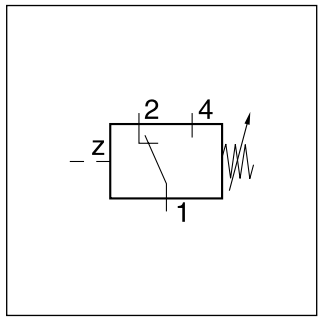
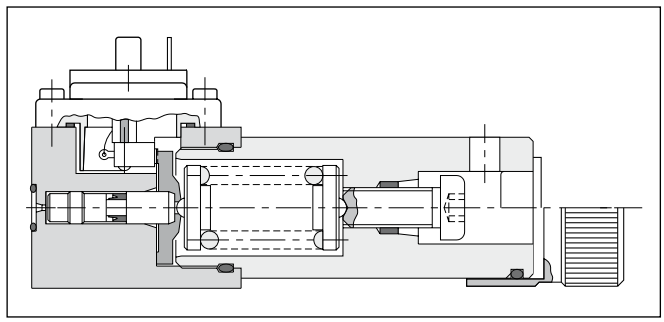
The electro-hydraulic pressure switch provides an electric signal when the sensed pressure goes above or below the selected setting.





Function

The spring loaded piston is hydraulically dampened. The PSB provides a very accurate hysteresis between the switching points (see diagram).

The required operating pressure is adjusted by the set-screw. Unauthorised adjustments can be prevented by the optional cylinder lock. The electric element is a micro switch with snap-action contact. Three terminals permit application as "On", "Off" or "Changeover" switch.

The electrical connection is made with a 3-pole plug-in connector to EN 175301-803 with ground.

Note

For inductive DC loads a spark discharger should be used to increase service life.

Features

- Flange or pipe mounting
- 4 pressure ranges
- Can be used as opener or closer
- Cylinder lock optional

Ordering code

PSB						
Pressure switch with manual switching point adjustment	**Switching pressure range**	**Adjustment**	**Connection**	**Seal**	**Design series** (not required for ordering)	**Lock**

Code	Switching pressure range
040	**3 to 40 bar**
100	**10 to 100 bar**
160	**10 to 160 bar**
250	**20 to 250 bar**

Code	Adjustment
A	**Hexagon socket**
S	Knob with scale

Code	Connection
F1	**Flange (front face)**
V1	**Fitting (front face, tube Ø6)**

Code	Lock
–	**without lock**
Z	Cylinder lock (not for scale knob)

Code	Seal
A	**NBR**
1	FPM

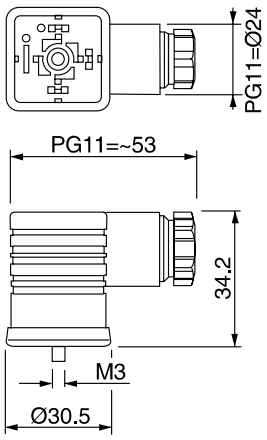
Bold letters =
Short-term availability

Technical data

General		
Symbol		DIN 24340
Design		Plunger type switch
Mounting		PSB*F1* flange (front face) PSB*V1 pipe mounting
Mounting position		unrestricted
Ambient temperature	[°C]	-20 ... +60
$MTTF_D$ value	[years]	150
Weight	[kg]	1.0
Hydraulic		
Operating pressure	[bar]	to 315
Actuating pressure difference		see diagram
Duty cycle		max. 1/s
Fluid		Hydraulic oil according to DIN 51524
Fluid temperature	[°C]	-20...+70 (NBR: -25...+70)
Viscosity, permitted	[cSt] / [mm²/s]	20 ... 400
recommended	[cSt] / [mm²/s]	30 ... 80
Filtration		ISO 4406 (1999); 18/16/13
Electrical connection		Plug-in connector to EN 175301-803
Insulation		IP65 as per EN 60529 (with correctly mounted plug-in connector)
Contact load carrying capacity		5 A at 250 VAC; 1 A at 50 VDC; 0.2 A at 250 VDC

Plug EN 175301-803

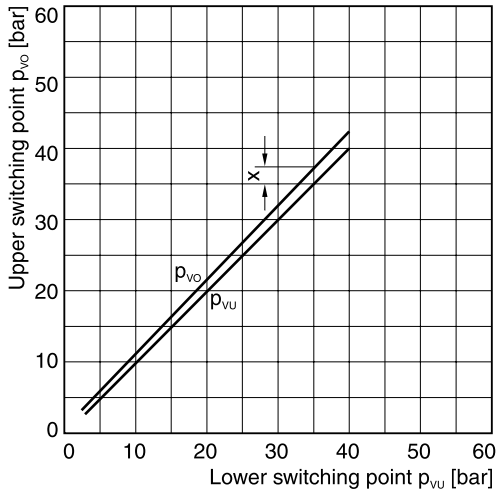
Description	Threaded cable joint	Ordering code
Plug EN 175301-803, design type AF, protection class IP65	PG11	**HR 21500157**
Plug with LED, 12...230 V AC/DC, protection class IP65	PG11	**HR 21502321**



