

METAL SEATED NELDISC® BUTTERFLY VALVES, SERIES LW, LG, ASME RATED

Neldisc wafer type LW and lug type LG series are metal seated, high performance butterfly valves specially designed to fulfill the requirements of chemical, petrochemical, refining and pulp and paper industries. With a nearly equal percentage characteristics and superior tightness Neldisc butterfly valves operate both in control and shut-off applications. As a result of the unique triple offset geometry of Neldisc, the contact between disc and seat is mechanically induced and does not rely on assistance from differential pressure. Due to a number of special constructions developed from the versatile Neldisc design, these valves offer a powerful tool for standardization and are truly high performance valves.



Features

- Metal seated design
- Bidirectional long term tightness
- Low friction
- Excellent wear resistance
- Extended life cycle
- Lower operational torque

RELIABILITY

Approvals

- TA-Luft, chapter 3.1.8.4, Shell SPE 77/312, ISO 15848
- Firesafe tested to BS6755 and API607, 6th edition.

Increased safety and minimized emissions

- Standard live loaded gland packing meets TA-Luft and Clean Air Act requirements.
- PTFE V-ring or graphite packing for a wide range of applications.
- Double packing available with or without leak off connection.
- Anti-blow out shaft construction standard in all valves, see page 2 exploded view.
- ATEX

PERFORMANCE

Excellent for on-off and control applications

- Bi-directional tight seat DIN 3230 rate 2 / BO, ISO 5208 rate B (air), FCI 70.2 Class VI, API 598
- Unique all-metal seat design assures superior tightness in difficult applications over long time periods.
- Contact between disc and seat is mechanically induced and does not rely on assistance from differential pressure.
- Low cost control valve for low differential pressures.
- Special S-disc option for difficult high noise and cavitation applications.

Abrasion resistant

- Solid metal seat design offered in a variety of materials to suit your application.
- Fully metal seated construction. No resilient parts exposed to the medium.

Materials suitable for a broad range of applications

Standard body materials:

- Carbon steel (WCB)
- Stainless steel (CF8M)

Other materials are available on application.

Face to face dimensions

API 609, category B

Other face to face dimensions on request.

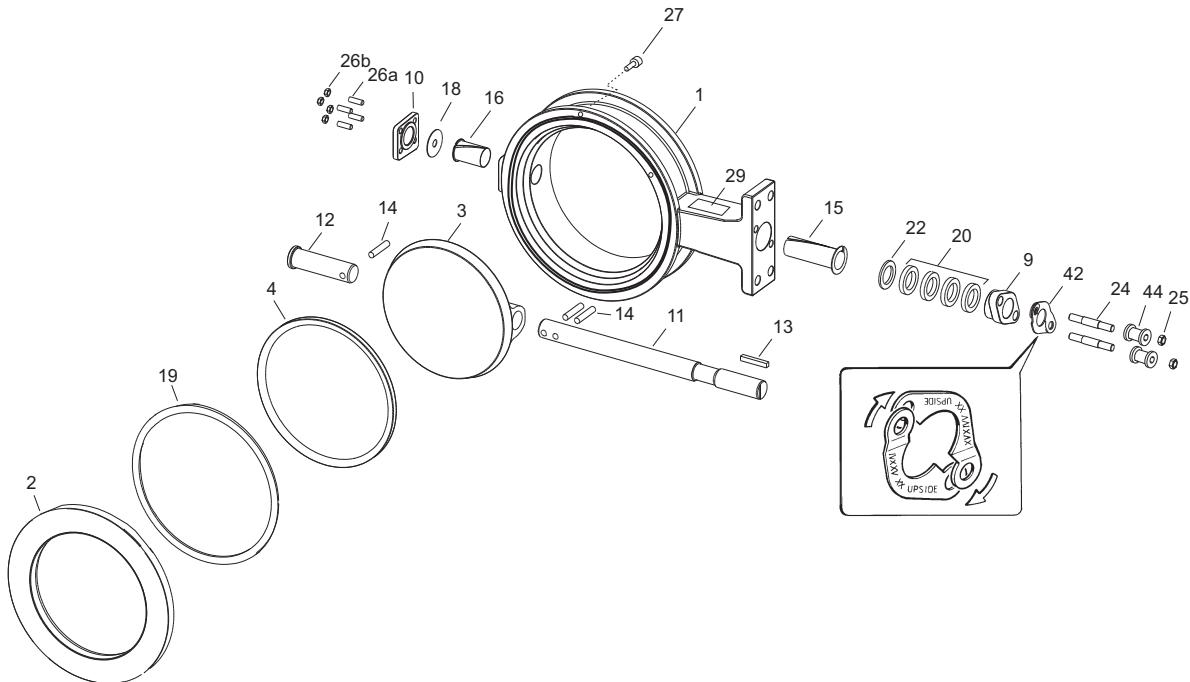
Wide pressure and temperature range

- Differential pressure/temperature ratings in accordance with ASME B16.34 and with EN.
- Appropriate constructions perform equally well from -200°C to +600°C/ -330°F to +1110°F.

Extended body neck

- Extended body neck to accommodate easy pipe line insulation.

EXPLODED VIEW



PARTS LIST

ITEM	PART DESCRIPTION	MATERIAL	
1	BODY wafer type	ASTM A216 gr.WCB	ASTM A351 gr.CF8M
2	CLAMP RING	ASTM A351gr.CF8M	
3	DISC	ASTM A182 gr.F316	
4	SEAT RING (code A)	Hard chrome coated Incoloy 825	
9	GLAND	ASTM A351 gr.CF8M	
10	BLIND FLANGE	ASTM A351 gr.CF8M	
11	DRIVE SHAFT	17-4PH Stainless steel	
12	SHAFT	17-4PH Stainless steel	
13	KEY	329 Stainless steel	
14	PIN	17-4PH Stainless steel	
15	BEARING	AISI 316 + PTFE or cobalt based alloy	
16	BEARING	AISI 316 + PTFE or cobalt based alloy	
18	GASKET	Graphite	
19	BODY SEAL	Graphite	
20	GLAND PACKING	PTFE V-ring or graphite	
22	ANTI-EXTRUSION RING	Graphite + AISI 316	
24	STUD	A4-70 / DIN 267 part 11 Stainless steel	
25	HEXAGON NUT	A4-70 / DIN 267 part 11 Stainless steel	
26a	STUD	Stainless steel	
26b	HEXAGON NUT	Stainless steel	
27	HX SOC. HEAD CAP SCREW	A4-70 / DIN 267 part 11 Stainless steel	
29	IDENTIFICATION PLATE	AISI 304	
42	RETAINING PLATE	Stainless steel	
44	TA-Luft KIT		

TECHNICAL SPECIFICATION

Product type

Full rated, high performance butterfly valve
 Metal seated
 LW:Wafer type
 LG:Lug type

Pressure ratings

Body & trim: ASME 150: LW5C, LG5C
 ASME 300: LW5D, LG5D

Size range

3" - 24"

Temperature range

-200°C...+600°C / -330°F...+1110°F
 (over + 600°C / +1110°F please consult with factory)

Design standards

ASME B16.34, API 609 cat B

Approvals

Emission: TA-Luft, chapter 3.1.8.4, Shell
 SPE 77/312, ISO 15848
 Fire test: BS 6755
 API 607, 4th edition

Valve tightness

Standard seat, code A:
 ANSI Class V
 ISO 5208, rate D
 Optional Leakage:
 API 598
 ANSI Class VI

Options

S-Disc, flow balancing trim, see bulletin 2 S-L1 20.
 High cycle/cycling design
 Cryogenic
 Oxygen construction
 High temperature design
 Steam jacket, heat tracing
 NACE MR0103/MR0175 with suitable const.

Pressure/Temperature ratings

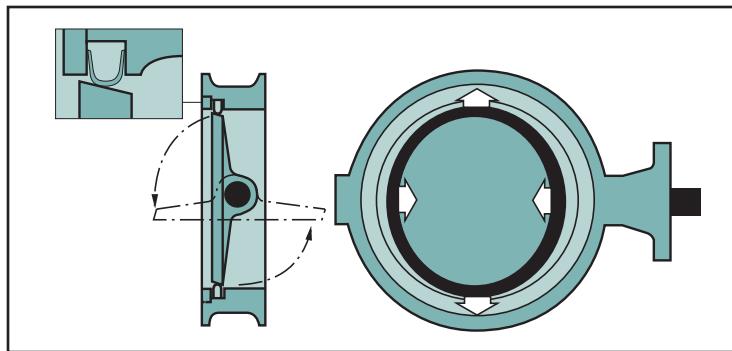
Maximum working pressure ratings of the valve in accordance with ASME B16.34.

Temp. °F	ASME 150		ASME 300	
	Carbon steel* (psi)	AISI 316 Stainless steel (psi)	Carbon steel* (psi)	AISI 316 Stainless steel (psi)
-20 to 100	284.2	275.5	740.9	719.2
122	278.4	266.8	726.4	697.4
212	256.6	234.9	672.8	611.9
300	229.1	214.6	655.4	558.2
392	203.0	198.6	635.1	517.6
482	175.4	175.4	604.6	484.3
572	147.9	147.9	561.1	458.2
662	121.8	121.8	536.5	440.8
707	107.3	107.3	529.2	430.6
752	94.2	94.2	500.2	421.9

*Not recommended for prolonged usage above +425°C / +800°F.

NELDISC TRIPLE OFFSET SEATING PRINCIPLE

The disc of the valve is machined to close tolerances to create an elliptical shape similar to an oblique slice taken from a solid metal cone. When the valve is closed, the elliptical disc at the major axis displaces the seat ring outward, causing the seat ring to contact the disc at the minor axis. When the valve is opened, the contact is released and the seat ring returns to its original circular shape.



