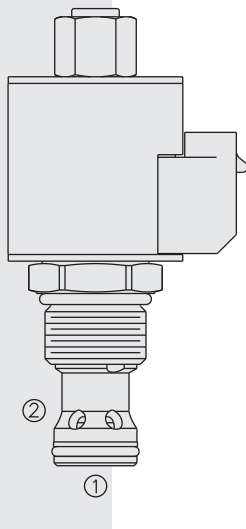


# SVRV12-26F Spool, 2-Way, Normally Open,

U.S. Patent  
7,137,406



## DESCRIPTION

A solenoid-operated, two-way, spool-type, normally open, screw-in, hydraulic pressure-relief valve.

## OPERATION

When the coil is activated, the pilot closes the drain flow and the spool closes port 2. In this position, the valve works as a relief valve, relieving flow from port 1 to 2. The pilot opens when the pressure at port 1 exceeds the set pressure. Pilot flow is discharged to port 2.

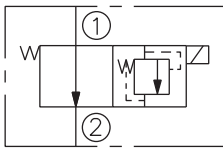
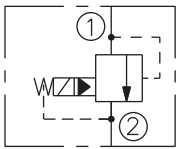
## FEATURES

- Multi-function.
- Factory preset pressure adjustment.
- Hardened spool and cage for long life.
- Unitized, molded coil design.
- Cartridges are voltage interchangeable.
- Optional coil voltages and terminations.
- Efficient wet-armature construction.
- Industry common cavity.
- Continuous-duty rated solenoid.

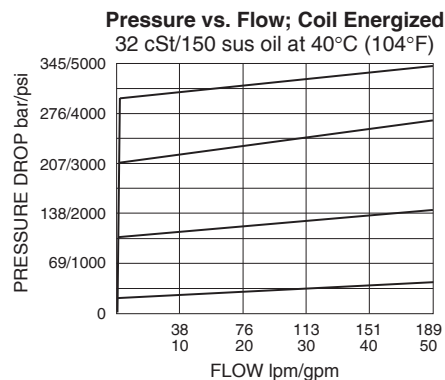
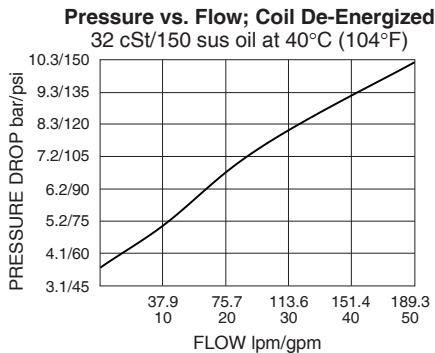
## SYMBOLS

ISO:

Expanded:



## PERFORMANCE (Cartridge Only)



## RATINGS

**Operating Pressure:** 297 bar (4300 psi)

**Proof Pressure:** 345 bar (5000 psi)

**Burst Pressure:** 689.5 bar (10000 psi) minimum to seat press fit

**Flow Rating:** 0 to 189 lpm (0 to 50 gpm)

**Relief Pressure Range** – setting defined as pressure evident at 7.57 lpm (2 gpm):  
20.7 to 296.5 bar (300 to 4300 psi)

**Reseat Pressure:** 80% of relief pressure setting

**Pressure Drop:** 10.3 bar (150 psi) at 89.3 lpm (50 gpm)

**Electrical Parameters:**

Coil Series	Nominal Voltage	Typical Resistance at 20 °C (68 °F)	Max Control Current
E	12 Vdc	7.1 Ω ± 5%	1.20 A

**Pull-In Amps:** 1.14 A maximum (12 V E-series coil) defined as attaining relief pressure setting

**Drop-Out Amps:** 0.08 A minimum (12 V E-series coil) defined as relief pressure returning to pressure drop across valve

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

**Pilot Flow & Leakage** at 80% of relief pressure setting: 350 ml (21.4 cu. in. per minute max.

**Temperature:** -40 to 100 °C (-40 to 212 °F) with standard Buna seals; -26 to 204 °C (-15 to 400 °F) with Fluorocarbon seals; -54 to 107 °C (-65 to 224 °F) with polyurethane seals.

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

**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:** VC12-2; See page 9.112.1

**Cavity Tool:** CT12-2XX; See page 8.600.1

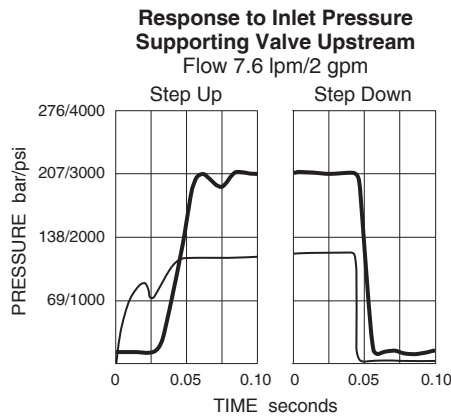
**Seal Kit:** SK12-2X-B; See page 8.650.1

