

NanoPure



STAINLESS STEEL

# 3 PIECE BALL VALVE

INSTRUMENT / UHP

**KL<sup>®</sup> GROUP**  
Stock Code 300260

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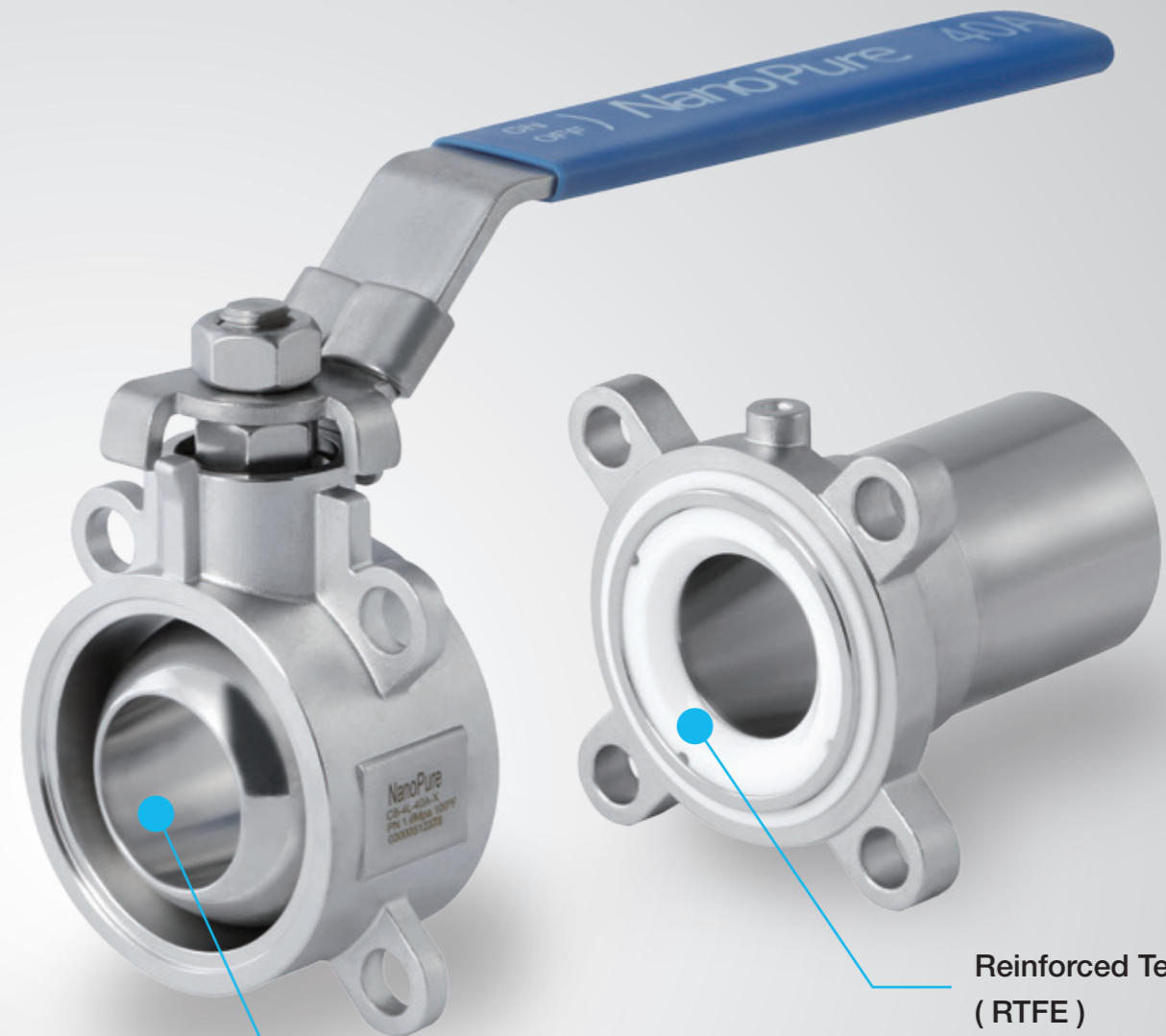
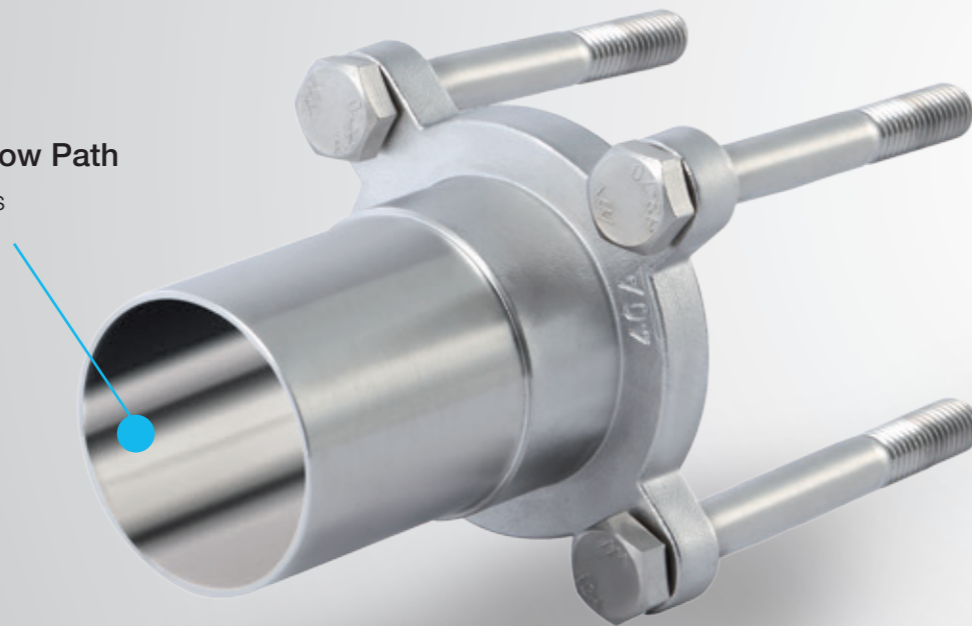


