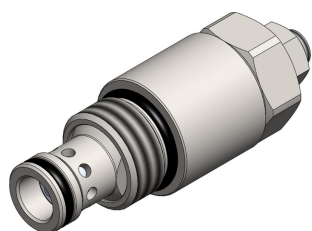
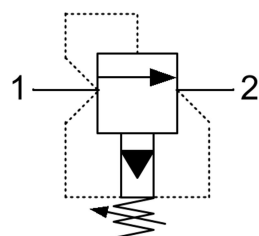


# RVQA.S10 VALVE SERIES

SAE10 Cartridge - 420 bar  
Pilot Operated - Spool Type



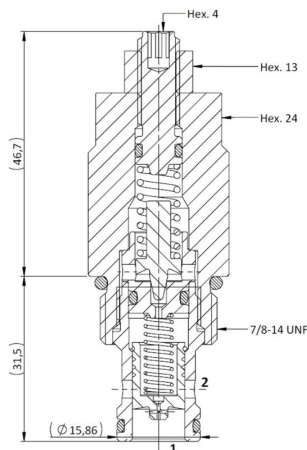
## HYDRAULIC SYMBOL



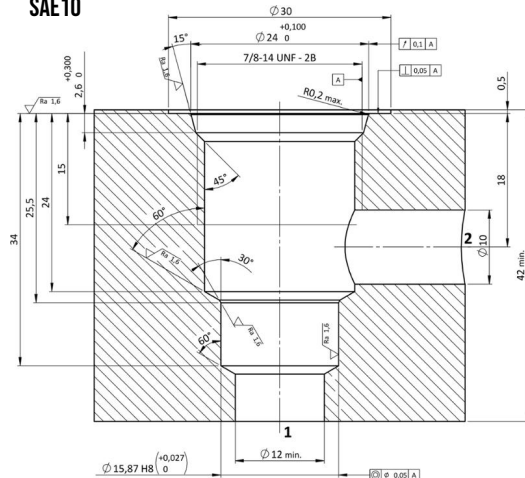
## DESCRIPTION

A screw-in, cartridge style, pilot operated (2-stage), spool type, normally closed, hydraulic relief valve. When the pressure at the Inlet (1) reaches the valve setting, the pilot poppet starts to open from its seat and determines the shifting of the main stage poppet (spool type) that throttles oil flow to tank (2). The cartridge offers smooth transition in response to load changes in demanding hydraulic circuits. Fast, smooth response and limited hysteresis.

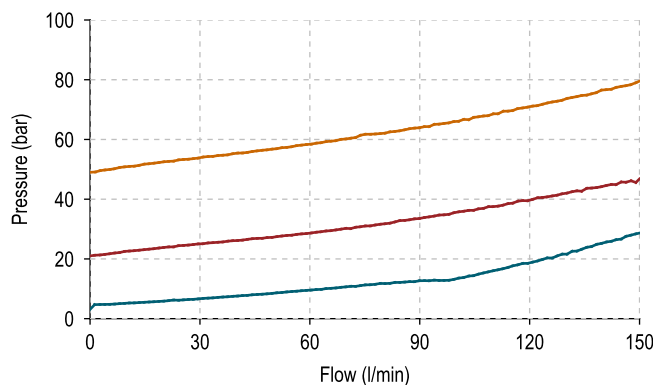
## CROSS SECTION



## CAVITY SAE 10



## PERFORMANCE DETAILS



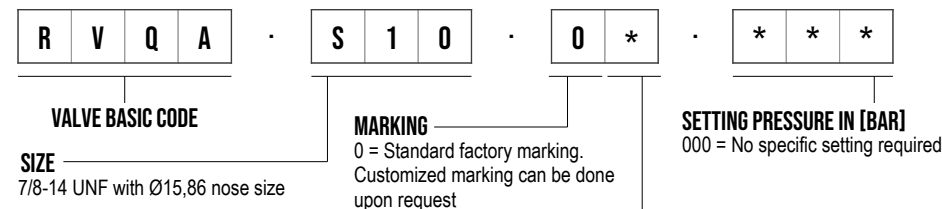
**NOTE**  
The performance chart illustrates flow handling capacity at various settings. p/Q curves are recorded at TOil = 40°C and 46 cSt

**LEGEND**  
 — Minimum nominal setting pressure  
 — Mean nominal setting pressure  
 — Maximum nominal setting pressure

## TECHNICAL DATA

MAXIMUM OPERATING PRESSURE	250 bar
MAXIMUM FLOW	150 l/min
SETTING PRESSURE	see table below
MAXIMUM INTERNAL LEAKAGE	see table below
EXTERNAL COMPONENT TREATMENT	Zn/Fe - standard (96h) Zn/Ni (720h) (Upon customer request)
O-RING TEMPERATURE RANGE	-30° C to 110° C (standard sealing NBR - BUNA - N) -35° C to 140° C (HNBR - Upon customer request) -23° C to 225° C (FKM - Upon customer request)
OIL TEMPERATURE RANGE	-30° C to 110° C
PRESSURE SETTINGS ESTABLISHED	5 l/min
RESEAT PRESSURE	nominal 80% of cracking pressure
FLUIDS	Mineral - based or synthetics with lubricating properties
VISCOSITIES	7,4 to 420 cSt
FILTRATION	20/18/15 ISO 4406 (maximum filtration admitted)
ORIENTATION	No restrictions
INSTALLATION TORQUE	55-65 Nm  Hex.24
NUT TIGHTENING TORQUE	10-13 Nm  Hex.13
TECH. SPEC. FOR CHARACTERIZATION	see page 700
OIL TESTING CONDITIONS	ISO VG 46 cSt
SEAL KIT CODE	SK.186 (standard sealing NBR-BUNA-N)
PLASTIC TAMPER PROOF CAP	CTP.003
WEIGHT	0,197 kg

## ORDERING CODE



## BIAS SPRING OPTIONS

Spring model code	Maximum internal leakage [cm <sup>3</sup> /min]	Pressure setting range [bar]	Pressure increment per turn adjusting ratio [bar/turn]
S	150	5-50	18