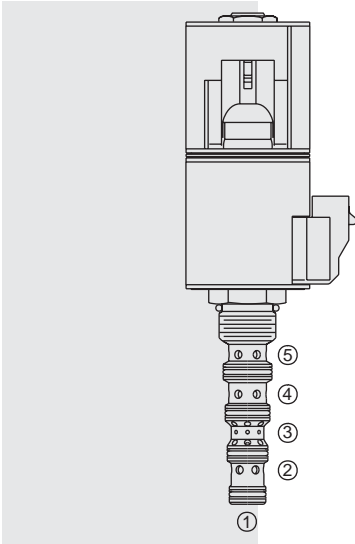


# SV10-58D Spool, 5-Way, 3-Position . . .



## DESCRIPTION

A solenoid-operated, five-way, three-position, motor-spool-type, screw-in hydraulic cartridge valve with integral load-sense port.

## OPERATION

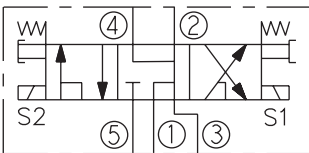
When de-energized, the **SV10-58D** blocks inlet flow at port ⑤ while load sense at port ① is vented to port ③, and ports ② and ④ are connected to port ③. When coil #1 is energized, flow is allowed from ⑤ to ② and from ④ to ③. When coil #2 is energized, flow is allowed from ⑤ to ④ and from ② to ③. Load sense at ① is connected to port ⑤ when spool is in shifted positions.

## FEATURES

- Continuous-duty rated solenoid.
- Hardened precision spool and cage for long life.
- Optional coil voltages and terminations.
- Optional waterproof E-Coils rated up to IP69K.
- Optional manual override.
- Efficient wet-armature construction.
- Cartridges are voltage interchangeable.
- Unitized, molded coil design.

## SYMBOLS

### USASI/ISO:



## RATINGS

**Operating Pressure:** 247 bar (3625 psi) with standard Buna N seals

**Flow:** 30.3 lpm (8 gpm) maximum; see performance charts

**Internal Leakage:** 164 cc/minute (10 cu. in./minute) max. at 250 bar (3625 psi)

**Temperature:** -40 to 120°C with standard Buna seals

**Coil Duty Rating:** Continuous from 85% to 115% of nominal voltage

**Initial Coil Current Draw at 20° C:** Standard Coil: 1.67 amps at 12 VDC; 0.18 amps at 115 VAC (full wave rectified). E-Coil: 1.6 amps at 12 VDC; 0.8 amps at 24 VDC

**Minimum Pull-in Voltage:** 85% of nominal at 207 bar (3000 psi)

**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

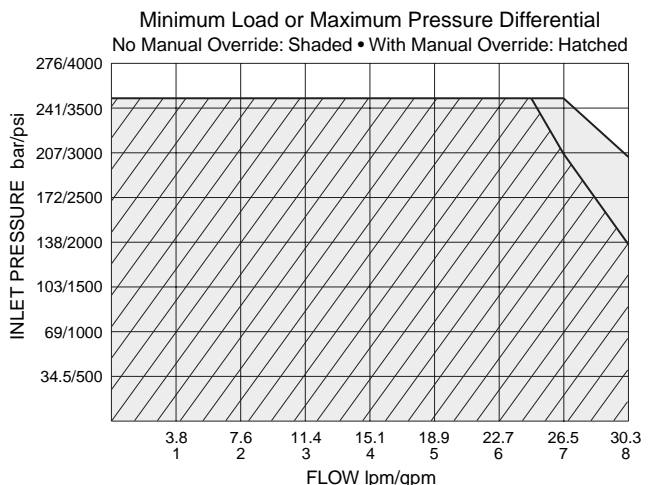
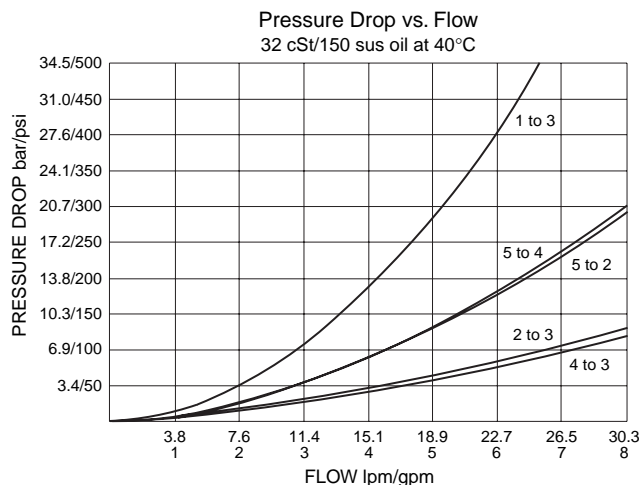
**Cavity:** VC10-5; See page 9.110.1

