

**Installation and Operation
Manual
ZTC 2000 – ZTC 3000
01/13/2015**



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Introduction

Your Spot Zero™ reverse osmosis system is a durable piece of equipment, which, with proper care, will last for many years. This User's Manual outlines installation, operation, maintenance and troubleshooting details vital to the sustained performance of your system.

Your system is designed to operate at a pressure of 80- 150 psi, unless otherwise stated. The recovery set for your system is between 50%-75%.

NOTE: Prior to operating or servicing the Spot Zero™ reverse osmosis system, this User's Manual must be read and fully understood. Keep it and other associated information for future reference and for new operators or qualified personnel near the system.

SYSTEM REQUIREMENTS AND OPERATION GUIDELINES

Plumbing

The membranes and high pressure pumps used on Spot Zero™ systems require a continuous and non-turbulent flow of water to the system with a minimum feed pressure of 20 psi during operation, which does not exceed 105°F.

The tubing or piping used for the inlet of the feed water is 1/2" NPT. The tubing or piping used for the discharge of the concentrate is 3/8" O.D. and should be run to an open over board in a free and unrestricted manner.

The tubing or piping used for the product is 3/8" O.D. and can be transported to the holding tank or directly through a high quality nylon tubing or PVC pipe or other FDA accepted materials.

Material must not precipitate in the system. Be certain that all of the components of the feed water are soluble at the concentrations attained in the system

CAUTION: Any restrictions or blockage in the overboard discharge line can cause back pressure, which will increase the system's operating pressure. This can result in damage to the system's components and possible leaks of components or tubing.

Electrical

The motors used on Spot Zero™ systems are pump and motor combinations. They are available in single-phase 115 volt or 230 volt AC.

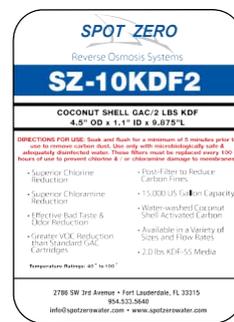
Please ensure that the electrical circuit supplying the system is compatible with the requirements of the specific Spot Zero™ model.

Pre-Filtration

Spot Zero™ systems are supplied with a 1 micron sediment pre-filter (part # SZ-45-1001) that filters out most particles over 1 microns, a GAC/KDF (part # SZ-10KDF2) Cartridge that removes chlorine, chloramine, VOCs and heavy metals.

CAUTION: a traditional carbon block filter must not be used as it will not remove chloramines and will cause permanent membrane damage. Pre Filters should be changed every 100 hours and/or whenever there is a pressure difference of 15 psi or more between the pressure readings before and after the filter. The pump must NEVER be run dry. Operating the pump without sufficient feed water will damage the pump. ALWAYS feed the pump with filtered water. The pump is susceptible to damage from sediment and debris.

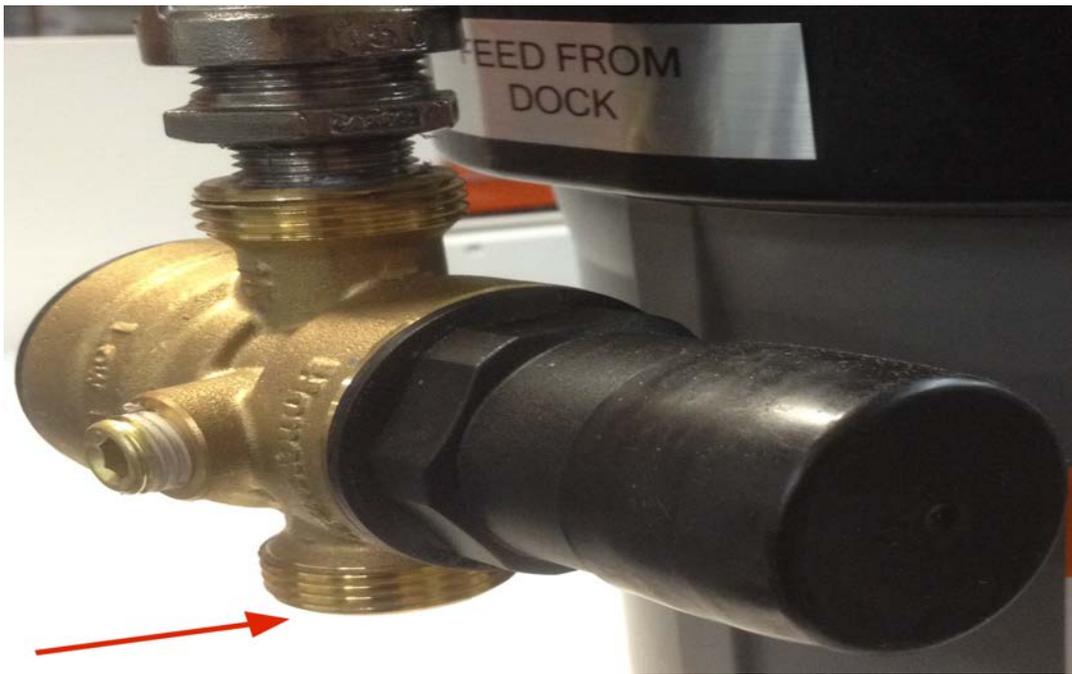
NOTE: THE SZ-10KDF2 CARTRIDGE MUST BE FLUSHED OUTSIDE OF SYSTEM BEFORE OPERATING TO REMOVE CARBON DUST. [Youtube Demo Link](#) The system must be operated on filtered water only. Do not attempt to clean used filter cartridges. The SZ-10KDF2 is rated to absorb chlorine, chloramine, heavy metals, etc. up to 18,000 gallons of feed water, which is the equivalent to approximately 100 hours of run time. **CAUTION: If the pre-filter becomes clogged and the water flow to the pump is reduced or interrupted, cavitation will occur. This will damage the pump.**



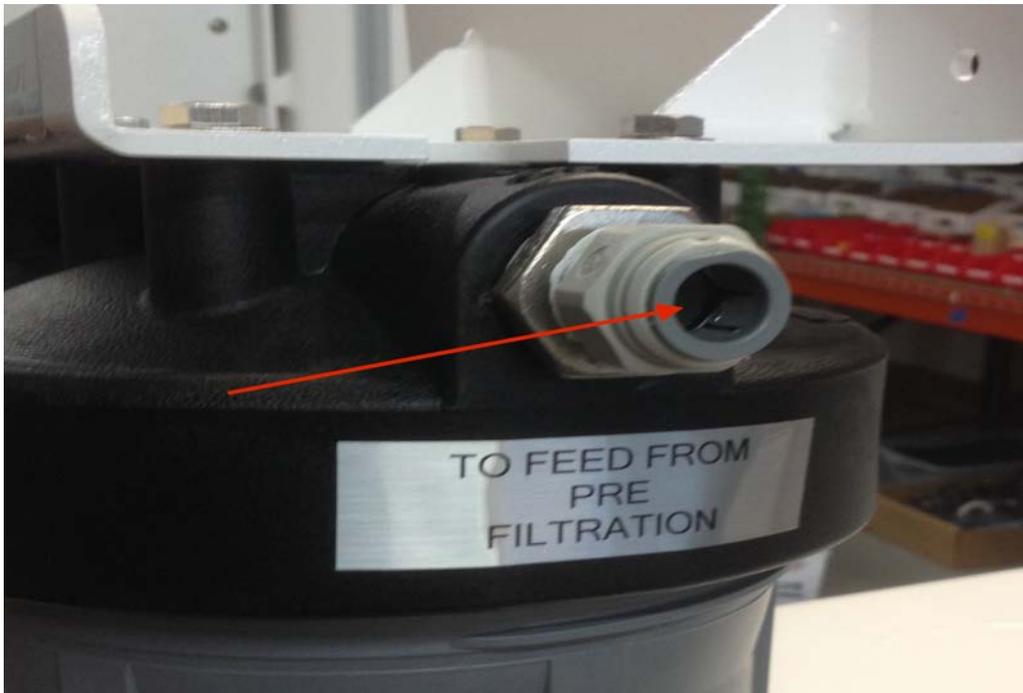
INSTALLATION PROCEDURE

FEED WATER

Plumb the feed water from the dock into the pre-filter inlet pressure regulator fitting.



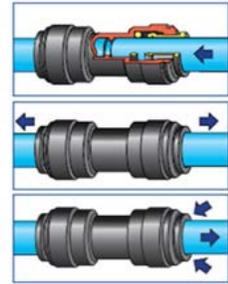
From the pre-filter outlet fitting, run the white nylon 1/2" spot zero water tubing to the feed from pre-filter fitting.



Install Tips:



Push up to pipe stop.



Pull to check secure. Test the system before use.

To disconnect, ensure the system is depressurised. Push the collet towards the fitting and remove the pipe. The fitting can be reused.

BRINE DISCHARGE

From the brine discharge fitting, run the white nylon 3/8" spot zero water tubing to a dedicated overboard fitting. Water must be allowed to run freely, without any restrictions or blockage in the brine discharge line. Be sure that no back pressure exists in the brine discharge line.

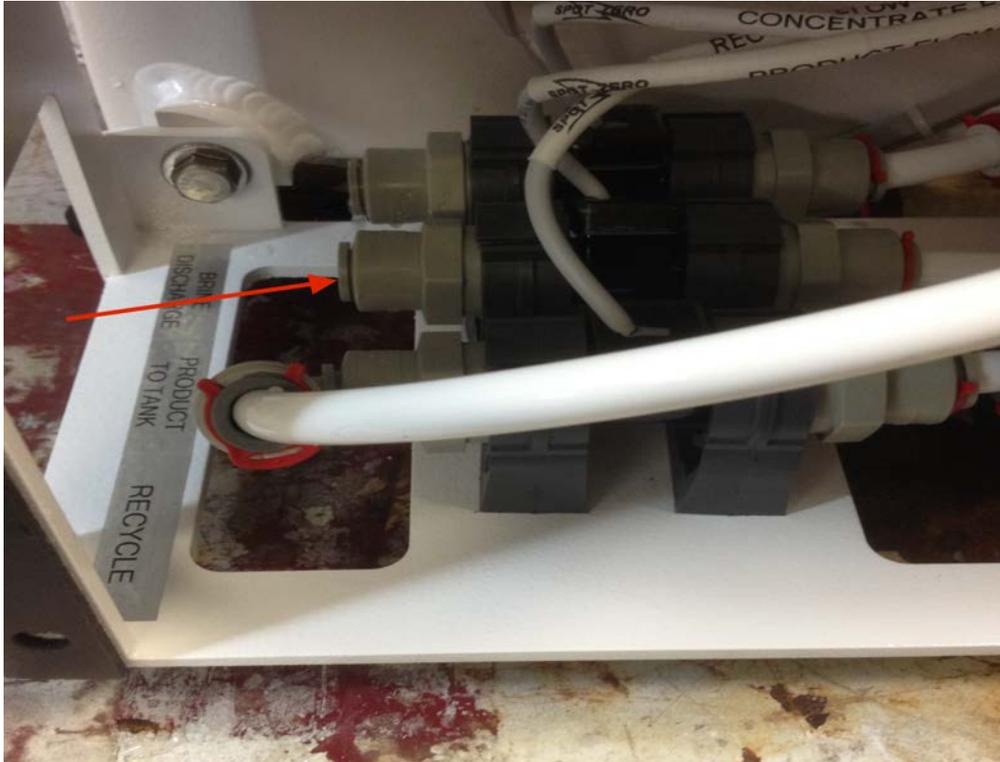
Note: There is an internal check valve in the brine discharge line in the system.



PRODUCT TO TANK

From the product to tank fitting, run the white nylon 3/8" spot zero water tubing to the vessels fresh water tank.

Note: There is an internal check valve in the product line in the system.



VENT

Connect the white nylon ½” spot zero water tubing to the vent fitting, and run to a dedicated overboard fitting. The vent is for purging air from the tank, and also acts as an emergency tank overfill.



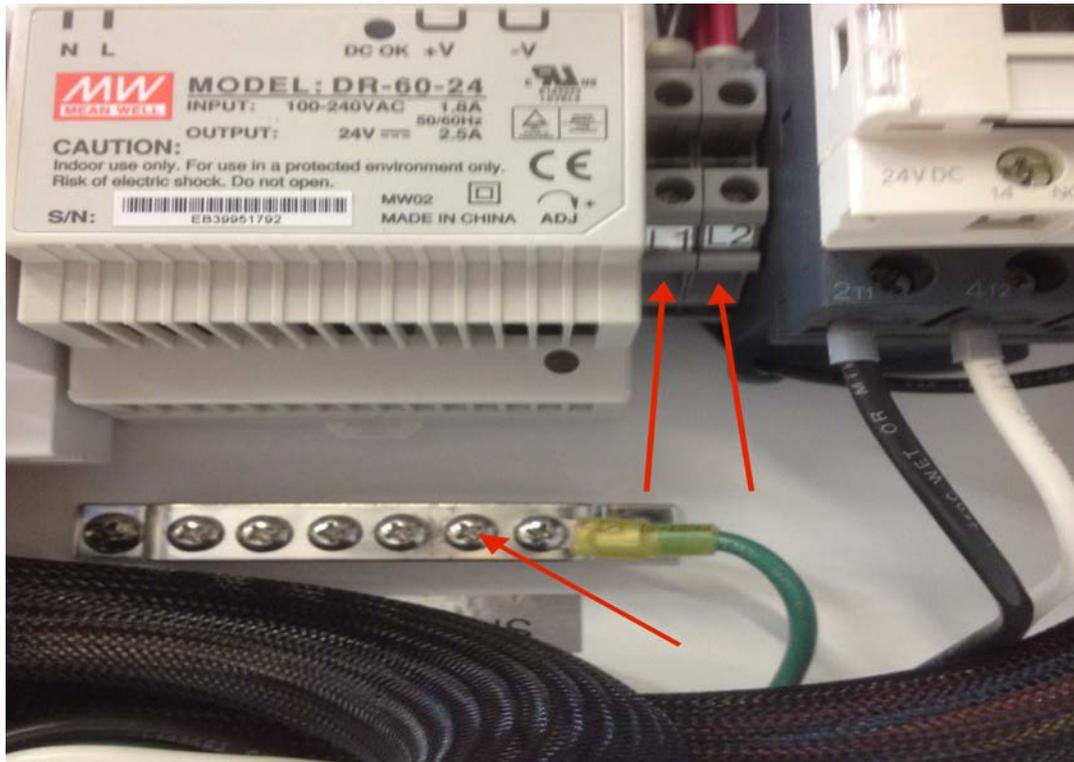
FEED FROM DESALINATOR

Connect the 3/8” product line from the desalinator to the feed from desalinator fitting. Always install a three way valve in line with this, so the water can be diverted to the spot zero system, or to the vessels fresh water tank.



POWER SUPPLY

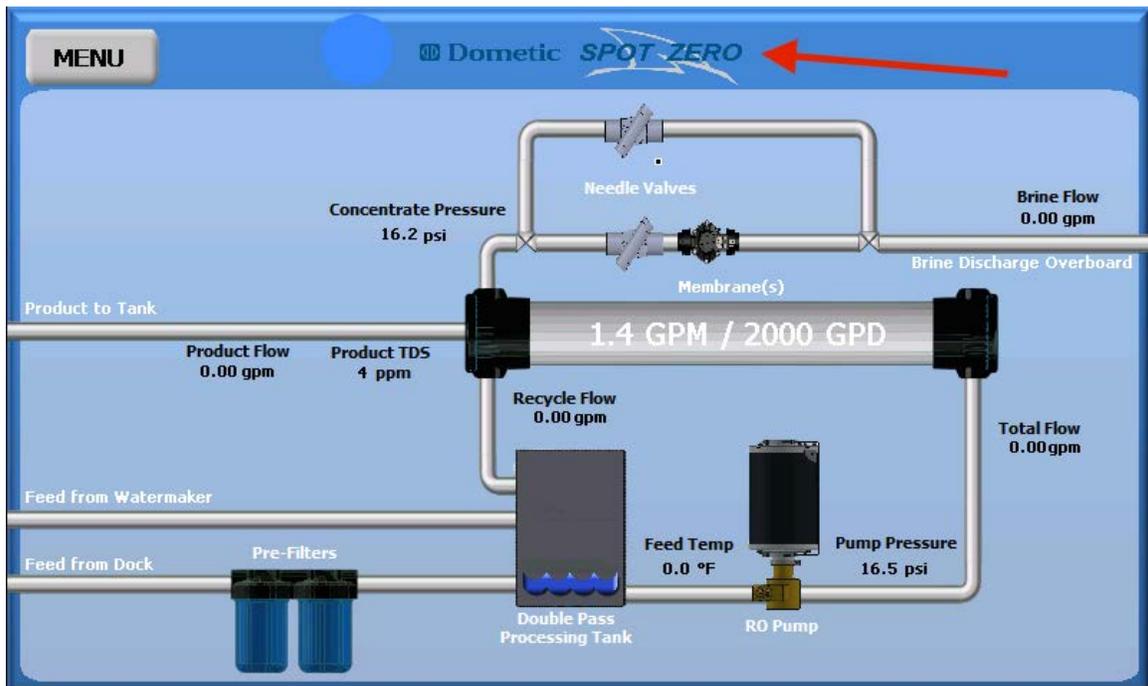
Supply and connect specified power (115v or 230v) from the vessels panel to the ZTC panel. Connect line 1 and line 2 to the terminals, and connect the ground wire to the ground bus bar. Be sure to confirm systems rated voltage before applying power.



