

Victaulic® Ball Valve

Series 726



Lever Operator



Lever Operator with
Stem Extension



Gear Operator

1.0 PRODUCT DESCRIPTION

Available Sizes:

- 1 ½ – 6"/DN40 – DN150

Maximum Working Pressure:

- Accommodates pressures up to 1000 psi/6894 kPa/69 Bar

Application:

- Two-piece, end-entry valve featuring a floating ball design
- Intended for use in full open or shut-off service; throttling is not recommended with standard ball valves

2.0 CERTIFICATIONS/LISTINGS

Conforms to ASME A17.1-2007/CSA B44-07 and is NACE compliant.



ALWAYS REFER TO ANY NOTIFICATIONS AT THE END OF THIS DOCUMENT REGARDING PRODUCT INSTALLATION, MAINTENANCE OR SUPPORT.

3.0 SPECIFICATIONS - MATERIAL

Body and End Cap: Ductile iron conforming to ASTM A395.

Ball: (specify choice)

- ☐ Standard: Carbon steel, chrome plated.
- ☐ Optional: 316 stainless steel.
- ☐ Optional: 316 stainless steel with vent.

Stem: Same material as specified for the Ball (see above).

Seats: Glass-reinforced polytetrafluoroethylene (PTFE)

Seals: Fluoroelastomer (Blue stripe color code). Temperature range +20°F to +250°F/ -7°C to +121°C. NOT COMPATIBLE FOR USE WITH HOT WATER SERVICES OR STEAM SERVICES.

Operators: (specify choice)

Lever Operator:

- ☐ 1 ½ – 3"/DN40 – DN80: Carbon steel, zinc-plated, plastic grip.
- ☐ 4 – 6"/DN100 – DN150: Carbon steel, enamel paint.
- ☐ Optional trim: Stainless steel.

Gear Operator:

- ☐ Standard: Manual with hand wheel.
- ☐ Optional trim: Stainless steel.

Operator Bracket: Hot rolled steel, black enamel-coated.

Bracket Bolts/Washers: Cold rolled steel, zinc-plated.

Power Actuators: Electric, pneumatic, hydraulic.

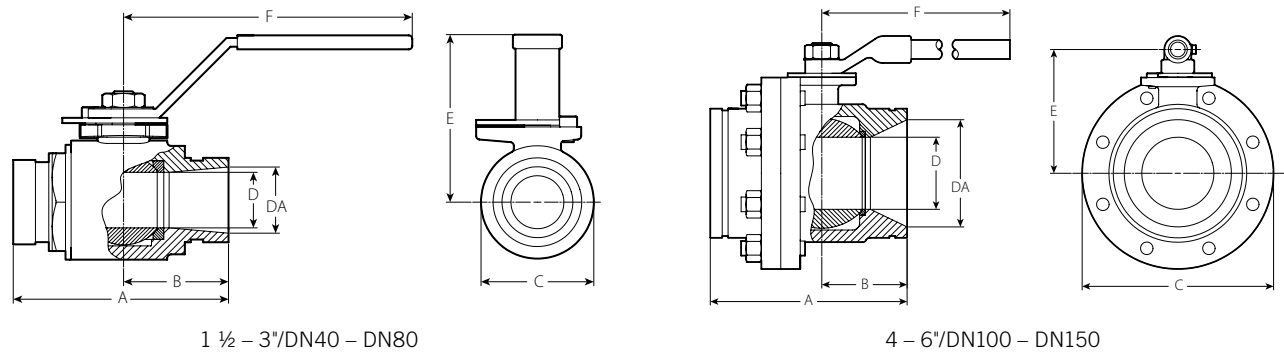
Integral Locking Drive Components: Stamped carbon steel, zinc-plated.