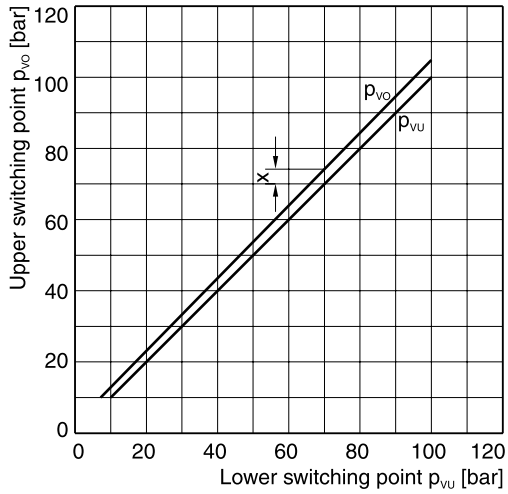
12

Switching pressure difference

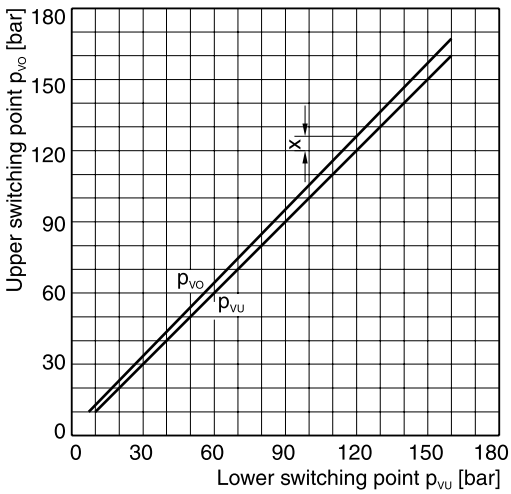
PSB040



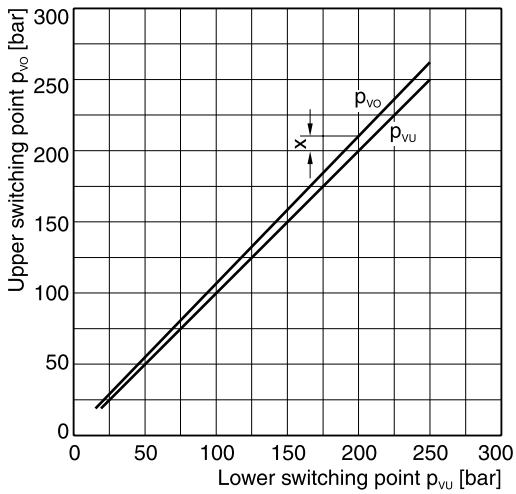
PSB100



PSB160



PSB250

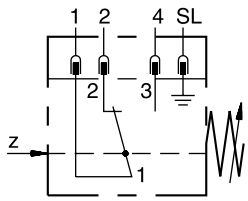


X = switching differential

All characteristic curves measured with HLP46 at 50 °C.

