

Low Cost

TENSION MONITORING SYSTEM

TELC SYSTEM

TELC Sensor plus TD-1-TE Indicator

Accurately measure the running line tensions of yarns, fibers, wires, cables, films & similar process materials — continuously!

The TELC System detects “out of tolerance” conditions and immediately alerts operating personnel. This enables them to take the appropriate corrective action to maintain the highest product quality.

Additionally, the TELC Tension Sensor can be installed separately, as part of a user-supplied closed-loop control system.

FEATURES

- Precision strain gauge accuracy of $\pm 1.5\%$ or better
- User-set high & low alarm limits with relays for alerting operating personnel of “out of tolerance” conditions
- Analog output for recording and control purposes
- For process speeds up to 5000 m/min
- Built-in electronic damping to filter out fluctuating tension readings.

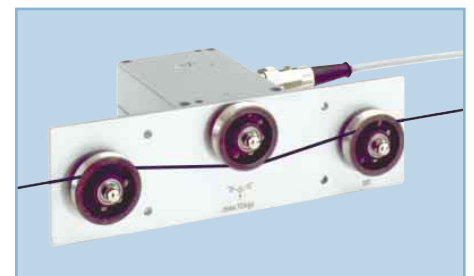


OTHER STANDARD SENSOR DESIGNS

Heavy-Duty Model

Uses 30 mm diameter hardened steel rollers for heavy wires, cables, tire cord and similar process materials subjected to high impact loads.

.....Type 24



Tapes/Films & Tows

Uses 7, 10, 15, 20 or 30 mm wide cylindrical rollers for “strip” materials. Wider materials can be accommodated with other models.

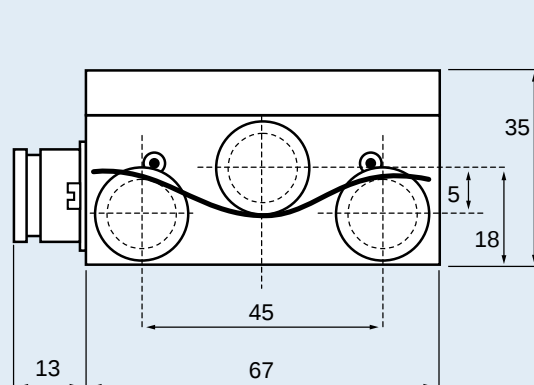
.....Type RX



Custom sensor designs can be developed to meet specific applications requirements. Inquire.

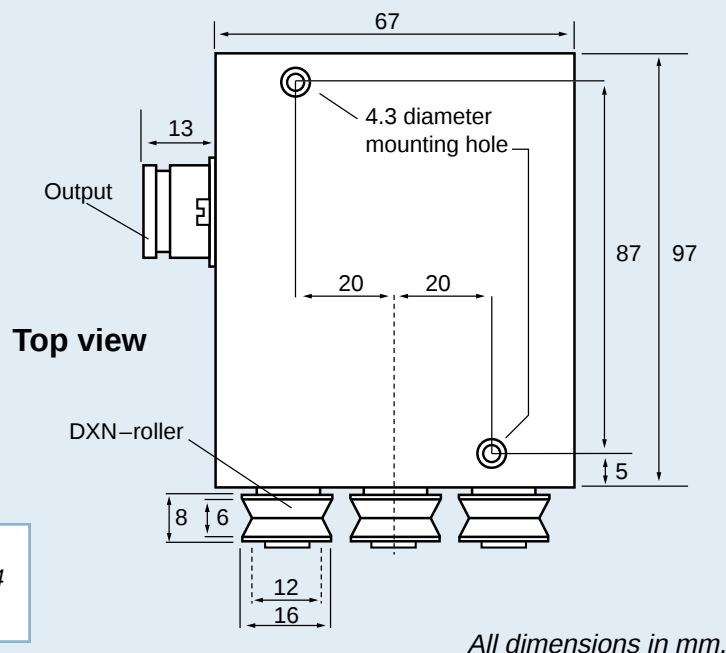
TELC Series

TELC Sensor Dimensions



Front view

NOTE: Dimensions will vary with different tension range, process material and application. Drawings for the Type 24 and RX are also available. Inquire.



All dimensions in mm.

TELC Sensor Specifications

Tension Ranges	0–100 g, 0–200 g, 0–500 g 0–1 Kg, 0–2 Kg, 0–5 Kg, 0–10 Kg,	Output (Optional)	0–10 V DC, 4–20 mA, RS-232 or RS-485 (Addressable)
Accuracy	±1.5% or better	Frequency Response	50 Hz
Power Required	+15 V DC, regulated (20 mA)	Outer Roller Spacing	40–200 mm, depending upon tension range, process material and application
Deflection	0.5 mm maximum	Operating Temperature	40 to 105 °F (5 – 40 °C)
Output (Standard)	0–1 V DC		

TD-1-TE Indicator Specifications

Display Range	1–1999 (user-set decimal point)	Panel Cutout	92 x 44 mm
Digital Display	3–1/2 Digit LED (14.4 mm high)	Dimensions	3.78" L x 1.89" H x 4.04" D (96 x 48 x 103 mm)
Power Required	115 / 230 V AC (user-configured)	Relay Operation	Hi-LO or Hi–Hi/HI
Sensor Power	Provides +15 V DC, regulated	Relay Rating	1 Amp @ 250 VAC / 30 V DC, resistive load, normally open.
Analog Output	4–20 mA or 0–10 V DC		
Frequency Response	1 Hz (with damping filter) 40 Hz (without damping filter)		

Specifications subject to change without notice.