Stem Extension:

- ☐ Stem Extension: 316 stainless steel.
- ☐ Packing: TFE.
- ☐ Adapter: ASTM A351 Grade CF8M stainless steel
- ☐ Stem Extension Hardware (1 ½ – 6"/DN40 – DN150): 304 stainless steel.
- ☐ Handle Hub (4 – 6"/DN100 – DN150 Sizes): ASTM A536 Grade 65-45-12.
- ☐ Handle Bolt (4 – 6"/DN100 – DN150 Sizes): Carbon steel.
- ☐ Pipe Handle (4 – 6"/DN100 – DN150 Sizes): ASTM A53.

4.0 DIMENSIONS

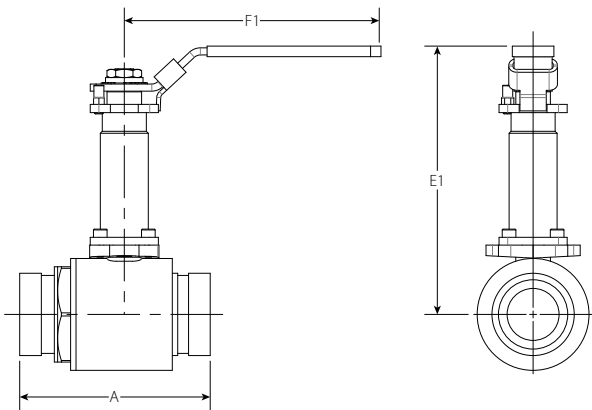
Series 726 Ball Valve
With Lever Operator



Size		Dimensions							Weight
Nominal	Actual Outside Diameter	A	B	C	D	DA	E	F	Approx. (Each)
inches	inches	inches	inches	inches	inches	inches	inches	inches	lb
DN	mm	mm	mm	mm	mm	mm	mm	mm	kg
1 ½	1.900	5.10	2.36	2.75	1.25	1.50	3.00	7.00	4.4
DN40	48.3	130	60	70	32	38	76	178	2.0
2	2.375	5.50	2.48	3.25	1.50	2.00	3.38	7.00	6.5
DN50	60.3	140	63	83	38	51	86	178	2.9
2 ½	2.875	6.30	2.80	4.00	2.00	2.50	4.00	9.88	10.4
	73.0	160	71	102	51	64	102	251	4.7
DN65	3.000	6.30	2.80	4.00	2.00	2.50	4.00	9.88	10.4
	76.1	160	71	102	51	64	102	251	4.7
3	3.500	6.60	3.15	4.88	2.50	3.00	4.63	10.00	14.9
DN80	88.9	168	80	124	64	76	118	254	6.8
4	4.500	8.30	3.35	7.75	3.00	4.00	5.50	15.75	41.5
DN100	114.3	211	85	197	76	102	140	400	19.0
	6.500	10.10	4.53	9.88	4.00	6.00	6.88	18.13	78.5
	165.1	257	115	251	102	152	175	461	35.5
6	6.625	10.10	4.53	9.88	4.00	6.00	6.88	18.13	78.5
DN150	168.3	257	115	251	102	152	175	461	35.5

