

Safety Valves

Type 06127



Safety Valves, angle type, stainless steel type tested, TÜV-SV.577. D/G/F

Standard safety valve
metal to metal seated, with lifting device,
closed bonnet
Flanged connection acc. to DIN EN 1092-1 PN40

Part No. 06127.X.0000

Available options - on request only:

- Disc with soft sealing
- Extended pressure and temperature ranges

Applications:

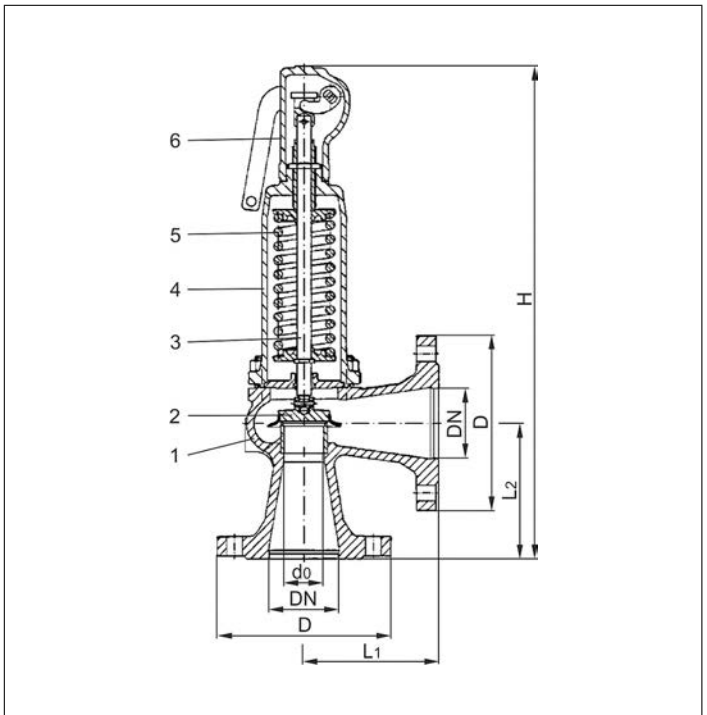
Provided as safety device for protection against excessive pressure in pressure vessels.

Approved for gases, vapours and fluids.

Working temperatures: -270°C / -454°F (3K) up to +450°C / +842°F (723K)



Materials	DIN EN	ASTM
1 Body	1.4408	A 351 CF 8M
2 Disc	1.4404	A 276 Grade 316L
3 Stem	1.4404	A 276 Grade 316L
4 Spring	1.4310	A 313 Grade 301
5 Bonnet	1.4408	A 351 CF 8M
6 Lifting device	1.4408	A 351 CF 8M



Essential: Valves are delivered at a set pressure, therefore when ordering please confirm set pressure, medium and temperature.

Standard marking acc. to Pressure Equipment Directive 97/23/EC (PED).



Type 06127	Technical data										
Nominal size	DN	15	20	25	32	40	50	65	80	100	125
Orifice	d ₀	12	18	18	18	23	29	37	46	60	74
Dimension code	.X.	0150	0200	0250	0320	0400	0500	0650	0800	1000	1250
Set pressure	bar	0.2-40	0.2-40	0.2-40	0.2-40	0.2-40	0.2-40	0.2-40	0.2-34	0.2-32	0.2-32
Flange diameter	D	95	105	115	140	150	165	185	200	235	270
Height	H	310	315	320	325	335	360	475	530	605	745
Length	L ₁	90	95	100	105	115	125	145	155	175	200
Length	L ₂	90	95	100	105	115	125	145	155	175	200
Weight	ca. kg	5.0	6.0	6.0	8.0	9.0	12.0	15.0	20.0	33.0	48.0
Coeff. of discharge gases, vapours	α _w	0.62	0.29	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Coeff. of discharge fluids	α _w	0.48	0.19	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25

Dimensions in mm.



