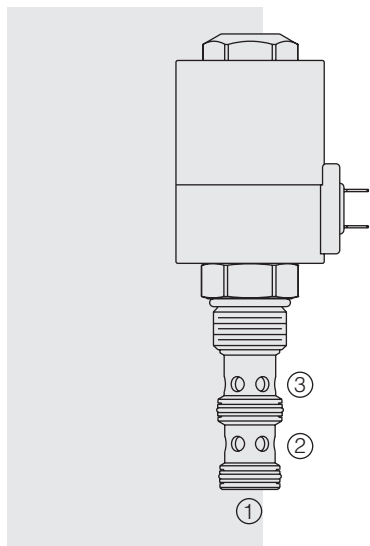


SV12-33 Spool, 3-Way



DESCRIPTION

A solenoid-operated, three-way, direct-acting spool-type, screw-in hydraulic cartridge valve, intended as a bidirectional blocking valve.

OPERATION

When de-energized, the **SV12-33** allows flow between ③ and ① while blocking flow at ②. When energized, the spool shifts to allow flow between ② and ① while blocking flow at ③.

While port ① may be fully pressurized, it is not intended to be used as the inlet.

FEATURES

- Continuous-duty rated solenoid.
- Hardened spool and cage for long life.
- Optional coil voltages and terminations.
- All ports may be fully pressurized.
- Heavy-duty waterproof E-Coils rated up to IP69K.

RATINGS

Operating Pressure: 240 bar (3500 psi) max.

Flow: See Performance Chart

Leakage: 410 cc/minute (25 cu. in./minute) at 240 bar (3500 psi)

Temperature: -40 to 120°C with Buna N seals

Coil Duty Rating: See Chart

Response Time: Pull-In: 100 msec; Drop-Out: 100 msec

Initial Coil Current Draw at 20°C: 2.8 amps at 12 VDC

Filtration: See page 9.010.1

Fluids: Mineral-based or synthetics with lubricating properties at viscosities of 7.4 to 420 cSt (50 to 2000 sus); See Temperature and Oil Viscosity, page 9.060.1

Installation: No restrictions; See page 9.020.1

Cavity: VC12-3; See page 9.112.1

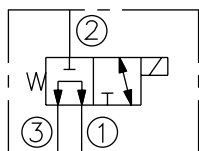
Cavity Tool: CT12-3XX; See page 8.600.1

Seal Kit: SK12-3X-MM; See page 8.650.1

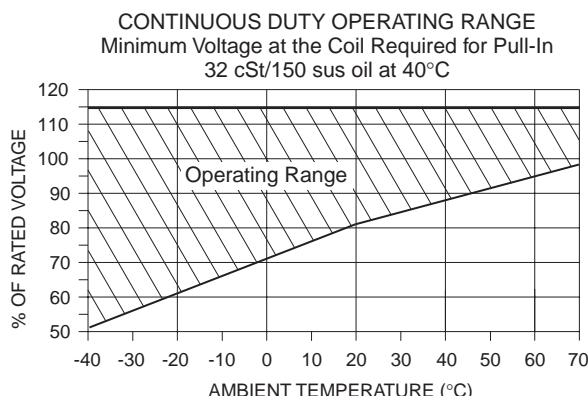
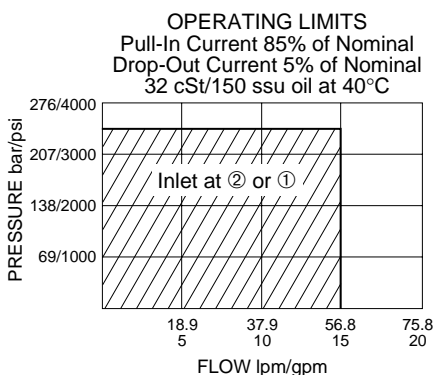
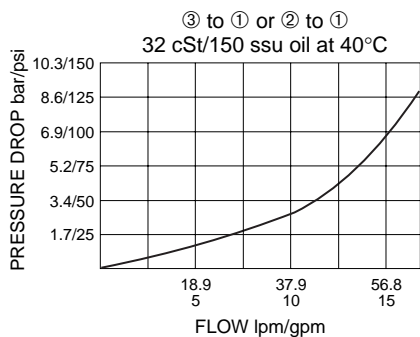
E-Coil Nut: Part No. 7085180

