# **FS Flow Sensor Series**



Eaton's Flow Sensor Series is designed to protect personnel and property in case of hose failure in compliance with Federal Safety Regulations. Flow Sensors are intended for use with compressed air.

#### **Product Features**

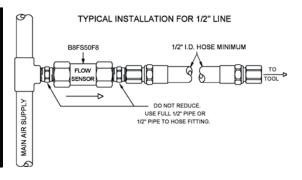
- Automatically shuts off air flow to ruptured hose
- Reduces risk of injury or damage from hose whip
- Automatically resets after failure correction
- Operates in any orientation
- Compact design, economical, tamper-resistant
- Standard body material: Brass

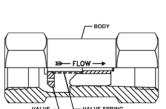
#### **Physical Characteristics**

	wax. Operati	ng Pressure	wiin. burst F	ressure	nateu riow		
Size	(bar)	(psi)	(bar)	(psi)	(lpm)	(gpm)	
All Sizes	17	250	68	1,000	See Chart	See Chart	

### **Applications & Markets**

- General Industry
- Pneumatic Tools





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Flow Data: The graph above indicates the minimum inlet pressure for various hose lengths. Each Flow Sensor has a shut-off flow rating dependent upon inlet pressure. The length of hose and fitting size are critical in the proper operation of the valve. For example, with the B8FS50F8 Flow Sensor, the hose I.D. must be 1/2" using only 1/2" pipe thread end fittings. Thirty feet of hose requires at least 20 psig inlet pressure; fifty feet of hose requires at least 28 psig inlet pressure; and seventy-five feet of hose requires at least 36 psig inlet pressure. Inlet pressures lower than those indicated on the curves above will not guarantee protection in case of hose failure. Valve shut-off occurs only when flow exceeds the flow rating for the inlet pressure.

If hose lengths greater than 75 feet are required, a 1/2" size or larger Flow Sensor must be installed on the inlet end of each 75-foot section, and a correspondingly higher inlet pressure must be supplied for proper operation of the Flow Sensor to assure safety.

Part Number*	Body Size	Thread Size	Туре	Shut-off Flow, SCFM, at Inlet Pressure, PSIG								Dimensions Length Hex Length Hex			
				60	80	100	120	140	160	180	200	(in)	(in)	(mm)	(mm)
B4FS25F2	1/4	1/4-18	NPTF	16	18	20	22	23	25	26	27	2.14	0.75	54.36	19.05
B6FS37F5	3/8	3/8-18	NPTF	41	46	50	55	59	63	66	69	2.50	0.88	63.50	22.35
B8FS50F8	1/2	1/2-14	NPTF	65	73	80	87	93	99	704	109	3.12	1.06	79.25	26.92
B12FS75F13	3/4	3/4-14	NPTF	105	118	130	141	152	161	169	177	3.68	1.38	93.47	35.05
B16FS100F21	1	1-11 1/2	NPTF	170	191	210	227	245	260	273	286	4.59	1.75	116.59	44.45
B24FS150F45	1 1/2	1 1/2-11 1/2	NPTF	365	410	450	489	525	557	586	615	5.86	2.50	148.84	63.50

<sup>\*</sup>All flow sensors have a pressure drop of approximately 2 psid at 80% of shut-off flow