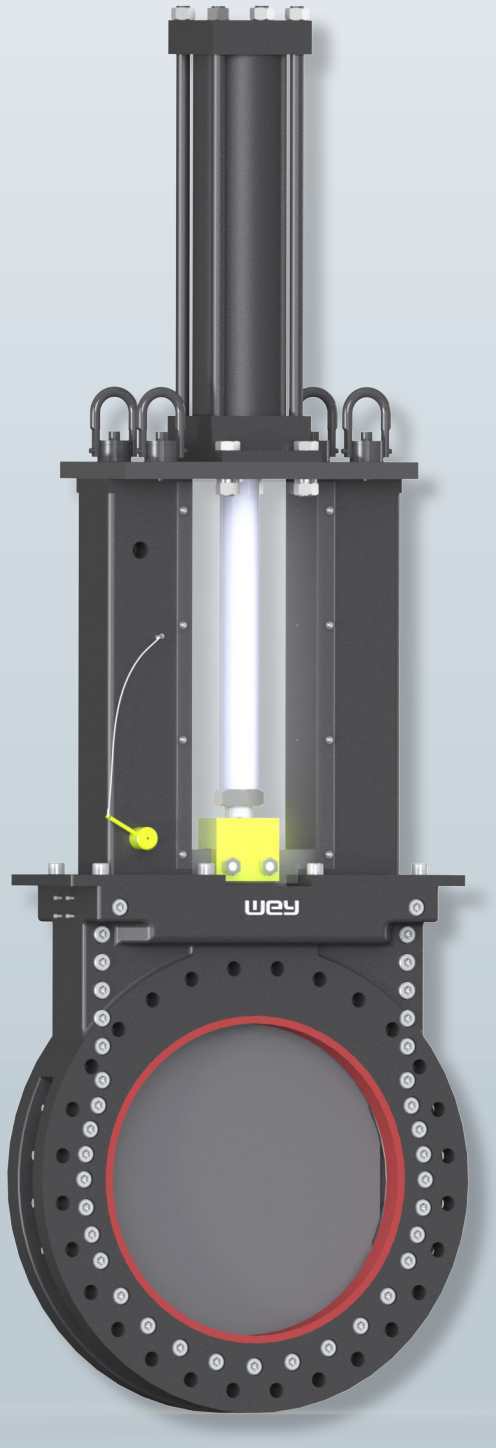
VALVE INNOVATION_MANAGEMENT

SWISS PERFORMANCE

Wey Knife Gate Valve Models A3, W0, W1, W2 & W3

Full Flange Knife Gate Valve



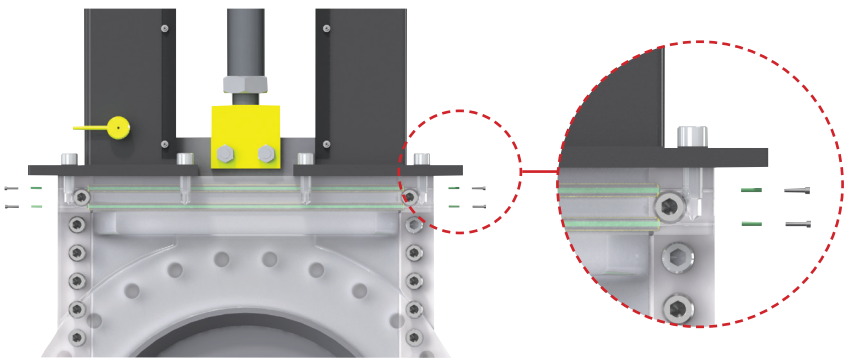
Compare the Unique Features

- Heavy-duty body design conforming to MSS SP-135, MSS SP-81 or customer specified face-to-face dimensions
- Dual heavy-duty top transverse seal with upper & lower scraper blades
- TFE packing (re-packable while in service and under pressure)
- Reduced chest cavity (prevents jamming)
- Gate-guided for full length of stroke for bi-directional bubble-tight shut-off
- Self-flushing contoured body bore
- ANSI 150 or 300 flange bolt pattern
- Type 17.4 PH stainless steel gate
- Proprietary non-stick coating for body and gate
- Totally enclosed heavy-duty bonnet
- Lifting lugs
- Lexan windows
- Lock-out pins (Weyon Coating)
- Weyon clevis for ease of position recognition
- Proximity switches
- Replaceable hardened wear ring (Ni-hard/tool steel/ceramic)
- Hydraulic, pneumatic, handwheel, manual bevel gear, or electric actuators
- Solenoid valves or positioners
- Pipe I.D. lining (Urethane/chrome carbide/ tungsten carbide)
- HVAF hardened seal groove

Benefits of the reliable Wey Valve design:

