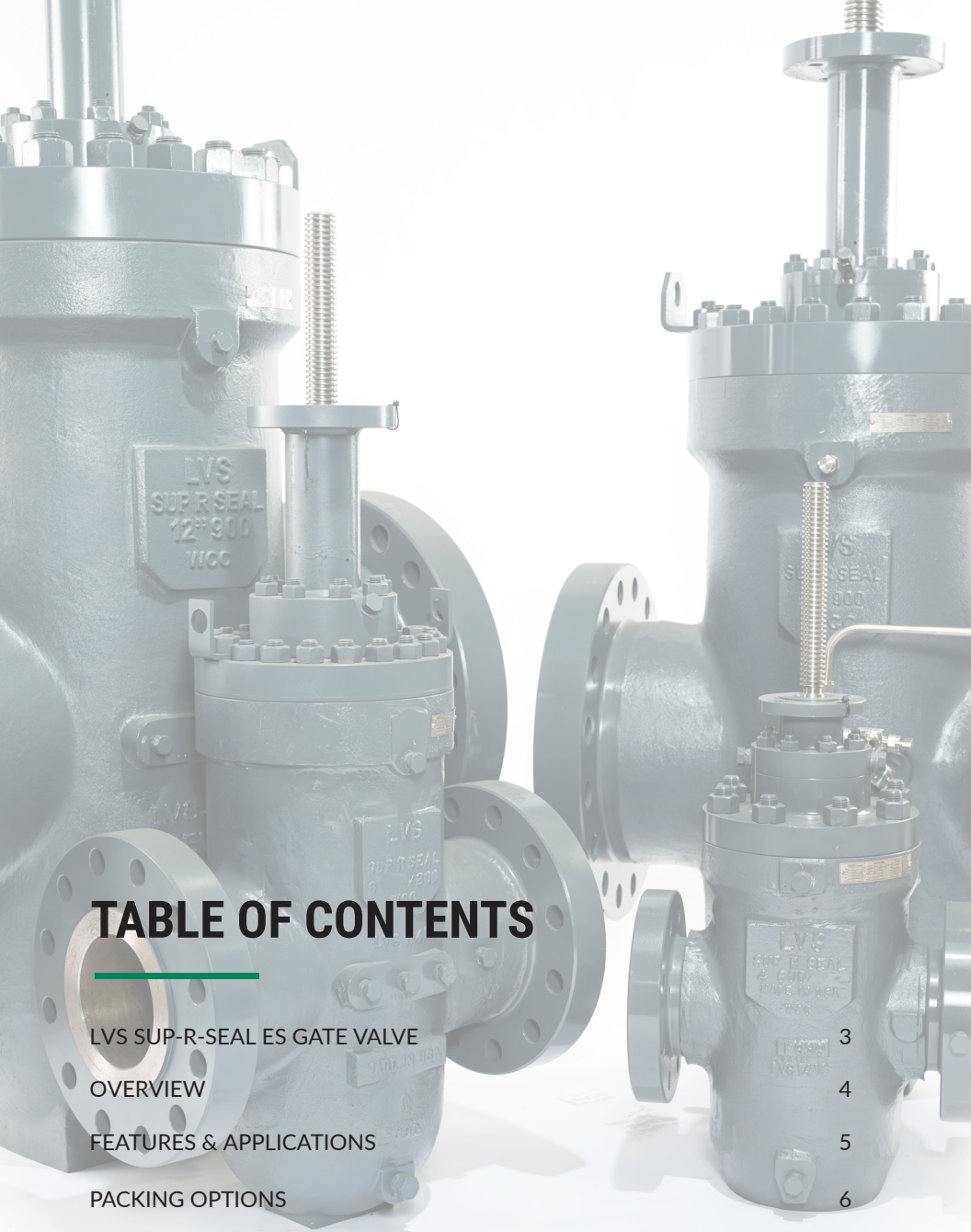
VALSOURCE

LVS SUP-R-SEAL ES GATE VALVE

SRS



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ABOUT US

Valsource is globally recognized for providing valves and valve services with facilities in Pasadena, TX, Port Allen, LA, and Youngsville, LA. This success has provided momentum to further establish Valsource as a quality valve manufacturer in the valve industry. This is demonstrated through our LVS Sup-R-Seal (ES) expanding gate valve.

