



SP 620 EC - SP 622 EC Brushless Dual Head

The pumps listed on this data sheet represent a cross-section of the large number of possibilities for each pump type. Based on our modular pump design, all pumps can be customised exactly to meet the needs of your application - within days and at standard pricing. Please contact us for details.



SP 620 EC-BL-DUp
parallel tubing



SP 620 EC-BL-DUs
serial tubing



SP 622 EC-BL-DUp
parallel tubing



SP 622 EC-BL-DUs
serial tubing

PRODUCT FEATURES

- High efficiency
- Very durable brushless drives
- Small size and low weight
- Low vibration and sound level
- Suitable for any mounting orientation
- Oil-free, maintenance-free, leak-tight

TYPICAL APPLICATIONS

- Exhaust and flue gas analysis
- Auto samplers
- Blood pressure monitoring
- Chromatography
- Dental vacuum
- Gas analysis
- Anaesthesia monitoring

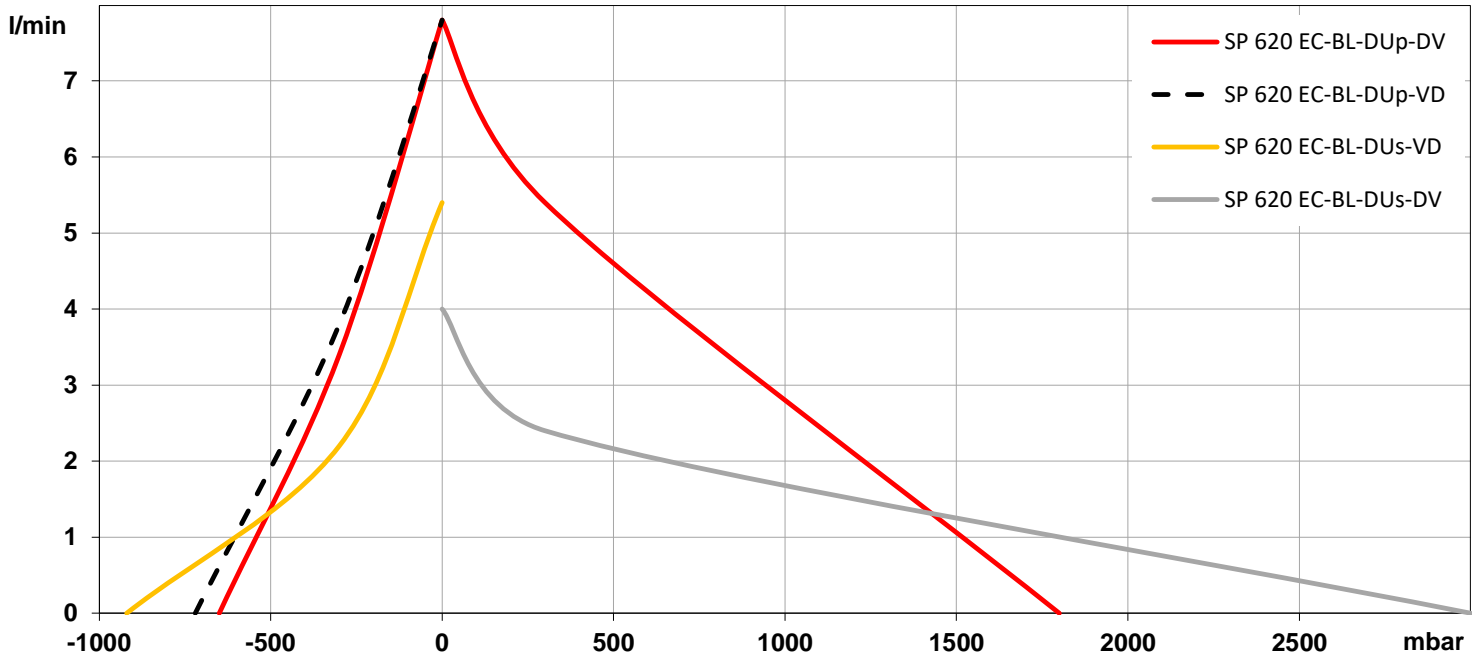


TYPE	SP 620 EC-BL-DUp-DV		SP 620 EC-BL-DUs-DV		SP 620 EC-BL-DUp-VD		SP 620 EC-BL-DUs-VD	
	parallel tubing pressure optimised		serial tubing pressure optimised		parallel tubing vacuum optimised		serial tubing vacuum optimised	
Operating Voltage [Vdc]	12	24	12	24	12	24	12	24
Art. No.	7s57261	7s57262	7s57215	7s57216	7s57265	7s57266	7s57263	7s57264
max. Nominal Current [mA]	850	550	850	550	850	550	850	550
PERFORMANCE								
max. Flow [l/min]	7.8	7.8	4.0	4.0	7.8	7.8	5.4	5.4
max. Pressure [bar]	1.8	1.8	3.0	3.0	-	-	-	-
max. Vacuum [mbar]	-650	-650	-	-	-720	-720	-920	-920
MOTOR								
Standard Motor	brushless for analogue control							
Standard Bearings	ball bearings							
Motor Connection	2 wires							
Optional Motor	brushless for analogue or PWM control / brushless without integrated electronics							
Optional Bearings	n/a							
MATERIALS								
Standard Pump Head	PPS							
Optional Pump Head	customer specific (upon request)							
Standard Diaphragm	EPDM							
Optional Diaphragm	FKM / FFKM / PTFE							
Standard Valves	EPDM							
Optional Valves	FKM / FFKM / customer specific (upon request)							
Standard Gaskets	EPDM							
Optional Gaskets	FKM / FFKM / customer specific (upon request)							
PNEUMATIC CONNECTION								
Standard Connectors	barbed connectors							
Optional Connectors	n/a							
DIMENSIONS + WEIGHT								
Dimensions [mm] W x H x L	54 x 75.5 x 70							
Weight [g]	315							
OPERATING CONDITIONS								
Storage Temperature [°C]	-10 – +60 (extended temperature ranges on request)							