4.0 DIMENSIONS

Series 726 Ball Valve
With Lever Operator and Stem Extension

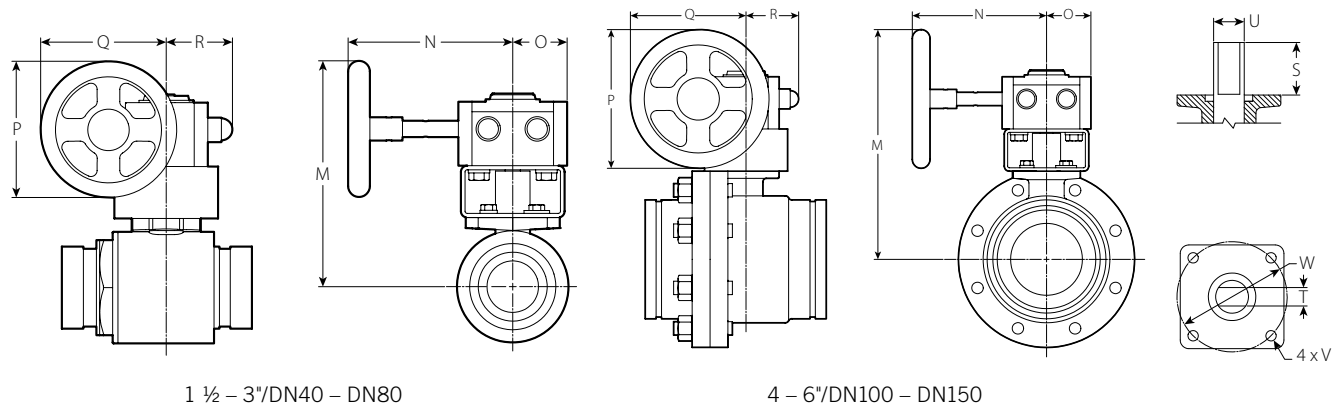


1 ½ – 3"/DN40 – DN80

Size		Dimensions			Weight
Nominal	Actual Outside Diameter	A	E1	F1	Approx. (Each)
inches	inches	inches	inches	inches	lb
DN	mm	mm	mm	mm	kg
1 ½	1.900	5.10	7.38	7.50	6.5
DN40	48.3	130	185	188	2.9
2	2.375	5.50	7.38	7.50	9.3
DN50	60.3	140	186	188	4.2
2 ½	2.875	6.30	8.50	11.50	13.0
	73.0	160	215	292	5.9
DN65	3.000	6.30	8.50	11.50	13.0
	76.1	160	215	292	5.9
3	3.500	6.60	8.75	11.50	21.0
DN80	88.9	168	221	292	9.5
4	4.500	8.30	9.63	15.75	52.0
DN100	114.3	211	243	398	23.5
	6.500	10.10	1.088	18.13	89.0
	165.1	257	276	459	40.5
6	6.625	10.10	10.88	18.13	89.0
DN150	168.3	257	276	459	40.5

4.1 DIMENSIONS

Series 726 Ball Valve
With Gear Operator



Size		Dimensions											Weight
Nominal	Actual Outside Diameter	M	N	O	P	Q	R	S	T	Ø U	V	W	Approx. (Each)
inches DN	inches mm	inches mm	inches mm	inches mm	inches mm	inches mm	inches mm	inches mm	inches mm	inches mm	metric	inches mm	lb kg
1 1/2 DN40	1.900 48.3	6.38 160	4.88 121	1.63 40	3.94 100	3.75 93	2.00 49	0.81 21	0.35 9	0.56 14	M6 x 1.00	1.97 50	7.1 3.2
2 DN50	2.375 60.3	6.63 166	4.88 121	1.63 40	3.94 100	3.75 93	2.00 49	0.81 21	0.35 9	0.56 14	M6 x 1.00	1.97 50	9.1 4.1
2 1/2	2.875 73.0	6.88 174	4.88 121	1.63 40	3.94 100	3.75 93	2.00 49	1.00 25	0.47 12	0.75 19	M8 x 1.25	2.76 70	12.9 5.9
DN65	3.000 76.1	6.88 174	4.88 121	1.63 40	3.94 100	3.75 93	2.00 49	1.00 25	0.47 12	0.75 19	M8 x 1.25	2.76 70	12.9 5.9
3 DN80	3.500 88.9	8.00 202	7.38 186	2.00 51	5.00 127	4.50 113	2.25 56	1.03 26	0.47 12	0.75 19	M8 x 1.25	2.76 70	20.0 9.1
4 DN100	4.500 114.3	10.00 253	7.38 186	2.00 51	5.00 127	4.50 113	2.25 56	1.64 42	0.55 14	0.81 21	M10 x 1.50	4.02 102	44.7 20.3
	6.500 165.1	13.00 329	9.00 228	2.88 73	8.00 203	6.38 161	3.13 79	1.98 50	0.67 17	1.02 26	M10 x 1.50	4.02 102	89.0 40.5
6 DN150	6.625 168.3	13.00 329	9.00 228	2.88 73	8.00 203	6.38 162	3.13 79	1.98 50	0.67 17	1.02 26	M10 x 1.50	4.02 102	89.0 40.5