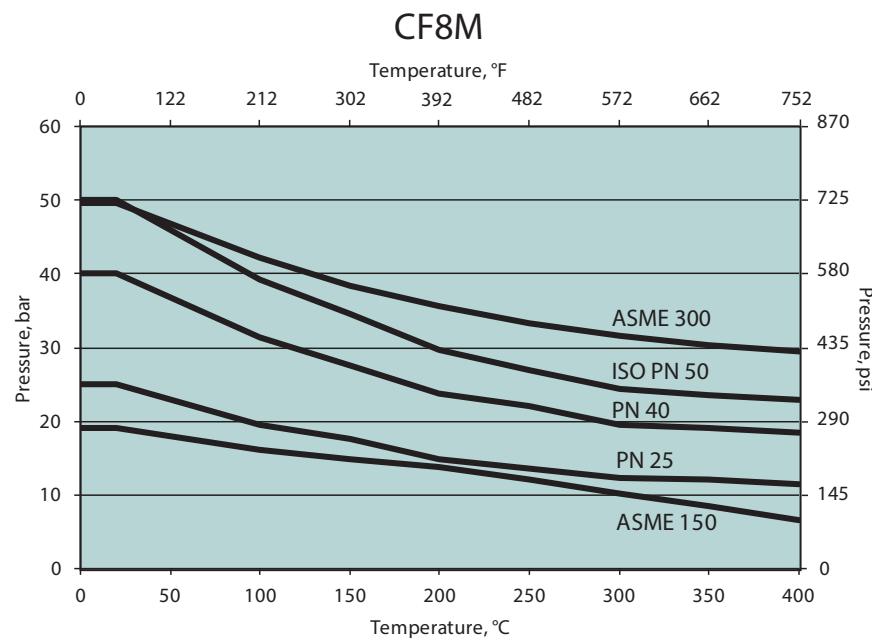
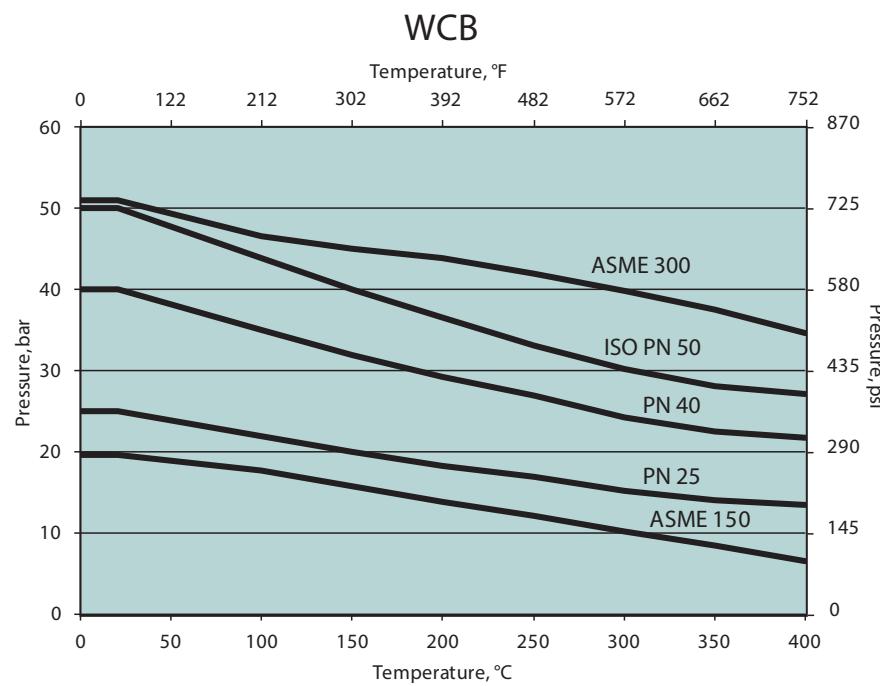
Flow Data

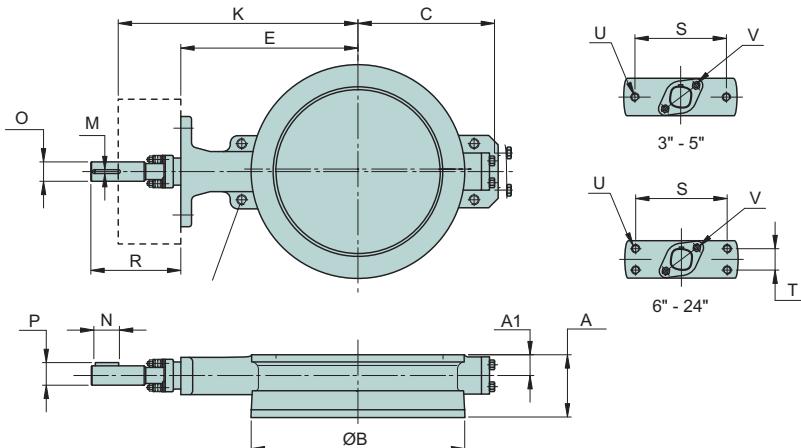
Cv tables of LW and LG valves in pressure classes ASME 150 and 300.

Inch	ASME 150 LW5C, LG5C		ASME 300 LW5D, LG5D	
	Cv 80°	Cv 90°	Cv 80°	Cv 90°
3	235	245	235	245
4	400	450	400	450
5	750	840	750	840
6	1100	1500	970	1240
8	2200	3050	1700	2130
10	3500	4870	2500	3180
12	5200	7300	4000	5090
14	7500	10500	5900	7470
16	9800	13700	5900*	7470*
18	12525	17600	6611*	7620*
20	15637	21900	8763*	10100*
24	22141	31000	10498*	12100*

Valve body ratings

Maximum working pressure ratings of the valve body in accordance with different standards.

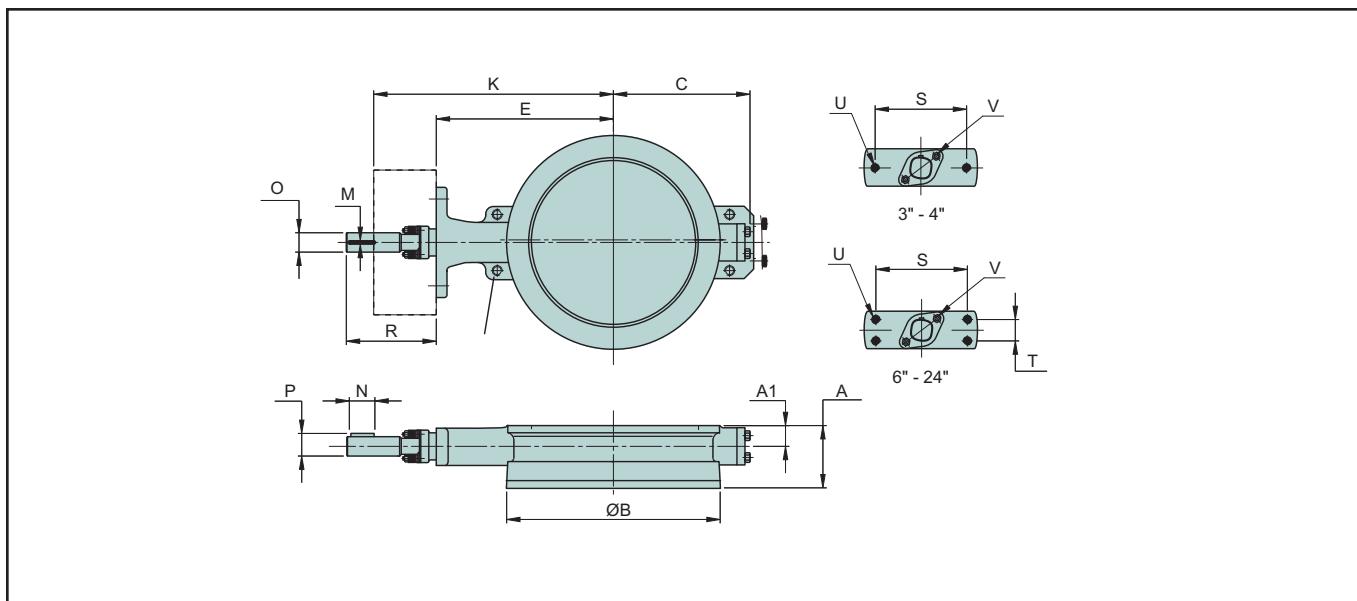


LW5C, 3" - 24", ASME 150**LW5C, DIMENSIONS**

Size	Dimensions, inch							U Thread	V Thread	Dimensions, inch					Weight (lbs)		
	A1	A	S-LW5C A	ØB	C	E	K	S	T	O	R	M	N	P			
3	0.71	1.89	1.93	5.04	3.15	6.61	9.76	2.76	-	M10	M8	0.59	4.13	0.19	0.98	0.67	9
4	0.79	2.13	2.20	6.22	3.94	7.17	10.71	3.54	-	M12	M8	0.79	4.92	0.19	1.38	0.87	13
6	0.91	2.24	2.76	8.35	5.91	8.94	12.48	4.33	1.26	M12	M8	0.79	4.92	0.19	1.38	0.87	33
8	0.94	2.52	2.80	10.55	6.30	10.12	13.66	4.33	1.26	M12	M10	0.98	5.31	0.25	1.81	1.09	44
10	1.14	2.80	2.99	12.60	8.27	11.42	15.75	5.12	1.26	M12	M10	1.18	6.30	0.25	2.01	1.30	66
12	1.26	3.19	3.27	14.88	10.83	12.60	16.93	5.12	1.26	M12	M10	1.38	6.30	0.37	2.28	1.54	99
14	1.42	3.62	3.62	17.24	11.42	13.98	18.70	6.30	1.57	M16	M10	1.57	7.40	0.37	2.68	1.74	154
16	1.73	4.02	4.02	19.09	12.60	15.94	20.67	6.30	1.57	M16	M14	1.77	7.87	0.50	3.15	1.98	209
18	1.85	4.49	4.49	20.94	14.58	14.96	20.47	6.30	2.17	M20	M14	1.97	9.06	0.50	3.54	2.19	286
20	2.20	5.00	5.00	23.03	16.23	17.32	22.83	6.30	2.17	M20	M14	2.17	9.06	0.50	3.54	2.39	385
24	2.83	6.06	6.06	26.97	25.45	19.88	26.97	9.06	3.54	M20	M14	2.76	11.81	0.75	4.69	3.08	671

