



**Omni® T-27 Ball Valve**

**Specifications**

**Sizes:** 3/8" - 2"  
**Models:** Socket and Threaded  
**Bodies:** PVC, CPVC  
**Seats:** PTFE backed with EPDM  
**Seals:** EPDM

**Sizes 3/8" - 2" PVC/EPDM Models  
 NSF-61 Certified**

**Standard Features (Sizes 3/8" - 2")**

- 2-way blocking valve
- Compact, Low profile
- Unibody sealed carrier construction
- Short face to face dimension
- 2-Stem O-rings
- PTFE seats with elastomeric backing
- Ergonomic handle design
- Full vacuum service rating
- Full port opening
- Accepts molded ISO top flange for actuation mounting

**Options**

- Electrically Actuated Series 83  
 120, 220 12/24 VAC, 12/24 VDC

**Parts List (Sizes 3/8" - 2")**

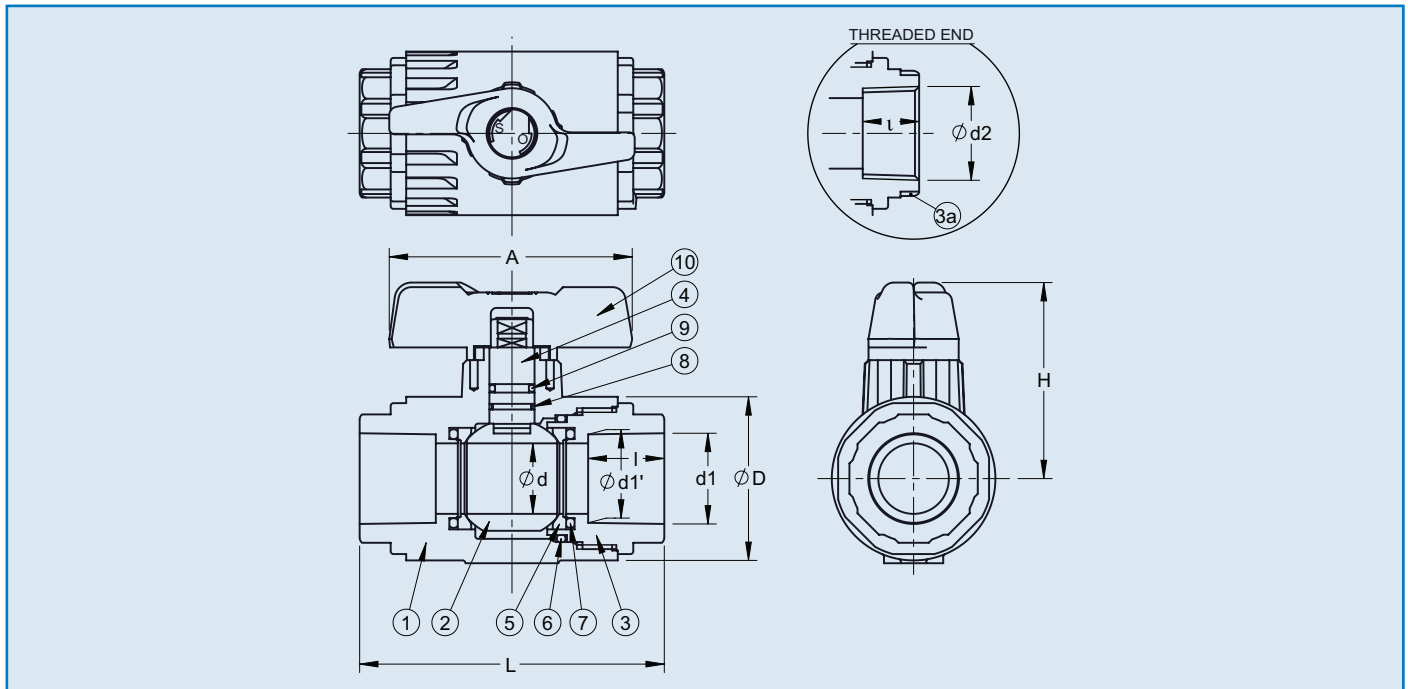
PARTS		
NO.	DESCRIPTION	MATERIAL
1	Body	PVC, CPVC
2	Ball	PVC, CPVC
3	End Carrier	PVC, CPVC
4	Stem	PVC, CPVC
5	Seat	PTFE
6	O-Ring (B)	EPDM
7	O-Ring (C)	EPDM
8	O-Ring (D)	EPDM
9	O-RING (E)	EPDM
10	Handle	ABS
30	Ring	304SS

**Sample Specification**

Omni® T-27 ball valves shall be PVC or CPVC body with EPDM seals and PTFE seats. Valves shall be 1 piece construction, have 2-way blocking capability, and have elastomeric backing cushions behind the PTFE seats for low stem torque, and to compensate for wear. End connections shall be either socket or threaded. Valve stems shall feature 2 stem o-rings. Valves shall accept the installation of a molded ISO top mounting flange for actuation mounting. PVC conforming to ASTM D1784 CC 12454A, and CPVC ASTM D1784 CC 23567A. Valves shall be rated 150psi at 70°F as manufactured by Asahi/America Inc.