The LVS Sup-R-Seal ES valve is manufactured in accordance with API-6D and is suitable for pipeline systems in the petroleum and natural gas industries. Our expanding gate valves are through-conduit designed with multiple custom packing set arrangements to reduce long-term maintenance costs. We maintain a quality management system with certifications in both ISO 9001 and API Q1.

LVS SUP-R-SEAL ES GATE VALVE

DESIGN ADVANTAGES:

The LVS SRS ES gate valve, manufactured by Valsource, is an API 6D certified, through-conduit, expanding gate valve designed for liquid or gas usage with double block and bleed capabilities. The through-conduit design and multiple available trim configurations provide dependable performance over the valve's life-cycle.

Double Block and Bleed Capability

The LVS SRS ES valve's parallel gate assembly sealing surfaces are designed to provide a bubble tight, mechanically assisted seal for both upstream and downstream in tandem with each other.

Protected Seat Sealing Surface

Seat faces are fully protected from contact with flow line media by remaining in contact with the gate assembly in both the open and closed positions. This allows for extended life of the valve sealing surfaces.

OVERVIEW

In-Line Repair

Due to its top entry design, the gate assembly, seats, and all other internal components can be replaced without having to remove the valve body from service, allowing shorter downtime.

Gate Centralizer

Valves 6” and larger contain level lock arms which keep the gate assembly together and in the neutral position during the opening and closing of the valve— all while allowing expansion at the moment of seating.

Through-Conduit Design

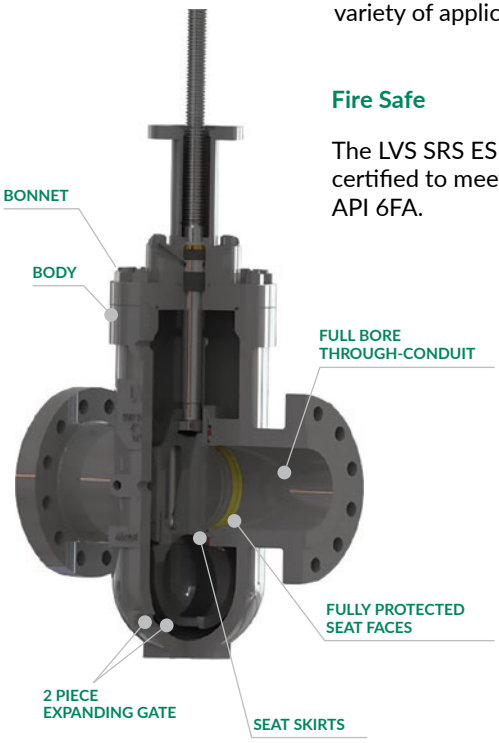
The full-bore design makes it possible to pass smart pigs and scrapers through the bore without damaging the valve or its components. This design has a flow resistance coefficient equal to that of piping, making the LVS SRS ES gate valve an excellent choice for pipeline systems.

Customized Operating

Valves can be provided as bare stem, manual gear operated, or automated (electric, pneumatic, or hydraulic). Extensions can be designed and installed per customer requirements to fit a variety of applications.

Fire Safe

The LVS SRS ES line is tested and certified to meet the requirements of API 6FA.



Valsource has a reputation for manufacturing the highest quality valves for the oil and gas industry and backs its products with experienced personnel and unmatched customer service.

