

Product information

PM1

Pressure Switch PM1



- Adjustable switch point
- Change over contact
- Flat plug 6.3×0.8 with rubber protection cap or
- Circular plug M12×1

Characteristics

Mechanical pressure controller in which a membrane or piston is pre-tensioned by a spring. The adjustment screws permits the setting of the switch point.

Technische Daten

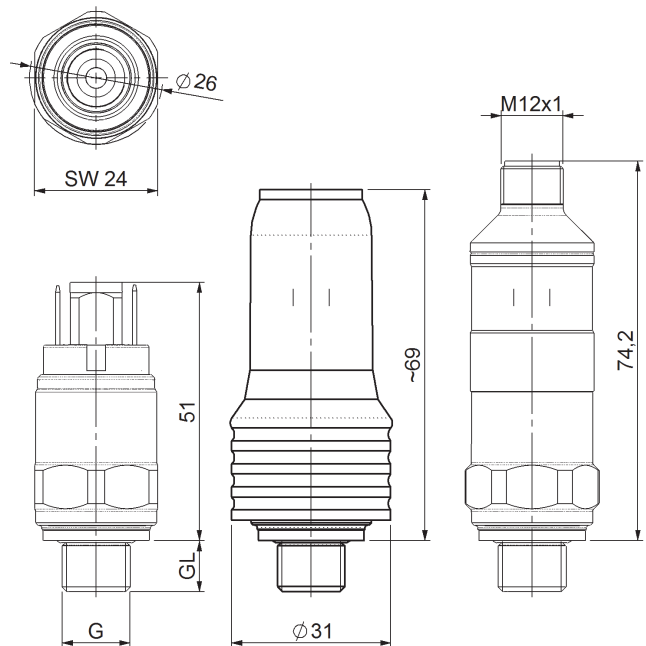
Switch	Mechanical switch	
Process connection	Male thread R 1/8, G1/8, G1/4, 1/4NPT, 1/8NPT, M10×1	
Switching range	0,2..320 bar	for details see table "Ranges"
Pressure resistance	PS 60bar/ 350 bar	
Tolerance	± 2% at RT relative to full scale value	
Hysteresis	See diagram „Hysteresis“	
Media temperature	-20..+80°C (Viton 0..+100°C)	
Ambient temperature	-20..+80°C	
Media	Water, oils, gases	
Wiring	<p>Flat plug 6,3×0,8 Change over Nr. 0.466</p> <p>Circular plug M12×1, 4-pin Change over Nr. 0.463</p>	
Switching voltage	Max. 48VAC/DC	
Switching current	Max. 2 A (1 A inductive)	
Ingress protection	Flat plug: IP 00 with rubber protection cap: IP 54 Circular plug M12×1: IP67 (with mating plug)	
Electrical connection	Flat plug 6,3×0,8 or Circular plug M12×1, 4-pin	
Materials medium-contact	Diaphragm type NBR or EPDM or Viton. Piston type: PTFE with NBR or EPDM or Viton steel, zinc coated or stainless steel (1.4305)	

Non-medium-contact materials	PA 6.6, NBR, Rubber
Weight	0,10 kg
Installation location	installation location as desired

Ranges

Switching Range bar (rel.)	Type	Pressure resistance PS bar	Functional principle
- 0,85 ..1	001	60	Diaphragm
0,2 .. 2	002		
0,5 .. 8	008		
1 .. 16	016		
10 .. 30	030	350	Piston
10 .. 80	080		
10 .. 120	120		
10 .. 160	160		
20 .. 200	200		
20 .. 250	250		
30 .. 320	320		

Dimensions



Handling and operation

Notes

- If the medium is dirty, install a filter.
- It must be ensured that the values given for voltage, current, and power are not exceeded.
- Check resistance to aggressive media, no DI water.
- Flat plug version 6,3×0,8 supplied with rubber cap.

Product information

Torques and thread lengths of the fluid connections

R 1/4, G 1/4, 1/4NPT 20-25 Nm 12 mm

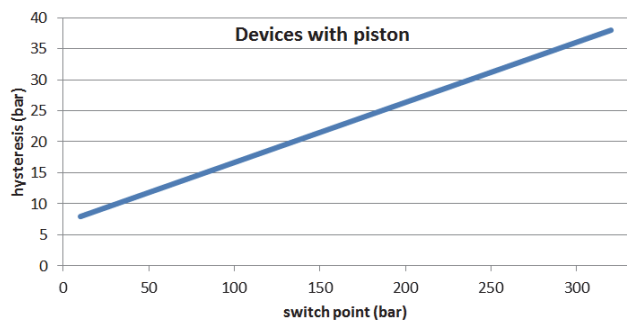
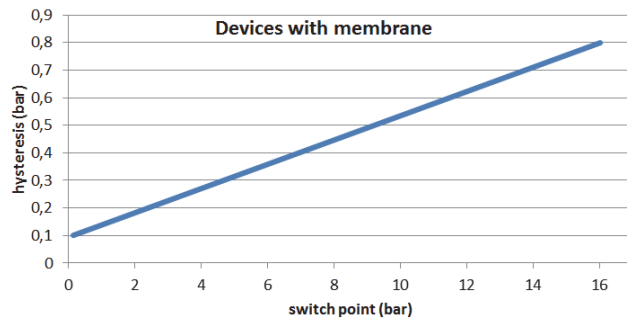
R 1/8, G 1/8, 1/8NPT, M10×1 15-20 Nm 10 mm

Adjustment

- Set the desired switching value using a hex wrench (size 2). Turn to right increases the value.
- M12x1: The adjustment is done in the factory.

Hysteresis

The diagram shows the hysteresis in relation to the switch point (idealized representation).



Ordering code

1. 2. 3. 4. 5. 6.
PM1 -

1. Switching range	
001	- 0,85 .. 1 bar
002	0,2 .. 2 bar
008	0,5 .. 8 bar
016	1 .. 16 bar
030	10 .. 30 bar
080	10 .. 80 bar
120	10 .. 120 bar
160	10 .. 160 bar
200	20 .. 200 bar
250	20 .. 250 bar
320	30 .. 320 bar
2. Connection material	
S	Steel, zinc coated
K	Stainless steel
3. Connection size	
004A	G 1/8A
004H	R 1/8A
008A	G 1/4A
009H	NPT1/8
011A	M10×1 (no stainless steel)
012H	NPT1/4
4. Rotatable	
0	Fixed
5. Electrical connection	
U	Flat plug 6.3×0,8
S	Circular plug M12×1*
6. Sealing / diaphragm	
N	NBR
E	EPDM
V	Viton

*only with adjustment ex factory

Options

- Factory setting of the switch point on falling or rising pressure.