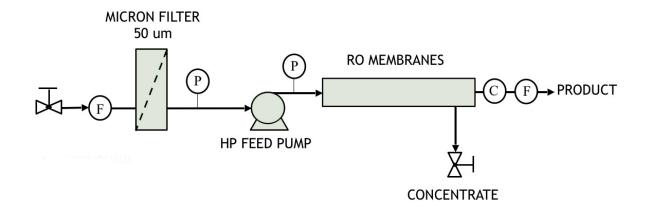


100,000, 200,000, 300,000, 400,000 AND 500,000 GPD

# BRACKISH WATER Reverse Osmosis Desalination Systems

Suitable for hotels, resorts and industrial customers, these brackish water desalination systems operate automatically and include an efficient high pressure pump. With a simple hookup to power and piping, the system is ready to go. Treated water is suitable for drinking.



### **SYSTEM FEATURES**

- · Quick Setup
- · Easy Start and Stop Functionality
- Safety Low Pressure and High Pressure Alarms
- Includes All Equipment and Instrumentation Necessary for Normal Operation
- Central Gauge Panel with Operating Information
- · Remote Start and Stop
- · Antiscalant Dosing

- VFD Control
- · Corrosion Resistant Materials
- 316 SS Hardware and Piping
- Micron Filter Housing Standard
- Process and Sample Valves
- Epoxy-Coated Steel Frame
- Totally Enclosed Motors
- Unmanned Operation
- Offinalified Operation
- Efficient High Pressure Pump
- Standard Permeate Tank Control Inputs

## **Specifications**

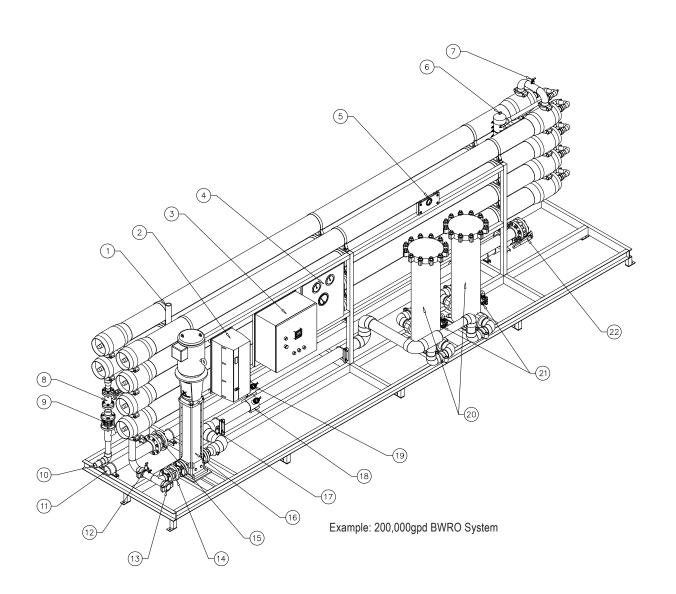
- Standard Electrical Supply 230/460 Three phase power, 60hz (Other voltages available)
- Instruments
  - o Feed Flowmeter
  - o Product Flowmeter
  - o Low Pressure Sensor and Transmitter
  - o Membrane Pressure Sensor and Transmitter
  - o Product Conductivity Meter
- NEMA 4 Control Enclosure
- Brackish Membranes
- · Designed and Assembled in the USA
- 1 Year Limited Warranty
- Multimedia Pre-Filter Recommended When Input Water Quality Is Poor
- Bag Filter– Recommended When Input Water Quality Is Poor
- · Antiscalant Chemical Dosing
- UV and Chlorination of Treated Product Water
- Product Storage Tank
- Feed Water Storage Tank
- Customization
- Spare Parts

**Options** 

- Consumables
- CIP System
- Pre and Post-treatment Chemical Dosing
- \* 2000 mg/l TDS @ 25C

PROCESS PARAMETERS						
DESCRIPTION	UNIT	CAPACITY				
Production Rate @ 60Hz*	USgpd	100,000	200,000	300,000	400,000	500,000
Production Rate	m3/day	378.5	757.1	1135.6	1514.2	1892.7
Vessel Array, (Size)	qty	2:1 (8")	4:2 (8")	6:3 (8'')	8:4 (8'')	10:5 (8")
Feed Flow	gpm	92.6	185.2	277.8	370.4	463
Brine Flow	gpm	23.2	46.3	69.5	92.6	115.8
Product Flow	gpm	69.4	138.9	208.3	277.8	347.2
Feed Pressure at 2k TDS	psi	161.3				
Product Quality	TDS	<100				
Skid Outside Dimensions	in.	288" L x 84" W x 90" H				
Skid Dry Weight	lbs	3,596	5,414	7,245	8,856	11,722
Power	kW	7.1	14.1	21.8	27.8	34.6
Specific Power*	kWh/Kgal	1.7				

# 100,000, 200,000, 300,000, 400,000 AND 500,000 GPD UNITS



#### TAG DESCRIPTION

- 1 Brine Standpipe
- 2 High Pressure Pump VFD
- 3 Control Cabinet
- 4 Gauge Panel
- 5 Micron Filter Differential Pressure Indicator
- 6 Product Header Air Bleed
- 7 High Pressure System Air Bleed
- 8 Brine Control Valve
- 9 Brine Orifice
- 10 Train Brine Outlet Terminal Point
- 11 Train Product Outlet Terminal Point

- 12 Membrane Pressure Transmitter
- 13 CIP Connection Point
- 14 High Pressure Pump Discharge Check Valve
- 15 Product Discharge Check Valve
- 16 High Pressure Pump
- 17 High Pressure Pump Suction Pressure Transmitter
- 18 High Pressure Pump Suction Flowmeter
- 19 Product Flowmeter
- 20 Micron Filters
- 21 Micron Filter Drain Valves
- 22 Feed Inlet Valve Terminal Point