

PT460XL Pressure Sensors

*IDEAL FOR ABRASIVE AND CORROSIVE
MELT PRESSURE APPLICATIONS*



Description

The PT460XL Series transducer is a $\pm 1.0\%$ sensor ideal for abrasive and/or corrosive melt pressure applications requiring simple installation, repeatability and reliability. The PT460XL transducers provide the industry standard 3.33 mV/V signal designed to work with most pressure indicators. Optional thermocouple or RTD configurations are available to provide melt temperature. The PT460XL features a 1/2-20 UNF thread for installation in standard transducer mounting holes and can be supplied with a variety of electrical connections.

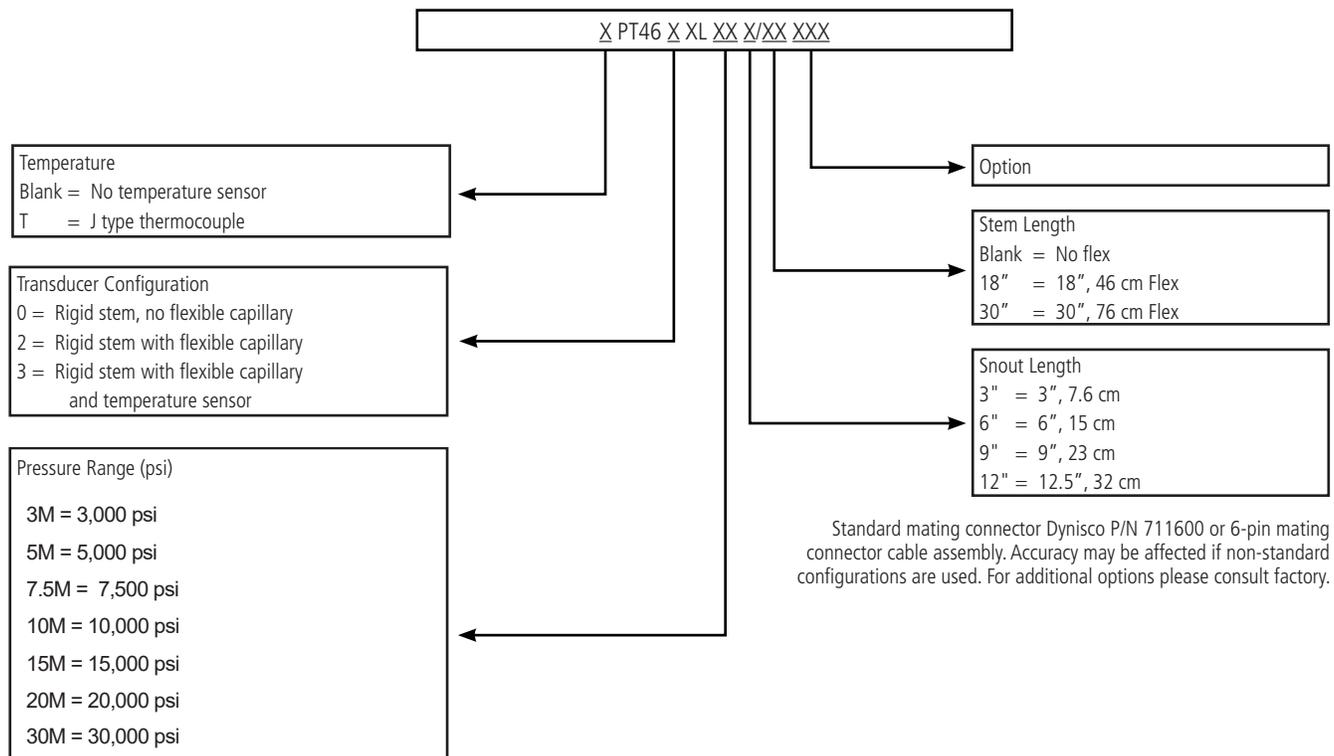
Features

- Accuracy better than $\pm 1.0\%$
- Inconel diaphragm
- Superior temperature stability
- Patented sensing element
- 0 - 3,000 to 0 -30,000 psi
- Internal 80% shunt calibration

Performance Characteristics	
Combined Error:	±1.0% FSO, (Including Linearity, Repeatability & Hysteresis)
Repeatability:	±0.2% FSO
Maximum Pressure:	2 x full range or 35,000 psi (whichever is less)
Configuration:	Four active arm bonded Wheatstone bridge strain gage
Bridge Resistance:	Input: 345 Ohms minimum; Output: 350 Ohms ±10%
Output:	3.33 mV/V ±2.0%
Zero Balance:	±10% full scale
Input Voltage:	10 Vdc recommended, 12 Vdc maximum
Internal Shunt Calibration (R-Cal):	80% FSO ±1.0%
Insulation Resistance:	1,000 megohms at 50 Vdc

Temperature & Mechanical Characteristics	
Transducer Diaphragm:	
Maximum Diaphragm Temperature:	750°F (400°C)
Zero Shift (due to temperature change):	<20 psi/100°F maximum (<36 psi/100°C)
Electronics Housing:	
Maximum Temperature:	250°F (121°C)
Zero Shift (due to temperature change):	±0.05% full scale/°F maximum (±0.10% full scale/°C)
Sensitivity Shift (due to temperature change):	±0.02% full scale/°F maximum (±0.04% full scale/°C)
Mounting Torque:	500 inch/lbs. maximum
Standard Wetted Parts:	Inconel 718

Ordering Guide for PT460XL Series



Dimensions

CONNECTOR WIRING	
PIN	FUNCTION
A	SIGNAL +
B	SIGNAL -
C	EXCITATION +
D	EXCITATION -
E	INTERNAL CAL RESISTOR
F	

NOTES
1. DIMENSIONS ARE IN INCHES (MILLIMETERS)

