### VACUUM RESEARCH

# Battery Gauge/Transmitter, Absolute & $\Delta$ P, Built in Sensor



# **Battery Powered Integral Gauge**

Powered by a standard 9 volt alkaline battery. these Vacuum Research Integral Sensor Diaphragm Manometers are compact vacuum measurement instruments with pure silicon diaphragms that can measure or gas pressure as well as vacuum. Response time is less than 400 milliseconds for full scale and instruments are available with a variety of flanges including 15 mm, VCR, and NW-16. These instruments offer the precision and high resolution of digital electronics at very competitive prices.

## Specifications

**Pressure Range:** 1 to 1500 Torr  $\pm$  1 Torr or differential with zero at atmosphere.

**Calibration:** Any gas or vacuum compatible with sensor materials. **Accuracy:** 1% of reading or 2 Torr.

**Response Time:** Less than 400 msec. for response to a step change. **Linearity:**  $\pm$  0.15% Full Scale.

Sensitivity: ± 1 Torr.

Vacuum Connection: 1/8 NPT male thread or fits into quick connects sized for 1/8 inch pipe (0.405" dia.). NW, VCR and Mini Conflat® available. Analog Output: 0 to 1.5 VDC (1 mV/Torr) 6 X 6 modular jack with 7 foot (2 m) cable with spade lugs. Extensions may be added up to 10,000 ohms. Materials: Parts in contact with process are 316, 304 SS silicone & silicon. Sensor Internal Volume: Approximately 0.5 ml.

**Power:** Powered by standard 9 volt alkaline battery.

Battery Life: In continuous display position battery operates up to 80 hours. Momentary Display: Push switch to display reading for approx. 100 secs. Continuous Display: Displays continuously until switch is turned Off.

Operating Temperature: 0 to 50 °C (32 to 120 °F).

**Temperature Effects:** When changes occur in ambient temperature between  $0^{0}$  and 50  $^{0}$ C, reading will change no more than ±0.05% per  $^{0}$ C. **Dimensions:** 2.5 x 2.5 x 1.25 inches (63 x 63 x 32 mm).

**Mounting:** Sensor and display in one integrated package. Mount directly on your vacuum system.

Transducer Cables: None required.

Weight: Approximately 6 ounces (170 grams.)

- · Sensor and Display in One Compact Package
- 9V Battery Gives 2,000 Readings or 80 Hours
- Silicon Diaphragm Measures Vacuum or Gas
- Rugged Digital Display; No Fragile Meters!
- Mount Directly on Vacuum System with 1/8 NPT
- Variety of Flanges Available: NW-16, VCR, 15 mm
- Momentary or Continuous Easy to Read Display
- Includes 0 to 1.5 VDC Linear Analog Output
- Sensor Built in, No Transducer Cables Required



## **Ordering Information**

**Differential Gauge Pressure Instrument** with Sensor and display integrated into one package. Linear analog output included as standard. (Zero at atmosphere). 9V Battery Powered.

0 to ± 20 In. H <sub>2</sub> O, 1/8 Inch NPT P/N: 902261	\$297.
0 to ± 20 In. H <sub>2</sub> O, with 1/2 In. O.D. Tube P/N: 902262	\$334.
0 to ± 20 mmHg, 1/8 Inch NPT P/N: 902258	\$297.
0 to ± 20 mmHg, with 1/2 Inch O.D. Tube P/N: 902263	\$334.
0 to ± 15 PSI with 1/8 Inch NPT P/N: 902264	\$297.
0 to ± 15 PSI with 1/2 Inch O.D. Tube P/N: 902265	\$366.

#### Absolute Pressure Diaphragm Gauge

1 to 1500 Torr Digital Display and sensor integrated into one package. 0 to 1.5 VDC linear analog output included as standard. 9V battery powered.

Sensor and display integrated into one package

Vacuum connection 1/8 in. NPT, P/N: 902159	\$285.
Vacuum Connection NW-16, P/N: 902160	\$322.
Vacuum Connection 1/2 in., P/N: 902161	\$322.
Vacuum Connection 1.33 cf, P/N: 902162	\$322.
Spare Analog Output Cable (7 ft. or 2 M) P/N: V801152 .	\$6.

#### Rebuild or Repair Integral Sensor Battery Diaphragm Gauge

Use original P/N plus "RBLD" suffix, e.g.; 902159-RLBD. Return old gauge to factory or local distributor with purchase order . . . .\$127.