MultiVac 310 - MS MultiVac 610 - MS

Aluminum Multi-Branch Manifold

MultiVac 310 - MS - T MultiVac 610 - MS - T MultiVac 310 - MS - A MultiVac 610 - MS - A

Vacuum Filtration System

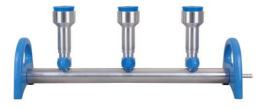
Important Notice

The instrument shall not be modified in any way. Any modification will void the warranty and may result in potential hazard. We are not responsible for any injury or damage caused by any non-intended purposes and modifying the instrument without authorization.

Unpacking

When unpacking, notice if the package is complete and in good situation. If you find any damage or missing parts, please preserve serial number, shipping carton and contact your dealer for quick solution. Please discard the packing materials according to your local environmental protection policy.

Model	Composition	Q'ty
MultiVac 310 - MS	3 Places Aluminum Manifold with No.8 Stopper Funnel	1
	Adaptor	x 1



Model	Composition	Q'ty
MultiVac 610 - MS	6 Places Aluminum Manifold with No.8 Stopper Funnel	v 1
	Adaptor	x 1



Model	Composition	Q'ty
MultiVac 310 - MS - T	3 Places Aluminum Manifold with No.8 Stopper	x 1
	Funnel Adaptor	
	MF 3, 300 ml Magnetic Filter Holder	x 3
	Rocker 400, Oil Free Vacuum Pump	x 1
	4000 ml Heavy Duty PP Waste Bottle with drain	x 1
	Silicone Tube (100 cm)	x 2



Model	Composition	Q'ty
MultiVac 610 - MS - T	6 Places Aluminum Manifold with No.8 Stopper	x 1
	Funnel Adaptor	
	MF 3, 300 ml Magnetic Filter Holder	x 6
	Rocker 400, Oil Free Vacuum Pump	x 1
	4000 ml Heavy Duty PP Waste Bottle with drain	x 1
	Silicone Tube (100 cm)	x 2



Model	Composition	Q'ty
MultiVac 310 - MS - A	3 Places Aluminum Manifold with No.8 Stopper	x 1
	Funnel Adaptor	
	MF 3, 300 ml Magnetic Filter Holder	x 3
	Alligator 200 Diaphragm Liquid Pump	x 1
	Silicone Tube (15 cm)	x 1
	Silicone Tube (200 cm)	x 1



Model	Composition	Q'ty
MultiVac 610 - MS - A	6 Places Aluminum Manifold with No.8 Stopper	x 1
	Funnel Adaptor	
	MF 3, 300 ml Magnetic Filter Holder	x 6
	Alligator 200 Diaphragm Liquid Pump	x 1
	Silicone Tube (15 cm)	x 1
	Silicone Tube (200 cm)	x 1



Installation and Operation

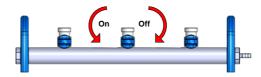
Attention

- MultiVac manifold can connect with vacuum pump or liquid pump for the filtration.
 It is always recommended to install a waste bottle between the manifold and vacuum pump to prevent liquid from flowing into the vacuum pump.
- The outlet direction of the of MultiVac manifold is interchangeable. The outlet can be disassembled by hand or tool to change into desired direction.

Operation

Make sure all valves are off before use, rotate the valves counterclockwise to





• Filter Holder Installation as below



• <u>Vacuum filtration system Installation</u> (with Oil Free Vacuum Pump)

- A. Follow below diagram to install the system: two silicone tubes to connect the Rocker 400 vacuum pump, waste bottle and manifold.
- B. Install the membrane in filter holder as above-mentioned steps.
- C. Turn on the pump and pour the sample liquid into the funnel and turn the valve to "vertical" position to start the filtration.
- D. After finishing the filtration, turn the valve to "horizontal" position and retrieval the membrane.



Vacuum Filtration System Assembly Diagram

• <u>Vacuum filtration system Installation</u> (with Diaphragm Liquid Pump)

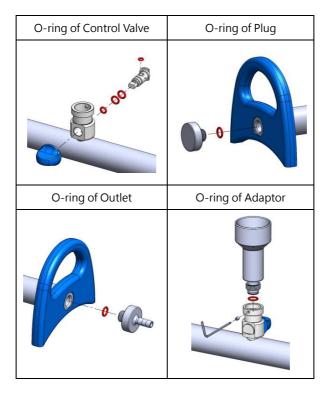
- A. Follow below diagram to install the system: connect 15 cm silicone tube to manifold and "IN", the inlet of Alligator 200, connect 200 cm tube to "OUT", the outlet of Alligator 200. Outlet of 200 cm tubes can be put in sink or container to drain or collect the waste liquid.
- B. Install the membrane in filter holder as above-mentioned steps.
- C. Turn on the pump and pour the sample liquid into the funnel and turn the valve to "vertical" position to start the filtration.
- D. After finishing the filtration, turn the valve to "horizontal" position and retrieval the membrane.



Vacuum Filtration System Assembly Diagram

Maintenance

- Please suck in pure water to clean the tubing after every use and keep pumping air for at least 1 min to drain out the residual liquid.
- Please clean the surface of manifold with pure water or 75% ethanol.
- MultiVac manifold, filter holder and vacuum bottle are autoclavable (121°C, 1 bar, 20 min). Please keep all control valves/ knobs and vent valve at "OPEN" position to make a complete sterilization when autoclaved.
- Silicone tube and O-ring are consumables. Please replace with new silicone tube and O-ring in case of air leakage problem.



Ordering Information

180310-01	MultiVac 310-MS, 3 Places Aluminum Manifold with No.8 Stopper Funnel
	Adaptor (w/o Funnel)
180610-01	MultiVac 610-MS, 6 Places Aluminum Manifold with No.8 Stopper Funnel
	Adaptor (w/o Funnel)
180311-01(02)-A	MultiVac 310-MS-A, Vacuum Filtration System, AC100V-240V Adaptor, US Plug
	(EU Plug)
180611-01(02)-A	MultiVac 610-MS-A, Vacuum Filtration System, AC100V-240V Adaptor, US Plug

- 180311-11(22)-T MultiVac 310-MS-T, Vacuum Filtration System, AC110V/60Hz (AC220V/50Hz)
- 180611-11(22)-T MultiVac 610-MS-T, Vacuum Filtration System, AC110V/60Hz (AC220V/50Hz)
- 181200-01(02) Alligator 200, Diaphragm Liquid Pump, AC100V~240V Adaptor, US Plug (EU Plug)
- 167400-11(22) Rocker 400, Vacuum Pump, AC110V/60Hz (AC 220V/50Hz)
- 167200-48 4000 ml Heavy Duty PP Waste Bottle with drain
- 167100-20 PALL, A/E Glass fiber Filter (1 um), 100/PK
- 167100-52 PALL, GN-6 Membrane, grid, sterilized, 0.45 um
- 200300-01 MF 3, 300 ml Magnetic Filter Holder

(EU Plug)

- 197000-01 LF 3, 300 ml Spin-Lock Filter Holder
- 167103-30 SS 3, 300 ml Stainless Steel Filter Holder
- 167110-16 Silicone Stopper (No.8)