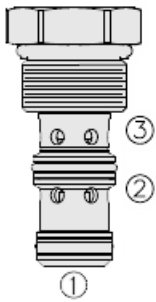




Overview



Description

The PC10-34 is a screw-in, cartridge style, pilot operated, hydraulic check valve.

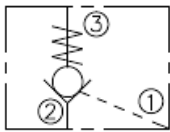
Operation

The cartridge valve allows free flow from ports 2 to 3, while normally blocking flow from ports 3 to 2. Flow will be allowed from ports 3 to 2 when pressure is applied at port 1.

Features

- Higher pilot ratio reduces valve "chatter" in low flow applications.
- Choice of several bias spring values.
- Hardened seat for long life and low leakage.
- Optional sealed piston.
- Industry common cavity.

Symbol



Ratings

Pressure Ratings

Pressure rating	241 bar (3500 psi)
Proof pressure	749 bar (11000 psi)
Burst pressure	1157 bar (17000 psi)
Pilot ratio	7:1

Flow Ratings

Flow rating	- Note: See performance graphs on sheet 2	
Maximum internal leakage	0.10 ml/min (2 drops/min)	- Note: At 207 bar (3000 psi) between ports 3 and 2
	0 ml/min (0 in ³ /min)	- Note: Between ports 2 and 1 with sealed piston
	115 ml/min (7 in ³ /min)	- Note: At 207 bar (3000 psi) between ports 2 and 1
	0 ml/min (0 in ³ /min)	- Note: Between ports 2 and 1 with sealed piston

Temperature Ratings

Operating fluid temperature	-40 to 100 °C (-40 to 212 °F)	- Note: With buna N seals
	-26 to 204 °C (-15 to 400 °F)	- Note: With fluorocarbon seals
	-54 to 107 °C (-65 to 225 °F)	- Note: With polyurethane and urethane seals
Storage temperature	-40 to 70 °C (-40 to 160 °F)	
Ambient temperature	-40 to 90 °C (-40 to 194 °F)	

Operating Parameters

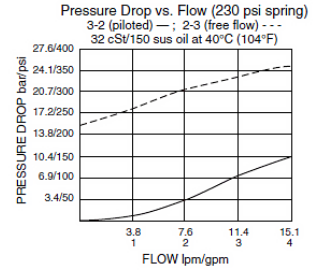
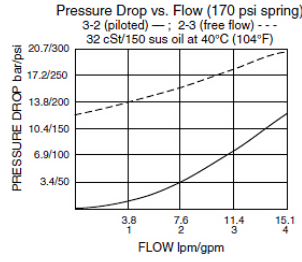
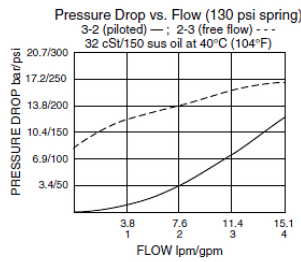
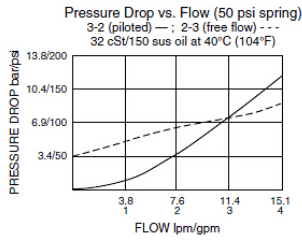
Fluids	Mineral based or synthetic hydraulic fluid with lubricating properties
Fluid viscosity range	7.4 to 420 cSt
Maximum operating contamination level	20/18/14 per ISO 4406

Properties

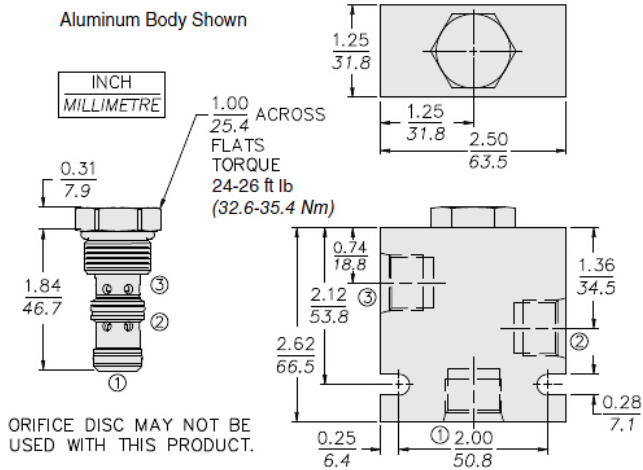
Unit weight	0.10 kg (0.21 lb)
Internal wetted surface area	99 cm ² (15.3 in ²)



Performance



Dimensions



Installation Specifications

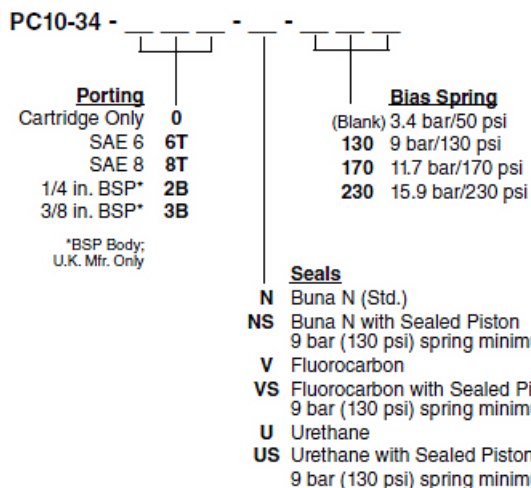
Cavity	VC10-3
Cartridge installation torque	32.6 to 35.4 N-m (24 to 26 ft-lb)
Maximum allowable torque	67.8 N-m (50 ft-lb)
Orientation restriction	None

Accessories

Seal kit	SK10-3N-TM SK10-3V-TM SK10-3U-00	- Note: Buna N - Note: Fluorocarbon - Note: Urethane
Housings		



Order Code



POSITION	CODE	DESCRIPTION
		PC10-34-H-J-R
H		Line Body
H	0	No Body
H	6T	Aluminum SAE 6
H	8T	Aluminum SAE 8
H	6TD	Ductile Iron SAE 6
H	8TD	Ductile Iron SAE 8
H	3B	Aluminum BSPP 3/8" (3)
H	3BD	Ductile Iron BSPP 3/8" (3)
J		Seal
J	N	Buna-N
J	NS	Buna-N with a Sealed Spool
J	V	Fluorocarbon
J	VS	Fluorocarbon with a Sealed Spool
J	P	Polyurethane
J	PS	Polyurethane with a Sealed Spool
J	U	PPDI Urethane
J	US	PPDI Urethane with a Sealed Spool
R		Spring
R	BLANK	50 3.4 bar (50 psi) Bias Spring
R	130	9.0 bar (130 psi) Bias Spring
R	170	11.7 bar (170 psi) Bias Spring
R	230	15.9 bar (230 psi) Bias Spring