5.0 PERFORMANCE

Maximum Working Pressure

Valve Size		Maximum Working Pressure psi kPa
Nominal inches DN	Actual Outside Diameter inches mm	
1 ½ – 3 DN40 – DN80	1.900 – 3.500 48.3 – 88.9	1000 6895
4 – 6 DN100 – DN150	4.500 – 6.625 114.3 – 168.3	800 5516

5.1 PERFORMANCE

Flow Characteristics

C_v values for flow of water at +60°F/+16°C are shown in the tables below.

Formulas for C_v values

$$\Delta P = \frac{Q^2}{C_v^2}$$

$$Q = C_v \times \sqrt{\Delta P}$$

Where:

Q = Flow (GPM)

ΔP = Pressure Drop (psi)

C_v = Flow Coefficient

Valve Size		Flow Coefficient
Nominal inches DN	Actual Outside Diameter inches mm	Full Open C _v K _v
1 ½ DN40	1.900 48.3	130 112
2 DN50	2.375 60.3	180 156
2 ½	2.875 73.0	340 294
DN65	3.000 76.1	340 294
3 DN80	3.500 88.9	600 519
4 DN100	4.500 114.3	650 562
	6.500 165.1	800 692
6 DN150	6.625 168.3	800 692

5.2 PERFORMANCE

Torque Requirements

The following chart details required torque to operate Victaulic Series 726 Ball Valves under varied working pressure conditions. This chart may be used to determine optional gear operator or remote electric or pneumatic actuator requirement. Contact Victaulic for specific operator/actuator recommendations.

These torque values were derived from test data in water at ambient temperature. All torque values are for normal service conditions where corrosion is expected to be minor, and the media is clean and non abrasive. The torque shown on the chart should be multiplied by the appropriate factor listed below.

Breakaway Factor:

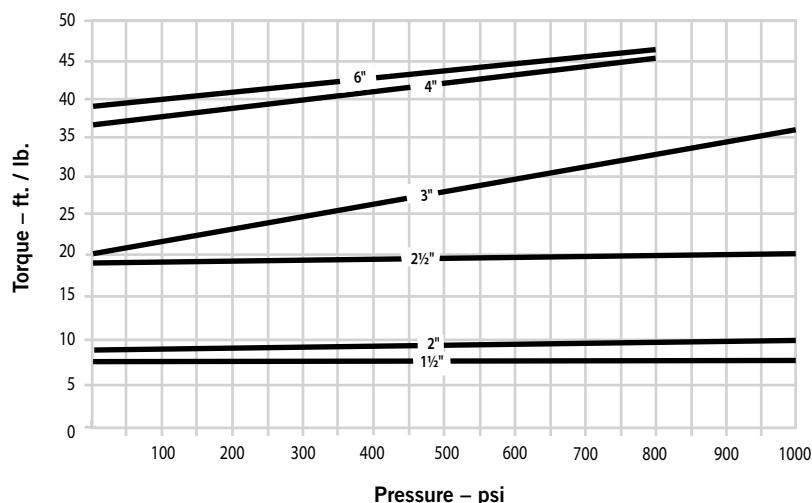
Ball valves will require additional breakaway torque if they are not continuously operated. A breakaway factor of between 2:1 and 3:1 should be applied to break the ball loose after being in a static condition for more than a few hours.

Typical fluid torque factors commonly used in the industry are:

- Water and other liquids – 1.0
- Dry gasses – 1.5 – 2.0

Actuation Factor:

A minimum factor of 1.2 is recommended for directly actuated valves and 1.5 for 3-way assemblies. Apply the actuation factor to the higher of the breakaway or service factor.



