

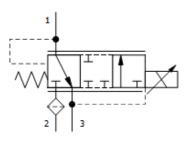


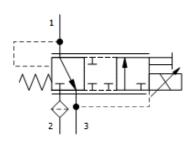
Electro-proportional, direct-acting pressure reducing/relieving valve with filter screen, 3000 psi (210 bar) - common cavity

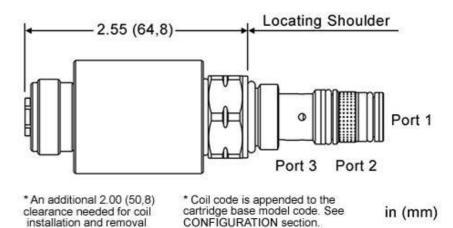
SERIES 0C / CAPACITY: 4 L/min. / CAVITY: SC-08-03



sunhydraulics.com/model/PRTS







This electro-proportional, direct-acting reducer/reliever valve reduces a high primary pressure at the inlet port (Port 2) to a constant reduced pressure at Port 1, with a relief function from Port 1 to tank (Port 3). The valve is biased to the relieving mode. Energizing the coil connects Port 2 to Port 1. Increasing the current to the coil will proportionally increase the reduced pressure at Port 1. If pressure at Port 1 exceeds the setting induced by the coil, pressure at port 1 is relieved to port 3. This valve is closed in the transition between reducing and relieving resulting in very low consumption of oil.

TECHNICAL DATA

NOTE: DATA MAY VARY BY CONFIGURATION. SEE CONFIGURATION SECTION.

* Additional coil options are available

Cavity	SC-08-03
Series	0C
Capacity	4 L/min.
Maximum Operating Pressure	210 bar
Typical Valve Leakage at 110 SUS (24cSt)	4,5 mL/min.@210 bar
Solenoid Tube Diameter	.51 in.
Valve Hex Size	22,2 mm
Coil Nut Torque	4,8 - 5,3 Nm
Valve Installation Torque	28 - 31 Nm
Model Weight	0.16 kg.

PROPORTIONAL PERFORMANCE DATA

Hysteresis (with dither)	5%
Linearity (with dither)	<2%
Recommended dither frequency	200 Hz

CONFIGURATION OPTIONS

E 0 - 290 psi

М -

Model Code Example: PRTSXDN

 CONTROL
 (X)
 ADJUSTMENT RANGE
 (D)
 SEAL MATERIAL
 (N)
 COIL *

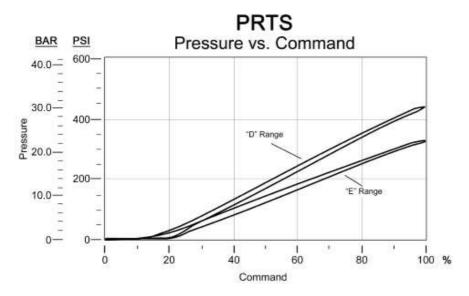
 X D 0 - 435 psi
 N Buna-N
 No coil

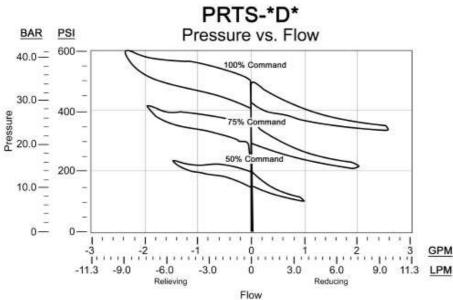
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TECHNICAL FEATURES

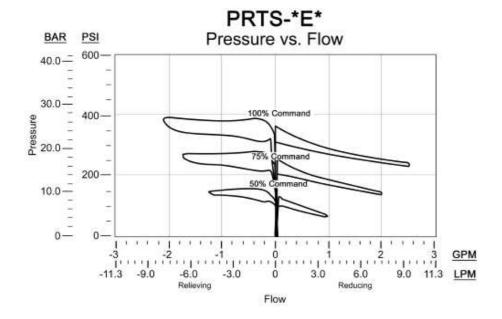
- The solenoid tube assembly is fatigue rated for 3000 psi (210 bar) service.
- Specified leakage is out of port 3, with 3000 psi (210 bar) at port 2 and port 1 deadheaded.
- Pressure at port 3 is directly additive to the valve setting at a 1:1 ratio.
- This valve features a filter installed on port 2 with a micron rating of 280.
- For best performance, an amplifier with current sensing and adjustable dither should be used. Recommended dither is 200 Hz.
- This valve is available with a push-type manual override. There is no upper limit to the pressure setting when using the M control. The more force you exert on the
 manual override, the higher the resulting pressure. This option is also rated for 3000 psi (210 bar).
- The cartridge installation torque of 22 lbf ft (30 Nm) should be respected for best performance.
- The metal coil nut is a functional feature of the valve and should be correctly installed for proper performance of the valve.
- Coil connector options offer ratings up to IP67. See individual coil product pages for details.
- Full reverse flow from reduced pressure (port 1) to inlet (port 2) may cause the spool to close. If reverse free flow is required in the circuit, consider adding a separate check valve to the circuit.
- Coils can be mounted on the tube in either direction.

PERFORMANCE CURVES





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