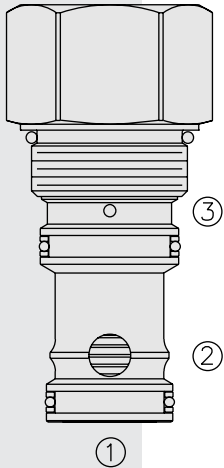


DIRECTIONAL VALVES

EP20-S35 Piloted Spool-Type Logic Element



DESCRIPTION

A spool-type, screw-in, cartridge-style, hydraulic directional element, with multi-function potential when used with other directional, pressure, or flow control devices.

OPERATION

The **EP20-S35** is a spring-biased blocking valve which will shift to allow full flow from ① to ② only when pressure at ① exceeds the cumulative pressure of ③, plus the bias spring pressure value.

EP20-S35 is a pilot-to-close directional valve.

With no pressure at ③, flow will be allowed from ① to ② once the bias spring force is overcome with pressure at ①.

FEATURES

- Multiple function/application potential.
- Low pressure drop.
- Industry common cavity.

RATINGS

Maximum Operating Pressure: Cartridge Only: Ports ① & ②: 345 bar (5000 psi); Port ③: 320 bar (4600 psi); Polyurethane seals are recommended for operation over 240 bar (3500 psi). Aluminum bodies are rated for 207 bar (3000 psi).

Flow: See Performance Chart

Internal Leakage: 1 1/2 cc/minute (1 1/2 cu. in./minute) max. at 345 bar (5000 psi)

Bias Spring Pressure Options: 5.5 bar (80 psi); 11.0 bar (160 psi)

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

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

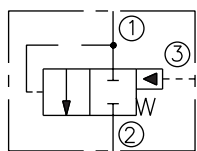
Cavity: VC20-S3; See page 9.120.1

Cavity Tool: CT20-S3xx; See page 8.600.1

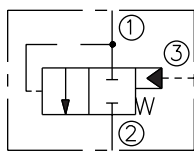
Seal Kit: SK20-S3x-MM; See page 8.650.1

SYMBOLS

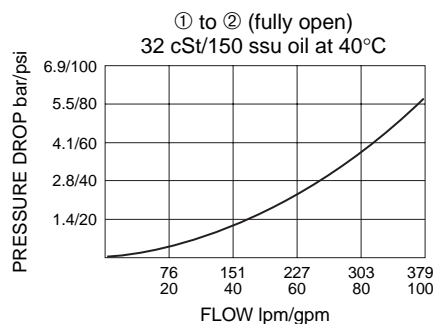
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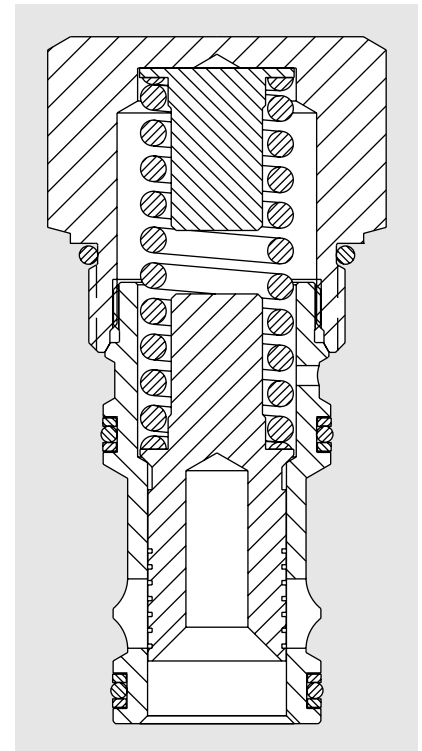
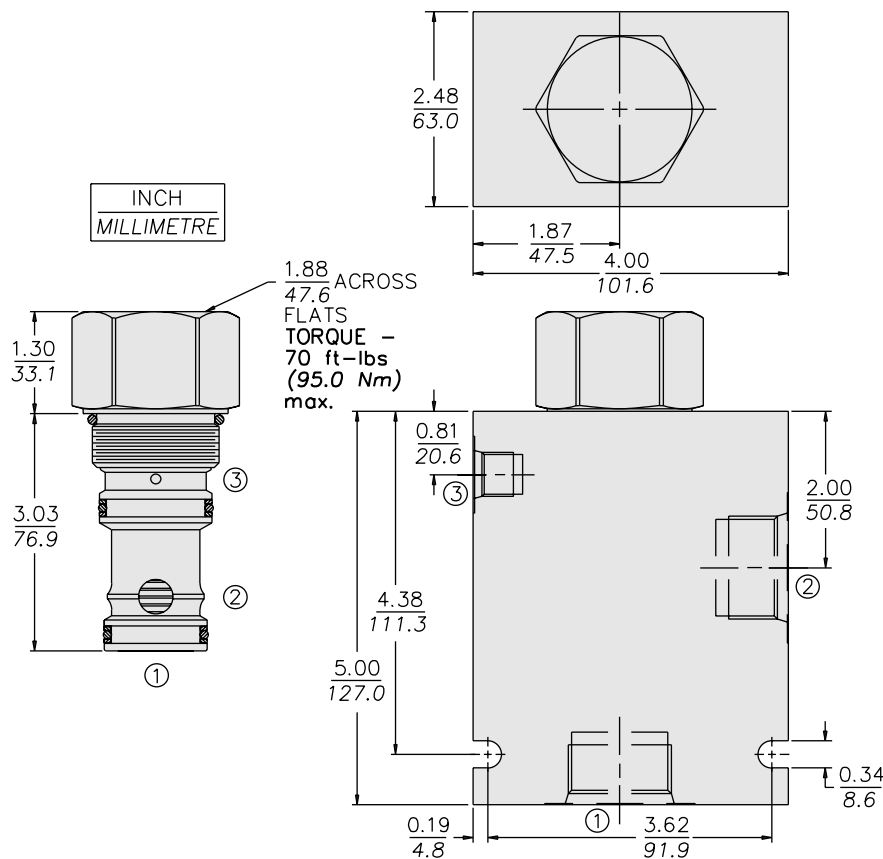
ISO:



PERFORMANCE (Cartridge Only)



DIMENSIONS



ORIFICE DISCS SHOULD NOT BE USED WITH THIS PRODUCT.

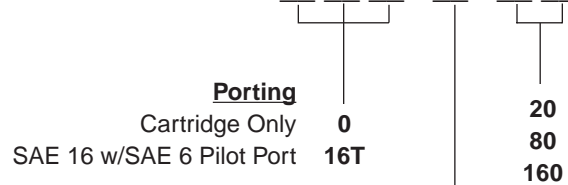
MATERIALS

Cartridge: Weight: 0.82 kg. (1.8 lbs.)
Steel with hardened work surfaces.
Zinc-plated exposed surfaces.
Buna N O-rings and polyester elastomer back-ups standard.

Standard Ported Body: Weight: 1.65 kg. (3.65 lbs.) Anodized high-strength 6061 T6 aluminum alloy, rated to 207 bar (3000 psi). Ductile iron bodies available; dimensions may differ. See page 8.020.1.

TO ORDER

EP20-S35 -



Seals

- N Buna N (Std.)
- V Fluorocarbon
- P Polyurethane (for pressures over 240 bar/3500 psi)