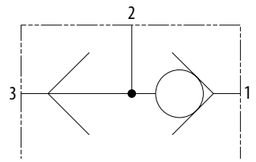
DSV2-8 - Shuttle valve

Ball type
23 L/min (6 USgpm) • 240 bar (3500 psi)



Operation

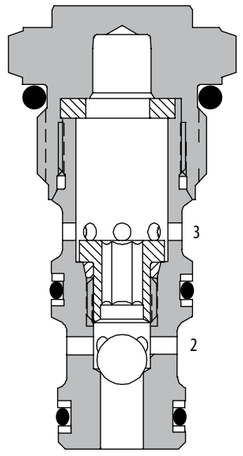
When a higher pressure is sensed at inlet 1 than at inlet 2 the ball within the cartridge is forced against a seat opening the higher pressure to outlet.

When the higher pressure appears at inlet 2 the ball is forced against the other seat which blocks inlet 1 and opens up inlet 2 to outlet.

Features

Cartridge design enabling speedy servicing when mounted in a body or in a composite manifold.

Sectional view



Performance data

Ratings and specifications

Performance data is typical with fluid at 21,8 cSt (105 SUS) and 49°C (120°F)	
Typical application pressure (all ports)	240 bar (3500 psi) steel housing
Cartridge fatigue pressure (infinite life)	240 bar (3500 psi)
Rated flow	23 L/min (6 USgpm)
Internal leakage	Between ports 2 and 1, and 2 and 3 <5 drops/min maximum @ 240 bar (3500 psi)
Cavity	C-8-3
Standard housing materials	Aluminum or steel
Temperature range	-40°C to +120°C (-40° to + 248°F)
Fluids	All general purpose hydraulic fluids such as MIL-H-5606, SAE 10, SAE 20, etc.
Filtration level	Cleanliness code 18/**16/13**
Weight cartridge only	0,06 kg (0.14 lbs)
Seal kits	02-160755 (Buna-N) 02-160756 (Viton®)

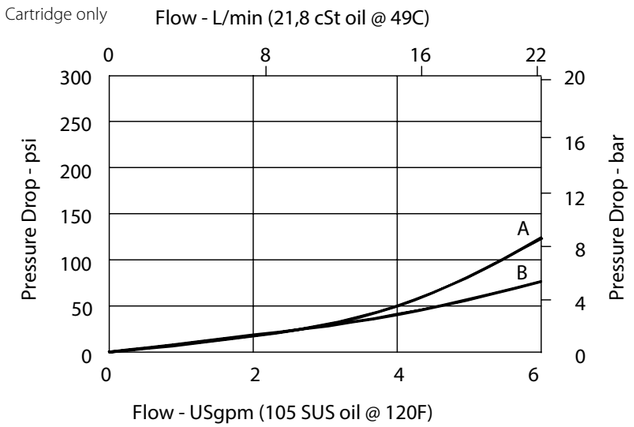
Viton is a registered trademark of E. I. DuPont

Description

This valve provides a means of sensing the higher pressures between two lines on a hydraulic circuit allowing this line to be used for an auxiliary function such as the removal of a mechanically applied brake, the operation of a gauge or to give a remote pressure sensing line for the control of a separate valve.

Pressure drop

Cartridge only



A - Port 1 to port 2

B - Port 3 to port 2

Note: This valve is intended for application as a load sense shuttle valve in load sensing systems

DSV2-8 - Shuttle valve

Ball type
23 L/min (6 USgpm) • 240 bar (3500 psi)

Model code

DSV2 – 8 (V) – B – (*) – ** – 00

1 2 3 4 5 6 7

1 Function

DSV2 - Shuttle Valve

2 Size

8 - 8 Size

3 Seals

Blank - Buna-N
V - Viton

4 Style

B - Ball

5 Valve housing material

Omit for cartridge only
A - Aluminum
S - Steel

6 Port size

Code	Port size	Housing number - body only	
		Aluminium fatigue rated	Steel fatigue rated
4T	SAE 4	02-160741	02-160745
6T	SAE 6	02-160742	02-160746
2G	1/4" BSPP	02-160739	02-160743
3G	3/8" BSPP	02-160740	02-160744

7 Special features

00 - None
(Only required if valve has special features, omitted if "00")

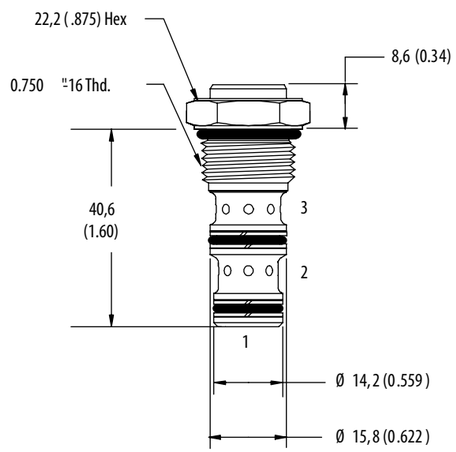
SS - 316TI Stainless Steel External components

Dimensions

mm (inch)

Cartridge only

Basic code
DSV2-8



Note: Torque cartridge in aluminum or steel housing 34-41 Nm (25-30 ft lbs).

⚠ Aluminum housings can be used for pressures up to 210 bar (3000 psi). Steel housings must be used for operating pressures above 1210 bar (3000 psi).

Installation drawing (Steel)

