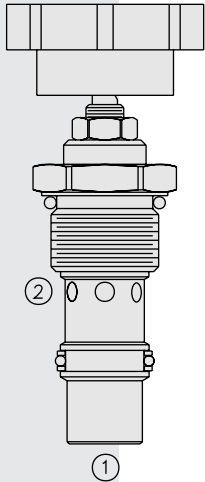


FR12-23 Regulator, Pressure-Compensated



DESCRIPTION

A screw-in, cartridge-style, adjustable orifice, pressure-compensated, manually-operated hydraulic flow regulating valve (restrictive type).

OPERATION

The **FR12-23** maintains a constant flow rate out of ② regardless of load pressure changes in the circuit downstream of ② or upstream of ①.

The regulated flow increases from closed to fully open with counter-clockwise rotation of the adjustment screw. The valve will maintain the set flow regardless of pressure variations on the regulated or inlet port. Reverse flow (② to ①) bypasses the control orifice.

FEATURES

- Hardened parts for long life.
- Quiet, modulated response.
- Cost-effective cavity.

RATINGS

Operating Pressure: 240 bar (3500 psi)

Flow Settings: 0–77 lpm (0–20 gpm)

Internal Leakage (① to ②): 0.12 lpm (0.03 gpm) max., fully closed

Adjustment Torque Required: 1.7 Nm (15 in.-lbs.) at 207 bar (3000 psi)

Temperature: -40 to 120°C

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, Variation "B"; See page 9.112.1

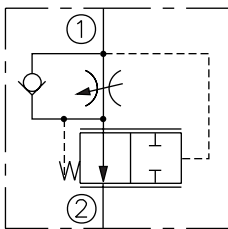
Cavity Tool: CT12-2XX; See page 8.600.1

Seal Kit: SK12-2X-M; See page 8.650.1

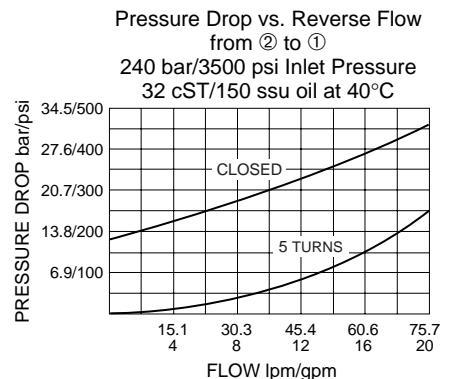
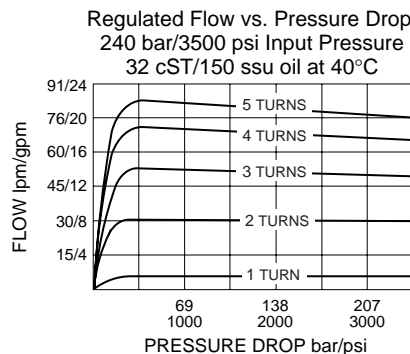
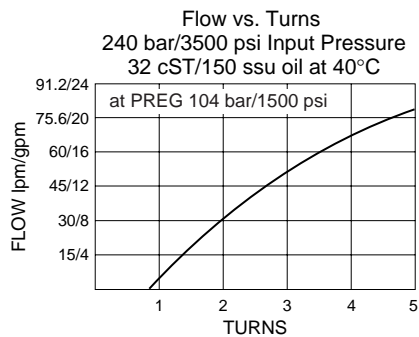
Knob Kit: Part Number 6113160; Converts from shaft-only version to "E" version