# STAINLESS STEEL 3 PIECE BALL VALVES

The Nanopure Ball Valve is 100% pressure tested, cleaned, and assembled in a class 1,000 cleanroom.

## High-Purity Polished Flow Path

The same high-purity surfaces

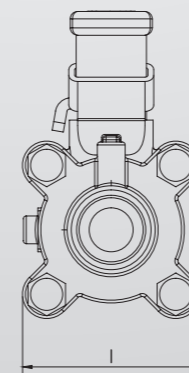
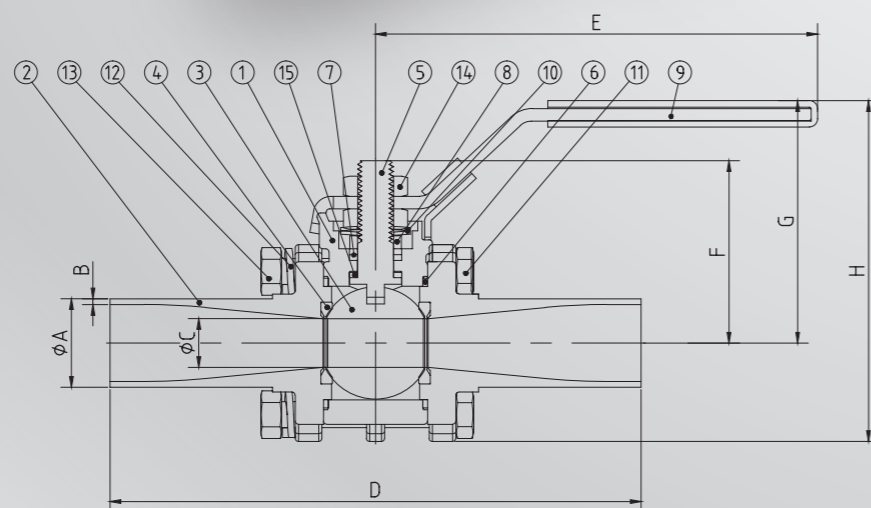