SPOT ZERO ZTC TOUCHSCREEN NAVIGATION

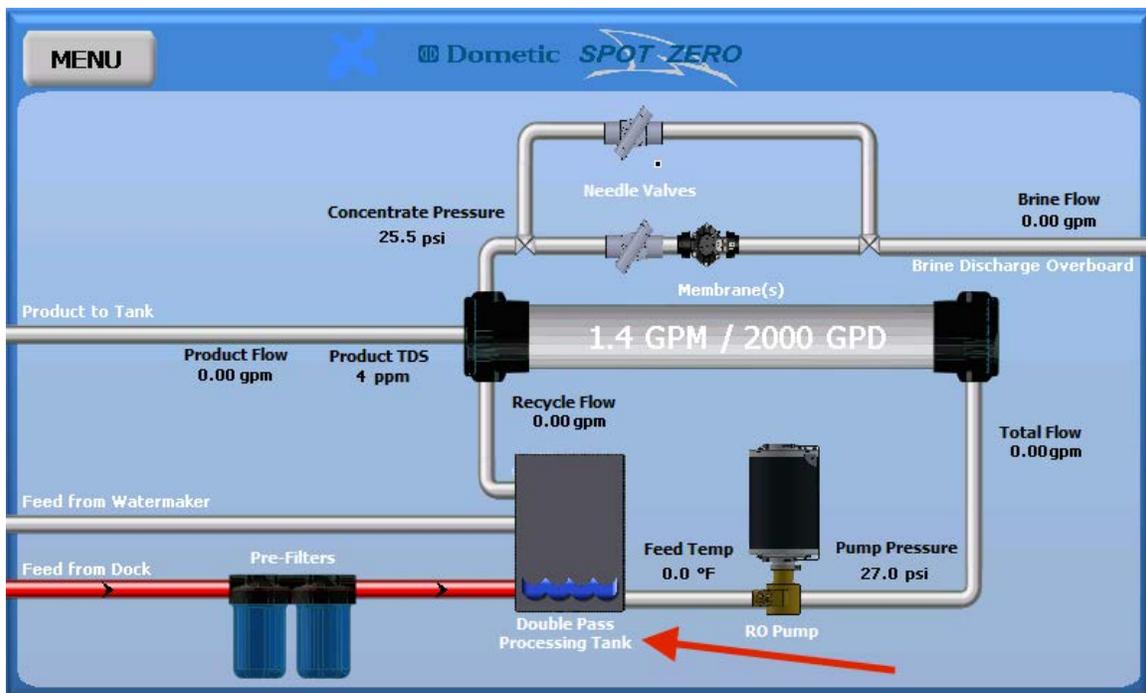
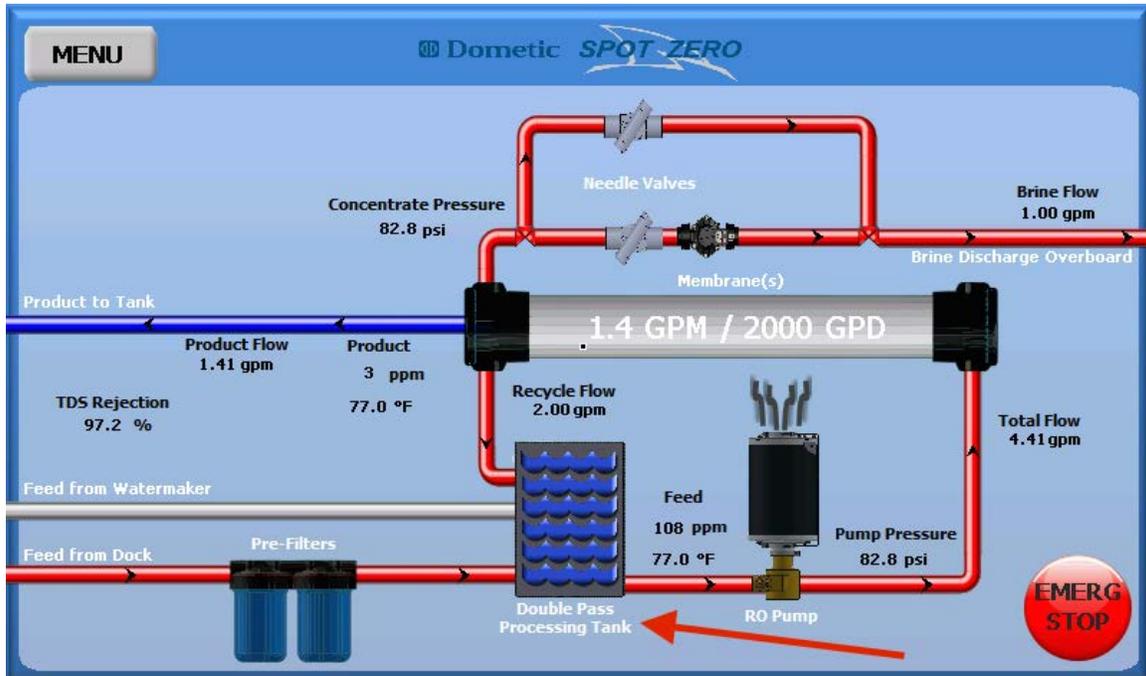
Home Screen

From any screen the Spot Zero icon can be pressed to return to this home screen. There is also a lot of information on this home screen that is important to the operation of this system. Some of the images can be pressed to bring up different information and setting choices. Also the menu button can be pressed to access more information. This manual will go through these options.



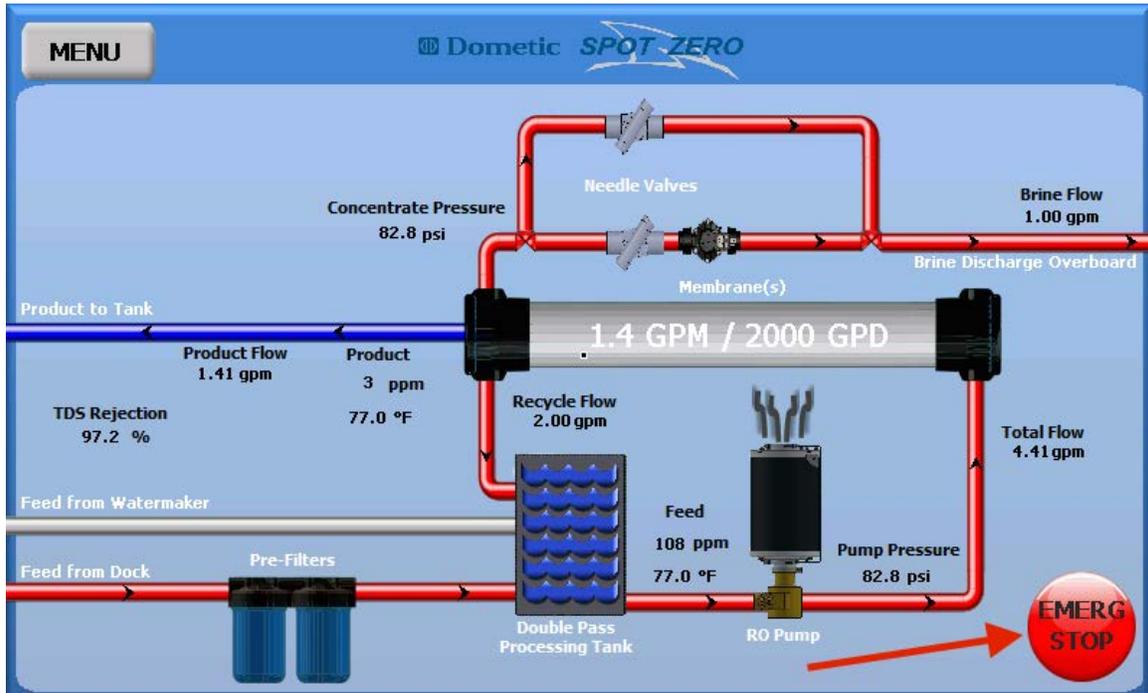
Operation Procedures

The Spot Zero ZTC is a fully automatic system. The capacity of the system is shown on the membrane in center of the screen. It will operate when water is present, and shut down when water is no longer fed to the system. On the home screen the double pass processing tank shows the water level present in the system. When the tank is full the unit will start to operate. When the tank is emptied, the system will shut down.



Emergency Stop

While the system is operating the emergency stop button will appear. Pressing the emergency stop button will shut down the system.

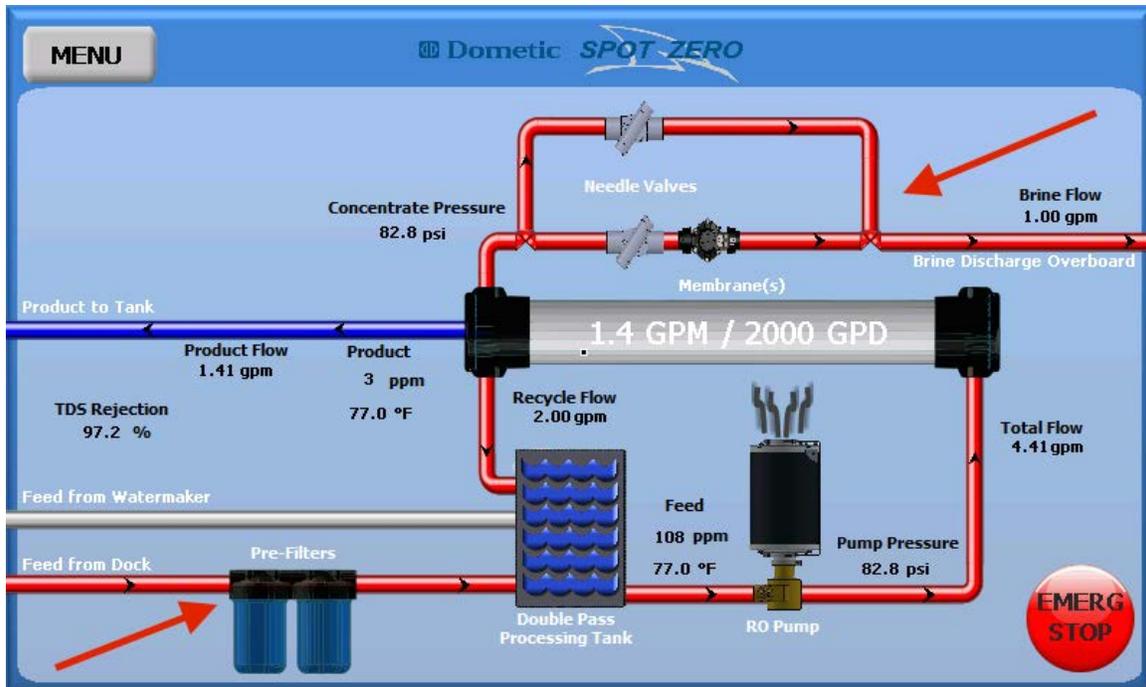


To restart the system, press the reset button.



Dock Water Source

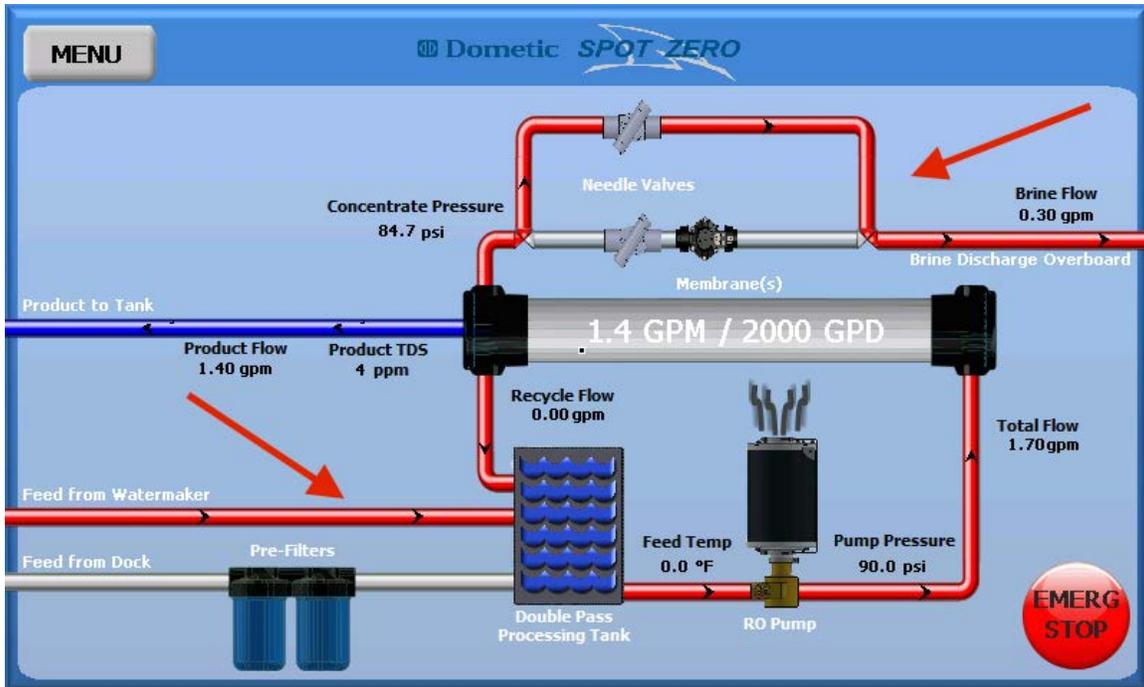
When operating from dock water, the system will show the water passing through the pre-filtration then into the double pass processing tank. The brine water will flow through two needle valves and then discharge overboard.



The dock water must flow through the pre-filtration to remove chemicals and contaminants that will harm the system and ruin the membranes.

Water maker Source

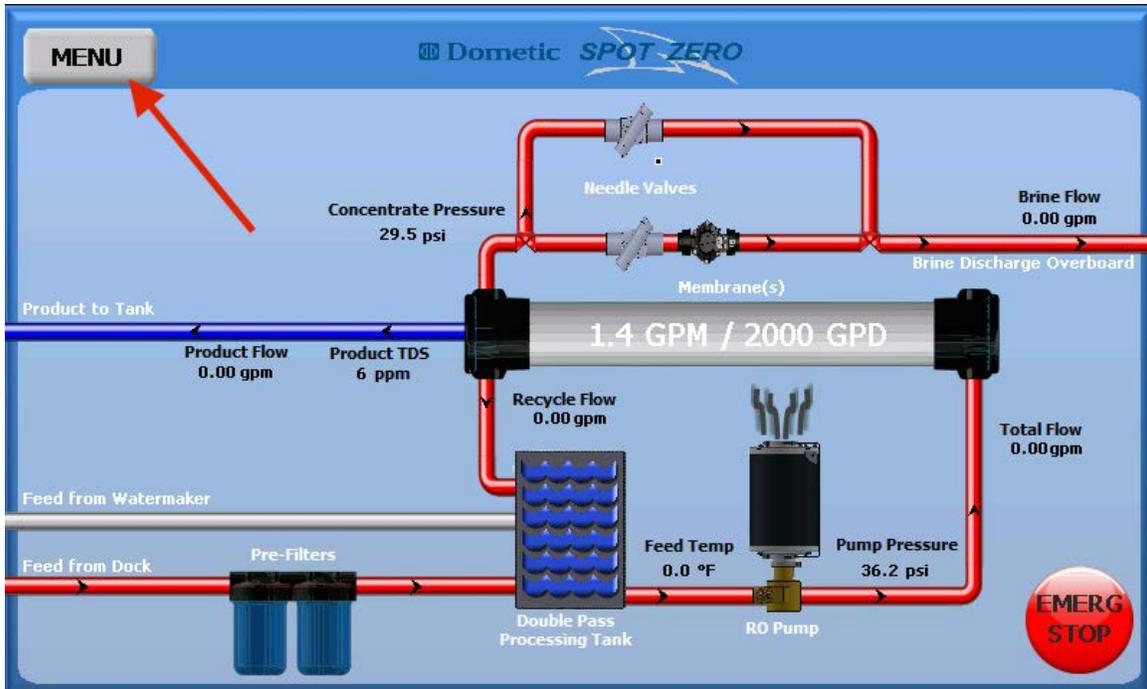
When operating from water maker product water, the flow will be shown going directly into double pass processing tank. The brine water from the water maker supply will be directed through the high efficiency valve then discharge overboard.



