

AEROFLOW CONTROL VALVE

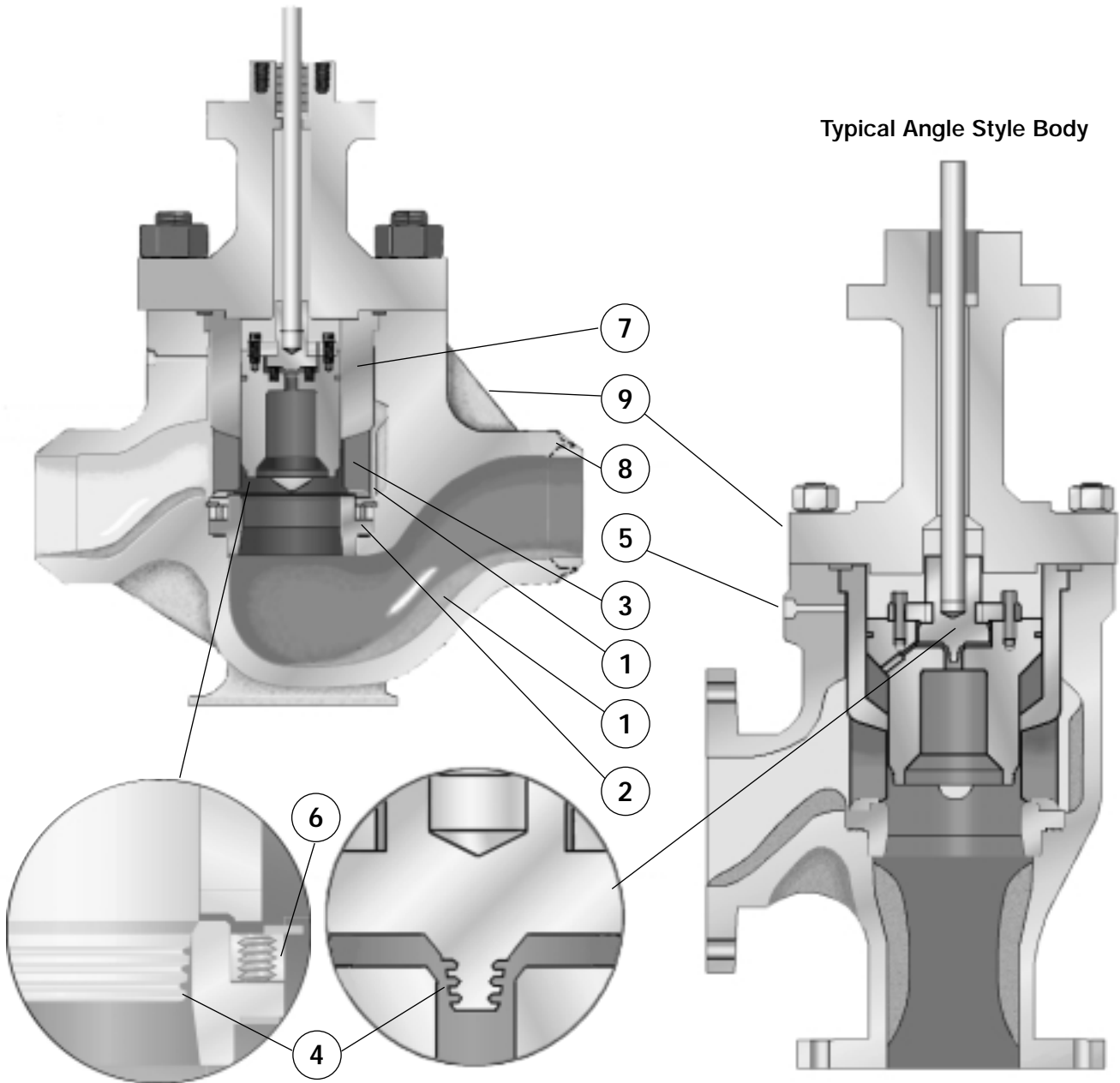
Innovative Technology for the 21st Century

The Aeroflow control valve family represents an integrated valve solution for the 21st Century ... and beyond. Not a compromise or re-packaging of old valve technologies. The Aeroflow valve concept integrates proven state-of-the-art design in aerodynamic/ hydrodynamic flow, field proven materials, digital positioning, and "smart" valve technology, with a modular design concept. The sum benefit of Aeroflow's technological advances is simply the most accurate, reliable control valve product line available in the world today.

CLASS 150 - 4500#

Typical Globe Style Body
w/Pilot Balanced Trim

Typical Angle Style Body



AEROFLOW CONTROL VALVE

Solution-Engineered Features for Demanding Applications

- 1. Aerodynamic Flow Control Vanes**
 - Integrally cast into the inlet and Outlet
 - Profiles flow to reduce turbulence
 - Evenly distributes flow around the cage
 - Reduces noise generated in the valve
- 2. Zero Leakage Tight Shut-off**
 - Exceeds ANSI Class VI shutoff
 - Metal to metal seat and pilot balanced plug design
 - Zero cc/min without oversized actuators
- 3. Custom Characterized Trim Options**
 - C3 Combination Characterized Cage – Combines high rangeability, cavitation protection and low noise in one valve
 - Mini P Multi Stage Trim – Designed for low-flow, high ΔP , cavitating service with tight shutoff
 - Les-Sonic Cage – Provide up to a 25 dBA noise reduction
 - Les-CAV Multi Stage Cage – Up to five stages control for pressure drops to 4000 PSI (276 BAR)
 - Micro Taper Trim – Specially designed trim for very fine control in low-flow/ high ΔP applications
- 4. Tri-Shear Protected Seat Design**
 - Prevents high velocity erosion at opening and closing
 - Provides a five-stage pressure drop near the seating position
 - Prevents particle impingement on the seating surfaces since they are withdrawn from the direct flow path before flow commences
 - For LES-CAV cages only
- 5. “Smart Valve” Capability**
 - Optional inlet and outlet pressure taps provide accurate, stable pressure measurements required by today’s “smart” instrument action
- 6. Quick Change Trim Design (ANSI 900 and above)**
 - Seat retention and gasket loading are designed for reliability and ease of maintenance
- 7. Hung Cage Design (ANSI 900 and above)**
 - Suspended Trim Cage eliminates damaging effects of thermal expansion
 - Cage is free to expand and contract with temperature changes
- 8. Oversized Outlet Connection**
 - Aeroflow Valves can be supplied with a larger outlet connection than the valve body size
- 9. Parts Interchangeability**
 - All parts interchangeable between globe and angle style bodies
 - Reduces parts inventory
 - Reduces maintenance training

AEROFLOW TRIM OPTIONS

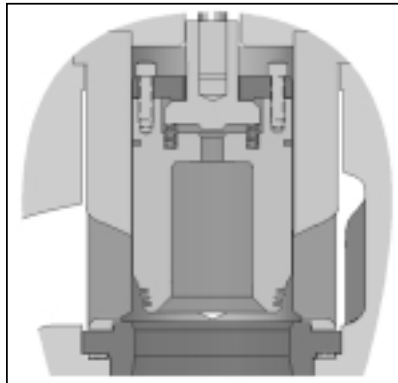
MODULAR TRIM

Aeroflow trim design allows you to choose the ideal cost/performance combination for each application. All trim modules are 100% field interchangeable providing extraordinary flexibility and value. Any of the cage throttling designs shown below can be combined with any of the characterized cages shown in this sec-

tion to give you the best possible solution to your specific flow control application. In addition, as shown at the bottom of this page, we can also offer customized trim sets for specific severe service applications where fine control of low flows and high differential pressures is a critical part to your operation.

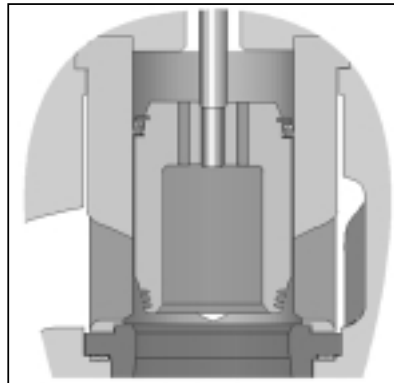
CAGE THROTTLING DESIGNS

PILOT BALANCED (PB)



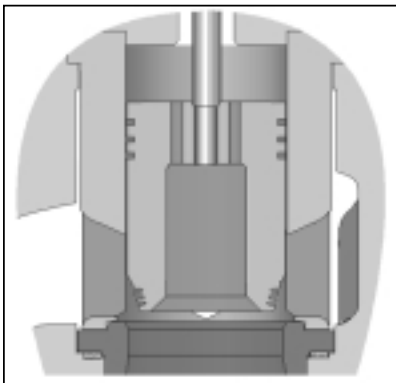
-20°F — 1050°F
 -29°C — 565°C
 Class IV/V/Zero

BAL. LOW-TEMP (BL)



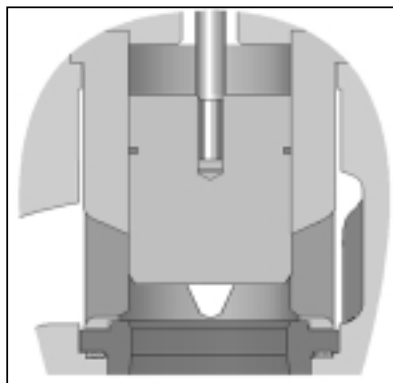
-20°F — 500°F
 -29°C — 260°C
 Class IV/V

BAL. HIGH-TEMP (BH)