FEATURES & APPLICATIONS

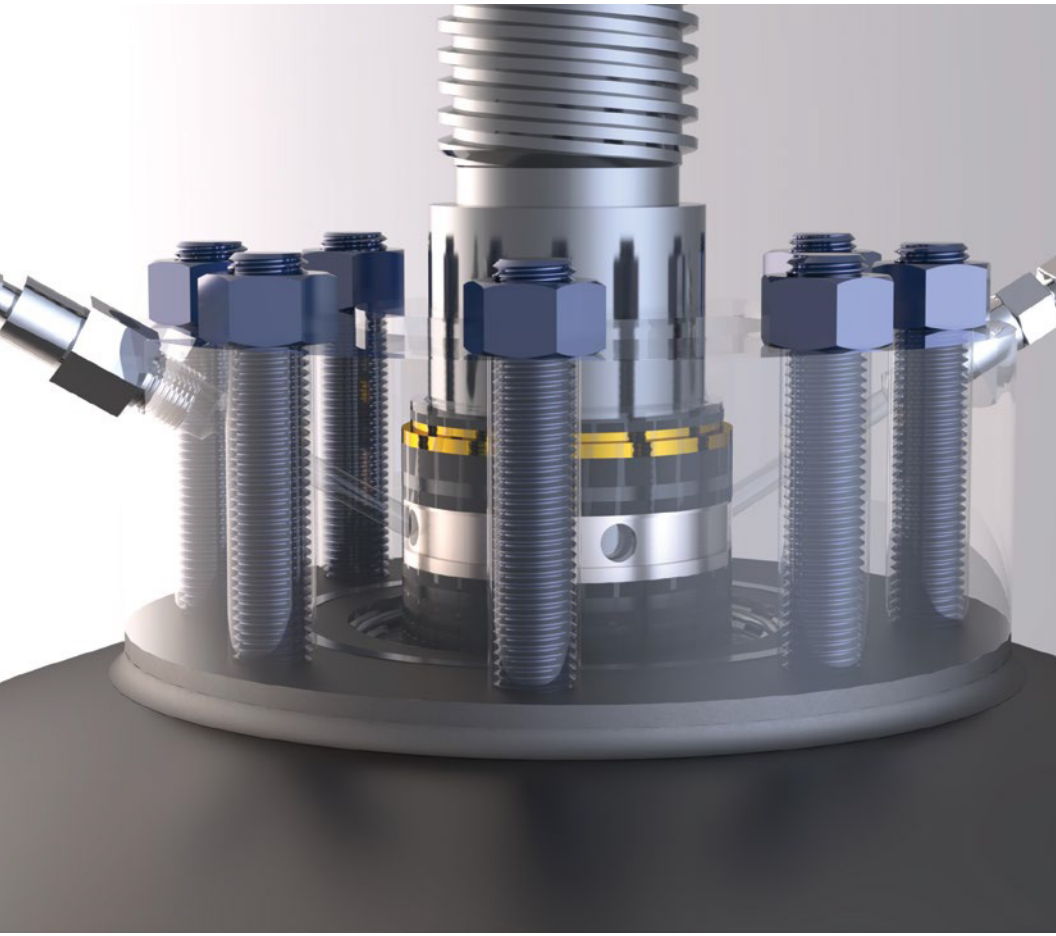
Features

- Standard nickel-plated gate and segment
- Stems are 17-4 stainless steel
- All LVS Sup-R-Seals are certified to API-6D standards (monogrammed)
- Allows for pigging and multi-media scrapers
- Lever arms hold gate and segment assembly in a neutral position during operation
- Finished in enamel gray (variety of finishes available)
- Standard temperature range -20° F to 250° F
- Operator extensions are available for above or below-grade applications

Applications

- Liquid and/or slurry piping systems
- Crude oil
- Natural gas liquids transport
- Refined products
- Storage tanks
- Wellhead production valves

PACKING OPTIONS



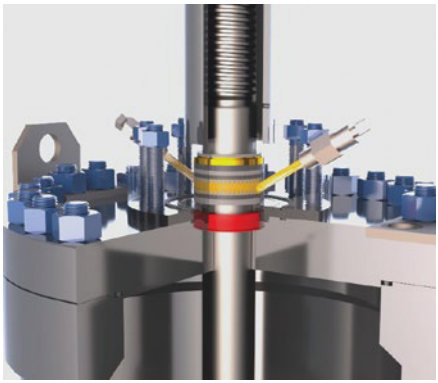
Standard Packing Arrangement

V-ring open style with SST lantern ring for maintenance free operation with the ability to inject packing to allow time for service.