The product water from the water maker has already gone through a desalination system and does not contain the chemicals and contaminants that dock water has in it. Therefore this water flows directly to the double pass processing tank. When the system is being run from a water maker the high efficiency valve will close and only allow a portion of the brine to discharge. Allowing the system to operate at a higher efficiency.

MENU OPTIONS

To access the menu, press the menu button in the upper left hand corner of the home screen.

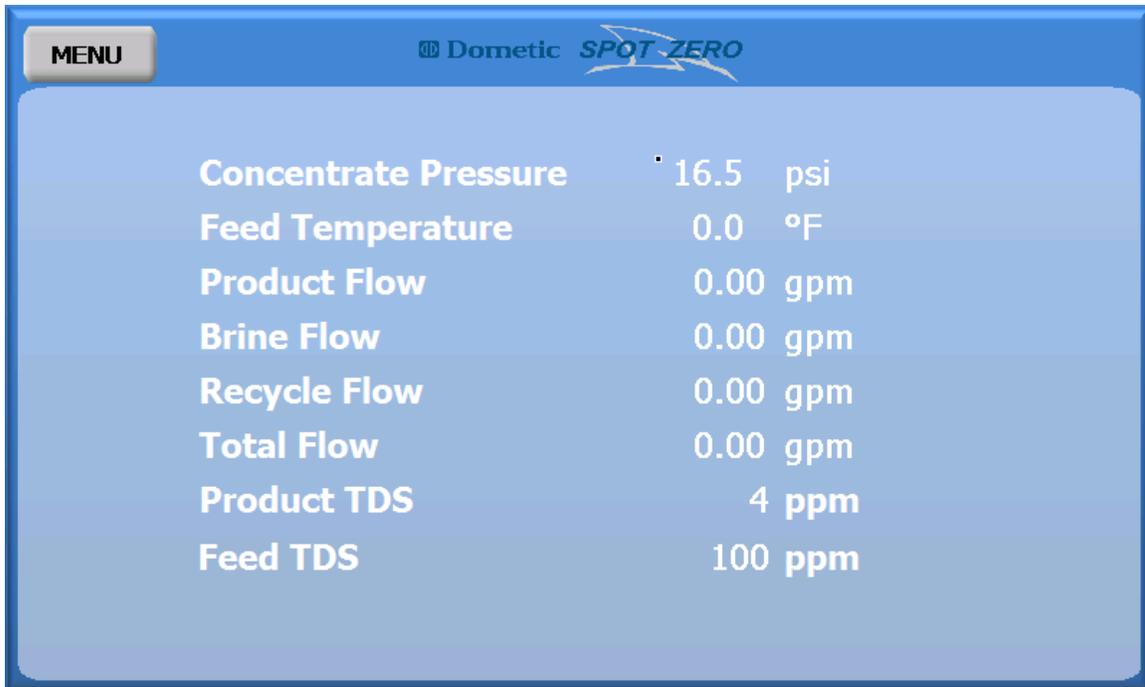


*NOTE: The factory menu is password protected and for factory use only.



SUMMARY

The summary screen shows the current values of the system.

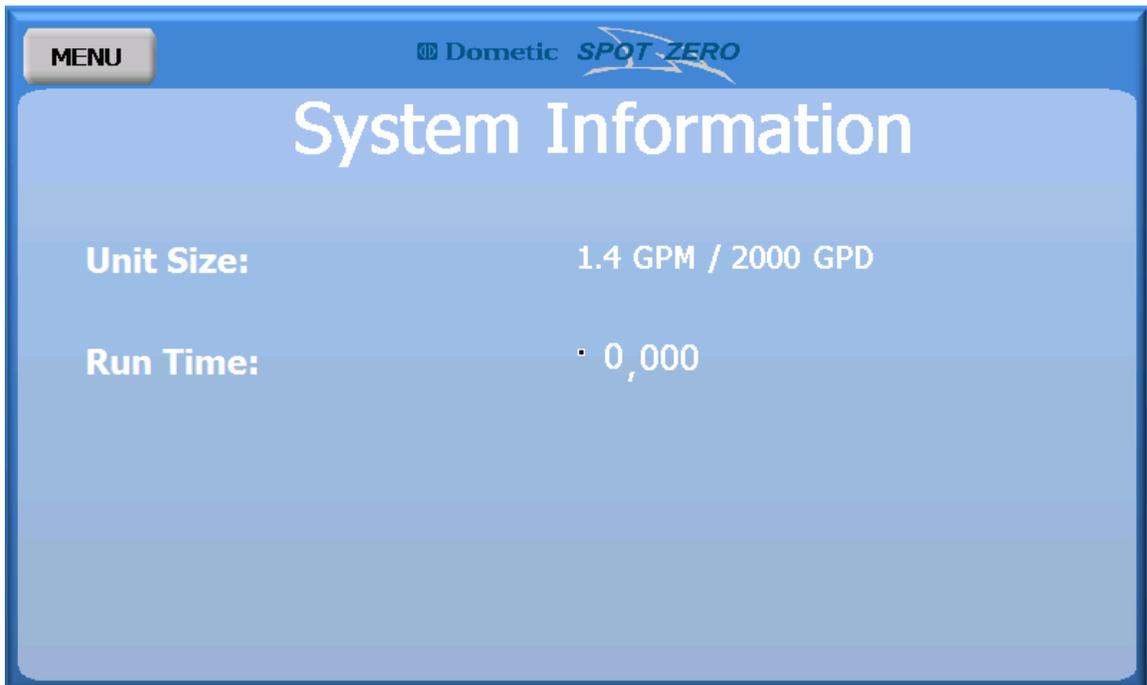


The image shows a digital display for a Dometic SPOT ZERO system. At the top left is a 'MENU' button. The top center features the 'Dometic SPOT ZERO' logo. The main display area lists eight parameters with their current values and units.

Concentrate Pressure	16.5	psi
Feed Temperature	0.0	°F
Product Flow	0.00	gpm
Brine Flow	0.00	gpm
Recycle Flow	0.00	gpm
Total Flow	0.00	gpm
Product TDS	4	ppm
Feed TDS	100	ppm

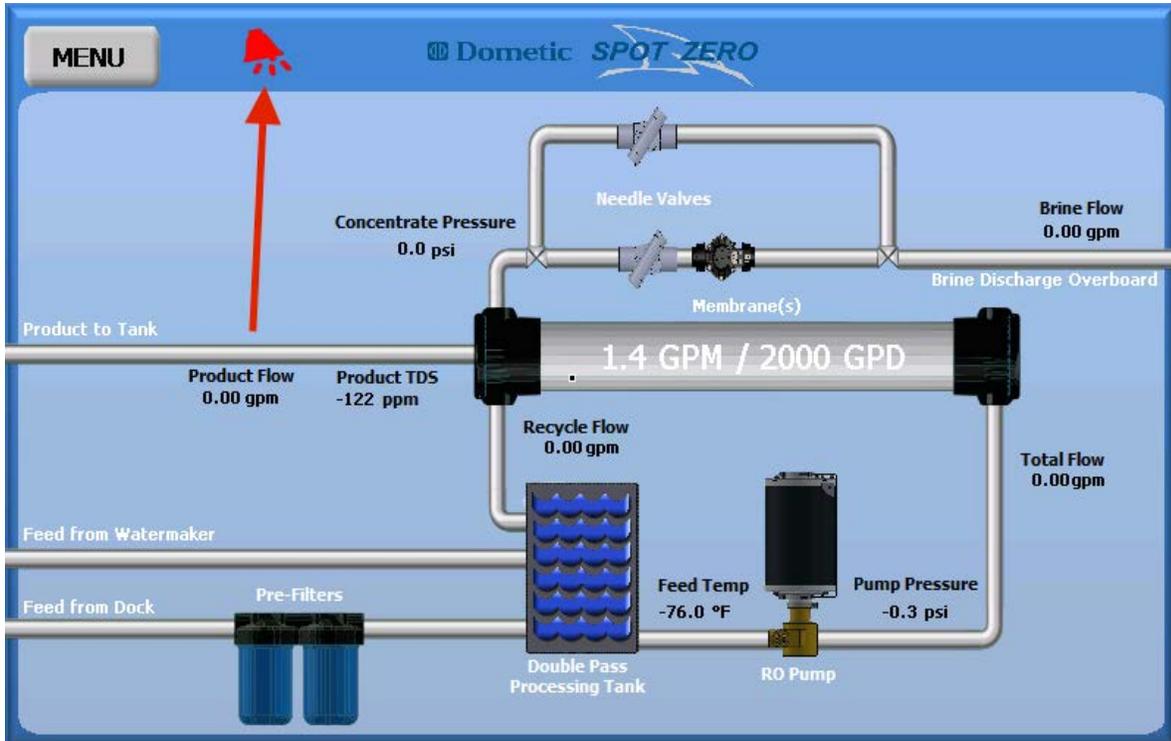
SYSTEM INFORMATION

The serial number of the system can be found here, also the system capacity, and the run time.



ALARMS

Any active alarms will be displayed here. When the system is in alarm a red alarm image will show at the top of the home screen. Pressing the alarm image will also open this screen.



MENU  Dometic SPOT ZERO

No Alarms

Name	Description

MENU  Dometic SPOT ZERO

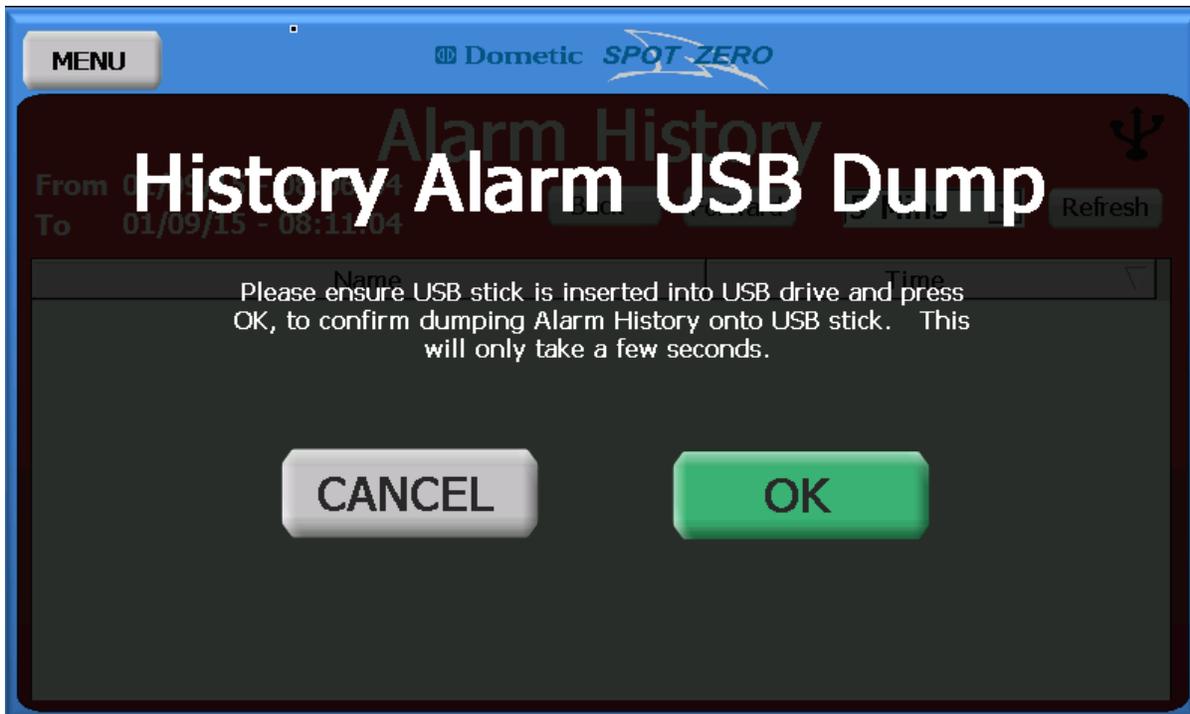
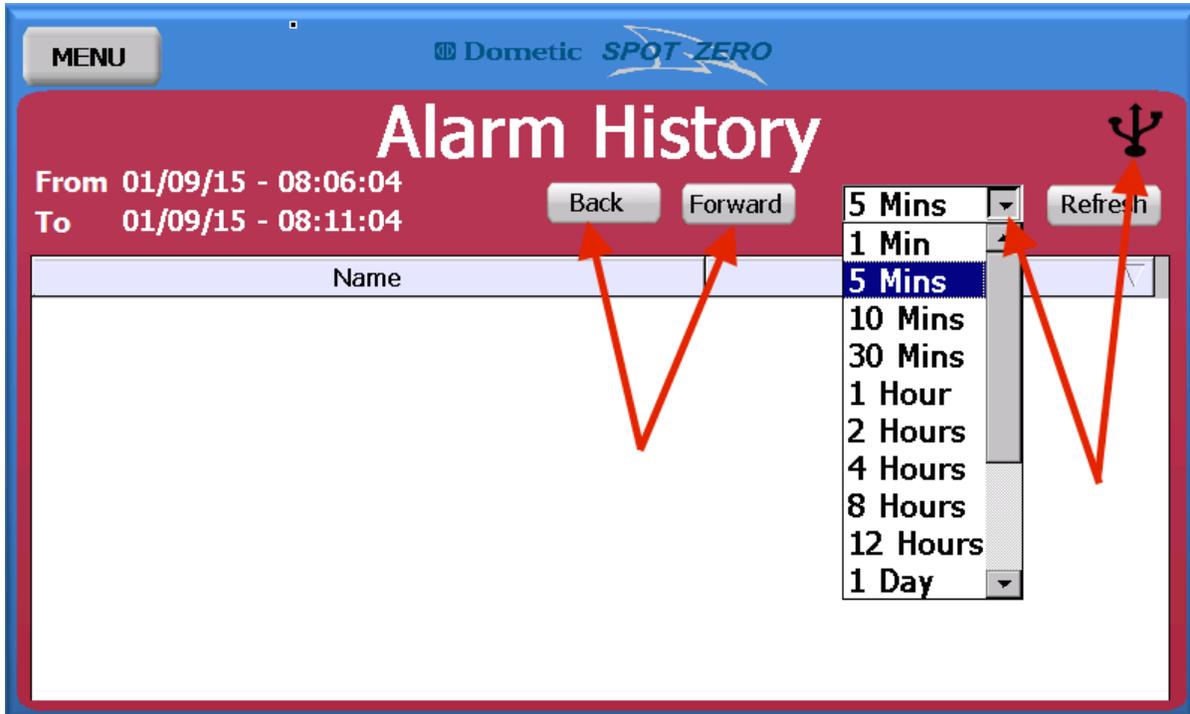
Active Alarms

Name	Description
High Concentrate Pressure	

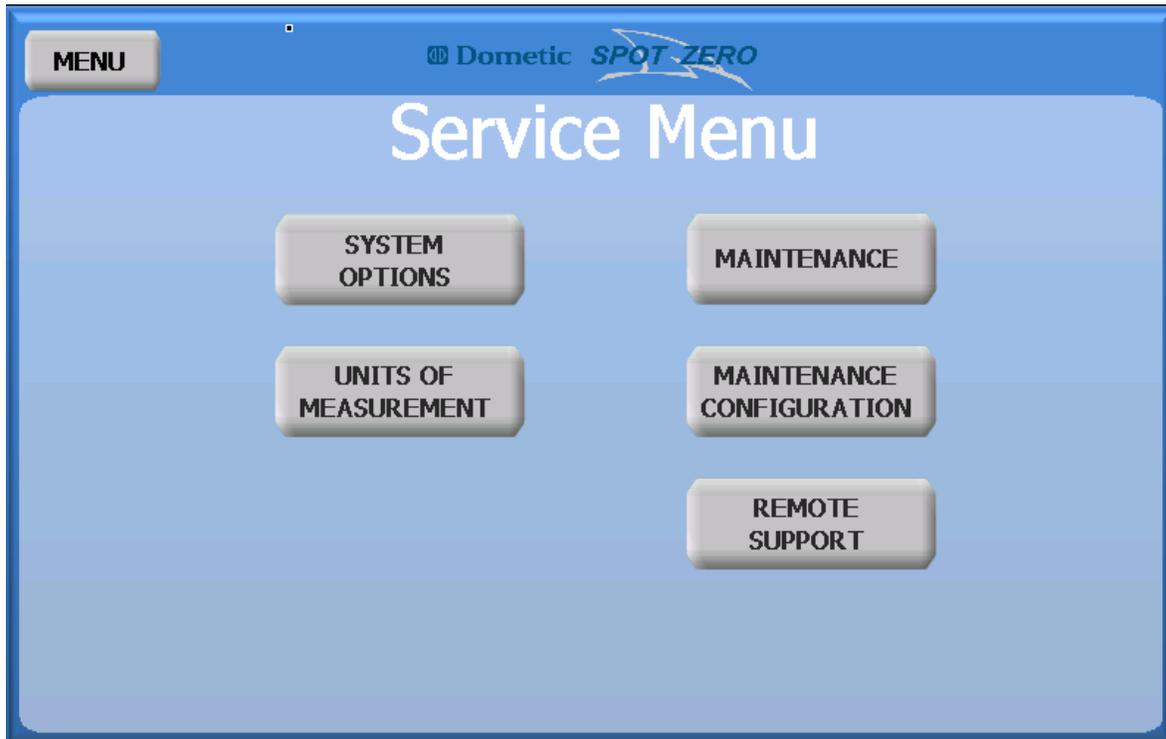
RESET ALARMS

ALARM HISTORY

The alarm history can be scrolled through using the back and forward buttons. The amount of time that has passed can also be changed in the drop down menu. Pressing the USB icon will allow the history to be transferred to a USB.



