



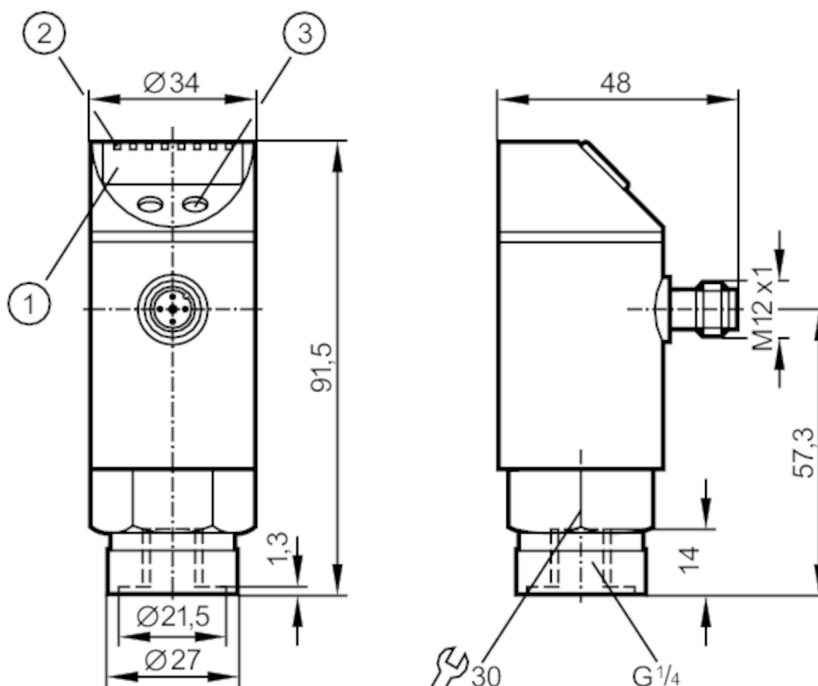
Pressure sensor with display

PN-2,5-RBR14-HFPKG/US/ IV

Article no longer available - archive entry

Alternative articles: PN7096

When selecting an alternative article and accessories please note that technical data may differ!



- 1 alphanumeric display 4-digit
- 2 LEDs Display unit / switching status
- 3 programming button



Product characteristics

Number of inputs and outputs	Number of digital outputs: 1			
Measuring range	0...2.5 bar	0...2500 mbar	0...36.3 psi	0...250 kPa
Process connection	threaded connection G 1/4 internal thread			

Application

Special feature	Gold-plated contacts		
Application	for industrial applications		
Media	liquids and gases		
Medium temperature [°C]	-25...80		
Min. bursting pressure	50 bar	725 psi	5000 kPa
Pressure rating	20 bar	290 psi	2000 kPa
Type of pressure	relative pressure		

Electrical data

Operating voltage [V]	18...36 DC; (to SELV/PELV)
Current consumption [mA]	< 50
Min. insulation resistance [MΩ]	100; (500 V DC)
Protection class	III



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Reverse polarity protection	yes			
Overvoltage protection	yes; (< 40 V)			
Power-on delay time [s]	0.3			
Integrated watchdog	yes			
Inputs / outputs				
Number of inputs and outputs	Number of digital outputs: 1			
Outputs				
Total number of outputs	1			
Output signal	switching signal			
Electrical design	PNP			
Number of digital outputs	1			
Output function	normally open / normally closed; (parameterisable)			
Max. voltage drop switching output DC [V]	2			
Permanent current rating of switching output DC [mA]	250			
Switching frequency DC [Hz]	< 170			
Short-circuit protection	yes			
Type of short-circuit protection	pulsed			
Measuring/setting range				
Measuring range	0...2.5 bar	0...2500 mbar	0...36.3 psi	0...250 kPa
Set point SP	0.02...2.5 bar	0.4...36.2 psi	2...250 kPa	
Reset point rP	0.01...2.49 bar	0.2...36 psi	1...249 kPa	
In steps of	0.01 bar	0.2 psi	1 kPa	
Factory setting		SP1 = 0.63 bar	rP1 = 0.58 bar	
Accuracy / deviations				
Switch point accuracy [X21]	< ± 0,5			
Repeatability [X21]	< ± 0,1; (with temperature fluctuations < 10 K)			
Characteristics deviation [X21]	< ± 0,25 (BFSL) / < ± 0,5 (LS); (BFSL = Best Fit Straight Line; LS = limit value setting)			
Hysteresis deviation [X21]	< ± 0,25			
Long-term stability [X21]	< ± 0,05; (per 6 months)			
Temperature coefficient zero point [X22]	0,2; (-20...80 °C)			
Temperature coefficient span [X22]	0,2; (-20...80 °C)			
Response times				
Delay time programmable dS, dr [s]	0; 0,2...50			
Software / programming				
Parameter setting options	hysteresis / window; normally open / normally closed; switch-on/switch-off delay; Damping; Display unit			
Operating conditions				
Ambient temperature [°C]	-20...80			
Storage temperature [°C]	-40...100			
Protection	IP 65			

PN5006



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Tests / approvals		
EMC	EN 61000-4-2 ESD	4 kV CD / 8 kV AD
	EN 61000-4-3 HF radiated	10 V/m
	EN 61000-4-4 Burst	2 kV
	EN 61000-4-5 Surge	0,5/1 kV
	EN 61000-4-6 HF conducted	10 V
Shock resistance	DIN IEC 68-2-27	50 g (11 ms)
Vibration resistance	DIN IEC 68-2-6	20 g (10...2000 Hz)

Mechanical data		
Weight	[g]	258.6
Materials	stainless steel (304/1.4301); stainless steel (316L/1.4404); PC; PBT; PEI; FKM; PTFE	
Materials (wetted parts)	stainless steel (303/1.4305); ceramics; FKM	
Min. pressure cycles	100 million	
Process connection	threaded connection G 1/4 internal thread	

Displays / operating elements		
Display	Display unit	3 x LED, green
	switching status	LED, yellow
	function display	alphanumeric display, 4-digit
	measured values	alphanumeric display, 4-digit

Remarks	
Pack quantity	1 pcs.

Electrical connection

Connector: 1 x M12; coding: A; Contacts: gold-plated



Connection

