



# FLIGHT QUALIFIED HIGH LEVEL DIGITALLY CORRECTED PRESSURE TRANSDUCER

## Model 8200 “B+” and “S” Class Electronics Available

Designed for the tough challenges and environmental rigors of space propulsion and aviation pressure testing.

### FEATURES:

- High accuracy, 0.08% RSS standard (0.05% RSS available)
- Proprietary mechanical isolation of the sensor for zero stability
- Cavity material options for extreme environments
- 10X overload option
- 0-5 Vdc Isolated or 0-10 Vdc Isolated digitally corrected output
- 100 G's Pk/Pk (3500 G shock), 1 Hr / Axis qualified
- Over 1,000,000 continuous cycles
- “B+” and “S” class electronics available
- Cleaning to MIL-STD-1246 available
- Serial port (RS-232) controlled zero & span adjustment

- Satellites: Commercial and Defense
- Ground & Engine Test
- Launch Vehicles
- Aircraft Systems / Avionics

### Heritage Includes

- NASA
- Lockheed Martin (EELV)
- Johns Hopkins APL
- Shuttle Upgrade
- Boeing
- Northrop Grumman - ABL



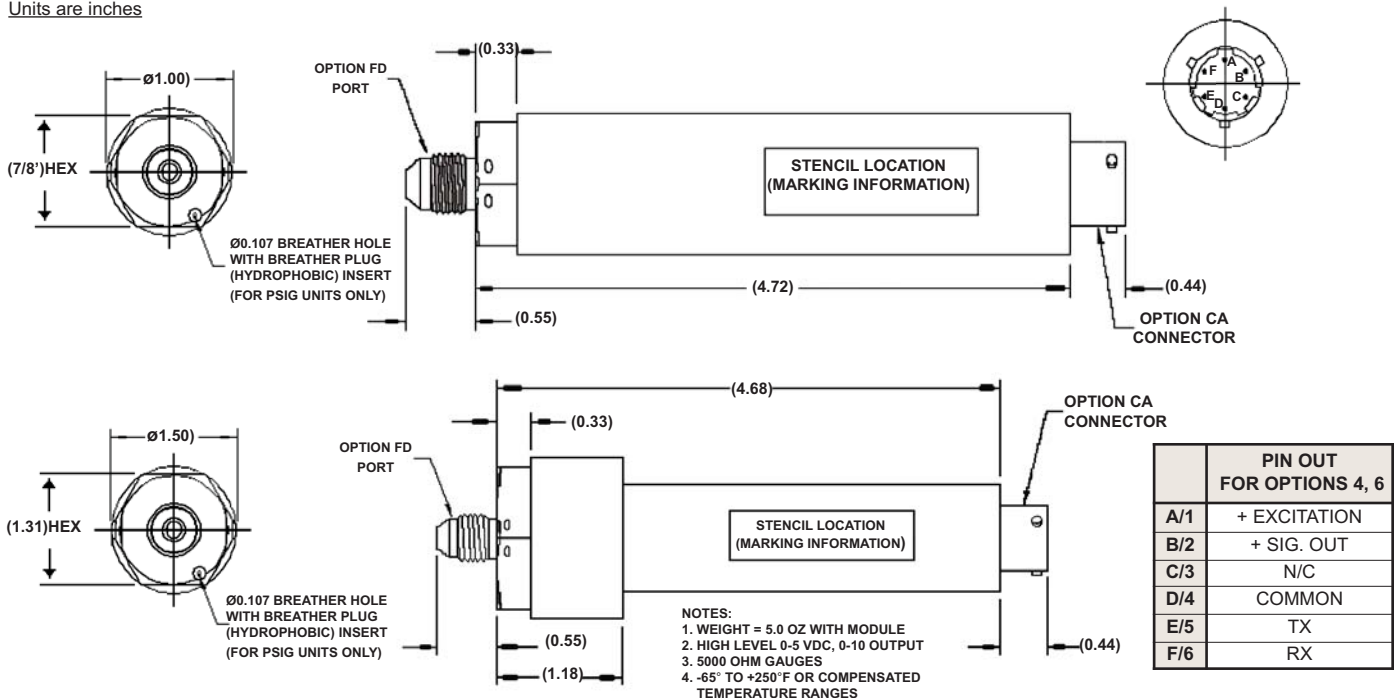
All GP:50 Aerospace pressure transducers are manufactured and tested to the following MIL-STD and MIL-Spec standards to insure the highest quality assurance:

- NIST Traceability and Calibration..... MIL-STD-45662A
- Workmanship ..... J-001 / NASA 8739.3 standards
- Quality System ..... ISO 9001:2000

Transducer Design Meets: MIL-STD-810F All Methods  
MIL-STD-461E

SEE INSTALLATION MANUAL FOR PINOUT ASSIGNMENT BASED ON ELECTRONICS OPTIONS

Units are inches



GP:50 reserves the right to make product improvements and amendments to the product specifications stated throughout this brochure without prior notification. Please contact the factory on all critical dimensions and specifications for verification.