SERVICE MENU



SYSTEM OPTIONS

Options can be added here.

SERVICE  

System Options

Silver Sterilizer Fault

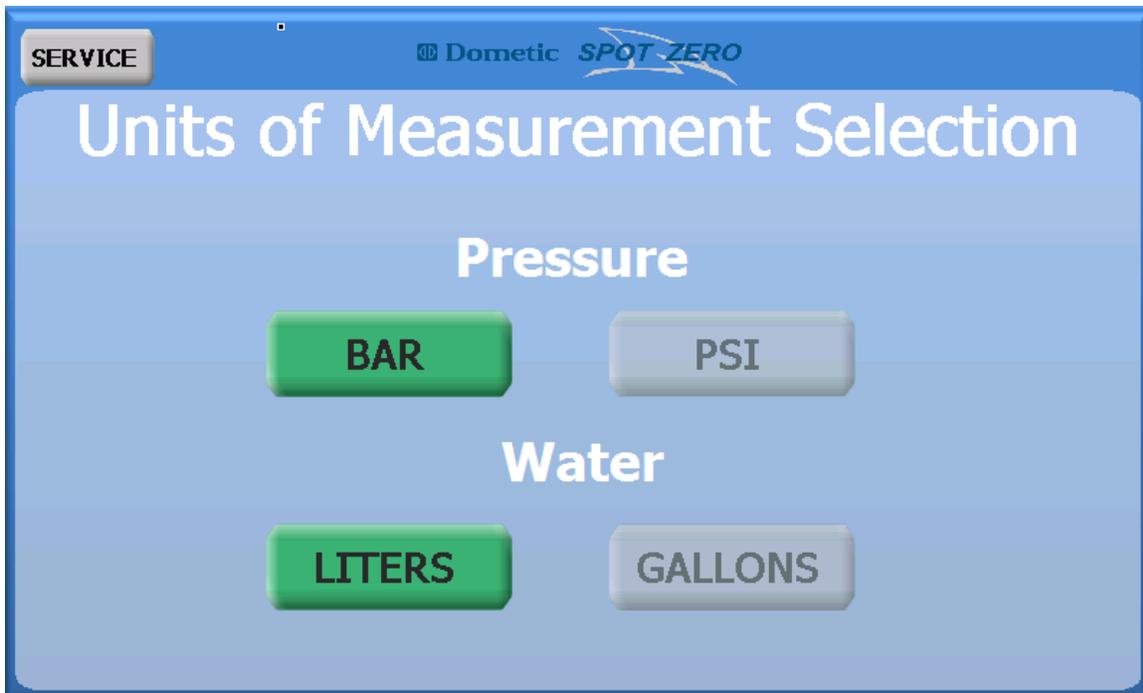
SERVICE  

System Options

Silver Sterilizer Fault

UNIT OF MEASUREMENT

The unit of measurement can be changed from standard to metric by pressing the desired unit of measurement.

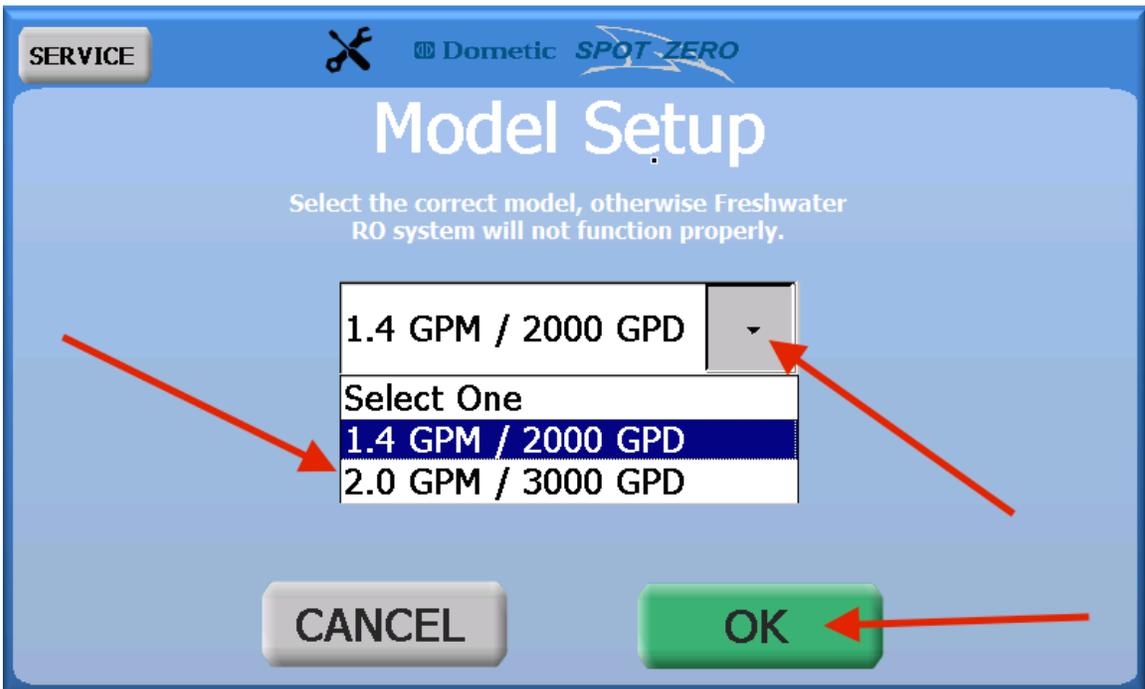
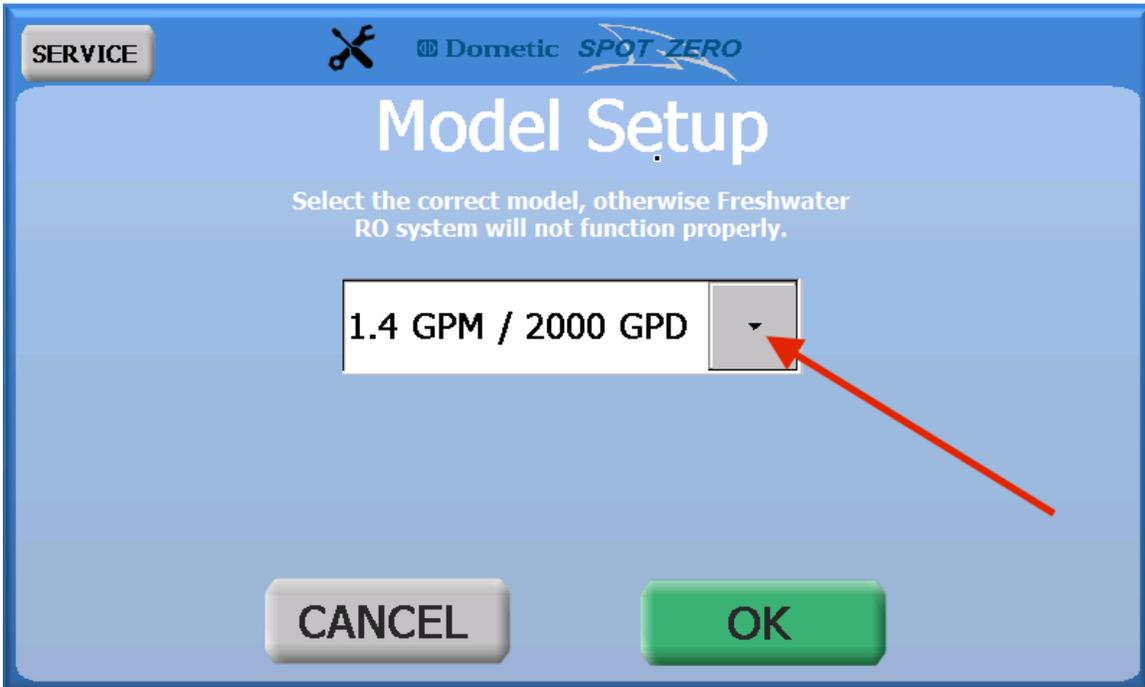


MODEL SETUP

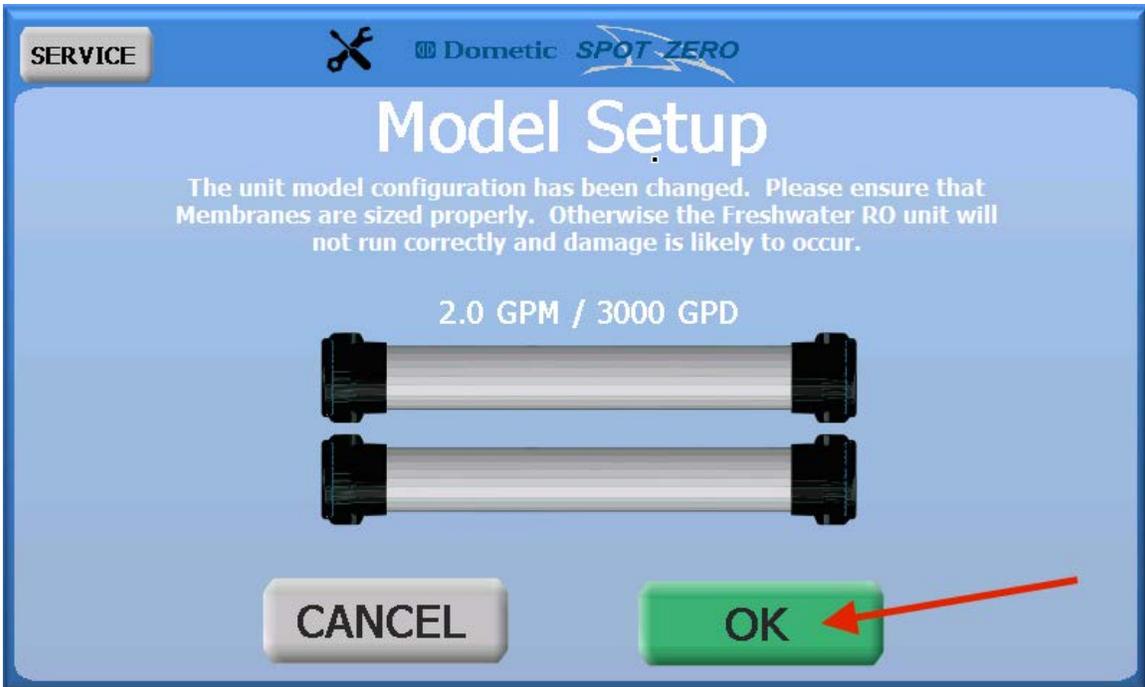
This is set at the factory and is password protected. To get the password contact the factory by visiting spotzerowater.com. If the system is upgraded with another membrane, or a membrane is removed, then the model would have to be changed so the system will work properly. *NOTE: Changing the system without changing the model can result in damage to the equipment.



Press the arrow button to access the drop down menu. Make selection, then press ok.



There are two choices, 2000 GPD, or the 3000 GPD system. Confirm the size of your system then press ok.



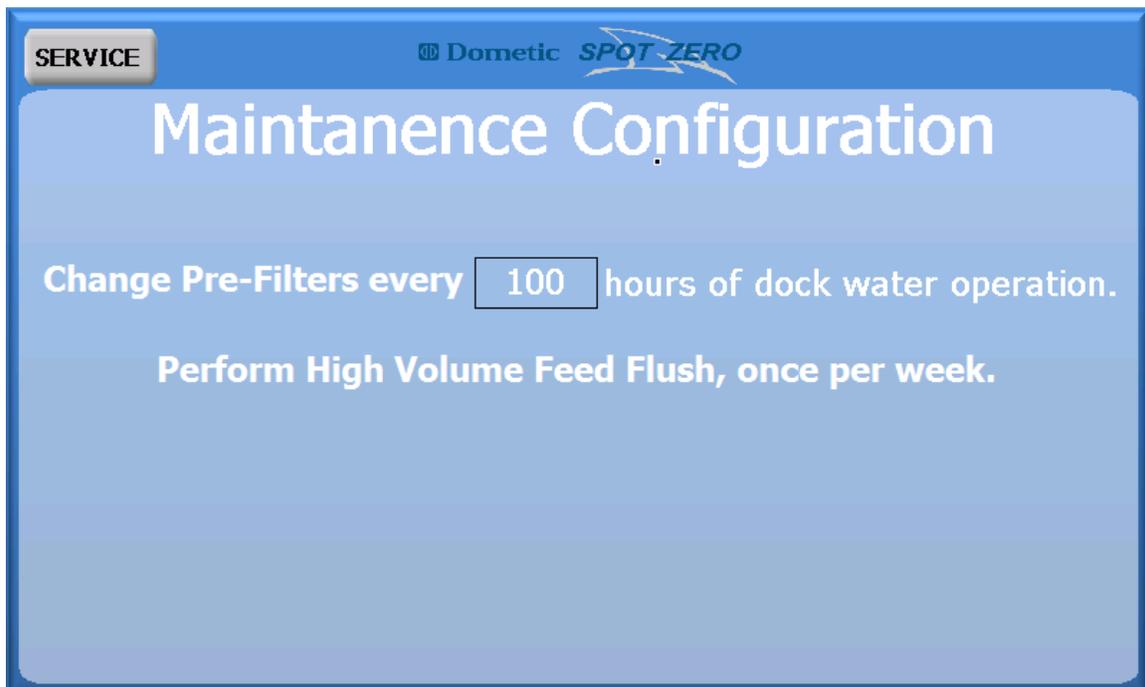
MAINTENANCE

When maintenance is required it will be listed here. If no maintenance is due, then it will say no maintenance needed. If maintenance is needed then after it has been completed press reset.



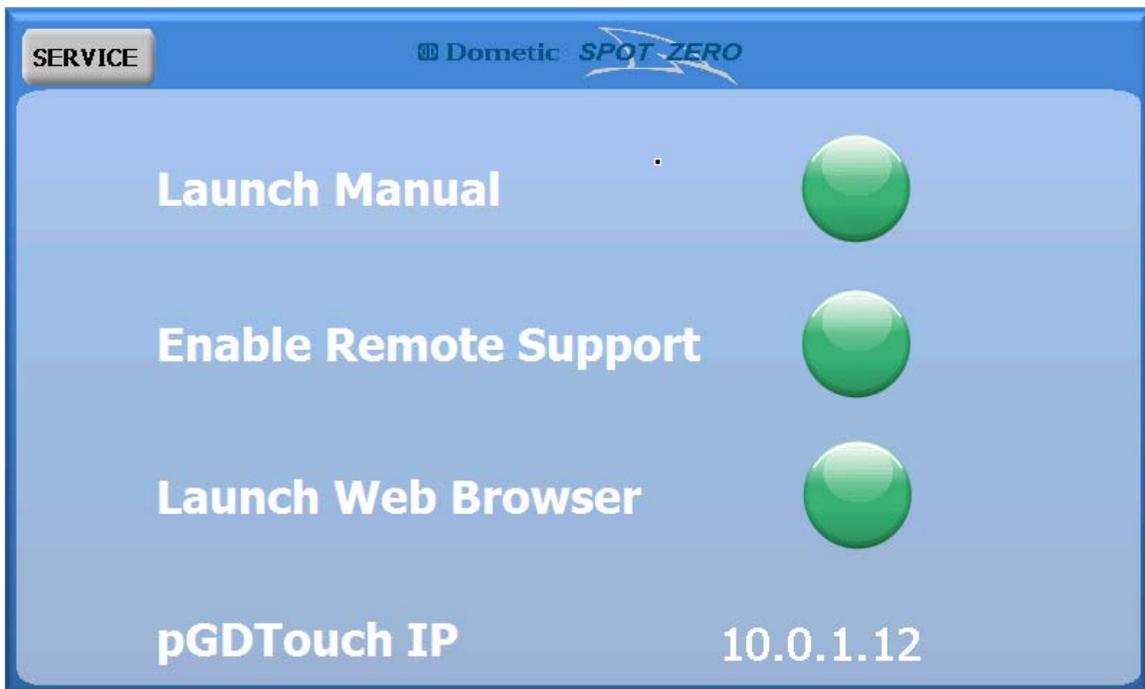
MAINTENANCE CONFIGURATION

Always change the pre-filters every 100 hours of dock water operation. Be sure to flush the KDF filter out before installing it into the system. This may change if there is media tank inline instead of the standard pre-filters.