5.3 PERFORMANCE

Series 726 Valve Numbering System

B - 020 - 1 1 6 6 - 16							
Type	Actual OD in/mm	Size Code	Pressure Rating	Body	Ball & Stem	Seat	Operator
B	1.900/48.3	014	1 - 1,000 psi ²	1 - Iron ⁴	2 - 316 Stainless Steel	6 - Reinforced Teflon	00 - Bare
	2.375/60.3	020	8 - 800 psi ³	9 - Special ¹	3 - 316 Stainless steel with vented ball	9 - Special ¹	16 - 2-Position Handle (Standard Trim) with Tamper-Proof Locking Device
	2.875/73.0	024			6 - Chrome Plated Carbon Steel		18 - 2-Position Handle (Standard Trim) with Stem Extension and Tamper-Proof Locking Device
	3.000/76.1	761			9 - Special ¹		19 - Locking Device - Without Handle
	3.500/88.9	030					20 - Gear Operator
	4.500/114.3	040					21 - Gear Operator with Memory Stop
	6.500/165.1	165					22 - Gear Operator with Chainwheel
	6.625/168.3	060					23 - Gear Operator with AWWA Square Nut
							26 - 2-Position Handle (Stainless Trim) with Tamper-Proof Locking Device
							28 - 2-Position Handle (Stainless Trim) with Stem Extension and Tamper-Proof Locking Device
							29 - Non-standard Gear Operator ¹

NOTES:

(1) Details required.

(2) For sizes 1½" / 48.3mm thru 3" / 88.9mm

(3) For sizes 4" / 114.3mm thru 6" / 168.3mm

(4) All iron body valves are AMPP (NACE) compliant

(•) For stainless steel Series 726S, request publication 17.22

6.0 NOTIFICATIONS



**WARNING**

- Read and understand all instructions before attempting to install any Victaulic products.
- Always verify that the piping system has been completely depressurized and drained immediately prior to installation, removal, adjustment, or maintenance of any Victaulic products.
- Confirm that any equipment, branch lines, or sections of piping that may have been isolated for/during testing or due to valve closures/positioning are identified, depressurized, and drained immediately prior to installation, removal, adjustment, or maintenance of any Victaulic products.
- Wear safety glasses, hardhat, foot protection, and hearing protection.

Failure to follow these instructions could result in death or serious personal injury and property damage.

7.0 REFERENCE MATERIALS

- [17.22: Stainless Steel Ball Valve Series 726S](#)
- [26.01: Victaulic Design Data](#)
- [29.01: Victaulic Terms and Conditions of Sale](#)
- [I-100: Victaulic Field Installation Handbook](#)
- [I-ENDCAP: Victaulic End Cap Installation Instructions](#)

User Responsibility for Product Selection and Suitability

Each user bears final responsibility for determining the suitability of Victaulic products for their end-use application, in accordance with industry standards, project specifications, and Victaulic’s published performance, maintenance, and safety data, as well as all warnings and installation instructions. Nothing in this or any other document, nor any verbal recommendation, advice, or opinion from any Victaulic employee, shall be deemed to alter, vary, supersede, or waive any provision of Victaulic Company’s standard conditions of sale, warranty, installation instructions, or this disclaimer.

Installation

Always refer to and follow the [Victaulic Installation Handbook](#) or installation instructions for the product you are installing. Handbooks are included with each shipment of Victaulic products, providing complete installation and assembly data, and are available in PDF format on our website at [victaulic.com](#).

Warranty

Refer to the Warranty section of the current Price List or contact Victaulic for details.

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Note

All products bearing a Victaulic trademark are manufactured by Victaulic or to Victaulic specifications. All products are to be installed only in accordance with the applicable Victaulic installation instructions. Victaulic reserves the right to change product specifications, designs and standard equipment without notice and without incurring obligations.