



TYPE RSL

0 - 300 psig

A CIRCOR CRYOGENICS COMPANY

Rockwood Swendeman®

BRONZE & STAINLESS STEEL SAFETY RELIEF VALVES

Technical Data

Operating Ranges

Temperature0 to +300°F

Set Pressuresto 300 psig

For use with back pressure services, please consult factory.

Materials of Construction

BRONZE

ShellCast Bronze, A.S.M.E. SB-62

BaseForged Brass, Alloy C37700

TrimCopper Alloy

Spring . . .Stainless Steel

17-7 PH A.S.T.M., A-313, Type 631

STAINLESS STEEL

ShellInvestment Cast 316SS, A.S.M.E SA-351

BaseInvestment Cast 316SS, A.S.M.E SA-351

Trim316SS, A.S.M.E. SA-479

Spring . . .Stainless Steel

17-7 PH, A.S.T.M., A-313, Type 631

Tests

Each valve is set, tested and retested at the factory to the customer's specifications.

Sizes

Bronze Inlet - 1/2 inch to 2 inches

Outlet - 3/4 inch to 2-1/2 inch

Stainless Steel Inlet - 1/2 inch to 1 inch

Outlet - 3/4 inch to 1-1/4 inch

Features

- Teflon® seat for improved seat tightness
- Cleaned and packaged for use in O₂ service in compliance with the CGA specification G-4.1

Additional cleaning specifications:

- 4WPI-SW 7003
- GS-38

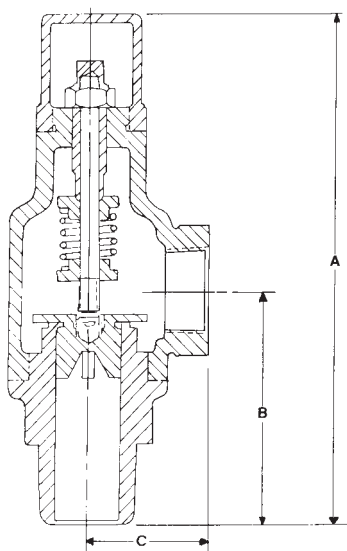
Applications

- Tanks, pumps, pipe lines and other vessels containing non-corrosive liquid, and where large relieving capacities are not required.

Options

- BSP threads available on most sizes
- Lever operation

Dimensions & Characteristics



DIMENSIONS & WEIGHTS

RSL	Inlet (in)	Orifice	Outlet (in)	Max P (psi)	A Overall Height	B Outlet Height	C Outlet Width	Wgt. (lb)
770*ACC	0.5	A	0.5	300				
770*ACD	0.5	A	0.75	300	5.78	2.44	1.34	2
770*ACE	0.5	A	1	300	6.41	2.69	1.69	3
770*ADD	0.75	A	0.75	300	5.905	2.565	1.34	2
770*ADE	0.75	A	1	300	6.535	2.815	1.69	3
770*BDE	0.75	B	1	300	7.402	2.902	1.66	3
770*BEE	1	B	1	300	7.402	2.902	1.66	4
770*CFF	1.25	C	1.25	300	8.65	3.5	2.25	6
770*DGG	1.5	D	1.5	300	9.84	3.56	2.59	9
770*DGH	1.5	D	2	300	9.69	3.69	2.75	9
770*EGH	1.5	E	2	300	9.705	3.705	2.75	10
770*EGH	1.5	E	2	300	9.685	3.685	2.75	10
770*EHJ	2	E	2.5	300	9.685	3.995	2.94	10

DIMENSIONS & WEIGHTS

RSL-S	Inlet (in)	Orifice	Outlet (in)	Max P (psi)	A Overall Height	B Outlet Height	C Outlet Width	Wgt. (lb)
775*ACD	0.5	A	0.75	300	5.78	2.44	1.34	2
775*ADD	0.75	A	0.75	300	5.905	2.565	1.34	2
775*BEF	1	B	1.25	300	7.492	2.992	1.88	5

Type RSL

WATER CAPACITY TABLE

Rate of discharge in gallons of water per minute at set pressure plus 25% accumulation or overpressure.

