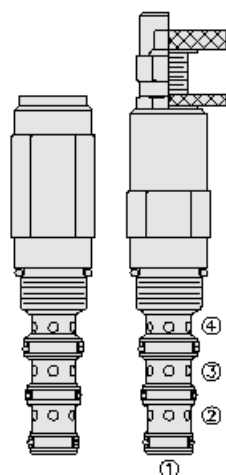




Overview



Description

The PS10-43X is a spool type, pilot operated, hydraulic sequence valve with external pilot and internal spring chamber drain. It is designed to function as a remote pilot-operated three-way valve

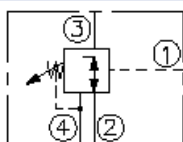
Operation

In neutral (unpiloted), the PS10-43X allows flow to pass bidirectionally from port 3 to port 2, while blocking at port 4. The spring chamber is constantly drained at port 4. Upon attainment of a predetermined pressure at port 1, the spool shifts to close port 3 to port 2, while opening port 3 to port 4

Features

- Adjustments cannot be backed out of the valve.
- Adjustments prohibit springs from going solid.
- Optional spring ranges to 151.7 bar (2200 psi).
- Hardened precision spool and cage for long life.
- Industry-common size.

Symbol



Ratings

Pressure Ratings

Pressure rating	207 bar (3000 psi) 68.9 bar (1000 psi)	- Note: Ports 1, 2, 3 - Note: Port 4
Proof pressure	241.3 bar (3500 psi) 68.9 bar (1000 psi)	- Note: Ports 1, 2, 3 - Note: Port 4
Burst pressure	965.3 bar (14000 psi)	

Flow Ratings

Flow rating	37.9 lpm (10 gpm)	
Maximum internal leakage	50 ml/min (3 in ³ /min) 50 ml/min (3 in ³ /min) 207 bar (3000 psi)	- Note: Port 3 to 4 (85% of nominal setting) - Note: Port 1 to 2 (85% of nominal setting) with added to port 1

Temperature Ratings

Operating fluid temperature	-40 to 100 °C (-40 to 212 °F) -35 to 204 °C (-31 to 400 °F) -54 to 107 °C (-65 to 225 °F)	- Note: With buna N seals - Note: With fluorocarbon seals - Note: With polyurethane seals
Storage temperature	-40 to 70 °C (-40 to 160 °F)	
Ambient temperature	-40 to 70 °C (-40 to 160 °F)	

Operating Parameters

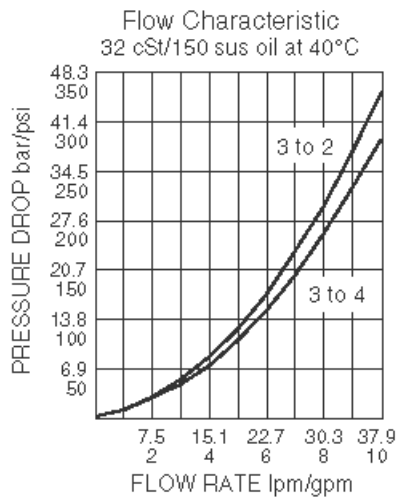
Fluids	Mineral based or synthetic with lubricating properties
Fluid viscosity range	7.4 to 420 cSt
Maximum operating contamination level	18/16/13 per ISO 4406

Properties

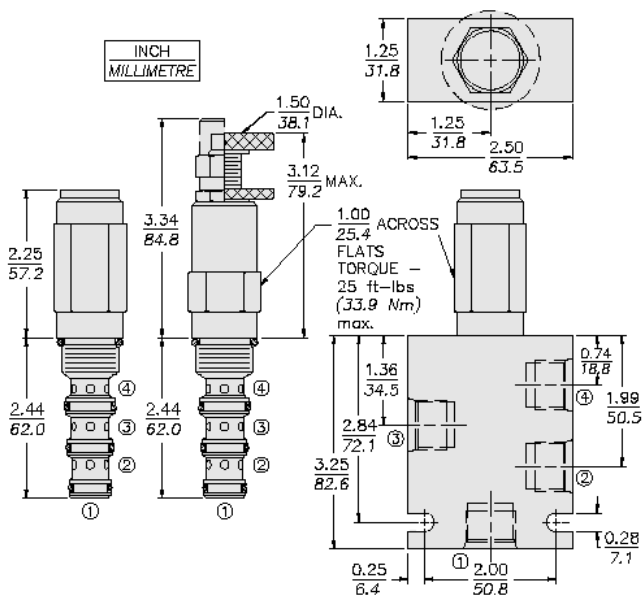
Unit weight	0.28 kg (0.61 lb) 0.31 kg (0.68 lb) 0.32 kg (0.70 lb) 0.27 kg (0.59 lb)	- Note: PS10-43A - Note: PS10-43B - Note: PS10-43C PS10-43L - Note: PS10-43F PS10-43H
Internal wetted surface area	184 cm ² (28.5 in ²) 184 cm ² (31.0 in ²)	- Note: PS10-43A PS10-43B PS10-43C PS10-43L - Note: PS10-43F PS10-43H



Performance



Dimensions



Materials

Materials

Cartridge: Weight: 0.34 kg (0.70 lb); Steel with hardened work surfaces. Zinc-plated exposed surfaces; Buna N O-rings and polyester elastomer back-ups standard. Anodized aluminum knobs and caps.

Standard Ported Body: Weight: 0.34 kg (0.70 lb); Anodized high-strength 6061 T6 aluminum alloy, rated to 207 bar (3000 psi); Ductile iron bodies available; dimensions may differ.

Adjustment Option Details: See [adjustment options](#)

Installation Specifications

Cavity	VC10-4
Cartridge installation torque	33.9 to 36.7 N-m (25 to 27 ft-lb)
H style plug torque	34 to 36 N-m (25 to 27 ft-lb)
Orientation restriction	None

Accessories

Seal kit	SK10-4X-BMM	- Note: X = seal options
Housings		



Order Code

POSITION	CODE	DESCRIPTION
		PS10-43F-H-J-R/S
F		Adjustment Option
F	A	1/4" Hex Allen Head
F	B	1-1/2" Diameter Aluminum Knob with Aluminum Lock Knob
F	C	1/4" Hex Allen Head with Cover Cap
F	F	Factory Preset Non-Adjustable
F	H	Factory Preset Hidden Adjustment
F	L	1/4" Hex Allen Head with Cover Cap and Lockwire Holes
H		Line Body
H	0	No Body
H	6T	Aluminum SAE 6
H	8T	Aluminum SAE 8
H	6TD	Ductile Iron SAE 6
J		Seal
J	N	Buna-N
J	V	Fluorocarbon
J	P	Polyurethane
J	U	PPDI Urethane
R		Spring
R	04	2.8 to 27.6 bar (40 to 400 psi) Spring Range
R	22	15.2 to 151.7 bar (220 to 2200 psi) Spring Range
S		Setting
S	MXXX	Spring Setting in XXX bar
S	XX	Spring Setting in XX psi (x 100)

