

Butterfly Valve

Figure-CS300G

Grooved End Valve With Gear Operator

Manufactured by: Central Grooved Piping Products
a Subsidiary of Central Sprinkler Company
451 North Cannon Avenue, Lansdale, Pennsylvania 19446
Phone (215) 362-0700 Fax (215) 362-5385



Product Description

Central Butterfly Valves provide for efficient control of fluid flow in piping systems. Flow may be from either direction, and the valves may be positioned in any orientation. The valves are furnished with grooved ends and can be easily adapted to flanged components utilizing our Figure 71 Class 150 flange adapters. The body and disc construction provides for increased strength and durability. The disc seal and body coating are compatible with a variety of chemicals and temperature ranges (contact Central for specific recommendations on seal and body coating selections). A high strength conventional stainless steel upper stem is provided for dependability as compared to iron upper stems provided by others. The surfaces at the upper stem and lower trunnion areas incorporate a reduced dynamic torque and anti-compression set design to ensure low operating torque and seal longevity.

This innovative feature prevents elastomeric failure of the disc encapsulation that is commonly experienced with other manufacturers. This is accomplished by providing uniform compression throughout the opening and closing operation of the disc. Other manufacturers have non-uniform compression, which results in permanent compression set and subsequent splitting of the material and undermining of the seal.



Technical Data

Figure No.: CS300G

Size:
2 1/2", 3", 4", 5", 6", 8", 10", & 12"

Manufacture Source:
Domestic

Materials of Construction:

Body:
Ductile Iron in accordance with ASTM A-536, Grade 65-45-12

Body Coating:
Black PPS (Polyphenylene Sulfide)

Disc:
Ductile Iron in accordance with ASTM A-536, Grade 65-45-12

Disc Seal:
Grade "E" EPDM or Grade "T" Nitrile encapsulated rubber in accordance with ASTM D-2000

Upper Stem:
Type 17-4 PH Stainless Steel

Lower Plug:
C360 Brass

Operator:
Gear Operator with Iron Housing Coated with Black Epoxy

Bracket:
Steel – Black Zinc Plated

Factory Hydro Test:
100% @ 350 psig (2413 kPa) in accordance with MSS-SP-67

Maximum working pressure:
300 psig (2068 kPa)

Temperature Rating:
-30°F (-34°C) to +230°F (110°C)



Installation

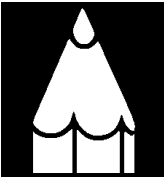
In piping systems, butterfly valves should be located where they will be readily accessible for operation, inspection, and maintenance.

When a valve "closes hard", it may be due to debris lodged in the sealing area. This may be corrected by backing-off the handwheel and closing it again, several times if necessary. The valve should never be forced to seat by applying a wrench to the handwheel as it may distort the valve components or score the sealing surfaces.

Important: All replacement parts must be obtained from the manufacturer to assure proper operation of the valve.

To prevent rotation of the valve, it is recommended that the CS300G Butterfly Valve be installed with rigid type couplings, such as the Central Fig. 772 Coupling. If flexible couplings are used, additional support may be needed to prevent rotation.

Note: Never disassemble or remove any valve component without verifying that the system is depressurized and drained.



Ordering Information

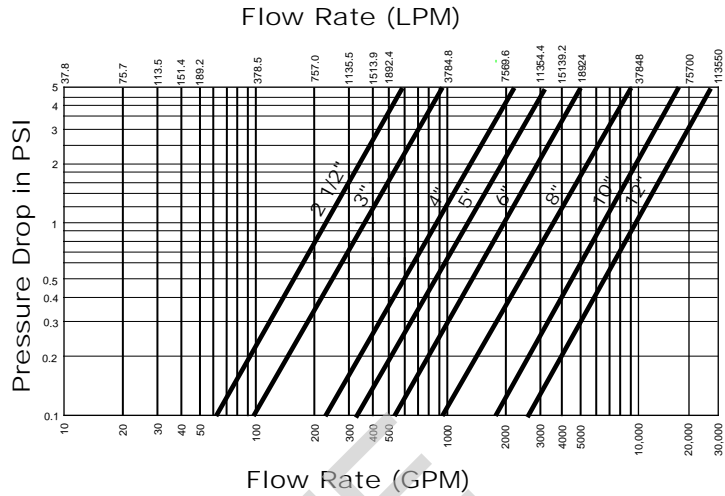
Butterfly Valve - CS300G

Ordering Information: When placing an order, indicate the full product name. Please specify the quantity, figure number, type of disc seal, EPDM "E" or Nitrile "T", and size.