LW5C, DIMENSIONS

Size	Dimensions, mm							U Thread	V Thread	Dimensions, mm					Weight (kg)		
	A1	A	S-LW5C A	ØB	C	E	K	S	T	O	R	M	N	P			
3	18	48	49	128	80	168	248	70	-	M10	M8	15	105	4.76	25	17	4
4	20	54	56	158	100	182	272	90	-	M12	M8	20	125	4.76	35	22.2	6
6	23	57	70	212	150	227	317	110	32	M12	M8	20	125	4.76	35	22.2	15
8	24	64	71	268	160	257	347	110	32	M12	M10	25	135	6.35	46	27.8	20
10	29	71	76	320	210	290	400	130	32	M12	M10	30	160	6.35	51	32.9	30
12	32	81	83	378	275	320	430	130	32	M12	M10	35	160	9.52	58	39.1	45
14	36	92	92	438	290	355	475	160	40	M16	M10	40	188	9.52	68	44.2	70
16	44	102	102	485	320	405	525	160	40	M16	M14	45	200	12.7	80	50.4	95
18	47	114	114	532	370.3	380	520	160	55	M20	M14	50	230	12.7	90	55.5	130
20	56	127	127	585	412.3	440	580	160	55	M20	M14	55	230	12.7	90	60.6	175
24	72	154	154	685	646.4	505	685	230	90	M20	M14	70	300	19.05	119	78.15	305

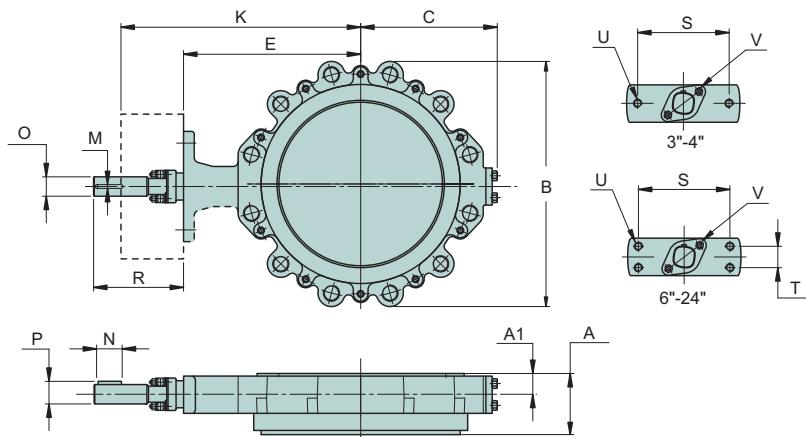
LW5D, 3" - 24", ASME 300**LW5D, DIMENSIONS**

Size	Dimensions, inch								U Thread	V Thread	Dimensions, inch					Weight (lbs)	
	A1	A	S-LW5D A	ØB	C	E	K	S			O	R	M	N	P		
3	0.71	2.52	1.89	5.04	3.15	6.61	9.76	2.76	-	M10	M8	0.59	4.13	0.19	0.98	0.67	9
4	0.79	2.52	2.13	6.22	3.94	7.17	10.71	3.54	-	M12	M8	0.79	4.92	0.19	1.38	0.87	13
6	1.06	2.99	2.32	8.58	5.71	9.13	12.68	4.33	1.26	M12	M10	0.98	5.31	0.25	1.81	1.09	44
8	1.34	3.50	2.87	10.87	8.07	10.79	15.12	5.12	1.26	M12	M10	1.38	6.50	0.37	2.28	1.54	84
10	1.61	4.49	3.27	13.19	10.24	12.60	17.32	6.30	1.57	M16	M14	1.77	7.87	0.50	3.15	1.98	132
12	1.81	4.49	3.62	15.55	11.81	14.17	19.69	6.30	2.17	M20	M14	1.97	9.06	0.50	3.54	2.19	187
14	2.24	5.00	4.61	17.72	12.99	15.75	21.26	6.30	2.17	M20	M14	2.17	9.06	0.50	3.54	2.39	231
16	2.60	5.51	5.24	19.88	14.57	17.32	22.83	6.30	2.17	M20	M14	2.17	9.06	0.50	3.54	2.39	275
18	2.83	5.98	5.87	21.81	16.12	16.34	23.43	9.06	3.54	M24	M16	2.76	11.77	0.75	4.69	3.08	495
20	2.87	5.98	6.26	24.02	17.38	17.32	24.41	9.06	3.54	M24	M16	2.76	11.73	0.75	4.69	3.08	561
24	3.27	7.01	7.13	27.56	20.33	19.69	26.77	9.06	3.54	M24	M16	3.35	12.83	0.88	5.75	3.73	891

LW5D, DIMENSIONS

Size	Dimensions, mm								U Thread	V Thread	Dimensions, mm					Weight (kg)	
	A1	A	S-LW5D A	ØB	C	E	K	S			O	R	M	N	P		
3	18	64	48	128	80	168	248	70	-	M10	M8	15	105	4.76	25	17	4
4	20	64	54	158	100	182	272	90	-	M12	M8	20	125	4.76	35	22.2	6
6	27	76	59	218	145	232	322	110	32	M12	M10	25	135	6.35	46	27.8	20
8	34	89	73	276	205	274	384	130	32	M12	M10	35	165	9.52	58	39.1	38
10	41	114	83	335	260	320	440	160	40	M16	M14	45	200	12.7	80	50.4	60
12	46	114	92	395	300	360	500	160	55	M20	M14	50	230	12.7	90	55.5	85
14	57	127	117	450	330	400	540	160	55	M20	M14	55	230	12.7	90	60.6	105
16	66	140	133	505	370	440	580	160	55	M20	M14	55	230	12.7	90	60.6	125
18	72	152	149	554	409.4	415	595	230	90	M24	M16	70	299	19.05	119	78.25	225
20	73	152	159	610	441.4	440	620	230	90	M24	M16	70	298	19.05	119	78.25	255
24	83	178	181	700	516.4	500	680	230	90	M24	M16	85	326	22.225	146	94.625	405