- The body material is corrosion and erosion resistant ductile Ni-Resist ASTM A439 D2, ideally suited for long service life in mining applications.
- The gate material is 17.4 PH SS heat treated to H900 and is guided for the full length of the stroke for bi-directional bubble-tight shut-off.
- The seat/seal is mechanically retained to prevent “pull out” and installed flush with the bottom body bore to prevent build-up in the seat area.
- The valve is equipped with dual heavy-duty scraper blades to wipe the gate clean while opening/closing to prolong packing life. The valve is re-packable in line under full line pressure.
- Inserted in the upstream body half is a hardened wear ring to protect the seal area from erosion.
- The heavy-duty carbon steel universal bonnet comes complete with Lexan covers to keep the bonnet area clean and to allow for visual inspection.

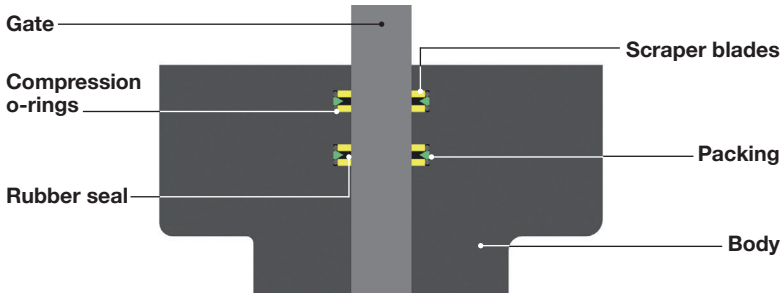
Re-packing the valve



Section of transverse seal illustrating how sealing compound is inserted into chamber to re-pack valve while in service.

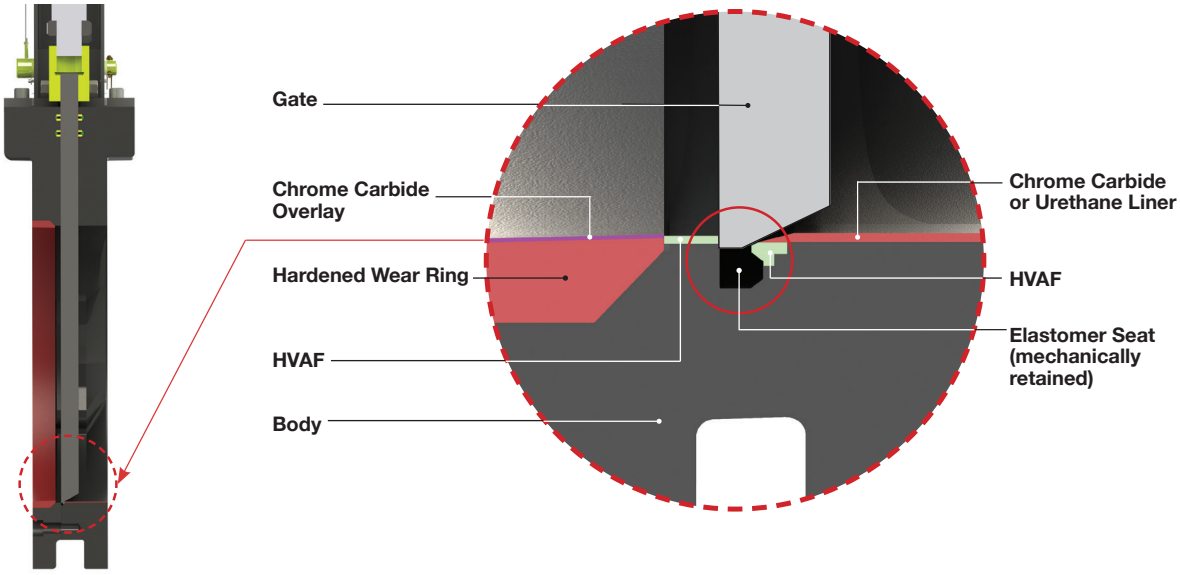
See live demonstration

Dual heavy-duty top transverse seal



Resilient transverse seal: Various elastomeric seal materials available. Seal includes compression loaded scraper blades to wipe gate clean and protect seal. Re-packable in service and under pressure/vacuum.

Mechanically retained resilient seat with wear ring and overlay option



Section view
Mechanically retained resilient seal insures bubble-tight shut-off with pressure on either side of gate. Seal will not pull out of specially machined groove.