SYMBOLS

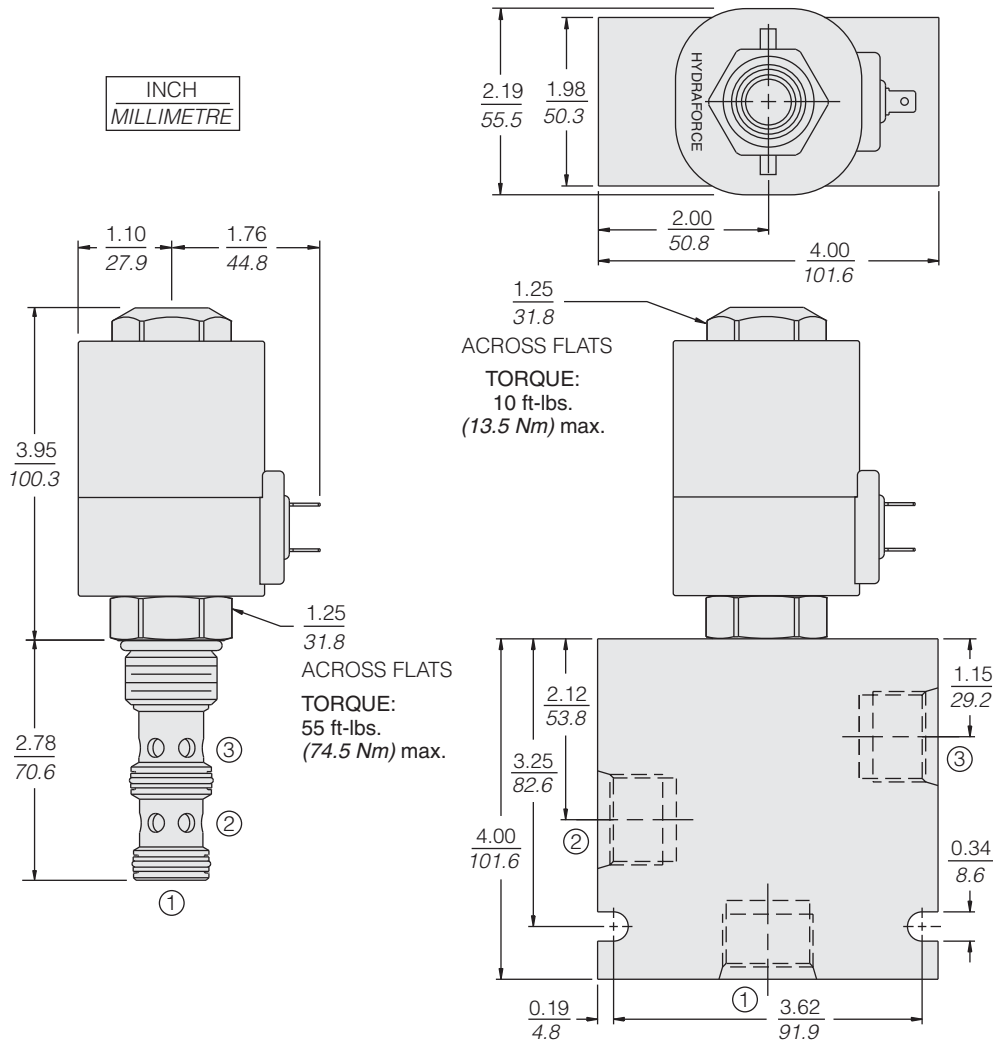
USAS/ISO:



PERFORMANCE (Cartridge Only)



DIMENSIONS



ACROSS FLATS
TORQUE:
10 ft-lbs.
(13.5 Nm) max.

ACROSS FLATS
TORQUE:
55 ft-lbs.
(74.5 Nm) max.

MATERIALS

Cartridge: Weight: 0.29 kg. (0.65 lbs.)
Steel with hardened work surfaces.
Zinc-plated exposed surfaces.
Buna N O-rings and TFE back-ups standard.

Standard Ported Body: Weight:
0.98 kg. (2.15 lbs.) Anodized high-strength 6061 T6 aluminum alloy, rated to 207 bar (3000 psi). Ductile iron bodies available; dimensions may differ. See page 8.012.1.

E-Coil: Weight: 1.36 kg. (3.0 lbs.)
Fully encapsulated with rugged external metal shell. Rated up to IP69K with integral connectors. See page 3.400.1.

TO ORDER

SV12-33		-	-	-	-	-
Porting						
Cartridge Only	0					
SAE 8	8T					
SAE 10	10T					
SAE 12	12T					
1/2 in. BSP*	4B					
3/4 in. BSP*	6B					
*BSP Body; U.K. Mfr. Only						
Seals						
Buna N (Std.)	N					
Fluorocarbon	V					
					Terminations (VDC)	
					EL Leadwires (2), IP65 Rated	
					ES Dual Spades, IP65 Rated	
					EG DIN 43650, IP65 Rated	
					EW Leads w/Weather-Pack® Connector, IP65 Rated	
					EY Metri-Pack® 150 Connector, IP69K Rated	
						Coils with internal diode are available. Consult factory.
				Voltage		
				0 Less Coil		
				12 12 VDC		
				24 24 VDC		
				36 36 VDC		
				48 48 VDC		
					Other coil voltages may be available for OEM applications. Consult factory.	