



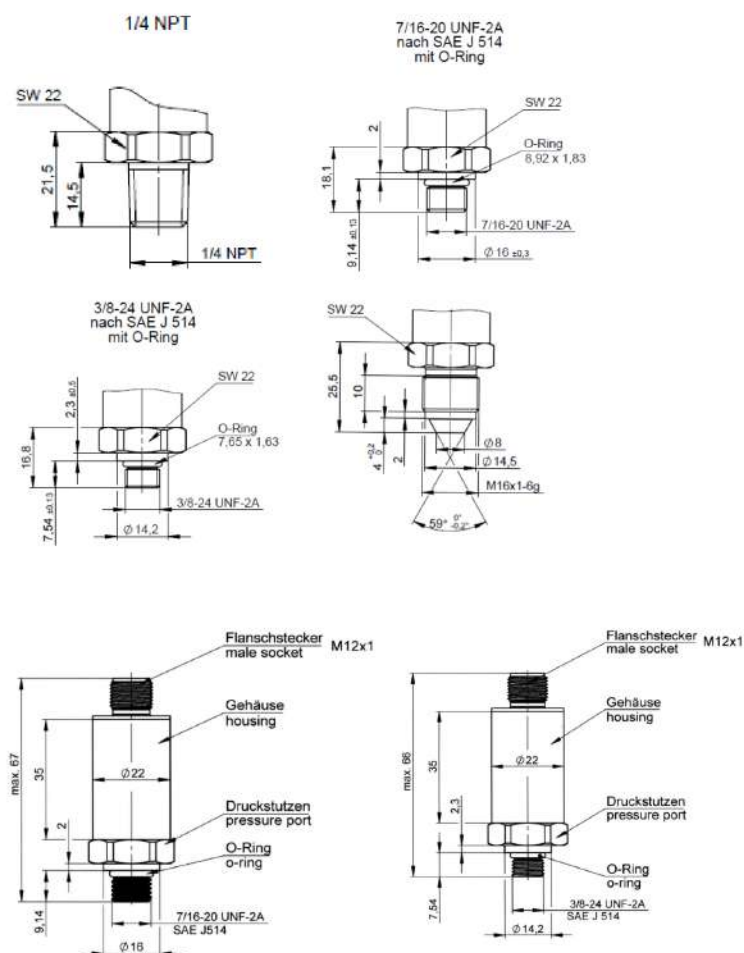
The SMO31H2 is a high quality all stainless steel pressure transducer, intended for applications around the measurement of hydrogen in the automotive industry. Due to the proven, robust mechanical construction and with additional EMI / RFI protection, the SMO31H2 is predestined to be used in harsh environments. Low static and thermal errors and high resistance to shock and vibration as standard, the SMO31H2 assures trouble free operation at temperatures up to 125° C.



Performance		
Accuracy @ RT	% of the range (gauge and vacuum sensors) < 0.5 BFSL ≤ 0.125	(incl. nonlinearity, hysteresis, repeatability, zero-offset and final offset acc. to IEC 61298-2)
Non-linearity	% of the range ≤ 0.30	
Repeatability	% of the range ≤ 0.20	
Stability/year	% of the range ≤ 0.20	
Response time	(10..90%) t(ms)1	
Overrange pressure	up to 2x rated pressure	
Burst pressure	up to 5x rated pressure	
Pressure cycles	> 10 million	
Electronics		
Output -> Supply	0.5 - 4.5V -> 5V ratiometric	
Output impedance	< 100 Ω	
Current consumption	< 10 mA	
Reverse voltage protection	Yes	
Environment		
Temperature [°C]: Measuring medium Ambience Storage Compensated range	-40...125 -40...105 -40...125 -20...85	
Temperature coefficient within the compensated range:		
Mean TC offset	% of the range ≤ 0,15 / 10K	
Mean TC range	% of the range ≤ 0,15 / 10K	
Shock	1000 G, 11 msec., 1/2 Sine	
Vibration	25 G peak, 20 to 2000 Hz	
Sealing	IP 67, optional IP69K	
Mechanics		
Material	stainless steel	
Pressure port	see select table	
Electrical connection	see select table	
Weight	ca. 60 g	



Dimensions in mm



Wiring



Round connector
M12x1 A



Packard Metripac

Cable assembly

Output	PIN 1	PIN 2	PIN 3	PIN 4
0.5 - 4.5V	+ Supply	N/A	- Supply	Output +
Output	PIN A	PIN B	PIN C	-
0.5 - 4.5V	- Supply	+ Supply	Output +	-
Output	Red	Black	White	Green
0.5 - 4.5V	+ Supply	- Supply	Output +	-



Ordering information

(Please use the characters in the chart below to construct your product code)

Sample Code SMO3100H2 - A - 01000 - B - 5 - A

Port Configuration

M16	M16x1 male up to 1000 bar (EC79 is limited to 700 bar)
B	1/4 NPT max. 500 bar
D	7/16" - 20 UNF 2A Male up to 1000 bar (EC79 bis limited to 700 bar)
N	3/8"-24 UNF2A up to 700 bar (EC79 is limited to 700 bar)

Pressure Range

See table below*

Pressure Unit

B	Gauge Pressure
V	Vacuum Pressure

Output Signal

5	0.5...4.5V
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Electrical Interface

A	600mm cable
C	Packard Metripac
F	M12x1 Round connector

Standard models:

SMO31H2-M16-44800-B-5-C

SMO31H2-M16-70000-B-5-C

Pressure Range

Bar	1.0	1.6	2.5	4	6	10	16	20	25	40	50	60	100	160	250	400	448	600	700	1000
Order Code	00100	00160	00250	00400	00600	01000	01600	02000	02500	04000	05000	06000	10000	16000	25000	40000	44800	60000	70000	100000

The SMO31H2 series is backed by a 1 Year Warranty. The purchaser is responsible for compatibility of the media, functional adequacy and correct installation of the transmitter.

If you require a customized solution for your program contact our sales team.