

PET-1RP300N10SAMA

PET

PRESSURE SENSORS





Ordering information

Туре	Part no.
PET-1RP300N10SAMA	6065884

Other models and accessories → www.sick.com/PET

Illustration may differ



Detailed technical data

Features

Pressure type	Gauge pressure
Measuring range	0 psi 300 psi
Process temperature	-30 °C +100 °C
Output signal	4 mA 20 mA, 2-wire
Pieces per package	50 pieces

Mechanics/electronics

Process connection	1⁄4" NPT		
Seal	Without seal		
Wetted parts	Stainless steel, stainless steel 13-8 PH		
Pressure port	3.5 mm Standard		
Housing material	Stainless steel 316L, PBT GF30		
Connection type	M12 round connector x 1, 4-pin		
Enclosure rating	IP67, for round connector (IEC 60529) 1)		
Supply voltage	8 V DC 30 V DC ²⁾		
Maximum ohmic load R _A	= $(L+-7 \ V)/0.02 \ A \ [ohm]$ for current output signal		
Maximum power consumption	25 mA		
Initialization time	15 ms		
Protection class	III		
Isolation voltage	750 V DC		
Overvoltage protection	36 V DC		
Short-circuit protection	Output Q _A towards M		
Reverse polarity protection	L ⁺ towards M		
CE-conformity	2004/108/EC, EN 61326-1 emission (group 1, class B) and interference immunity (industrial application) and pressure equipment directive $97/23/EC$		

¹⁾ The enclosure rating classes specified only apply while the thermometer is connected with female connectors that provide the corresponding enclosure rating.

²⁾ The pressure transmitter must be supplied with power by a limited energy circuit compliant with 9.3 of UL/EN/IEC 601010-1 or LPS to UL/EN/IEC 60950-1 or Class 2 to UL 1310/UL1585 (NEC or CEC). The power supply must be suitable for operation above 2,000 m if the pressure transmitter is used above this altitude.

RoHS certificate	✓
Service life	Minimum 10 Mio. load cycles
MTTF	> 100 years

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Performance

Non-linearity	$\leq \pm~0.5~\%$ of span (best fit straight line, BFSL)	
Accuracy	\leq ± 1.2 % of span (at room temperature)	
Response time	< 2 ms	
Measurement deviation of zero signal	\leq ± 0.5 % of the span	
Temperature error	\leq ± 1.5 % of the span	
Long-term drift/one-year stability	≤ ± 0.3 % of span (per year)	
Rated temperature range	0 °C +80 °C	
Reference conditions	According to IEC 61298-1	

Ambient data

Ambient temperature, operation	-30 °C +100 °C
Storage temperature	-30 °C +100 °C
Shock load	40 g (6 ms) according to IEC 60068-2-27 (mechanical shock)
Vibration load	20 g (20 Hz 2000 Hz, 120 min) according to IEC 60068-2-6 (vibration at resonance)

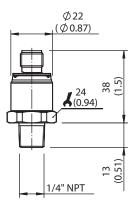
Classifications

ECLASS 5.0	27200614
ECLASS 5.1.4	27200614
ECLASS 6.0	27200614
ECLASS 6.2	27200614
ECLASS 7.0	27200614
ECLASS 8.0	27200614
ECLASS 8.1	27200614
ECLASS 9.0	27200614
ECLASS 10.0	27200614
ECLASS 11.0	27200614
ECLASS 12.0	27200614
ETIM 5.0	EC011478
ETIM 6.0	EC011478
ETIM 7.0	EC011478
ETIM 8.0	EC011478
UNSPSC 16.0901	41112410

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Dimensional drawing (Dimensions in mm (inch))

Process connection 1/4" NPT with round connector M12 x 1, 4-pin



Connection type

M12 round connector x 1, 4-pin



Assignment	L+	М	Q _A
2-wire	1	3	-
3-wire	1	3	4

- ① L⁺: Positive supply connection
- ② M: Negative supply connection
- ③ Q_A: Analog output

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