Wear Ring Options
- Ni-hard
- Tool Steel
- Ceramic

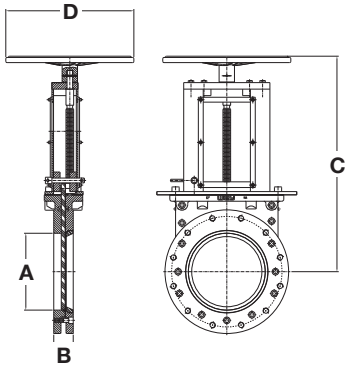
Pipe I.D. Lining
- Chrome Carbide
- Tungsten Carbide
- Urethane

Valve class and body ratings

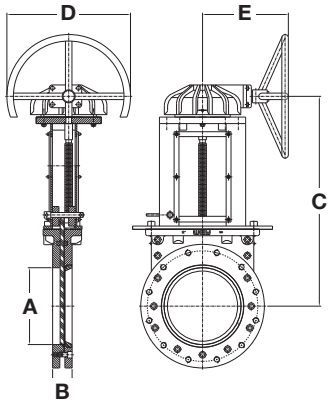
ASME/ANSI CLASS RATINGS		
SIZE	BODY	CLASS
2" to 42"	A3	150/300
2" to 48"	W0	150
2" to 48"	W1	150
2" to 48"	W2	300
2" to 48"	W3	300

BODY PRESSURE RATINGS	
BODY RATING	MATERIALS OF CONSTRUCTION
Class 125/250	Cast iron & cast Ni-Resist (ASME/ANSI B16.1)
Class 150/300	Ductile iron & ductile Ni-Resist (ASME/ANSI B16.42)
	Carbon steel & steel alloys (ASME/ANSI B16.34)
	Cast Ni-Resist (ASME/ANSI B16.1)

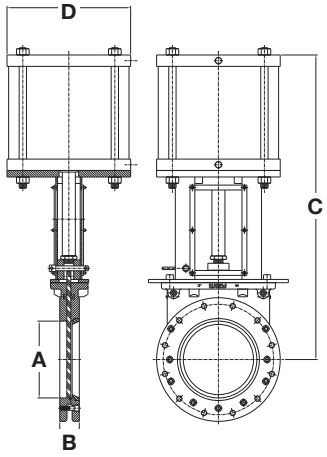
Sizes and Dimensions



Handwheel



Bevel Gear



Pneumatic Cylinder

Flange Bolting: Quantity, bolt circle diameters, flange bolt threads are per ASME B16.5 Class 300 (NPS less than or equal to 24"), and ASME B16.47 Series A Class 150 and 300 (NPS greater than 24"). Optional drill-through flange bolt holes are available. Consult Wey Valve, Inc., for depth and number of blind tapped holes in chest area of valve.

Valve Size		A	B					C	D	E
			Wey standard face-to-face	MSS SP-135						
			ANSI 150/ANSI 300	ANSI 150		ANSI 300				
				Short	Long	Short	Long			
IN	MM		A3	W0	W1	W2	W3			
2"	50	2.00	2.36	2.00*	2.75	2.75	2.75	Dimensions C, D, E are dependent on actuation options selected.		
3"	75	3.13	2.75	2.00	4.00	2.75	4.00			
4"	100	4.00	2.75	2.00	4.12	2.75	4.12			
6"	150	6.00	3.15	2.25	2.50	3.15	4.12			
8"	200	7.88	3.54	2.75	2.88	3.50	4.63			
10"	250	9.88	3.94	2.75	3.12	4.68	5.38			
12"	300	11.88	4.33	3.00	3.25	5.00	5.63			
14"	350	13.88	4.72	3.00	3.62	5.50	6.25			
16"	400	15.75	4.72	3.50	3.75	5.50	6.63			
18"	450	17.75	5.51	3.50	4.12	6.25	7.00			
20"	500	19.75	5.90	4.50	4.50	7.44	7.44			
24"	600	23.63	6.69	4.50	5.00	8.50	8.50			
26"	650	25.63	7.09	6.75	7.09	8.50	8.50			
28"	700	27.56	7.48	7.12	7.12	10.00	10.00			
30"	750	30.00	8.25	7.38	8.25	10.50	10.50			
32"	800	32.00	-	8.12	8.62	11.50	11.50			
36"	900	35.44	9.84	8.88	9.84	12.00	12.00			
42"	1050	41.34	13.78	9.75	12.00	12.00	14.75			
48"	1200	47.63	-	11.50	16.50	12.00	16.75			

*W0 model size 2" available as per TAPPI and MSS SP-81 face-to-face standard (1.88").
W0 model conforms to TAPPI and MSS SP-81 face-to-face standards in sizes 3" to 24". Flange Drilling per MSS SP-81 and MSS SP-135 available.
Manual A3 models have a rising stem. The dimensions shown account for the stem at its highest point.
Consult factory for valve sizes 54"- 90" dimensions. Dimensions shown in inches.
Important Note: All dimensions subject to change. Consult factory for certified dimensions.

Your contact

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