LG5C, 3" - 24", ASME 150

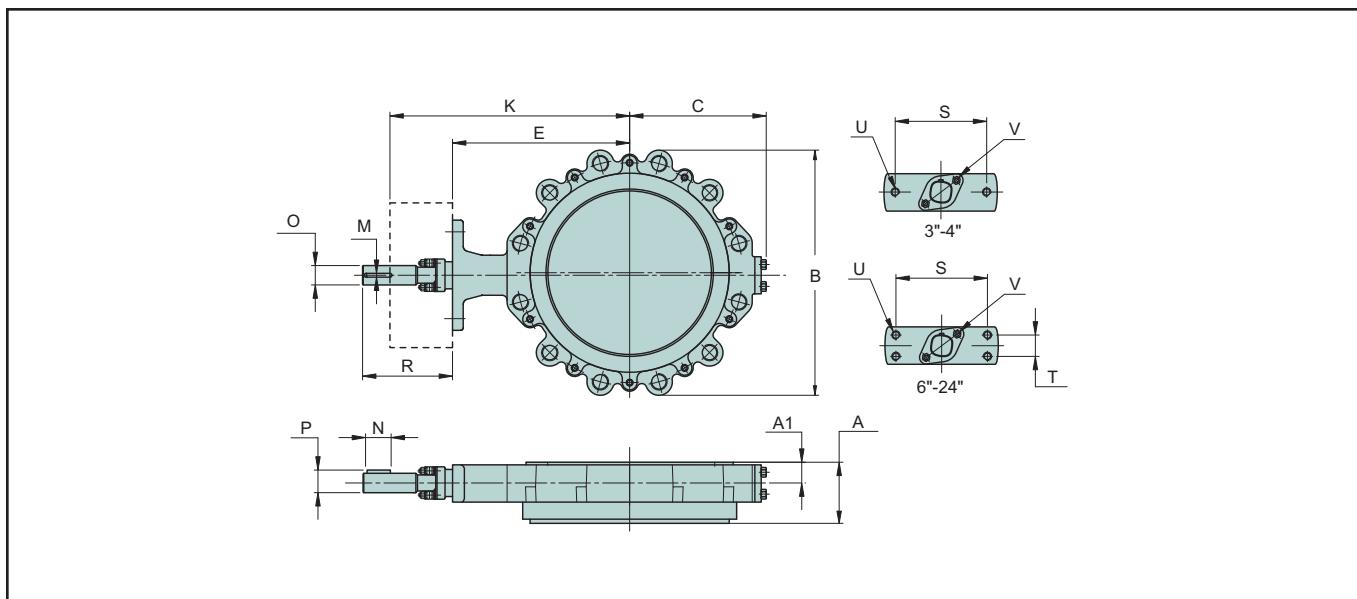


LG5C, DIMENSIONS

Size	Dimensions, inch								U Thread	V Thread	Flange Thread		Dimensions, inch					Weight (lbs)	
	A1	A	S-LG5C A	ØB	C	E	K	S			Thread	Qty	O	R	M	N	P		
	0.67	1.89	1.93	8.07	4.72	6.61	9.76	2.76			M10	M8	5/8	4	0.59	4.13	0.19	0.98	0.67
3	0.67	1.89	1.93	8.07	4.72	6.61	9.76	2.76	-	M10	M8	5/8	4	0.59	4.13	0.19	0.98	0.67	20
4	0.83	2.13	2.20	9.25	5.31	7.17	10.71	3.54	-	M12	M8	5/8	8	0.79	4.92	0.19	1.38	0.87	31
6	0.87	2.24	2.76	11.81	6.30	8.94	12.48	4.33	1.26	M12	M8	3/4	8	0.79	4.92	0.19	1.38	0.87	53
8	0.98	2.52	2.80	14.17	7.28	10.12	13.66	4.33	1.26	M12	M10	3/4	8	0.98	5.31	0.25	1.81	1.09	75
10	1.10	2.80	2.99	16.73	8.66	11.42	15.75	5.12	1.26	M12	M10	7/8	12	1.18	6.30	0.25	2.01	1.30	95
12	1.26	3.19	3.27	19.09	10.83	12.60	16.93	5.12	1.26	M12	M10	7/8	12	1.38	6.30	0.37	2.28	1.54	165
14	1.42	3.62	3.62	21.85	12.20	13.98	18.70	6.30	1.57	M16	M10	1	12	1.57	7.40	0.37	2.68	1.74	209
16	1.61	4.02	4.02	24.02	13.39	15.94	20.67	6.30	1.57	M16	M14	1	16	1.77	7.87	0.50	3.15	1.98	330
18	1.93	4.49	4.49	25.20	14.58	14.96	20.47	6.30	2.17	M20	M14	1 1/8	16	1.97	9.06	0.50	3.54	2.19	451
20	2.20	5.00	5.00	28.74	16.23	17.32	22.83	6.30	2.17	M20	M14	1 1/8	20	2.17	9.06	0.50	3.54	2.39	653
24	2.56	6.06	6.06	32.87	18.28	19.88	26.97	9.06	3.54	M20	M14	1 1/4	20	2.76	11.81	0.75	4.69	3.08	981

LG5C, DIMENSIONS

Size	Dimensions, mm								U Thread	V Thread	Flange Thread		Dimensions, mm					Weight (kg)	
	A1	A	S-LG5C A	ØB	C	E	K	S			Thread	Qty	O	R	M	N	P		
	17	48	49	205	120	168	248	70			M10	M8	5/8	4	15	105	4.76	25	17
3	17	48	49	205	120	168	248	70	-	M10	M8	5/8	4	15	105	4.76	25	17	9
4	21	54	56	235	135	182	272	90	-	M12	M8	5/8	8	20	125	4.76	35	22.2	14
6	22	57	70	300	160	227	317	110	32	M12	M8	3/4	8	20	125	4.76	35	22.2	24
8	25	64	71	360	185	257	347	110	32	M12	M10	3/4	8	25	135	6.35	46	27.8	34
10	28	71	76	425	220	290	400	130	32	M12	M10	7/8	12	30	160	6.35	51	32.9	43
12	32	81	83	485	275	320	430	130	32	M12	M10	7/8	12	35	160	9.52	58	39.1	75
14	36	92	92	555	310	355	475	160	40	M16	M10	1	12	40	188	9.52	68	44.2	95
16	41	102	102	610	340	405	525	160	40	M16	M14	1	16	45	200	12.7	80	50.4	150
18	49	114	114	640	370.3	380	520	160	55	M20	M14	1 1/8	16	50	230	12.7	90	55.5	205
20	56	127	127	730	412.3	440	580	160	55	M20	M14	1 1/8	20	55	230	12.7	90	60.6	297
24	65	154	154	835	464.4	505	685	230	90	M20	M14	1 1/4	20	70	300	19.05	119	78.15	446

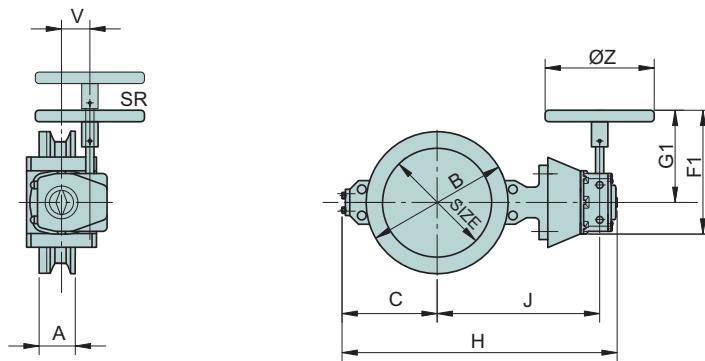
LG5D, 3" - 24", ASME 300**LG5D, DIMENSIONS**

Size	Dimensions, inch								U Thread	V Thread	Flange Thread				Dimensions, inch					Weight (lbs)		
	A1	A	S-LG5D	ØB	C	E	K	S			Thread	Qty	Flange Thread		O	R	M	N	P			
													Thread	Qty								
3	0.67	2.52	1.89	8.07	4.72	6.61	9.76	2.76	-	M10	M8	3/4	8	0.59	4.13	0.19	0.98	0.67	20			
4	0.83	2.52	2.13	9.25	5.31	7.17	10.71	3.54	-	M12	M8	3/4	8	0.79	4.92	0.19	1.38	0.87	31			
6	0.94	2.99	2.32	11.42	6.30	9.13	12.68	4.33	1.26	M12	M10	3/4	12	0.98	5.31	0.25	1.81	1.09	55			
8	1.34	3.50	2.87	14.37	8.07	10.79	15.12	5.12	1.26	M12	M10	7/8	12	1.38	6.50	0.37	2.28	1.54	106			
10	1.61	4.49	3.27	17.13	10.24	12.60	17.32	6.30	1.57	M16	M14	1	16	1.77	7.87	0.50	3.15	1.98	198			
12	1.81	4.49	3.62	19.69	11.81	14.17	19.69	6.30	2.17	M20	M14	1-1/8	16	1.97	9.06	0.50	3.54	2.19	330			
14	2.24	5.00	4.61	22.24	12.99	15.75	21.26	6.30	2.17	M20	M14	1-1/8	20	2.17	9.06	0.50	3.54	2.39	440			
16	2.44	5.51	5.24	25.55	14.57	17.32	22.83	6.30	2.17	M20	M33	1-1/4	20	2.17	9.06	0.50	3.54	2.39	638			
18	2.85	5.98	5.87	27.95	16.12	16.34	23.43	9.06	3.54	M24	M16	1-1/4	24	2.76	11.77	0.75	4.69	3.08	840			
20	2.95	5.98	6.26	30.31	17.38	17.32	24.41	9.06	3.54	M24	M16	1-1/4	24	2.76	11.73	0.75	4.69	3.08	979			
24	3.15	7.01	7.13	36.02	20.33	19.69	26.77	9.06	3.54	M24	M16	1-1/2	24	3.35	12.83	0.88	5.75	3.73	1595			

LG5D, DIMENSIONS

Size	Dimensions, mm								U Thread	V Thread	Flange Thread				Dimensions, mm					Weight (kg)			
	A1	A	S-LG5D	ØB	C	E	K	S			Thread	Qty	Flange Thread		O	R	M	N	P				
													Thread	Qty									
3	17	64	48	205	120	168	248	70	-	M10	M8	3/4	8	15	105	4.76	25	17	9				
4	21	64	54	235	135	182	272	90	-	M12	M8	3/4	8	20	125	4.76	35	22.2	14				
6	24	76	59	290	160	232	322	110	32	M12	M10	3/4	12	25	135	6.35	46	27.8	25				
8	34	89	73	365	205	274	384	130	32	M12	M10	7/8	12	35	165	9.52	58	39.1	48				
10	41	114	83	435	260	320	440	160	40	M16	M14	1	16	45	200	12.7	80	50.4	90				
12	46	114	92	500	300	360	500	160	55	M20	M14	1-1/8	16	50	230	12.7	90	55.5	150				
14	57	127	117	565	330	400	540	160	55	M20	M14	1-1/8	20	55	230	12.7	90	60.6	200				
16	62	140	133	649	370	440	580	160	55	M20	M33	1-1/4	20	55	230	12.7	90	60.6	290				
18	72.5	152	149	710	409.4	415	595	230	90	M24	M16	1-1/4	24	70	299	19.05	119	78.25	382				
20	75	152	159	770	441.4	440	620	230	90	M24	M16	1-1/4	24	70	298	19.05	119	78.25	445				
24	80	178	181	915	516.4	500	680	230	90	M24	M16	1-1/2	24	85	326	22.225	146	94.625	725				

VALVE + MANUAL GEAR OPERATOR, M-SERIES



L_5C + M-SERIES, DIMENSIONS

SIZE	OPERATOR ISO 5211	Dimensions, inch												LW5C-M lbs	LG5C-M lbs			
		L_5C		S-L_5C		LW5C			LG5C			F1	G1	J	V	Z		
		A	A	B	C	H	B	C	H	B	C							
3	M7/Q	1.89	1.93	5.04	3.15	15.35	8.07	4.72	16.93	6.93	5.20	10.79	1.54	5.98	18	28		
4	M7/Q	2.13	2.2	6.22	3.94	17.13	9.25	5.31	18.5	6.93	5.20	11.73	1.54	5.98	22	40		
6	M7/Q	2.24	2.76	8.35	5.91	20.87	11.81	6.3	21.26	6.93	5.20	13.50	1.54	5.98	42	62		
8	M10/Q	2.52	2.8	10.55	6.3	22.83	14.17	7.28	23.82	9.80	7.52	15.04	2.05	12.01	57	88		
10	M12/Q	2.8	2.99	12.6	8.27	27.36	16.73	8.66	27.76	12.56	9.61	17.40	2.64	17.99	92	120		
12	M14/Q	3.19	3.27	14.88	10.83	31.7	19.09	10.83	31.69	16.69	12.80	18.90	3.50	24.02	143	210		
14	M14/Q	3.62	3.62	17.24	11.42	34.05	21.85	12.2	34.84	16.69	12.80	20.67	3.50	24.02	210	265		
16	M16/Q	4.02	4.02	19.09	12.6	38.19	24.02	13.39	38.98	23.66	17.44	22.64	6.06	35.98	310	430		