Availability & Service: Central Grooved Piping Products, valves, accessories, and other products are available throughout the U.S., Canada, and internationally, through a network of Central distribution centers. You may write directly to Central or call 215-362-0700 for the distributor nearest you.

Warranty: Central will repair and/or replace any products found to be defective in material or workmanship within a period of one year from the date of shipment. Please refer to the current price list for further details of the warranty.

PERFORMANCE CS300G Sizes 2½", 3", 4", 5", 6", 8", 10", & 12"

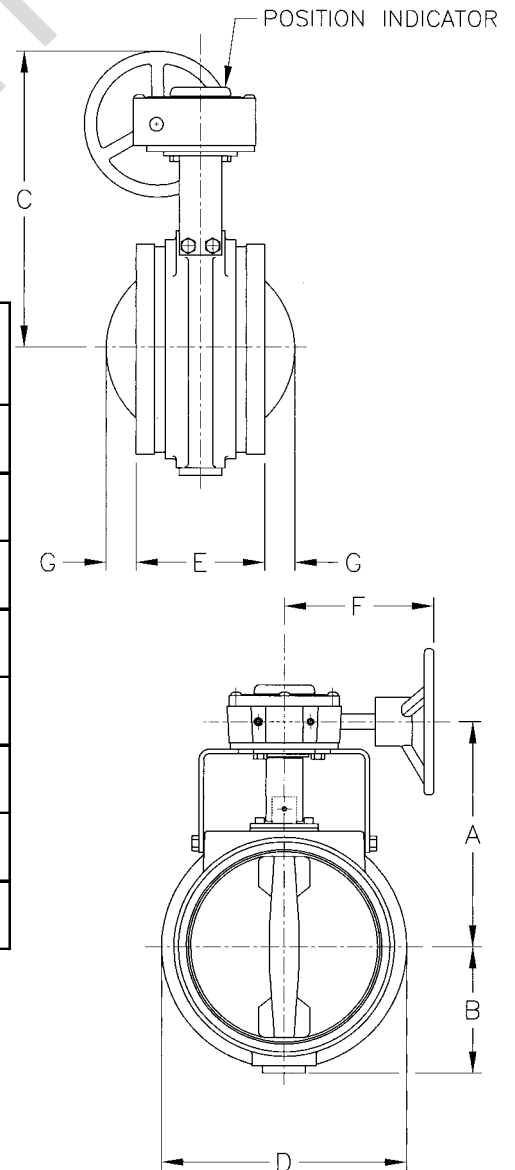


NOTE: It is good piping practice to apply a safety factor of 15 to 20% to the values in the above table.