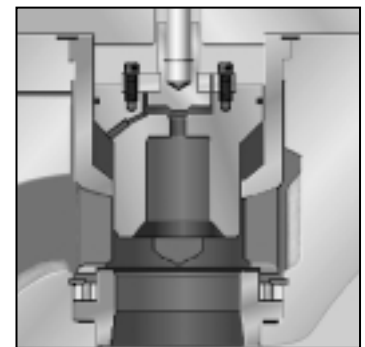
-20°F — 1050°F
 -29°C — 565°C
 Class III

UNBALANCED (UBC)



-20°F — 1050°F
 -29°C — 565°C
 Class IV/V/Zero

T²



-20°F — 1050°F
 -29°C — 565°C
 Class IV/V/Zero

AEROFLOW TRIM OPTIONS

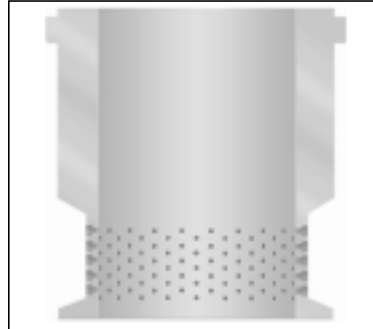
LINEAR

CUSTOM CHARACTERIZED CONTROL

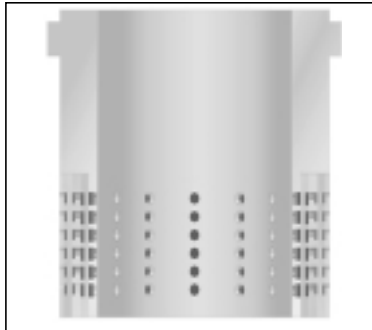
Standard
Cage



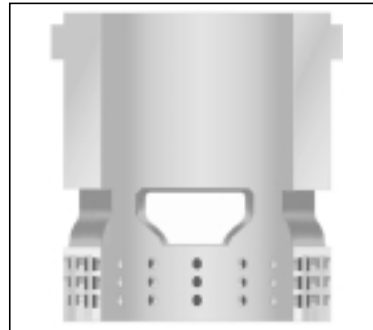
LesSonic Cage
(Noise Control)



LesCav Cage
(Cavitation Control)

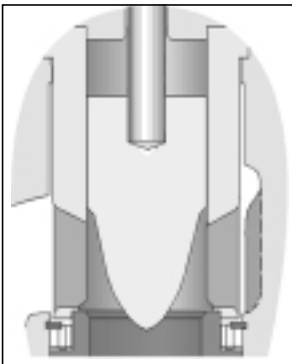


C³ Cage
(Range Control)



CUSTOM TRIM SET OPTIONS

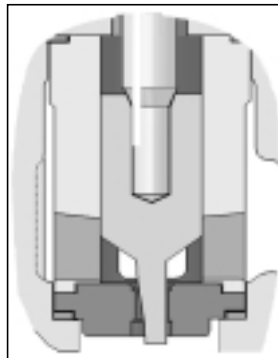
UNBALANCED (UBP)



-20°F — 1050°F
-29°C — 565°C
Class IV/V/Zero

MICROTAPER® (MT)

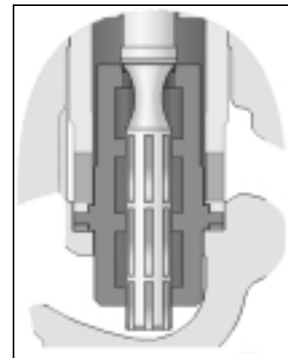
For Fine Control on
Low Flow/
High ΔP Service



-20°F — 1050°F
-29°C — 565°C
Class IV/V/Zero

MINI-P

For Staged Low Flow/
High ΔP Cavitating
Service



-20°F — 800°F
-29°C — 427°C
Class IV/V/Zero

AEROFLOW Cv TABLES

UNBALANCED PLUG THROTTLING (UBP) Cv Table ANSI Class 150 – 2500

LINEAR

Linear and Equal %					
Valve Size in (DN)	Stroke in (mm)	Stem Dia. in (mm)	Seat Dia. in (mm)	Min. Cv Controllable	Max. Cv
1 (25)	1 (25)	0.75 (20)	1.00 (25)	0.2	16
1.5 (40)	1 (25)	0.75 (20)	1.50 (40)	0.2	30
2 (50)	1.5 (40)	0.75 (20)	2.25 (57)	0.3	57
3 (80)	2 (50)	0.75 (20)	3.00 (80)	0.4	120

CAGE THROTTLING (UBC, BL, BH, PB, T²) Cv Table ANSI Class 150 – 2500

Flow Characteristic										
Valve Size in. (DN)	Stroke in. (mm)	Stem Dia. ¹		Seat Dia.		Min Cv Controllable	LINEAR		EQUAL %	
		150-600 in. (mm)	900-2500 in. (mm)	150-600 in. (mm)	900-2500 in. (mm)		Max. Cv		Max. Cv	
							ANSI 150-600	ANSI 900-2500	ANSI 150-600	ANSI 900-2500
2 (50)	1.5 (40)	0.75 (20)	0.75 (20)	2.21 (56)	2.21 (56)	0.6	65	60	55	50
3 (80)	2 (50)	0.75 (20)	0.75 (20)	2.96 (75)	2.96 (75)	0.8	140	130	125	120
4 (100)	2 (50)	0.75 (20)	0.75 (20)	3.80 (97)	3.80 (97)	0.9	210	200	190	180
6 (150)	3 (80)	1.00 (25)	1.00 (25)	5.31 (135)	5.31 (135)	1.4	470	450	420	400
8 (200)	3 (80) 4 (100)	1.25 (32)	1.25 (32)	7.06 (179)	7.06 (179)	1.8	725 830	700 800	650 750	580 720
10 (250)	3 (80) 4 (100)	1.25 (32)	1.5 (40)	10 (250)	8.5 (216)	5.0	1375 1550	1020 1160	1230 1390	850 1040
12 (300)	3 (80) 4 (100)	1.25 (32)	1.5 (40)	11.9 (301)	10 (250)	6.0	1740 2020	1300 1470	1560 1790	1080 1320
14 (350)	3 (80) 4 (100)	1.25 (32)	1.5 (40)	12.5 (318)	11.86 (301)	7.5	— —	1650 1950	— —	1370 1750
16 (400)	3 (80) 4 (100)	1.25 (32)	1.5 (40)	14.7 (373)	12.5 (318)	7.5	2500 3100	1850 2200	2250 2750	1530 1980

1. Stem diameter for T2 trim is 1/2" for 2-4" sizes and 3/4" for 6" & 8" sizes.

AEROFLOW Cv TABLES

LES-SONIC CAGE THROTTLING Cv Table

LINEAR

Flow Characteristic - LINEAR												
Valve Size in (DN)	Stroke in (mm)	Stem Dia. ¹		Seat Dia.		Min. Cv Controllable	$\Delta P/P_1$					
		150-600 in (mm)	900-2500 in (mm)	150-600 in (mm)	900-2500 in (mm)		≤ 0.6		$>0.6 \leq 0.8$		$>0.8 \leq 0.99^2$	
							150-600	900-2500	150-600	900-2500	150-600	900-2500
2 (50)	1.5 (40)	0.75 (20)	0.75 (20)	2.21 (56)	2.21 (56)	0.60	45	45	30	30	15	15
	2 (50)						60	60	40	40	23	23
3 (80)	2 (50)	0.75 (20)	0.75 (20)	2.96 (75)	2.96 (75)	0.80	100	100	55	55	30	30
	3 (80)						150	150	82	82	45	45
4 (100)	2 (50)	0.75 (20)	0.75 (20)	3.80 (97)	3.80 (97)	0.90	150	150	75	75	40	40
	3 (80)						225	225	110	110	60	60
6 (150)	3 (80)	1.00 (25)	1.00 (25)	5.31 (135)	5.31 (135)	1.40	330	330	150	150	85	85
	4 (100)						440	440	200	200	115	115
8 (200)	3 (80)	1.25 (32)	1.25 (32)	7.06 (179)	7.06 (179)	1.80	430	430	200	200	110	110
	4 (100)						530	530	265	265	150	150
	5 (125)						720	720	330	330	180	180
10 (250)	3 (80)	1.25 (32)	1.5 (40)	10 (250)	8.5 (216)	5.02	620	535	280	240	160	135
	4 (100)						830	720	375	320	210	180
	5 (125)						1030	890	470	400	270	225
12 (300)	3 (80)	1.25 (32)	1.5 (40)	11.9 (301)	10 (250)	6.00	760	620	340	280	190	160
	4 (100)						1010	830	450	375	250	210
	5 (125)						1270	1030	570	470	315	270
14 (350)	3 (80)	1.25 (32)	1.5 (40)	12.5 (318)	11.86 (301)	7.50	—	760	—	340	—	190
	4 (100)						—	1010	—	450	—	250
	5 (125)						—	1270	—	570	—	315
16 (400)	3 (80)	1.25 (32)	1.5 (40)	14.7 (373)	12.5 (318)	7.50	920	790	410	350	230	200
	4 (100)						1230	1060	550	465	310	270
	5 (125)						1540	1320	690	585	390	335

1. Stem diameter for T2 trim is 1/2" for 2-4" sizes and 3/4" for 6" size.
2. For ratios above .9 consult Leslie Controls.

