ALL STAINLESS STEEL TRANSDUCER **MULTIMEDIA COMPATIBILITY** HIGH-PERFORMANCE SILICON TECHNOLOGY



PX309 Series

0-1 to 0-10,000 psi 0-0.07 to 0-690 bar 100 mV, 0 to 5 V, and 4 to 20 mA Outputs







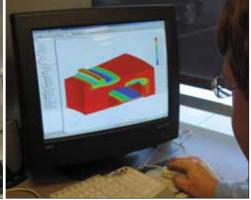
- ✓ All Stainless Steel Construction
- ✓ Gage or Absolute Pressure
- ✓ Rugged Solid State Design
- ✓ High Stability, Low Drift
- ✓ 0.25% Accuracy Typical
- ✓ IP 65 Protection Class



We provide a complete range of services from product inception, through design and prototypes, to manufacturing and testing. Our application engineers work closely with our customers to customize, design or create entirely **new products**. Call us—

whether you're an OEM, manufacturer, or end user.

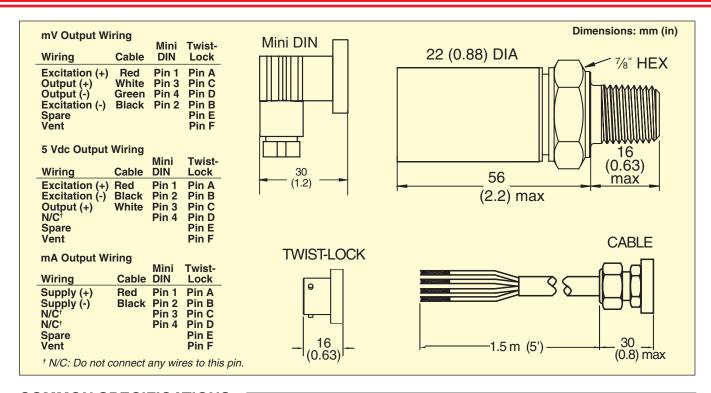








RUGGED, GENERAL PURPOSE TRANSDUCER COMMON SPECIFICATIONS



COMMON SPECIFICATIONS

OMEGA's PX309 Series models below 100 psi use a high-accuracy silicon sensor protected by an oilfilled stainless steel diaphragm. Units 100 psi and above use silicon strain gages molecularly bonded to the stainless steel diaphragm

Long-Term Stability (1 Year):

±0.25% typical

Typical Life: 10 million cycles typical Operating Temperature: -40 to 85°C (-40 to 185°F)

Proof Pressure:

All psia and ≤50 psig Ranges:

3x capacity or 20 psi, whichever is greater

100 psig Ranges: 2x capacity Burst Pressure: 500% of capacity or 25 psi, whichever is greater

Response Time: <1 ms Shock: 50 g, 11 ms half-sine

Vibration: ±20 g Protection Class: IP 65

Wetted Parts:

316 SS for all psia and 1 to 50 psig ranges; 17-4 PH stainless steel for ranges 100 to 10,000 psig

Pressure Port: ¼-18 MNPT **Electrical Connections:**

PX309: 1.5 m (5') 2-, 3-, or 4-conductor cable (mA, 5V, mV

outputs, respectively)

PX319: Mini DIN connector with

Compatible Meters/Controllers for PX309 Series Pressure Transducers

Starting at \$195, the iSeries is available in 1/32, 1/6, and 1/8 DIN programmable process controllers with serial and embedded Internet/Ethernet communications (Order El Option CNi16D). The iSeries features programmable color displays, free software and ActiveX Controls. selectable full autotune PID

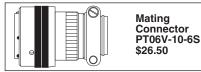


control, and NEMA 4 (IP65) rated front bezel. Ordering Examples: DPiS8, strain/process (monitor only), ½ DIN, \$300; CNiS8, strain/process controller with 2 control outputs, \$370.

mating connector included PX329: Twist-lock connector. vented mating connector sold separately (PT06V-10-6S)

Weight:

PX309: 154 g (5.4 oz) **PX319:** 100 g (3.5 oz) PX329: 100 g (3.5 oz)



Order a snubber to protect your pressure transducer! PS-4G, \$10, shown actual size. Snubbers protect sensors

from fluid hammers/spikes.

HOW TO ORDER PX309 SERIES

RUGGED, GENERAL PURPOSE TRANSDUCERS **WITH 100 mV OUTPUTS**



PX309 Series

100 mV Output 0-1 to 0-10,000 psi 0-70 mbar to 0-690 bar mini DIN connector included. shown smaller than actual size.

PX319-050GV, \$175.

