

PRESSURE RELIEF VALVE SV 811L

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 and PED 2014/68/EU Module H

CE-marked according to:

- PED 2014/68/EU

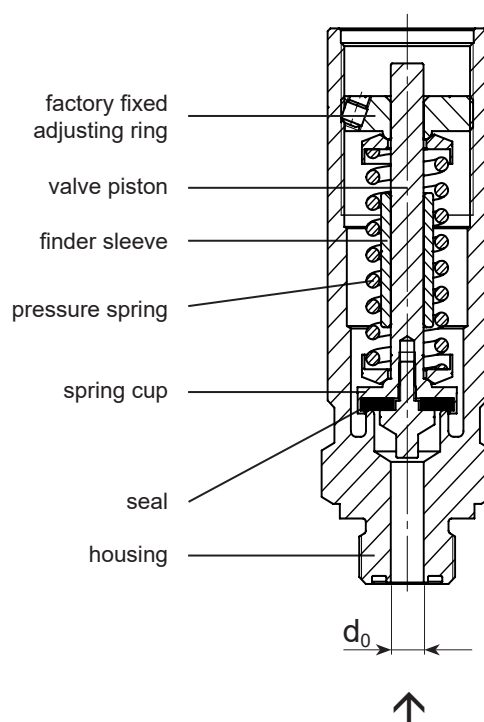
- type-approval from Federal Motor Transport Authority

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	SV811L
Type-approval	<p>< 30 bar no type-approval is required according to Regulation (EC) No. 79/2009 Appendix I b</p> <hr/> <p>> 30 bar e1 00 0006</p>
Opening pressure	4.5 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	27 mm
Weight	approx. 360 g
Drill hole (d₀)	6.0 mm
Temperature range	-40 °C/-40 °F up to max. +85 °C/+185 °F
Adapter	for connection to ventilation pipe at the outlet
Burst pressure of housing	<p>900 bar</p> <hr/> <p>heavy duty version (Model SV811) 1 600 bar</p>



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Flow capacity for hydrogen at 23 °C / 73.4 °F (valid only for atmospheric back pressure)

SV811L

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	1 015	1 065	1 116	1 166	1 216	1 267
Opening pressure [bar]	26	27	28	29	30	31	32	33	34	35	36
Volume flow [m ³ /h]	1 312	1 362	1 412	1 462	1 512	1 562	1 612	1 662	1 712	1 762	1 812
Opening pressure [bar]	37	38	39	40	41	42	43	44	45		
Volume flow [m ³ /h]	1 862	1 912	1 962	2 011	2 161	2 211	2 261	2 210	2 260		

Type / Variants / Versions

Overall length [mm]	Inlet male thread (M)	Outlet female thread (F)	Drill hole d ₀ [mm]
SV811L			SV811L
95.2	11/16-16 UNF-2A	M24 x 1	6.0
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		

We recommend to check once a year whether the pressure relief valve still opens at the required response pressure (opening pressure) and is tight closed afterwards.

Service life is 3 years.