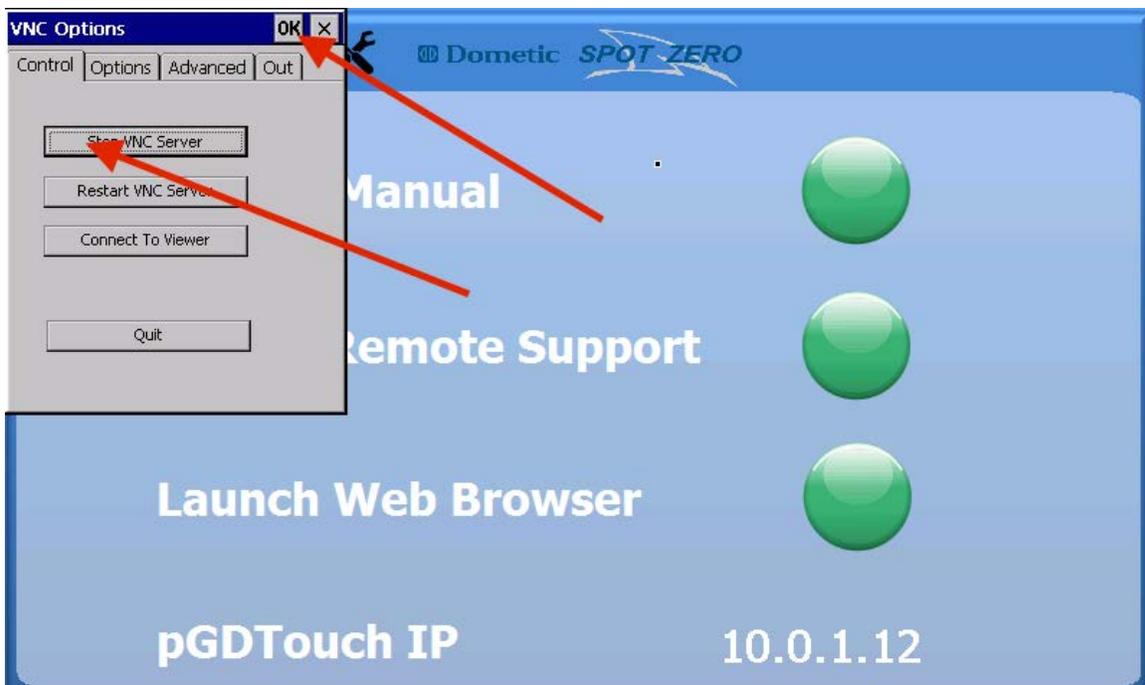
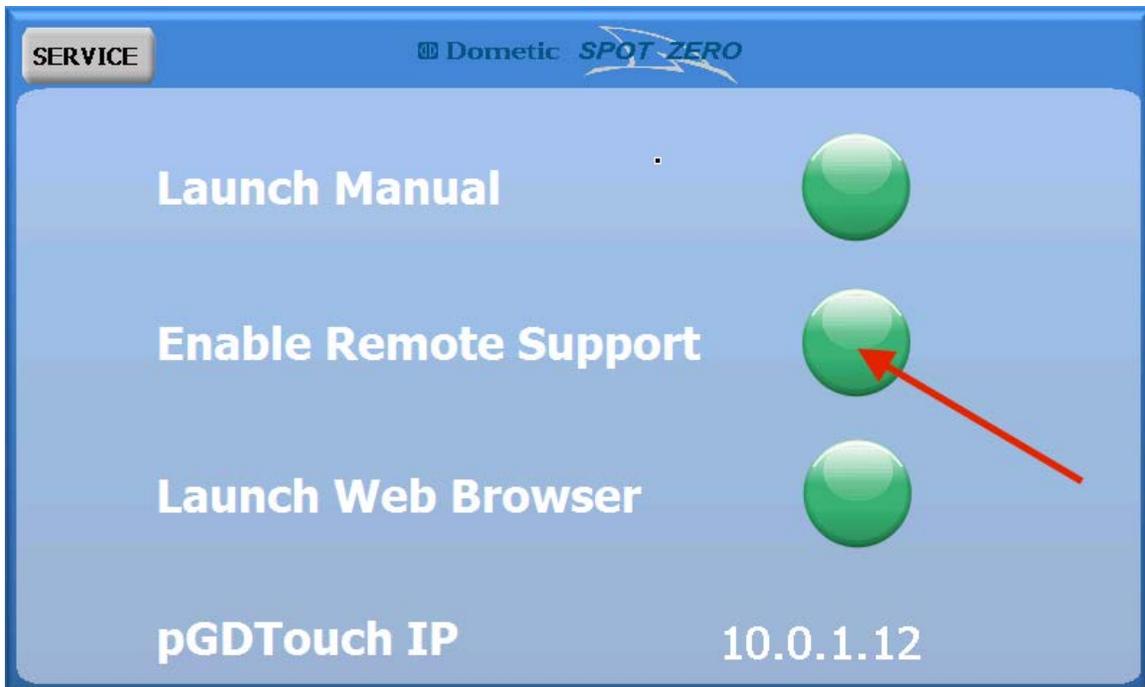
REMOTE SUPPORT

In this menu the pGD Touch IP address will be shown at the bottom of the screen if the system is wired to a router. This will be needed to connect to the VNC viewer app. This manual will be brought up if the launch manual button is pressed. The VNC viewer menu will pop up if the enable remote support is pressed. The web browser will pop up if the launch web browser is pressed. To enable remote support, see the VNC viewer procedure section of the manual

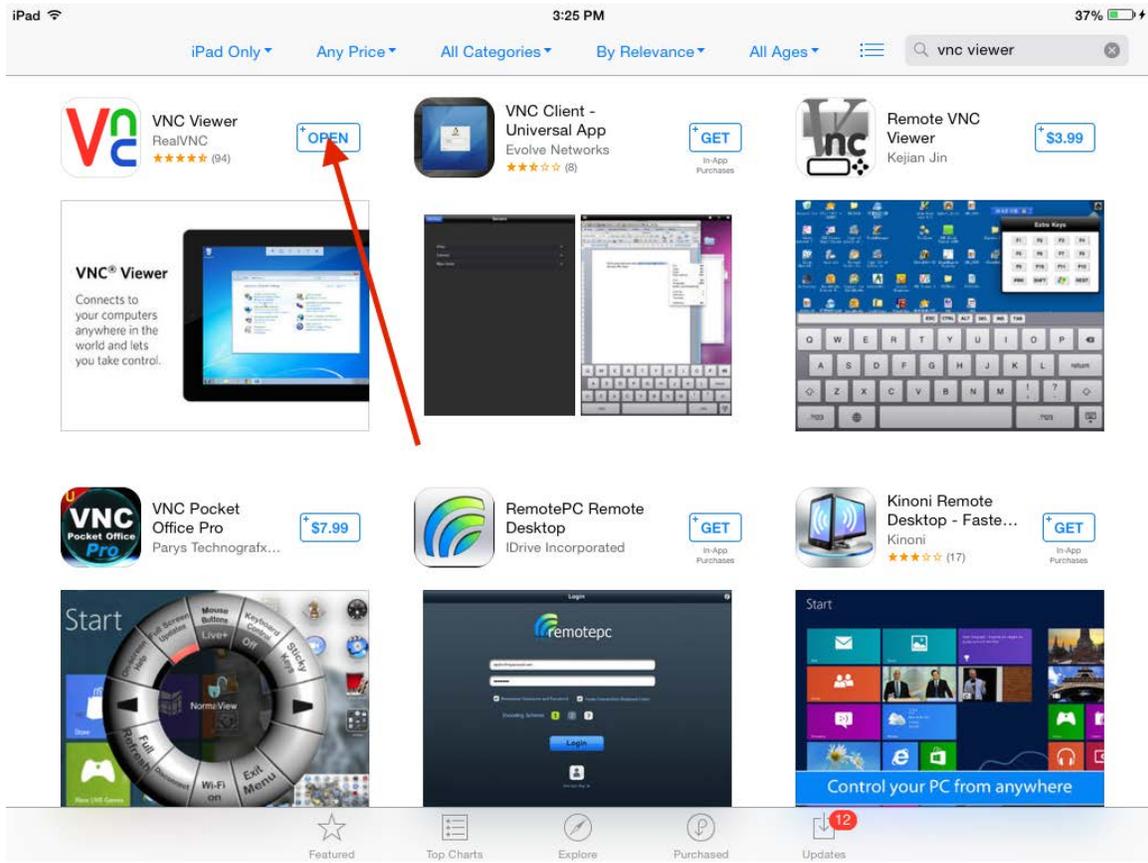


VNC VIEWER PROCEDURE

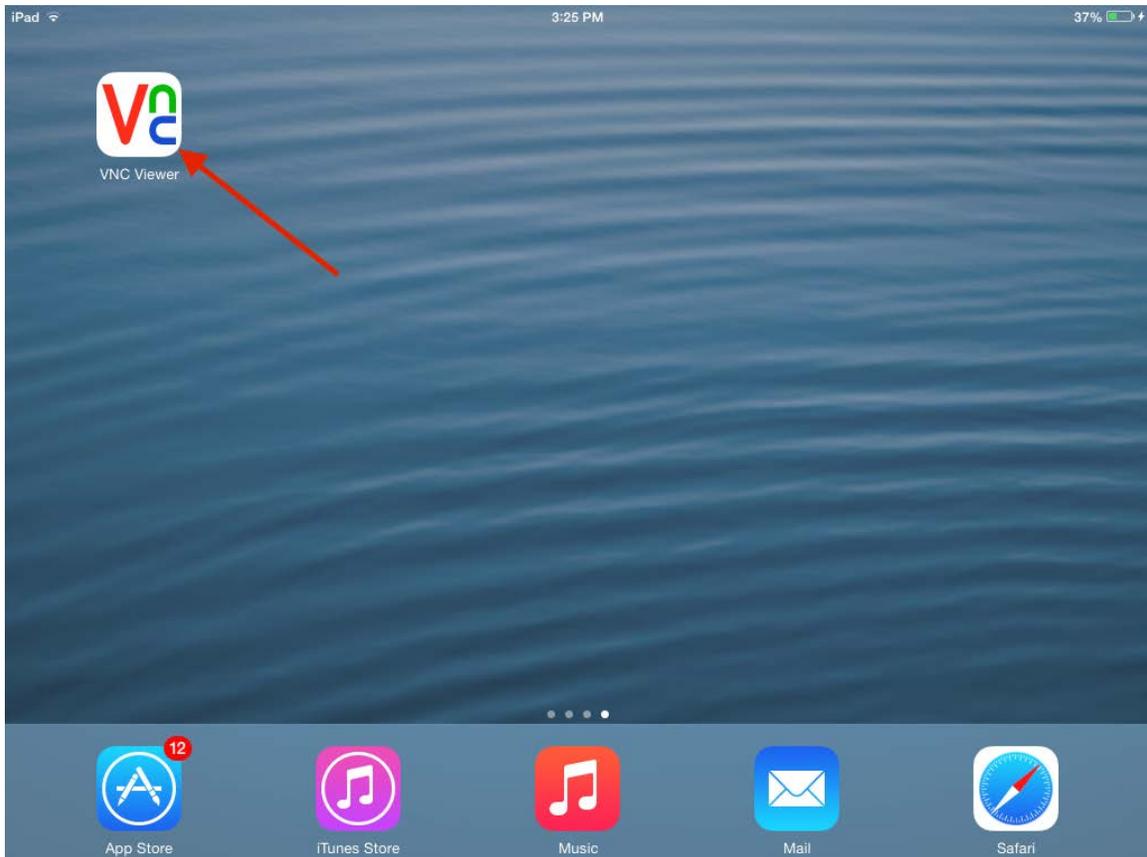
1. In the service menu, press the enable remote support button. Another menu will pop up. Press the start VNC server button, then press ok.



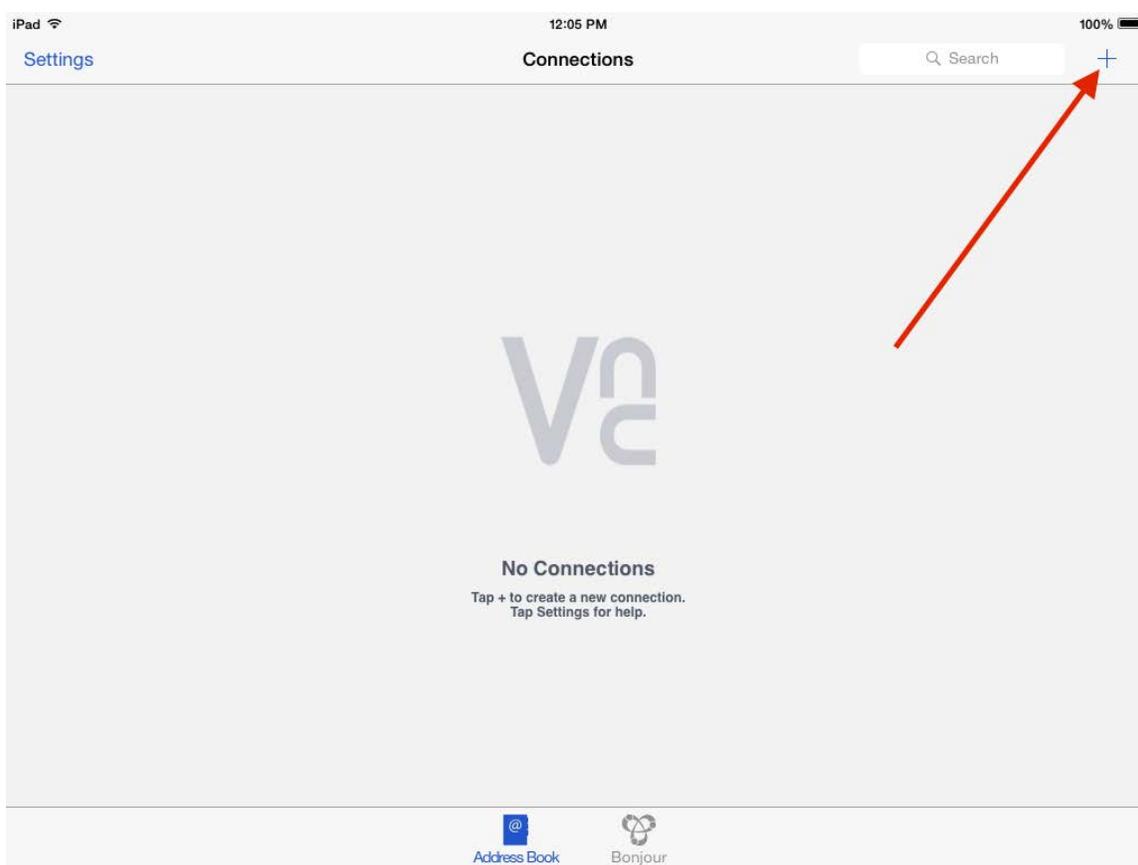
2. Download the Free VNC Viewer app from the app store.



