Operation

This valve remains closed from port 2 to 1 until the predetermined setting has been reached at port 2.

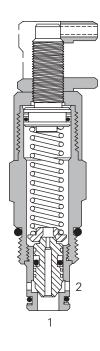
The pressure acts on the

differential area between the seat and the seal diameter on the poppet.

Features

Hardened and ground working parts. Low leakage poppet design. High flow rate for a compact cartridge.

Sectional view



Performance data

Ratings and specifications

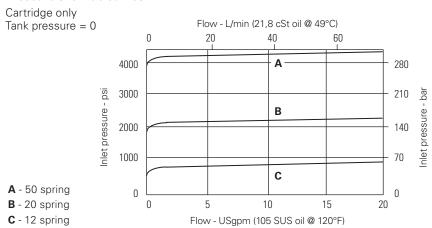
49° C (120° F)		
350 bar (5000 psi		
350 bar (5000 psi		
76 L/min (20 USgpm)		
0.3 mL/min (5 drops/min) @ 85% of Pressure Setting		
C-10-2		
Aluminum or stee		
-40° to 120°C (-40° to 248°F)		
All general purpose hydraulic fluids such as MIL–H–5606, SAE 10, SAE 20, etc		
Cleanliness Code 18/ 16/13		
0,22 kg (0.48 lbs)		
565803 Buna—N 566086 Viton® 565806 Buna—N 889627 Viton®		

Viton is a registered trademark of E.I. DuPont

Description

This is a fast, direct acting differential area screw-in cartridge relief valve. The valve is ideal for the protection against shock pressures that can damage actuators.

Pressure override curves



Where measurements are critical request certified drawings. We reserve the right to change specifications without notice.

Function

RV8 - Relief valve

2 Cage seals

Blank - Single back-up ring as shown

A - 1/2 thickness back-up ring on each side of o-ring (for cross port relief applications)

Size

10 - 10 size

Seal material

Blank - Buna-N V - Viton®

5 Adjustment

C - Cap

F - Factory set

I - Internal K - Knob

S - Screw

Valve housing material

Blank - Aluminum S-Steel

Dimensions

mm (inch)

7 port size

0 - Cartridge only

Code	Port size	Housing number		
		Aluminum light duty	Aluminum fatigue rated	Steel fatigue rated
3B	3/8" BSPP	02-175462	_	_
2G	1/4" BSPP	_	876702	02-175102
3G	3/8" BSPP	_	876703	02-175103
6H	SAE 6	_	876700	_
8H	SAE 8	_	876701	_
6T	SAE 6	566151	_	02-175100
8T	SAE 8	_	_	02-175101

See section J for housing.

8 **Cracking pressure** range

Note: Code based on pressure in psi.

4 -3,45-30 bar (50-450 psi)

12 -7-86 bar (100-1250 psi)

25 -17-175 bar (250-2500 psi)

50 -38-350 bar (550-5000 psi)

Setting pressure

Within ranges in 8

Blank - Normal factory setting at approximate mid-range. User requested settings in 3,45 bar (50 psi) steps, Coded as in the following examples:

10 - 70 bar (1000 psi) 10.5 - 72,4 bar (1050 psi)

10 Special features

00 - None

(Only required if valve has special features, omitted if "00.")

SS - 316 Stainless Steel external components

Torque cartridge in housing

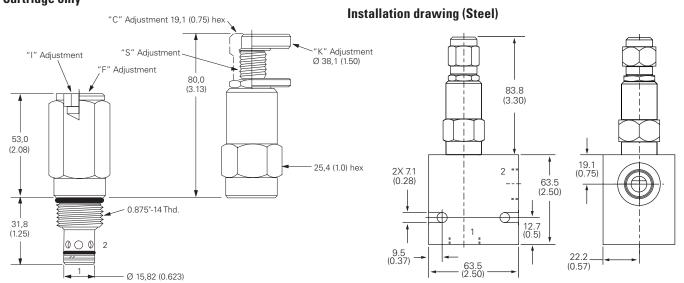
A - 47-54 Nm (35-40 ft. lbs) **S -** 68-75 Nm (50-55 ft. lbs)

⚠ Warning

Aluminum housings can be used for pressures up to 210 bar (3000 psi). Steel housings must be used for operating pressures above 210 bar (3000 psi).

E-39

Cartridge only



Where measurements are critical request certified drawings. We reserve the right to change specifications without notice.