LES-CAV CAGE THROTTLING (Single/Multi - Stage) Cv Table

Flow Characteristic - LINEAR																
Valve Size in (DN)	Stroke in (mm)	Stem Dia. ¹		Seat Dia.		Min. Cv Contr.	ANSI 150-600					ANSI 900-2500				
		150-600 in (mm)	900-2500 in (mm)	150-600 in (mm)	900-2500 in (mm)		CAV I	CAV II	CAV III	CAV IV	CAV V	CAV I	CAV II	CAV III	CAV IV	CAV V
2 (50)	1.5 (40)	.75 (20)	.75 (20)	2.2 (56)	2.2 (56)	0.6	40	15	9	6	4	40	15	9	6	4
	2 (50)						52	20	12	7	6	52	20	12	7	6
3 (80)	2 (50)	.75 (20)	.75 (20)	2.96 (75)	2.96 (75)	0.8	75	28	18	10	8	75	28	18	10	8
	3 (80)						110	48	28	14	12	110	48	28	14	12
4 (100)	2 (50)	.75 (20)	.75 (20)	3.80 (97)	3.80 (97)	0.9	95	45	27	18	13	95	45	27	18	13
	3 (80)						140	68	41	26	22	140	68	41	26	22
6 (150)	3 (80)	1 (25)	1 (25)	5.31 (135)	5.31 (135)	1.4	200	110	58	38	28	200	110	58	38	28
	4 (100)						265	145	80	50	38	265	145	80	50	38
8 (200)	3 (80)	1.25 (32)	1.25 (32)	7.06 (179)	7.06 (179)	1.8	270	150	106	58	50	270	150	106	58	50
	4 (100)						340	225	140	87	75	340	225	140	87	75
	5 (125)						430	300	180	116	100	430	300	180	116	100
10 (250)	3 (80)	1.25 (32)	1.5 (40)	10 (250)	8.5 (216)	5.0	370	210	150	81	70	320	185	127	70	60
	4 (100)						490	280	195	122	106	425	250	168	104	90
	5 (125)						620	350	250	162	140	530	310	215	140	120
12 (300)	3 (80)	1.25 (32)	1.5 (40)	11.9 (301)	10 (250)	5.6	450	250	178	97	84	370	210	150	81	70
	4 (100)						600	330	235	146	126	490	280	195	122	106
	5 (125)						750	415	300	195	168	620	350	250	162	140
14 (350)	3 (80)	1.25 (32)	1.5 (40)	12.5 (318)	11.86 (301)	6.6	345	250	178	97	84	345	250	178	97	84
	4 (100)						580	330	235	146	126	580	330	235	146	126
	5 (125)						730	415	300	195	168	730	415	300	195	168
16 (400)	3 (80)	1.25 (32)	1.5 (40)	14.7 (373)	12.5 (318)	6.9	550	310	220	120	104	470	260	187	103	88
	4 (100)						730	410	290	180	150	630	345	248	154	133
	5 (125)						910	515	370	240	200	780	430	320	205	177

AEROFLOW Cv & FLOW COEFFICIENT TABLES

Mini-P (3-STAGE) PLUG THROTTLING Cv Table

Good for Cavitation but not for Flashing

Flow Characteristic - LINEAR					
Valve Size in/DN	Stroke in/mm	Stem Dia. in/mm	Seat Dia. in/mm	Min Cv	Max Cv
1/25 or 1.5/40	0.75/20	0.75/20	0.875/22	0.08	1.2 3 5

MICROTAPER® PLUG THROTTLING Cv Table

Good for Flashing but not for Cavitation

Flow Characteristic - LINEAR					
Valve Size in/DN	Stroke in/mm	Stem Dia. in/mm	Seat Dia. in/mm	Min Cv	Max Cv
1/25 or 1.5/40	1/25	0.75/20	0.375/9.5	0.01	0.3
			0.375/9.5	0.01	0.6
			0.375/9.5	0.01	1.2
			0.50/13	0.013	2.1
			.75/19	0.02	4.8
			1.0/25	0.03	8.5

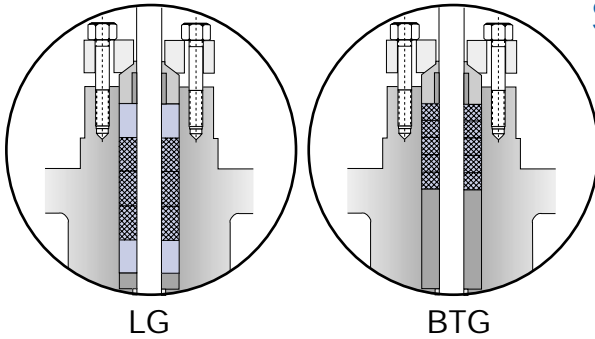
Flow Coefficients Globe vs. Angle

Flow Coefficients/Allowable ΔP for AeroFlow Anti-Cav Trim Configurations						
	Globe		Angle		Maximum Pressure Differential psi (bar) ¹	
	FL	XT	FL	XT		
Unbalanced Plug Throttling (Flow under seat)	0.92	0.80	0.90	0.76	N/A	
Unbalanced Plug Throttling (Flow over seat) ²	0.75	0.50	0.65	0.40	N/A	
Cage (UBC/LT/HT) Throttling (Flow under seat)	0.88	0.76	0.85	0.72	N/A	
Cage (LT/HT/PB/T2) Throttling (Flow over seat)	0.85	0.72	0.83	0.70	N/A	
Les-Sonic (Flow under seat)	N/A	0.68	N/A	0.64	N/A	
Les-Sonic (Flow over seat)	N/A	0.66	N/A	0.62	N/A	
Les-Cav I (Flow over seat)	0.94	N/A	0.92	N/A	400 (27.6)	
Les-Cav II (Flow over seat)	0.96	N/A	0.94	N/A	750 (51.7)	
Les-Cav III (Flow over seat)	0.98	N/A	0.96	N/A	2000 (138)	
Les-Cav IV (Flow over seat)	0.99	N/A	0.97	N/A	3000 (207)	
Les-Cav V (Flow over seat)	0.99	N/A	0.98	N/A	4000 (276)	
MicroTaper® (Flow under seat)	0.92	0.80	0.90	0.78	N/A	
MicroTaper® (Flow over seat)	0.70	0.45	0.60	0.35	N/A	
Mini-P (Flow under seat)	0.98	N/A	0.96	N/A	2000 (138)	

1. Other trim Configurations Maximum Pressure Differential will be limited on Allowable Liquid Velocities. These values are rules of thumb and may vary with specific customer conditions.

2. Consult factory for limitations of using unbalanced trim to flow over seat.

STANDARD PACKING CONFIGURATIONS



LAMINATED GRAPHITE (LG)

Precision die-cut laminated graphite rings provide a reliable, tight stem seal up to operating temperatures of 1050°F (565°C).

BRAIDED TEFLON GRAPHITE (BTG)

Split rings allow packing replacement without removal of actuator. Graphite impregnated PTFE provides 500°F (260°C) service temperature, better "memory" and sealing than pure PTFE rings, lowered stem hysteresis, and is ideal for fluids that contain suspended particles.

DOUBLE PTFE V-RING

Also available.



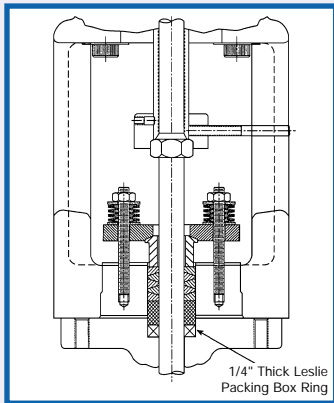
No More Tightening

Leslie Controls PROTECTS YOUR VALVE INVESTMENT

with a leak free WedgeSeal packing system

from **CHESTERTON**
Global Solutions. Local Service.

WedgeSeal™ Packing System



The WedgeSeal packing system reduces stem friction and gland loads. The WedgeSeal arrangement transfers gland force with predictable precision. Patented, WedgeSeal sealing rings are available in low friction, PTFE mesh over graphite construction or pure graphite. Both meet API 589 Fire Test requirements.

CHESTERTON WedgeSeal™ SOLUTIONS

MAXIMUM SEALABILITY

- Transfers gland force efficiently to enhance sealing
- Packing volume loss and relaxation is minimized with low PTFE content

VALVE RESPONSIVENESS

- Combines the friction characteristics of PTFE with the physical characteristics of graphite for unmatched performance. Step response below 1% is typical to maximize process control
- Minimizes valve hunting and improves process quality and production yields

CONSISTENT PERFORMANCE

- Engineered sets ensure valve performance and repeatability
- Wiper rings are available for abrasive service

MAINTENANCE FREE

- Valve live loading stores 800% more elastic energy to maintain optimized gland load
- Frequent valve adjustments are eliminated

COMMON AIR OPERATED VALVE CONCERNS

VALVE LEAKAGE

- Frequent stem actuation can cause loss of packing gland load that leads to stem leakage.
- PTFE v-rings will relax and wear in service. Braided packing will consolidate in-service and lose gland load.

POOR VALVE RESPONSIVENESS

- Control valve responsiveness is critical to process quality and control. High packing friction from graphite rings causes poor step response and process control, especially in lower temperature valves.
- Friction causes valves to constantly hunt for the correct position resulting in continuous stem actuation.

VARIATIONS IN VALVE PERFORMANCE

- Variations in packing friction can cause unit start-up problems. Inconsistent gland loading and sealing system designs can be factors.

FREQUENT VALVE ADJUSTMENTS

- Tightening packing glands in the field to reduce valve leakage can be all too common. Once tightened, uncontrolled packing friction can limit operability.

POOR VALVE RELIABILITY

- Poor control valve reliability can have a dramatic affect on production costs, even before it is removed from service. Removing control valves from service can be expensive.



