

Sub-Miniature Pressure Sensor



Features

- ➔ Available with 0,5-4,5Vdc output
- ➔ Operating from -40 to +125°C
- ➔ Ultra light sensor : 3 grams
- ➔ Pressure ranges from -1 to 250bar

Applications

- ➔ Automotive - on vehicle
- ➔ Machine construction
- ➔ Medical instruments
- ➔ Automation & Robotics

The PST860 series is a miniature pressure sensor. Operating from -40 up to +125°C, three compensated temperature ranges are available to best suit your application's environment. Its wetted parts being stainless steel, it is compatible with most media, including corrosive fluids used in automotive and aerospace industries. High performances and stability over temperature are achieved thanks to EFE proprietary sensing technologies. The robust and proven design of the sensor ensures reliability in your application. The PST860 series is available with unamplified (mV/V) and amplified voltage output (0,5-4,5Vdc), integrating a high performance and ruggedized electronic module.

Technical specifications

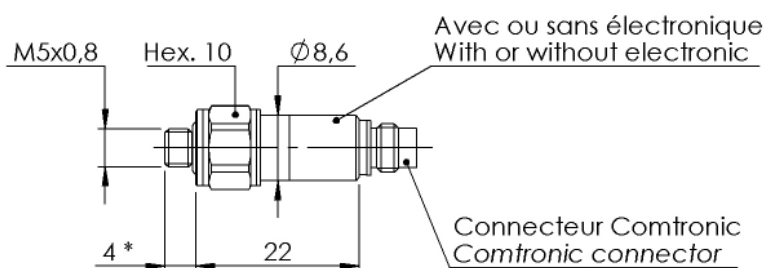
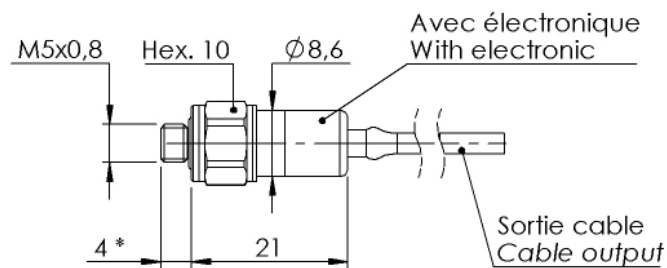
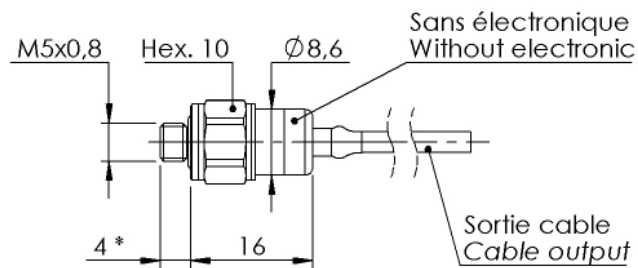
Pressure ranges (FS)	-1/+4bar ; -1/+9bar ; 5bar ; 10bar ; 20bar ; 40bar ; 70bar ; 250bar ; -14.5/+50PSI ; -14.5/+140PSI ; 70PSI ; 150PSI ; 300PSI ; 500PSI ; 1000PSI ; 3000PSI
Type	Absolute ; Gage
Type (for ranges > 40 bar)	Sealed Gage
Safe overload	150% FS
Burst pressure	300% FS
Power supply	8 to 16Vdc
Consumption	< 10mA
Insulation	> 1000 MOhms under 50Vdc at ambient temperature
Output at -100%FS (only for $\pm$ range)	0.5Vdc
Output at 0%FS (except ranges $\pm$)	0.5Vdc
Output at 100%FS	4.5Vdc
Zero and sensitivity settings tolerances	$\pm$ 50mV

Technical Specifications

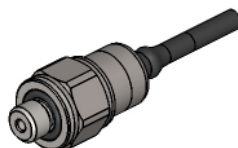
Non linearity and hysteresis combined	±0.25% FS typical (±0.35% FS max.)
Non repeatability	±0.02% FS typ.
Signal bandwidth	1000Hz @ -3dB Option : Special Adjustment up to 3000Hz @ -3dB
Compensated temperature range	0 to +60°C Option : -25 to +85°C ; -25 to +125°C
Operating temperature range	-40 to +125°C
Combined thermal zero & sensitivity shifts	±0.02% FS/°C
Constant acceleration in linear vibrations	± 0.02% FS/g (frequency 20-2000Hz, 50g max.)
Mechanical shock	100g ½ sinus 1ms
Electrical protection	Not protected against polarity inversion
EMC protection	Compliant to EN61000
Electrical connection	AWG32 4 wires Ø1.6mm Shielded Teflon Cable & Polyolefine Sleeve
Mechanical connection	M5x0.8-6g male
Material(s) of wetted parts	Stainless Steel 316L ; Stainless Steel 17-4PH ; Stainless steel 15-5PH
Weight	3g without cable
Enclosure protection	IP65 for sealed gage version

Codification

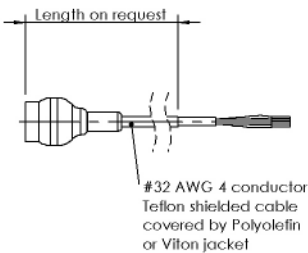
Sub-Miniature Pressure Sensor	PST86	7	S	10bar	G	05	17/1m	A	3	1	B	
Output Signal												
0.5-4.5Vdc unregulated power supply		7										
Material												
Stainless Steels			S									
Range												
Example				10bar								
Type												
Gage					G							
Sealed Gage					SG							
Mechanical connection												
M5x0.8-6g male						05						
Electrical connection												
AWG32 4 wires Ø1.6mm Shielded Teflon Cable & Polyolefine Sleeve							17/1m					
Compensated temperature range												
0 to +60°C								A				
-25 to +85°C								B				
-25 to +125°C								C				
Non linearity and hysteresis combined												
±0.25% FS typical (±0.35% FS max.)									3			
Combined thermal zero & sensitivity shifts												
±0.02% FS/°C										1		
Options												
Special Adjustment up to 3000Hz @ -3dB											B	



* Option filetage allongé 10 mm
10 mm lengthened thread option



DIMENSIONS : mm

	4 CONDUCTOR TEFLON CABLE		
	VOLTAGE OUTPUT	CONDUCTOR	
	+ EXCITATION	RED	
	+ SIGNAL	GREEN	
	0 VOLT	BLACK	
	NC	WHITE	
	SENSOR HOUSING	SHIELD	

Agent :



E.F.E.

L'ESSOR FRANCAIS ELECTRONIQUE

16 Rue Porte a Bateaux - 27540 Ivry-la-Bataille - FRANCE

Tel : 33 (0)2 32 22 35 05 - Fax : 33 (0)2 32 36 93 08

www.efc-sensor.com - infos@efc-sensor.com