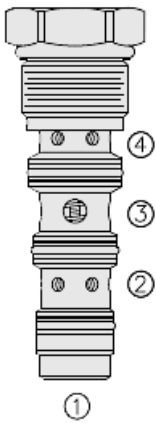




Overview



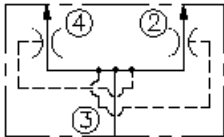
Description

The FD50-45 is a screw-in cartridge, spool type flow divider/combiner valve. It provides pressure compensated proportional division of inlet flow or combining of two return flows regardless of system operating pressure conditions. The valve provides synchronizing flow in dividing and combining modes. The valve is intended for use in mineral based or synthetic hydraulic fluids with lubricating properties.

Features

- Hardened parts for long life.
- Quiet, modulated response.
- Wide operating flow range.
- Synchronizing in dividing and combining modes.
- Floating cage “high installation torque.
- Industry-common cavity.

Symbol



Ratings

Pressure Ratings

Pressure rating	345 bar (5000 psi)	
Pressure drop	20.5 bar (300 psi)	- Note: At maximum inlet flow

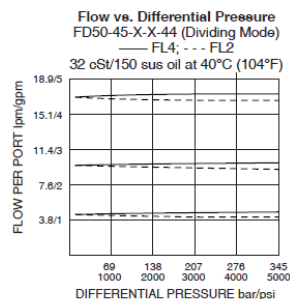
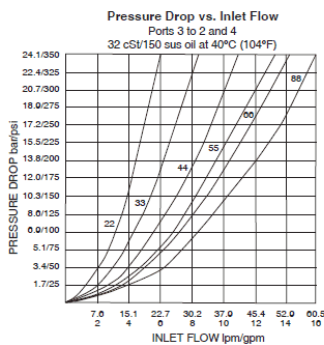
Flow Ratings

Inlet flow rating	19 to 57 lpm (5.0 to 15.0 gpm)
Synchronizing flow	Approximately 10% of maximum inlet flow
Flow accuracy	15 % - Note: Of inlet flow (maximum)

Properties

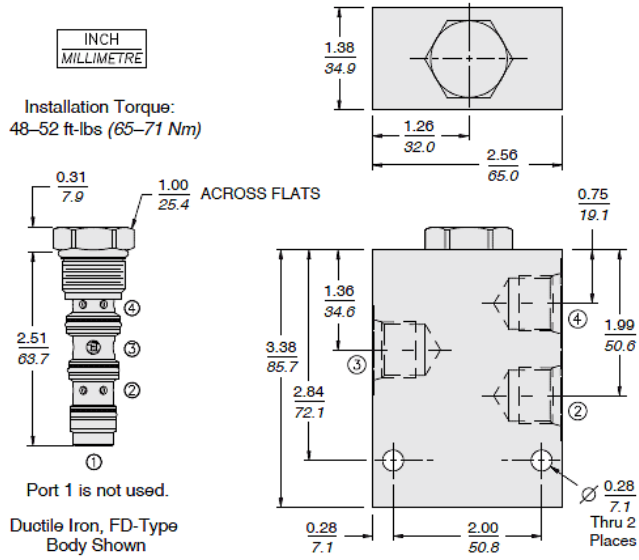
Unit weight	0.49 kg (1.07 lb)
-------------	-------------------

Performance





Dimensions



Installation Specifications

Cavity VC10-4

Accessories

Seal kit SK10-4N-MMM
Housings



Order Code

FD50-45 -

Ported Bodies

- Cartridge Only 0
- SAE 6 (all ports) 6TD
- SAE 8 (all ports) 8TD
- SAE 8 port 3;
SAE 6 ports 2 & 4 8DD
- 1/4 in. BSP* (all ports) 2BD
- 3/8 in. BSP* (all ports) 3BD

*BSP Body; U.K. Mfr. Only

Dividing/Combining Ratio

- 22 50:50 rated @ 4-19 lpm (1-5 gpm) input
- 33 50:50 rated @ 5.5-26.5 lpm (1.5-7 gpm) input
- 44 50:50 rated @ 9.5-38 lpm (2.5-10 gpm) input
- 55 50:50 rated @ 11.5-41.5 lpm (3-11 gpm) input
- 66 50:50 rated @ 15-45 lpm (4-12 gpm) input
- 88 50:50 rated @ 19-57 lpm (5-15 gpm) input

Seals

- N Buna N (Std.)
- V Fluorocarbon
- P Polyurethane*
- U Urethane*

* Required for operation over 240 bar (3500 psi); FD50 option.

POSITION	CODE	DESCRIPTION
		FD50-45-H-J-N
H		Line Body
H	0	No Body
H	6T	Aluminum SAE 6
H	6TD	Ductile Iron SAE 6
J		Seal
J	N	Buna-N
J	V	Fluorocarbon
J	P	Polyurethane
N		Flow Dividing/Combining
N	22	50/50 Rated at 4.0-19.0 lpm (1.0-5.0 gpm)
N	33	50/50 Rated at 5.5-26.5 lpm (1.5-7.0 gpm)
N	44	50/50 Rated at 9.5-38.0 lpm (2.5-10.0 gpm)
N	55	50/50 Rated at 11.5-41.5 lpm (3.0-11.0 gpm)
N	66	50/50 Rated at 15.0-45.0 lpm (4.0-12.0 gpm)
N	88	50/50 Rated at 19.0-57.0 lpm (5.0-15.0 gpm)