# Pressure, Level & Temperature Transmitters & Transducers

Specifications reflect standard product, improved performance/mechanical options available. Modifications may alter specs, consult factory for more information.

Ranges	3 thru 15,000 PSIA, PSIG or PSISG options
FS Output at Rated Pressure	0-5 Vdc Isolated or 0-10 Vdc Isolated Digitally corrected output
Proof Pressure	1.5X with 25 psia min, 10X optional
Burst Pressure	3.0X (4500 secondary containment) (300 min)
Excitation or Input Voltage Reverse Polarity Protected	18V-36Vdc Unregulated, +12, +15 Vdc Regulated
Non-Repeatability	<0.04% FSO
Non-Linearity	<0.05% FSO
Hysteresis	<0.05% FSO
Thermal Error	Zero 0.225% / 100F Span 0.225% / 100F
Static Accuracy RSS	<0.08% FSO RSS, 0.05% optional
Error Band (all 5 parameters)	0.5% FSO
Pressure Medium (Wetted Materials)	316SS port, 15-5 sensor (Inconel, Hastelloy optional)
Temperature Compensation	-10°F to +180°F / -20°C to +80°C, expanded range optional
Operating/Environmental Temperature	-20°F to +190°F / -30°C to +90°C
Weight	5 oz. (some options may affect weight)
Pressure Port	MS 33656-4 (M)
Electrical Connector	PTIH-10-6P, MIL D38999 series III
Shunt Cal 80% Option	Internal
Vibration, Shock, Acceleration Designs meets MIL-STD-810C&E requirement	25 Grms / 100G's Pk/Pk / 3500 G Pyroshock / 12g
Response Time	500 ms (12 BIT Processor)
Meets MIL-STD-461 EMI/RFI	Some options will affect EMI/RFI rating

## ORDERING GUIDE:

Some options will affect dimensions, consult factory if important.  
Use the following codes to identify desired item.

MODEL	OUTPUT	RANGE	PRESSURE TYPE	OPTIONS
●	—	●	—	●

Example: 8200-4-RH-A-CA/FD/GH

### OUTPUT

2	0-5 Vdc 4 wire (Non-Isolated)
4	0-5 Vdc 4 wire (Isolated)
5	0-10 Vdc 4 wire (Non-Isolated)
6	0-10 Vdc 4 wire (Isolated)
9	0-5 Vdc 3 wire (Non-Isolated)
10	0-10 Vdc 3 wire (Non-Isolated)

### RANGE (PSI)

PG	0-3*	PZ	0-100	RO	0-1500
PJ	0-5*	RB	0-150	RR	0-2,000
PN	0-10*	RD	0-200	RT	0-3,000
PP	0-15*	RF	0-300	RV	0-5,000
PR	0-20*	RH	0-500	RX	0-7,500
PO	0-25*	RK	0-750	RZ	0-10,000
PV	0-50	RM	0-1000	SB	0-15,000

\*Can dia. 1.5"

Contact factory for non-standard pressure ranges.

### PRESSURE TYPE

A	Sealed Absolute, ref to vacuum
G	Gauge, ref to atmosphere
SG	Sealed Gauge, ref to 14.7 psia

### OPTIONS

#### CONNECTORS

CA	PTIH-10-6P Bendix
CI	D38999/27YB98PN
DB	D38999/27YA35PN

#### PORTS

FA	MS33649-4, 7/16-20 (F)
FD	MS33656-4, 7/16-20 (M)

#### MISC:

D	Improved Static Accuracy to 0.05%
GB	Alternate Full Scale Outputs
GD	10X Proof Pressure (may affect overall performance, not available with options D,GF,GK,GP) <b>Option GD (Not available on low pressure transducer)</b>
GK	Inconel Pressure Cavity
GL	Cleaning for oxygen service

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