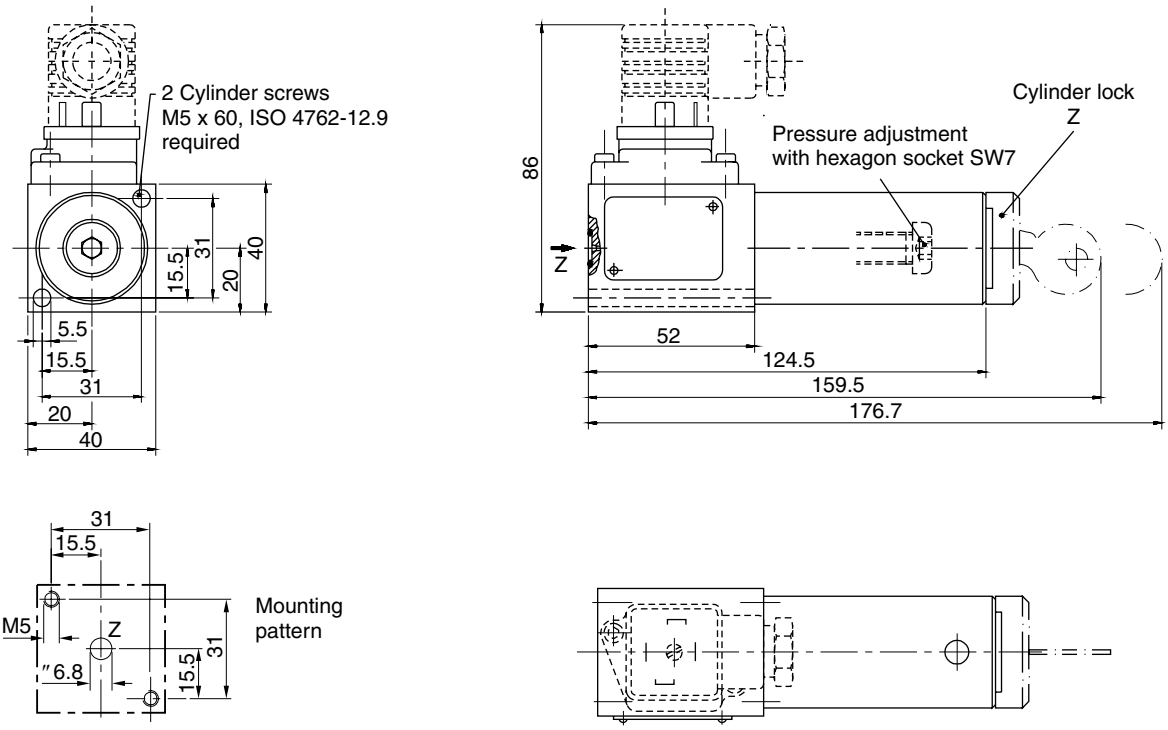
12

Electrical connections

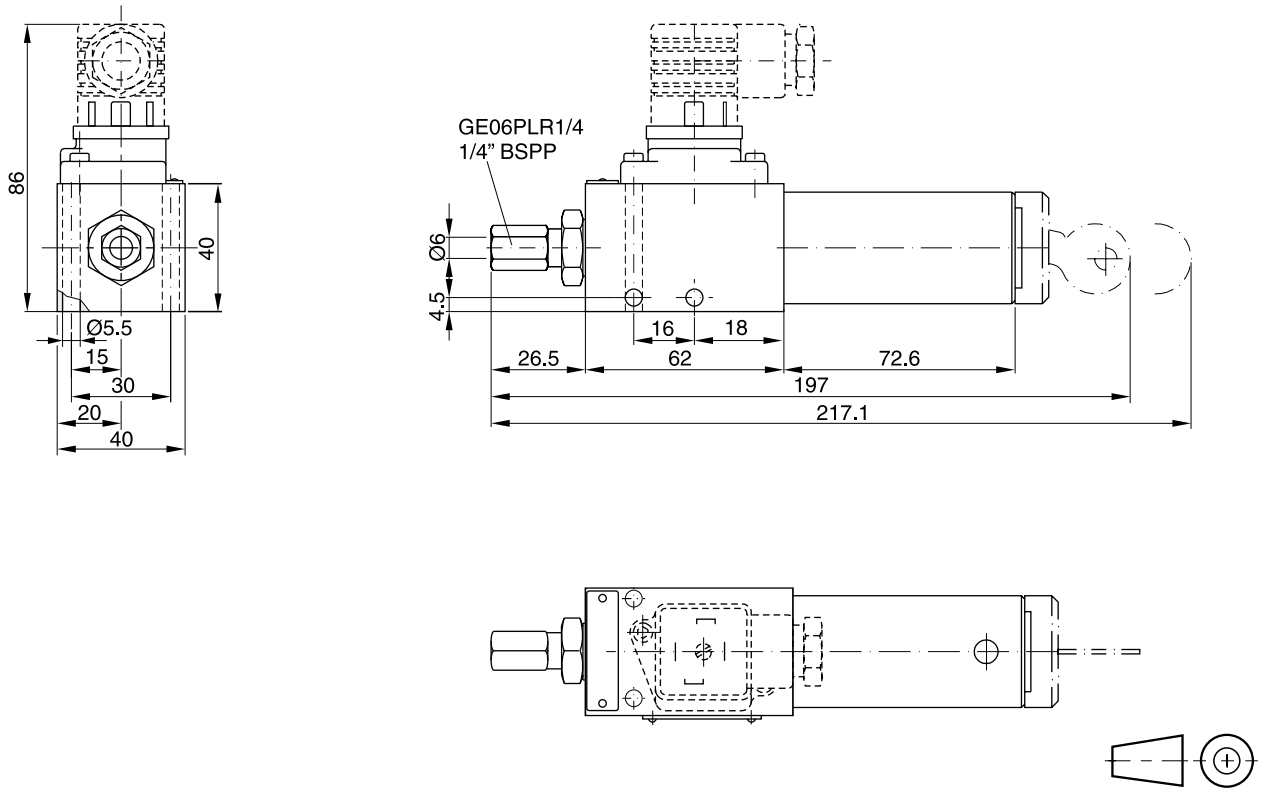


Electrical connection EN175301-803

PSB*F1*

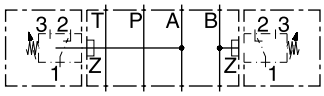
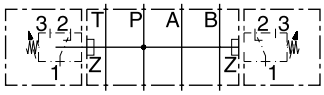