Ambient Temperature [°C]	-10 – +40 (extended temperature ranges on request)							
Temperature of Media [°C]	0 – +80 (extended temperature ranges on request)							
Acceptable Humidity [%rH]	5 – 80 (non condensing)							

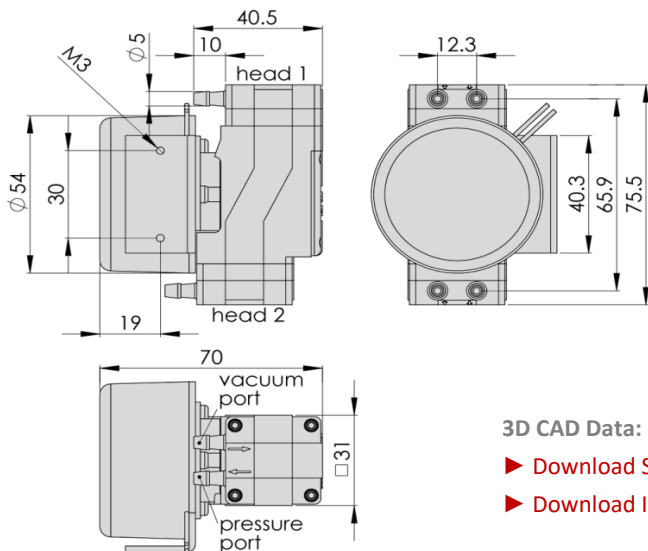


SP 620 EC - SP 622 EC Brushless Dual Head

PERFORMANCE DIAGRAM | SP 620 EC-BL-DU



DRAWING | SP 620 EC-BL-DU



3D CAD Data:

- ▶ Download STEP
- ▶ Download IGES

All dimensions given in [mm]. Drawing shows standard orientation of pneumatic connectors (3 alternative orientations possible).

You can also download the 3D CAD files from the SP website:

▶ www.schwarzer.com/download



TYPE	SP 622 EC-BL-DUp-DV		SP 622 EC-BL-DUs-DV		SP 622 EC-BL-DUp-VD		SP 622 EC-BL-DUs-VD	
	parallel tubing pressure optimised		serial tubing pressure optimised		parallel tubing vacuum optimised		serial tubing vacuum optimised	
Operating Voltage [Vdc]	12	24	12	24	12	24	12	24
Art. No.	7s57093	7s57094	7s57217	7s57218	7s57090	7s57091	7s57125	7s57126
max. Nominal Current [mA]	1650	870	1800	900	1650	870	1650	870
PERFORMANCE								
max. Flow [l/min]	13.0	13.0	5.8	5.8	12.0	12.0	8.0	8.0
max. Pressure [bar]	1.8	1.8	3.0	3.0	-	-	-	-
max. Vacuum [mbar]	-660	-660	-	-	-720	-720	-920	-920
MOTOR								
Standard Motor	brushless for analogue or PWM control							
Standard Bearings	ball bearings							
Motor Connection	4 wires							
Optional Motor Types	brushless without integrated electronics							
Optional Bearings	n/a							
MATERIALS								
Standard Pump Head	PPS							
Optional Pump Head	customer specific (upon request)							
Standard Diaphragm	EPDM							
Optional Diaphragm	FKM / FFKM / PTFE							
Standard Valves	EPDM							
Optional Valves	FKM / FFKM / customer specific (upon request)							
Standard Gaskets	EPDM							
Optional Gaskets	FKM / FFKM / customer specific (upon request)							
PNEUMATIC CONNECTION								
Standard Connectors	barbed connectors							
Optional Connectors	n/a							
DIMENSIONS + WEIGHT								
Dimensions [mm] W x H x L	31.7 x 75.5 x 74.3							
Weight [g]	203							
OPERATING CONDITIONS								
Storage Temperature [°C]	-10 – +60 (extended temperature ranges on request)							
Ambient Temperature [°C]	-10 – +40 (extended temperature ranges on request)							
Temperature of Media [°C]	0 – +80 (extended temperature ranges on request)							
Acceptable Humidity [%rH]	5 – 80 (non condensing)							