## Reinforced Teflon Seats (RTFE)

Increased strength for longer life

## Stainless Steel Ball

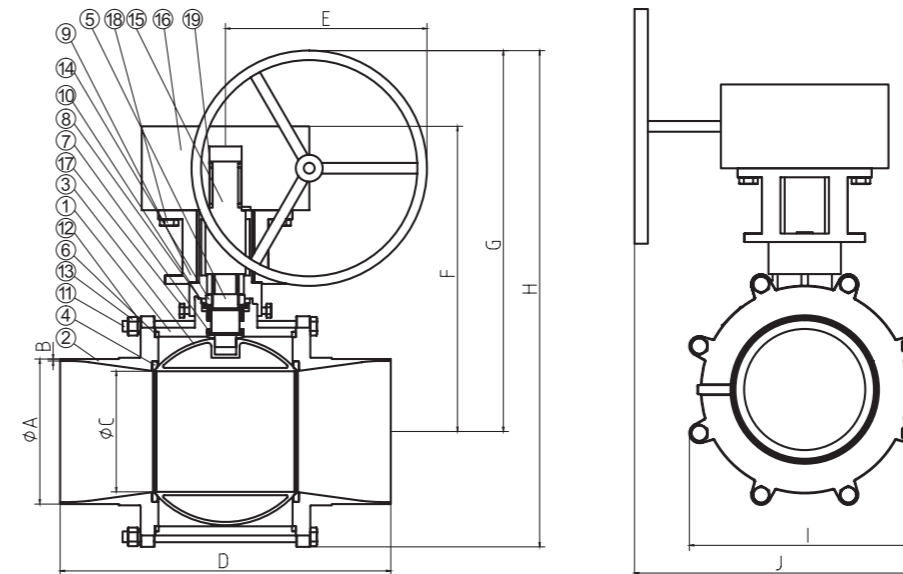
Full port I.D. for minimum flow turbulence



ITEM	PART NO.	DESCRIPTION
1	300 Series SS	Body
2	304L / 316L	End Connector
3	300 Series SS	Ball
4	PTFE	Seal Parking For Ball
5	300 Series SS	Stem
6	PTFE	Seal Parking For Body
7	PTFE	Seal Parking For Stem
8	300 Series SS	Gland
9	300 Series SS, Vinyl	Handle Module
10	300 Series SS	Disc Spring
11	300 Series SS	Bolt
12	300 Series SS	Spring Washer
13	300 Series SS	Nut
14	300 Series SS	Stem Nut
15	PTFE	Stem Packing

# TECHNICAL PARAMETER

Size	A	B	C	D	E	F	G	H	I
15A	21.70	1.65	10.00	135.00	136.00	38.70	71.00	95.80	49.50
20A	27.20	1.65	15.00	162.30	162.00	56.00	76.30	106.60	60.60
25A	34.00	1.65	20.60	163.40	162.00	56.00	76.30	106.60	60.60
32A	42.70	1.65	25.00	194.00	162.00	60.60	80.30	113.60	66.60
40A	48.60	1.65	32.00	205.20	202.00	76.30	92.00	132.00	79.60
50A	60.50	1.65	40.00	211.50	202.00	86.50	98.60	142.00	86.70
65A	76.30	2.10	50.00	248.00	202.00	99.50	111.20	164.00	105.70
80A	89.10	2.10	65.00	262.00	330.00	134.50	153.50	224.70	160.90
100A	114.30	2.10	80.00	301.00	330.00	145.50	165.50	252.50	196.00
125A	139.80	2.80	100.00	330.00	500.00	172.00	187.30	288.50	229.00
150A	165.20	2.80	125.00	364.00	500.00	192.00	207.50	333.00	250.80
1/2"	12.70	1.24	10.00	103.00	129.00	34.30	50.00	71.00	42.20
3/4"	19.05	1.24/1.65	10.00	135.00	136.00	38.70	71.00	95.80	49.50
1"	25.40	1.24/1.65	15.00	162.30	162.00	56.00	76.30	106.60	60.60
1.25"	31.75	1.65	20.60	163.40	162.00	56.00	76.30	106.60	60.60
1.5"	38.10	1.65	25.00	194.00	162.00	60.60	80.30	113.60	66.60
2"	50.80	1.65	32.00	205.20	202.00	76.30	92.00	132.00	79.60
2.5"	63.50	1.65	40.00	211.50	202.00	86.50	98.60	142.00	86.70
3"	76.20	1.65	50.00	248.00	202.00	99.50	111.20	164.00	105.70
4"	101.60	2.10	80.00	301.00	330.00	145.50	165.50	252.50	196.00
5"	127.00	2.77	100.00	330.00	500.00	172.00	187.30	288.50	229.00
6"	152.40	2.77	125.00	364.00	500.00	192.00	207.50	333.00	250.80



ITEM	DESCRIPTION
1	Body
2	End Connector
3	Ball
4	Seal Parking For Ball
5	Stem
6	Seal Parking For Body
7	Stem Packing
8	Gland
9	Support
10	Disc Spring
11	Bolt
12	Spring Washer
13	Nut
14	Stem Nut
15	Worm Shaft
16	Gear Box
17	Stop Bolt Nut
18	Stop Bolt Nut
19	Key

