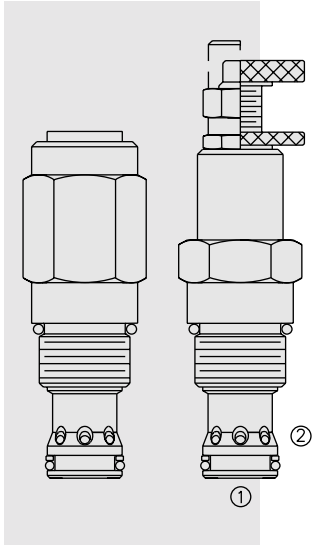


RV12-26 Relief, Pilot-Operated Spool



DESCRIPTION

A screw-in, cartridge-style, pilot-operated (two-stage), spool-type hydraulic relief valve, intended for use as a pressure limiting device in demanding hydraulic circuits which require fast response and low hysteresis.

OPERATION

The RV12-26 blocks flow from ① to ② until sufficient pressure is present at ① to force the piloting relief off its seat, allowing the main (second stage) spool to shift, opening ① to ②.

The cartridge offers smooth transition in response to load changes in demanding hydraulic circuits.

FEATURES

- Adjustments cannot be backed out of the valve.
- Adjustments prohibit springs from going solid.
- Hardened spool and cage for long life.
- Optional spring ranges to 241 bar (3500 psi).
- Fast, smooth response to pressure surges.
- Cost effective cavity.

RATINGS

Operating Pressure: 241 bar (3500 psi)

Proof Pressure: 420 bar (6090 psi)

Flow: See Performance Chart

Internal Leakage: 115 cc/minute (7 cu. in./minute) max. to 85% of nominal setting

Crack Pressure Defined: bar (psi) evident at 7.6 lpm (2.0 gpm) attained

Reseat Pressure: Nominal 90% of crack pressure

Standard Spring Ranges:

- 6.9 to 27.6 bar (100 to 400 psi);
- 10.3 to 103.4 bar (150 to 1500 psi);
- 20.7 to 241 bar (300 to 3500 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 ssu)

