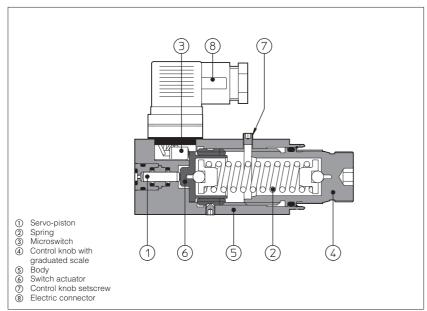


Pressure switches type MAP

with fixed differential



MAP pressure switches produce an electrical make/break contact which is triggered when pressure in the hydraulic circuit reaches a given setting.

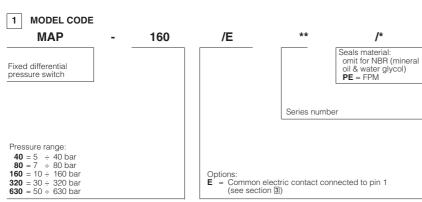
Fluid pressure in the circuit operates a piston ① flitted with adjustable spring bias ②; once the pressure setting is reached, the piston is urged forward so as to actuate a microswitch ③ and make or break its contacts.

The pressure setting is selected by turning a graduated control knob ④.

Clockwise rotation increases the setting pressure.

Pressure switches are designed to operate in hydraulic systems with hydraulic mineral oil or synthetic fluid having similar lubricating characteristics

Max pressure = 650 bar



Note: special version with gold-plated microswitch contact available on request

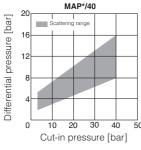
2 MAIN CHARACTERISTICS OF PRESSURE SWITCHES TYPE MAP

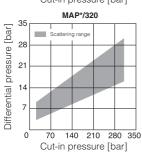
Assembly position / location	Any position				
Subplate surface finishing	Roughness index Ra 0,4 - flatness ratio 0,01/100 (ISO 1101)				
Ambient temperature	from -20°C to +70°C				
Fluid	Hydraulic oil as per DIN 51524 535; for other fluids see section 1				
Recommended viscosity	15 ÷ 100 mm²/s at 40°C (ISO VG 15 ÷ 100)				
Fluid contamination class	ISO 4401 class 21/19/16 NAS 1638 class 10 (filters at 25 μm value with β25 ≥ 75 recommended)				
Fluid temperature	-20°C +60°C (standard seals and water glycol) -20°C +80°C (/PE seals)				

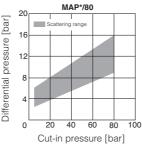
3 MAIN CHARACTERISTICS AND WIRING OF INTERNAL MICROSWITCH

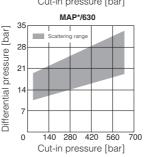
		Supply voltage [V]					Resting position	Pressure operated position	
		125 AC	250 AC	30 DC	250 DC		2	2	
Max current - resistive load -	[A]	7	5	5	0,2	STD		1 3	
Max current - inductive load (Cos ϕ = 0,4) -	[A]	4	2	3	0,02		1		
Insulating resistance \geq 100 M Ω					/E	2			
Contact resistance		= $15 \text{ m}\Omega$							
Electrical life-expectancy	≥ 1.000.000 switchings					3 J			
Mechanical life-expectancy		≥ 10.000.000	switchings				1 1	1 1	

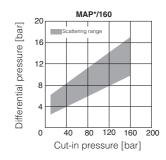
4 DIAGRAMS





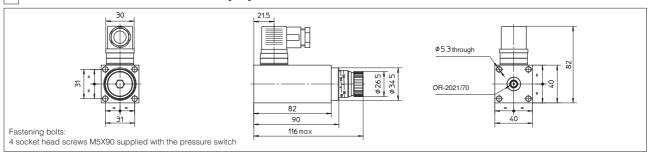




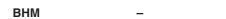


The graphs show, according to the set cut-in pressure, the pressure difference between the insert and the at-rest positions of the pressure switch electric contacts.

5 DIMENSIONS OF MAP WITHOUT ADAPTORS [mm]



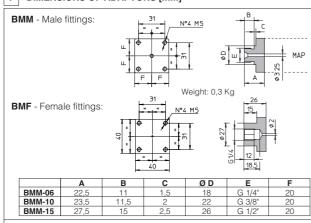
6 MODEL CODE FOR ADAPTORS WHEN SUPPLIED SEPARATELY

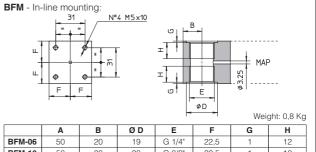




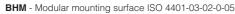
Threated connection	ns for BMM and BFM adaptors, see section 7	Port to serve for BHM and BKM adaptors,
BMM	BFM	see section 7
06 = G 1/4"	06 = G 1/4"	11 = port P
10 = G 3/8"	10 = G 3/8"	12 = port A and B
15 = G 1/2"	15 = G 1/2"	13 = port A
	20 = G 3/4"	14 = port B
BMF	25 = G 1"	17 = port P and A
06 = G 1/4"	32 = G 1 ¹ /4"	18 = port P and B

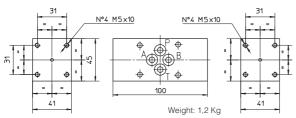
7 DIMENSIONS OF ADAPTORS [mm]

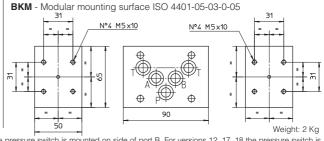




		Α	В	ØD	E	F	G	Н
BFM-	06	50	20	19	G 1/4"	22,5	1	12
BFM-	10	50	20	23	G 3/8"	22,5	1	12
BFM-	15	50	20	27	G 1/2"	22,5	1	15
BFM-	20	50	20	33	G 3/4"	22,5	1,5	17
BFM-	25	70	30	40	G 1"	30	1,5	19
BFM-	32	70	30	50	G 1 1/4"	30	1,5	22







Weight: 2 Kg
For versions 11 and 13 the pressure switch is mounted on side of port A. For version 14 the pressure switch is mounted on side of port B. For versions 12, 17, 18 the pressure switch is mounted on both sides.