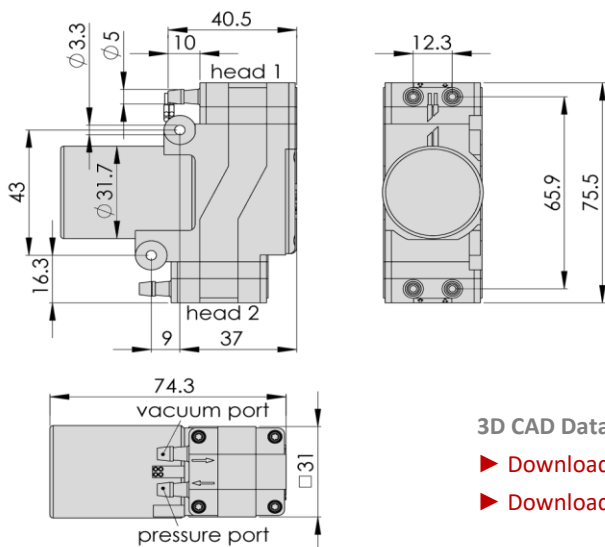


SP 620 EC - SP 622 EC Brushless Dual Head

PERFORMANCE DIAGRAM | SP 622 EC-BL-DU



DRAWING | SP 622 EC-BL-DU



All dimensions given in [mm]. Drawing shows standard orientation of pneumatic connectors (3 alternative orientations possible).

You can also download the 3D CAD files from the SP website:

▶ www.schwarzer.com/download



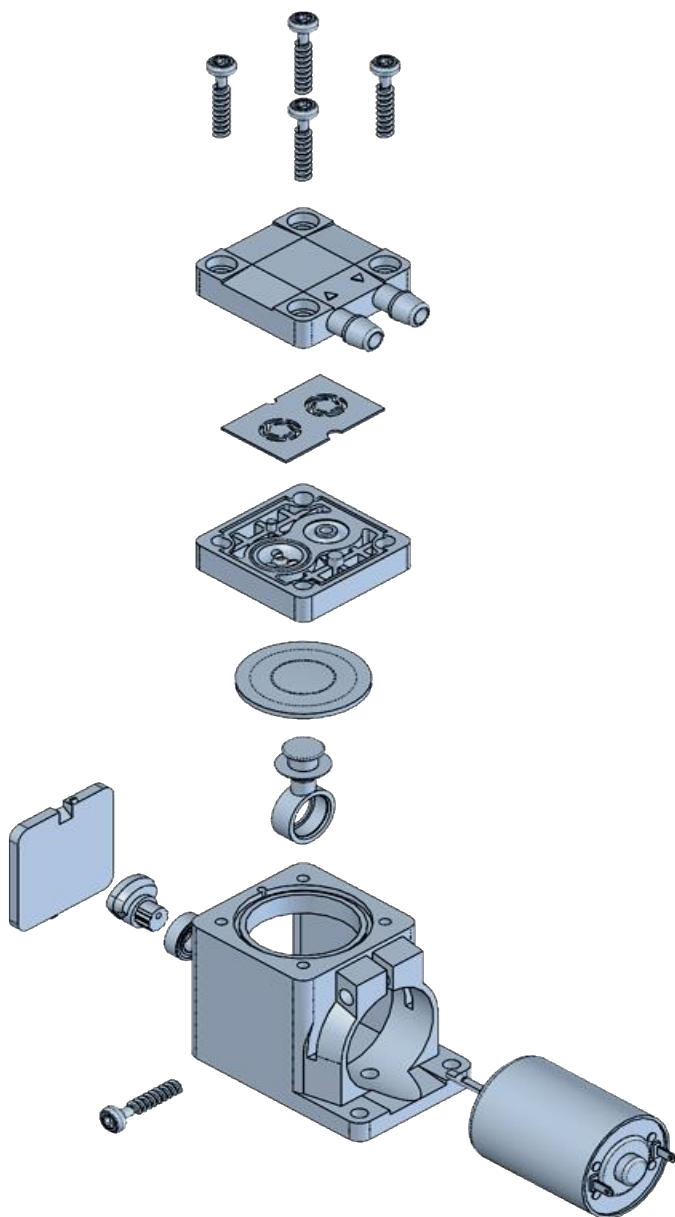
DISCLAIMER

Flow values are subject to the standard conditions specified in DIN 1343. The use of other materials may cause deviations in performance values. The technical data shown on this data sheet represents the typical mean values achieved by the products in our standard testing procedure. All data provided is for information only and does not represent production values. Standard products are subject to change without notice.

08.05.2025

CUSTOMISING

The pumps in this data sheet represent our standard types. All pumps can be customised exactly to your specific requirements in all parameters.



Pump heads

Different materials available

Connectors

Barbed fittings, internal threads and manifold mounting available. Selectable port direction.

Valves

Different designs and materials available.

Flow channels

Pressure- or vacuum-optimised.

Diaphragm

Application-specific designs. Free choice of materials, geometry, hardness, etc.

Connection rods

Available in different lengths.

Eccentric

Stroke and bearing selectable.

Housings

With individual mounting options and installation positions.

Drives

Iron core, coreless, shaded pole and brushless motors with choice of operating voltages and individual wiring.