Installation: No restrictions; See page 9.020.1

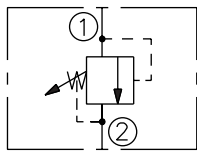
Cavity: VC12-2; See page 9.112.1

Cavity Tool: CT12-2XX; See page 8.600.1

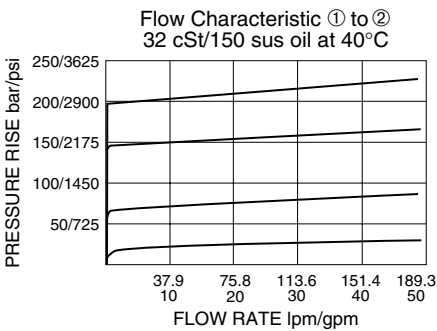
Seal Kit: SK12-2X-B; See page 8.650.1

SYMBOLS

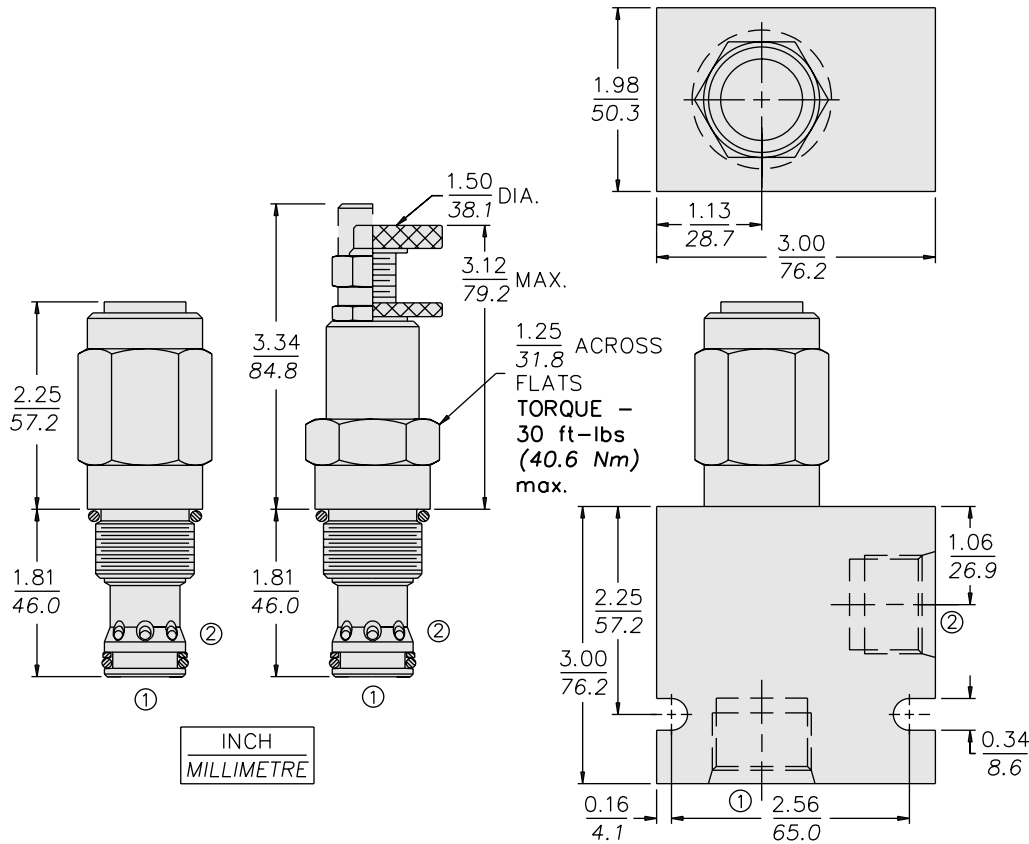
USASI/ISO:



PERFORMANCE (Cartridge Only)



DIMENSIONS



INCH
MILLIMETRE

MATERIALS

Cartridge: Weight: 0.34 kg. (0.75 lbs.);
Steel with hardened work surfaces.
Zinc-plated exposed surfaces.
Buna N O-rings and polyester
elastomer back-up standard.
Anodized aluminum knobs.

Standard Ported Body: Weight:
0.57 kg. (1.25 lbs.); Anodized high-
strength 6061 T6 aluminum alloy,
rated to 240 bar (3500 psi); see page
8.012.1. Ductile iron and steel bodies
available; dimensions may differ;
consult factory.

TO ORDER

RV12-26

Adjustment Option
1/4 in. Hex Allen Head **A**
1-1/2 in. Dia. Alum. Knob **B**
Option A w/ Cover Cap **C**
Factory Preset Non-Adj. **F**
Factory Preset
Hidden Adj. **H**
Option C w/
Lockwire Holes **L**

Porting
Cartridge Only **0**
SAE 10 **10T**
SAE 12 **12T**
SAE 16 **16T**
1/2 in. BSP* **4B**
3/4 in. BSP* **6B**
1 in. BSP* **8B**

*BSP Body; UK Mfr. Only

Seals
Pressure on
P Only:
N Buna N (Std.)
V Fluorocarbon

Bidirectional
Pressure:
NC Buna N
VC Fluorocarbon

Setting in bar*
(Blank) for Adjustable, or
Specify, for example:
M25 25 bar
M100 100 bar
Setting in psi*
(Blank) for Adjustable, or
Specify, for example:
9.0 900 psi
23.5 2350 psi

Spring Range
4 6.9 to 27.6 bar
(100 to 400 psi)
15 10.3 to 103.4 bar
(150 to 1500 psi)
35 20.7 to 241 bar
(300 to 3500 psi)

*Adjustable valves will be preset to
approx. 50% of spring max. potential.