

# TEL-TRU MANUFACTURING COMPANY

# PTD-1 LOCAL READOUT DISPLAY

The PTD-1 loop powered display is designed for direct readout in milli-Amps VC, percent of full scale, or engineering units. The display is configurable from -1999 to +1999, and may be used on most instruments with 4 to 20mA output and a DIN 43650 electrical connection.

Reliable in harsh environments and high vibration applications

- High-impact ABS housing
- Fully gasketed
- NEMA 4X
- Surface mount electronics
- Easy field setup
- NIST traceable calibration certificate available when display is factory installed on models that use DIN 43650 A conn. and 4-20mA electronics

## **Specifications**

#### > ELECTRICAL

Excitation: 12-36 Vdc

Voltage Drop: 2.5 Vdc Max

Zero Balance:  $\leq \pm 1\%$  FSO

FSO Setting:  $\leq \pm 1\%$  FSO

Display: LED (LCD Available)

Update Rate: < 100 mS

Insulation Resistance:  $1000 \text{ M}\Omega$  at 50 Vdc

Reverse Polarity: Protected EMI/RFI: Internal Fi

EMI/RFI: Internal Filtering Short Circuit Protected: Up to 40 Vdc

#### > PERFORMANCE

Accuracy:  $\leq \pm 0.05\%$  FSO (BFSL, RSS)

Repeatability:  $\leq \pm 0.05\%$  FSO

Temperature Effects:  $\leq \pm 0.5\%$  FSO over comp range

(combined effects of zero and FSO with reference at 70° F)

Long Term Stability:  $\leq \pm 0.05\%$  FSO per year



### > MECHANICAL

Materials: High impact ABS plastic

neoprene gasket

Mates With: DIN 43650 electrical connector

Dimensions: See outline drawing Weight: Approximately 3 oz.

#### > ENVIRONMENTAL

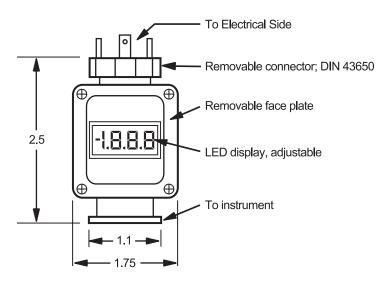
Compensated Temp Range: 0 to 170°F
Operating Temp Range: 0 to 200°F
Storage Temp Range: -20 to 200°F



Since 1916

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### NEMA 4X Loop powered, Customer configurable



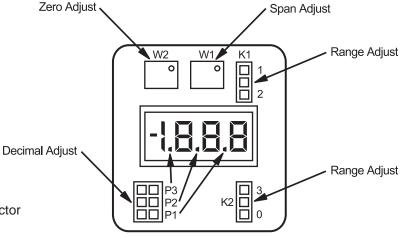


- Unscrew Hex nut and remove connector.
- Install indicator on instrument.
   Please be certain wiring is + in: Pin 1, return/signal: Pin 2.
- Tighten mounting screw located in center of indicator. Re-install connector and Hex nut.
- 4. Install mating DIN connector.

## > CALIBRATION

- 1. Remove face plate (4 screws).
- 2. Determine position for switch K1 and K2 and short appropriate pins.
- 3. Install display on instrument.
- 4. Apply input voltage to Pin 1 of removable connector (12-36 Vdc).
- 5. Apply the zero pressure, adjust zero pot to desired zero reading.
- Apply full scale pressure, adjust span pot to desired span reading.
- 7. Install face plate.





Range	Display at 20 mAdc	Swi K1	itch K2	Display at 4 mAdc
1	1300 thru 1000	1	0	
II	500 thru 1300	2	0	-1999 to 0
III	190 thru 500	2	3	