Packing Arrangement

Dual Stage Packing for LVS Sup-R-Seal ES Gate Valve

- Certified to ISO 15848-1:2015 (Yarmouth Research and Technology)
- Fire tested to API-6FA, 5th edition (Yarmouth Research and Technology)
- True Dual Stage Packing

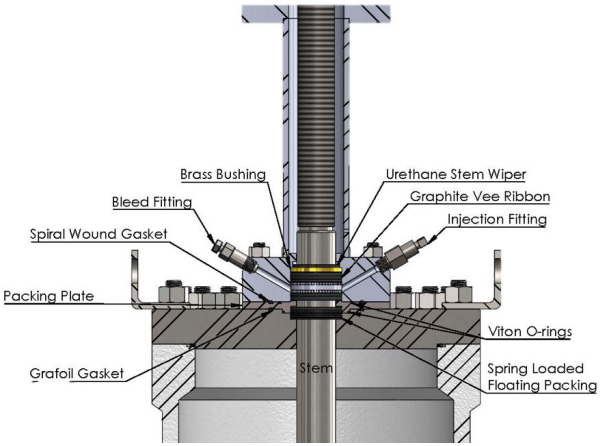


First Stage:
Spring-energized floating packing (self-adjusting for optimal performance)

Second Stage:
FKM V-Ring packing (accepts injectable packing for emergency shut-off)

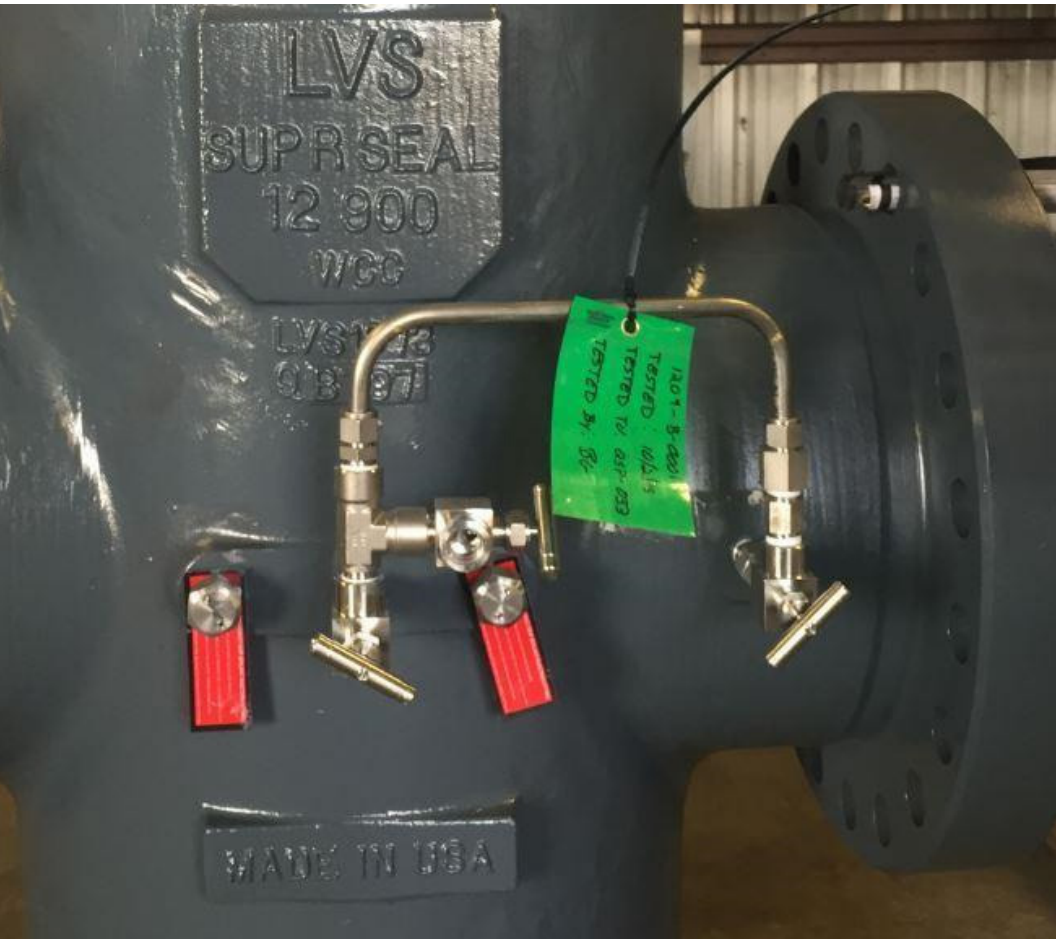
ISO 15848-1:2015 Test Criteria:

