



GOE-418
Stainless Steel
Side Discharge
Overflow & Pressure
Control Valve
For Air, Oil, Steam & Water*
Standard Capacity
BSPF Female Threaded



The GOE-418 is a compact overflow and pressure control valve designed for pump protection and bypass control applications with low to medium capacities.

User pressure adjustment is achievable on site or these valves can be set to your requirements before despatch.

Features, Benefits & Approvals

- Lloyds, DNV, BV type approved**
- ABS & GL type approved**
- Suitable for low to medium capacities
- Side discharge
- Gastight spring housing dome
- Set, tested and certified prior to despatch
- User adjustable if necessary

Pressure & Temperature

Pressure range:-

0.2 to 30 bar
(EPDM, NBR & FKM discs)

0.5 to 30 bar
(PTFE disc only)

Temperature range:-

PTFE Disc: -60°C to 225°C

NBR Disc: -30°C to 130°C

FKM Disc: -20°C to 200°C

EPDM Disc: -50°C to 150°C

DN (G)	10 (3/8")	15 (1/2")	20 (3/4")	25 (1")	32 (1 1/4")
L	34	34	40	50	50
H	73	73	84	98	98
h	33	33	36	48	48
do	10	14	16	25	25
Weight Kg	0.5	0.5	0.8	1.8	1.9
Range of Adjustment	0.2 - 1.2 bar • 1.2 - 3.0 bar • 2 - 12 bar • 12 - 30 bar** (Specify when ordering)				

Materials	
Inlet Body & Internal Parts	Stainless Steel (316L)
Outlet Body	Stainless Steel (CF8M)
Spring	Stainless Steel (316L)
Disc	PTFE (standard) • NBR • FKM • EPDM

* Dependent on version, please check compatibility ** On request, PTFE seals only

GOE-418

Capacity Charts/Sizing

Kv VALUES AIR (Nm³/h) @ 1 bar overpressure

Set Pressure (bar)	DN10	DN15	DN20	DN25	DN32
0.2	87	107	151	348	426
0.7	106	119	166	402	457
1.2 ⁽¹⁾	113 (81)	126 (92)	182 (123)	431 (381)	460 (386)
2 ⁽²⁾	96 (47)	107 (47)	139 (88)	398 (179)	441 (187)
3 ⁽³⁾	99 (51)	115 (54)	150 (97)	372 (212)	477 (229)
4	56	63	102	244	278
6	65	81	124	308	326
8	77	103	136	319	369
10	94	112	148	346	413
12 ⁽⁴⁾	108 (81)	122 (61)	159 (114)	363 (142)	448 (167)
14	74	78	121	187	220
16	62	97	129	223	252
18	48	114	136	234	267
20	29	34	144	247	283
22	16	<1	115	258	328
24	6	<1	87	270	359
26	<1	<1	36	287	381
28	<1	<1	20	310	401
30	<1	<1	4	336	412

Kv VALUES WATER (m³/h) @ 1 bar overpressure

Set Pressure (bar)	DN10	DN15	DN20	DN25	DN32
0.2	2.9	3.4	4.7	10.3	12.1
0.7	3.0	3.7	5.4	11.6	14.2
1.2 ⁽¹⁾	3.2 (2.3)	3.8 (2.8)	5.8 (3.5)	11.2 (9.4)	14.5 (10.3)
2	2.6	2.4	3.4	9.8	10.9
3 ⁽³⁾	2.6 (1.2)	2.1 (1.4)	2.8 (1.7)	8.5 (4.3)	12.0 (4.3)
4	1.2	1.4	1.6	4.3	4.4
6	1.1	1.5	1.4	4.5	4.6
8	1.0	1.3	1.0	4.9	4.8
10	0.7	1.1	0.7	5.6	5.2
12 ⁽⁴⁾	0.4 (0.7)	0.8 (0.7)	0.6 (0.4)	4.8 (1.9)	6.5 (2.1)
14	0.6	0.6	0.7	1.9	2.7
16	0.6	0.5	0.9	2.0	3.2
18	0.5	0.5	1.1	2.4	2.2
20	0.4	0.4	0.7	1.3	1.7
22	0.3	0.4	0.5	0.9	1.3
24	0.2	0.3	0.3	0.7	1.0
26	0.2	0.2	0.2	0.5	0.6
28	0.1	0.1	0.1	0.3	0.4
30	0.1	0.1	0.1	0.1	0.2

Kv VALUES STEAM (kg/h) @ 1 bar overpressure

Set Pressure (bar)	DN10	DN15	DN20	DN25	DN32
0.2	62.0	76.3	107.7	248.1	303.7
0.7	74.7	83.9	117.0	283.3	322.0
1.2 ⁽¹⁾	76.3 (56.9)	88.5 (64.6)	127.8 (86.4)	302.6 (267.5)	322.9 (271.0)
2 ⁽²⁾	67.0	74.7	97.0	277.8	307.8
3 ⁽³⁾	68.7 (35.4)	79.8 (37.5)	104.1 (67.3)	258.3 (147.2)	331.2 (159.0)
4	38.8	43.6	70.6	169.0	192.5
6	44.7	55.7	85.2	211.6	224.0
8	52.6	70.4	93.0	218.0	252.2
10	63.9	76.2	100.6	235.3	280.8
12 ⁽⁴⁾	73.1 (54.9)	82.6 (41.3)	107.7 (77.2)	245.8 (96.2)	303.4 (113.1)
14	50.1	52.8	81.9	126.5	148.8
16	41.8	65.4	87.0	150.3	169.9
18	32.3	52.5	91.6	157.6	179.8
20	19.5	8.1	96.9	166.3	190.5
22	10.8	<1	77.4	173.6	220.7
24	4.0	<1	58.5	181.6	241.4
26	<1	<1	24.2	192.9	256.1
28	<1	<1	13.4	208.2	269.4
30	<1	<1	2.7	225.6	276.6

(1) Figures in brackets are with spring range 0.2 - 1.2 bar

(2) Figures in brackets are with spring range 1.2 - 3 bar

(3) Figures in brackets are with spring range 2 - 12 bar

(4) Figures in brackets are with spring range 12 - 30 bar