

3.2 Technical data overview

Table 3-2: Technical data		
	Vacuum Pump V-700	Vacuum Pump V-710
Dimensions (W x H x D)	180 x 276 x 209	177 x 297 x 378
Weight	5.3 kg	10.4 kg
Connection voltage	100–240 V / 50/60 Hz	100–240 V / 50/60 Hz
Power consumption	210 W	370 W
Environmental conditions	For indoor use only 10–40 °C, up to 2000 m, maximum relative humidity 80% for temperatures up to 31 °C, and then linearly decreasing to 50% at 40 °C	
Ultimate vacuum (absolute)	< 10 mbar	2 mbar
Ultimate vacuum (with gas ballast)	24 mbar	8 mbar
Volume flow rate	1.8 m ³ /h	3.1 m ³ /h
Vacuum connection	GL-14	GL-14
Motor	brushless DC motor	brushless DC motor
Revolution speed	max. 1600 rpm min ⁻¹	max. 1600 rpm min ⁻¹
Sound level	40-52 dB dependent on operation mode	4-55 dB dependent on operation mode
Installation category	II	II
Pollution degree	2	2
Degree of protection	IP 34	IP 34
Noise level	< 70 dB	< 70 dB

3.3 Materials used

Table 3-3: Materials used		
Component	Material designation	Material code
Pump heads	Glass/PEEK	3.3
Housing	Aluminium	
Housing cover	PP (V-700); PUR (V-710)	
Diaphragms	PTFE / rubber	
Valve plate	PEEK	
Valve head	PEEK	
Vacuum tubes	FEP	
Gasket rings, valves	Rubber	
Check-valve O-rings	FFKM	