TT820D

Programmable Thermocouple Temperature Transmitter w/4-20 mA Output

Product Features

- *Microprocessor-Based design*
- *Linearized output to temperature*
- *2-wire loop powered 4-20 mA output*
- *Input T/C with cold junction compensation*
- *Factory Calibrated*
- *Re-Programmable via PC*
- *DIN Rail-Mounted*

Description

The TT820D is a low cost microprocessor-based 2-wire DIN rail-mounting transmitter. The TT820D features a one point calibration adjustment with two push buttons as well as an advanced software programming via the RS-232 input. The advanced programming allows two points calibration, re-scaling, filtering options and identification of the transmitter.

TT820D is designed for highest reliability and excellent industrial performance. Automatic cold junction compensation and a low-drift input amplifier maintain accuracy under varying ambient conditions.

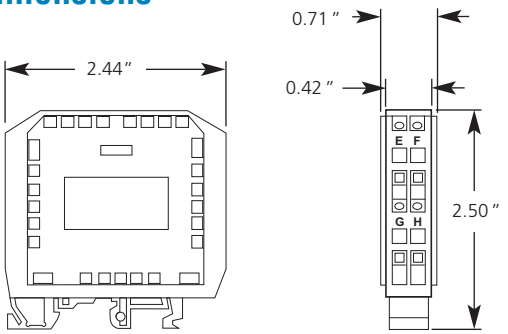
Specifications

@Vnom = 24 VDC, **T.ambient** = 25°C, **Span nom.** = 100 °C

Input :	T/C type J, K , T or E
Output :	4-20 mA loop powered
Linearization :	Linear to temperature
Power Supply :	12-32 VDC, polarity protected
Supply Effect :	0.02 % / V
Zero Drift :	±0.1% FS/ ºC
Span Drift :	±0.1 % FS/ ºC
T/C Cold Junction Error :	K : ±1 °C max. at -20 to 50 °C J : ±2 °C max. at -20 to 50 °C T, E : ±3 °C max. at -20 to 50 °C
Sensor Lead Resistance :	10 K ohms max.
Accuracy :	0.5 % FS (includes effects of linearity, hysteresis and repeatability)
Warmup :	30 seconds
Ambient Operating Temperature :	-40ºC.....80ºC (-40 ºF....176ºF)
Storage Temperature :	-40ºC.....80ºC (-40 ºF....176ºF)
Maximum Loop Resistance :	Rmax. = [Vsupply – 9 VDC] / 20 mA
DIN Rail :	DIN 46277
Housing Material :	Polyamide
Housing Dimensions :	2.44 " W x 2.50 " H x 0.71 " D

- *Information furnished by Intempco is believed to be accurate and reliable. However, no responsability is assumed by Intempco for its use.*
- *Specifications subject to change without notice.*

Dimensions



Temperature Standard Ranges		Input			
°C	(°F)	K	J	T	E
-50/+50	(-58/+122)				
0/+50	(32/+122)				
0/+100	(32/+212)		•	•	•
0/+200	(32/+392)	•	•	•	•
0/+300	(32/+572)	•	•	•	•
0/+400	(32/+752)	•	•	•	•
0/+600	(32/+1112)	•	•		•
0/+800	(32 /+1472)	•	•		
0/+1000	(32/+1182)	•			
0/+1200	(32 /+2192)	•			

For non-standard temperature ranges, specify range

Custom Builder

Model	Input Code	Range
TT820D	K, J, T, E	(___ / ___)

Ex.: **TT820D - J - (0/100 °C)**