PRESSURE TRANSMITTER

Models 202 / 302



FEATURES

- High accuracy
- Small size and weight
- Many options available
- All stainless steel construction
- 5 to 100K PSI (0.3 to 6900 bar)
- Shunt calibration circuit

TYPICAL APPLICATIONS

- Engine test stand
- Turbine-rocket
- Diesel-internal combustion
- Emission testing
- Production test stand
- Transmission testing
- Break testing

COMPACT SIZE WITH STATE-OF-THE-ART CIRCUITRY

The compact size means more transmitters fit into a small space meaning more pressure points can be measured. An internal calibration signal circuit is also included allowing calibration of the transmitter without an external pressure source. This minimizes the need to send the 202 / 302 to a metrology lab.

Surface mount technology (SMT) allows the 202 / 302 to be equipped with electronic linearization, a compensation circuit that corrects for non-linearities in the sensor.

OPTIONAL OUTPUTS, PROOF PRESSURES AND MORE

Spikes and over pressures are a problem. To combat spikes, Viatran employs a bonded foil strain gage on a hardened stainless steel diaphragm. This solution withstands overpressure conditions inherent in your toughest applications.

EASILY ADAPTABLE

Viatran has been making Pressure Transducers for the Test and Control industry for the last 40 years and have the technical expertise and proven track record to go along with it.

If your application requires the reliability and endurance of a rugged pressure transducer, Viatran's 202 / 302 is the answer.

CE

MECO MEASUREMENTS & CONTROLS
Via Paolo Uccello, 4 20148 Milano
Tel. +39 02 4 692 680 Fax +39 02 4 694 602 info@mecoitalia.it www.mecoitalia.it

PERFORMANCE

Full Scale Pressure Range	0 to 5 PSI thru 0 to 100,000 PSIG/A/V/S (0.3 thru 6900 bar)
Nonlinearity (Best Fit Straight Line)	≤±0.1% FSO (≤±0.25% FSO for 100K PSI)
Hysteresis & Repeatability	≤±0.1% FSO
Full Scale Output (FSO) 202	5 Vdc at 70°F (21°C) - standard (see options)
302	16 mA at 70°F (21°C)
Long-term Stability	≤±0.2% FSO per 6 months
Temperature Shift Compensated Temperature	70°F to 170°F (21°C to 77°C)
Operating Temperature	-40°F to 185°F (-40°C to 85°)
Storage Temperature Limits	-40°F to 250°F (-40°C to 120°C)
Temperature Effect on Zero	≤±0.01% FSO / °F (0.18% FSO / °C)
Temperature Effect on Span	≤±0.01% FSO / °F (0.18% FSO / °C)

ELECTRICAL

Supply Voltage 202	11 to 40 Vdc
	(15.5 to 40 Vdc for 0-10 Vdc output option)
302	9 to 36 Vdc
Power Supply Regulation	≤±0.01% FSO per volt change over the supply voltage range
Output Signal 202	0 - 5 Vdc standard (see options)
302	4 to 20 mA
Load Resistance 202	100K Ohms minimum
302	1286 ohms max at 36 Vdc
Zero Adjustment	±10% FSO min
Span Adjustment	±10% FSO min
Calibration Signal	80% of FSPR, by shorting pins
Calibration Signal Accuracy	≤±0.1% of the stated value
Circuit Protection	Input polarity may be reversed. Output may be short-circuited
	indefinitely. Over voltage protection to 1000 volts for ≤1 mSec
Insulation Resistance	≥200 MegOhms to case ground
Response Time	≤4.0 mSec
Electrical Connection	Bendix PT02E-10-6P, mates PT06E-10-6S (SR)
202 Pin A	+Power
Pin B	-Power
Pin C	+Signal
Pin D	-Signal
Pin E	Calibrate
Pin F	Calibrate
302 Pin A	+Power/Signal
Pin B	-Power/Signal
Pin C	Calibrate
Pin D	Calibrate
Pin E	n/c
Pin F	n/c

MATERIALS OF CONSTRUCTION

Wetted Parts 5 to 150 PSI (0.3 to 10 bar)	316L SST
200 to 15K PSI (14 to 1034 bar)	15-5PH SST
20K to 100K (1400 to 6900 bar)	13-8 Mo SST
Housing	304 SS with a Cadmium plated electrical connector
Weight	15 oz (425 g)
Identification	Laser etched onto body

ACCESSORIES

Direct Mount digital Indicator/Power Supply
Mating Electrical Assembly

MECO MEASUREMENTS & CONTROLS
Via Paolo Uccello, 4 20148 Milano
Tel. +39 02 4 692 680 Fax +39 02 4 694 602 info@mecoitalia.it www.mecoitalia.it
Viatran A Dynisco Company

