



FEATURES

- ◆ M6x1 thread
- ◆ Flush Diaphragm
- ◆ For Static and Dynamic Applications
- ◆ High Level Tension Output Available
- ◆ Low Installation Torque Sensitivity

APPLICATIONS

- ◆ Explosion test benches
- ◆ Extreme Miniature Devices
- ◆ Robotics and actuators
- ◆ Breaking system pressure
- ◆ Laboratory and research

XPM6

Miniature pressure sensor

SPECIFICATIONS

- ◆ Ranges 100 to 1000 bars [1.5k to 15k psi]
- ◆ Sealed and gauge pressure reference
- ◆ Stainless steel housing
- ◆ Linearity $\pm 0.25\%$ F.S.

The **XPM6** is a miniature transducer made of stainless steel designed to measure static and dynamic pressure under a wide variety of conditions, including hostile environments.

The **XPM6**'s sensing element is a fully temperature compensated Wheatstone bridge made with high stability micro-machined silicon strain gauges. For protection against thermal flash/explosive testing up to 1000 ° C [1832 ° F] the option **MH** allows inserting extra protection into the "H" shape diaphragm.

The **XPM6** incorporates TE CONNECTIVITY's cutting edge SanShift™ technology, which virtually eliminates zero shifts caused by installation torque.

On request, Instruction documents can be provided to ease the selection and use of our sensors and provide helpful tips.

STANDARD RANGES

Full Scale (FS)		Pressure Reference			Resonant Frequency	Sensitivity "FSO"	Overpressure	Burst Pressure
bar	psi	Gauge	Abso.	Sealed		(non amplified)	(rated pressure)	(rated pressure)
100	1.5k	*		*	415 kHz	10 mV/V	2 x FS	3 x FS
200	3k	*		*	415 kHz	10 mV/V	2 x FS	3 x FS
350	5k	*		*	575 kHz	10 mV/V	2 x FS	3 x FS
500	7.5k	*		*	750 kHz	10 mV/V	2 x FS	3 x FS
1000	15k	*		*	910 kHz	10 mV/V	2 x FS	3 x FS