WedgeSeal Packing System for temperatures greater than 230°C (450°F)



Low overall PTFE content increases thermal stability

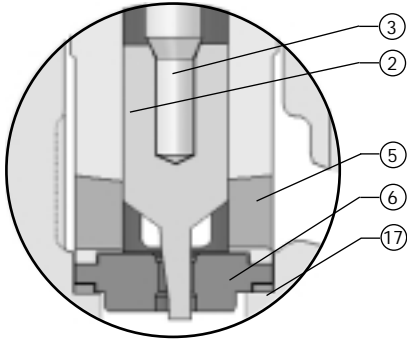


1724E PTFE Sealing System for maximum chemical compatibility

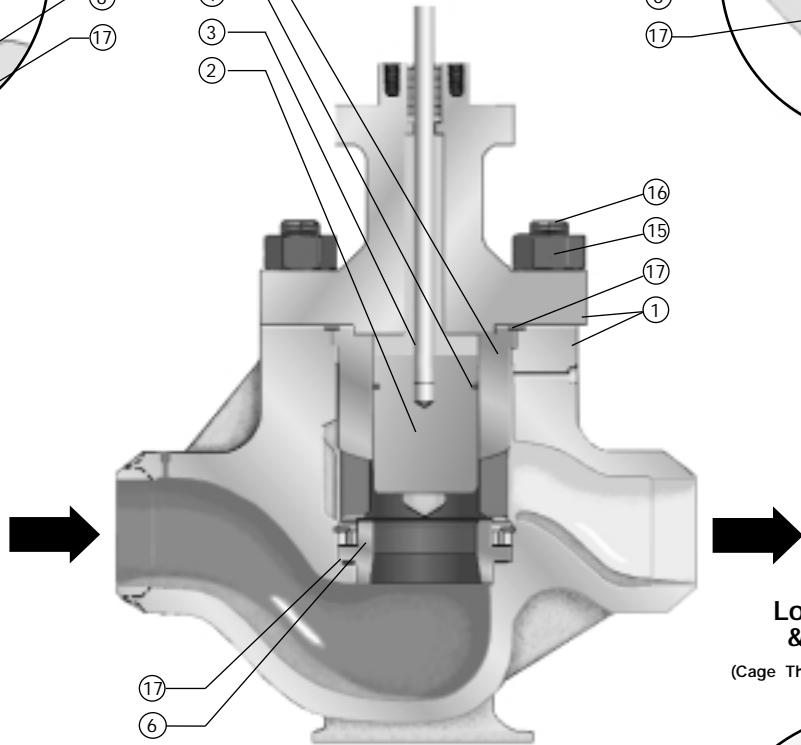
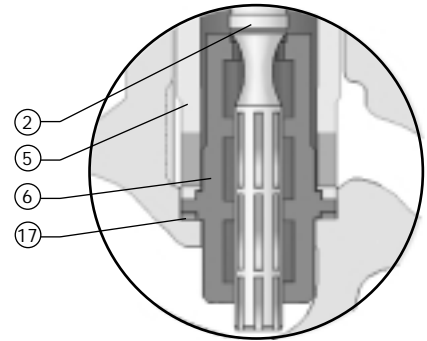
AEROFLOW PARTS - UNBALANCED

LINEAR

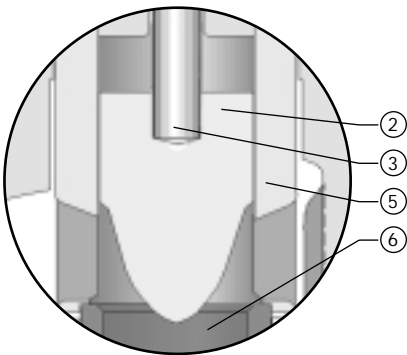
MicroTaper®
Trim



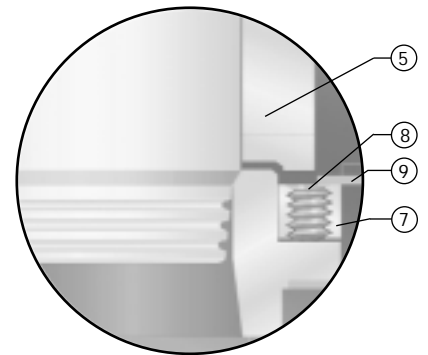
Mini-P Multi-Stage
Plug Throttling Trim



Unbalanced Plug
Throttling Trim



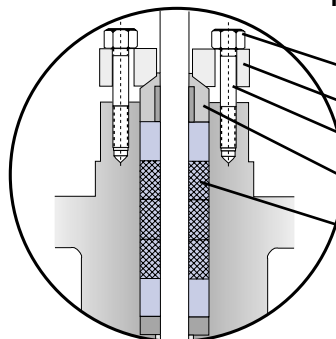
Load Ring Detail
& VP 900-2500
(Cage Throttling 4" Valve Size and Up)
900-2500 Class



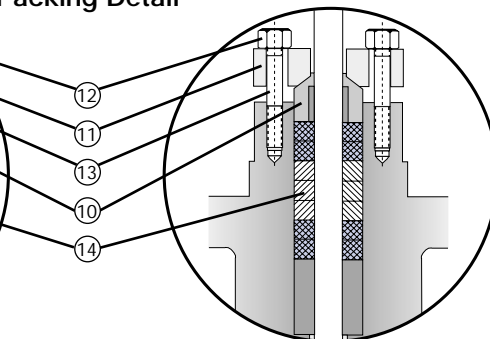
Body/bonnet Module
shown with
Unbalanced Cage
Throttling Trim

Packing Detail

Packing Detail
w/BTG Packing



Packing Detail
w/Laminated
Graphite Packing



AEROFLOW MATERIAL SPECIFICATION - UNBALANCED

Item	Description	Material	Material Specification
1	Body/Bonnet	Carbon Steel Stainless Steel Chrome-moly Steel	ASTM A-216 GR WCB ASTM A-351 GR CF8M ASTM A-217 GR WC9
2	Valve Plug Mini P Trim only Microtaper Trim only	Stainless Steel 1 3-8 MO Stainless Steel	AISI SST 420 ASTM A-564 AISI SST 431
3	Valve Stem	Nitronic 60	ASTM A-276
4	Piston Ring	Stellite	Stellite #25
5	Cage ¹	Stainless Steel	AISI SST 440
6	Seat Ring	Stainless Steel	AISI SST 440C
7	Load Ring	Stainless Steel	400 Series
8	Load Screws	Stainless Steel	ASTM F880
9	Retaining Ring	Stainless Steel	AISI SST 302
10	Packing Follower	Stainless Steel	AISI SST 303
11	Packing Flange	Stainless Steel	AISI 1144CF
12	Hex Nut	Stainless Steel	ASTM A-194 GR4
13	Studs	Alloy Steel	ASTM A-193 B16
14	Packing	BTG or Laminated Graphite	
15	Hex Nut	Alloy Steel Alloy Steel (WCB body)	ASTM A-194 GR7 ASTM A-194 GR2
16	Stud	Alloy Steel Alloy Steel (WCB body)	ASTM A-193 B16 ASTM A-193 GR7
17	Gasket	Graphite	Inconel 600

NOTE:

