



FLUSH DIAPHRAGM IS® PRESSURE TRANSDUCERS

IPT-750 SERIES

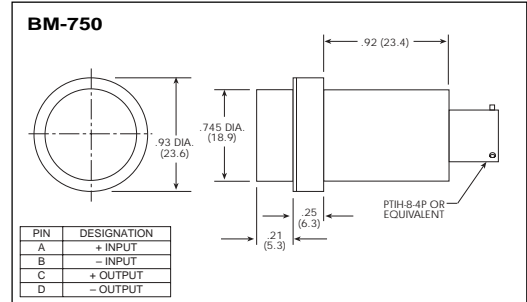
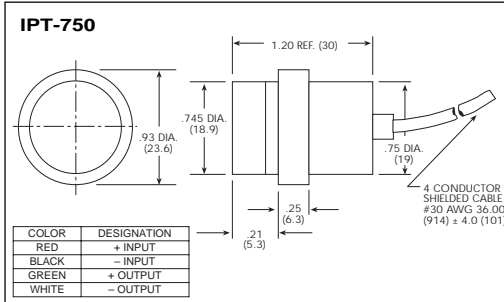
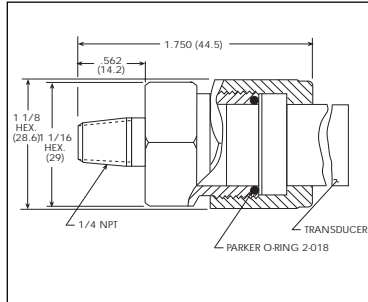
- High Output
- Hygienic Construction
- Process Instrument Compatible
- Flush Stainless Steel Diaphragm

BM-750 SERIES

- High Output
- Hygienic Construction
- Process Instrument Compatible
- Flush Stainless Steel Diaphragm
- Hermetic Sealed Connector

This midsize range of Kulite pressure sensors, incorporating flush stainless steel diaphragms, are designed as general purpose measuring instruments. These units incorporate a four arm active semiconductor chip isolated from pressure media by an oil barrier and stainless steel membrane.

Typical applications include tank contents, head pressure and soil stress measurement. The units are manufactured to allow cleaning by sterilization when used in the food processing industry and medical field. Sealing is accomplished with an o-ring. Typical mounting configuration requires a clamp situated behind the .930 diameter shoulder. By using a standard inlet port adaptor, the unit can be converted for pipe mounting applications.



| | | | | | |
|--|--|-----------|----------------------------------|-----------|-------------------|
| INPUT Pressure Range | 1.7 25 | 3.5 50 | 7 100 | 17 250 | 35 BAR 500 PSI |
| Operational Mode | Absolute, Sealed Gage, Gage (Consult Factory For Vented Gage) | | | | |
| Over Pressure | 2 Times Rated Pressure Range | | | | |
| Burst Pressure | 3 Times Rated Pressure | | | | |
| Pressure Media | Any Liquid or Gas Compatible With 17-4PH or 316 SS and Selected O-ring | | | | |
| Rated Electrical Excitation | 10 VDC/AC (RMS) | | | | |
| Maximum Electrical Excitation | 12 VDC/AC (RMS) | | | | |
| Input Impedance | 1000 Ohm (Min.) | | | | |
| OUTPUT Output Impedance | 1000 Ohm (Nom.) | | | | |
| Full Scale Output (FSO) | 100 mV (Nom.) | | | | |
| Residual Unbalance | ± 5 mV (Typ.) | | | | |
| Combined Non-Linearity, Hysteresis and Repeatability | ± 0.1% FSO BFSL (Typ.) | | | | |
| Hysteresis | ± 0.1% FSO (Typ.) | | | | |
| Repeatability | ± 0.1% FSO (Typ.) | | | | |
| Resolution | Infinitesimal | | | | |
| Natural Frequency (KHz) (Typ.) | 120 | 210 | 285 | 425 | 550 |
| Insulation Resistance | 100 Megohm Min. at 50 VDC | | | | |
| ENVIRONMENTAL Operating Temperature Range | -65° F to +250° F (-55° C to +120° C) | | | | |
| Compensated Temperature Range | +80° F to +180° F (+27° C to +80° C) Other Ranges Quoted on request | | | | |
| Thermal Zero Shift | ± 1% FSO/100° F | | | | |
| Thermal Sensitivity Shift | ± 1% FSO/100° F | | | | |
| Linear Vibration | 100g Peak, Sine 10 to 5000 Hz | | | | |
| Altitude | -150 ft. to +70,000 ft. Will Not Damage Sensor | | | | |
| Humidity | 100% Relative Humidity | | | | |
| Mechanical Shock | 100g half Sine Wave 1 msec. Duration | | | | |
| PHYSICAL Pressure Port | Flush Mount, Unthreaded (1/4" N.P.T. Male SS Adaptor Available) | | | | |
| Electrical Connection | 4 Conductor 30 AWG Shielded Cable 36" Long (IPT-750) | | PTIH-8-4P or Equivalent (BM-750) | | |
| Weight | 39 Grams Approx. (IPT-750) | | 42 Grams Approx. (BM-750) | | |
| Sensing Principle | Fully Active Four Arm Wheatstone Bridge Dielectrically Isolated Silicon on Silicon | | | | |
| Mounting Torque | 100 Inch-Pounds (Max.) For Inlet Port Adaptor | | | | |

Note: Custom pressure ranges, accuracies and mechanical configurations available.
Continuous development and refinement of our products may result in specification changes without notice - all dimensions nominal. (A)