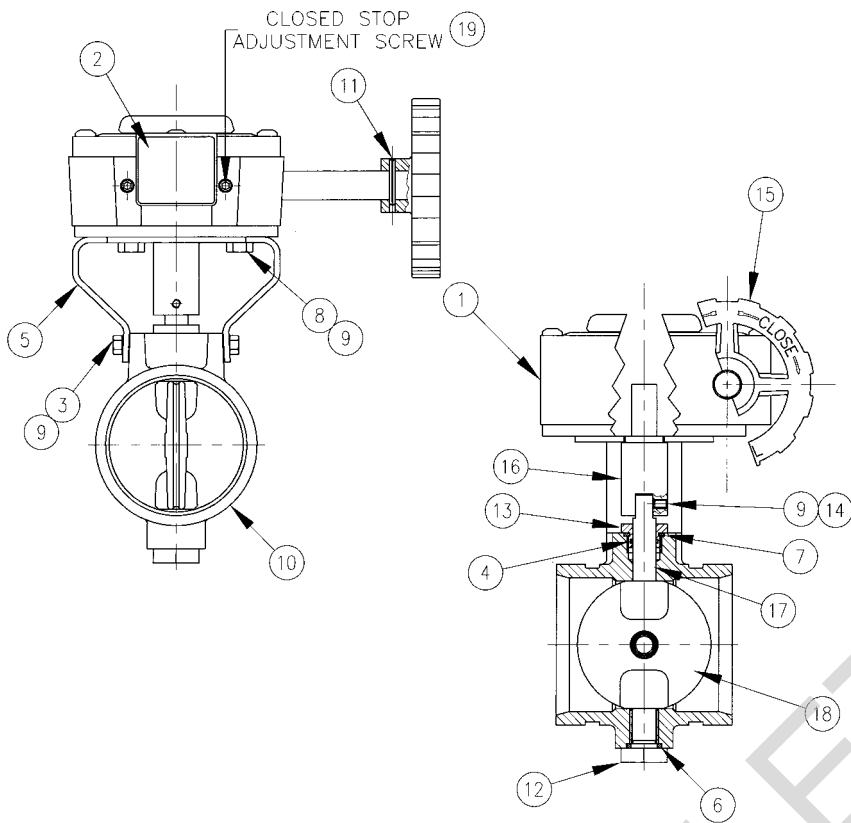
8" Configuration shown

Size	A Inches mm	B Inches mm	C Inches mm	D Inches mm	E Inches mm	F Inches mm	G Inches mm	Weight lbs. Kg
2½"	5.34 135.6	1.93 49.0	7.22 183.4	2.88 73.0	3.81 96.8	5.72 145.3	N/A*	10 4.5
3"	5.67 144.0	2.56 65.0	7.55 191.8	3.50 88.9	3.81 96.8	5.72 145.3	N/A*	12 5.4
4"	6.76 171.7	2.90 73.7	8.63 219.2	4.75 120.7	4.56 115.8	6.18 157.0	N/A*	20 9.1
5"	7.15 181.6	3.85 97.8	10.23 259.8	6.25 158.8	5.81 147.6	6.18 157.0	N/A*	29 13.2
6"	7.88 200.2	4.28 108.7	10.86 275.8	6.75 171.5	5.81 147.6	6.18 157.0	N/A*	34 15.4
8"	9.24 234.7	5.15 130.8	12.24 310.9	10.00 254.0	5.25 133.4	6.43 163.3	1.22 31.0	50 22.7
10"	11.56 293.6	6.31 160.3	15.68 398.3	12.00 304.8	6.25 158.8	7.25 184.2	1.75 44.5	79 35.8
12"	12.70 322.6	7.40 188.0	18.70 475.0	14.25 362.0	6.50 165.1	8.75 222.3	2.62 66.5	95 43.1