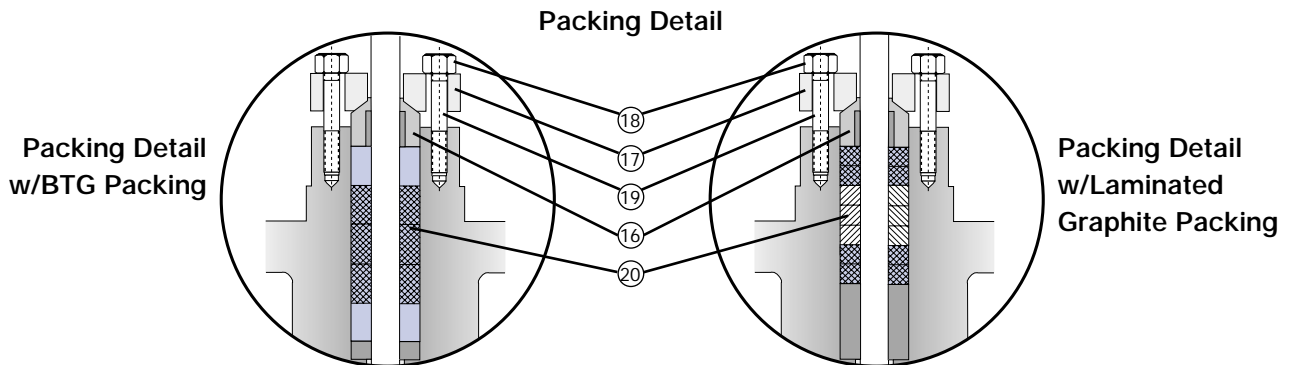
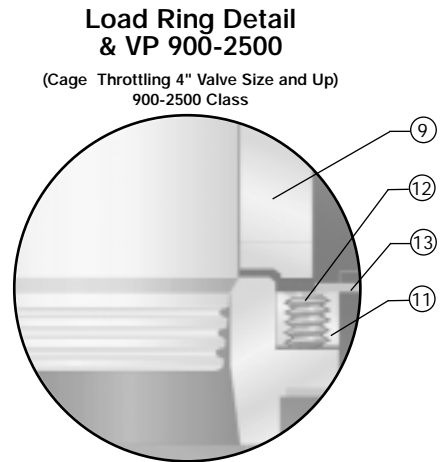
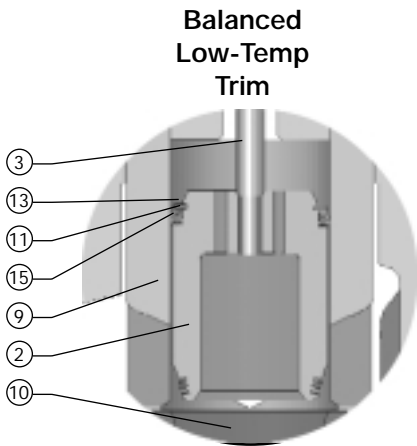
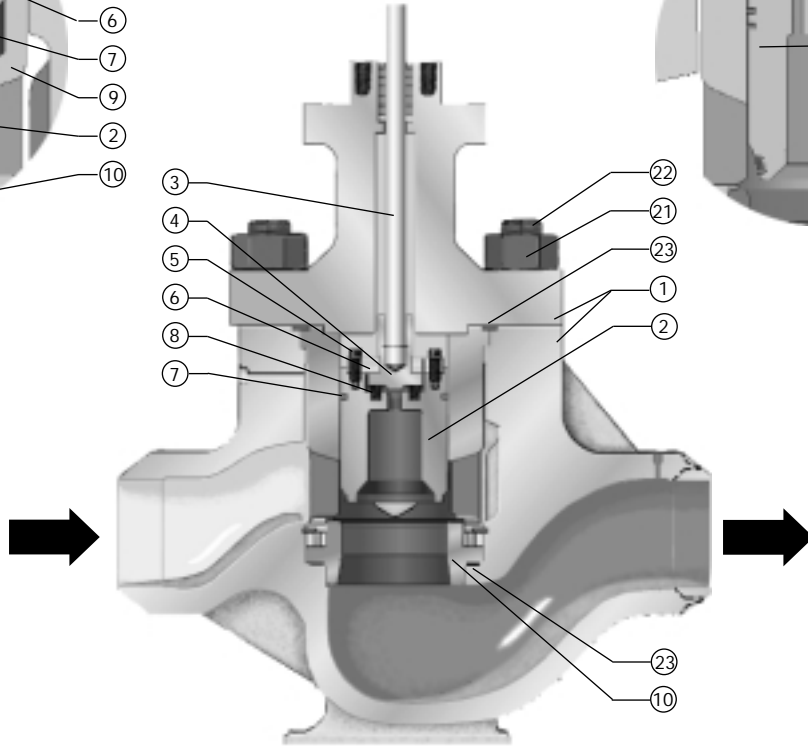
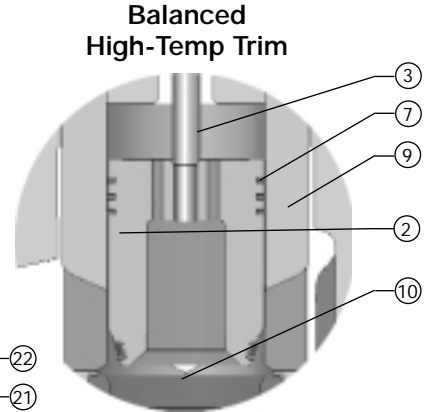
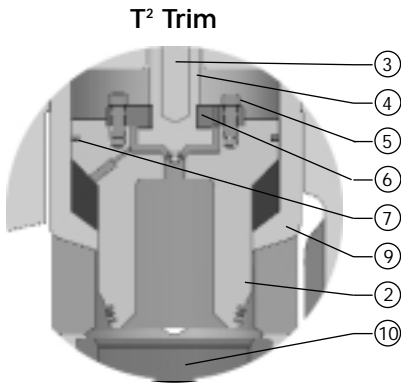
INCONEL® is a trademark of the Inco Family of Companies
 MICROTAPER® is a registered trademark of Leslie Controls, Inc.
 STELLITE® is a trademark of Stoodly Deloro Stellite, Inc.
 NITRONIC 60® is a trademark of Armco, Inc.

NACE Material available upon request

1. Included in all other trim modules unless otherwise listed

AEROFLOW PARTS - BALANCED

LINEAR



AEROFLOW MATERIAL SPECIFICATION - BALANCED

Item	Description	Material	Material Specification
1	Body/Bonnet	Carbon Steel Stainless Steel Chrome-moly	ASTM A-216 GR WCB ASTM A-351 GR CF8M ASTM A-217 GR WC9
2	Valve Plug	Stainless Steel	AISI 420
3	Valve Stem	Nitronic 60	ASTM A-276
4	Pilot Plug	Stainless Steel	AISI SST 431
5	Socket Head Cap Screw	18-8 Stainless Steel	AISI SST 300
6	Pilot Plate	Stainless Steel	ASTM A-582
7	Piston Ring	Stellite	Stellite #25
8	Spring	Inconel	INCO: x 750
9	Cage ¹	Stainless Steel	AISI SST 440
10	Seat Ring	Stainless Steel	AISI SST 440 C
11	Load Ring ²	Stainless Steel	400 Series
12	Load Screws ²	Stainless Steel	ASTM F880
13	Retaining Ring	Stainless Steel	AISI SST 302
14	Seal Retainer	Stainless Steel	ASTM A-240
15	Seal	PTFE	Fluo 36
16	Packing Follower	Stainless Steel	AISI SST 303
17	Packing Flange	Stainless Steel	AISI 1144 CF
18	Hex Nut	Stainless Steel	ASTM A-194 GR4
19	Studs	Alloy Steel	A-193 B16
20	Packing	BTG or Laminated Graphite	
21	Hex Nut	Alloy Steel Alloy Steel (WCB only)	ASTM 194 GR7 ASTM 194 GR2H
22	Stud	Alloy Steel Alloy Steel (WCB only)	ASTM 193 B16 ASTM 193 GR7
23	Gasket	Graphite	Inconel 600

NOTE: Common to all trim modules including Les-Cav/Les-Sonic unless otherwise listed

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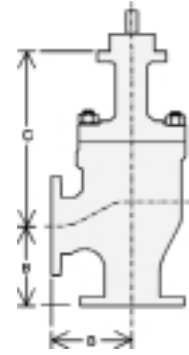
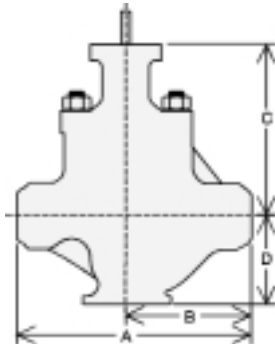
NACE Material available upon request