- Allowable Leakage: 100 PPMv minimum
- Test Media: 99% Methane
- Test Method: Sniffing Method Endurance Class: CO3 (2500 Mechanical Cycles)
- Temperature Class: RT (250°F) Four Thermal Cycles
- Cyclic Rate: 1 cycle every 475 seconds



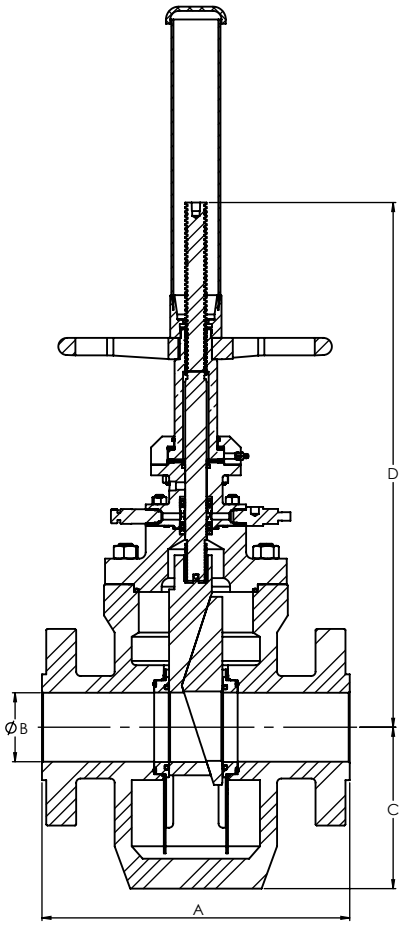
DIFFERENTIAL THERMAL RELIEF (DTR)

A thermal relief system provides the relief of excess pressure build-up by allowing it to be released back into the upstream portion of the valve. When the body pressure is greater than the pressure in the upstream conduit of the valve, a check valve unseats and allows the excess pressure to be relieved. The needle valves should remain open while the valve is in service. The needle valves can be used to isolate pressures as needed for in-line repair. It should be noted that customer-specific DTR designs can be installed pending engineering review.



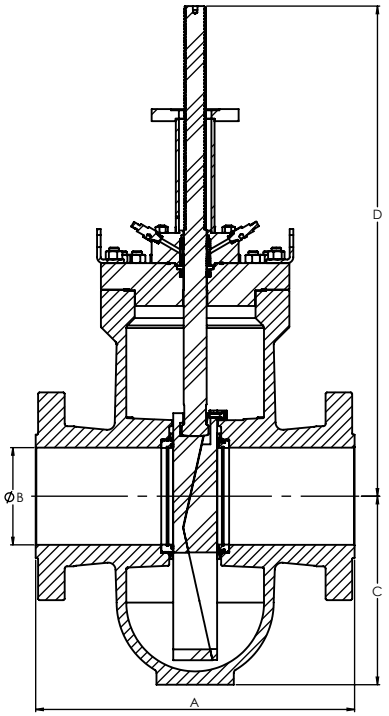
3" – 4" PRINCIPAL DIMENSIONS

LVS Sup-R-Seal ES Gate Valve



MAX STANDARD WP @100° F	
CLASS 600	1480 psi–WP
	2225 psi–TEST
CLASS 900	2220 psi–WP
	3350 psi TEST

