



Model 267

Very Low Differential Pressure Transducer

Features

- Optional 3.5 Digit LCD Display w/ 0.5% FS Accuracy
- NEMA 4 Rated Housing
- Optional Static Pressure Probe
- PG-9, PG-13 or Conduit Electrical Termination
- 24 VAC or 24 VDC Excitation
- CE & RoHS Compliant
- Suitable for Harsh Environments
- Optional LCD Display
- $\pm 0.25\%$, 0.4%, 0.5%, 1% FS Accuracy

Applications

- HVAC Systems
- Energy Management Systems
- Static Duct Pressure
- Cleanroom Pressure
- Oven Pressurization & Furnace Draft Controls

Setra's Model 267 is the most rugged high accuracy, low differential pressure transducer on the market. It delivers accuracies of $\pm 1\%$ FS (without display), $\pm 0.5\%$ FS (with display), and optional $\pm 0.25\%$ FS and $\pm 0.4\%$ FS accuracies, and pressure ranges from 0.1" W.C. up to 100" W.C. The 267 is housed in a robust, NEMA 4 rated enclosure and has an optional static pressure probe reducing installation and material costs. The 267 is offered with an optional LCD display and a standard accuracy of $\pm 0.5\%$ making it ideal for high accuracy Pharmaceutical applications.

Customization is standard

The 267, unlike most competitors, offers many mechanical and electrical options that can be integrated into existing designs. The optional 0.25" diameter pressure probe is made of sturdy extruded aluminum and is designed with baffles to prevent velocity pressure errors which saves money and reduces time on the job site.

Robust enclosure for difficult applications

The 267 is housed in a NEMA 4 rated housing and is built to withstand harsh environments. The 267 is available in both wall and duct mount providing the installer with flexible mounting options. The wall mount allows the sensor to be installed anywhere, whereas the duct probe configuration is designed to maximize space efficiency in difficult applications.

The Setra sensor

The core technology of the 267 is the all stainless steel capacitive sensing element. Setra designs and manufactures all of their sensing elements resulting in full control over the process and quality of every single sensor. The welded dead-ended capacitive sensors requires minimal amplification and delivers excellent accuracy and longterm stability. Setra's technology has been used in over 8 million installations and has the highest field acceptance rate in the industry.

Specifications

Performance data

	Standard	Optional	
Accuracy RSS ¹ (at constant temp)	±1.0% FS	±0.4% FS	±0.25% FS
Non-linearity, BFSL	±0.98% FS	±0.38% FS	±0.22% FS
Hysteresis	±0.10% FS	±0.10% FS	±0.10% FS
Non-repeatability	±0.05% FS	±0.05% FS	±0.05% FS

Position effect: consult factory

Physical description

Case	IP65/NEMA 4 Plastic Glass-Filled Polycarbonate UL94V-O Case
Electrical connection	Screw Terminal Strip Inside of Case
Electrical Terminations	PG-9/PG13.5 Strain Relief, 1/2" Conduit Opening, or 9 Pin D-Sub Connector*
Zero and Span Adjustments	Accessible Inside of Case
Weight (approx.)	9.0 Ounces (255 grams) 9.5 Ounces (Duct Probe Assembly)

Electrical data (Voltage)

Circuit	3-Wire (Exc, Gnd, Sig), Protected from Miswiring
Excitation (for 0-5 VDC Output)	9 to 30 VAC /12 to 40 VDC
Excitation (for 0-10 VDC Output)	11 to 30 VAC /13 to 40 VDC
Output ³	0 to 5 VDC ⁵ / 0 to 10 VDC ⁵

¹ RSS of Non-Linearity, Hysteresis, and Non-Repeatability.

² Units calibrated at nominal 70°F. Maximum thermal error computed from this datum.

³ Calibrated into a 50K ohm load, operable into a 5000 ohm load or greater.

⁴ Zero output factory set to within ±0.16 mA (±0.08 mA for optional accuracies). Span (Full Scale) output factory set to within ±0.16 mA (±0.08mA for optional accuracy).

⁵ Zero output factory set to within ±50mV (±25 mV for optional accuracies).

Span (Full Scale) output factory set to within ±50mV (±25 mV for optional accuracies)

⁶ Operating temperature limits of the electronics only. Pressure media temperatures may be considerably higher.

⁷ Calibrated at factory with a 24 VDC loop supply voltage and a 250 ohm load.

Electrical data (current)

Circuit	2-Wire, Protected from Miswiring
Output ⁷	4 to 20 mA ⁴
Bidirectional Output at Zero	12 mA
Min. Loop Supply Voltage (VDC)	9 + 0.02 x (Resistance of Receiver plus line)
Max. Loop Supply Voltage (VDC)	30 + 0.004 x (Resistance of Receiver plus line)

Pressure media

Thermal Effects^{2,3}

Compensated Range °F (°C)	+40 to +150 (+5 to +65)
Zero/Span Shift %FS/°F (°C)	±0.033 (±0.06)
Maximum Line Pressure	10 PSI
Overpressure	Up to 10 PSI (Range Dependent)
Long-Term Stability	0.1% FS Total

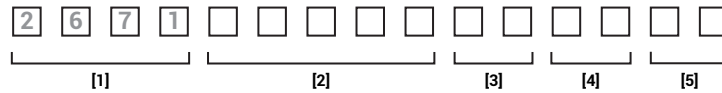
Environmental data

Operating ⁶ Temperature °F (°C)	0 to +150 (-18 to +65)
Storage Temperature °F (°C)	-65 to +180 (-54 to +82)

