

FLOW CONTROL VALVES

NEEDLE VALVES

CHECK VALVES

SPECIFICATIONS

Maximum Operating Pressure (Non-Shock Service)

- Brass – 2,000 PSI (138 Bar)
- Carbon Steel – 5,000 PSI (345 Bar)

Operating Temperature Range (O-Ring Packing)

Viton: -15° to +400° F (-26° to 203°C)

Threads

NPTF Standard, 1/8", 1/4", 3/8" and 1/2".

Materials

- Housing, Plug, Body – Hexagon Brass, Hexagon Carbon Steel
- Needle – 416 Stainless Steel on Steel Valves
- Needle – Brass on Brass Valves
- Back-up Washer – Teflon
- Knob – Aluminum
- Tamperproof Key – Cadmium Plated Steel
- Ball – Stainless Steel
- Retainer – Stainless Steel
- Spring – Stainless Steel

ORDERING INFORMATION

SERIES	TYPE	SIZE	MATERIAL
F	MF	10	B

- F = Flow Control
- N = Needle
- C = Check

Male-to-Female Pipe Threads

- 10 = 1/8"
- 20 = 1/4"
- 25 = 3/8"
- 30 = 1/2"

- B = Brass
- S = Steel

Example:

To order 1/4" brass male-to-female needle valves with knob, specify NMF20BK.

Pneu-Trol

MALE-TO-FEMALE FLOW CONTROL, NEEDLE AND CHECK VALVES

- Eliminates Need for Extra Pipe Nipple

FLOW CONTROL

A spring biased ball provides full flow in one direction; a tapered needle provides a wide range of adjustment of flow in the controlled direction. A locknut prevents unwanted changes in adjustment. A knurled knob is standard; a tamperproof adjustment key is available.

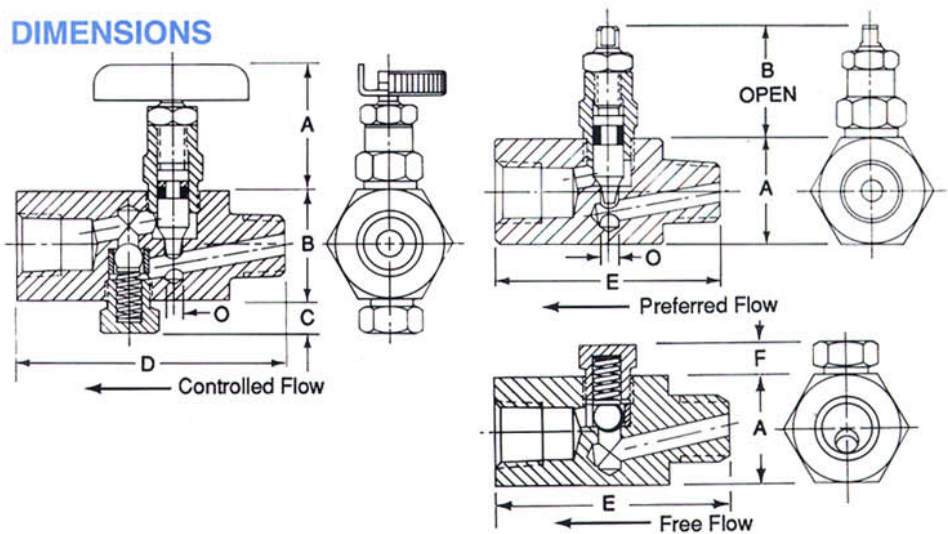
NEEDLE

A wide range of flow adjustment is possible because of the fine thread, tapered needle. Unwanted changes in adjustment are prevented by a locknut. A knurled knob is standard; a tamperproof adjustment key is available.

CHECK

A slight pressure differential fully opens or closes the ball or poppet check valve. This valve is available with either ball check or bubble-tight poppet check.

DIMENSIONS



PIPE SIZE	A HEX	B	C	D	E	F	O
1/8"	11/16 (17.5)	7/8 (22.3)	13/64 (5.2)	1-3/4 (44.5)	1-15/32 (37.4)	—	.107 (2.8)
1/4"	7/8 (22.3)	1 (25.4)	23/64 (9.2)	2-3/8 (60.4)	2 (50.8)	23/64 (9.2)	.156 (4.0)
3/8"	1-1/16 (27.0)	1-13/16 (46.1)	11/32 (8.8)	2-3/4 (69.9)	2-1/4 (57.2)	—	.219 (5.6)
1/2"	1-5/16 (33.4)	1-7/16 (36.6)	15/32 (12.0)	3-3/16 (81.0)	2-21/32 (67.5)	—	.281 (7.2)

() Parentheses = Millimeters

ORDERING INFORMATION

	FLOW CONTROL VALVES	FLOW CHECK	NEEDLE VALVES		Max. Open Needle	CHECK VALVES
SIZE	Brass	Cv	Brass	Carbon Steel	Cv	Brass
1/8"	FMF10BK	.23	NMF10BK	—	.20	—
1/4"	FMF20BK	.54	NMF20BK	NMF20SK	.43	CPMF20B*
3/8"	FMF25BK	.83	—	NMF25SK	.78	—
1/2"	FMF30BK	1.47	—	—	—	—

* Poppet Style Check