

CONTROL VALVE

Plunger Valve

REF **EFC-371** ISSUED 11 Jun 2026

SPECIFICATIONS

Size	DN50–DN600
Pressure	PN16–PN25
End connection	flanged (EN 1092-2)

STANDARDS

Design	EN 1074-5
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APPROVALS & CERTIFICATIONS

- ISO 9001

COATINGS & LINING

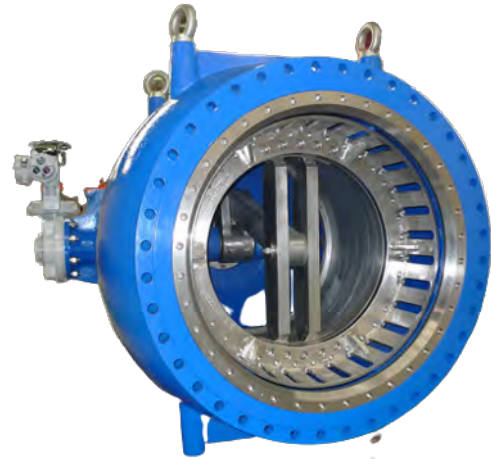
- Rubber lined

APPLICATIONS

- Energy dissipation
- Reservoir inlet regulation
- Throttling service
- Turbine bypass

FEATURES

- The plunger valve is a globe-body throttling valve for precise flow regulation and energy dissipation in pipeline systems
- The streamlined plunger element provides a characterised flow curve, making it suitable for constant throttling duty where butterfly and gate valves would suffer cavitation or excessive wear
- Used downstream of pressure reducing stations, at reservoir inlets and for turbine bypass on hydroelectric schemes



PRESSURE-TEMPERATURE RATING

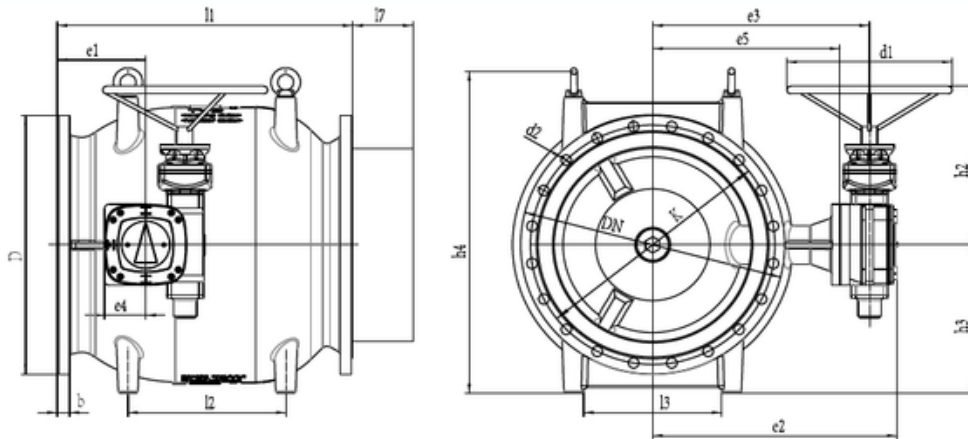
CLASS	TEMPERATURE	MAX PRESSURE
PN40, DN100-1200	50°C	40 bar
PN25, DN100-1600	50°C	25 bar
PN16, DN100-2000	50°C	16 bar
PN10, DN100-2000	50°C	10 bar

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SECTION Technical drawing 1 REF EFC-371

Size:



PN10

DN	unit	300	400	450	500	600	700	800	900	1000	1200	1400	1600	1800	2000
D	[mm]	445	565	615	670	780	895	1015	1115	1230	1455	1915	1915	2115	2325
b	[mm]	24.5	28	30	31.5	36	39.5	43	46.5	50	57	50	50	75	80
d1	[mm]	250	250	250	400	400	400	400	400	400	400	400	400	500	500
d2	[mm]	23	28	28	28	31	31	34	34	37	41	50	50	50	50
e1	[mm]	160	170	150	175	280	315	400	420	460	560	650	725	900	900
e2	[mm]	403	518	518	629	645	800	797	880	1016	1136	1335	1609	1865	1930
e3	[mm]	345	467	467	550	575	725	725	800	898	1040	1205	1490	1705	1735
e4	[mm]	63	80	80	100	100	125	125	160	160	200	250	250	340	430
e5	[mm]	300	410	410	475	500	650	650	725	800	950	1100	1350	1560	1560
h2	[mm]	265	268	268	439	449	454	454	520	520	600	725	705	985	1066
h3	[mm]	260	335	345	385	460	520	600	650	720	850	1000	1200	1280	1400
h4	[mm]	573	741	761	841	1010	1150	1309	1428	1568	1828	2200	2608	2858	3120
k	[mm]	400	515	565	620	725	840	950	1050	1160	1380	1820	1820	2020	2230
l1	[mm]	500	600	650	750	900	1050	1200	1350	1500	1800	2100	2500	2700	3000
l2	[mm]	230	300	350	400	500	560	600	700	750	800	1000	1200	1500	1600
l3	[mm]	230	300	350	400	500	560	600	700	750	800	1000	1200	1500	1600
l7	[mm]	94	127	144	153	150	194	244	275	291.5	363	480	480	658	723
holes		12	16	20	20	20	24	24	28	28	32	40	40	44	48
weight	kg	170	305	350	540	940	1500	1900	2500	3640	4900	8835	17000	20000	25500
volume	m3	0.2	0.4	0.45	0.7	1	1.08	2.2	3	4.1	5.1	6.1	9.9	12.8	16.6

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SECTION Dimensions per size REF EFC-371

SIZE	D	B	D1	D2	E1	E2	E3	E4	E5	H2	H3	H4	K	L1	L2	L3	L7	WEIGHT
DN300	445	24.5	250	23	160	403	345	63	300	265	260	573	400	500	230	230	94	170 kg
DN400	565	28	250	28	170	518	467	80	410	268	335	741	515	600	300	300	127	305 kg
DN450	615	30	250	28	150	518	467	80	410	268	345	761	565	650	350	350	144	350 kg
DN500	670	31.5	400	28	175	629	550	100	475	439	385	841	620	750	400	400	153	540 kg
DN600	780	36	400	31	280	645	575	100	500	449	460	1010	725	900	500	500	150	940 kg
DN700	895	39.5	400	31	315	800	725	125	650	454	520	1150	840	1050	560	560	194	1500 kg
DN800	1015	43	400	34	400	797	725	125	650	454	600	1309	950	1200	600	600	244	1900 kg
DN900	1115	46.5	400	34	420	880	800	160	725	520	650	1428	1050	1350	700	700	275	2500 kg
DN1000	1230	50	400	37	460	1016	898	160	800	520	720	1568	1160	1500	750	750	291.5	3640 kg
DN1200	1455	57	400	41	560	1136	1040	200	950	600	850	1828	1380	1800	800	800	363	4900 kg
DN1400	1915	50	400	50	650	1335	1205	250	1100	725	1000	2200	1820	2100	1000	1000	480	8835 kg
DN1600	1915	50	400	50	725	1609	1490	250	1350	705	1200	2608	1820	2500	1200	1200	480	17000 kg
DN1800	2115	75	500	50	900	1865	1705	340	1560	985	1280	2858	2020	2700	1500	1500	658	20000 kg
DN2000	2325	80	500	50	900	1930	1735	430	1560	1066	1400	3120	2230	3000	1600	1600	723	25500 kg

All dimensions in millimetres unless stated otherwise. Values are nominal; tolerances confirmed at quote.