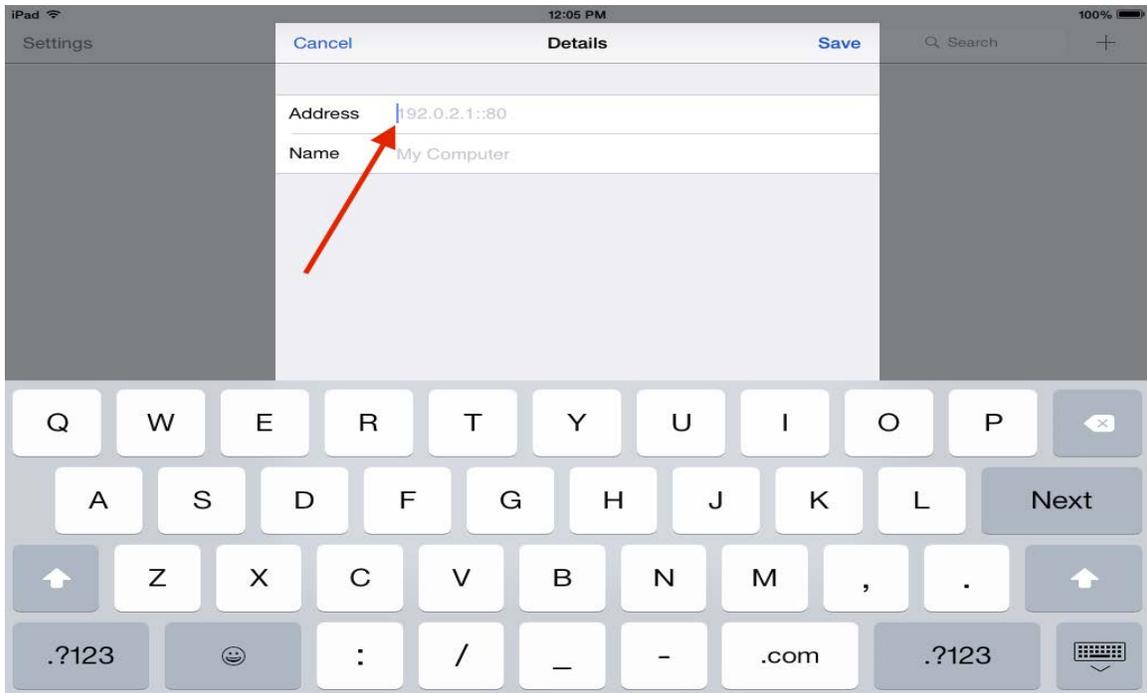
3. Select the VNC Viewer app from your device.



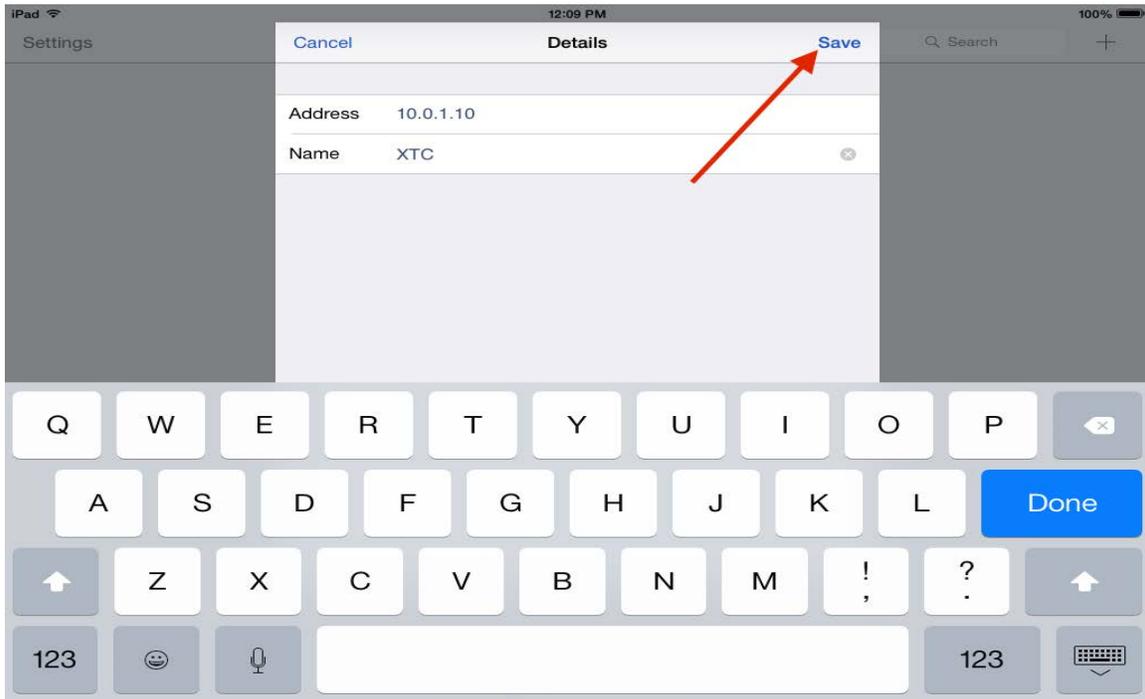
4. Press the plus sign in the upper right hand corner to set up new connection.



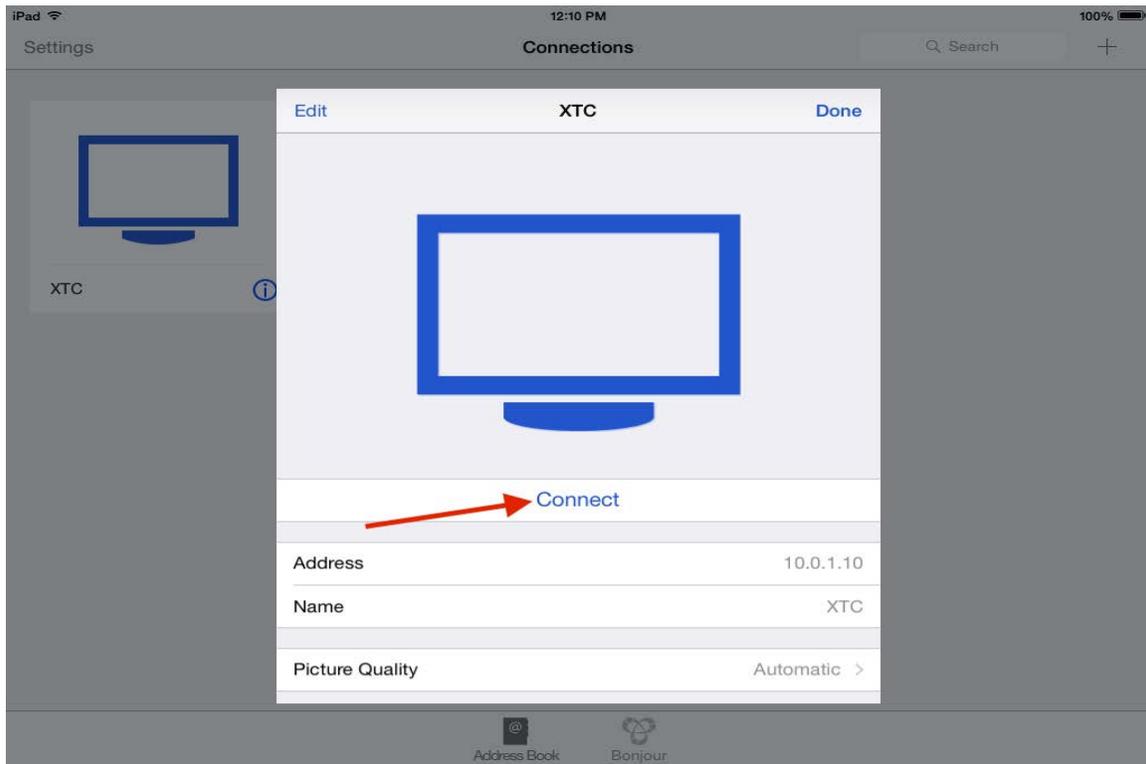
5. Type in the IP Address found in the unit's service menu, in the remote support menu at the bottom of the screen. Then give it a name.



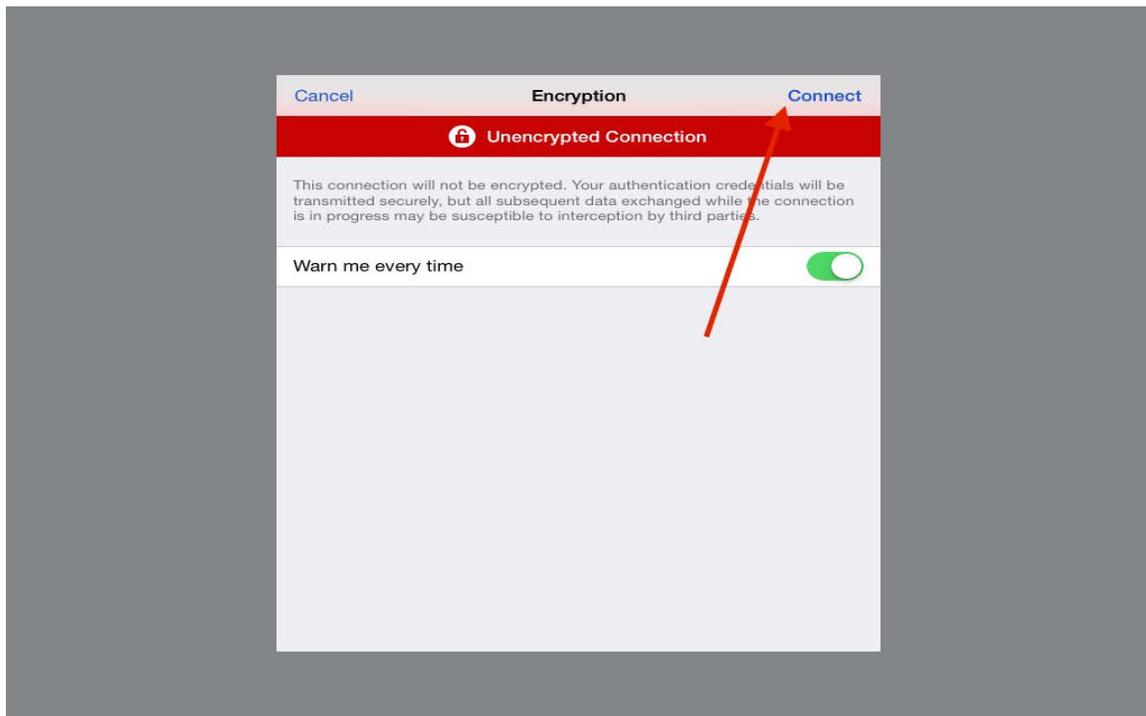
6. Example. Then press save.



7. Next press the connect button.



The following screen will pop up, press the word connect.

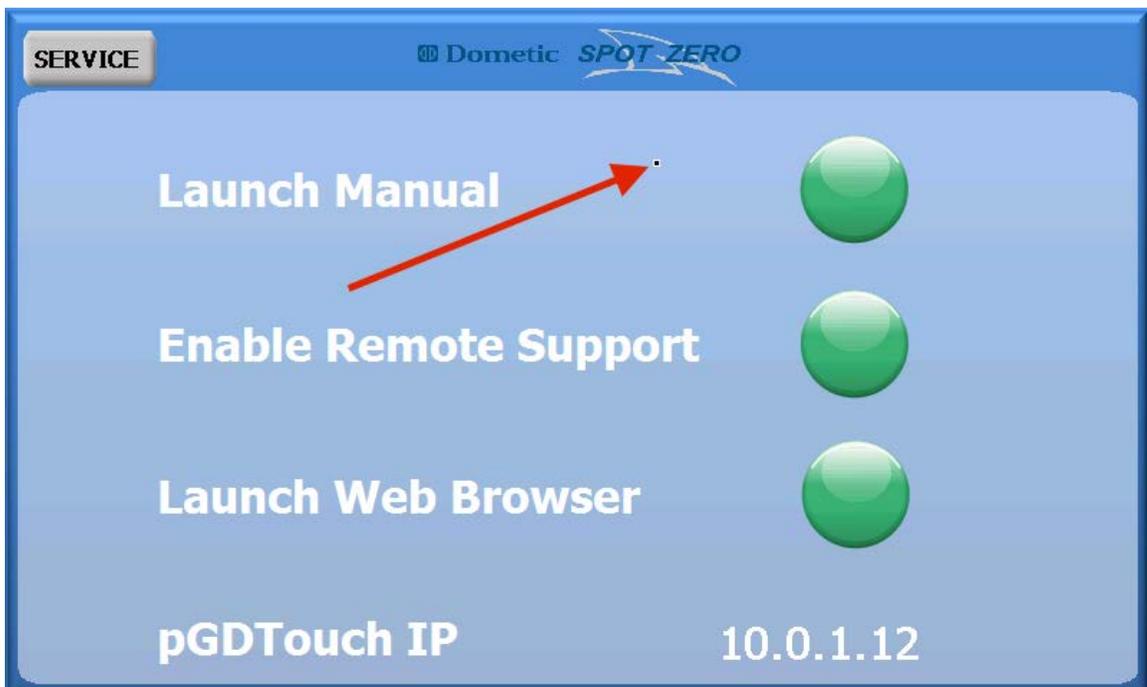


8. Finally it will show you the connecting screen, when it is done connecting you will see the same thing on your display and your device.

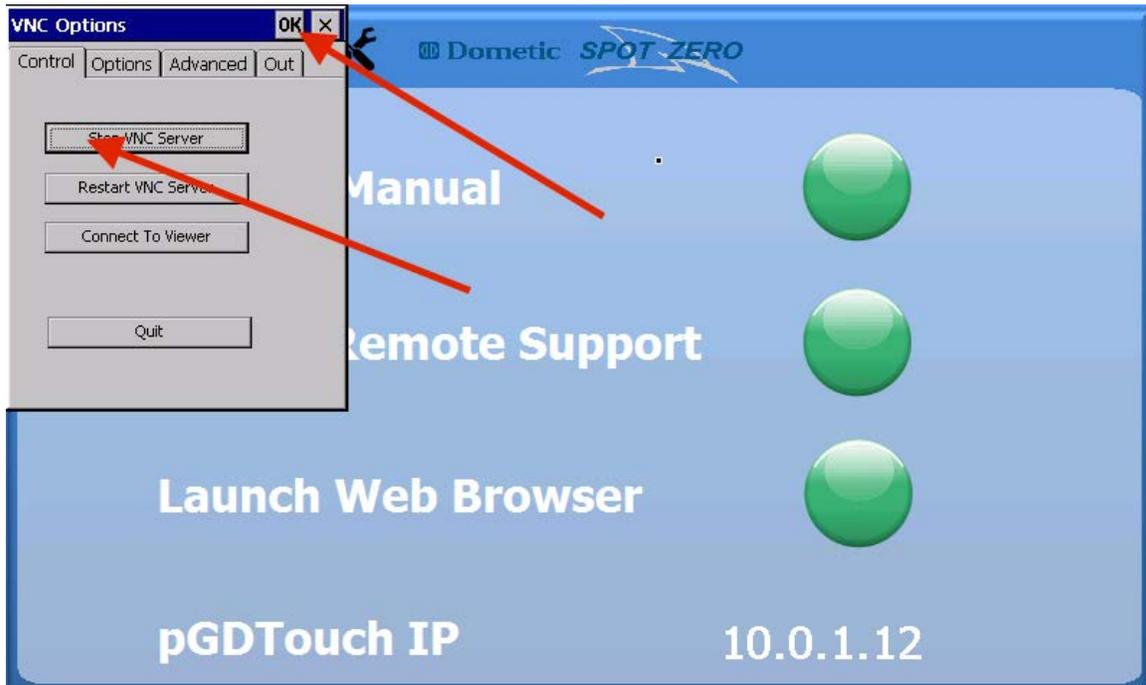


Cancel

9. On the device there will be a tiny little square dot. This is the mouse that is used to select the items on your device. Move the mouse to the item then tap the screen to select.



10. If there is a problem connecting, the enable remote support button can be pressed. Another menu will pop up. Select the start VNC server button, and press ok. Try to connect again.



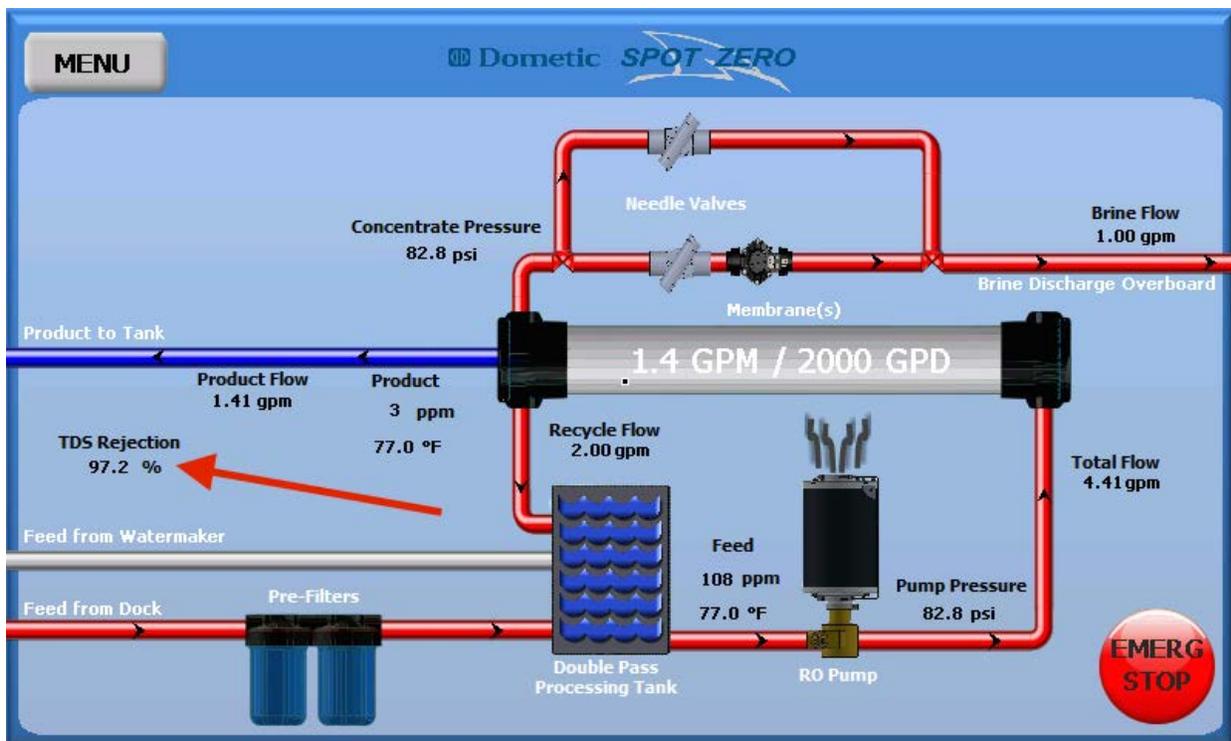
TDS Rejection

The Spot Zero ZTC reverse osmosis system is designed to reject 94% or more Total dissolved solids (TDS). The rejection percentage is calculated by the following formula.

$$\% \text{ Rejection} = (\text{Feed TDS} - \text{Product TDS}) / (\text{Feed TDS}) \times 100$$

$$\text{Example: } 96.58\% = (117 - 4) / (117) \times 100$$

This calculation is done automatically and displayed under the product to tank line on the left hand side of the home screen. This will allow the user to see how the membranes are performing at all times.