Size	A	B	C	D	E	F	G	H	I	J
200A	216.3	2.8	180	493.2	300	455.5	568.5	740.5	345	426.1
8"	203.2	2.77	180	493.2	300	455.5	568.5	740.5	345	426.1
250A	267.4	4	220	567	350	505.5	641.5	853.5	424	490
300A	318.5	4.5	260	665	350	535.5	671.5	915	487	521.5

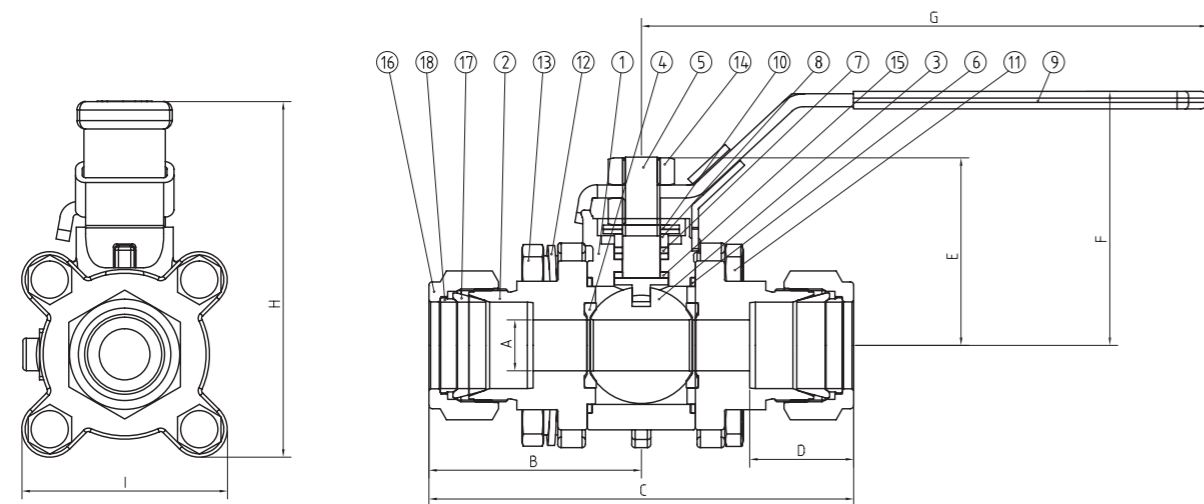
# TECHNICAL PARAMETER

Rotary welding



**ITEM DESCRIPTION**

1	Body
2	End Connector
3	Ball
4	Seal Parking For Ball
5	Stem
6	Seal Parking For Body
7	Seal Parking For Stem
8	Gland
9	Handle Module
10	Disc Spring
11	Bolt
12	Spring Washer
13	Nut
14	Stem Nut
15	Stem Packing
16	Nut
17	Front Ferrule
18	Back Ferrule



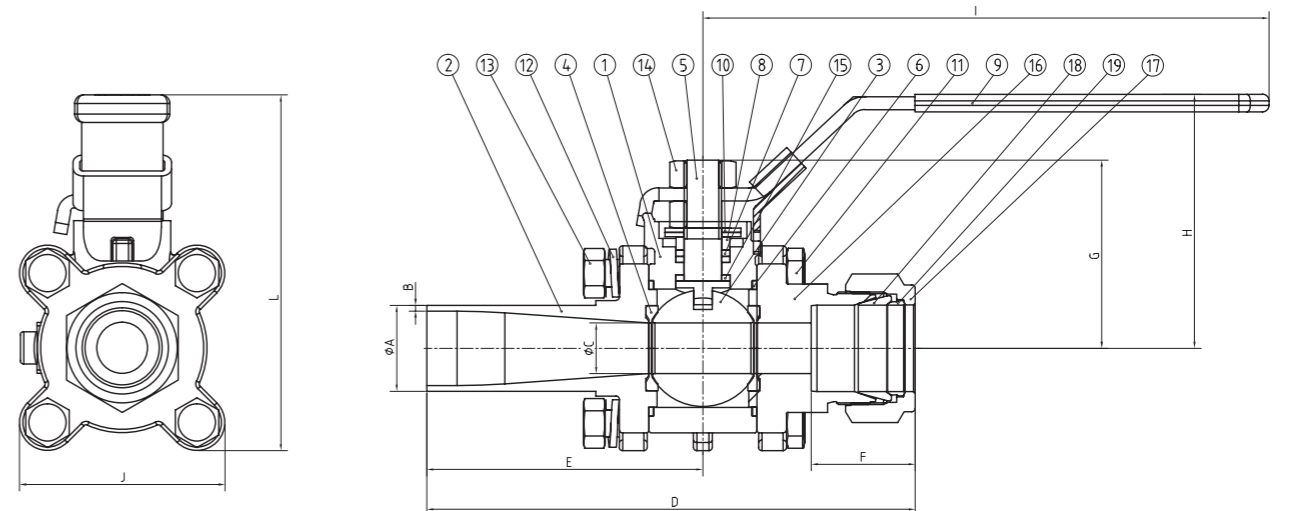
Size	A	B	C	D	E	F	G	H	I
1/2" Ferrule	10.0	51.8	103.6	23.0	34.3	49.5	128.5	70.6	42.2
3/4" Ferrule	10.0	58.8	117.6	24.3	38.7	71.0	136.0	95.8	49.5
1" Ferrule	15.0	62.8	125.6	30.8	56.0	76.3	162.0	106.6	60.6