NEW, LOW-PRESSURE RANGES HIGHLIGHTED

To Order *(Specify Model Number)* 1.5 m CABLE MINI DIN TWIST-LOCK CONNECTION PRICE CONNECTION PRICE CONNECTION PRICE ABSOLUTE PRESSURE PX309-005AV IPX319-005AV \$300 PX329-005AV 0 to 0.34 0 to 5 \$300 \$300 PX309-015AV PX319-015AV 215 PX329-015AV 0 to 15 195 235 0 to 1 0 to 2.1 0 to 30 PX309-030AV 195 PX319-030AV 215 PX329-030AV 235 0 to 3.4 0 to 50 PX309-050AV 195 PX319-050AV 215 PX329-050AV 235 0 to 6.9 0 to 100 PX309-100AV 195 IPX319-100AV 215 PX329-100AV 235 0 to 200 PX309-200AV PX319-200AV 215 PX329-200AV 0 to 14 195 235 0 to 300 PX309-300AV 195 PX319-300AV 215 PX329-300AV 235 GAGE PRESSURE IPX319-001GV \$300 PX329-001GV 0 to 0.07 0 to 1 PX309-001GV \$300 \$300 0 to 0.14 PX309-002GV PX319-002GV 300 PX329-002GV 0 to 2 300 300 0 to 0.34 0 to 5 PX309-005GV 300 PX319-005GV 300 PX329-005GV 300 PX309-015GV 175 PX319-015GV 175 PX329-015GV 0 to 1 0 to 15 215 0 to 2.1 0 to 30 PX309-030GV 175 PX319-030GV 175 PX329-030GV 215 0 to 3.4 0 to 50 PX309-050GV 175 PX319-050GV 175 IPX329-050GV 215 0 to 6.9 0 to 100 PX309-100GV 175 PX319-100GV 175 PX329-100GV 215 0 to 10 0 to 150 PX309-150GV 175 PX319-150GV 175 IPX329-150GV 215 0 to 14 0 to 200 PX309-200GV 175 PX319-200GV 175 PX329-200GV 215 0 to 21 0 to 300 PX309-300GV 175 PX319-300GV 175 PX329-300GV 215 0 to 34 0 to 500 PX309-500GV 175 PX319-500GV 175 IPX329-500GV 215 0 to 69 0 to 1000 PX309-1KGV 175 PX319-1KGV 175 IPX329-1KGV 215 0 to 138 0 to 2000 PX309-2KGV 175 PX319-2KGV 175 PX329-2KGV 215 0 to 207 0 to 3000 PX309-3KGV 175 PX319-3KGV 175 PX329-3KGV 215 0 to 345 0 to 5000 PX309-5KGV 175 PX319-5KGV 175 PX329-5KGV 215 0 to 517 0 to 7500 PX309-7.5KGV 175 PX319-7.5KGV 175 PX329-7.5KGV 215

Comes with certificate of conformance to specifications. Notes: 1. Units 100 psig and above may be subjected to vacuum on the pressure port without damage. 2. For alternative performance specifications to suit your application, contact Engineering.

175 PX319-10KGV

175 PX329-10KGV

Ordering Examples: PX309-100GV, 100 psi gage pressure transducer with 100 mV output @ 5 Vdc excitation and 1.5 m cable termination, \$175. PX319-015AV, 15 psi absolute pressure transducer with 100 mV output @ 10 Vdc excitation and Mini DIN termination, \$175. PX329-3KGV, 3000 psi gage pressure transducer with 100 mV output @ 5 Vdc excitation and twist-lock termination, \$215. Mating connector sold separately; order PT06V-10-6S, \$26.50. Consult Sales for OEM pricing.

Starts at \$175



- ✓ Gage or Absolute Pressure
- ✓ Low Pressure to 1 psig.
- Rugged Solid State Design
- ✓ All Stainless Steel Construction
- High Stability. Low Drift
- ✓ 0.25% Accuracy Typical

100 mV Output Specifications **Excitation:**

0 to 50 psig and All psia Ranges: 10 Vdc (ratiometric), (5 to 12 Vdc limits) 100 to 10,000 psig Ranges:

5 Vdc (ratiometric), (3 to 10 Vdc limits)

Output: 0 to 100 mV, except 2 psi = 40 mV and 1 psi = 20 mV Accuracy: ±0.25% typical; includes linearity, hysteresis and repeatability

Zero Offset: ±2% FSO; ±4% 1 and 2 psi ranges Span Setting: ±2% FSO; ±4% 1 and 2 psi ranges

Compensated Temperature: 0 to 50°C

(-18 to 122°F)

Thermal Zero and Span Effects (Over Compensated Range):

15 to 10,000 psi Ranges: ±2% FSO

5 psi Range: ±3% FSO 2 psi Range: ±4% FSO 1 psi Range: ±5% FSO

0 to 690 0 to 10,000 **PX309-10KGV**

ACCESSORIES			
MODEL NO.	PRICE	DESCRIPTION	
-NIST	\$75.00	5-point NIST-traceable calibration (must be ordered with new transducer)	
CAL-3	150.00	Recalibration: 5-point NIST traceable	
PT06V-10-6S	26.50	Mating connector for PX329	
CA-39-4PC22-5	90.00	4-conductor mating twist-lock connector with 1.5 m (5') cable for PX329	
CX5302	15.00	Extra Mini DIN connector for PX319	
ES-2272	190.00	Reference Book: Handbook of Heating, Ventilation, and Air Conditioning	

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