SIZE	CLASS	FLANGE	A	B	C	D (OPEN)	LBS	# OF TURNS	STEM TRAVEL
3"	600	RF	14	3.063	7.250	19.520	230	17.5	3.5
		BWE	14						
		RTJ	14.125						
	900	RF	15	3.063	7.250	19.520	243	17.5	3.5
		BWE	15						
		RTJ	15.125						
4"	600	RF	17	4.063	9.440	31.188	382	18	4.5
		BWE	17						
		RTJ	17.125						
	900	RF	18	9.440	31.188	50.537	398	18	4.5
		BWE	18						
		RTJ	18.125						

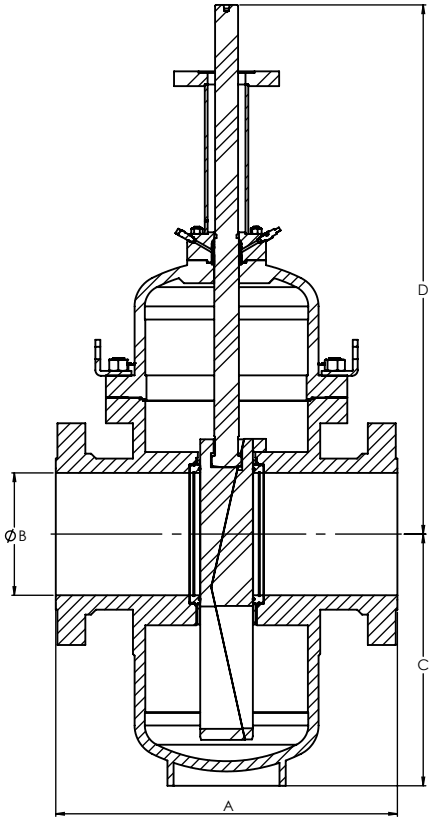


6”–12” PRINCIPAL DIMENSIONS

LVS Sup-R-Seal ES Gate Valve

MAX STANDARD WP @100° F	
CLASS 600	1480 psi–WP
	2225 psi–TEST
CLASS 900	2220 psi–WP
	3350 psi TEST

SIZE	CLASS	FLANGE	A	B	C	D (OPEN)	LBS	# OF TURNS	STEM TRAVEL
6”	600	RF	22	6.063	12.625	42.10	712	27.5	6.875
		BWE	22						
		RTJ	22.125						
	900	RF	24	6.063	12.625	42.1	751	27.5	6.875
		BWE	24						
		RTJ	24.125						
8”	600	RF	26	8.063	16.440	50.537	929	36	9
		BWE	26						
		RTJ	26.125						
	900	RF	29	8.063	16.440	50.537	1261	36	9
		BWE	29						
		RTJ	29.125						
10”	600	RF	31	10.063	19.750	61.438	1850	33.5	11.188
		BWE	31						
		RTJ	31.125						
	900	RF	33	10.063	19.750	61.438	2210	33.5	11.188
		BWE	33						
		RTJ	33.125						
12”	600	RF	33	12	23	69.813	2733	39.5	13.125
		BWE	33						
		RTJ	33.125						
	900	RF	38	12	23	69.813	3295	39.5	13.125
		BWE	38						
		RTJ	38.125						



