



LOW-COST OEM PRESSURE TRANSDUCER



Model BR1001/1002/1003
Low-Cost OEM Pressure Transducer

MODEL BR1001/1002/1003

FEATURES:

- Low-cost, high reliability
- Up to 0.25% FSO accuracy
- Compact 0.870" diameter
- Rugged, all welded construction
- NEMA - 4X/IP65 rated
- CE Directives: EMC, PED, ROHS

APPLICATIONS:

- Automotive
- Industrial OEM
- On-board vehicle
- Compressor controls
- Pneumatic/hydraulic controls
- Pump controls

PRODUCT OVERVIEW:

The Model BR1001/1002/1003 from Blue Ribbon Corp is a family of lower cost, industrial grade OEM pressure transducers, featuring corrosion-resistant, all stainless steel wetted parts and housings. Series transducers are ideal for higher volume pressure monitoring applications, particularly where lower costs are required, yet where the need for precision measurement accuracy remains. Units are available with choice of 4-20 mA, 0 to 5 Vdc, 0 to 10 Vdc or mV/V output, as well as various electrical connection and pressure port options. Typical applications for the Model BR1001/1002/1003 include off-road vehicle, HVAC/R, hydraulic and pneumatic control systems, pumps and compressors, and industrial engine pressure monitoring.

FIELD OPTIONS:

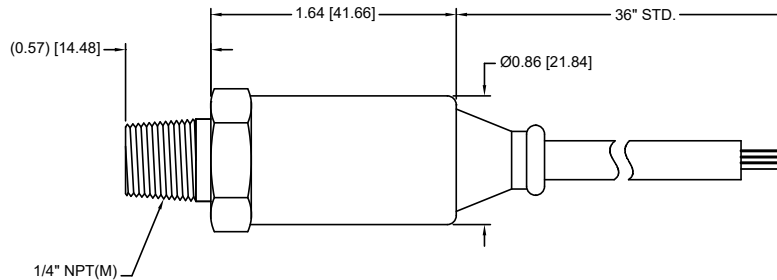
- 4-20 mA, 0-5 Vdc, 0-10 Vdc and mV/V outputs available
- Alternate connectors & pressure ports

BR5SL-TX-011
REV-I

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DIMENSIONAL DRAWING

All dimensions are in inches (mm)



STANDARD WIRING

WIRE	MODEL 1001	WIRE	MODEL 1002	WIRE	MODEL 1003
1/RED	+EXC	1/RED	+EXC	1/WHT	N/C
2/GRN	+SIG	2/BLK	-EXC/SIG	2/BLK	-EXC/SIG
3/WHT	-SIG	3/WHT	+SIG	3/RED	+EXC/SIG
4/BLK	-EXC	GND/SHIELD	N/C	GND/SHIELD	N/C

REFERENCE SPECIFICATIONS

ELECTRICAL

- **Supply Voltage:**
(1001) 3.5 to 15 Vdc
(1002, 1003) 9 to 32 Vdc
- **Output Signal:**
(1001) 3.0 to 10.0 mV/V
(1002) 0 to 5 Vdc, 0 to 10 Vdc optional
(1003) 4-20 mA
- **Circuit Protection:** Reverse polarity
- **Compliance:** CE directives: EMC, PED, ROHS
- **Response Time:** <5 ms
- **Connection:** 36" long, 24 AWG, 4 conductor cable (Other options available)

STATIC ACCURACY (BFSL) (HYSTERESIS, NON-LINEARITY & REPEATABILITY @ +70 °F)

Standard: $\pm 0.5\%$ FSO

Improved: $\pm 0.2\%$ FSO

Zero Balance & FSO: $\pm 1.0\%$ FSO @ +70 °F

MATERIALS OF CONSTRUCTION

- **Wetted Parts:** 316L SST or 17-4 stainless steel
- **Housing:** 300 Series stainless steel
- **Internal Fill:** May contain Silicone oil fill (consult factory for alternatives)

MECHANICAL

- **Process Connection:** 1/4" NPT (M) standard (other options available)
- **Proof Pressure:** 1.5X FSO
- **Burst Pressure:** 3X FSO or 17,500 PSIG (1,207 BAR), whichever is less
- **Weight:** <4 oz (113 g)

PRESSURE RANGES

- 0 to 15 thru 0 to 10K PSI (1,034 mBAR thru 689 BAR), gauge, vacuum, and absolute pressure reference available

THERMAL SPECIFICATIONS

- **Compensated:** 0 °F to +180 °F (-17.7 °C to +82 °C)
- **Operating Temperature:** -40 °F to +180 °F (-40 °C to +82 °C)
- **Storage Ambient:** -40 °F to +250 °F (-40 °C to +121 °C)
- **Effect on Zero/Span:** $\leq \pm 2.0\%$ FSO/100 °F

All specifications are for reference purposes only. In the interests of continuous product improvement, all specifications are subject to change without notice. Please contact Blue Ribbon Corporation for assistance with your application.