* END OF DISC DOES NOT EXTEND BEYOND VALVE BODY

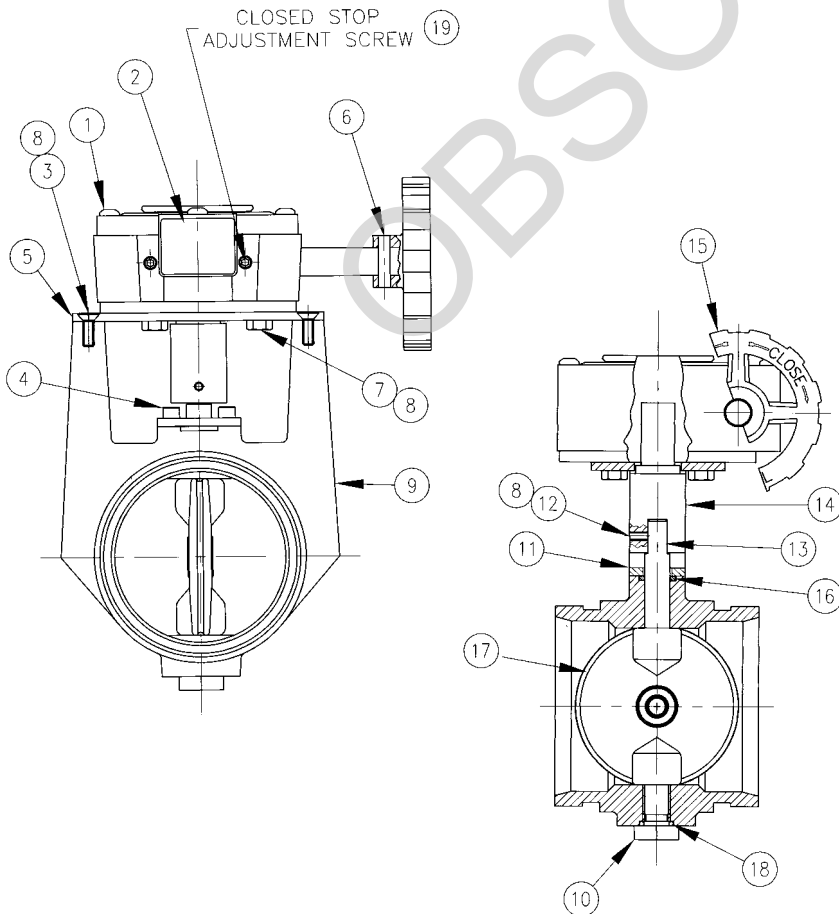


2 1/2" and 3" CS300G W/ GEAR ACTUATOR



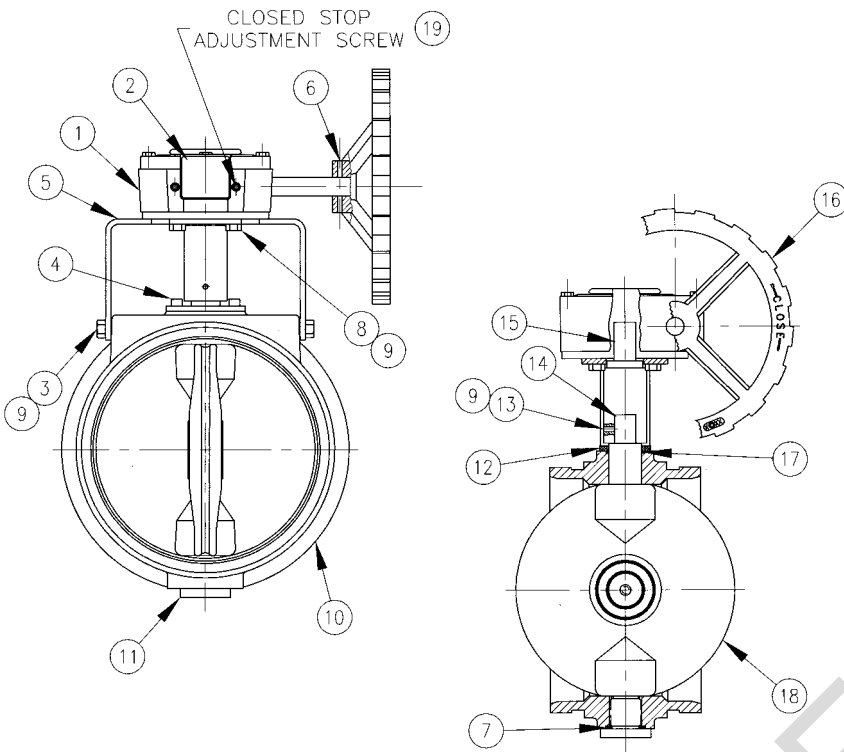
Det. No.	Part	Description	Qty.
1	Actuator Sub-Assembly		1
2	Name Plate	Aluminum	1
3	1/4" Hex Hd. Tap Screw	Steel, Zinc Plated	2
4	O-Ring	EPDM	2
5	Bracket	Steel, Black Zinc Plated	1
6	O-Ring	EPDM	1
7	O-Ring	EPDM	1
8	5/16" Hex Screw	Steel, Zinc Plated	AR
9	Adhesive	Loctite Thd. Locker	1
10	Body	PPS Coated Ductile Iron	1
11	Groove Pin	Steel, Zinc Plated	1
12	Plug	Brass	1
13	Packing Nut	Stainless Steel	1
14	Set Screw	Steel, Black Oxide	1
15	Hand Wheel	Ductile Iron	1
16	Coupling	Steel, Black Zinc Plated	1
17	Shaft	Stainless Steel	1
18	Disc	EPDM Molded Ductile Iron	1
19	Filler	Epoxy	AR