1. Cage Guided 4" valve size and up (900-2500 Class)

2. Malcolmized® 150-600 Class above 700°F and 900-4500 Class above 650°F.

AEROFLOW Body Dimensions³ - CLASS 150-600

LINEAR



DIMENSIONS IN INCHES					Shpg. Info. ¹		DIMENSIONS IN MILLIMETERS					Shpg. Info. ¹	
SIZE	A	B	C ²	D	WGT.	VOL.	SIZE	A	B	C ²	D	WGT.	VOL.
ANSI 150/300/600# PN16-100 BWE/SWE							ANSI 150/300/600# PN16-100 BWE/SWE						
1	8 $\frac{1}{4}$	4 $\frac{1}{8}$	8	3	53 lb.	2 ft ³	25	210	105	203	76	24 kg	0.1 m ³
1 $\frac{1}{2}$	9 $\frac{1}{8}$	4 $\frac{1}{16}$	8	3 $\frac{1}{16}$	63 lb.	2 ft ³	40	251	125	203	78	29 kg	0.1 m ³
2	11 $\frac{1}{4}$	5 $\frac{1}{8}$	12 $\frac{1}{4}$	3 $\frac{1}{16}$	94 lb.	3 ft ³	50	286	143	324	94	43 kg	0.1 m ³
3	13 $\frac{1}{4}$	6 $\frac{1}{8}$	14 $\frac{1}{2}$	4 $\frac{1}{8}$	160 lb.	4 ft ³	75	337	168	368	121	73 kg	0.2 m ³
4	15 $\frac{1}{2}$	7 $\frac{1}{8}$	16 $\frac{1}{2}$	5 $\frac{1}{16}$	215 lb.	6 ft ³	100	394	197	419	141	98 kg	0.2 m ³
6	20	10	21 $\frac{1}{16}$	6 $\frac{1}{16}$	450 lb.	11 ft ³	150	508	254	548	173	204 kg	0.4 m ³
8	24	12	24	8 $\frac{1}{8}$	860 lb.	17 ft ³	200	610	305	610	225	390 kg	0.5 m ³
10	29 $\frac{1}{8}$	14 $\frac{1}{16}$	18 $\frac{1}{4}$	9 $\frac{1}{8}$	1100 lb.	22 ft ³	250	752	376	476	248	499 kg	0.6 m ³
12	32 $\frac{1}{4}$	16 $\frac{1}{8}$	20 $\frac{1}{2}$	10 $\frac{1}{4}$	1700 lb.	27 ft ³	300	819	410	521	273	771 kg	0.8 m ³
16	43 $\frac{1}{8}$	21 $\frac{1}{16}$	23 $\frac{1}{2}$	12 $\frac{1}{4}$	3200 lb.	53 ft ³	400	1108	552	597	324	1451 kg	1.5 m ³
ANSI 150# PN16 Flanged							ANSI 150# PN16 Flanged						
1	7 $\frac{1}{4}$	3 $\frac{1}{8}$	8	3	56 lb.	2 ft ³	25	184	92	203	76	25 kg	0.1 m ³
1 $\frac{1}{2}$	8 $\frac{3}{4}$	4 $\frac{3}{8}$	8	3 $\frac{1}{16}$	65 lb.	2 ft ³	40	222	111	203	78	29 kg	0.1 m ³
2	10	5	12 $\frac{1}{4}$	3 $\frac{1}{16}$	95 lb.	3 ft ³	50	284	127	324	94	43 kg	0.1 m ³
3	11 $\frac{1}{4}$	5 $\frac{1}{8}$	14 $\frac{1}{2}$	4 $\frac{1}{8}$	155 lb.	4 ft ³	75	298	149	368	121	70 kg	0.1 m ³
4	13 $\frac{1}{8}$	6 $\frac{1}{16}$	16 $\frac{1}{2}$	5 $\frac{1}{16}$	230 lb.	5 ft ³	100	352	176	419	141	105 kg	0.3 m ³
6	17 $\frac{1}{4}$	8 $\frac{1}{8}$	21 $\frac{1}{16}$	6 $\frac{1}{16}$	505 lb.	9 ft ³	150	451	225	548	173	230 kg	0.3 m ³
8	21 $\frac{1}{8}$	10 $\frac{1}{8}$	24	8 $\frac{1}{8}$	930 lb.	14 ft ³	200	543	270	610	225	423 kg	0.4 m ³
10	26 $\frac{1}{2}$	14 $\frac{1}{16}$	18 $\frac{1}{4}$	9 $\frac{1}{8}$	1120 lb.	18 ft ³	250	673	376	476	248	508 kg	0.5 m ³
12	29	16 $\frac{1}{8}$	20 $\frac{1}{2}$	10 $\frac{1}{4}$	1730 lb.	23 ft ³	300	737	410	521	273	785 kg	0.7 m ³
16	40	21 $\frac{1}{16}$	23 $\frac{1}{2}$	12 $\frac{1}{4}$	3250 lb.	46 ft ³	400	1016	554	597	324	1474 kg	1.3 m ³
ANSI 300# PN40-64 Flanged							ANSI 300# PN40-64 Flanged						
1	7 $\frac{1}{4}$	3 $\frac{1}{8}$	8	3	58 lb.	2 ft ³	25	197	98	203	76	26 kg	0.1 m ³
1 $\frac{1}{2}$	9 $\frac{1}{4}$	4 $\frac{1}{8}$	8	3 $\frac{1}{16}$	67 lb.	2 ft ³	40	235	117	203	78	30 kg	0.1 m ³
2	10 $\frac{1}{2}$	5 $\frac{1}{4}$	12 $\frac{1}{4}$	3 $\frac{1}{16}$	97 lb.	3 ft ³	50	267	133	324	94	44 kg	0.1 m ³
3	12 $\frac{1}{2}$	6 $\frac{1}{4}$	14 $\frac{1}{2}$	4 $\frac{1}{8}$	160 lb.	4 ft ³	75	311	159	368	121	73 kg	0.1 m ³
4	14 $\frac{1}{2}$	7 $\frac{1}{4}$	16 $\frac{1}{2}$	5 $\frac{1}{16}$	240 lb.	6 ft ³	100	368	184	419	141	109 kg	0.2 m ³
6	18 $\frac{1}{8}$	9 $\frac{1}{16}$	21 $\frac{1}{16}$	6 $\frac{1}{16}$	525 lb.	10 ft ³	150	473	237	548	173	239 kg	0.3 m ³
8	22 $\frac{1}{2}$	11 $\frac{1}{16}$	24	8 $\frac{1}{8}$	950 lb.	15 ft ³	200	568	284	610	225	432 kg	0.5 m ³
10	27 $\frac{1}{8}$	13 $\frac{1}{16}$	18 $\frac{1}{4}$	9 $\frac{1}{8}$	1140 lb.	20 ft ³	250	708	354	476	248	517 kg	0.6 m ³
12	30 $\frac{1}{2}$	15 $\frac{1}{4}$	20 $\frac{1}{2}$	10 $\frac{1}{4}$	1760 lb.	25 ft ³	300	775	387	521	273	798 kg	0.7 m ³
16	41 $\frac{1}{8}$	20 $\frac{1}{16}$	23 $\frac{1}{2}$	12 $\frac{1}{4}$	3300 lb.	49 ft ³	400	1057	529	597	324	1497 kg	1.4 m ³
ANSI 600# PN40-64 Flanged							ANSI 600# PN40-64 Flanged						
1	8 $\frac{1}{4}$	4 $\frac{1}{8}$	8	3	59 lb.	2 ft ³	25	210	105	203	76	27 kg	0.1 m ³
1 $\frac{1}{2}$	9 $\frac{1}{8}$	4 $\frac{1}{16}$	8	3 $\frac{1}{16}$	69 lb.	2 ft ³	40	251	125	203	78	31 kg	0.1 m ³
2	11 $\frac{1}{4}$	5 $\frac{1}{8}$	12 $\frac{1}{4}$	3 $\frac{1}{16}$	100 lb.	3 ft ³	50	286	143	324	100	45 kg	0.1 m ³
3	13 $\frac{1}{4}$	6 $\frac{1}{8}$	14 $\frac{1}{2}$	4 $\frac{1}{8}$	170 lb.	4 ft ³	75	337	168	368	121	77 kg	0.2 m ³
4	15 $\frac{1}{2}$	7 $\frac{1}{8}$	15 $\frac{1}{8}$	5 $\frac{1}{16}$	260 lb.	6 ft ³	100	394	197	419	141	118 kg	0.2 m ³
6	20	10	21 $\frac{1}{16}$	6 $\frac{1}{16}$	450 lb.	11 ft ³	150	508	254	548	173	204 kg	0.3 m ³
8	24	12	24	8 $\frac{1}{8}$	1000 lb.	17 ft ³	200	610	305	610	225	390 kg	0.5 m ³
10	29 $\frac{1}{8}$	14 $\frac{1}{16}$	18 $\frac{1}{4}$	9 $\frac{1}{8}$	1160 lb.	22 ft ³	250	752	376	476	248	526 kg	0.6 m ³
12	32 $\frac{1}{4}$	16 $\frac{1}{8}$	20 $\frac{1}{2}$	10 $\frac{1}{4}$	1740 lb.	28 ft ³	300	819	410	521	273	812 kg	0.8 m ³
16	43 $\frac{1}{8}$	21 $\frac{1}{16}$	23 $\frac{1}{2}$	12 $\frac{1}{4}$	3350 lb.	53 ft ³	400	1108	554	597	324	1520 kg	1.5 m ³

NOTE: DIMENSIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

Request certified drawings for piping layout and construction purposes.

1. Approximate weight and volume (actuator not included)
2. Consult factory for extended travel (C dimension)
3. ISA - 575.15 - 1986
4. Consult Factory for installation dimensions for 150-600 Angle Valves