Ordering information

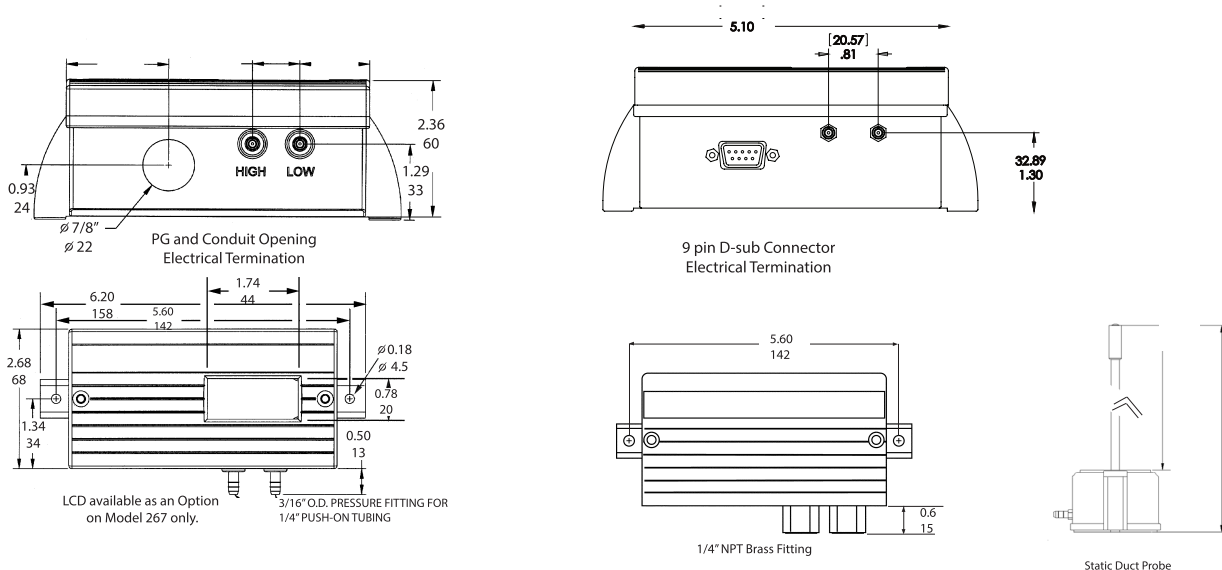
Example part number: 2671R25WD11G2CN

0 to .25 in. WC Unidirectional Range, 4-20 mA Output, 3/16" Barbed Brass Fitting, PG-9 Electrical Termination, 1% Accuracy with LCD Display



[1]		[2]	or	[2]	[3]	[4]	[5]
Model		Range ¹ (unidirectional)		Pressure range ¹ (bidirectional)	Output	Pressure Fitting/Elec. Termination	Accuracy (Full Scale)
2671	267	OR1WD 0 to 0.1 "W.C.		OR1WB ±0.1" WC	11 4-20 mA	3/16" Barbed Brass Fitting	CN ±1% FS with no LCD Display
		R25WD 0 to 0.25"W.C.		R25WB ±0.25" WC	2D 0-5 VDC	G1 PG-13.5 Strain Relief	CD ±1% FS with LCD Display
		OR5WD 0 to 0.5"W.C.		OR5WB ±0.5" WC	2E 0-5 VDC	G2 PG9 Strain Relief	EN ±0.4% FS* with no LCD Display
		001WD 0 to 1"W.C.		001WB ±1" WC		D9' 9 pin D-Sub Conn.	FN ±0.25% FS* with no LCD Display
		1RSWD 0 to 1.5"W.C.		1RSWB ±1.5"W.C.		A1 1/2" Conduit Opening	GN ±1% FS* with no LCD Display
		2R5WD 0 to 2.5"W.C.		2R5WB ±2.5"W.C.		1/4"NPTF Brass Fitting	HD ±0.5% FS* with LDC Display
		005WD 0 to 5.0"W.C.		005WB ±5.0"W.C.		1K PG-9 Strain Relief	ED ±0.4% FS* with LDC Display
		010WD 0 to 10"W.C.		010WB ±10"W.C.		2K PG-13.5 Strain Relief	FD ±0.25% FS* with LDC Display
		025WD 0 to 25"W.C.		025WB ±25"W.C.		9K 9 Pin D-Sub Conn.	
		050WD 0 to 50"W.C.		050WB ±50"W.C.		AK 1/2" Conduit Opening	
		100WD 0 to 100"W.C.		100WB ±100"W.C.		Static Duct Probe	
		025LD 0 to 25 Pa		025LB ±25 Pa		1P 1/2" Conduit Opening	*Includes Cal. Cert
		050LD 0 to 50 Pa		050LB ±50 Pa		2P PG-13.5 Strain Relief	
		100LD 0 to 100 Pa		100LB ±100 Pa		9P 9 Pin D-Sub Conn..	
		250LD 0 to 250 Pa		250LB ±250 Pa		AP 1/2" Conduit Opening	
		500LD 0 to 500 Pa		500LB ±500 Pa			
		10CLD 0 to 1000 Pa		10CLB ±1000 Pa			
		25CLD 0 to 2500 Pa		25CLB ±2500 Pa			
		40CLD 0 to 4000 Pa		40CLB ±4000 Pa			
		70CLD 0 to 7000 Pa		70CLB ±7000 Pa			

Dimensions





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