L_5D + M-SERIES, DIMENSIONS

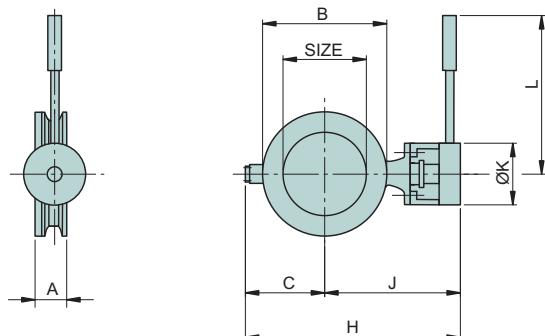
SIZE	OPERATOR ISO 5211	Dimensions, inch												LW5D-M lbs	LG5D-M lbs			
		L_5D		S-L_5D		LW5D			LG5D			F1	G1	J	V	Z		
		A	A	B	C	H	B	C	H	B	C							
3	M7/Q	1.89	1.93	5.04	3.15	15.35	8.07	4.72	16.93	6.93	5.20	10.79	1.54	5.98	18	28		
4	M7/Q	2.13	2.2	6.22	3.94	17.13	9.25	5.31	18.5	6.93	5.20	11.73	1.54	5.98	22	40		
6	M10/Q	2.32	2.99	8.58	5.71	21.26	11.42	6.3	21.85	9.80	7.52	14.06	2.05	12.01	57	66		
8	M14/Q	2.87	3.43	10.94	8.07	26.38	14.37	8.07	26.38	16.69	12.80	17.09	3.50	24.02	123	145		
10	M14/Q	3.27	4.49	13.19	10.24	31.5	17.13	10.24	31.5	16.69	12.80	19.29	3.50	24.02	165	230		
12	M16/Q	3.62	4.49	15.55	11.81	35.83	19.69	11.81	35.83	23.66	17.44	21.65	6.06	35.98	255	395		
14	M16/Q	4.61	5	17.72	12.99	38.58	22.24	12.99	38.58	23.66	17.44	23.23	6.06	35.98	300	495		
16	M16/Q	5.24	5.51	19.88	14.57	41.73	25.59	14.57	41.73	23.66	17.44	24.80	6.06	35.98	340	680		

L_5C + M-SERIES, DIMENSIONS

SIZE	OPERATOR ISO 5211	Dimensions, mm												LW5C-M kg	LG5C-M kg			
		L_5C		S-L_5C		LW5C			LG5C			F1	G1	J	V	Z		
		A	A	B	C	H	B	C	H	B	C							
3	M7/Q	48	49	128	80	390	205	120	430	176	132	274	39	152	8	13		
4	M7/Q	54	56	158	100	390	235	135	470	176	132	298	39	152	10	18		
6	M7/Q	57	70	212	150	530	300	160	540	176	132	343	39	152	19	28		
8	M10/Q	64	71	268	160	580	360	185	605	249	191	382	52	305	26	40		
10	M12/Q	71	76	320	210	695	425	220	705	319	244	442	67	457	42	55		
12	M14/Q	81	83	378	275	805	485	275	805	424	325	480	89	610	65	95		
14	M14/Q	92	92	438	275	865	555	310	885	424	325	525	89	610	95	120		
16	M16/Q	102	102	485	320	970	610	340	990	601	443	575	154	914	140	195		

L_5D + M-SERIES, DIMENSIONS

SIZE	OPERATOR ISO 5211	Dimensions, mm												LW5D-M kg	LG5D-M kg			
		L_5D		S-L_5D		LW5D			LG5D			F1	G1	J	V	Z		
		A	A	B	C	H	B	C	H	B	C							
3	M7/Q	48	49	128	80	390	205	120	430	176	132	274	39	152	8	13		
4	M7/Q	54	56	158	100	435	235	135	470	176	132	298	39	152	10	18		
6	M10/Q	59	76	218	145	540	290	160	555	249	191	357	52	305	26	30		
8	M14/Q	73	87	278	205	670	365	205	670	424	325	434	89	610	56	65		
10	M14/Q	83	114	335	260	800	435	260	800	424	325	490	89	610	75	105		
12	M16/Q	92	114	395	300	910	500	300	910	601	443	550	154	914	115	180		
14	M16/Q	117	127	450	330	980	565	330	980	601	443	590	154	914	135	225		
16	M16/Q	133	140	505	370	1060	650	370	1060	601	443	630	154	914	135	310		

VALVE + HAND LEVER, RH

Face to face dimensions according to API 609, category B

Note:

S-disc = flow balancing trim, face to face dimension A (K2)
according to:

EN 558-part 1, table 5 / basic series 25 (DIN3202-K2) for S-L_5C_

LG_ is lug type valve

LW_ is wafer type valve

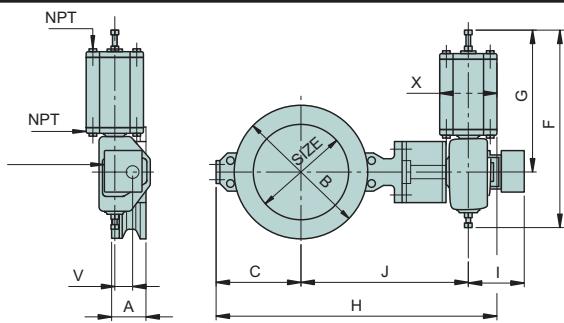
LW5C + RH, DIMENSIONS

SIZE	HAND LEVER	Dimensions, inch												LW5C-RH lbs	LG5C-RH lbs		
		L_5C		S-L_5C		LW5C			LG5C			J	ØK	L			
		A	A	B	C	H	B	C	H								
3	RH 415 MM	1.89	1.93	5.04	3.15	13.98	8.07	4.72	15.55	10.83	3.94	15.75	11	22			
4	RH 420 MM	2.13	2.20	6.22	3.94	16.14	9.25	5.31	17.52	12.20	3.94	15.75	15	33			
6	RH 520 MM	2.24	2.76	8.35	5.91	20.87	11.81	6.30	21.26	14.57	5.12	19.69	37	57			

LW5C + RH, DIMENSIONS

SIZE	HAND LEVER	Dimensions, mm												LW5C-RH kg	LG5C-RH kg		
		L_5C		S-L_5C		LW5C			LG5C			J	ØK	L			
		A	A	B	C	H	B	C	H								
3	RH 415 MM	49	49	128	80	355	205	120	395	275	100	400	5	10			
4	RH 420 MM	52	56	158	100	410	235	135	445	310	100	400	7	15			
6	RH 520 MM	56	70	212	150	530	300	160	540	370	130	500	17	26			

VALVE + PNEUMATIC ACTUATOR, B1C



L_5C + B1C, DIMENSIONS

SIZE	ACTUATOR	Dimensions, inch														NPT	LW5C-B1C lbs	LG5C-B1C lbs
		L_5C		S-L_5C		LW5C			LG5C			F	G	I	J	V	X	
		A	A	B	C	H	B	C	H	F	G	I	J	V	X			
3	B1C9	1.89	1.93	5.04	3.15	17.52	8.07	4.72	19.09	17.72	12.40	8.66	12.09	1.69	4.33	1/4	44	55
4	B1C9	2.13	2.20	6.22	3.94	19.29	9.25	5.31	20.67	17.72	12.40	8.66	13.03	1.69	4.33	1/4	48	66
4	B1C11	2.13	2.20	6.22	3.94	20.08	9.25	5.31	21.46	21.06	14.76	8.86	13.27	2.01	5.31	3/8	62	79
6	B1C9	2.24	2.76	8.35	5.91	23.03	11.81	6.30	23.43	17.72	12.40	8.66	14.80	1.69	4.33	1/4	75	95
6	B1C11	2.24	2.76	8.35	5.91	23.82	11.81	6.30	24.02	21.06	14.76	8.86	15.04	2.01	5.31	3/8	88	108
6	B1C13	2.24	2.76	8.35	5.91	25.20	11.81	6.30	24.21	25.59	25.50	17.52	9.45	15.67	6.89	3/8	121	141
8	B1C11	2.52	2.80	10.55	6.30	25.39	14.17	7.28	17.52	21.06	14.76	8.86	16.22	2.01	5.31	3/8	99	130
8	B1C13	2.52	2.80	10.55	6.30	26.77	14.17	7.28	27.76	25.59	17.52	9.45	16.85	2.56	6.89	3/8	132	163
8	B1C17	2.52	2.80	10.55	6.30	28.15	14.17	7.28	29.13	30.91	21.85	10.04	17.44	3.07	8.46	1/2	183	213
10	B1C13	2.80	2.99	12.60	8.27	30.91	16.73	8.66	31.30	25.59	17.52	9.45	18.94	2.56	6.89	3/8	156	185
10	B1C17	2.80	2.99	12.60	8.27	32.28	16.73	8.66	32.68	30.91	21.85	10.04	19.53	3.07	8.46	1/2	207	235
12	B1C13	3.19	3.27	14.88	10.83	34.65	19.09	10.83	34.65	25.59	17.52	9.45	20.12	2.56	6.89	3/8	189	255
12	B1C17	3.19	3.27	14.88	10.83	36.02	19.09	10.83	36.02	30.91	21.85	10.04	20.71	3.07	8.46	1/2	242	308
12	B1C20	3.19	3.27	14.88	10.83	36.81	19.09	10.83	36.81	34.65	23.23	10.63	21.46	3.82	8.46	1/2	282	348
14	B1C17	3.62	3.62	17.24	11.42	38.39	21.85	12.20	39.17	30.91	21.85	10.04	22.48	3.07	8.46	1/2	297	352
14	B1C20	3.62	3.62	17.24	11.42	39.17	21.85	12.20	39.96	34.65	23.23	10.63	23.23	3.82	8.46	1/2	319	396
14	B1C25	3.62	3.62	17.24	11.42	40.94	21.85	12.20	41.73	42.32	28.54	12.20	24.13	4.76	10.43	1/2	473	528
16	B1C20	4.02	4.02	19.09	12.60	42.32	24.02	13.39	43.11	34.65	23.23	10.63	25.20	3.82	8.46	1/2	396	517
16	B1C25	4.02	4.02	19.09	12.60	44.09	24.02	13.39	44.88	42.32	28.54	12.20	26.10	4.76	10.43	1/2	528	649
18	B1C25	4.49	4.49	20.94	14.58	45.70	25.20	14.58	45.70	42.32	28.54	12.20	25.91	4.76	10.43	1/2	574	739
18	B1C32	4.49	4.49	20.94	14.58	49.72	25.20	14.58	49.72	53.94	36.22	13.78	27.36	6.02	15.55	3/4	849	1014
20	B1C25	5.00	5.00	23.03	16.23	49.72	28.74	16.23	49.72	42.32	28.54	12.20	28.27	4.76	10.43	1/2	673	942
20	B1C32	5.00	5.00	23.03	16.23	53.73	28.74	16.23	53.73	53.94	36.22	13.78	29.72	6.02	15.55	3/4	948	1217
24	B1C32	6.06	6.06	26.97	18.28	59.92	32.87	18.28	59.92	53.94	36.22	13.78	33.86	6.02	15.55	3/4	1234	1544
24	B1C40	6.06	6.06	26.97	18.28	64.05	32.87	18.28	64.05	65.75	45.28	14.57	35.83	7.64	19.88	3/4	1652	1962