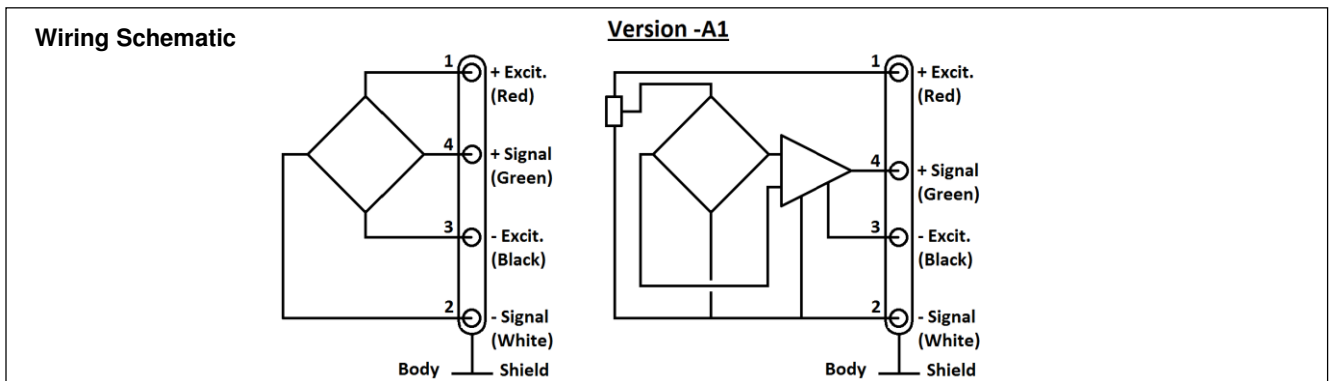
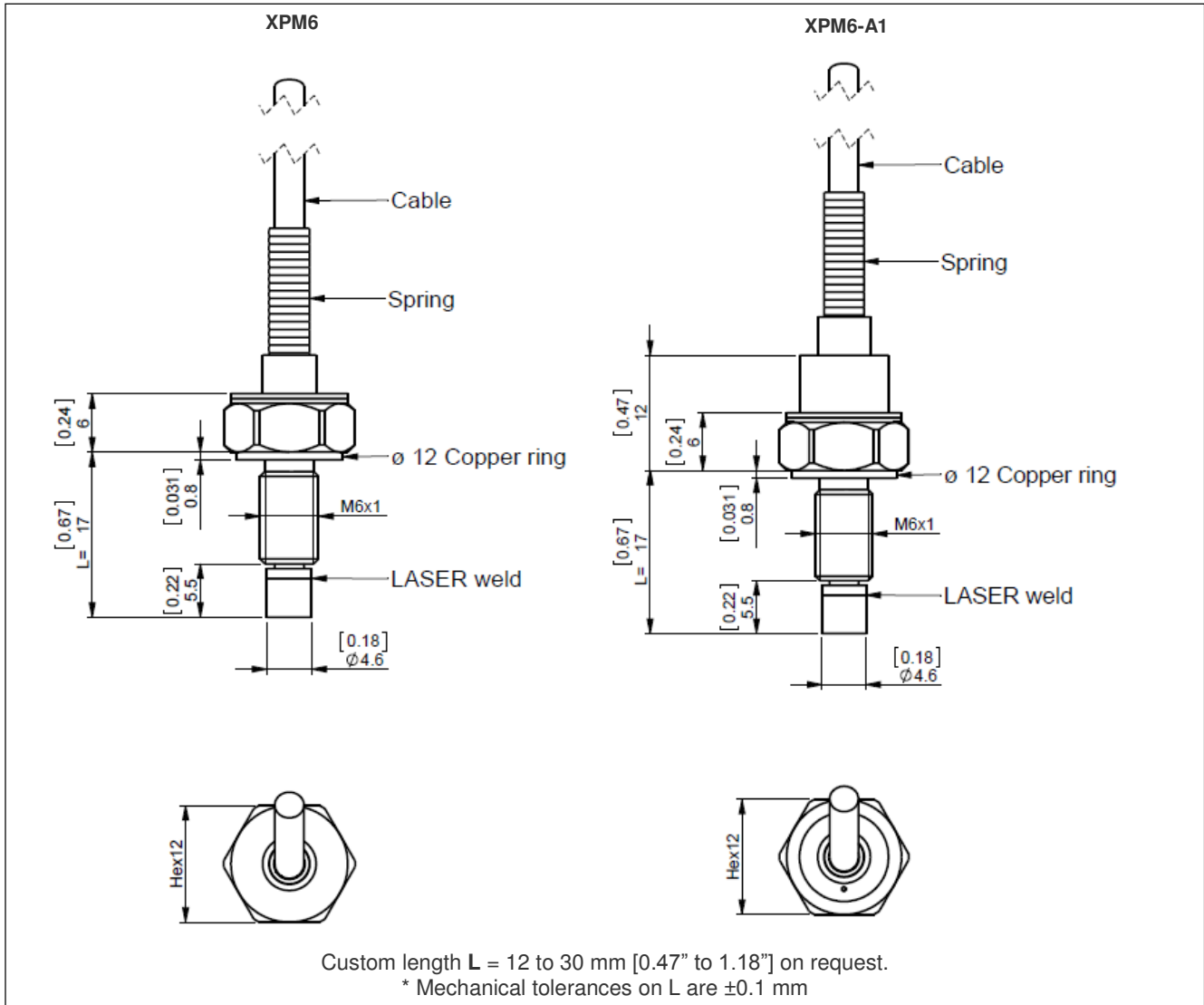
PERFORMANCE SPECIFICATIONS (all values are typical at ambient temperature 23±3°C)

