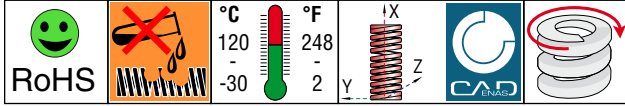
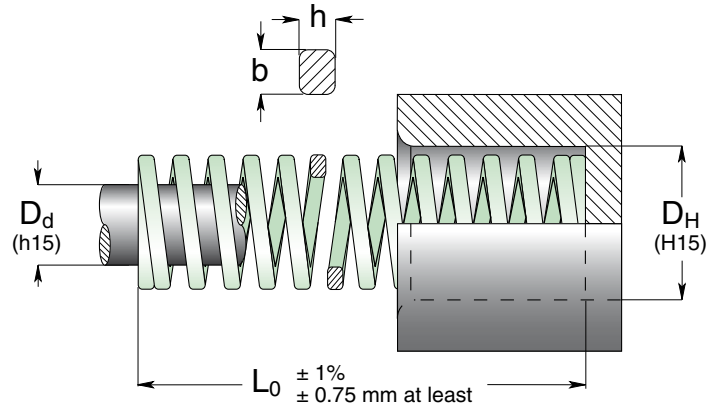


- IT** Molle carico extra-leggero
- EN** Extra-light load springs
- DE** Federn für leichte Spannung
- FR** Ressorts charge extra-légère
- ES** Muelles carga extra-ligera
- PT** Molas carga extra-leve






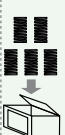


Code	D _H D _d		L ₀	R	A		B		C		D		E	Pcs
	Hole Diameter	Rod Diameter			Free Length	Spring Constant	30% L ₀	40% L ₀	45% L ₀	50% L ₀	do not use			
b x h		mm	mm	mm	N/mm	mm	mm	mm	mm	mm	mm	mm	mm	
VL 20 - 025	20	10	25	29.4	7.5	221	10.0	294	11.3	331	12.5	368	13.9	50
VL 20 - 032			32	22.6	9.6	217	12.8	289	14.4	325	16.0	362	18.2	50
VL 20 - 038			38	18.6	11.4	212	15.2	283	17.1	318	19.0	353	22.0	25
VL 20 - 044			44	15.7	13.2	207	17.6	276	19.8	311	22.0	345	25.8	25
VL 20 - 051			51	13.7	15.3	210	20.4	279	23.0	314	25.5	349	30.3	25
VL 20 - 064			64	11.3	19.2	217	25.6	289	28.8	325	32.0	362	38.9	25
VL 20 - 076			76	9.8	22.8	223	30.4	298	34.2	335	38.0	372	47.0	25
VL 20 - 089			89	8.3	26.7	222	35.6	295	40.1	332	44.5	369	55.7	20
VL 20 - 102			102	7.4	30.6	226	40.8	302	45.9	340	51.0	377	64.2	20
VL 20 - 115			115	6.4	34.5	221	46.0	294	51.8	331	57.5	368	72.9	10
VL 20 - 127			127	5.9	38.1	225	50.8	300	57.2	337	63.5	375	80.7	10
VL 20 - 139			139	5.4	41.7	225	55.6	300	62.6	338	69.5	375	88.4	10
VL 20 - 152			152	4.9	45.6	223	60.8	298	68.4	335	76.0	372	96.7	10
VL 20 - 305			4.3 x 1.7	305	2.5	91.5	229	122	305	137	343	153	381	196
VL 25 - 025	25	12.5	25	53.9	7.5	404	10.0	539	11.3	606	12.5	674	12.9	50
VL 25 - 032			32	42.2	9.6	405	12.8	540	14.4	608	16.0	675	17.2	25
VL 25 - 038			38	35.8	11.4	408	15.2	544	17.1	612	19.0	680	20.7	25
VL 25 - 044			44	31.4	13.2	414	17.6	553	19.8	622	22.0	691	24.4	25
VL 25 - 051			51	27.0	15.3	413	20.4	551	23.0	620	25.5	689	28.5	25
VL 25 - 064			64	21.6	19.2	415	25.6	553	28.8	622	32.0	691	36.5	25
VL 25 - 076			76	18.1	22.8	413	30.4	550	34.2	619	38.0	688	43.9	20
VL 25 - 089			89	15.2	26.7	406	35.6	541	40.1	609	44.5	676	51.4	20
VL 25 - 102			102	13.2	30.6	404	40.8	539	45.9	606	51.0	673	59.3	20
VL 25 - 115			115	11.8	34.5	407	46.0	543	51.8	611	57.5	679	67.2	10
VL 25 - 127			127	10.6	38.1	404	50.8	538	57.2	606	63.5	673	74.4	10
VL 25 - 139			139	9.6	41.7	400	55.6	534	62.6	600	69.5	667	81.6	10
VL 25 - 152			152	8.8	45.6	401	60.8	535	68.4	602	76.0	669	89.5	10
VL 25 - 178			178	7.6	53.4	406	71.2	541	80.1	609	89.0	676	105	10
VL 25 - 203	203	6.7	60.9	408	81.2	544	91.4	612	102	680	121	10		
VL 25 - 305	5.4 x 2.2	305	4.4	91.5	403	122	537	137	604	153	671	182	5	
VL 32 - 038	32	16	38	43.1	11.4	491	15.2	655	17.1	737	19.0	819	19.9	20
VL 32 - 044			44	37.3	13.2	492	17.6	656	19.8	739	22.0	821	23.5	20
VL 32 - 051			51	32.4	15.3	496	20.4	661	23.0	744	25.5	826	27.6	20
VL 32 - 064			64	25.5	19.2	490	25.6	653	28.8	734	32.0	816	35.2	20
VL 32 - 076			76	21.6	22.8	492	30.4	657	34.2	739	38.0	821	42.4	20
VL 32 - 089			89	18.1	26.7	483	35.6	644	40.1	725	44.5	805	50.0	10
VL 32 - 102			102	15.7	30.6	480	40.8	641	45.9	721	51.0	801	57.6	10
VL 32 - 115			115	14.2	34.5	490	46.0	653	51.8	735	57.5	817	65.5	10
VL 32 - 127			127	12.7	38.1	484	50.8	645	57.2	726	63.5	806	72.5	10
VL 32 - 139			139	11.6	41.7	484	55.6	645	62.6	726	69.5	806	79.4	10
VL 32 - 152			152	10.6	45.6	483	60.8	644	68.4	725	76.0	806	87.3	10
VL 32 - 178			178	9.0	53.4	481	71.2	641	80.1	721	89.0	801	103	5
VL 32 - 203			203	7.8	60.9	475	81.2	633	91.4	713	102	792	118	5
VL 32 - 254			254	6.4	76.2	488	102	650	114	732	127	813	148	5
VL 32 - 305	6.5 x 2.6	305	5.3	91.5	485	122	647	137	727	153	808	178	5	