SYMBOLS

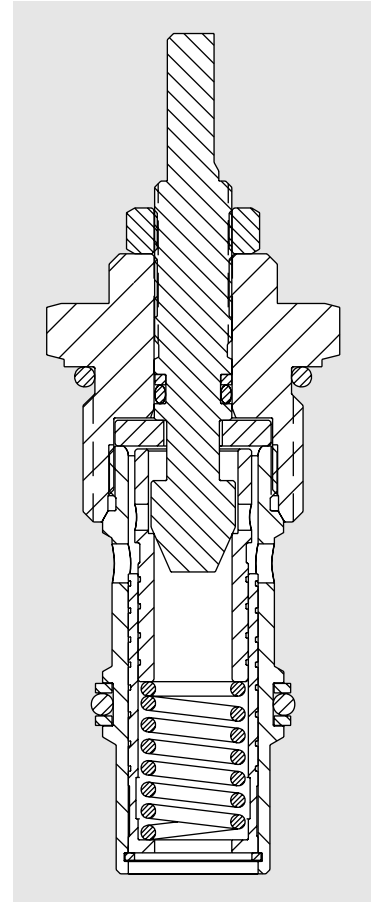
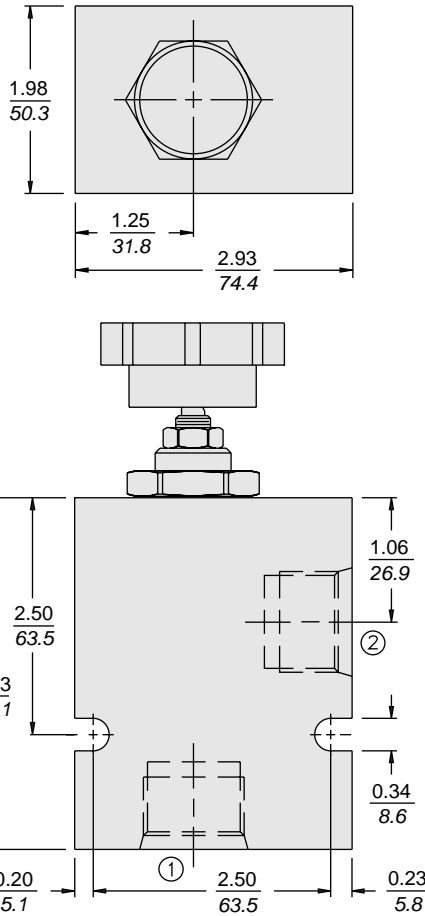
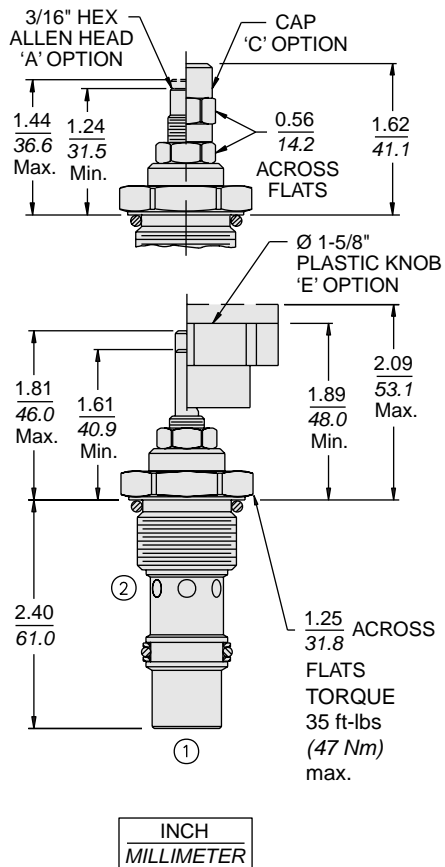
USASI/ISO:



PERFORMANCE



DIMENSIONS



MATERIALS

Cartridge: Weight: 0.08 kg. (0.18 lbs.)
Steel with hardened work surfaces.
Zinc-plated exposed surfaces.
Buna N O-rings and polyester elastomer back-ups standard.

Special Ported Body: Weight:
0.52 kg. (1.15 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

TO ORDER

FR12-23

Adjustment Option
Extended Shaft Only Blank
3/16" Hex Allen Head **A**
Option 'A' w/Cover Cap **C**
Plastic Knob **E**

Porting
Cartridge Only **0**
SAE 10 **10T**
SAE 12 **12T**
SAE 16 **16T**

Special ported body required. Consult factory.

Flow Setting
(Blank) Factory Set at 4-6 gpm

Setting in gpm
Specify; For example:
5.0 5.0 gpm
10.0 10 gpm etc.

Setting in lpm
Specify; For example:
M4.0 4.0 lpm
M20.0 20.0 lpm etc.

Seals
N Buna N (Std.)
V Fluorocarbon