GEFRAN

PMH

Main features

- *Pressure range from 0…0.25 bar to 0…30 bar*
- *AISI 316L*
- *Non-compensated sensor*
- *Compactness*
- *Material in contact with fluid is AISI 316L*

The PMH series measurement module is based on the piezo-resistive measurement principle.
The module can be used in demanding applications because all of its components are highly stable.
It is constructed entirely of AISI 316 L, which assures compatibility in applications ranging from the food and pharmaceutical industry to the process industry.

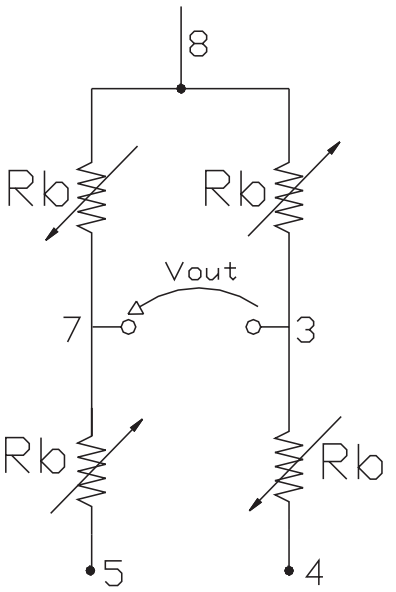
TECHNICAL DATA

	Minimum	Typical	Maximum
Output signal	60mV	100mV	140mV
Accuracy		0.25% FS	
Measurement range		From 0..0.25 bar to 0..30 bar	
Max. applicable static pressure (without degradation)		See table on page	
Static bursting resistance		See table on page	
Jumper resistance		Typical 5 kOhm± 10 % max ±20% kOhm	
Insulation resistance at 50 Vdc		>100 MOhm	
Allowed temperature range		-40…+125°C	
Storage temperature range		-55..+130°C	
Zero thermal drift for pressures ≤1 bar in temperature range –25..+125°C	Minimum ± 0.15%	Typical ± 0.2%	Maximum ± 0.3%
Zero thermal drift for pressures > 1 bar in temperature range –25..+125°C	Typical ± 0.05%	Maximum ± 0.07%	
Compensated zero thermal drift for pressures ≤1 bar(**1**) in temperature range –25..+85°C	Typical ± 0.04% /°C	Maximum ± 0.06% /°C	
Compensated zero thermal drift for pressures > 1 bar(**1**) in temperature range –25..+85°C	Typical ± 0.02% /°C	Maximum ± 0.03% /°C	
Full-scale thermal drift	Typical ± 0.19% /°C	Maximum ± 0.21% /°C	
Compensated full-scale thermal drift in temperature range –25..+85°C	± 0.03%/°C		
Material in contact with fluid	AISI 316L		
Filling oil	Silicone		
Life	>10*10^6 cycles		

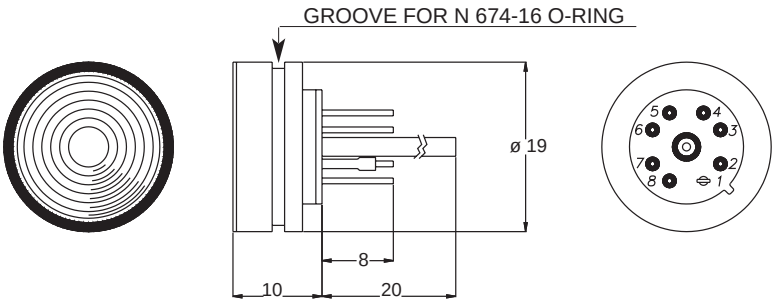
(**1**) After resistive compensation
Note: all data refer to 1 mA power supply

PRESSURE RANGE bar	**0.25**	**0.5**	**1**	**2**	**4**	**5**	**6**	**7**	**10**	**16**	**20**	**25**	**30**
Max. applicable static pressure (without degradation)	2.5	3.5	7	10	16	20	25	30	30	48	60	75	90
Static bursting resistance	5	10	10	20	35	75	75	75	150	150	150	150	150

ELECTRICAL CONNECTIONS



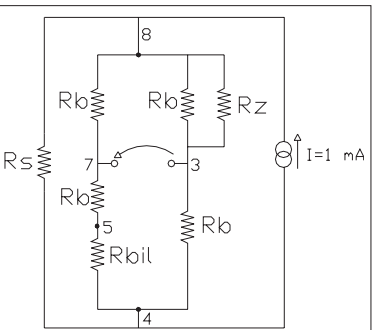
MECHANICAL DIMENSIONS



MEASUREMENT REPORT

PRESSURE [Pa]	SIGNAL [mV]	Lin. [% FS]
0	0.00	0.000
40000	23.77	0.199
80000	47.32	0.253
120000	70.79	0.261
160000	94.17	0.163
200000	117.43	0.000

Compensated Trange	
Linearity [% FS]	-0.261
FSO [mV]	-94.17
T-Hys [% FS]	-0.652
P-Hys [% FS]	-0.063



Rs = 23192 Ω Rp = 734511 Ω Rbil = 65 Ω NP = 12.33 mV Repeatability [%FS] = 0.051

ORDER CODE

PMH ☐☐☐☐

PRESSURE RANGE bar	
0...0.25	**BV25**
0...0.50	**BV50**
0...1	**B01U**
0...2	**B02U**
0...4	**B04U**
0...5	**B05U**
0...6	**B06U**
0...7	**B07U**
0...10	**B01D**
0...16	**B16U**
0...20	**B02D**
0...25	**B25U**
0...30	**B03D**

PRESSURE TYPE	
Relative	**G**

Mechanical and/or electrical characteristics other than standard may be requested.

OPTIONS	
N	O-Ring NBR
S	O-Ring Silicon

GEFRAN spa reserves the right to make aesthetic or functional changes at any time and without notice.

GEFRAN spa
via Sebina, 74- 25050 PROVAGLIO D'ISEO (BS) - ITALIA
tel. 0309888.1 - fax. 0309839063- Internet: http://www.gefran.com