

2200 Series / 2600 Series- Universal Industrial Pressure Transducers

- ▶ Gauge, Absolute, Vacuum and Compound Pressure Models Available
- ▶ Submersible, General Purpose and Wash down Enclosures
- ▶ High Stability Achieved by CVD Sensing Element
- ▶ Millivolt, Voltage and Current Output Models

The 2200 series features stability and accuracy in a variety of enclosure options. The 2600 series extends the packaging options via an all welded stainless steel back end for demanding submersible and industrial applications. The 2200 and the 2600 feature proven CVD sensing technology, an ASIC (amplified units), and modular packaging to provide a sensor line that fits most applications and can easily accommodate specials while not sacrificing high performance.

Specifications

Input	
Pressure Range	Vacuum to 400 bar (6000 psi)
Proof Pressure	2 x Full Scale (FS) (1.5 x Fs for 400 bar, >= 5000 psi)
Burst Pressure	>35 x FS <= 6 bar (100 psi); >20 x FS >=60 bar (1000 psi); >5 x FS <= 400 bar (6000 psi)
Fatigue Life	Designed for more than 100 million FS cycles
Performance	
Long Term Drift	0.2% FS/year (non-cumulative)
Accuracy	0.25 % FS typical (optional 0.15% FS)
Thermal Error	1.5% FS typical (optional 1% FS)
Compensated Temperatures	-20° to 80° C (-5° to 180° F)
Operating Temperatures	-40° to 125° C (-40° to 260° F) for elec. codes A, B, C, 1 -20° to 80° C (-5° to 180° F) for elec. codes 2, D, G, 3 -20° to 50° C (-5° to 125° F) for elec. codes F,M, P Amplified units >100°C maximum 24 Vdc supply
Zero Tolerance	1% of span
Span Tolerance	1% of span
Mechanical Configuration	
Pressure Port	see ordering chart
Wetted Parts	17-4 PH Stainless Steel
Electrical Connection	see ordering chart
Enclosure	316 ss, 17-4 PH ss IP65 for elec. codes A, B, C, D, G, 1, 2, 3 IP67 for elec. code "F" IP68 for elec. codes M, P IP30 for elec. code "3" with flying leads
Vibration	35g peak sinusoidal, 5 to 2000 Hz
Acceleration	100g steady acceleration in any direction 0.032% FS/g for 1 bar (15 psi) range decreasing logarithmically to 0.0007% FS/g for 400 bar (6000 psi) range.
Shock	Withstands free fall to IEC 68-2-32 procedure 1
Approvals	CE
Weight	approx. 100 grams (additional cable; 75 g/m)

Individual Specifications

Millivolt Output units	
Output	100 mV +/-1 mV
Supply Voltage (Vs)	10 Vdc (15 Vdc max.) Regulated
Bridge resistance	2600-6000 ohms
Voltage Output units	
Output	see ordering chart
Supply Voltage (Vs)	1.5 Vdc above span to 35 Vdc @ 6 mA
Supply Voltage Sensitivity	0.01% FS/Volt
Min. Load Resistance	(FS output / 2) Kohms
Current Consumption	approx 6 mA at 7.5V output
Current Output units	
Output	4-20 mA (2 wire)
Supply Voltage (Vs)	24 Vdc, (7-35 Vdc)
Supply Voltage Sensitivity	0.01% FS/Volt
Max. Loop Resistance	(Vs-7) x 50 ohms



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Connection Code		mV Units				Current units (4-20mA)			Voltage units				
		IN+	OUT+	OUT-	IN-	(+)	(-)	EARTH	IN+	COM	OUT+	EARTH	
A, B, G	“DIN”	PIN	1	2	3	E	1	2	4	1	2	3	4
C	“10-6 Bayonet”	PIN	A	B	C	D	A	B	E	A	C	B	E
D	“cable”		R	Y	BL	G	R	BK	DRAIN	R	BK	W	DRAIN
F	“IP 67 cable”		R	Y	BL	G	R	BL	DRAIN	R	B	W	DRAIN
M, P	“Immersible”		R	Y	BL	W	R	BL	DRAIN	R	W	Y	DRAIN
1	“8-4 Bayonet”	PIN	A	B	C	D	A	B	D	A	C	B	D
2	“cable”		R	W	G	BK	R	BK	DRAIN	R	BK	W	DRAIN
3	“conduit & cable”		R	W	G	BK	R	BK	DRAIN	R	BK	W	DRAIN

Cable Legend:

R = Red
BL = Blue
BK = Black
W = White
G = Green
Y = Yellow

How to Order

Use the **bold** characters from the chart below to construct a product code

Series 2200 2600

Output A - 100 mV C - 1-6V J - 0.5-5.5V
B - 4-20mA D - 1-11V R - 0-5V
H - 1-5V S - 0-10V

Pressure Datum A* - Absolute G - Gauge
*Max absolute range is 25 bar.

