Features

- Semi-Flush Mount Pressure Transmitter
- Piezo-resitive sensor, ceramic of silicon
- Accuracy <+0.25% FS BFSL
- Various outputs including Volts and mA
- Pressure ranges from 100mbar to 100 bar
- Pressure reference, Gauge or Absolute
- G3/4” BSP Pressure port connection

RS PRO Pressure Sensors

RS Stock No.: 828-5757, 828-5763, 828-5773, 828-5776, 828-5782, 828-5811, 828-5820

RS PRO is the own brand of RS. The RS PRO Seal of Approval is your assurance of professional quality, a guarantee that every part is rigorously tested, inspected, and audited against demanding standards. Making RS PRO the Smart Choice for our customers.

Product Description

This semi-flush mount pressure transmitter RS PRO range, has a piezo-resistive silicon or ceramic pressure sensor.
The sensor is semi-flush to the housing making this product ideal for viscous or paste like media.
The sensor and housing are made from stainless steel with a choice of internal 'O' ring seals to ensure the product is suitable for a wide range of applications.
The electronics incorporate a microprocessor-based amplifier, requiring no adjusting and giving stable electronics - especially in high vibration or shock applications.
*Every device is temperature compensated, calibrated and supplied with a traceable serial number and calibration data.**
**Calibration data is supplied as a sticker affixed to the product packaging - do not discard.*

Suitable Applications
Environmental engineering • Static tank level • Viscous and paste-like media • Composite manufacturing • Process control • Automotive testing • Process pumping • Sewage or grey water • Injection moulding or infusion • Aggressive media

Performance

Accuracy (Non-linearity & Hysteresis)	<+0.25% / FS (BFSL)	
Setting Errors (Offsets)	2-wire	Zero & Full Scale, <+0.5% / FS
	3-wire	Zero & Full Scale, <+0.5% / FS
Permissible Load	2-wire	Rmax = [(VS-VSmin)/0.02] Ω
	3-wire	Rmin = 10kΩ
Influence Effects	Supply	<0.005% FS / 1V
	Load	0.05% FS0 / kΩ

Material

Housing Material	303 Stainless Steel
"O" Ring Seals	Viton
Diaphragm Material	316L Stainless Steel or Ceramic
Media Wetted Parts	Housing & process connection, 'O' ring seal, diaphragm

Miscellaneous

Current Consumption	2-wire Limits at 28mA
	3-wire Typical 6mA

Electrical Protection

Supply Reverse Polarity	No damage/no function
Electromagnetic Compatibility	CE EMC directive EN 61326-1:2013

Environmental Condtions

Shock	100g / 11s
Vibration	10g RMS (20 – 2000Hz
Media Temperature	-40°C to +125°C
Ambient Temperature	-20°C to +80°C
Storage Temperature	-40°C to +125°C
Humidity	5% to 95% RH non-condensing

Temperature & Thermal Effects

Compensated Temperature Range	+20°C to +80°C
Thermal Zero Shift (TZS)	<+0.04% /FS/°C
Thermal Span Shift (TSS)	<-0.015% /°C

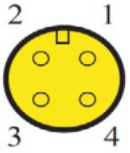
Input Pressure Ranges

Nominal Pressure, Gauge	bar	0.1	0.5	1	2	5	10	20	50	100
Nominal Pressure*, Absolute	bar			1	2	5	10	20		
Nominal Pressure*, Compound	bar			-1 to +1		-1 to +5	-1 to +9	-1 to +19		
Permissible Overpressure	bar	2	2		4	10	15	35	100	150

*Ceramic sensor only

Output Signal & Supply Voltage

Wire System	Output	Supply Volts	Connection	Pin No. (M12 4-pin connector)
2-wire	4 – 20mA	9 – 32V dc	+ve Supply	Pin 1
			-ve Supply	Pin 2
			Ground	Pin 3
3-wire		14 – 32V dc	+ve Supply	Pin 1

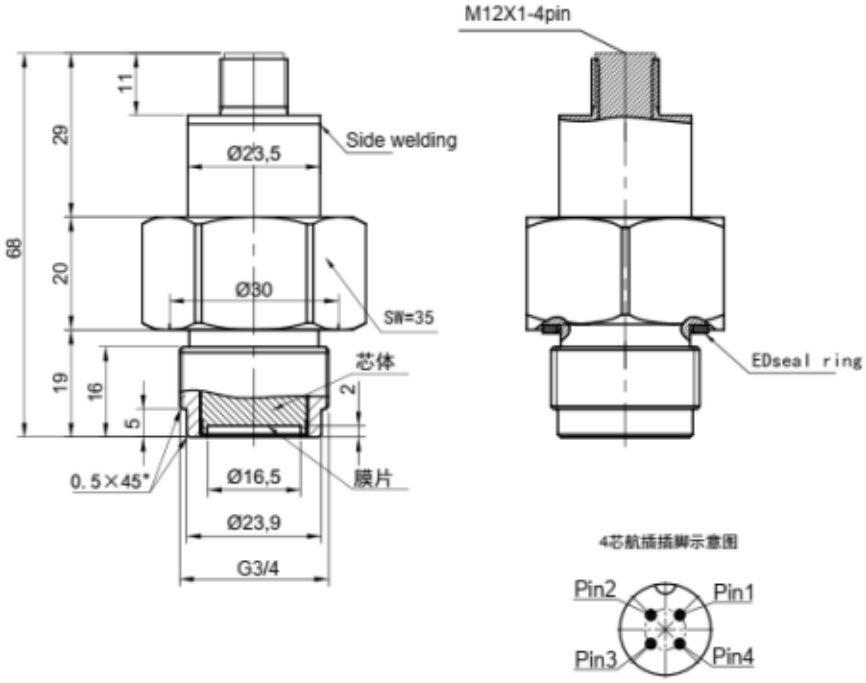


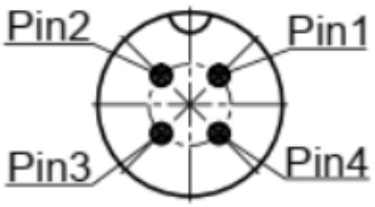
	0 – 10Vdc (non-ratiometric)		-ve Supply	Pin 2
			+ve Output	Pin 3
			Ground	Pin 4

Range

RS Stock No.	Sensor Type	Pressure Range	Output
828-5757	Silicon	0-500 mBar G (0-7.25psi)	4-20mA
828-5763	Ceramic	0-5 Bar G (0-73psi)	4-20mA
828-5776	Ceramic	0-20 Bar G (0-290psi)	4-20mA
828-5773	Ceramic	0-100 Bar G (1450psi)	4-20mA
828-5782	Silicon	0-100 mBar G (0-1.4psi)	0-10V
828-5811	Ceramic	-1 to +1 Bar G (-14.5 to +14.5psi)	4-20mA
828-5820	Ceramic	0-1 Bar Abs (0-14.5psiA)	4-20mA

All dimensions are in millimeters.





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