AEROFLOW Body Dimensions³ - CLASS 900-2500

LINEAR

DIMENSIONS IN INCHES							Shpg. Info. ¹		DIMENSIONS IN MILLIMETERS					Shpg. Info. ¹	
SIZE	A	B	C ²	D	WGT.	VOL.	SIZE	A	B	C ²	D	WGT.	VOL.		
ANSI CLASS 900/1500 PN160-250 BWE/SWE							ANSI CLASS 900/1500 PN160-250 BWE/SWE								
1	11	5½	9½	3½	87 lb.	2 ft ³	25	279	140	241	79	39 kg	0.1 m ³		
1½	13	6½	9½	3½	125 lb.	3 ft ³	40	330	165	251	89	57 kg	0.1 m ³		
2	14¾	7½	12¾	4½	230 lb.	4 ft ³	50	400	200	323	379	104 kg	0.1 m ³		
3	18½	9½	14½	6½	346 lb.	7 ft ³	75	460	251	368	156	157 kg	0.2 m ³		
4 Glb	20½	11¾	15¾	7¾	484 lb.	10 ft ³	100	574	308	400	197	220 kg	0.3 m ³		
4 Angl	N/A	11¾	15¾	7¾	484 lb.	10 ft ³	100	574	308	400	197	220 kg	0.3 m ³		
6	30¾	15½	20¾	10¾	1311 lb.	24 ft ³	150	819	384	527	259	595 kg	0.7 m ³		
8	32¾	16½	23¾	13¾	3069 lb.	34 ft ³	200	1022	416	598	337	1392 kg	1.0 m ³		
10	39	19½	28½	16½	3800 lb.	52 ft ³	250	991	495	724	419	1723 kg	1.5 m ³		
12	44½	22¾	30½	19¾	5700 lb.	74 ft ³	300	1130	565	775	502	2585 kg	2.1 m ³		
16	56	28	34½	26	8100 lb.	134 ft ³	400	1422	711	876	660	3674 kg	3.8 m ³		
ANSI CLASS 2500 PN400 BWE/SWE							ANSI CLASS 2500 PN400 BWE/SWE								
1	12½	6¾	9½	3½	90 lb.	3 ft ³	25	318	159	241	79	41 kg	0.1 m ³		
1½	14¾	7½	9½	3½	130 lb.	3 ft ³	40	359	191	251	89	59 kg	0.1 m ³		
2	15¾	7½	12¾	4-4½	250 lb.	5 ft ³	50	375	187	323	379	113 kg	0.1 m ³		
3	19¾	9¾	14½	6½	511 lb.	8 ft ³	75	460	230	368	156	232 kg	0.2 m ³		
4 Glb	22¾	12¾	15¾	8	625 lb.	11 ft ³	100	530	301	400	203	283 kg	0.3 m ³		
4 Angl	N/A	11¾	15¾	8	625 lb.	11 ft ³	100	530	301	400	203	283 kg	0.3 m ³		
6	32¾	16½	20¾	11	1590 lb.	27 ft ³	150	768	409	527	280	721 kg	0.8 m ³		
8	40¾	20½	23¾	14¾	4059 lb.	51 ft ³	200	832	511	598	362	1841 kg	1.4 m ³		
10	50	25	28½	17½	4900 lb.	84 ft ³	250	1270	635	724	419	2223 kg	2.4 m ³		
12	56	28	30½	20¾	7100 lb.	115 ft ³	300	1422	711	775	502	3221 kg	3.3 m ³		
16	Call	Call	34½	27	10600 lb.	Call ft ³	400	Call	Call	876	660	4808 kg	Call		
ANSI CLASS 900 PN160 Flanged (RF and RTJ)							ANSI CLASS 900 PN160 Flanged (RF and RTJ)								
1	17¾	8¾	9½	3½	105 lb.	4 ft ³	25	438	219	241	79	48 kg	0.1 m ³		
1½	20	10	9½	3½	150 lb.	6 ft ³	40	508	254	251	89	68 kg	0.2 m ³		
2	23¾	11½	12¾	4½	280 lb.	9 ft ³	50	591	295	323	379	113 kg	0.3 m ³		
3	26¾	13¾	14½	6½	551 lb.	13 ft ³	75	676	338	368	156	232 kg	0.4 m ³		
4 Glb	30¾	15½	15¾	8	680 lb.	18 ft ³	100	770	379	400	203	283 kg	0.5 m ³		
4 Angl	N/A	15¾	15¾	8	680 lb.	Call ft ³	100	N/A	386	400	203	283 kg	Call		
6	41¾	20¾	20¾	11	1680 lb.	43 ft ³	150	1060	530	527	280	721 kg	1.2 m ³		
8	46¾	23¾	23¾	14¾	4189 lb.	78 ft ³	200	1172	586	598	362	1841 kg	1.9 m ³		
10	54	27	28½	17½	5070 lb.	106 ft ³	250	1372	686	724	419	2300 kg	2.8 m ³		
12	60¾	30¾	30½	20¾	7300 lb.	147 ft ³	300	1543	772	775	502	3311 kg	3.8 m ³		
16	73½	36¾	34½	27	10840 lb.	225 ft ³	400	1867	933	876	660	4917 kg	6.5 m ³		
ANSI CLASS 1500 PN250 Flanged (RF and RTJ)							ANSI CLASS 1500 PN250 Flanged (RF and RTJ)								
1	17¾	8¾	9½	3½	105 lb.	4 ft ³	25	438	219	241	79	48 kg	0.1 m ³		
1½	20	10	9½	3½	150 lb.	6 ft ³	40	508	254	251	89	68 kg	0.2 m ³		
2	23¾	11½	12¾	4½	280 lb.	9 ft ³	50	591	295	323	379	113 kg	0.3 m ³		
3	26¾	13¾	14½	6½	561 lb.	14 ft ³	75	708	354	368	156	254 kg	0.4 m ³		
4 Glb	31¾	16¾	15¾	8	690 lb.	19 ft ³	100	791	389	400	203	313 kg	0.5 m ³		
4 Angl	N/A	15¾	15¾	8	690 lb.	Call	100	N/A	395	400	203	313 kg	Call		
6	44¾	22¾	20¾	11	1685 lb.	47 ft ³	150	1124	562	527	280	764 kg	1.4 m ³		
8	50¾	25¾	23¾	14¾	4199 lb.	90 ft ³	200	1273	637	598	362	1905 kg	2.2 m ³		
10	59½	29¾	28½	17½	5100 lb.	126 ft ³	250	1511	756	724	419	2313 kg	3.3 m ³		
12	67¾	33¾	30½	20¾	7360 lb.	176 ft ³	300	1708	854	775	502	3338 kg	4.6 m ³		
16	81	40½	34½	27	10980 lb.	271 ft ³	400	2057	1029	876	660	4980 kg	7.7 m ³		
ANSI CLASS 2500 PN400 Flanged (RF and RTJ)							ANSI CLASS 2500 PN400 Flanged (RF and RTJ)								
1	20	10	9½	3½	110 lb.	6 ft ³	25	508	254	241	79	50 kg	0.2 m ³		
1½	23¾	11¾	9½	3½	160 lb.	8 ft ³	40	594	297	251	89	73 kg	0.2 m ³		
2	26¾	13¾	12¾	4½	290 lb.	12 ft ³	50	667	333	323	379	113 kg	0.3 m ³		
3	33¾	16¾	14½	6½	576 lb.	27 ft ³	75	848	424	368	156	232 kg	0.6 m ³		
4 Glb	38¾	19¾	15¾	8	710 lb.	37 ft ³	100	968	562	400	203	283 kg	0.8 m ³		
4 Angl	N/A	19¾	15¾	8	710 lb.	Call	100	N/A	484	400	203	283 kg	Call		
6	54¾	27¾	20¾	11	1745 lb.	73 ft ³	150	1378	689	527	280	721 kg	2.0 m ³		
8	65¾	32¾	23¾	14¾	4249 lb.	124 ft ³	200	1670	829	598	362	1841 kg	3.6 m ³		
10	83¾	41¾	28½	17½	5180 lb.	240 ft ³	250	2121	1060	724	419	2350 kg	6.2 m ³		
12	93	46¾	30½	20¾	7460 lb.	336 ft ³	300	2362	1181	775	502	3384 kg	8.5 m ³		
16	C/F	C/F	34½	27	11120 lb.	C/F	400	C/F	C/F	876	660	5044 kg	C/F		

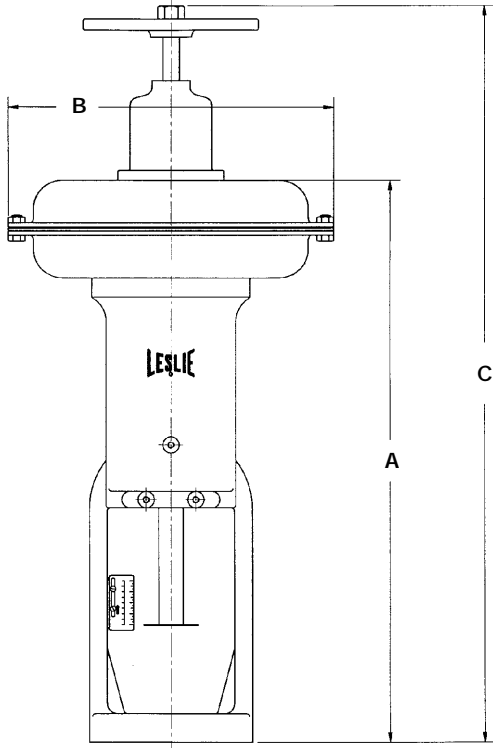
NOTE: DIMENSIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.
Request certified drawings for piping layout and construction purposes.

1. Approximate weight and volume (actuator not included)
2. Consult factory for extended travel (C dimension)
3. ISA - 575.15 - 1986
4. Consult Factory for installation dimensions for 150-600 Angle Valves

AEROFLOW ACTUATOR DIMENSIONS

LINEAR

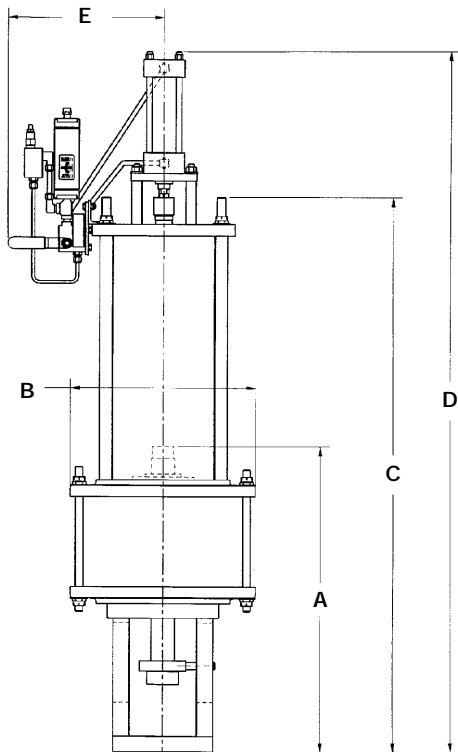
Diaphragm Actuator



DIAPHRAGM ACTUATOR

SIZE	STANDARD		w/Handwheel	WEIGHT	
	A	B	C	w/o	w/Hndwl
55AFR	16 $\frac{1}{4}$	11 $\frac{1}{16}$	25 $\frac{3}{16}$	60	65
55AF	18 $\frac{5}{8}$	11 $\frac{1}{16}$	26 $\frac{3}{16}$	50	55
85AFR	22 $\frac{15}{32}$	14 $\frac{3}{4}$	31 $\frac{1}{16}$	120	122
85AF	25 $\frac{1}{16}$	14 $\frac{3}{4}$	33 $\frac{3}{8}$	96	101

Piston Actuator



PISTON ACTUATOR

SIZE	NOM. AREA in ²	DA A	DA & DASR B [†]	DASR C	DASR w/ HOD		WEIGHT		SHPG. VOL. ft. ³	
					D	E	DA	DASR	DA	DASR
6"	28	16 $\frac{1}{2}$	7 $\frac{7}{8}$	25 $\frac{15}{16}$	35 $\frac{3}{8}$	11 $\frac{1}{2}$	82	122	2.1	2.8
10"	78	17 $\frac{1}{16}$	10 $\frac{1}{2}$	33 $\frac{3}{8}$	45 $\frac{3}{8}$	12 $\frac{1}{16}$	132	172	3.7	5
13"	130	26	15 $\frac{3}{4}$	47 $\frac{5}{16}$	59 $\frac{13}{16}$	13 $\frac{3}{16}$	232	352	8.1	11.8
16"	201	24 $\frac{3}{4}$	19	42 $\frac{1}{16}$	51 $\frac{13}{16}$	14 $\frac{1}{16}$	295	425	9.7	14
20"	314	24 $\frac{3}{4}$	23	42 $\frac{1}{16}$	51 $\frac{13}{16}$	14 $\frac{1}{16}$	415	535	13.8	20

DA - Double Acting

DASR - Double Acting w/Spring Return

† Corner to corner dimension not shown.

Leslie's unique optional Manual Hydraulic Override System (HOD), shown above, assures easy, accurate manual valve positioning using a hydraulic hand pump to position the valve plug in 1/8" increments per pump stroke.

AEROFLOW SPECIFICATION

Valve Body

- 1.1.1 Body should have integrally cast flow control vanes in the inlet, outlet and body gallery to reduce turbulence and allow maximum Cv/Size ratios.
- 1.1.2 Body should be designed with pressure taps on the inlet and outlet side so that adjacent piping penetration points are not needed.
- 1.1.3 Globe and angle body configurations should be designed so that trim modules are fully interchangeable.
- 1.1.4 High pressure body designs (900-2500#) should allow for machining to accept an outlet pipe nominally one size larger than the valve body size.