# Omni® T-27 Ball Valve



## Dimensions (Sizes 3/8" – 2") (in.)

NOMINAL SIZE	SOCKET			THREADED		L	d	A	D	H	
	ASTM SCH 40			ASTM SCH 40							
INCHES mm	d1	d1	l	d2	l						
3/8	13	0.687	0.671	0.59	3/8 - 18 NPT	0.59	2.72	0.59	2.95	1.57	2.07
1/2	15	0.848	0.836	0.69	1/2 - 14 NPT	0.59	3.11	0.59	2.95	1.57	2.07
3/4	20	1.058	1.046	0.72	3/4 - 14 NPT	0.67	3.70	0.79	3.43	1.93	2.46
1	25	1.325	1.310	0.87	1 - 11 1/2 NPT	0.79	4.25	0.98	3.43	2.28	2.74
1-1/4	32	1.670	1.655	0.94	1 1/4 - 11 1/2 NPT	0.87	4.76	1.22	4.13	2.68	3.21
1-1/2	40	1.912	1.894	1.09	1 1/2 - 11 1/2 NPT	0.98	5.75	1.57	5.31	3.25	3.78
2	50	2.387	2.369	1.16	2 - 11 1/2 NPT	1.10	6.86	2.01	5.31	4.09	4.23

**Note:** The shape and appearance of assembly differ a little with nominal size compared to this drawing.

## Weight (lbs.)

NOMINAL SIZE		SOCKET		THREADED		NOMINAL SIZE		Cv
INCHES	mm	PVC	CPVC	PVC	CPVC	INCHES	mm	
3/8	13	0.26	0.27	0.27	0.28	3/8	13	7.7
1/2	15	0.27	0.28	0.28	0.30	1/2	15	14
3/4	20	0.43	0.46	0.45	0.48	3/4	20	29
1	25	0.64	0.68	0.67	0.71	1	25	47
1-1/4	32	0.94	1.00	0.99	1.05	1-1/4	32	72
1-1/2	40	1.53	1.64	1.60	1.71	1-1/2	40	155
2	50	2.62	2.78	2.71	2.87	2	50	190

## Cv Values

## Pressure vs. Temperature (psi, water, non-shock)

NOMINAL SIZE		PVC		CPVC		
INCHES	mm	30° F 120° F	30° F 120° F	121° F 140° F	141° F 175° F	176° F 195° F
3/8-2	13-50	150	150	120	90	60

# Omni® T-27 Ball Valves

## 1.0 Scope:

All requirements are for PVC & CPVC, Omni® T-27 Ball Valves and accessories.

## 2.0 Materials:

U-PVC – Conforming to ASTM D1784 Cell Classification 12454 A

CPVC – Conforming to ASTM D1784 Cell Classification 23567A

EPDM – Ethylene Propylene Diene Terpolymer Rubber

PTFE - Polytetrafluoroethylene

## 3.0 Valves:

Omni® T-27 ball valves shall be PVC or CPVC body with EPDM seals and PTFE seats. Valves shall be 1 piece construction, have 2-way blocking capability, and have elastomeric backing cushions behind the PTFE seats for low stem torque, and to compensate for wear. End connections shall be either Socket or Threaded. Valve stems shall feature 2 stem O-rings. Valves shall accept the installation of a molded ISO top mounting flange for actuation mounting.

## 3.1 Operators

3/8" – 2" (Lever Type standard)

Lever Handle to be Asahi Standard valve handle Red color.

## 3.2 Approved Manufacturer

Valves shall be provided by Asahi/America, Inc. of Lawrence, MA with no approved equals.

Manufacturer must be ISO-9001 certified.

## 3.3 Pressure Vs. Temperature

Valves shall have a pressure rating of: 150 psi at 70° F all sizes

## 4.0 Accessories:

### 4.1 Actuation

Actuation where required should be designed, built and provided by Asahi/America, Inc., and be electric (Series 83) type. All actuation accessories to be provided and installed by Asahi/America, Inc. in accordance with manufacturer's requirements.

## 5.0 Certifications:

### 5.1 NSF-61

PVC/EPDM models shall have NSF-61 Certification for use in drinking water applications.

## 6.0 installation Procedures:

All valve joints shall be prepared using the preferred joining method for the valve material and installation type in accordance with all requirements put forth in the Omni Ball Valve Operation & Maintenance manual. All accessories should be installed in accordance with the manufacturer's requirements as well as any facility requirements.