**Coil Nut:** Part No. 7004420

# with Internal Relief

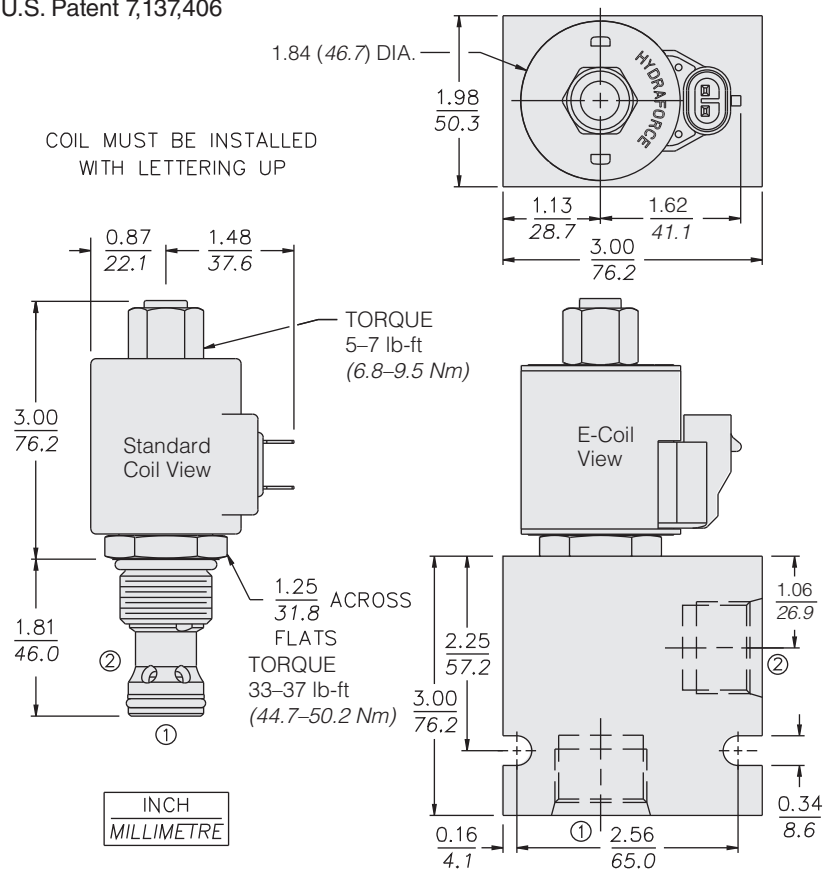
# SVRV12-26F

## PERFORMANCE (Continued)



## DIMENSIONS

U.S. Patent 7,137,406



## MATERIALS

**Cartridge:** Weight: 0.25 kg (0.56 lb)  
Steel with hardened work surfaces. Zinc-plated exposed surfaces. Buna N O-rings and polyester elastomer back-up standard.

**Standard Ported Body:** Weight: 0.57 kg (1.25 lb)  
Anodized high-strength aluminum alloy, rated to 207 bar (3000 psi). Ductile iron bodies available; dimensions may differ. See page 8.012.1

**Standard Coil:** Weight: 0.27 kg (0.60 lb)  
Unitized thermoplastic encapsulated, Class H high temperature magnet wire. See page 3.200.1

**E-Coil:** Weight: 0.41 kg (0.9 lb);  
Fully encapsulated with rugged external metal shell. Rated up to IP69K with integral connectors.  
**Note: See page 3.400.1 for all E-Coil retrofit applications.**

## TO ORDER

**SVRV12-26F - - - /**

<p><b>Porting</b></p> <p>Cartridge Only 0 SAE 12 12T</p>	<p><b>Seals</b></p> <p>Buna N (Std.) N Fluorocarbon V Polyurethane P</p>	<p><b>Voltage Std. or E-Coil</b></p> <p>0 Less Coil** 12 12 Vdc 24 24 Vdc</p> <p>**Includes Std. Coil Nut. For other voltages, see pages 3.200.1 &amp; 3.400.1</p>	<p><b>Setting in bar</b></p> <p>21 to 297 bar Examples: M75 75 bar M190 190 bar</p> <p><b>Setting in psi</b></p> <p>300 to 4300 psi Examples: 6.0 600 psi 30.0 3000 psi</p>
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<b>Coil Termination</b>	<b>E-Coil</b>	<b>D-Coil</b>
Deutsch DT04-2P	ER (IP69K)	DR (IP65)
Metri-Pak 150	EY (IP69K)	DY (IP65)
Dual Lead Wires	EL (IP69K)	DL (IP65)
Amp Jr. Timer	EJ (IP67)	—
DIN 43650	EG (IP65)	DG (IP65)
Dual Spades	—	DS (IP65)

For Coil with Zener Diode, add "Z" to option code.  
For example: "ER/Z". Not available on all models.  
See coil option info. on pages 3.200.1 & 3.400.1