



3.7

# 30RA08-38A TYPE

## Bi-Directional Relief Valve, Vented

Maximum pressure (bar / psi) 205 / 3000

Peak flow (L/min / gpm) 30 / 8 (See performance chart)

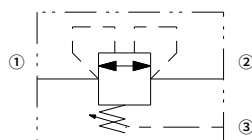
### Features

- Adjustments cannot be backed out of the valve
- Adjustments prohibit springs from going solid
- Hardened parts for long life
- Industry common cavity

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### Symbol



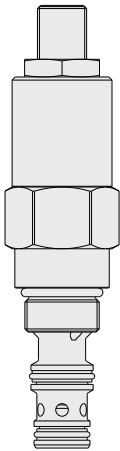
Description

A screw-in, cartridge-style, direct-acting, differential area, poppet-type, bi-directional relief valve, intended for use as a pressure limiting device in demanding hydraulic circuits.

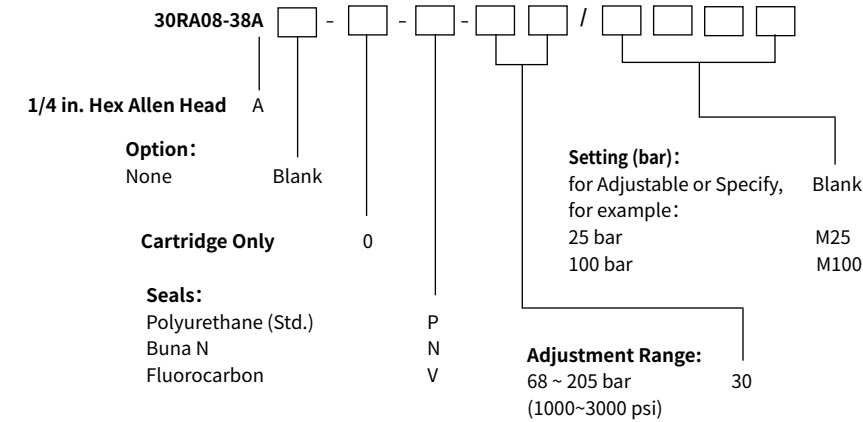
Operation

The 30RA08-38A is a direct-acting, dual cross-over relief valve in a single cartridge format. It blocks flow from ① to ② bi-directionally, with the spring chamber constantly drained at ③ .

On attainment of a pre-determined pressure at either ① or ② , the poppet is forced from its seat. Back pressure on port ③ will affect the nominal setting on a 2:1 basis.



Ordering Code



Materials

**Cartridge:**  
Weight: 0.24 kg; Steel with hardened work surfaces. Zinc-plated exposed surfaces; Polyurethane (Std. ) seal.

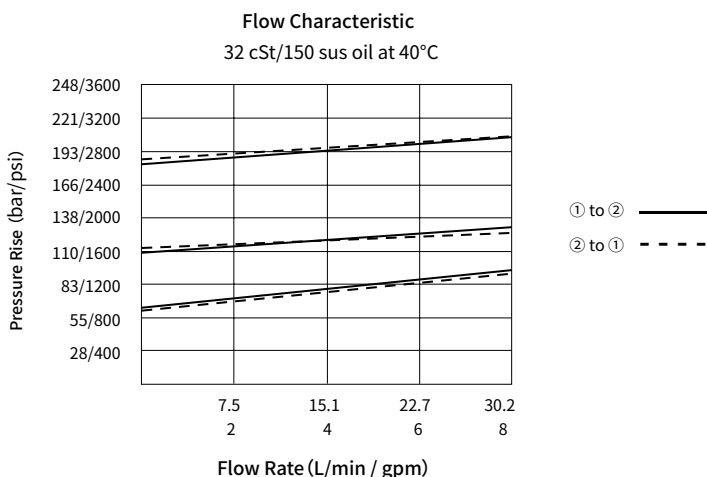
**Standard Ported Body:**  
Anodized high-strength aluminum alloy, rated to 240 bar; Ductile iron and steel bodies available; Dimensions may differ, consult factory.

## Technical Data

Maximum pressure	205 bar (3000 psi)
Adjustable pressure range	68–205 bar (1000–3000 psi); Pressure is set at port ②
Proof pressure	345 bar (5000 psi)
Reseat pressure	80% of Crack; Crack: 0.96 L/min
Maximum difference for crack pressure in both directions	20.7 bar (300 psi)
Peak flow	30 L/min (8 gpm) ; See performance chart
Internal leakage	When reseat to 75% of crack pressure: 0.4 mL/min (8 drops/minute maximum)
Cycle limitations:	Internal seal life is limited to 300,000 cycles in either direction at maximum setting
Cavity	VC08-3
Fluid	Mineral-based or synthetics with lubricating properties
Viscosity range	7.4 to 420 mm <sup>2</sup> /s
Temperature range	-54 to 107 °C (Polyurethane seals)
	-40 to 100 °C (Buna N seals)
	-26 to 204 °C (Fluorocarbon seals)
Degree of fluid contamination	The minimum pollution level is ISO4406 level 20/18/14, and level 17/15/13 is recommended to prolong the service life

03

## Performance (Cartridge Only)



Dimensions

( Dimensions in mm )