Inlet Sizes Inches	1/2	3/4	1/2	3/4	1
	3/4	1	1-1/4	1-1/2	2
Outlet Sizes	1	1-1/4	1-1/2	2	2-1/2
Seat Diameter Inches	A	B	C	D	E
Flow Area	.118	0.204	0.326	0.424	0.628
Set Pressure					
5	10.5	17.6	28.1	36.5	54.1
10	12.0	20.0	32.0	41.6	61.6
15	13.3	22.2	35.5	46.1	68.3
20	14.5	24.2	38.6	50.3	74.4
25	15.6	26.0	41.6	54.1	80.1
30	16.6	27.7	44.3	57.6	85.3
35	17.6	29.3	46.9	61.0	90.3
40	18.5	30.9	49.3	64.1	95.0
45	19.4	32.3	51.6	67.2	99.5
50	20.2	33.7	53.9	70.1	103.8
55	21.0	35.1	56.0	72.9	107.9
60	21.8	36.3	58.1	75.5	111.9
65	22.5	37.6	60.1	78.1	115.7
70	23.3	38.8	62.0	80.6	119.4
75	24.0	40.0	63.9	83.1	123.0
80	24.6	41.1	65.7	85.4	126.5
85	25.3	42.2	67.4	87.7	129.9
90	25.9	43.3	69.2	89.9	133.2
95	26.6	44.3	70.8	92.1	136.5
100	27.2	45.4	72.5	94.3	139.6
105	27.8	46.4	74.1	96.3	142.7
110	28.4	47.3	75.6	98.4	145.7
115	29.0	48.3	77.2	100.4	148.7
120	29.5	49.2	78.7	102.4	151.6
125	30.1	50.2	80.2	104.3	154.4
130	30.6	51.1	81.6	106.2	157.2
135	31.2	52.0	83.1	108.0	160.0
140	31.7	52.8	84.5	109.8	162.7
145	32.2	53.7	85.8	111.6	165.4
150	32.7	54.6	87.2	113.4	168.0
155	33.2	55.4	88.5	115.1	170.5
160	33.7	56.2	89.8	116.9	173.1
165	34.2	57.0	91.1	118.5	175.6
170	34.7	57.8	92.4	120.2	178.0
175	35.1	58.6	93.7	121.9	180.5
180	35.6	59.4	94.9	123.5	182.9
185	36.1	60.2	96.2	125.1	185.3
190	36.5	60.9	97.4	126.7	187.6
195	37.0	61.7	98.6	128.2	189.9
200	37.4	62.4	99.8	129.8	192.2
205	37.9	63.2	100.9	131.3	194.4
210	38.3	63.9	102.1	132.8	196.7
215	38.7	64.6	103.2	134.3	196.9
220	39.2	65.3	104.4	135.7	201.1
225	39.6	66.0	105.5	137.2	203.2
230	40.0	66.7	106.6	138.6	205.3
235	40.4	67.4	107.7	140.1	207.5
240	40.8	68.1	108.8	141.5	209.5
245	41.2	68.7	109.9	142.9	211.6
250	41.6	69.4	110.9	144.3	213.7
255	42.0	70.1	112.0	145.6	215.7
260	42.4	70.7	113.0	147.0	217.7
265	42.8	71.4	114.1	148.3	219.7
270	43.2	72.0	115.1	149.7	221.7
275	43.5	72.6	116.1	151.0	223.6
280	43.9	73.3	117.7	152.3	225.6
285	44.3	73.9	118.1	153.6	227.5
290	44.7	74.5	119.1	154.9	229.4
295	45.0	75.1	120.1	156.2	231.3
300	45.4	75.7	121.0	157.4	233.2

TO ORDER: See Page 7