PSB*V1*



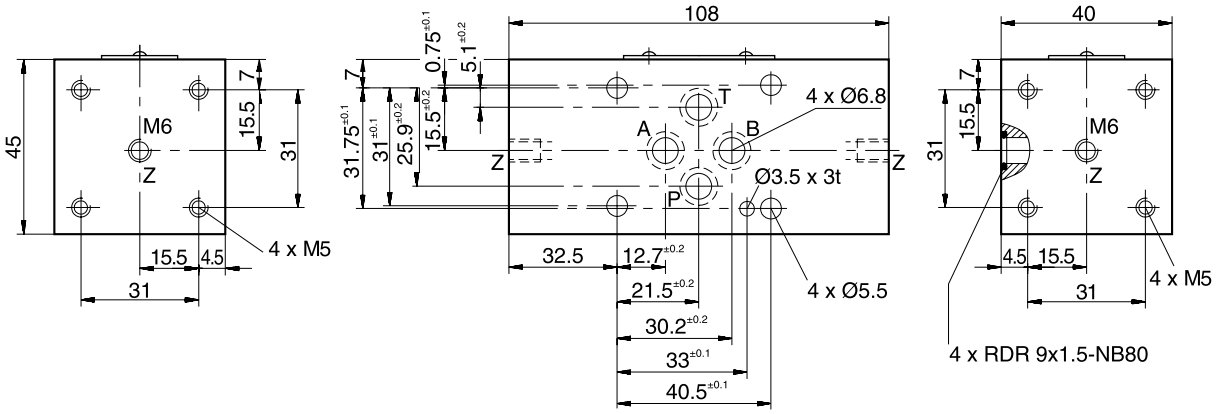
12

Technical Data

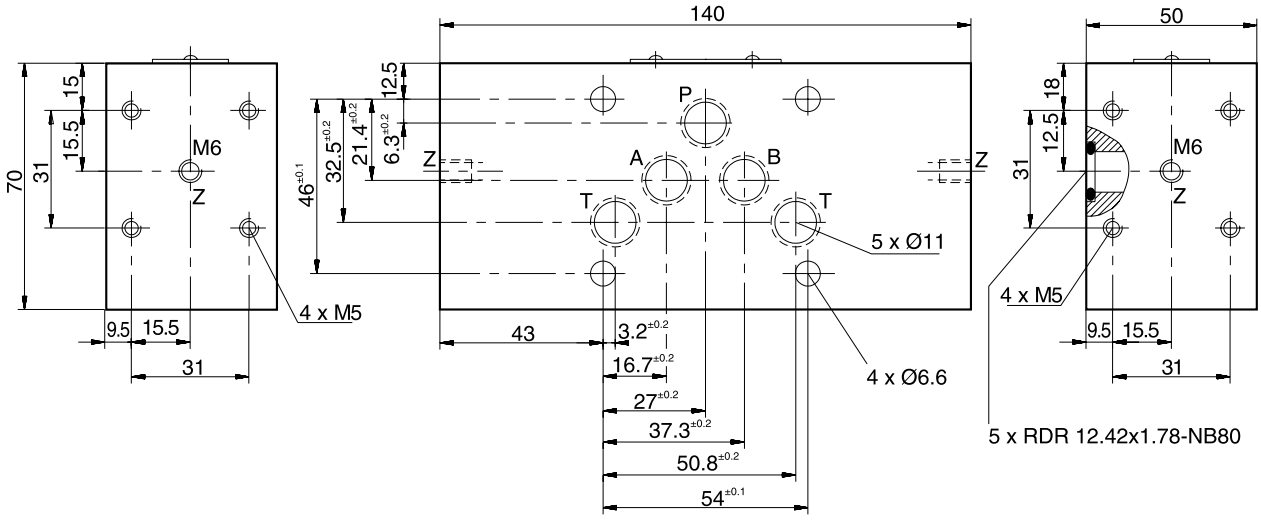
Switch code	Ordering code	Nominal size	Function
	**H06PSB-994**	**06**	**Pressure switch connection to A or B or A and B: Connections not used are closed by plug.**
	H10PSB-996	**10**	
	H06PSB-993	06	Pressure switch connection to P (left or right mounting is possible). Connection not used is closed by plug.
	H10PSB-995	10	

Bold letters =
Short-term availability

Dimensions NG06



Dimensions NG10



12