

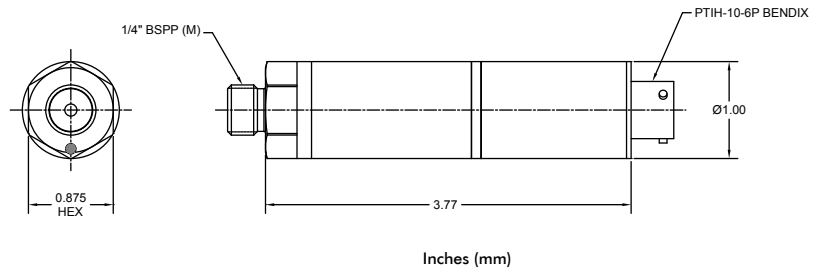


MODEL 741

HIGH-ACCURACY RS485 / DIGITAL PRESSURE TRANSDUCER

WIRING CONFIGURATION

| PIN | DESCRIPTION |
|-----|-------------|
| 1 | +EXC |
| 2 | +RS485 |
| 3 | -RS485 |
| 4 | -EXC |
| 5 | N/C |
| 6 | N/C |



**REF DIMENSIONS ONLY.
CONSULT FACTORY FOR ACTUAL DIMENSIONS.**

PRODUCT OVERVIEW:

GP:50 Model 741 provides RS485 digital data transmission used in serial communication protocols standard for Industrial Control Networks and Data Acquisition Systems. High static accuracy, thermal performance and lack of EMI makes the 741 ideal for the auto and aircraft manufacturing floor.

FEATURES:

- RS485 (TIA 485) serial communication standard
- Supports Modbus RTU and ASCII Protocols
- 4000 ft max data transmission
- EMI resistant
- High accuracy $\pm 0.05\%$ FSO
- -40 to +180 °F (-40 °C to +82 °C) compensation
- Compact, lightweight, all stainless steel design

APPLICATIONS:

- Industrial Control Systems
- Data Acquisition Systems
- Programmable Logic Controllers
- Automotive and Jet Engine Test Stands

OPTIONS:

- Modbus RTU or ASCII serial communication protocol
- Adjustable Baud Rate
- System Output Re-Zero and Digital Shunt

*The following specifications provide a broad facet of this model.
Please contact GP:50 for your specific application.*

GP:50 MODEL 741

REFERENCE SPECIFICATIONS

(Standard configurations shown, consult factory for other options)

| ELECTRICAL | |
|------------------------------------|----------------------|
| Digital Output: (Output Signal) | RS-485 (TIA-485) |
| Excitation Voltage: | 10-32 Vdc |
| Conversion Rate: | 4.8 KHz |
| Current Draw: | 40 mA |
| Standard Resolution: | 18 Bit |
| Standard Messaging: | Pressure |
| Protocol: | Modbus ASCII, or RTU |
| Baud Rate: | 115200 |

| MATERIALS OF CONSTRUCTION | |
|---------------------------|---|
| Wetted Parts: | 316 or 17-4 PH SST |
| Housing: | 300 Series Stainless Steel |
| Internal Fill: | ≤2000 PSI Silicone Oil (Fomblin optional) |

| ACCURACY (BFSL): Hysteresis, non-Linearity & Repeatability @ + 70 °F | |
|--|------------|
| Standard: | ±0.15% FSO |
| Improved: | ±0.05% FSO |
| Zero Balance/Span: | ±0.5% FSO |

| MECHANICAL | |
|------------------------|--|
| Process Connection: | ¼" NPT (M) (Options available) |
| Electrical Connection: | PTIH-10-6P connector (Options available) |
| Proof Pressure: | 2X FSO (Optional 5X) |
| Burst Pressure: | 5X Typ (2X for ranges ≥20K PSI) |
| Approximate Weight: | 8 oz. |

| PRESSURE RANGES | |
|---|--|
| 0 to 1 thru 0 to 15,000 PSI (0.069 thru 1035 BAR) (Some specs may be affected above 8,000 PSI - consult factory) Gauge, Sealed Gauge, Absolute or Vacuum | |

| THERMAL SPECIFICATIONS | |
|-----------------------------------|--|
| Operating Range: | -40 °F to +180 °F (-40 °C to +82 °C) |
| Compensated Range: | 0 °F to +180 °F (-18 °C to +82 °C) |
| Effect on Zero/Span: | ±0.5% FSO/100 °F (±1.0% FSO/100 °F from -40 to +185 °F / (-40 °C to +85 °C)) |
| Improved Temperature Performance: | ±0.25% FSO/100 °F (-40 °F to +180 °F (-40 °C to +82 °C)) |
| Storage Ambient: | -40 °F to +250 °F (-40 °C to +121 °C) |

