

PRESSURE RELIEF VALVE

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SV 811 4.5 up to 45.0 bar

Spring loaded, direct acting pressure relief valve for hydrogen-powered motor vehicles according to the European Regulation (EC) No. 79/2009, as implemented by Regulation (EC) No. 406/2010.

Benefits

- type-approval from Federal Motor Transport Authority according to Regulation (EC) 79/2009 and (EC) 406/2010
- individual opening pressure from 4.5 up to 45.0 bar
- TÜV-certification of pressure setting
- stainless steel 1.4404
- compact size for easy, problem free installation
- range of inlet connections
- adapter for connection to ventilation pipe

Approvals

Manufactured and certified according to Commission Regulation (EU) No. 406/2010 Annex IV, Part 3

Company certified according to ISO 9001:2000, ISO 14001 and PED 97/23/EC Module H

CE-marked according to:

- PED 97/23/EC
- type-approval from Federal Motor Transport Authority

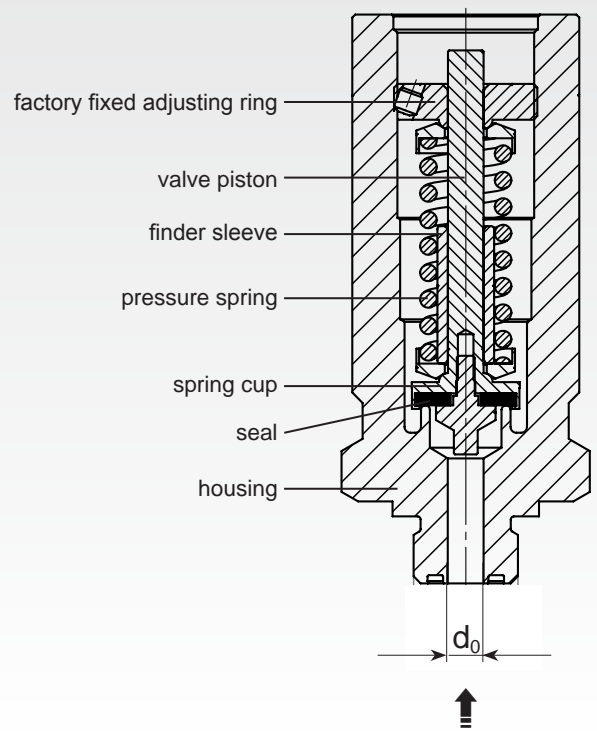
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Other models, options and accessories available on request.



Product Information

	SV811 type 1	SV811 type 2
Type-approval	no type-approval is required according to Regulation (EC) No. 79/2009 Appendix I b	e1 00 0006
Opening pressure	4.5 up to ≤ 25.0 bar	>25.0 up to 45.0 bar
Gases	hydrogen	
Material	housing and metal turned parts made of stainless steel 1.4404, pressure spring made of stainless steel 1.4310, valve seal EPDM	
Width across flats	36 mm	
Weight	approx. 520 g	
Drill hole (d₀)	see table	
Temperature range	-40 °C/-40 °F up to max. +85 °C/+185 °F	
Adapter	for connection to ventilation pipe at the outlet	



D01/F1 subject to change

Technical Data

PRESSURE RELIEF VALVE
Flow capacity for hydrogen at 23 °C / 73.4 °F (valid only for atmospheric back pressure)
SV811 type 1

Opening pressure	[bar]	4.5	5	6	7	8	9	10	11	12	13	14
Volume flow	[m ³ /h]	194	216	259	302	345	388	431	474	517	560	603
Opening pressure	[bar]	15	16	17	18	19	20	21	22	23	24	25
Volume flow	[m ³ /h]	646	689	732	914	964	1015	1065	1116	1166	1216	1267

SV811 type 2

Opening pressure	[bar]	26	27	28	29	30	31	32	33	34	35	36
Volume flow	[m ³ /h]	1312	1362	1412	1462	1512	1562	1612	1662	1712	1762	1812
Opening pressure	[bar]	37	38	39	40	41	42	43	44	45		
Volume flow	[m ³ /h]	1862	1912	1962	2011	2161	2211	2261	2210	2260		

Type / Variants / Versions

Overall length [mm]	Inlet male thread (M)	Outlet female thread (F)	Drill hole d ₀ [mm]	
			type 1	type 2
95.2	11/16-16 UNF-2A	M24 x 1	6.0	6.5
96.0	9/16-18 UNF-2A			
96.5	G 1/4; 1/4" NPT G 3/8; 3/8" NPT M16 x 1.5			
96.8	13/16-16 UNF-2A			
101.5	G 1/2; 1/2" NPT G 3/4; 3/4" NPT M20 x 1.5			