



Three-position, 4-way directional cartridges are spring-centered, 6-port directional valves that can be configured from a choice of spool options. The supply port is port 3 and all ports will accept 5000 psi (350 bar). Capacity for these pilot-to-shift valves is dependent on the spool type specified.

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

Cavity	T-61A
Series	1
Capacity	7 - 10 gpm
Maximum Operating Pressure	5000 psi
Minimum Pilot Pressure Required to Shift Valve	175 psi
Maximum Valve Leakage at 110 SUS (24 cSt)	2 in ³ /min. @1000 psi
Pilot Volume Displacement	.02 in ³
Valve Hex Size	7/8 in.
Valve Installation Torque	30 - 35 lbf ft
Model Weight	.40 lb
Seal kit - Cartridge	Buna: 990-061-007
Seal kit - Cartridge	Polyurethane: 990-061-002
Seal kit - Cartridge	Viton: 990-061-006

OPTION SELECTION EXAMPLE: DCCCXCYN

CONTROL	(X)	SPOOL CONFIGURATION	(Y)	SEAL MATERIAL	(N)	MATERIAL/COATING
X Standard Pilot		Y A and B to T Center		N Buna-N		Standard Material/Coating
		A A to T Center		V Viton		/AP Stainless Steel, Passivated
		B B to T Center				/LH Mild Steel, Zinc-Nickel
		C Blocked Center				
		F Closed Center, A and B to T				
		H Open Center				
		N P to A and B to T Center				
		R Regen Center				
		T Tandem Center				
		W A and B Bleed to T Center				

TECHNICAL FEATURES

- All ports will accept 5000 psi (350 bar), including the x and y pilot ports (port 5 and port 6).
- The reason for the different capacities, or performance limits, for the different spool configurations are flow forces. Flow forces are proportional to flow and pressure drop. Typically, they resist the opening of a passage. Spool configurations that open passages as they spring center are the most susceptible. If the flow forces due to the flow and pressure conditions exceed the centering spring force the valve may not shift completely. Higher flows may be used at lower pressures.
- Leakage listed in technical data is for each path.
- The pilot ports, 5 and 6, are positively sealed from the work ports.
- Hardened spool and sleeve provide consistent and low spool leakage rates and excellent wear characteristics.
- 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.

PERFORMANCE CURVES

