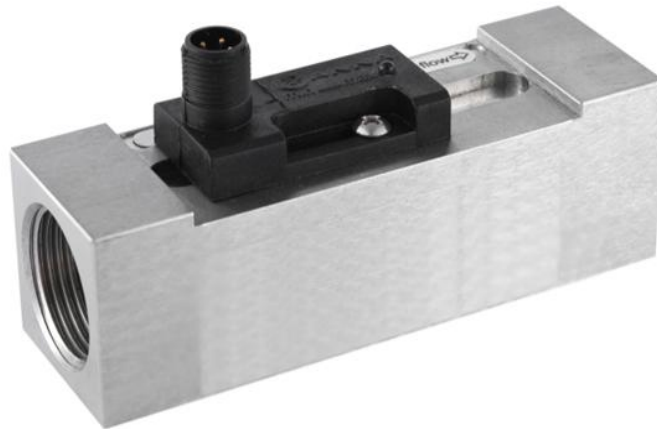


Datasheet

Piton Flow Switch F10

Introduction

F10 equips with a piston which responds to the amount of flow within a pipe. When there is an increase or a decrease in the flow rate, movement of the piston actuates a hermetically sealed reed switch, triggering the specified action.



Characteristics

1/4...1" / DN08...DN25

Repeatability 5%

Aluminum or stainless steel housing material

LED display for easier use

Applicable to liquid or gas

Flow rate indicator

Applications

Inline mount for small pipelines

Hydraulic and lubrication system

Cooling system

Compressed air

Air conditioning industry

Machine manufacturing

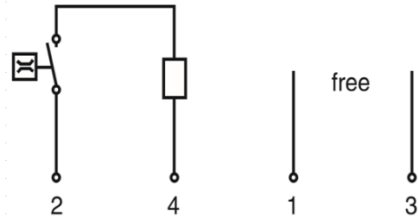
Specifications

Measurable flow range	See below for details
Accuracy	5% of full span
Hysteresis	Depend on the switch point, Min. 0.132GPM (0.5L/min)
Flow indicator	Calibrated with 20°C water; Horizontally mounting
	Mounting position, medium and temperature will affect this indicator slightly
LED	LED for switch state
Electrical connection	M12 x 1
Output	Reed switch (24VDC, 1A)
Pressure rating	725psi / 50 bar (Aluminum housing)
	1450psi / 100 bar (stainless steel housing)
Average pressuer loss	4.35psi (6.6GPM) / 0.3 bar (25L/min)
Medium temperature	Max. 194°F / 90°C
Protection class	IP65
Material	Housing: Stainless steel or Aluminum
	Piston: POM plastic
	Spring: stainless steel
	Sealing: NBR

Measurable flow range

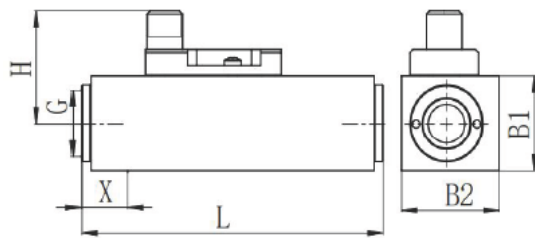
DN	Aluminum housing		Stainless steel housing		Max.Flow rate
	Measurable flow range L/min (water)	Pressure (bar)	Measurable flow range L/min (water)	Pressure (bar)	
8	0.6...7	50	0.1...6.5	100	40
	1...12.5		0.5...11		
10	0.6...7		0.1...6.5		40
	1...12.5		0.5...11		
15	0.6...7		0.1...6.5		40
	1...12.5		0.5...11		
	2...24		0.8...22		
20	0.6...7		0.1...6.5		100
	1...12.5		0.5...11		
	2...24		0.8...22		
	27...70		21...66		
25	0.6...7		0.1...6.5		100
	1...12.5	0.5...11			
	2...24	0.8...22			
	27...70	21...66			

Wiring

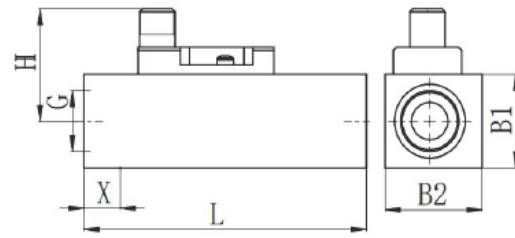


PIN	Cable color	Description
1	Brown	-
2	White	24VDC±20% / 220VAC±15%
3	Blue	-
4	Black	Load (signal output)

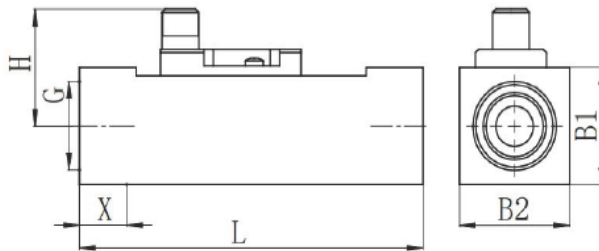
Dimension in mm



FP10N-008.../FP10N-010...



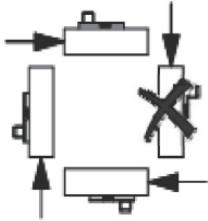
FP10N-015...



FP10N-020.../FP10N-025...

DN	G	L is related to measurable flow range		H (mm)	B1 (mm)	B2 (mm)	X (mm)	Weight (kg)	
		L (mm)	Measurable flow range					Aluminum	Stainless steel
8	G1/4	99	any flow range	36	30	32	12	0.22	0.53
10	G3/8	99	any flow range	36	30	32	12	0.2	0.51
15	G1/2	93	any flow range	36	30	32	12	0.18	0.48
20	G3/4	109	All others except below 2 listed	36	35	35	15	0.23	0.65
		121	27...70 (Aluminum) 21...66 (Stainless steel)						
25	G1	109	All others except below 2 listed	36	40	40	15	0.32	0.82
		115	27...70 (Aluminum) 21...66 (Stainless steel)						

Mounting



Order Code

Example: F10-010AYAQ1

1. Model

F10- Piston flow switch

2. Pipe size

008 Female thread connection G1/4
 010 Female thread connection G3/8
 015 Female thread connection G1/2
 020 Female thread connection G3/4
 025 Female thread connection G1

3. Housing material

A Aluminum
 K Stainless steel

4. Indicator

N No led indicator
 Y LED indicator (24 VDC)

5. Measuring range (L/min)

A	0.6...7 (Aluminum);	0.1...6.5 (Stainless steel)
B	1...12.5 (Aluminum);	0.5...11 (Stainless steel)
C	2...24 (Aluminum);	0.8...22 (Stainless steel)
D	27...70 (Aluminum);	21...66 (Stainless steel)

6. Electrical connection

Q M12 x 1

7. Output

1	1 switch output
2	2 switch outputs