ML RO 500, ML RO 800

TECHNICAL DATA

Reverse osmosis system for elimination (> 95 %) of salts and minerals from main water with a capacity of 3170 GPD and 4755 GPD respectively.

The systems are developed by ML System with focus on reliable and hygienically correct solutions. The system applies a membrane separation process whereby water molecules may pass through the membrane, while the majority of salts and minerals are retained.

They are fitted on frames with a separate reservoir tanks and all components are assembled, tested, and ready to use.

Fig 1. ML RO 500 shown

ML RO 500 and ML RO 800 are equipped with the following components:

Standard:

- PLC control
- Separate pump provides 58 psi output pressure
- Reservoir tank closed with 0.2 µm breathing filter
- Overflow protection
- Type approved water meter for produced permeate
- 5 µm filtration of the tap water
- Pressure switch for protection of pump
- Operational hour meter
- Stopcock for RO water

Options:

- Water softener
- Active carbon filter
- UV system for sterilization of water
- Conductivity meter/alarm
- Dosage unit for regulating hardness

Benefits:

- Delivered on frame and with separate reservoir tank
- Fully assembled and tested
- All components exposed to water are made of corrosion resistant material
- The hoses are stainless steel braided or high-pressure hoses

ML RO 500, ML RO 800

TECHNICAL DATA

Specifications:	ML RO 500	ML RO 800
Capacity*:	2.2 GPM at 59 °F	3.3 GPM at 59 °F
Permeate quality:	5 < EC < 30 µS/cm	5 < EC < 30 µS/cm
Permeate/Concentrate ratio:	approx. 75 / 25 %	approx. 75 / 25 %
Reservoir tank:	52 gallons	132 gallons
Size, frame: (LxWxH)	34 x 28 x 63 inches	34 x 28 x 63 inches
Size, reservoir tank: (LxWxH)	24 x 24 x 40 inches	31.5 x 31.5 x 50 inches
Weight:	485 lb	552 lb
Sound pressure level:	< 80 dB	< 80 dB
Supply voltage:	3x480 VAC+GND+N, 60Hz, 2.1kW, 20 A	3x480 VAC+GND+N, 60Hz, 2.1kW, 20 A
	3x230 VAC+GND+N, 50Hz, 2.1kW, 16 A	3x230 VAC+GND+N, 50Hz, 2.1kW, 16 A
	3x208 VAC+GND+N, 60 Hz, 1.8 kW, 20 A	3x208 VAC+GND+N, 60 Hz, 1.8 kW, 20 A
Dissolved salt removal:	> 95 %	> 95 %
Water connection, tap water:	3/4” RG	3/4” RG
Water connection, RO-water:	3/4” RG	3/4” RG
Water connection, drainage:	3/4” RG	3/4” RG
Outgoing pressure, RO-water:	43.5 - 60.9 psi (3.0 - 4.2 bar)	43.5 - 60.9 psi (3.0 - 4.2 bar)
* Capacity may vary depending on the quality of the tap water and decreases by approximately 3 % per decrease in °F of the temperature of the water.		

Pre-Conditions:	ML RO 500	ML RO 800
Water supply:	Drinking water quality,	Drinking water quality,
	36-101 psi (2.5-7 bar) @ 3 GPM	36-101 psi (2.5-7 bar) @ 4.8 GPM
Hardness:	Max. 1 gr/gal	Max. 1 gr/gal
Conductivity:	250-1000 µS/cm	250-1000 µS/cm
Free chlorine:	Max. 0.1 mg/l	Max. 0.1 mg/l
TDS:	Max. 625 mg/l	Max. 625 mg/l
Silt index:	Max. 3	Max. 3
KMnO4:	Max. 10 mg/l	Max. 10 mg/l
Fe:	Max. 0.2 mg/l	Max. 0.2 mg/l
Mn:	Max. 0.05 mg/l	Max. 0.05 mg/l
NTU:	Max. 1.0	Max. 1.0
Temperature:	Max. 59 °F	Max. 59 °F