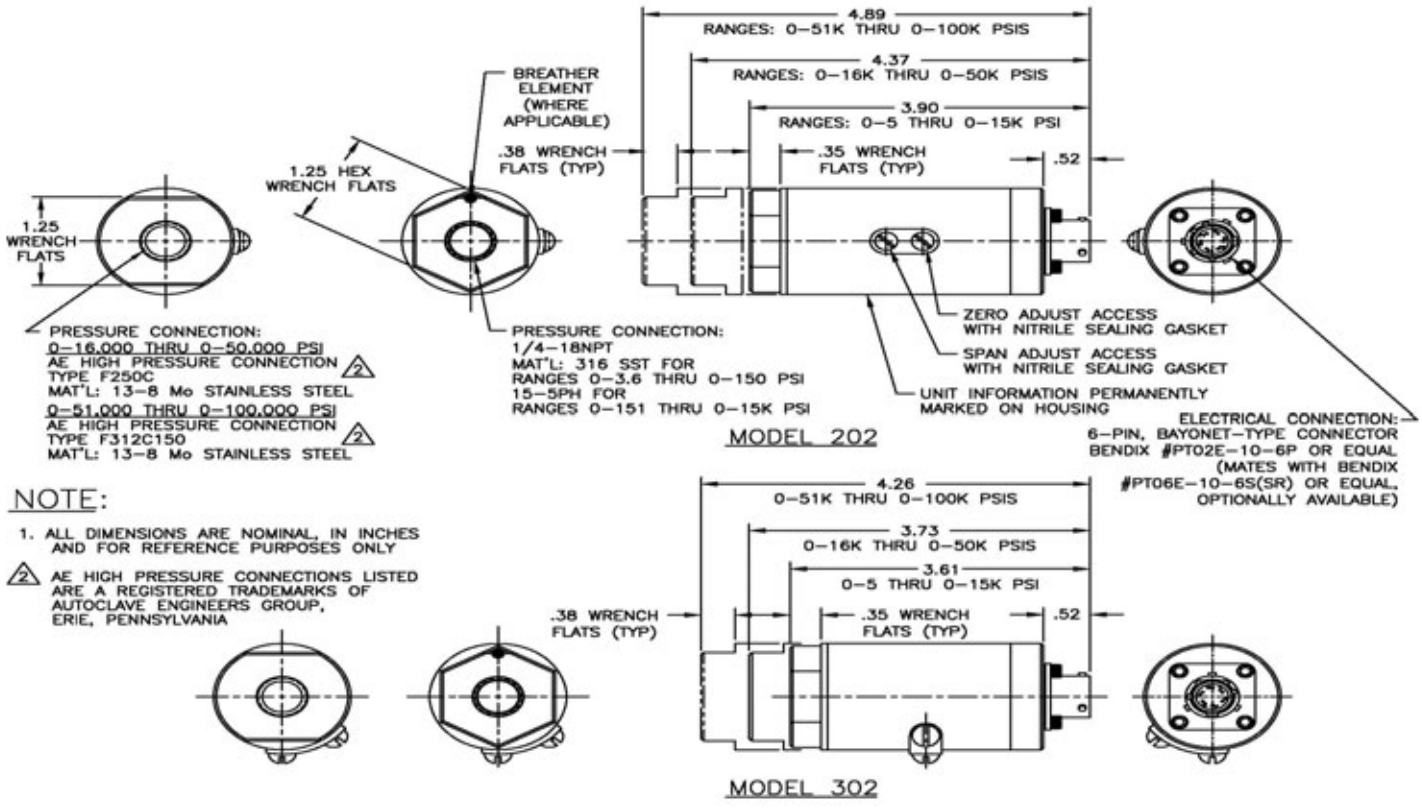
MECHANICAL

Pressure Connection	5 to 15K PSI (0.2 to 1000 bar)..... 1/4" - 18 NPT female
	20K to 50K PSI (1400 to 3500 bar)..... 1/4" F250-C high pressure tube
	60K to 100K PSI (4000 to 6900 bar)..... 5/16" F312-C high pressure tube
Proof Pressure	5 to 150 PSI (0 to 10 bar)..... 3X range
	200 to 15K PSI (14 to 1034 bar)..... 1.5X range
	20K to 100K PSI (1400 to 6900 bar)..... 1.2X range
Burst Pressure	5 to 150 PSI (0 to 10 bar)..... 4X range
	200 to 15K PSI (14 to 1034 bar)..... 2.3X range
	20K - 100K PSI (1400 to 6900 bar)..... 1.5X range
Pressure Cavity Volume	5 to 150 PSI (0 to 10 bar)..... 0.25 cubic in (4 ml)
	200 to 15K PSI (14 to 1034 bar)..... 0.32 cubic in (5.2 ml)
	20K to 100K PSI (1400 to 6900 bar)..... 0.10 cubic in (1.6 ml)
Mounting	May be supported by process piping

OPTIONS

Codes	BG.....DIN 43650
	BP..... Micro change M12
	ZA..... G-1/2" (m) RFI
	ZL..... M20 RFI
	ZU..... Direct Cable (175°F max temperature) (79°C)
Performance Options	DG..... Improved temp performance to 0.005% FSO / °F (0.09% FSO / °C)
	DH.....Special ranging
	DK.....Special calibration setting
	DM.....Modified full scale output
	DN.....Improved accuracy
	DQ.....Cleaning for oxygen service
	EA.....Special calibration run
	NH.....Customer specified identification
	PW.....1/8 DIN digital indicator

Note: Application of some available options may affect standard performance. Consult your Viatran representative for details.



Information is accurate to the best of Viatran's knowledge. We reserve the right to change specifications at any time.

98DSx02 REV. A

MECO MEASUREMENTS & CONTROLS
Via Paolo Uccello, 4 20148 Milano
Tel. +39 02 4 692 680 Fax +39 02 4 694 602 info@mecoitalia.it www.mecoitalia.it
Viatran A Dynisco Company