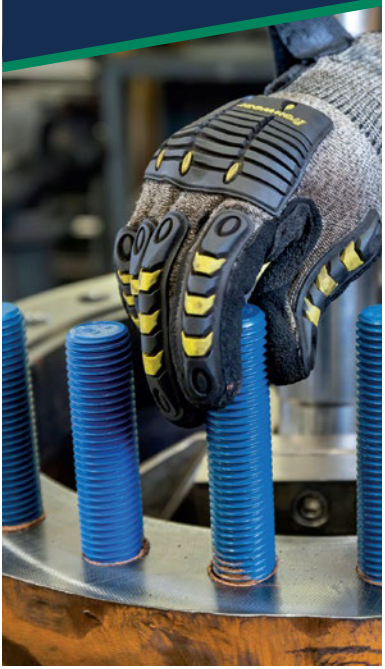
16″–30″ PRINCIPAL DIMENSIONS

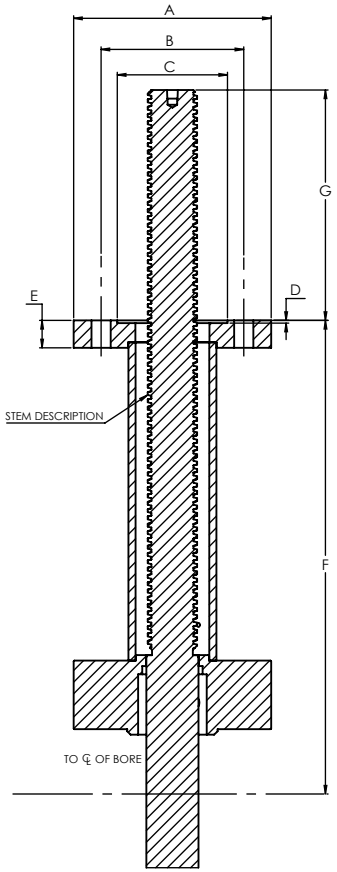
LVS Sup-R-Seal ES Gate Valve

SIZE CLASS	
CLASS 600	1480 psi–WP
	2225 psi–TEST
CLASS 900	2220 psi–WP
	3350 psi–TEST

SIZE	CLASS	FLANGE	A	B	C	D (OPEN)	LBS	# OF TURNS	STEM TRAVEL
16″	600	RF	39	15.25	33.37	79.034	4377	20.5	16.375
		BWE	39						
		RTJ	39.125						
	900	RF	44.5	14.75	33.37	79.034	4833	20.5	16.375
		BWE	44.5						
		RTJ	44.875						
20″	600	RF	47	19.25	38.125	102.547	8212	25.5	20.5
		BWE	47						
		RTJ	47.25						
	900	RF	52	18.625	38.125	102.547	8554	25.5	20.5
		BWE	52						
		RTJ	52.5						
22″	600	RF	51	21.25	43.14	114.25	8591	29.5	23.75
		BWE	51						
		RTJ	51.375						
24″	600	RF	55	23.25	46.06	122.000	13138	32.5	26
		BWE	55						
		RTJ	55.375						
30″	600	RF	65	29	54	146.435	21075	39	31
		BWE	65						
		RTJ	65.5						

6″–30″ VALVE TOPWORKS DIMENSIONS





SIZE	CLASS	FLANGE	STEM DESCRIPTION	A (ø)	B (ø)	C (ø)	D	E	F	G*
6″	600	FA-14	1-1/2″–4 Acme LH Single Lead	7.000″	5.500″	3.770″	.250″	1.000″	12.625″	8.924″
	900	FA-14	1-1/2″–4 Acme LH Single Lead	7.000″	5.500″	3.770″	.250″	1.000″	12.625″	8.924″
8″	600	FA-14	1-3/4″–4 Acme LH Single Lead	7.000″	5.500″	3.770″	.250″	1.000″	12.625″	8.399″
	900	FA-14	1-3/4″–4 Acme LH Single Lead	7.000″	5.500″	3.770″	.250″	1.000″	12.625″	8.399″