L_5D + B1C, DIMENSIONS

SIZE	ACTUATOR	Dimensions, inch														NPT	LW5D-B1C lbs	LG5D-B1C lbs
		L_5D		S-L_5D		LW5D			LG5D			F	G	I	J	V	X	
		A	A	B	C	H	B	C	H	F	G	I	J	V	X			
3	B1C9	1.89	2.52	5.04	3.15	17.52	8.07	4.72	19.09	17.72	12.40	8.66	12.09	1.69	4.33	1/4	46	57
4	B1C9	2.13	2.52	6.22	3.94	19.29	9.25	5.31	20.67	17.72	12.40	8.66	13.03	1.69	4.33	1/4	51	68
4	B1C11	2.13	2.52	6.22	3.94	20.08	9.25	5.31	21.46	21.06	14.76	8.86	13.27	2.01	5.31	3/8	64	81
6	B1C9	2.32	2.99	8.58	5.71	23.82	11.42	6.30	24.41	17.72	12.40	8.66	15.24	1.69	4.33	1/4	79	90
6	B1C11	2.32	2.99	8.58	5.71	25.20	11.42	6.30	25.79	21.06	14.76	8.66	15.87	2.01	5.31	3/8	92	103
6	B1C13	2.32	2.99	8.58	5.71	26.57	11.42	6.30	27.17	25.20	15.72	9.45	16.46	2.56	6.89	3/8	128	139
8	B1C11	2.87	3.50	10.94	8.07	29.33	14.37	8.07	29.33	21.06	14.76	8.86	17.52	2.01	5.31	3/8	132	154
8	B1C13	2.87	3.50	10.94	8.07	30.71	14.37	8.07	30.71	25.20	17.52	9.45	18.11	2.56	6.89	3/8	167	189
8	B1C17	2.87	3.50	10.94	8.07	31.30	14.37	8.07	31.30	30.91	21.85	10.04	18.86	3.07	8.46	1/2	220	242
10	B1C17	3.27	4.49	13.19	10.24	35.83	17.13	10.24	35.83	30.91	21.85	10.04	21.10	3.07	8.46	1/2	264	330
10	B1C20	3.27	4.49	13.19	10.24	36.61	17.13	10.24	36.61	34.65	23.23	10.63	21.85	3.82	8.46	1/2	308	374
10	B1C25	3.27	4.49	13.19	10.24	38.39	17.13	10.24	38.39	42.32	28.54	12.20	22.76	4.76	10.43	1/2	440	506
12	B1C20	3.62	4.49	15.55	11.81	40.55	19.69	11.81	40.55	34.65	23.23	10.63	24.21	3.82	8.46	1/2	506	563
12	B1C25	3.62	4.49	15.55	11.81	42.32	19.69	11.81	42.32	42.32	28.54	12.20	25.12	4.76	10.43	1/2	495	638
14	B1C20	4.61	5.00	17.72	12.99	43.31	22.24	12.99	43.31	34.65	23.23	10.63	25.12	3.82	8.46	1/2	407	616
14	B1C25	4.61	5.00	17.72	12.99	45.08	22.24	12.99	45.08	42.32	28.54	12.20	26.69	4.76	10.43	1/2	539	748
16	B1C20	5.24	5.51	19.88	14.57	46.46	25.55	14.57	46.46	34.65	23.23	10.63	27.36	3.82	8.46	1/2	451	814
18	B1C32	5.87	5.98	21.81	16.12	54.21	27.95	16.12	54.21	53.94	36.22	13.78	30.31	6.02	15.55	3/4	1058	1404
18	B1C40	5.87	5.98	21.81	16.12	58.34	27.95	16.12	58.34	65.75	45.28	14.57	32.28	7.64	19.88	3/4	1476	1822
20	B1C32	6.26	5.98	24.02	17.38	56.45	30.31	17.38	56.45	53.94	36.22	13.78	31.30	6.02	15.55	3/4	1124	1542
20	B1C40	6.26	5.98	24.02	17.38	60.59	30.31	17.38	60.59	65.75	45.28	14.57	33.27	7.64	19.88	3/4	1542	1960
24	B1C32	7.13	7.01	27.56	20.33	65.90	36.02	20.33	65.90	65.75	45.28	14.57	35.63	7.64	19.88	3/4	1454	2158
24	B1C40	7.13	7.01	27.56	20.33	69.64	36.02	20.33	69.64	81.10	54.72	16.34	37.60	9.53	24.02	1	2717	3421

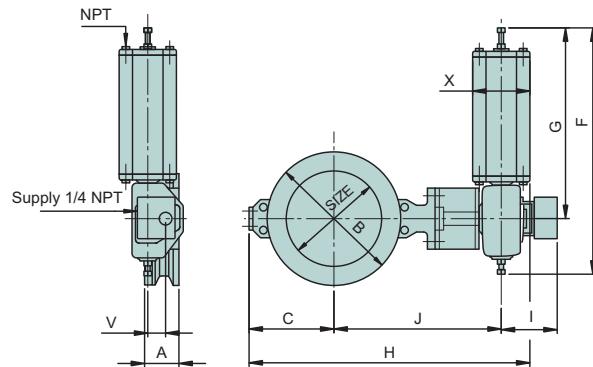
L_5C + B1C, DIMENSIONS

SIZE	ACTUATOR	Dimensions, mm														NPT	LW5C-B1C kg	LG5C-B1C kg
		L_5C		S-L_5C			LW5C			LG5C			F	G	I	J	V	X
		A	A	B	C	H	B	C	H	B	C	H	F	G	I	J	V	X
3	B1C9	48	49	128	80	445	205	120	485	450	315	220	307	43	110	1/4	20	25
4	B1C9	54	56	158	100	490	235	135	525	450	315	220	331	43	110	1/4	22	30
4	B1C11	54	56	158	100	510	235	135	545	535	375	225	337	51	135	3/8	28	36
6	B1C9	57	70	212	150	585	300	160	595	450	315	220	376	43	110	1/4	34	43
6	B1C11	57	70	212	150	605	300	160	615	535	375	225	382	51	135	3/8	40	49
6	B1C13	57	70	212	150	640	300	160	445	650	640	445	240	398	175	3/8	55	64
8	B1C11	64	71	268	160	645	360	185	670	535	375	225	412	51	135	3/8	45	59
8	B1C13	64	71	268	160	680	360	185	705	640	445	240	428	65	175	3/8	60	74
8	B1C17	64	71	268	160	715	360	185	740	785	555	255	443	78	215	1/2	83	97
10	B1C13	71	76	320	210	785	425	220	795	640	445	240	481	65	175	3/8	71	84
10	B1C17	71	76	320	210	820	425	220	830	785	555	255	496	78	215	1/2	94	107
12	B1C13	81	83	378	275	880	485	275	880	640	445	240	511	65	175	3/8	86	116
12	B1C17	81	83	378	275	915	485	275	915	785	555	255	526	78	215	1/2	110	140
12	B1C20	81	83	378	275	935	485	275	935	880	590	270	545	97	215	1/2	128	158
14	B1C17	92	92	438	290	975	555	310	995	785	555	255	571	78	215	1/2	135	160
14	B1C20	92	92	438	290	995	555	310	1015	880	590	270	590	97	215	1/2	145	180
14	B1C25	92	92	438	290	1040	555	310	1060	1075	725	310	613	121	265	1/2	215	240
16	B1C20	102	102	485	320	1075	610	340	1095	880	590	270	640	97	215	1/2	180	235
16	B1C25	102	102	485	320	1120	610	340	1140	1075	725	310	663	121	265	1/2	240	295
18	B1C25	114	114	532	370.3	1160.8	640	370.3	1160.8	1075	725	310	658	121	265	1/2	261	336
18	B1C32	114	114	532	370.3	1262.8	640	370.3	1262.8	1370	920	350	695	153	395	3/4	386	461
20	B1C25	127	127	585	412.3	1262.8	730	412.3	1262.8	1075	725	310	718	121	265	1/2	306	428
20	B1C32	127	127	585	412.3	1364.8	730	412.3	1364.8	1370	920	350	755	153	395	3/4	431	553
24	B1C32	154	154	685	464.4	1521.9	835	464.4	1521.9	1370	920	350	860	153	395	3/4	561	702
24	B1C40	154	154	685	464.4	1626.9	835	464.4	1626.9	1670	1150	370	910	194	505	3/4	751	892