Discharge capacities

Calculation of mass flow acc. to AD2000-Merkblatt A2

Medium:

A = Saturated steam in kg/h

B = Air in m³/h at 0°C and 1013.25 mbar

C = Water in kg/h at 20°C

The capacity indicated below is for a fully opened valve.

d₀ - orifice

A₀ - flow area

Set pressure in bar (g)	DN	15			20			25 & 32			40			50		
	d ₀ (mm)	12			18			18			23			29		
	A ₀ (mm ²)	113.1			254.5			254.5			415.5			660.6		
	Medium	A	B	C	A	B	C	A	B	C	A	B	C	A	B	C
0.2	-	-	-	-	-	-	34	39	1770	55	63	2890	88	101	4600	
0.5	55	67	2140	30	35	1900	63	74	2510	102	120	4090	163	191	6510	
1.0	78	93	2900	67	80	2580	101	121	3390	165	197	5540	263	313	8810	
2.0	125	151	4100	129	156	3650	170	206	4800	278	336	7840	442	534	12500	
3.0	168	206	5020	177	217	4470	232	284	5880	379	463	9600	603	737	15300	
4.0	210	258	5790	221	272	5160	290	356	6790	473	582	11100	752	925	17600	
5.0	251	311	6480	265	327	5770	347	429	7590	566	700	12400	900	1113	19700	
6.0	293	363	7090	308	382	6320	404	501	8310	659	818	13600	1048	1301	21600	
7.0	333	416	7660	350	438	6820	459	574	8980	750	936	14700	1192	1489	23300	
8.0	374	468	8190	394	493	7300	516	646	9600	842	1055	15700	1339	1677	24900	
9.0	415	521	8690	437	548	7740	572	718	10200	934	1173	16600	1485	1865	26400	
10.0	456	573	9160	480	604	8160	629	791	10700	1026	1291	17500	1632	2053	27900	
12.0	538	679	10000	566	714	8930	741	936	11800	1210	1528	19200	1924	2429	30500	
16.0	699	889	11600	736	935	10300	964	1225	13600	1574	2001	22200	2503	3181	35200	
20.0	863	1099	13000	908	1156	11500	1190	1515	15200	1942	2474	24800	3088	3933	39400	
24.0	1024	1309	14200	1078	1377	12600	1412	1805	16600	2306	2947	27100	3665	4685	43200	
28.0	1189	1519	15300	1251	1599	13600	1639	2095	18000	2676	3420	29300	4254	5437	46600	
32.0	1354	1729	16400	1425	1820	14600	1867	2384	19200	3049	3893	31300	4847	6189	49800	
34.0	-	1834	16900	-	1930	15000	-	2529	19800	-	4130	32300	-	6565	51400	
36.0	-	1939	17400	-	2041	15500	-	2674	20400	-	4366	33200	-	6941	52900	
40.0	-	2149	18300	-	2262	16300	-	2964	21500	-	4839	35000	-	7693	55700	

Set pressure in bar (g)	DN	65			80			100			125		
	d ₀ (mm)	37			46			60			74		
	A ₀ (mm ²)	1075.3			1662.1			2827.8			4300.7		
	Medium	A	B	C	A	B	C	A	B	C	A	B	C
0.2	142	165	7500	220	255	11600	375	431	19700	570	660	30000	
0.5	265	311	10600	410	481	16400	697	819	27800	1060	1245	42400	
1.0	428	510	14300	661	788	22200	1125	1341	37700	1711	2039	57400	
2.0	720	870	20300	1113	1344	31300	1893	2287	53300	2880	3478	81100	
3.0	981	1199	24800	1517	1854	38400	2581	3153	65300	3926	4797	99300	
4.0	1224	1505	28700	1892	2327	44300	3218	3958	75400	4895	6021	115000	
5.0	1465	1811	32100	2265	2800	49600	3853	4763	84300	5861	7245	128000	
6.0	1706	2117	35100	2636	3273	54300	4485	5568	92400	6823	8469	140000	
7.0	1940	2423	37900	2999	3746	58600	5102	6373	99800	7761	9694	152000	
8.0	2179	2729	40600	3368	4219	62700	5730	7177	107000	8717	10918	162000	
9.0	2418	3035	43000	3737	4692	66500	6358	7982	113000	9671	12142	172000	
10.0	2656	3342	45300	4105	5165	70100	6984	8787	119000	10624	13366	181000	
12.0	3132	3954	49700	4842	6111	76800	8237	10397	131000	12530	15815	199000	
16.0	4074	5178	57400	6297	8003	88700	10714	13616	151000	16296	20711	229000	
20.0	5027	6402	64100	7770	9895	99100	13218	16835	169000	20107	25608	257000	
24.0	5967	7626	70200	9222	11788	109000	15690	20055	185000	23866	30505	281000	
28.0	6925	8851	75900	10704	13680	117000	18211	23274	200000	-	35402	304000	
32.0	7890	10075	81100	12195	15572	125000	20748	-	-	-	40299	324000	
34.0	-	10687	83600	-	16518	129000	-	-	-	-	-	-	
36.0	-	11299	86000	-	-	-	-	-	-	-	-	-	
40.0	-	12523	90700	-	-	-	-	-	-	-	-	-	