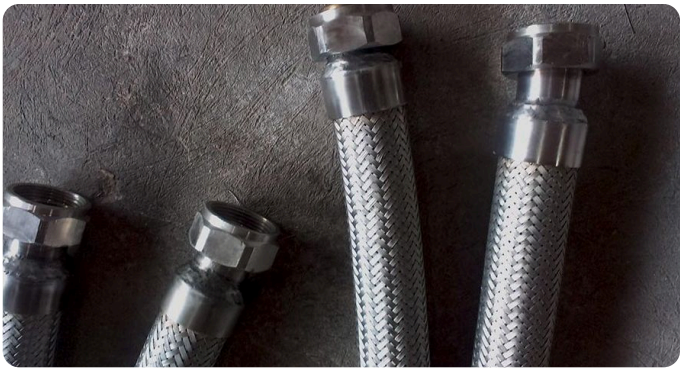
Weldon Industrial d.o.o.
Majevička 164, 76300 Bijeljina, Bosnia and Herzegovina
+387 66 395 698 · +387 65 222 957 · office@weldon-bn.com · weldon-bn.com

FLEXON-S flexible hoses

Corrugated hose with compressed parallel corrugations and a smaller bending radius.

Description	Corrugated metal hose of high-alloy stainless steel with compressed parallel corrugations and circular cross-section, hydraulically formed from a smooth longitudinally welded tube.
Material	AISI 316L (1.4404), AISI 321 (1.4541)
Wall thickness	0.15 mm to 0.60 mm
Sizes	DN 6 to DN 150 (inside diameter 6 – 150 mm)
Tightness	Absolutely leak-tight
Braid	Stainless steel wire AISI 304 (1.4301), 1–3 layers
End fittings	Flanges, threaded fittings, weld-on ends of stainless and carbon steel, cast iron and non-ferrous metals
Lengths	Up to 25 m in one piece, depending on size
Temperatures	Optimal resistance from –270 °C to +700 °C
Application	Conveying liquids and gases under pressure and vacuum, including corrosive media and atmospheres



FLEXON-S – technical data

DN	d (mm)	d1 (mm)	R_{min} static	R_{min} dynamic	Unbraided		1 braid		2 braids	
			mm	mm	P_w bar	P_t bar	P_w bar	P_t bar	P_w bar	P_t bar
6	6	9.4	19	100	4	6	100	150	160	240
10	10	14	29	115	4	6	90	135	144	216
12	12.9	17.2	34	124	3	4.5	80	120	128	192
20	19.8	27.5	53	170	2	3	64	96	102	153
25	26	34.4	64	195	2	3	50	75	80	120
32	32.3	42.5	79	225	1.5	2.3	40	60	64	96
40	40.6	51.5	98	255	1.5	2.3	30	45	48	72
50	50.8	64	120	295	1	1.5	28	42	44	66
65	65.1	82	150	345	1	1.5	24	36	38	57

DN	d (mm)	d1 (mm)	R_{min} static	R_{min} dynamic	Unbraided		1 braid		2 braids	
			mm	mm	P_w bar	P_t bar	P_w bar	P_t bar	P_w bar	P_t bar
80	80	97	180	390	1	1.5	18	27	28	42
100	99.8	119	218	450	0.8	1.2	16	24	26	39
125	125.2	148	255	650	0.6	0.9	12	18	20	30
150	149.7	173.5	290	815	0.6	0.9	10	15	16	24

d – inside diameter; d1 – outside diameter; R_{min} – minimum bending radius; P_w – maximum working pressure at 20 °C; P_t – test pressure.

Temperature correction factor K_t

The working pressure in the table is the maximum permissible pressure at room temperature. At higher temperatures it is calculated as:

$$P_{rt} = P_r \times K_t \text{ (bar)}$$

Temperature (°C)	-200	-150	-100	-50	0	20	50	100	150	200	250	300	350	400	450	500	550	600	650	700
K_t	1	1	1	1	1	1	0.95	0.83	0.75	0.69	0.65	0.61	0.58	0.56	0.54	0.53	0.52	0.34	0.19	0.1

Example: DN 50 hose with one braid, flow without shocks or vibration, temperature 300 °C: P_{wt} = 28 × 0.61 = 17.08 bar.

Ordering

When ordering please state: hose type, nominal size (DN), nominal length, type, size and material of the end fittings, medium, working pressure and working temperature.