
 PETROLVALVES GROUP enabling your energy flow			INSTRUMENT DATA SHEET v1.0.21				 VSI CONTROLS A PETROLVALVES COMPANY		
Customer Name:		DELTA GmbH		Project Name:		BOC		JOB #:	
Quote no.:		24-0151.VS		End User:		DELTA		Customer RFQ:	
Rev. no. / Date:		0.0 / 28-06-2024		Service:		CHILLER EXPANSION LINE		Customer PO.:	
Line Item #:		1		Tag:		LCV-0001A/B		Quantity: 2	
Fluid:		100% PROPYLENE LIQUID		Critical Pressure:				Doc no.:	
Design Press. in/out:		22 / 22 bar g		Design Temp. in/out/min:		120 / 120 / 0 deg C		Area Class. Zone 2, IIB, T3	
1	SIZING CONDITIONS	Parameters		Units		Cond 1		Cond 2	
2		Liquid Flow		kg/h				3131.00	
3		Gas Flow		kg/h				...	
4		Inlet-P1		bar g				18.68	
5		Outlet-P2		bar g				4.680	
6		Pressure Drop		bar				14.00	
7		Temperature		deg C				56.00	
8		Vapor Pressure		bar g				-0.84811	
9		Density		kg/m3				510.00	
10		Viscosity		Centipoise				0.06900	
11		Required Cv						1.36	
12		Open		% Open				44	
13		Valve Noise (IEC)		dBA				<70	
14		Valve Velocity		m/s				3.369	
15		Pipe Velocity		ft/s				0.20783	
16	LINE	Pipe Size: In/Out		1.5 / 4 inch		55		Positioner Mfr. / Model	
17		Pipe Sch.: In/Out		80 / 40		56		Protocol / Elec. Connection	
18		Pipe Insulation		No		57		Cert. / Enclosure Rating	
19		Mfr. / Body Style / Model		VSI / Globe / G-Stream		58		Housing / Diagnostics	
20		Size / Rating Std. / Press. Rating in/out		1" / ANSI / CL 300		59		Gauges / Options	
21		Leakage Class		IV		60		Airset Mfr.* / Code	
22		End Conn. / Finish / Butt Weld Sch.		Integral Flanges RF / 125- 250 Ra / NA		61		Air Conn. / Enclosure Matl.	
23		Face To Face		ANSI/ISA 75.08.01		62		Drain / Relieving	
24		Body Material in/out		A352 LCB / LCC		63		Gauge Mfr. / Code	
25		Bonnet Type / Bellows		Standard / NA		64		SOV Mfr.*	
26	Bonnet Matl.		Same as body		65		SOV Code		
27	Body Bolting Material		L7M / 7M		66		Valve Action		
28	Gaskets Material		316L SS + graphite		67		Body matl. / Enclosure Matl.		
29	Packing Style / Options		Single / NA		68		Air Connection / Elec. Conn.		
30	Packing Material		PTFE V-Ring		69		Voltage / Rating		
31	TRIM	Trim Design / Balancing		Unbal.-Contoured / N/A		70		Elec. Cert. / Enclosure Rating	
32		Trim Size [mm] / Rated Cv [Stages]		22/12.8 [NA]		71		(Box) Switch Mfr.* / Code	
33		Stroke [mm]		19.1		72		Switch Code	
34		Flow / Flow Characteristics		Over / Linear		73		Switch no. / Type	
35		Plug Material / Plug Facing		A479 316-316L / NA		74		Switch Rating	
36		Stem Material		A479 316-316L		75		Elec. Cert. / Enclosure Rating	
37		Seat Type		Metal		76		Enclosure Matl. / Elec. Conn.	
38		Seat Ring Material / Facing		A479 316-316L / NA		77		Booster Mfr.* / Code	
39		Soft Seat Material		NA		78		Air Connection / Encl. Matl.	
40		Cage / Seat Retainer Material		N/A / A351 CF8M		79		Lock-up Valve Mfr.* / Code	
41	ACTUATOR	Mfr. / Type / Model		VSI / Pneumatic Piston / L-Act		80		Air Connection / Encl. Matl.	
42		Size / Spring Type / Act. Function		25 / Standard / Throttling		81		Marking / NACE / Dual Use	
43		Fail Action / Air To		Close / Open		82		Hydro / St. Leakage / Functional	
44		Shut-Off Press. / Air Supply Press.		22 bar g / 4.5 bar g		83		* or equivalent	
45		Power Supply		NA		84		1) Expanders & Reducers will not be under our scope of supply.	
46		Actuator Material / O-Rings		Aluminum / Buna-N		85			
47		Handwheel / Travel Stop		None / None		86			
48		Volume Tank		No		87			
49		Pneum. tubing O.D. / Matl.		5/16" / A269 Tp316		88			
50		Fitting Mfr. / Matl.		VSI Standard / 316SS double ferrule		89			
51		Sunshade		Not Provided		90			
52		Stroking Time [s]				91			
53		Quick Open [s]				92			
54		Quick Close [s]				93			
*Factory review required. Completed by -Cv calculation according to IEC 60534-2-1 / ANSI/ISA-75.01.01 -noise calculation for liquid according to IEC 60534-8-4{ed3.0} -noise calculation for gases according to IEC 60534-8-3{ed3.0}						Submitted By		user1	
						Company			
						Contact Information			