L_5D + B1C, DIMENSIONS

SIZE	ACTUATOR	Dimensions, mm														NPT	LW5D-B1C kg	LG5D-B1C kg
		L_5D		S-L_5D			LW5D			LG5D			F	G	I	J	V	X
		A	A	B	C	H	B	C	H	B	C	H	F	G	I	J	V	X
3	B1C9	48	64	128	80	445	205	120	485	450	315	220	307	43	110	1/4	21	26
4	B1C9	54	64	158	100	490	235	135	525	450	315	220	331	43	110	1/4	23	31
4	B1C11	54	64	158	100	510	235	135	545	535	375	225	337	51	135	3/8	29	37
6	B1C9	59	76	218	145	605	290	160	620	450	315	220	387	43	110	1/4	36	41
6	B1C11	59	76	218	145	640	290	160	655	535	375	225	403	51	135	3/8	42	47
6	B1C13	59	76	218	145	675	290	160	690	640	445	240	418	65	175	3/8	58	63
8	B1C11	73	89	278	205	745	365	205	745	535	375	225	445	51	135	3/8	60	70
8	B1C13	73	89	278	205	780	365	205	780	640	445	240	460	65	175	3/8	76	86
8	B1C17	73	89	278	205	795	365	205	795	785	555	255	479	78	215	1/2	100	110
10	B1C17	83	114	335	260	910	435	260	910	785	555	255	536	78	215	1/2	120	150
10	B1C20	83	114	335	260	930	435	260	930	880	590	270	555	97	215	1/2	140	170
10	B1C25	83	114	335	260	975	435	260	975	1075	725	310	578	121	265	1/2	200	230
12	B1C20	92	114	395	300	1030	500	300	1030	880	590	270	615	97	215	1/2	230	165
12	B1C25	92	114	395	300	1075	500	300	1075	1075	725	310	638	121	265	1/2	225	290
14	B1C20	117	127	450	330	1100	565	330	1100	880	590	270	655	97	215	1/2	185	280
14	B1C25	117	127	450	330	1145	565	330	1145	1075	725	310	678	121	265	1/2	245	340
16	B1C20	133	140	505	370	1180	649	370	1180	880	590	270	695	97	215	1/2	205	370
18	B1C32	149	152	554	409.4	1376.9	710	409.4	1376.9	1370	920	350	770	153	395	3/4	481	638
18	B1C40	149	152	554	409.4	1481.9	710	409.4	1481.9	1670	1150	370	820	194	505	3/4	671	828
20	B1C32	159	152	610	441.4	1433.9	770	441.4	1433.9	1370	920	350	795	153	395	3/4	511	701
20	B1C40	159	152	610	441.4	1538.9	770	441.4	1538.9	1670	1150	370	845	194	505	3/4	701	891
24	B1C32	181	178	700	516.4	1568.9	915	516.4	1568.9	1370	920	350	855	153	395	3/4	661	981
24	B1C40	181	178	700	516.4	1673.9	915	516.4	1673.9	1670	1150	370	905	194	505	3/4	851	1171
24	B1C50	181	178	700	516.4	1776.4	915	516.4	1776.4	2060	1390	415	955	242	610	1	1235	1555

VALVE + PNEUMATIC SPRING RETURN ACTUATOR, B1J



L_5C + B1J, DIMENSIONS

SIZE	ACTUATOR	Dimensions, inch													NPT	LW5C+B1J lbs	LG5C+B1J lbs	
		L_5C			LW5C			LG5C			F	G	I	J	V			
		A	A	B	C	H	B	C	H									
3	B1J8	1.89	1.93	5.04	3.15	18.11	8.07	4.72	19.69	21.85	16.54	8.66	12.09	1.69	5.31	3/8	59	70
4	B1J8	2.13	2.20	6.22	3.94	19.88	9.25	5.31	21.26	21.85	16.54	8.66	13.03	1.69	5.31	3/8	64	81
4	B1J10	2.13	2.20	6.22	3.94	20.87	9.25	5.31	22.24	25.20	18.90	8.86	13.27	2.01	6.89	3/8	92	110
6	B1J8	2.24	2.76	8.35	5.91	23.62	11.81	6.30	24.02	21.85	16.54	8.66	14.80	1.69	5.31	3/8	90	110
6	B1J10	2.24	2.76	8.35	5.91	24.61	11.81	6.30	25.00	25.20	18.90	8.86	15.04	2.01	6.89	3/8	119	139
6	B1J12	2.24	2.76	8.35	5.91	25.98	11.81	6.30	26.38	32.09	24.41	9.45	15.67	2.56	8.46	1/2	178	198
8	B1J10	2.52	2.80	10.55	6.30	26.18	14.17	7.28	27.17	25.20	18.90	8.86	16.22	2.01	6.89	3/8	130	161
8	B1J12	2.52	2.80	10.55	6.30	27.56	14.17	7.28	28.54	32.09	24.41	9.45	16.85	2.56	8.46	1/2	189	220
8	B1J16	2.52	2.80	10.55	6.30	29.13	14.17	7.28	30.12	38.98	29.92	10.04	17.44	3.07	10.43	1/2	315	284
10	B1J12	2.80	2.99	12.60	8.27	31.69	16.73	8.66	32.09	32.09	24.41	9.45	18.94	2.56	8.46	1/2	213	242
10	B1J16	2.80	2.99	12.60	8.27	33.26	16.73	8.66	33.66	38.98	29.92	10.04	19.53	3.07	10.43	1/2	308	337
12	B1J12	3.19	3.27	14.88	10.83	35.43	19.09	10.83	35.43	32.09	24.41	9.45	20.12	2.56	8.46	1/2	246	312
12	B1J16	3.19	3.27	14.88	10.83	37.01	19.09	10.83	37.01	38.98	29.92	10.04	20.71	3.07	10.43	1/2	343	409
12	B1J20	3.19	3.27	14.88	10.83	40.35	19.09	10.83	40.35	48.43	37.01	10.63	21.46	3.82	15.55	3/4	506	572
14	B1J16	3.62	3.62	17.24	11.42	39.37	21.85	12.20	40.16	38.98	29.92	10.04	22.48	3.07	10.43	1/2	396	451
14	B1J20	3.62	3.62	17.24	11.42	42.72	21.85	12.20	43.50	48.43	37.01	10.63	23.23	3.82	15.55	3/4	539	616
14	B1J25	3.62	3.62	17.24	11.42	45.67	21.85	12.20	46.46	58.66	44.88	12.20	24.13	4.76	19.88	3/4	957	1012
16	B1J20	4.02	4.02	19.09	12.60	45.87	24.02	13.39	46.65	48.43	37.01	10.63	25.20	3.82	15.55	3/4	616	737
16	B1J25	4.02	4.02	19.09	12.60	48.82	24.02	13.39	49.61	58.66	44.88	12.20	26.10	4.76	19.88	3/4	1012	1133
18	B1J25	4.49	4.49	20.94	14.58	50.43	25.20	14.58	50.43	58.66	44.88	12.20	25.91	4.76	19.88	3/4	1056	1221
20	B1J32	5.00	5.00	23.03	16.23	56.59	28.74	16.23	56.59	74.21	56.50	13.78	29.72	6.02	21.26	1	1861	2130
24	B1J32	6.06	6.06	26.97	18.28	52.14	32.87	18.28	52.14	74.21	56.50	13.78	33.86	6.02	21.26	1	2147	2457

L_5D + B1J, DIMENSIONS

SIZE	ACTUATOR	Dimensions, inch													NPT	LW5D+B1J lbs	LG5D+B1J lbs	
		L_5D			LW5D			LG5D			F	G	I	J	V			
		A	A	B	C	H	B	C	H									
3	B1J8	1.89	2.52	5.04	3.15	18.11	8.07	4.72	19.69	21.85	16.54	8.66	12.09	1.69	5.31	3/8	62	73
4	B1J8	2.13	2.52	6.22	3.94	19.88	9.25	5.31	21.26	21.85	16.54	8.66	13.03	1.69	5.31	3/8	66	84
4	B1J10	2.13	2.52	6.22	3.94	20.87	9.25	5.31	22.24	25.20	18.90	8.86	13.27	2.01	6.89	3/8	95	90
6	B1J10	2.32	2.99	8.58	5.71	24.61	11.42	6.30	25.20	25.20	18.90	8.86	15.24	2.01	6.89	3/8	123	134
6	B1J12	2.32	2.99	8.58	5.71	25.98	11.42	6.30	38.39	32.09	24.41	9.45	15.87	2.56	8.46	1/2	183	194
6	B1J16	2.32	2.99	8.58	5.71	27.56	11.42	6.30	28.15	38.98	29.92	10.04	16.46	3.07	10.43	1/2	282	293
8	B1J12	2.87	3.50	10.94	8.07	30.12	14.37	8.07	30.12	32.09	24.41	9.45	17.52	2.56	8.46	1/2	220	242
8	B1J16	2.87	3.50	10.94	8.07	31.69	14.37	8.07	31.69	38.98	29.92	10.04	18.11	3.07	10.43	1/2	319	341
8	B1J20	2.87	3.50	10.94	8.07	35.04	14.37	8.07	35.04	48.43	37.01	10.63	18.86	3.82	15.55	3/4	484	506
10	B1J16	3.27	4.49	13.19	10.24	36.81	17.13	10.24	36.81	38.98	29.92	10.04	21.10	3.07	10.43	1/2	363	429
10	B1J20	3.27	4.49	13.19	10.24	40.16	17.13	10.24	40.16	48.43	37.01	10.63	21.85	3.82	15.55	3/4	528	594
10	B1J25	3.27	4.49	13.19	10.24	43.11	17.13	10.24	43.11	58.66	44.88	12.20	22.76	4.76	19.88	3/4	968	1034
12	B1J20	3.62	4.49	15.55	11.81	44.09	19.69	11.81	44.09	48.43	37.01	10.63	24.21	3.82	15.55	3/4	660	726
12	B1J25	3.62	4.49	15.55	11.81	47.05	19.69	11.81	47.05	58.66	44.88	12.20	25.12	4.76	19.88	3/4	979	1122
14	B1J20	4.61	5.00	17.72	12.99	46.85	22.24	12.99	46.85	48.43	37.01	10.63	25.79	3.82	15.55	3/4	627	836
14	B1J25	4.61	5.00	17.72	12.99	49.80	22.24	12.99	49.80	58.66	44.88	12.20	26.69	4.76	19.88	3/4	1023	1232
16	B1J20	5.24	5.51	19.88	14.57	52.76	25.55	14.57	52.76	58.66	44.88	12.20	28.27	4.76	19.88	3/4	671	1034
16	B1J25	5.24	5.51	19.88	14.57	52.76	25.55	14.57	52.76	58.66	44.88	12.20	28.27	4.76	19.88	3/4	1067	1430
18	B1J32	5.87	5.98	21.81	16.12	57.06	27.95	16.12	57.06	74.21	56.50	13.78	30.31	6.02	21.26	1	1971	2317
20	B1J32	6.26	5.98	24.02	17.38	59.31	30.31	17.38	59.31	74.21	56.50	13.78	31.30	6.02	21.26	1	2037	2455
24	B1J32	7.13	7.01	27.56	20.33	66.59	36.02	20.33	66.59	112.99	56.50	-	34.25	6.02	24.02	1	4521	5225