Parameters	Non amplified	Amplified (A1 opt.)	Notes
Power supply	10 Vdc regulated	10 to 30 Vdc	
Sensitivity "FSO"	See previous table	4 V ±0.2 V	Signal 0.5 V - 4.5 V for A1 option
Zero Offset	±1 mV/V	0.5 V ±0.2 V	
Non Linearity	±0.25%FS		
Hysteresis	±0.25%FS		
Repeatability	±0.2%FS		
Operating Temperature (OTR)	-40 to 150°C (-40 to 302°F)	-40 to 120°C (-40 to 248°F)	
Compensated Temperature (CTR)	0 to 60°C (32 to 140°F)	0 to 60°C (32 to 140°F)	
Thermal Zero Shift in CTR (TZS)	<±2.5%FS/50°C		
Thermal Sensitivity Shift in CTR (TSS)	<±2% of reading /50°C		
Input Impedance or consumption	1500 Ω nom.	< 30 mA	
Output Impedance	800 Ω nom.	1000 Ω	
Ingress Protection	IP50		
Media – Pressure Port	Fluids compatible with stainless steel		

Insulation under 50Vdc ≥100MΩ

CE certification according to EN 61010-1, EN 50081-1, EN 50082-1.

DIMENSION & WIRING SCHEMATIC (IN METER AND IMPERIAL)



Notes:

1. Recommended Tightening Torque: 5 N.m [44 lbf.in] to 10 N.m [88 lbf.in]
2. Sealing: One FKM sealing ring is supplied with the sensor (operating temperature -30 to 150°C)
3. Electrical connection: Standard = 2m of shielded cable $\varnothing 3$ mm with 4 wires AWG30, Silicon jacket

XPM6

Miniature pressure sensor

OPTIONS

MH : "H" Diaphragm for thermal flash/explosive testing
HA : Accuracy (CNL&H) $\leq \pm 0.25\%$ F.S.
SI : Sensitivity shift in CTR $\leq 1\%$ of reading / 50 ° C [/ 100 ° F]
ZI : Zero shift in CTR $\leq 1.5\%$ F.S. / 50 ° C [/ 100 ° F]
ET1 : CTR -20 to 100 ° C [-4 to 212 ° F]
ET3 : CTR -40 to 150 ° C [-40 to 302 ° F] OTR=CTR (not available with A1 options)
L00M : special cable length, replace "00" with total length in meters

ORDERING INFORMATION

XPM6	-		-	1KB	G	-	/H//SI/L5M
Model	-	Output signal	-	Pressure Range	Pressure reference	-	Options
XPM6		(none) : bridge (mV/V) A1 : 0,5 to 4,5V		100B 200B 350B 500B 1KB	G : gauge S : sealed		/MH /HA /SI /ZI /ET1 /ET3 /SC /L00M

The sensor ordering codes uses only bar as units because **XPM6** uses metric threads. Psi value correspondence is noted as information.

NORTH AMERICA

Measurement Specialties, Inc.,
a TE Connectivity Company
Phone: 800-522-6752
Email: customercare.frm@te.com

EUROPE

Measurement Specialties (Europe), Ltd.,
a TE Connectivity Company
Phone: 800-440-5100
Email: customercare.lcsb@te.com

ASIA

Measurement Specialties (China), Ltd.,
a TE Connectivity Company
Phone: 0400-820-6015
Email: customercare.shzn@te.com

TE.com/sensorsolutions

Measurement Specialties, Inc., a TE Connectivity company.

Measurement Specialties, TE Connectivity, TE Connectivity (logo) and EVERY CONNECTION COUNTS are trademarks. All other logos, products and/or company names referred to herein might be trademarks of their respective owners.

The information given herein, including drawings, illustrations and schematics which are intended for illustration purposes only, is believed to be reliable. However, TE Connectivity makes no warranties as to its accuracy or completeness and disclaims any liability in connection with its use. TE Connectivity's obligations shall only be as set forth in TE Connectivity's Standard Terms and Conditions of Sale for this product and in no case will TE Connectivity be liable for any incidental, indirect or consequential damages arising out of the sale, resale, use or misuse of the product. Users of TE Connectivity products should make their own evaluation to determine the suitability of each such product for the specific application.

© 2015 TE Connectivity Ltd. family of companies All Rights Reserved.