

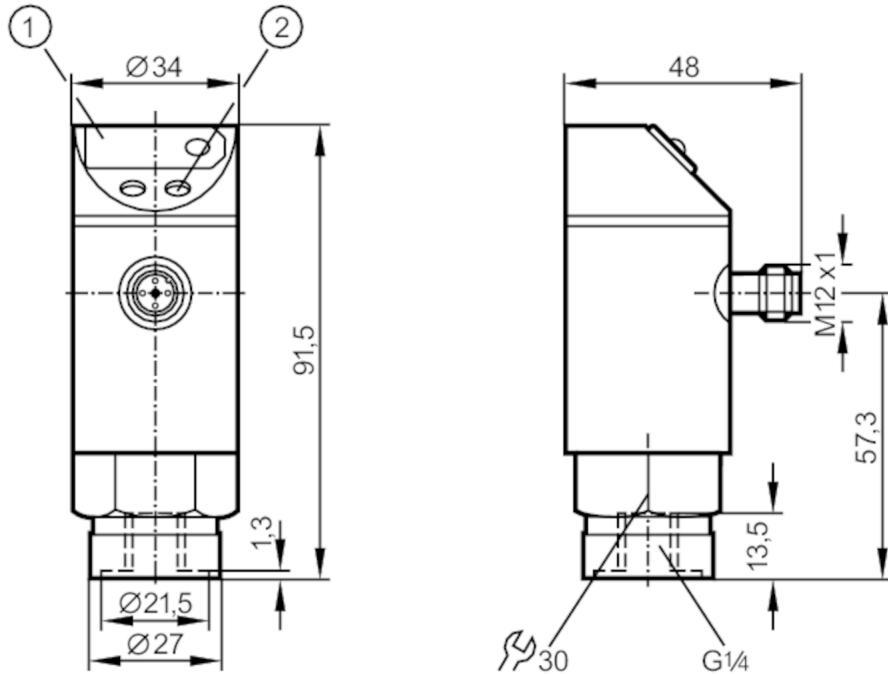
Pressure sensor with display

PN-001-RDR14-KFPKG/US/ IV

Article no longer available - archive entry

Alternative articles: PN3007

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



1 7-segment LED display
2 programming button

CE

Product characteristics

Number of inputs and outputs	Number of digital outputs: 1; Number of analogue outputs: 1
Measuring range [bar]	0...1
Process connection	threaded connection G 1/4 internal thread

Application

Application	for industrial applications
Media	liquids and gases
Medium temperature [°C]	-25...80
Min. bursting pressure [bar]	30
Pressure rating [bar]	10

Electrical data

Operating voltage [V]	20...30 DC
Current consumption [mA]	< 60
Reverse polarity protection	yes
Power-on delay time [s]	0.2
Integrated watchdog	yes

PN8057



Pressure sensor with display

PN-001-RDR14-KFPKG/US/ /V

Inputs / outputs																																	
Number of inputs and outputs	Number of digital outputs: 1; Number of analogue outputs: 1																																
Outputs																																	
Total number of outputs	2																																
Output signal	switching signal; analogue signal; (configurable)																																
Electrical design	PNP																																
Number of digital outputs	1																																
Max. voltage drop switching output DC [V]	2																																
Permanent current rating of switching output DC [mA]	250																																
Number of analogue outputs	1																																
Analogue current output [mA]	4...20																																
Max. load [Ω]	500																																
Short-circuit protection	yes																																
Type of short-circuit protection	pulsed																																
Overload protection	yes																																
Measuring/setting range																																	
Measuring range [bar]	0...1																																
Set point SP [bar]	0.05...1																																
Reset point rP [bar]	0.03...0.98																																
In steps of [bar]	0.01																																
Accuracy / deviations																																	
Repeatability [X16]	< ± 0,25; (with temperature fluctuations < 10 K)																																
Characteristics deviation [X16]	< ± 2,0																																
Temperature drift per 10 K	< ± 0,3																																
Response times																																	
Switching frequency for a given set response time of one output	<table border="1"> <tr> <td>Response time [ms]</td> <td>15</td> <td>20</td> <td>30</td> <td>50</td> <td>90</td> <td>170</td> <td>330</td> </tr> <tr> <td>time (dAP)</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </table> <table border="1"> <tr> <td>Switching frequency [Hz]</td> <td>50</td> <td>35</td> <td>30</td> <td>20</td> <td>15</td> <td>9</td> <td>5</td> </tr> <tr> <td>frequency</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </table>	Response time [ms]	15	20	30	50	90	170	330	time (dAP)								Switching frequency [Hz]	50	35	30	20	15	9	5	frequency							
Response time [ms]	15	20	30	50	90	170	330																										
time (dAP)																																	
Switching frequency [Hz]	50	35	30	20	15	9	5																										
frequency																																	
Response time [ms]	at rectangular pressure characteristic; switch point (SPx) = 70 %; reset point (rPx) = 30 %																																
Delay time programmable dS, dr [s]	0, 0,2, 0,4,...3																																
Software / programming																																	
Adjustment of the switch point	programming button																																
Operating conditions																																	
Ambient temperature [°C]	-25...80																																
Storage temperature [°C]	-40...100																																
Protection	IP 65																																

PN8057



Pressure sensor with display

PN-001-RDR14-KFPKG/US/ IV

Tests / approvals		
EMC	IEC 801/2 ESD	4 kV CD / 8 kV AD
	IEC 801/3 HF	10 V/m
	IEC 801/4 Burst	2 kV
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		
Materials	stainless steel (1.4404 / 316L); PBT; PC; NBR; EPDM/X; FKM; PTFE	
Materials (wetted parts)	stainless steel (1.4571/316Ti); ceramics; FKM	
Min. pressure cycles	100 million	
Process connection	threaded connection G 1/4 internal thread	

Displays / operating elements		
Display	switching status	LED, red
	function display	7-segment LED display
	measured values	7-segment LED display

Remarks		
Pack quantity		1 pcs.

Electrical connection		
Connector: 1 x M12; coding: A		

