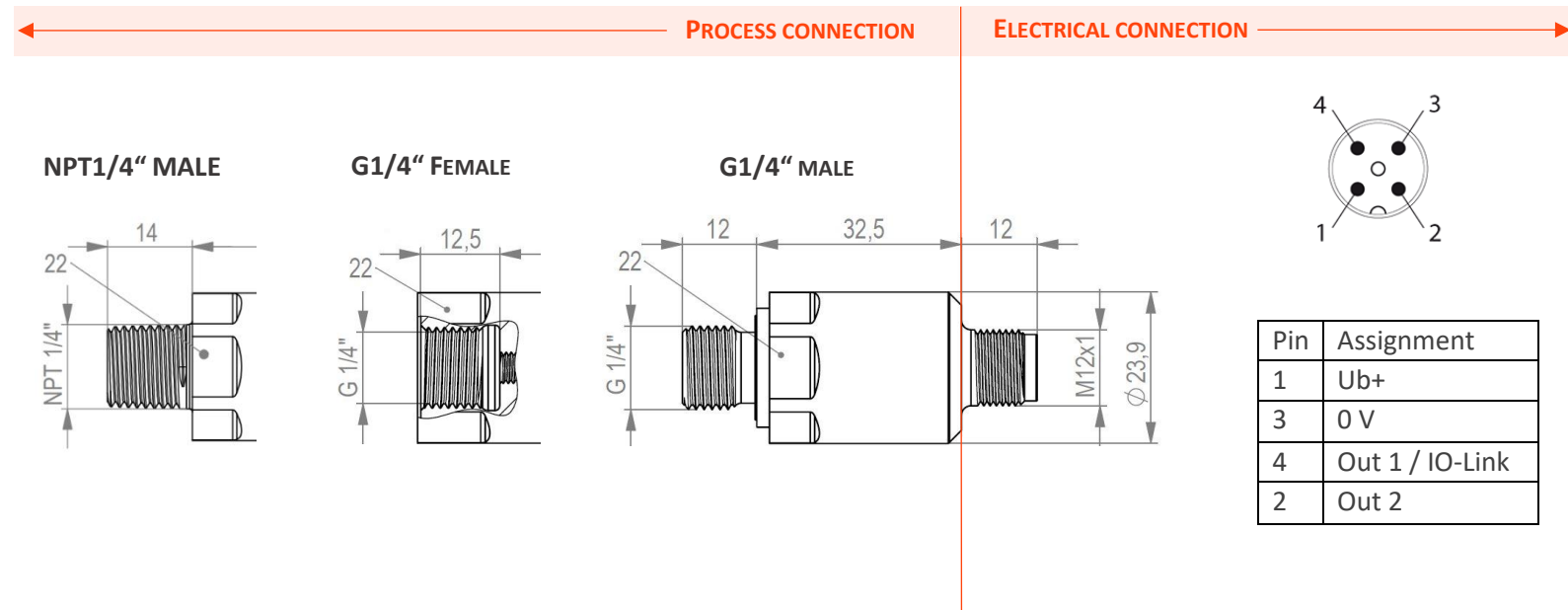


DATA SHEET | ENGLISH



One of the smallest sensors with a ceramic measuring cell and yet extremely robust. The housing with protection class IP68 is made of solid stainless steel and designed for continuous industrial use.

2 switching outputs and an IO-Link interface give the sensor maximum functionality and flexibility for the user.



General data		
Protection class rating	IP65 / IP67 / IP68	
Protection level	III	
Expected lifetime	100 Mio. load changes	
Pressure type	relative pressure	
Measuring cell type	ceramic	
Electrical data		
Electrical connection	Connector M12x1, 4-pole	
Operating voltage	9...30 VDC	
Current consumption [Ub]	< 30 mA	
Short-circuit / reverse polarity prot.	yes / yes	
Ordering information:		
5 - 20 - X 1 4 X - XXX X XX		
<u>Process connection</u>	<u>Firmware</u>	
G1/4" M (male)	Standard	00
G1/4" F (female)	Customized	>00
NPT1/4" M (male)		
<u>Sealings</u>	<u>Pressure range*</u>	
NBR (=standard)	-1...1 bar	001 2
FKM	-1...5 bar	005 2
EPDM	-1...10 bar	010 2
	0...10 bar	010 0
	0...16 bar	016 0
	0...25 bar	025 0
	0...40 bar	040 0
	0...100 bar	100 0
	0...250 bar	250 0
	0...400 bar	400 0
	0...600 bar	600 0

\*more pressure ranges available on request

Output	
Out 1 (Pin 4)	PNP/NPN/PP or IO-Link
Out 2 (Pin 2)	PNP/NPN/PP
Max. output current	max. 200 mA per output
Output voltage	Ub - 2.0V
Response time	< 3 ms
Accuracy	
Total accuracy (23°C)	± 0.5% FS (LP)
max. temperature error (-40...+80°C)	± 1.5% FS (<100bar); ± 2.5% (≥100bar)
Long-term drift	≤ 0.1% FS / a
Repetition accuracy	0.1% FS
Programming options	
Outputs	Switching/re-switching points; hysteresis/window mode; normally closed/ normally open contact; switch-on/switch-off delay
Measuring value	Units; Damping
Diagnosis	
Pressure peaks	Counter, adjustable threshold, reset
Counters	Switching operations; load changes; operating hours; starting cycles
ATEX Conditions	
The pressure sensors may only be connected to suitably approved intrinsically safe equipment that provides device protection according to "ic" (EPL Gc/Dc).	
Maximum intrinsically safe voltage: U <sub>i</sub> = 30 V	
The specified maximum output current of 200 mA per channel must never be exceeded.	

Materials (wetted parts)									
Material fluid connection	stainless steel 1.4404								
Material measuring cell	ceramic Al <sub>2</sub> O <sub>3</sub> 96%								
Material seals	see ordering information								
Materials (non-wetted parts)									
Material housing	stainless steel 1.4305								
Mechanical data									
Process connections	G1/4" M, G1/4" F, NPT1/4" M								
Wrench size pressure connection	22								
Weight	68g (G1/4" M, NPT1/4" M); 103g (G1/4" F)								
Pressure range									
<b>Measuring range*</b> [bar]	5	10	16	25	40	100	250	400	600
<b>Overload press.**</b> [bar]	10	20	40	40	100	150	375	500	750
<b>Burst pressure**</b> [bar]	20	35	60	60	140	300	500	650	900

\*more measuring ranges available on request \*\* increased overload resistance available on request

Operating conditions	
Operating temperature	Operation: -40°...+80°C Fluid: -25°...+100°C
Range of application	Fluid group 2 media only
EMC / interference immunity	EN61000-6-2
EMC / interference emission	EN61000-6-4
Vibration resistance	DIN EN 60068-2-6: 20G, 10-2000 Hz, XYZ
Shock resistance	DIN EN 60068-2-27: 50G, 11ms, XYZ
UL approval	E511277
ATEX approval	Ex ic IIC T4 Gc Ex icD IIC T4 Dc