

Normally open, balanced poppet, logic element - vent-to-close

Capacity:
15 gpm (60 L/min.)

Functional Group:

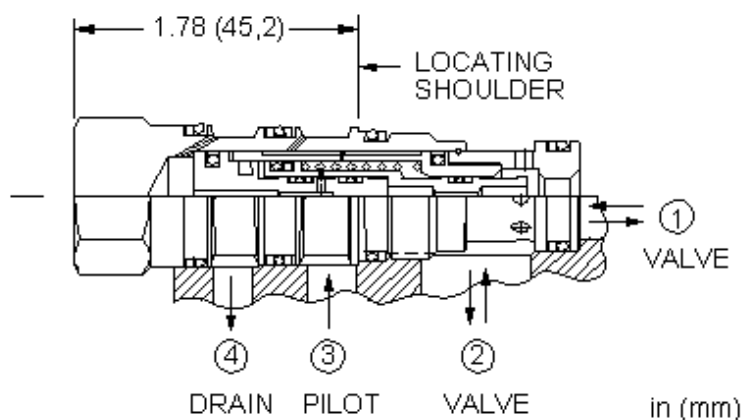
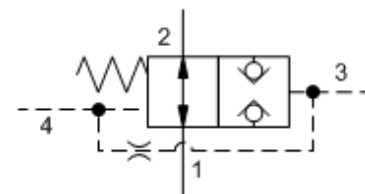
Products : Cartridges : Logic Element : Balanced Poppet : Normally Open, Vent to Operate

Model:

DODR

Product Description

This is a normally open, balanced poppet, switching element. When the vent port (port 4) is blocked, the poppet remains in the open position. Venting port 4 shifts it to the closed position, provided there is sufficient pressure at port 3.

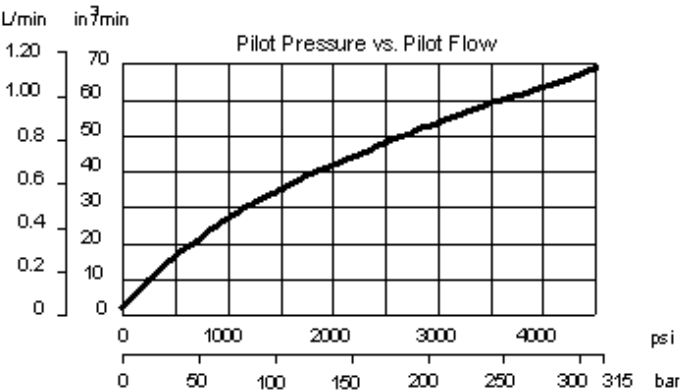
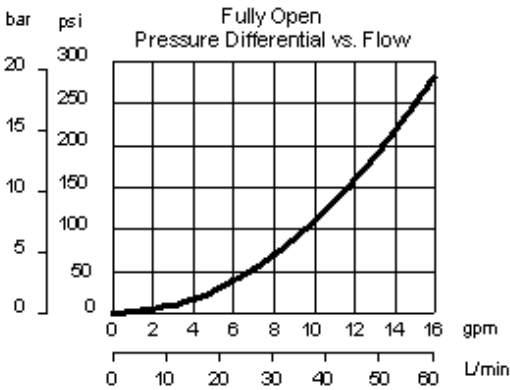


Technical Features

- Unique balanced construction provides predictable switching with 5000 psi (350 bar) at both ports 1 and 2, with the vent (port 4) open and a minimum pilot pressure of 400 psi (30 bar) at port 3.
- Valve will open when the pilot pressure falls below 145 psi (10 bar).
- These valves are hydraulically balanced between port 1 and port 2.
- Port 1 and port 2 are fully sealed from port 3 and port 4. Ports 3 and 4 are positively sealed.
- Leakage rate between port 1 and port 2 is very low, typically less than 10 drops/min. at 5000 psi (0,7 cc/min at 350 bar).
- Port 4 may be externally connected to a pilot switching valve. The pilot valve should have a leakage rate of less than 10 drops/min. and be able to satisfy the pilot flow requirements. Sun model DAA*-*** solenoid pilot valve is ideal for this application.
- All ports will accept 5000 psi (350 bar).
- Incorporates the Sun floating style construction to minimize the possibility of internal parts binding due to excessive installation torque and/or cavity/cartridge machining variations.

Technical Data

	U.S. Units	Metric Units
Cavity	T-21A	
Capacity	15 gpm	60 L/min.
Minimum Pilot Pressure Required to Shift Valve	400 psi	28 bar
Control Pilot Flow	15 - 30 in ³ /min.	0,25 - 0,50 L/min.
Maximum Operating Pressure	5000 psi	350 bar
Maximum Valve Leakage at 110 SUS (24 cSt)	10 drops/min.@5000 psi	0,7 cc/min.@350 bar
Series (from Cavity)	Series 1	
Valve Hex Size	7/8 in.	22,2 mm
Valve Installation Torque	30 - 35 lbf ft	40 - 50 Nm
Seal Kits - Cartridge	Buna: 990-021-007	
Seal Kits - Cartridge	Viton: 990-021-006	
Model Weight	0.36 lb.	0.16 kg.



DODR-XHN

Control	Minimum Pilot Pressure	Seal Material
Standard Options	Standard Options	Standard Options
X Vent to Operate	H 400 psi (28 bar)	N Buna-N
		V Viton

Related Models
[DODR8](#)