4", 5", and 6" CS300G W/ GEAR ACTUATOR



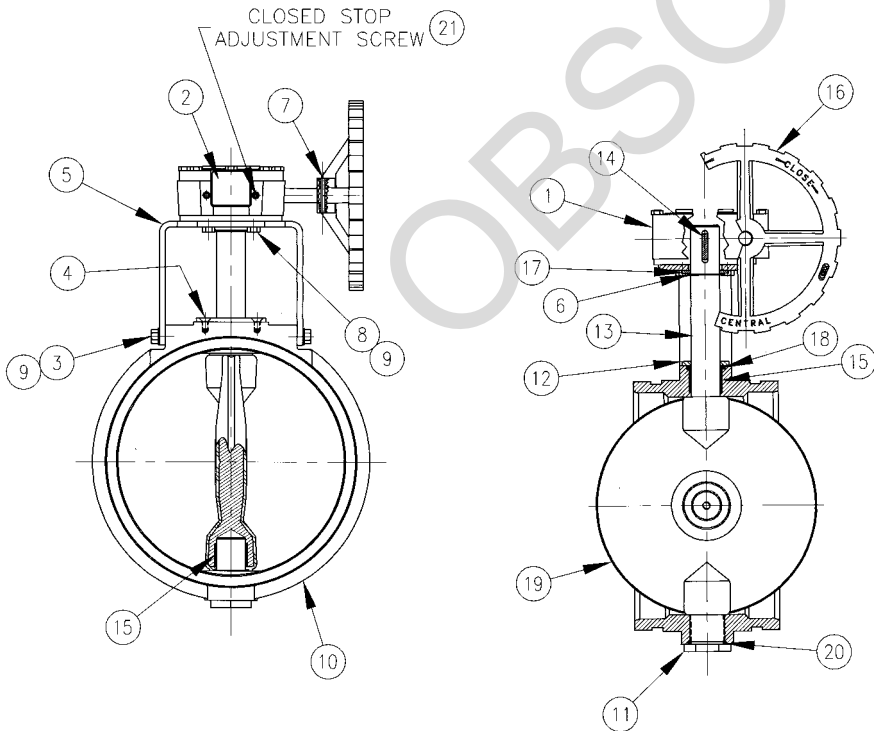
Det. No.	Part	Description	Qty.
1	Actuator Sub-Assembly		1
2	Name Plate	Aluminum	1
3	1/4" Flat Hd. Tap Screw	Steel, Zinc Plated	2
4	1/4" Fillister Hd. Tap Screw	Stainless Steel	2
5	Bracket	Steel, Black Zinc Plated	1
6	Groove Pin	Steel, Zinc Plated	1
7	5/16" Hex Screw	Steel, Zinc Plated	4
8	Adhesive	Loctite Thd. Locker	AR
9	Body	PPS Coated Ductile Iron	1
10	Plug	Brass	1
11	Bearing Plate	Brass	1
12	Set Screw	Steel, Black oxide	1
13	Shaft	Stainless Steel	1
14	Coupling	Steel, Black Zinc Plated	1
15	Hand Wheel	Ductile Iron	1
16	O-Ring	EPDM	1
17	Disc	EPDM Molded Ductile Iron	1
18	O-Ring	EPDM	1
19	Filler	Epoxy	AR

8" CS300G W/ GEAR ACTUATOR



Det. No.	Part	Description	Qty.
1	Actuator Sub-Assembly		1
2	Name Plate	Aluminum	1
3	3/8" Hex Hd. Tap Screw	Steel, Zinc Plated	4
4	1/4" Flat Hd. Tap Screw	Stainless Steel	1
5	Bracket	Steel, Black Zinc Plated	1
6	Groove Pin	Steel, Zinc Plated	1
7	O-Ring	EPDM	1
8	5/16" Hex Screw	Steel, Zinc Plated	4
9	Adhesive	Loctite Thd. Locker	AR
10	Body	PPS Coated Ductile Iron	1
11	Plug	Brass	1
12	Bearing Plate	Brass	1
13	Set Screw	Steel, Black Oxide	1
14	Shaft	Stainless Steel	1
15	Coupling	Steel, Black Zinc Plated	1
16	Hand Wheel	Ductile Iron	1
17	O-Ring	EPDM	1
18	Disc	EPDM Molded Ductile Iron	1
19	Filler	Epoxy	AR

10" and 12" CS300G W/ GEAR ACTUATOR



Det. No.	Part	Material	Qty.
1	Actuator Sub-Assembly		1
2	Name Plate	Aluminum	1
3	3/8" Hex Hd. Tap Screw	Steel, Zinc Plated	4
4	1/4" Flat Hd. Tap Screw	Stainless Steel	2
5	Bracket	Steel, Black Zinc Plated	1
6	Snap Ring	Steel, Zinc Plated	1
7	Grooved Pin	Steel, Zinc Plated	1
8	5/16" Hex Screw	Steel, Zinc Plated	4
9	Adhesive	Loctite Thd. Locker	AR
10	Body	PPS Coated Ductile Iron	1
11	Plug	Brass	1
12	Bearing Plate	Brass	1
13	Shaft	Stainless Steel	1
14	Shaft Key	Steel, Zinc Plated	1
15	Bearing, Shaft	Steel, Bronze, Teflon	1
16	Hand Wheel	Ductile Iron	1
17	1 1/4" Flat Washer	Steel, Zinc Plated	1
18	O-Ring	EPDM	1
19	Disc	EPDM Molded Ductile Iron	1
20	O-Ring	EPDM	1
21	Filler	Epoxy	AR


CENTRAL GROOVED PIPING PRODUCTS