Valve Trim

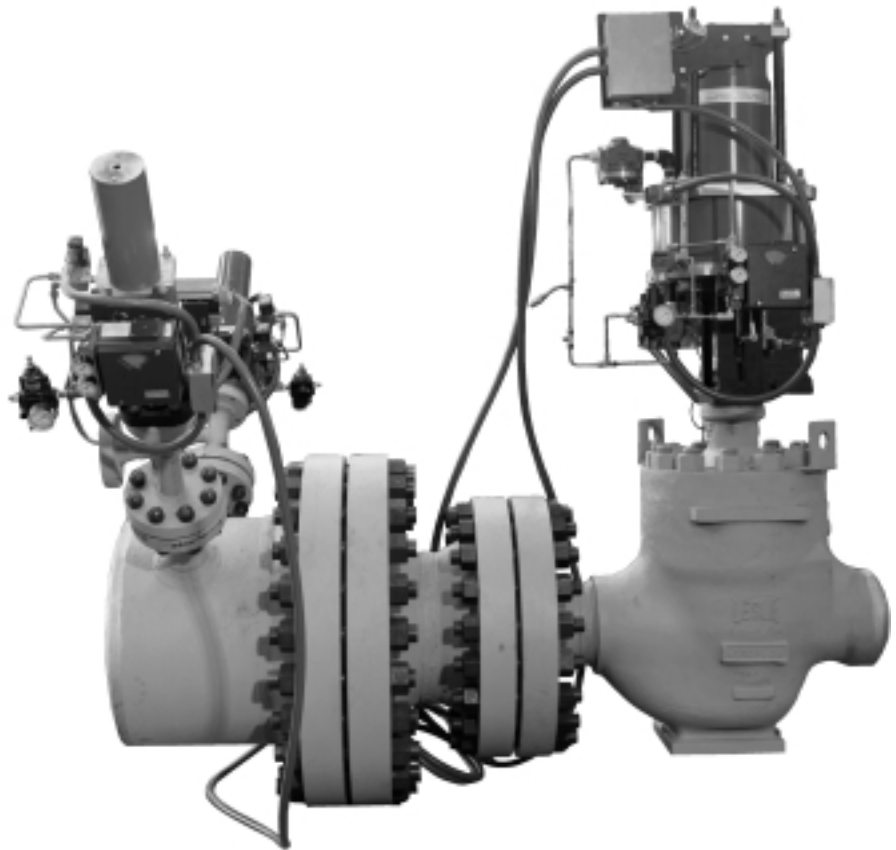
- 1.2.1 Pilot balanced trim to have capability to shutoff to ANSI Class VI or Zero (cc/min) Leakage utilizing metal-to-metal seats.
- 1.2.2 Valve plug should be designed with a three stage labyrinth style plug tip.
- 1.2.3 Trim design should allow for reduction down to a 0.2 factor of full Cv, without changing the original plug or seat ring
- 1.2.4 Cage design should allow for modification of flow window for a desired flow characteristic without changing plug assembly.
- 1.2.5 Unbalanced designs should allow for reduction of Cv without reducing seat ring diameter.

Actuators

- 2.1.1 Actuator should be designed in a steel or composite construction that is rated for 150 psig working pressure.
- 2.1.2 Air failure spring should be mounted outside air cylinder to minimize residual air volume.
- 2.1.3 Spring cartridge should be mounted so that accessibility for reversing failure modes is easily accomplished.
- 2.1.4 Actuator/spring assembly shall be designed to provide a low center of gravity for vibration and seismic resistance.

Steam Conditioning Station

Leslie offers its unique Aeroflow pressure reducing valve in combination with a state of the art, variable area, mechanically atomized desuperheating system. This combination system meets today's stringent requirements for control and turndown without the temperature stress problems associated with combination units. We offer complete fabricated systems that include either Globe or Angle body PRV designs with noise attenuation plates (as required), customized trim selection and desuperheating equipment.



AEROFLOW ACCESSORIES



Siemens Series 760 Positioners

- Pneumatic: Model 760P
- Electropneumatic: Model 760E
- Optional internal limit switches
- Optional valve position transmission

Other Positioners

- PMV Series 1200, 2000 and P5
- ABB TZID-C
- SMAR FY302 Fieldbus
- Siemens PS2
- Bailey AV Series

Process Controllers

- Electropneumatic: PMC-1
- Pneumatic: PDAP/PRAP

Solenoid Valves

- ASCO 8320G174 is standard
- Other Asco models, Versa, Skinner, as required

Electric Actuators

- Jordan

Electrohydraulic Actuators

- Rexa L & T Series

Limit Switches

- Westlock
- National Acme (NAMCO)
- Honeywell (Micro)
- GO Proximity Switches

Noise Reduction Devices

- Noise Suppressor
- Les-Sonic Silencing Orifice

Air Regulators

- ASG-1
- AFG-2
- Bellofram Type 50
- Control Air Type 300

Other Options

- Handwheels
- Hydraulic Manual Override System
- Limit Stops
- Special Connections
 - Socketweld
 - Butt weld
 - Stub Ends
 - Pipe Reducers
 - Smooth Flange Faces
 - Ring Type Joints

Instruments

- Lockup Valves
- S-Transfer Valve

AEROFLOW Linear Valve Specification Form

LINEAR



LESLIE CONTROLS, INC.
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CONTROL VALVE SPEC SHEET

Project/Job _____
 Unit/Customer _____
 P.O./LCO File # _____
 Item _____
 Contract _____
 MFR Serial# _____

Data Sheet _____ of _____
 Spec _____
 Tag _____
 Dwg _____
 Service _____

Fluid Steam Water Gas _____ Liquid _____ Crit Pres PC _____

Service Conditions

Flow #/hr gpm scfh _____
 Inlet Pressure psig psia _____
 Outlet Pressure psig psia _____
 Temperature °C °F _____
 Max Press/Temperature: _____ / _____
 Density/MW/SG _____ / _____ / _____
 Viscosity _____ CP
 Vapor Pressure psia _____
 Required C_v _____ Noise (dBA) Allowable _____

Max. Flow	Norm. Flow	Min. Flow	Shut-off Pressure

Line

Pipe Size/Sch. In _____ / Sch _____
 Pipe Size/Sch. Out _____ / Sch _____
 Pipe Line Insulation _____ in. _____

Valve Body and Bonnet

Type Globe Angle

*Body Size inches 1 1½ 2 3 4
 6 8 10 12 16

ANSI Class 150 300 600
 900 1500 2500 4500

Design. Press. Temp _____ / _____
 Mfr./Model: Leslie/Aeroflow

Body/Bonnet Mat'l WCB WC9 CF8M
 C12A _____

End Conn Inlet/Outlet

Flg RF Thd RTJ
 SWE BWE/Sch _____
 In BWE/Sch _____ In SWE _____
 Out BWE/Sch _____ Out SWE _____
 In Stubs/Sch _____ Length (in.) _____
 Out Stub/Sch _____ Length (in.) _____
 Exp _____ x _____ In/Sch _____
 Exp _____ x _____ Out/Sch _____

Fig. Face Finish _____ RMS Std. (125-500)
 End Ext/Mat'l. _____

*Flow Over Seat Under Seat

*Type Bonnet Std

*Packing Mat'l LG BTG DTFE
 Live Loaded Other

Trim

*Type UBP MT Mini-P UBC
 BH BL PB T2

Les-Sonic Cage Yes

Les-Cav I II III IV V

C3 Yes

*Characteristic Linear =% OO Custom

Travel Std. Ext Max

*Rated Cv _____ % Max. _____ Cv = _____

Malcomizing (150-600 CL > 700°F, 900-4500 CL > 650°F)

Special ACC NEC Class _____ Group _____ Div. _____

Actuator

*Type DA SR DASR
 Diaph EHA Electr. Other

*Mfr./Model _____ / _____

*Size/Eff Area 6"/28 in² 10"/80 in² 13"/130 in²
 16"/200 in² 20"/300 in² Other

On/Off Modulating

Spring Action/Air Failure Open Closed None
 Spring # _____

*Max. Allowable Press. _____
 *Min. Required Press. _____ psig
 Available Air Supply Press. _____
 Max. _____ Min. _____

*Bench Range _____ psig N/A

Act. Orientation Horiz. Vert. (Std.)

Override Type Hyd. Override None

Air Failure Valve Opens Closes Last

Tubing SST Copper
 3/8" 1/2" _____

Data Tag: Brass SST

Solenoid Asco/8320G174 None
 Other Mfr/Model _____ / _____

Positioner

Input Signal 3-15 psi 4-20 mA _____

*Type Pneu. I/P None

*Mfr./Model _____ / _____

*On Incr. Signal Output Incr. Decr.

Gauges Yes No, By-Pass Yes No

*Cam Charact. Linear =% Sq. Root

Switch

*Type Mech Prox Other

*Mfr./Model _____ / _____

Contacts/Rating SPDT DPDT

Actuation points: Both Open Closed

NEMA Class 1,4, & 13

Airset

*Mfr./Model: Leslie/ AFG-2 ASG-1 None

*Set Press. _____ PSIG _____ / _____

Filter Yes No Gauge Yes No

Range: Max 30psi 60 psi 100psi 150psi

Test *Hydro Pressure

ANSI/FCI Leakage Class III IV V
 VI Zero CC/min

QUESTIONS? CALL LESLIE CONTROLS @ (813) 978-1000 PLEASE FAX COMPLETED FORM TO: (813) 977-0174