

KEY EXPLANATION:

- 5. O-Ring Seal, TFE
- 6. Filter, 10 Micron, Sintered Bronze
- 19. Poppet Seal, TFE
- 27. Spring (Used on valves = "A" Dia. 1-7/8 & 2-1/4")

SPECIFICATIONS:

Air Pilot Operated Hydraulic Spool Valve.
 Three Way, Birectional Control or Selector Valve.
 Maximum System Pressure:
 Ports 1, 2, and 3 rated to 3,000 PSI.
 Maximum Pilot Pressure (X port) 150 PSI.
 Fluid temperature -40°F (-40°C) to 200°F (93.3°C)
 Install Cartridge valve using 1" wrench
 Valve should screw in freely to the Mount Seal.
 Final tightening to 20 foot pounds torque.
 Use lubricant on external oil seals and mounting threads.

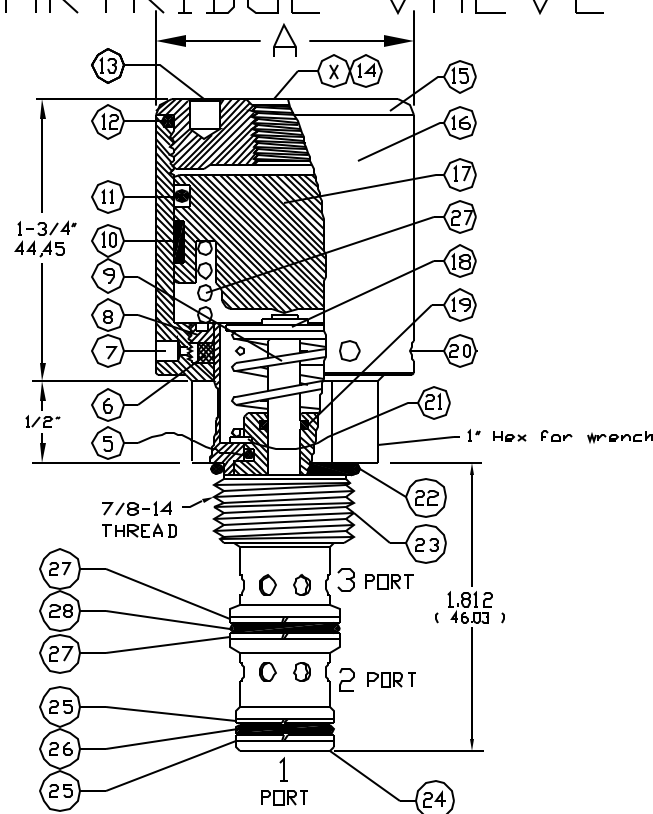
OPTIONS

Pilot Port (Key X) is 1/8 NPT.
 Optional Pilot Porting includes 1/4 NPT, SAE4, and SAE6
 Standard seals are Buna-N with Teflon back up rings.
 Optional seals include Viton, Teflon and others.
 Keys 7 & 20 are vents to atmosphere.
 † Option provides 10-32 Threaded ports at these locations.

PILOT RATIO NOTES:

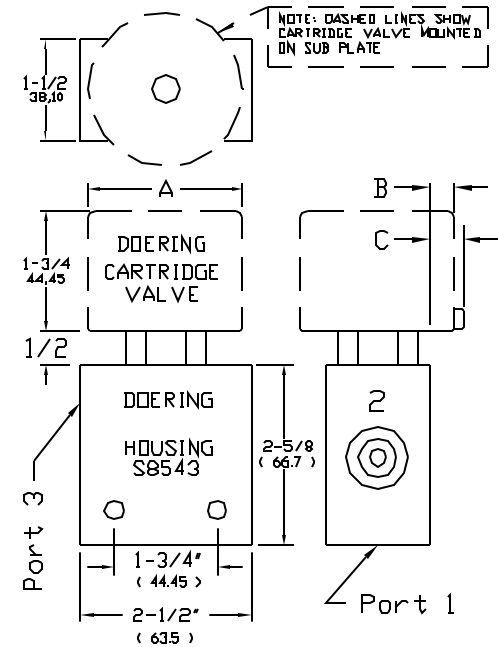
- TO CALCULATE THE CORRECT PILOT RATIO VALVE TO ORDER FOLLOW THESE STEPS:
1. Determine the MAXIMUM possible system pressure.
 Multiply X 1.1 = SYSTEM
 2. Determine MINIMUM possible pilot pressure.
 Multiply X .9 = PILOT
 3. Divide SYSTEM by PILOT = PILOT TO SYSTEM RATIO
 4. Round up to standard available ratio.

CARTRIDGE VALVE



Cartridge Valve Requires Cavity C-8543

HOUSING

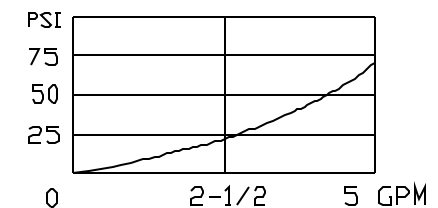


Housing Parts 1, 2 & 3 P/N S8543 are 3/8 NPT,
 P/N S8543-2 are 1/4 NPT, P/N S8543-6 are SAE6
 Standard Housing material is Aluminum,
 For Stainless order S8543-3 or S8543-23 or S8543-63.

SPEC. SHEET NO. 1201637 REV. 003

PILOT TO SYSTEM RATIO	" A " DIAMETER	" B " MAXIMUM	" C " MAXIMUM APPLICABLE TO † OPTION ONLY	CARTRIDGE VALVE NO.	HOUSING BODY NO.	Functional Symbol
108:1	1-1/2 (38.1)	NOT APPLICABLE	.15 (3.8)	54H2371080	S8543	<p>Normally Open: 1=Cyl, 2=P, 3=T</p>
131:1	1-5/8 (41.28)	.06 (1.6)	.21 (5.4)	54H3371310	- OR - S8543-2	
183:1	1-7/8 (47.63)	.19 (4.8)	.34 (8.6)	54H6371830	- OR - S8543-6	
277:1	2-1/4 (57.15)	.38 (9.6)	.53 (13.5)	54H7372770		
108:1	1-1/2 (38.1)	NOT APPLICABLE	.15 (3.8)	54H2371081	S8543	<p>Normally Closed: 1=Cyl, 2=P, 3=T</p>
131:1	1-5/8 (41.28)	.06 (1.6)	.21 (5.4)	54H3371311	- OR - S8543-2	
183:1	1-7/8 (47.63)	.19 (4.8)	.34 (8.6)	54H6371831	- OR - S8543-6	
277:1	2-1/4 (57.15)	.38 (9.6)	.53 (13.5)	54H7372771		
108:1	1-1/2 (38.1)	NOT APPLICABLE	.15 (3.8)	54H2371085	S8543	<p>Selector: 2=P, 1=C1, 3=C2</p>
131:1	1-5/8 (41.28)	.06 (1.6)	.21 (5.4)	54H3371315	- OR - S8543-2	
183:1	1-7/8 (47.63)	.19 (4.8)	.34 (8.6)	54H6371835	- OR - S8543-6	
277:1	2-1/4 (57.15)	.38 (9.6)	.53 (13.5)	54H7372775		

PRESSURE DROP CHART



3PS SERIES

3 Way Spool Valve, Pilot Operated.
 Directional Control or Selector Valve.