L_5C + B1J, DIMENSIONS

SIZE	ACTUATOR	Dimensions, mm																		
		L_5C		S-L_5C		LW5C			LG5C			F	G	I	J	V	X	NPT	LW5C+B1J kg	LG5C+B1J kg
		A	A	B	C	H	B	C	H											
3	B1J8	48	49	128	80	460	205	120	500	555	420	220	307	43	135	3/8	27	32		
4	B1J8	54	56	158	100	505	235	135	540	555	420	220	331	43	135	3/8	29	37		
4	B1J10	54	56	158	100	530	235	135	565	640	480	225	337	51	175	3/8	42	50		
6	B1J8	57	70	212	150	600	300	160	610	555	420	220	376	43	135	3/8	41	50		
6	B1J10	57	70	212	150	625	300	160	635	640	480	225	382	51	175	3/8	54	63		
6	B1J12	57	70	212	150	660	300	160	670	815	620	240	398	65	215	1/2	81	90		
8	B1J10	64	71	268	160	665	360	185	690	640	480	225	412	51	175	3/8	59	73		
8	B1J12	64	71	268	160	700	360	185	725	815	620	240	428	65	215	1/2	86	100		
8	B1J16	64	71	268	160	740	360	185	765	990	760	255	443	78	265	1/2	143	129		
10	B1J12	71	76	320	210	805	425	220	815	815	620	240	481	65	215	1/2	97	110		
10	B1J16	71	76	320	210	845	425	220	855	990	760	255	496	78	265	1/2	140	153		
12	B1J12	81	83	378	275	900	485	275	900	815	620	240	511	65	215	1/2	112	142		
12	B1J16	81	83	378	275	940	485	275	940	990	760	255	526	78	265	1/2	156	186		
12	B1J20	81	83	378	275	1025	485	275	1025	1230	940	270	545	97	395	3/4	230	260		
14	B1J16	92	92	438	290	1000	555	310	1020	990	760	255	571	78	265	1/2	180	205		
14	B1J20	92	92	438	290	1085	555	310	1105	1230	940	270	590	97	395	3/4	245	280		
14	B1J25	92	92	438	290	1160	555	310	1180	1490	1140	310	613	121	505	3/4	435	460		
16	B1J20	102	102	485	320	1165	610	340	1185	1230	940	270	640	97	395	3/4	280	335		
16	B1J25	102	102	485	320	1240	610	340	1260	1490	1140	310	663	121	505	3/4	460	515		
18	B1J25	114	114	532	370.3	1280.8	640	370.3	1280.8	1490	1140	310	658	121	505	3/4	480	555		
20	B1J32	127	127	585	412.3	1437.3	730	412.3	1437.3	1885	1435	350	755	153	540	1	846	968		
24	B1J32	154	154	685	464.4	1324.4	835	464.4	1324.4	1885	1435	350	860	153	540	1	976	1117		

L_5D + B1J, DIMENSIONS

SIZE	ACTUATOR	Dimensions, mm																		
		L_5D		S-L_5D		LW5D			LG5D			F	G	I	J	V	X	NPT	LW5D+B1J kg	LG5D+B1J kg
		A	A	B	C	H	B	C	H											
3	B1J8	48	64	128	80	460	205	120	500	555	420	220	307	43	135	3/8	28	33		
4	B1J8	54	64	158	100	505	235	135	540	555	420	220	331	43	135	3/8	30	38		
4	B1J10	54	64	158	100	530	235	135	565	640	480	225	337	51	175	3/8	43	41		
6	B1J10	59	76	218	145	625	290	160	640	640	480	225	387	51	175	3/8	56	61		
6	B1J12	59	76	218	145	660	290	160	975	815	620	240	403	65	215	1/2	83	88		
6	B1J16	59	76	218	145	700	290	160	715	990	760	255	418	78	265	1/2	128	133		
8	B1J12	73	89	278	205	765	365	205	765	815	620	240	445	65	215	1/2	100	110		
8	B1J16	73	89	278	205	805	365	205	805	990	760	255	460	78	265	1/2	145	155		
8	B1J20	73	89	278	205	890	365	205	890	1230	940	270	479	97	395	3/4	220	230		
10	B1J16	83	114	335	260	935	435	260	935	990	760	255	536	78	265	1/2	165	195		
10	B1J20	83	114	335	260	1020	435	260	1020	1230	940	270	555	97	395	3/4	240	270		
10	B1J25	83	114	335	260	1095	435	260	1095	1490	1140	310	578	121	505	3/4	440	470		
12	B1J20	92	114	395	300	1120	500	300	1120	1230	940	270	615	97	395	3/4	300	330		
12	B1J25	92	114	395	300	1195	500	300	1195	1490	1140	310	638	121	505	3/4	445	510		
14	B1J20	117	127	450	330	1190	565	330	1190	1230	940	270	655	97	395	3/4	285	380		
14	B1J25	117	127	450	330	1265	565	330	1265	1490	1140	310	678	121	505	3/4	465	560		
16	B1J20	133	140	505	370	1265	649	370	1265	1230	940	270	695	97	395	3/4	305	470		
16	B1J25	133	140	505	370	1340	649	370	1340	1490	1140	310	718	121	505	3/4	485	650		
18	B1J32	149	152	554	409.4	1449.4	710	409.4	1449.4	1885	1435	350	770	153	540	1	896	1053		
20	B1J32	159	152	610	441.4	1506.4	770	441.4	1506.4	1885	1435	350	795	153	540	1	926	1116		
24	B1J32	181	178	700	516.4	1691.4	915	516.4	1691.4	2870	1435	-	870	153	610	1	2055	2375		

HOW TO ORDER

Neldisc butterfly valve, Series LW, LG, ASME rated.

1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.	12.	13.
	LW	5	C	B	A	08	P	A	C	A	G	/

1.sign	S-DISC CONSTRUCTION
S-	Flow balancing trim on down stream side of body flow port. Face to face acc. to EN 558 -part 1, table 5

2.sign	PRODUCT SERIES / DESIGN
LW	Wafer type, metal seated butterfly valve.
LG	Lug type, metal seated butterfly valve.

3.sign	FACE TO FACE
5	API 609, category B.

4.sign	PRESSURE RATING
C	ASME 150 fully rated.
D	ASME 300 fully rated.

5.sign	VALVE-ACTUATOR CONNECTION
B	Drive shaft with key way.

6.sign	CONSTRUCTION
A	STANDARD (-80°C...+260°C/-110°F...+500°F) -bearings AISI 316 + PTFE -body and blind flange gaskets graphite -live loaded TA-Luft packing
C	CRYOGENIC (min. -200°C/-330°F) -extended bonnet and drive shaft -otherwise as construction
N	EXTENDED SERVICE (max. + 430°C/+806°F) -shaft bearings surfaces Nitrited -bearings cobalt based alloy -body and blind flange gaskets graphite -live loaded TA-Luft packing
H	HIGH TEMP (max. +600°C/+1110°F) -shaft bearings surfaces Celsit coted -bearings cobalt based alloy -body and blind flange gaskets graphite -live loaded TA-Luft packing
B	BEARING PROTECTION -O-ring bearing protection on upper and lower shaft -O-ring behind seat to prevent the accumulation of process fluid behind the seat.

7.sign	SIZE
	03, 04, 06, 08, 10, 12, 14, 16, 18, 20, 24, 28, 30, 32, 36, 40

MATERIALS					
8.sign	BODY	9.sign	DISC	10.sign	SHAFTS & PINS
A	CF8M	A	F316 or CF8M	C	gr.630 (17-4PH)
P	WCB	B	CF8M / F316+ cobalt based alloy on disc edge	H	Nimonic 80A (Not used with N-construction, can not be nitrated)
				N	XM-19 (Not used with N-construction, can not be nitrated)

11.sign	SEAT
A	Incoloy 825, hard chrome plated.
H	Nimonic 80A, hard chrome plated. (Used with "H" construction)
K	2.4681, UNS R31233 (ULTIMET®).

12.sign	DESIGN OPTIONS
T	TA-Luft PTFE V-ring packing.
G	TA-Luft graphite packing, Fire safe construction

13.sign	FLANGE FACING
-	ASME B16.5 (Ra 3.2-6.3/RMS 125-250), standard, without sign.
Y	Special, to be specified.

Example model codes:
 LW5CBA_AACAT - Standard valve (Tmax = 500°F)
 S-LW5CBA_AACAT - Standard valve with flow balancing trim (Face to face according to EN558-part 1, table 5)
 LW5CBN_AACAG - Extended service valve (Tmax = 800°F)
 LW5CBH_AANHG (Tmax = 1100°F)

Subject to change without prior notice.

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