Special Springs Standard

SERIES VL

Code	D _H	D _d	L ₀	R		A		B		C		D		E		
	Hole Diameter	Rod Diameter	Free Length	Spring Constant	$\pm 10\%$	+ 3.000.000	$\sim 1.500.000$		300 - 500.000		100 - 200.000		do not use	approx.	Pcs	
	b x h															
	mm	mm	mm	N/mm	mm	N	mm	N	mm	N	mm	N	mm	N	mm	Pcs
VL 40 - 051	40	20	51	48.1	15.3	736	20.4	981	23.0	1104	25.5	1227	28.0	20		
VL 40 - 064			64	39.2	19.2	753	25.6	1004	28.8	1129	32.0	1254	36.2	10		
VL 40 - 076			76	33.3	22.8	759	30.4	1012	34.2	1139	38.0	1265	43.7	10		
VL 40 - 089			89	28.4	26.7	758	35.6	1011	40.1	1137	44.5	1264	51.7	10		
VL 40 - 102			102	24.5	30.6	750	40.8	1000	45.9	1125	51.0	1250	59.8	10		
VL 40 - 115			115	22.1	34.5	762	46.0	1017	51.8	1144	57.5	1271	67.9	10		
VL 40 - 127			127	19.6	38.1	747	50.8	996	57.2	1120	63.5	1245	75.2	5		
VL 40 - 139			139	17.7	41.7	738	55.6	984	62.6	1107	69.5	1230	82.4	5		
VL 40 - 152			152	16.2	45.6	739	60.8	985	68.4	1108	76.0	1231	90.6	5		
VL 40 - 178			178	13.7	53.4	732	71.2	975	80.1	1097	89.0	1219	106.5	5		
VL 40 - 203			203	12.3	60.9	749	81.2	999	91.4	1124	101.5	1248	122.2	5		
VL 40 - 254			254	9.8	76.2	747	101.6	996	114.3	1120	127.0	1245	153.6	2		
VL 40 - 305			8.0 x 3.4	305	8.3	91.5	759	122.0	1013	137.3	1139	152.5	1266	185.4	2	
VL 50 - 064			50	25	64	86.3	19.2	1657	25.6	2209	28.8	2485	32.0	2762	35.1	5
VL 50 - 076	76	70.6			22.8	1610	30.4	2146	34.2	2415	38.0	2683	42.2	5		
VL 50 - 089	89	59.8			26.7	1597	35.6	2129	40.1	2395	44.5	2661	50.3	5		
VL 50 - 102	102	52.0			30.6	1591	40.8	2122	45.9	2387	51.0	2652	58.4	5		
VL 50 - 115	115	46.1			34.5	1590	46.0	2121	51.8	2386	57.5	2651	66.1	5		
VL 50 - 127	127	42.2			38.1	1608	50.8	2144	57.2	2412	63.5	2680	73.8	5		
VL 50 - 139	139	38.2			41.7	1593	55.6	2124	62.6	2389	69.5	2655	80.9	5		
VL 50 - 152	152	34.3			45.6	1564	60.8	2085	68.4	2346	76.0	2607	89.0	2		
VL 50 - 178	178	29.4			53.4	1570	71.2	2093	80.1	2355	89.0	2617	105.3	2		
VL 50 - 203	203	25.5			60.9	1553	81.2	2071	91.4	2329	101.5	2588	120.6	2		
VL 50 - 254	254	20.6			76.2	1570	101.6	2093	114.3	2355	127.0	2616	152.2	2		
VL 50 - 305	10.5 x 4.1	305			17.2	91.5	1574	122.0	2098	137.3	2361	152.5	2623	183.7	2	

VL