Rotary welding



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Size	A	B	C	D	E	F	G	H	I
1/2" Tube - 1/2" Ferrule	12.7	1.24	10	103.3	51.5	23	34.3	50	129
3/4" Tube - 3/4" Ferrule	19.05	1.24/1.65	10	126.3	67.5	24.3	38.7	71	136
1" Tube - 1" Ferrule	25.4	1.24/1.65	15	144.5	81.7	30.8	56	76.3	162

# PRODUCT FEATURES

## UHP Cleaning, Packaging, and Testing

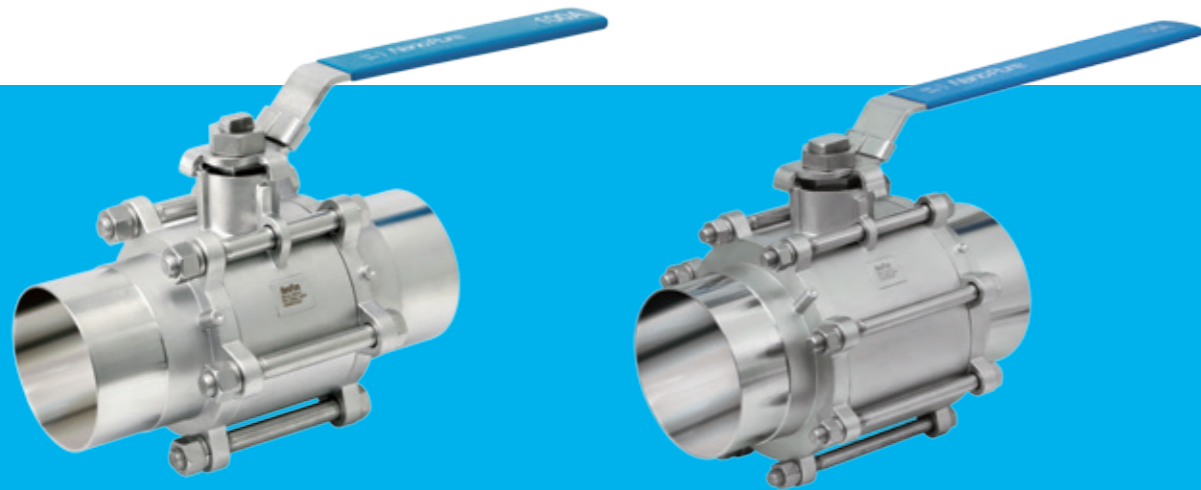
Final cleaning uses 18meg-ohm DI water and high-purity nitrogen from a cryogenic source. Every valve is tested with 100% helium across the seat and inboard across the body seals.

## Custom Configurations Available

Nanopure can custom build specialty assemblies that reduce field installation time. Since we polish all the welds we make at our facility, the number of raw welds in your process line is reduced. And we can electronically supply a computer-generated 3-D model of your special assembly for your approval before we start making it.

## Full Port Design

Dramatically decreases fluid flow resistance, using the same bore size for both valve internal components and the connecting tube. Elimination of Butted welds reduces contaminant pockets.



## End Connections

Pipe & Tube stub connections are available with surface finishes mechanically polished to 20 micro-inch Ra. All tube ends are faced and squared, ready for orbital welding and permanently marked for traceability to the producing mill. Material test reports with chemistry and mechanical properties of the tube ends are sent with each valve.