Membrane Cleaning Procedure

SZ-CCC part number 252404006

When membrane performance is reduced and is not due to temperature or feed water quality, a chemical cleaning may be required to remove scaling on the membrane film.

Note: Damage to membrane film caused by chlorine or chloramine is irreversible and cannot be corrected by chemical cleaning.

1. Procure part number 252404006 Spot Zero Chemical Cleaning Cartridge.



2. Shut off water supply to the system.
3. Disconnect product to tank and discard any product during the cleaning process.
4. Temporarily install SZ-10KDF2 in the first housing in place of SZ45-1001.
5. Insert SZ-CCC in the second housing in place of SZ-10KDF2.
6. Open concentrate valve counter clockwise until fully open.



7. Supply system with water, and allow system to run for two minutes.
8. After two minutes, shut off water supply again, and allow the membranes to soak for 2 to 24 hours.
9. After the soak time, run the system for 30 minutes by supplying water, with the concentrate valve still open, to flush membranes out.
10. Return the SZ-45-1001 filter to first housing and SZ-10KDF2 to second housing and reconnect the product to tank line, and supply the system with water.
11. Close the concentrate valve until the brine flow reads 1 GPM again. Check that the product flow is what the system is rated for if it is not the pump pressure will have to be adjusted to get the correct flows.

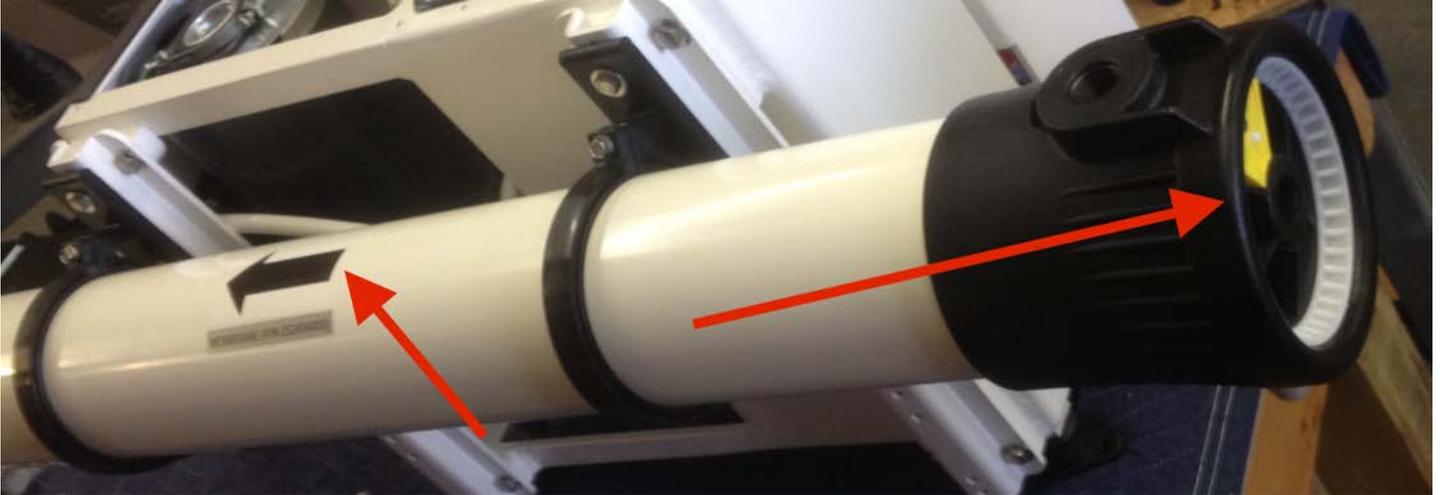
Membrane Replacement Procedure

Membrane Element Part Number 252404000

NOTE: For best results from this system, change membranes every 1,000 hours.

Changing membranes in an easy process if you have the proper information and tools. Refer to the following instructions when removing and replacing membrane elements.

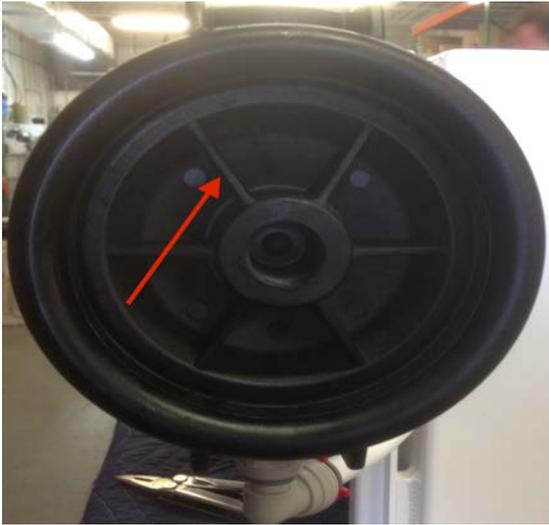
1. Locate the inlet end of the pressure vessel. That is opposite the flow direction.



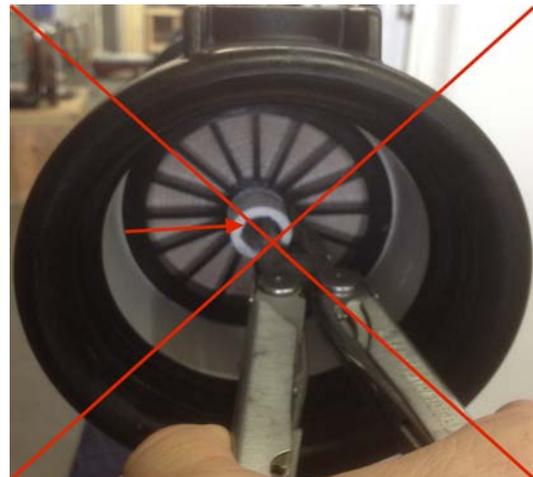
2. Remove the screw from the yellow snap ring lock at the end of the pressure vessel. Then remove the white nylon snap ring.



3. Remove the end cap from the pressure vessel.



4. Slowly remove the membrane element from the pressure vessel being careful not to grasp it by the permeate tube. Needle nose pliers may be necessary to pull the old membrane element out of the pressure vessel.



5. Remove the new membrane element from container and inspect for damage. Make sure that all parts are clean and free of debris. Examine the brine seal, and permeate tube for nicks or cuts. Replace the O-rings or brine seal if damaged.
6. Lubricate the brine seal and O-rings with a food grade lubricant.
7. Install the membrane element so the brine seal will be located at the opposite end of the flow direction.



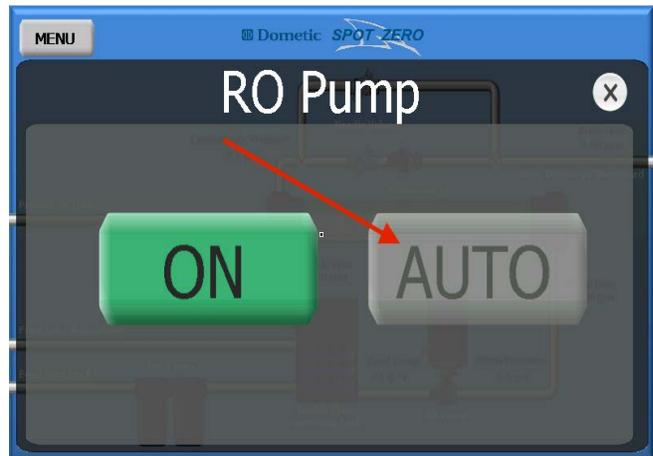
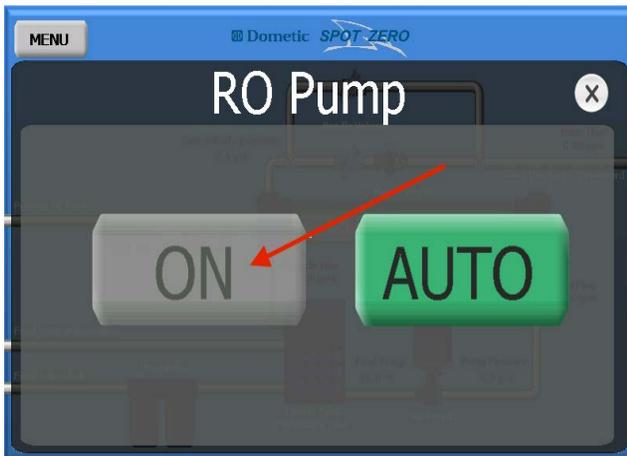
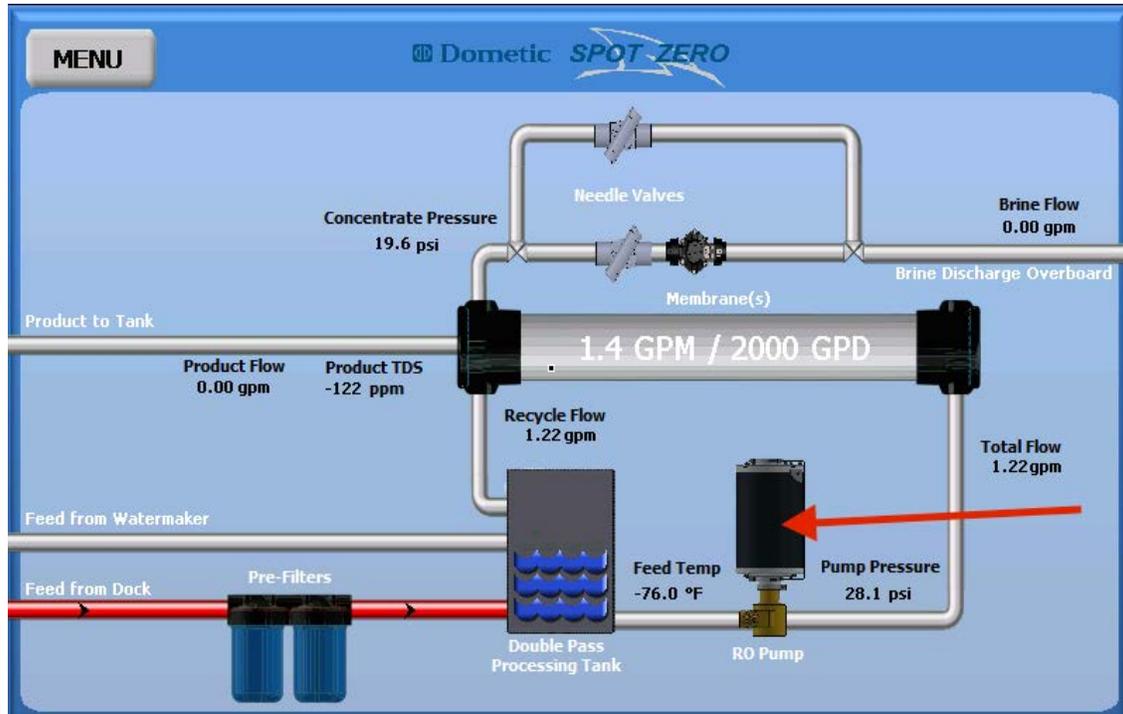
8. At a slight angle insert membrane element being careful not to tear or flip the brine seal. Re-lube the brine seal if necessary.
9. With a smooth and constant motion, push the membrane element into the housing so that the brine seal enters the housing without coming out of the brine seal groove. A slow twisting motion should be used to insert the membrane element, to ensure that the brine seal stays in place.
10. Re-install the end cap by gently twisting the end cap while pushing it into the housing. Ensure that the O-ring is not pinched or fatigued while pushing the end cap on. Push the end cap on until the outer diameter of the cap is recessed past the snap ring groove.
11. Re-install the white nylon snap ring and the yellow snap ring lock.

Note: As time progresses, the efficiency of the membrane will be reduced. The permeate flow rate will begin to decline slightly after one year of operation, but can be extended with diligent flushing and cleaning of the system. A high pH and/ or precipitation of hardness can cause premature loss in rejection of membrane elements in the system.

NOTE: For best results from this system, change membranes every 1,000 hours.

MANUAL RO PUMP OPERATION

To operate the RO pump manually press the RO pump image on the home screen then press the on button. To stop the operation of the RO pump press the auto button.



TFC Membranes

* Nominal Rejection

CHARACTERISTICS OF THIN FILM COMPOSITE POLYAMIDE MEMBRANE

Ion	Symbol	% Rejection
Aluminum	Al ⁺³	97 – 98
Ammonium	NH ₄ ⁺	85 – 95
Borate	B ₄ O ₇ ⁻²	30 – 50
Boron	B	60 – 70
Bromide	Br ⁻	93 – 96
Cadmium	Cd ⁺²	93 – 97
Calcium	Ca ⁺²	95 – 98
Chloride	Cl ⁻	92 – 98
Chromate	CrO ₄ ⁻²	85 – 95
Copper	Cu ⁺²	96 – 98
Fluoride	F ⁻	93 – 95
Iron	Fe ⁺²	96 – 98
Lead	Pb ⁺²	95 – 98
Manganese	Mn ⁺²	97 – 98
Magnesium	Mg ⁺²	95 – 98
Mercury	Hg ⁺²	95 – 97
Nickel	Ni ⁺²	97 – 98
Nitrate	NO ₃ ⁻	90 – 95
Phosphate	PO ₄ ⁻³	95 – 98
Polyphosphate		96 – 98
Potassium	K ⁺	92 – 96
Silica	Si	85 – 90
Silicate	SiO ₂ ⁻²	92 – 95
Silver	Ag ⁺	95 – 97
Sodium	Na ⁺	92 – 98
Sulfate	SO ₄ ⁻²	96 – 98
Thiosulfate	S ₂ O ₃ ⁻²	97 – 98
Zinc	Zn ⁺²	97 – 99

CTA Membranes

* Nominal Rejection

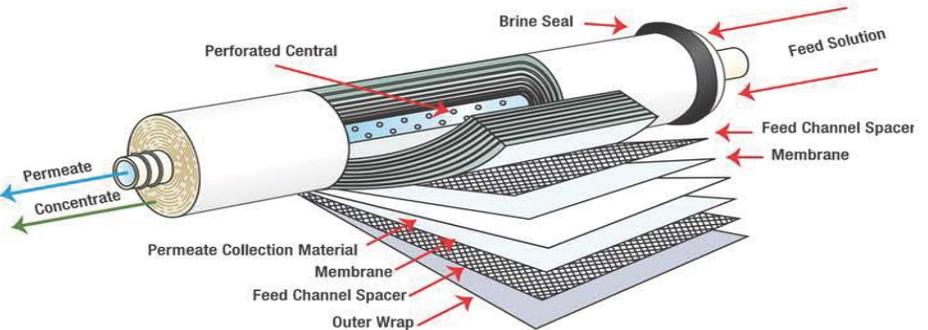
CHARACTERISTICS OF CELLULOSE ACETATE MEMBRANE

Ion	Symbol	% Rejection
Aluminum	Al ⁺³	96 – 99
Ammonium	NH ₄ ⁺	85 – 95
Barium	Ba ⁺²	94 – 96
Bicarbonate	HCO ₃	90 – 95
Borate	B ₄ O ₇ ⁻²	25 – 50
Bromide	Br ⁻	87 – 93
Cadmium	Cd ⁺²	96 – 98
Calcium	Ca ⁺²	92 – 95
Chloride	Cl ⁻	90 – 95
Chromate	CrO ₄ ⁻²	80 – 90
Chromium	Cr ⁺³	96 – 98
Copper	Cu ⁺²	98 – 99
Fluoride	F ⁻	87 – 93
Iron	Fe ⁺²	95 – 98
Lead	Pb ⁺²	96 – 98
Manganese	Mn ⁺²	92 – 96
Magnesium	Mg ⁺²	96 – 98
Mercury	Hg ⁺²	96 – 98
Nickel	Ni ⁺²	96 – 98
Nitrate	NO ₃ ⁻	50 – 70
Phosphate	PO ₄ ⁻³	96 – 99
Potassium	K ⁺	85 – 95
Silicate	SiO ₂ ⁻²	80 – 90
Silver	Ag ⁺	90 – 95
Sodium	Na ⁺	87 – 93
Sulfate	SO ₄ ⁻²	98 – 99
Thiosulfate	S ₂ O ₃ ⁻²	96 – 99
Zinc	Zn ⁺²	98 – 99

* The above percent of rejection is for reference only and not to be construed as chemistry, temperature, and TDS are not constant in each water supply.