SIZE	CLASS	FLANGE	STEM DESCRIPTION	A (ø)	B (ø)	C (ø)	D	E	F	G*
10"	600	FA-16	2-1/4"X 3 Acme LH Single Lead	9.000"	6.500"	5.020"	.190"	1.250"	39.573"	11.052"
	900	FA-16	2-1/4"X 3 Acme LH Single Lead	9.000"	6.500"	5.020"	.190"	1.250"	39.573"	11.052"
12"	600	FA-16	2-1/4"X 3 Acme LH Single Lead	9.000"	6.500"	5.020"	.190"	1.250"	45.140"	11.758"
	900	FA-16	2-1/4"X 3 Acme LH Single Lead	9.000"	6.500"	5.020"	.190"	1.250"	45.140"	11.758"
16"	600	FA-25	2-1/2"X 2-1/2 Acme LH Double Lead	11.500"	10.000	6.025"	0.250"	1.250"	55.320"	7.400"
	900	FA-30	2-3/4"X 2-1/2 Acme LH Double Lead	13.625"	11.750"	7.020"	0.250"	1.750"	53.522"	7.400"
20"	600	FA-30	2-3/4"X 2-1/2 Acme LH Double Lead	13.625"	11.750"	7.020"	0.250"	2.750"	70.333"	11.714"
	900	FA-35	3-1/2"X 2-1/2 Acme LH Double Lead	16.000"	14.000"	8.520"	0.250"	2.750"	68.030"	11.714"
22"	600	FA-30	3"X 2-1/2 Acme LH Double Lead	13.625"	11.750"	7.020"	0.250"	1.750"	77.320	13.220"
24"	900	FA-35	3"X 2-1/2 Acme LH Double Lead	16.125"	14.000"	8.520"	0.250"	3.250"	85.440"	10.830"
30"	600	FA-40	3-3/4"X 2-1/2 Acme LH Double Lead	18.750"	16.000"	9.020"	.385"	3.250"	94.925"	20.328"

TRIM CHART

LVS Sup-R-Seal ES Gate Valve (6"-30" / 600-900)

PART DESCRIPTION	MATERIAL
Casted Body	A216 WCC
Bonnet	A516-70 A216 WCC*
Gate and segment	A516-70, 2 MIL ENP A216 WCC, 2 MIL ENP **
Seat	A-36, 2 MIL ENP, PTFE INSERT
Stem	17-4 PH HH1150
Stem V-Ring Packing	FKM
O-rings	VITON
Bolting	A193 B7
Fittings	STAINLESS STEEL
Temperature Range	-20°F TO 250° F

**Only 20" 600 and 30" 600 use A216 WCC BONNET*

***Only 30" 600 use A216 WCC GATE / SEGMENT*

NOTES

CERTIFICATIONS

We are an API Q1 accredited company. Our certifications are on file and can be provided at any time. Providing quality products and services is of the utmost importance to us as a company. We ensure this by maintaining our endorsements with these organizations. We adhere to all industry standards as they evolve, and we communicate changes to our employees through regular forums.

VALSOURCE

Locations

We are available 24/7 to service your valve needs. For more information, you can reach us at 877-474-1113, sales@valsource.net, or at any of the following locations:

Pasadena
9415 New Century Drive
Pasadena, Texas 77507
Phone: (281) 474-1163

Port Allen
2701 River Road
Port Allen, LA 70767
Phone: (225) 343-1383

Memphis
6695 Fletcher Creek Cove STE B
Memphis, TN 38133
Phone: (901) 612-2200

www.valsource.net

Valsource cannot provide specific warning and data for all possible applications. The purchaser/end-user must adhere to all pressure/temperature limitations provided in this literature, along with those of any applicable code or standard. The purchaser/end-user assumes the responsibility for the proper selection, installation, operation, and maintenance of any product. While the information provided in this literature is believed to be accurate, it is provided for informational purposes only and should not be considered within this literature are subject to change without notice.

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