

Relief, Direct-Acting, Hydraulic Cartridge Valve

Functional Symbol Description:



A screw-in, direct-acting, normally-closed, cartridge-style hydraulic relief valve. For use as a pressure limiting device for common hydraulic circuit protection.

Operation:

The DRVT blocks flow from (port 1) to (port 2) until sufficient pressure at (port 1) to force the valve open to tank (port 2). The cartridge offers fast response to load changes in typical hydraulic circuits requiring low hysteresis, low pressure rise and essentially zero internal leakage.

For cross port applications, will accept maximum pressure at port 2; suitable for use in cross port relief circuits.

Features:

- The seals on the adjust screw are exposed to system pressure which means this valve can only be adjusted when the pressure is removed.
- Valve is relatively insensitive to varying oil temperatures and oil contamination.
- Compact size for minimal space requirements.
- Optional spring ranges.
- Industry standard cavity.

Ratings:

Rated Flow: Port 1 to 2: 53 GPM (200 lpm) Operating Pressure: 5,000 PSI (350 bar) Operating Temperature: -22° to 250°f (-30° to 120°c) Leak Rate: 0.7 ml/min. max. to 90% of nominal setting. Fluids: Mineral-based fluids with viscosities of 7.4 to 420 cSt. Performance Curve Pressure Drop vs.Flow

	150ssu/32 cSt OIL@100°F/38°C.										
	5076(350)										
-	4351(300)										
	3626(250)										
	2900(200)					-					
	2176(150)										
	1450(100)		-								
	725(50)		-					_			
	0		3.2 50)	26 (10	.4 00)	39 (15	.6 60)	52. (20			
		FLOW gpm(lpm)									

PRESSURE DROP psi(bar)

Ordering Information:

Model	Cavity	Control	Adjustment Range	Seal Material	Material / Coating					
DRV	T3 T-3A Cavity	Blank Standard Screw Adjustment	 D 300-1500 psi (20-105bar) E 500- 3000 psi (35-210 bar) F 800-4500 psi (55-315 bar) G 1000-6000 psi (70-420 bar) C 200-600 psi (14-55 bar) B 100-400 psi (7-28 bar) A 50-200 psi (3.5-14 bar) 	Blank Buna-N ✔ Viton	Blank Plated Steel					

*Custom set pressure also available