**Cavity Tool:** CT10-5XX; See page 8.600.1

**Seal Kit:** SK10-5X-MMMM; See page 8.650.1

**Coil Nut:** Part No. 7004400; **Coil Spacer** for E-Coils: Part No. 4539700

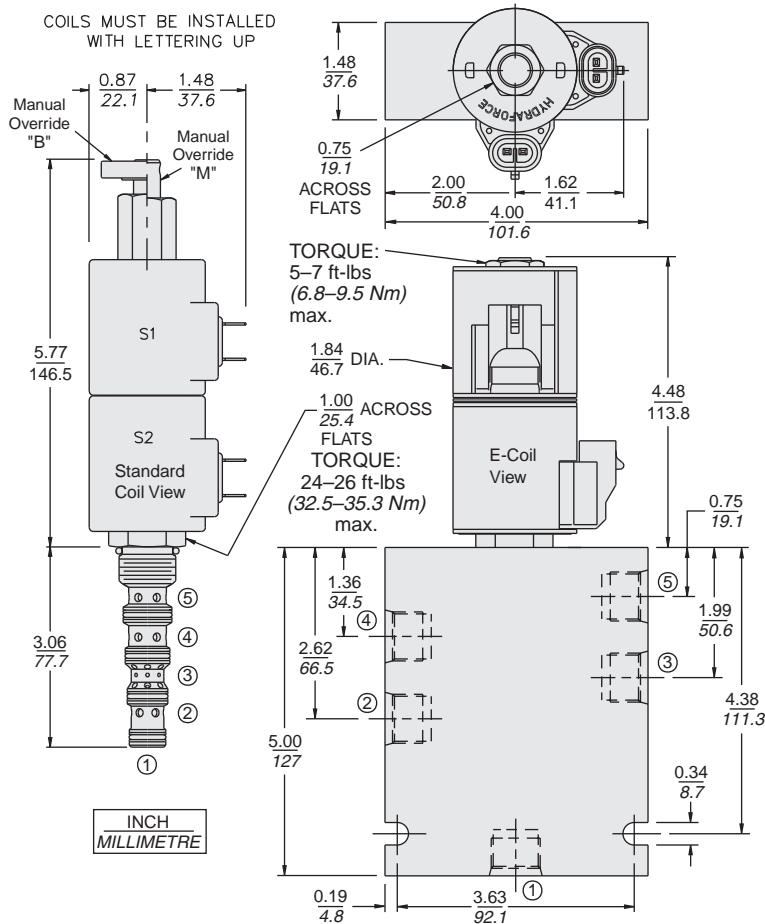
## PERFORMANCE (Cartridge Only)



for Load Sense Applications

SV10-58D

**DIMENSIONS**



**MATERIALS**

**Cartridge:** Weight: 0.35 kg. (0.76 lbs.); Steel with hardened work surfaces. Zinc-plated exposed surfaces; Buna N O-rings and back-ups standard.

**Standard Ported Body:** Weight: 0.41 kg. (0.85 lbs.); Anodized high-strength 6061 T6 aluminum alloy, rated to 207 bar (3000 psi); Ductile iron bodies available; dimensions may differ. See page 8.010.1.

**Standard Coil:** Weight each: 0.27 kg. (0.60 lbs.); Unitized thermoplastic encapsulated, Class H high temperature magnetwire. See page 3.200.1

**E-Coil:** Weight: 0.41 kg. (0.9 lbs.); Perfect wound, fully encapsulated with rugged external metal shell; Rated up to IP69K with integral connectors.

See page 3.400.1 for all E-Coil retrofit applications.

**TO ORDER**

**SV10-58D**

**Option**  
None (Blank)  
Manual Override **B**  
Manual Override **M**  
For Manual Override options see page 1.001.1

**Porting**  
Cartridge Only **0**  
SAE 6 **6T**  
SAE 8 **8T**

**Seals**  
Buna N (Std.) **N**  
Fluorocarbon **V**

**Voltage Std. Coil**

**0** Less Coil\*\*  
**10** 10 VDC†  
**12** 12 VDC  
**24** 24 VDC  
**36** 36 VDC  
**48** 48 VDC  
**24** 24 VAC  
**115** 115 VAC  
**230** 230 VAC

\*\*Includes Std. Coil Nut

† DS, DW or DL terminations only.

**E-Coil**

**10** 10 VDC  
**12** 12 VDC  
**20** 20 VDC  
**24** 24 VDC

**Termination (VDC) Std. Coil**

**DS** Dual Spades  
**DG** DIN 43650  
**DL** Leadwires (2)  
**DL/W** Leads w/Weatherpak® Connectors  
**DR** Deutsch DT04-2P

**Termination (VAC) Std. Coil**

**AG** DIN 43650  
**AP** 1/2 in. Conduit

**Termination (VDC) E-Coil**

**ER** Deutsch DT04-2P (IP69K Rated)  
**EY** Metri-Pack® 150 (IP69K Rated)

Coils with internal diode are available. Consult factory.