## Locking Device

The handle has an integral safety tab to prevent accidental operation, and it can be locked in the open or closed position with a standard padlock.

## 3-Piece Swing-in-Place Construction

Offers quick and easy in situ maintenance while maintaining parts alignment and allowing easy access to internal components after installation.

## Stainless Steel Construction

All wetted metallic surfaces are constructed from 300 stainless steel for excellent corrosion resistance. 300-series stainless steel is also used in the remaining non-wetted components to protect from environmental corrosion.

## I.D. Finish / Seal Lube

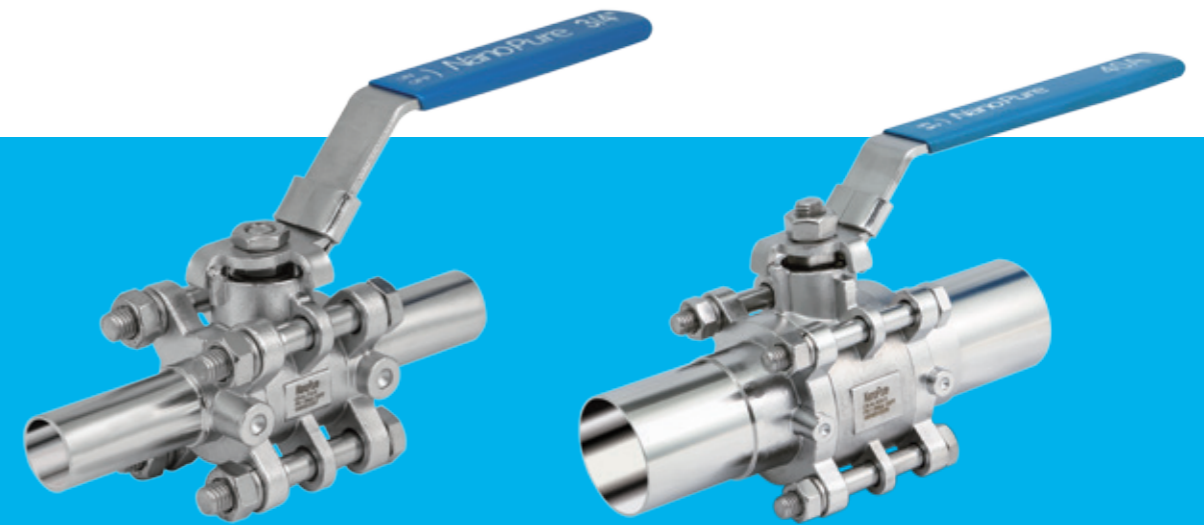
25 Ra mechanical polished / oxygen-compatible lube.

## Pressure Rating

Vacuum to 300 psig (20 bar)  
Test Pressure: 150 psig (10 bar)

## Leak Test

$1 \times 10^{-8}$  scc / sec



## Purge Ports

Compression or face-seal purge ports are available upstream, downstream, or both.

## Easy-Torque Handle

The heavy-duty, long handle gives plenty of leverage to open or close the valve against flowing process fluid.

# ORDERING INFORMATION

	15A						
	20A						
	25A	008=1/2"				L = Lever	
	32A	012=3/4"				W = wheel gear	
	40A	016=1"				NO = Normally Open Actuator	
	50A	020=1 1/4"				- Spring Return	
	65A	024=1 1/2"				NC = Normally Closed Actuator	
	80A	032=2"				- Spring Return	
	100A	040=2 1/2"				DA = Double Acting Actuator	
	125A	048=3"	BW=Butt Welded			Solenoid Assist for Air Actuator	
	150A	064=4"	08=SWG	X=Without	24 = 24 VDC Solenoid Assist		
	200A	080=5"	12=SWG	IPP=Inlet	120 = 120 VAC Solenoid Assist		
4L=304L	250A	096=6"	16=SWG	OPP=Outlet	240 = 240 VAC Solenoid Assist		
6L=316L	300A	128=8"	F=Flange	IOPP=In & Out	WL = With Limit Switch		

## STAINLESS STEEL 3 PIECE BALL VALVES

E = Electropolished  
B = Bright Annealing

Series	Material	Pipe Size JIS G3459	Tube Size ASTM A269	End Connector	Purge Port	Handle	Grade
CB	4L	15A	008	BW	IPP	L	B