Pressure Range - bar (see note 3)
A10 - 0-1 B25 - 0-25 Vac = -1 bar
A16 - 0-1.6 B40 - 0-40 1A0 - Vac-0
A25 - 0-2.5 B60 - 0-60 1A6 - Vac-0.6
A40 - 0-4 C10 - 0-100 2A5 - Vac-1.5
A60 - 0-6 C16 - 0-160 4A0 - Vac-3
B10 - 0-10 C25 - 0-250 6A0 - Vac-5
B16 - 0-16 C40 - 0-400 1B0 - Vac-9
1B6 - Vac-15
2B5 - Vac-24
4B0 - Vac-39

Pressure Range - psi (see note 3)
F15 - 0-15 G60 - 0-600 Vac = -15 psi
F30 - 0-30 H10 - 0-1,000 1F5 - Vac-0
F60 - 0-60 H15 - 0-1,500 3F0 - Vac-15
G10 - 0-100 H20 - 0-2,000 6F0 - Vac-45
G15 - 0-150 H30 - 0-3,000 1G0 - Vac-85
G20 - 0-200 H40 - 0-4,000 1G5 - Vac-135
G30 - 0-300 H50 - 0-5,000 2G0 - Vac-185
G50 - 0-500 H60 - 0-6,000 3G0 - Vac-285

Pressure Port 01 - G1/4 External 08 - 1/8-27 NPT External
02 - 1/4-18 NPT External 09 - G1/8 Internal
03 - G1/2 Manometer 00 - G1/4 Internal
04 - 7/16-20UNF to SAE J514 0A - R1/4 External **Others** - Consult
05 - G1/4 Ext. Soft Seal 19 - Nose Cone (2600 Only) Factory

Electrical Connection 2200 Series 2600 Series
A - Mini 4 PIN DIN (Micro) Mating Connector Supplied C - Fixed Plug Size 10-6 Mating Plug Not Supplied
B - 4 PIN DIN (Micro) Mating Connector Not Supplied G - Fixed Plug To DIN 43650 Mating Plug Supplied
2 - Cable Nema 4 USA M - Moulded Cable Immersible Max. (See Note 1)
D - Cable Weatherproof IP65 Europe P - Moulded Detachable Immersible Cable (See note 1/2)
F - Cable Gland Metal IP67 1 - Fixed Plug Size 8-4 Mating Plug Not Supplied
3 - Conduit Connector 1/2NPT Ext. 1M Cable (See Note 2)

Performance Code
Accuracy/Thermal
A - .25%/1.5%
B - .15%/1.0%

Cable Length
U - No Cable Fitted (See Notes 1 and 2)
D - 1 Metre (3 feet)
E - 3 Metres (9 feet)
F - 5 Metres (16 feet)
G - 10 Metres (32 feet)

Apparatus Protection
2 - mV Only Transient Protection CE Mark
3 - Amplified Only RFI Protected CE Mark

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Notes:

- Where electrical connection **-M** is specified, customer must select cable length from Table 1.
- Where electrical connection **-3** or **P** and cable length **-U** occur in part number, the unit will be supplied with flying leads (IP30).
- Additional Pressure Ranges are available. Minimum range 500mb - please consult factory.

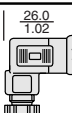
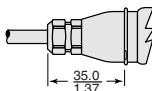
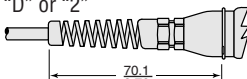
Table 1 - Cable Units

(2600 Series) (2200 Series select "U" through "G")

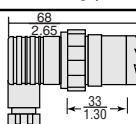
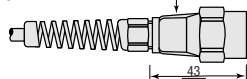
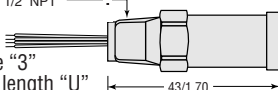
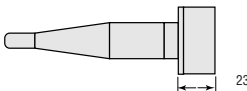
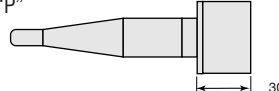
Code	Length (M)	Code	Length (M)	Code	Length (M)	Code	Length (M)	Code	Length (M)
U	No Cable Fitted	F	5	K	25	P	75	4	170
		G	10	L	30	Q	100	5	200
D	1	H	15	M	40	R	125	6	225
E	3	J	20	N	50	S	150		

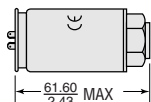
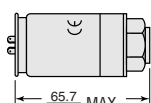
Dimensions

2200 Series

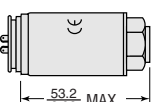
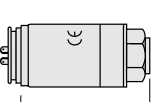
Mini 4 Pin Connector	
Code "B"	
Mini 4 Pin Connector (mate supplied)	
Code "A"	
IP67 Cable	
Code "F"	
IP65 or NEMA4 Cable	
Code "D" or "2"	

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10-6 or 8-4 Mil-C Connector	
10-6 Code "C"	
8-4 Code "1"	
Large DIN 43650 Plug (mate supplied)	
Code "G"	
Conduit Connector with Cable	
Code "3" 1/2" NPT	
Conduit Connector with Flying Leads	
Code "3" 1/2" NPT	
Moulded, Immersible Cable	
Code "M"	
Detachable Moulded, Immersible Cable	
Code "P"	

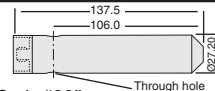
mV Gauge/Absolute Amplified Gauge

Amplified Absolute


Maximum diameter 27.3 mm (1.07")

mV Gauge/Absolute Amplified Gauge

Amplified Absolute


Maximum diameter 27.3 mm (1.07")

G 1/4 Internal
Code "00" 
G 1/4 External
Code "01" 
1/4 - 1/8 NPT
Code "02" 
G 1/2 Manometer
Code "03" 
7/16-20 UNF-2A
Code "04" 
G 1/4 Soft Seal
Code "05" 
1/8-27 NPT
Code "08" 
R 1/4
Code "0A" 
G 1/8 Internal
Code "09" 

Nose Cone - Black Acetal
Code "19" 
Nose Cone Sink Weight

Code "29" Through hole Ø 10.0

Others - Consult factory

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