E	F	G
TU-BR200N-G	200N	56	60	28	20	44	60	M6 x 1 Depth 12
TU-BR500N-G	500N	56	60	28	20	44	60	M6 x 1 Depth 12
TU-BR1KN-G	1kN	56	60	28	20	44	60	M6 x 1 Depth 12
TU-BR2KN-G	2kN	56	60	28	20	44	70	M12 x 1.75 Depth 16
TU-BR5KN-G	5kN	56	60	28	20	44	70	M12 x 1.75 Depth 16
TU-BR10KN-G	10kN	56	60	28	20	44	70	M12 x 1.75 Depth 16
TU-BR20KN-G	20kN	70	74	33	25	58	90	M16 x 2 Depth 20

Loadcell	Rod-end Bearing	H	J	ØK	L	ØM	N
TU-BR200N-G	TF-RR006F	126	108	6H7	9	18	M6 x 1.0
TU-BR500N-G							
TU-BR1KN-G							
TU-BR2KN-G	TF-RR012F	199	165	12H7	16	34	M12 x 1.75
TU-BR5KN-G							
TU-BR10KN-G							
TU-BR20KN-G	TF-RR016F	229	190	16H7	19	39	M16 x 2.0

Related Products (Indicators and Signal Conditioners)

92 x 92mm
Panel opening size

Color Graphics Digital Indicator

TD-9000T

RS-485 model
EtherNet/IP™ model
CC-Link model

High performance model with large LCD

Supporting two inputs, force sensor and displacement sensor, various comparison judgments function, and direct saving of waveform data onto large capacity internal memory.

TEDS | RoHS | 4.3" LCD
Touch Panel | 5,000 time/sec. | 24-bit
Load/Vary Inputs | Waveform | Static Strain
Interrupt Check | High/Low Limit Compare | Judgements
D/A OUT | RS-232C | Bilingual

92 x 45mm
Panel opening size

Digital Indicator

TD-700T

Standard model
CC-Link model
RS-485 model

Excellent model with compact and high functionality

Supporting five key functions in one unit, numeric display, graph display, TEDS function, static strain display, and signal conditioner. This small and cost-effective TD-700T achieves equal or even higher performance to upper-class models, with high-visibility color LCD and various hold functions.

TEDS | RoHS | 4,000 time/sec. | 24-bit
Static Strain | Waveform | Bar Meter | D/A OUT
Data Rec | Various Holds | Bilingual | AC/DC Power

New
EtherNet/IP™ model
CC-Link model

Attaches to common DIN rails

Signal Conditioner

TD-SC1

D/A model
RS-485 model
EtherNet/IP™ model
CC-Link model

Slim and light-weight signal conditioner

Supporting high-speed sampling of 20,000 times/second, PC-based configuration via USB connection, selectable network, and TEDS calibration function.

TEDS | RoHS | Plug-in
20,000 time/sec. | 24-bit | Static Strain
Bilingual | High/Low Limit Compare | Hold Functions

Weighs only 320g (incl. batteries)

Portable Digital Indicator

TD-01 Portable

On-site checking tool with versatility

Supporting various functions that equal to embeded systems, in hand-held size, allowing you to take measurements anytime anywhere, according to your purpose.

TEDS | RoHS | Color LCD
Waveform | Bar Meter | High/Low Limit Compare
Data Rec | Static Strain | Interrupt Check
D/A OUT | Dual I/O | 24-bit
AA Batteries | Long Time Operation | Bilingual

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