Reverse Osmosis – How Does it Work

Reverse osmosis (RO) is a separation process that uses pressure to force a solvent through a membrane that retains the solute on one side and allows the pure solvent to pass to the other side. More formally, it is the process of forcing a solvent from a region of high solute concentration through a membrane to a region of low solute concentration by applying a pressure in excess of the osmotic pressure. This is the reverse of the normal osmosis process, which is the natural movement of solvent from an area of low solute concentration, through a membrane, to an area of high solute concentration when no external pressure is applied. The membrane here is semipermeable, meaning it allows the passage of solvent but not of solute.





Membrane Temperature Correction Factor

Temperature °F (°C)	Temperature Correction Factor	Temperature °F (°C)	Temperature Correction Factor	Temperature °F (°C)	Temperature Correction Factor	Temperature °F (°C)	Temperature Correction Factor	Temperature °F (°C)	Temperature Correction Factor
50.0 (10.0)	1.711	57.2 (14.0)	1.475	64.4 (18.0)	1.276	71.6 (22.0)	1.109	78.8 (26.0)	0.971
50.2 (10.1)	1.705	57.4 (14.1)	1.469	64.6 (18.1)	1.272	71.8 (22.1)	1.105	79.0 (26.1)	0.968
50.4 (10.2)	1.698	57.6 (14.2)	1.464	64.8 (18.2)	1.267	72.0 (22.2)	1.101	79.2 (26.2)	0.965
50.5 (10.3)	1.692	57.7 (14.3)	1.459	64.9 (18.3)	1.262	72.1 (22.3)	1.097	79.3 (26.3)	0.962
50.7 (10.4)	1.686	57.9 (14.4)	1.453	65.1 (18.4)	1.258	72.3 (22.4)	1.093	79.5 (26.4)	0.959
50.9 (10.5)	1.679	58.1 (14.5)	1.448	65.3 (18.5)	1.254	72.5 (22.5)	1.090	79.7 (26.5)	0.957
51.1 (10.6)	1.673	58.3 (14.6)	1.443	65.5 (18.6)	1.249	72.7 (22.6)	1.086	79.9 (26.6)	0.954
51.3 (10.7)	1.667	58.5 (14.7)	1.437	65.7 (18.7)	1.245	72.9 (22.7)	1.082	80.1 (26.7)	0.951
51.4 (10.8)	1.660	58.6 (14.8)	1.432	65.8 (18.8)	1.240	73.0 (22.8)	1.078	80.2 (26.8)	0.948
51.6 (10.9)	1.654	58.8 (14.9)	1.427	66.0 (18.9)	1.236	73.2 (22.9)	1.075	80.4 (26.9)	0.945
51.8 (11.0)	1.648	59.0 (15.0)	1.422	66.2 (19.0)	1.232	73.4 (23.0)	1.071	80.6 (27.0)	0.943
52.0 (11.1)	1.642	59.2 (15.1)	1.417	66.4 (19.1)	1.227	73.6 (23.1)	1.067	80.8 (27.1)	0.940
52.2 (11.2)	1.636	59.4 (15.2)	1.411	66.6 (19.2)	1.223	73.8 (23.2)	1.064	81.0 (27.2)	0.937
52.3 (11.3)	1.630	59.5 (15.3)	1.406	66.7 (19.3)	1.219	73.9 (23.3)	1.060	81.1 (27.3)	0.934
52.5 (11.4)	1.624	59.7 (15.4)	1.401	66.9 (19.4)	1.214	74.1 (23.4)	1.056	81.3 (27.4)	0.932
52.7 (11.5)	1.618	59.9 (15.5)	1.396	67.1 (19.5)	1.210	74.3 (23.5)	1.053	81.5 (27.5)	0.929
52.9 (11.6)	1.611	60.1 (15.6)	1.391	67.3 (19.6)	1.206	74.5 (23.6)	1.049	81.7 (27.6)	0.926
53.1 (11.7)	1.605	60.3 (15.7)	1.386	67.5 (19.7)	1.201	74.7 (23.7)	1.045	81.9 (27.7)	0.924
53.2 (11.8)	1.600	60.4 (15.8)	1.381	67.6 (19.8)	1.197	74.8 (23.8)	1.042	82.0 (27.8)	0.921
53.4 (11.9)	1.594	60.6 (15.9)	1.376	67.8 (19.9)	1.193	75.0 (23.9)	1.038	82.2 (27.9)	0.918
53.6 (12.0)	1.588	60.8 (16.0)	1.371	68.0 (20.0)	1.189	75.2 (24.0)	1.035	82.4 (28.0)	0.915
53.8 (12.1)	1.582	61.0 (16.1)	1.366	68.2 (20.1)	1.185	75.4 (24.1)	1.031	82.6 (28.1)	0.913
54.0 (12.2)	1.576	61.2 (16.2)	1.361	68.4 (20.2)	1.180	75.6 (24.2)	1.028	82.8 (28.2)	0.910
54.1 (12.3)	1.570	61.3 (16.3)	1.356	68.5 (20.3)	1.176	75.7 (24.3)	1.024	82.9 (28.3)	0.908
54.3 (12.4)	1.564	61.5 (16.4)	1.351	68.7 (20.4)	1.172	75.9 (24.4)	1.021	83.1 (28.4)	0.905
54.5 (12.5)	1.558	61.7 (16.5)	1.347	68.9 (20.5)	1.168	76.1 (24.5)	1.017	83.3 (28.5)	0.902
54.7 (12.6)	1.553	61.9 (16.6)	1.342	69.1 (20.6)	1.164	76.3 (24.6)	1.014	83.5 (28.6)	0.900
54.9 (12.7)	1.547	62.1 (16.7)	1.337	69.3 (20.7)	1.160	76.5 (24.7)	1.010	83.7 (28.7)	0.897
55.0 (12.8)	1.541	62.2 (16.8)	1.332	69.4 (20.8)	1.156	76.6 (24.8)	1.007	83.8 (28.8)	0.894
55.2 (12.9)	1.536	62.4 (16.9)	1.327	69.6 (20.9)	1.152	76.8 (24.9)	1.003	84.0 (28.9)	0.892
55.4 (13.0)	1.530	62.6 (17.0)	1.323	69.8 (21.0)	1.148	77.0 (25.0)	1.000	84.2 (29.0)	0.889
55.6 (13.1)	1.524	62.8 (17.1)	1.318	70.0 (21.1)	1.144	77.2 (25.1)	0.997	84.4 (29.1)	0.887
55.8 (13.2)	1.519	63.0 (17.2)	1.313	70.2 (21.2)	1.140	77.4 (25.2)	0.994	84.6 (29.2)	0.884
55.9 (13.3)	1.513	63.1 (17.3)	1.308	70.3 (21.3)	1.136	77.5 (25.3)	0.991	84.7 (29.3)	0.882
56.1 (13.4)	1.508	63.3 (17.4)	1.304	70.5 (21.4)	1.132	77.7 (25.4)	0.988	84.9 (29.4)	0.879
56.3 (13.5)	1.502	63.5 (17.5)	1.299	70.7 (21.5)	1.128	77.9 (25.5)	0.985	85.1 (29.5)	0.877
56.5 (13.6)	1.496	63.7 (17.6)	1.294	70.9 (21.6)	1.124	78.1 (25.6)	0.982	85.3 (29.6)	0.874
56.7 (13.7)	1.491	63.9 (17.7)	1.290	71.1 (21.7)	1.120	78.3 (25.7)	0.979	85.5 (29.7)	0.871
56.8 (13.8)	1.486	64.0 (17.8)	1.285	71.2 (21.8)	1.116	78.4 (25.8)	0.977	85.6 (29.8)	0.869
57.0 (13.9)	1.480	64.2 (17.9)	1.281	71.4 (21.9)	1.112	78.6 (25.9)	0.974	85.8 (29.9)	0.866

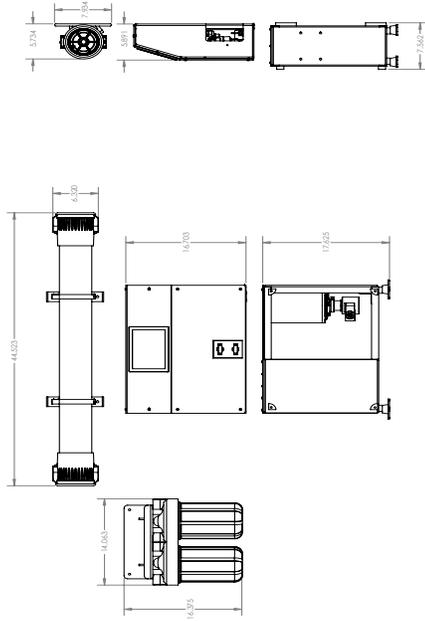
°F = (°C × 9/5) + 32

Corrected Flow Rate = (Measured Flow Rate) * (TCF @ Feed Water Temp.)

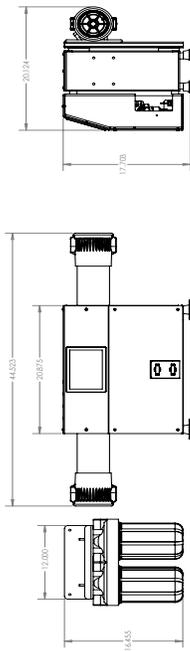


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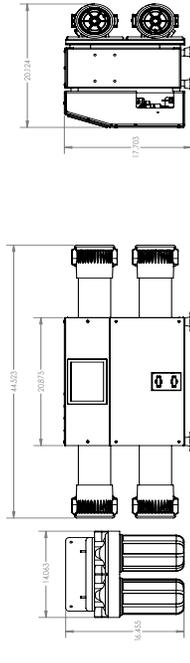
SPOT ZERO XTC 2000 MODULAR



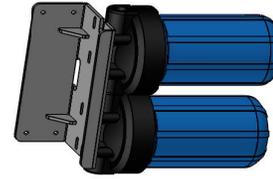
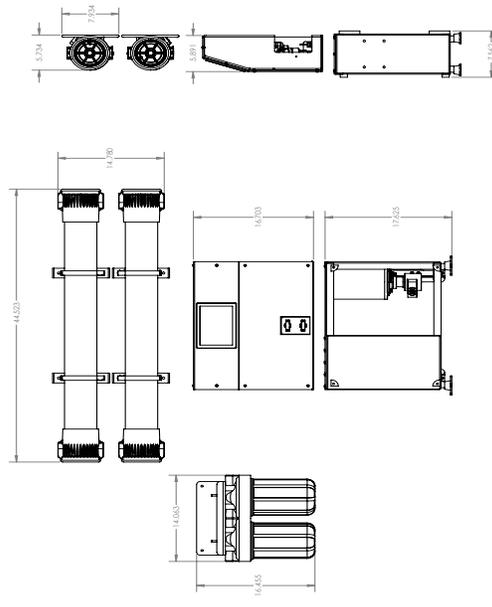
SPOT ZERO XTC 2000



SPOT ZERO XTC 3000

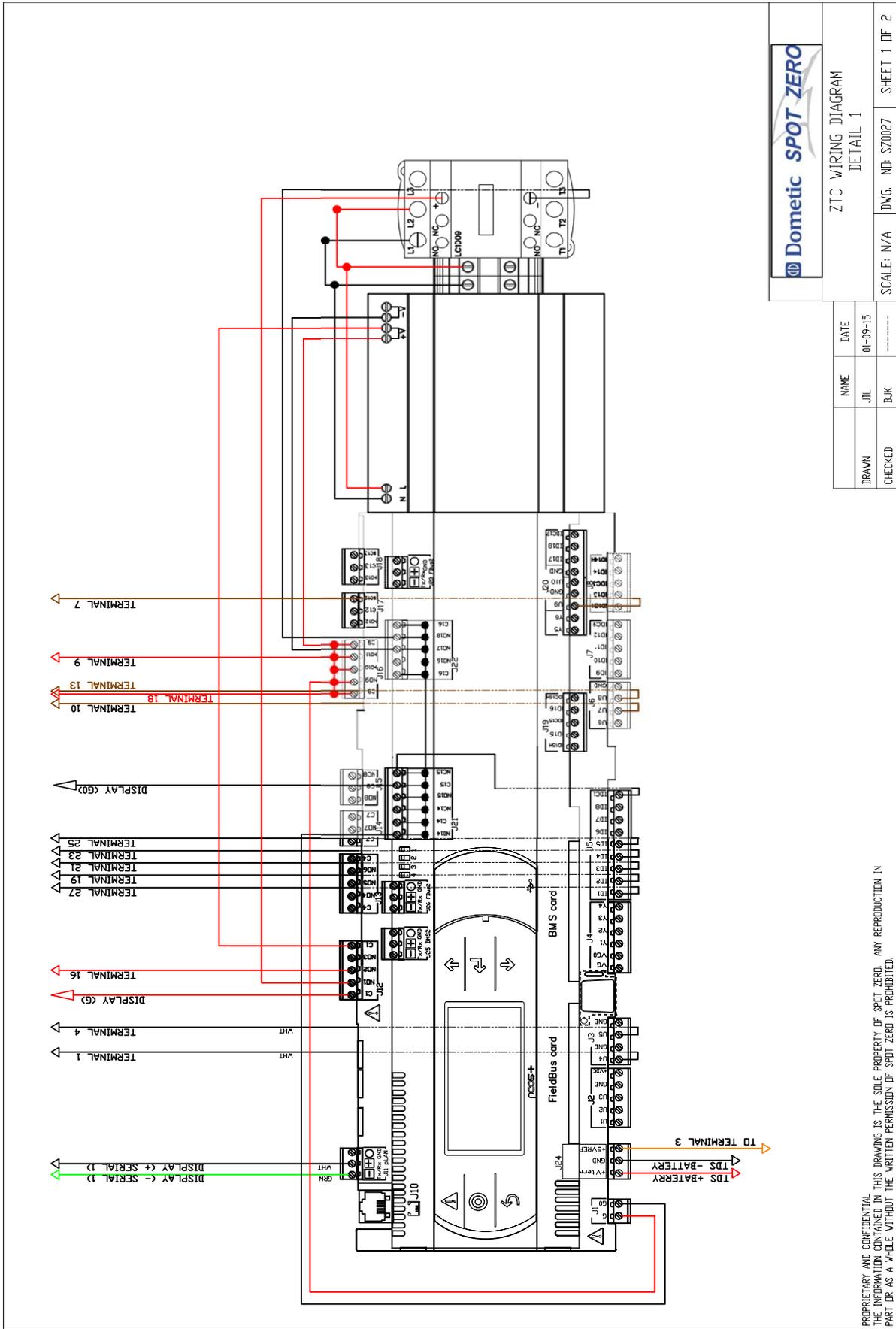


SPOT ZERO XTC 3000 MODULAR



Domestik SPOT ZERO XTC

ITEM NO.	DESCRIPTION	QTY	UNIT
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2	SPOT ZERO XTC	1	PC
3	SPOT ZERO XTC	1	PC
4	SPOT ZERO XTC	1	PC
5	SPOT ZERO XTC	1	PC
6	SPOT ZERO XTC	1	PC
7	SPOT ZERO XTC	1	PC
8	SPOT ZERO XTC	1	PC
9	SPOT ZERO XTC	1	PC
10	SPOT ZERO XTC	1	PC
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99	SPOT ZERO XTC	1	PC
100	SPOT ZERO XTC	1	PC



Dometic SPOT ZERO

ZTC WIRING DIAGRAM
DETAIL 1

NAME	DATE
JIL	01-09-15
CHECKED	BJK
SCALE: N/A	DWG. NO: SZ0027
SHEET 1 OF 2	

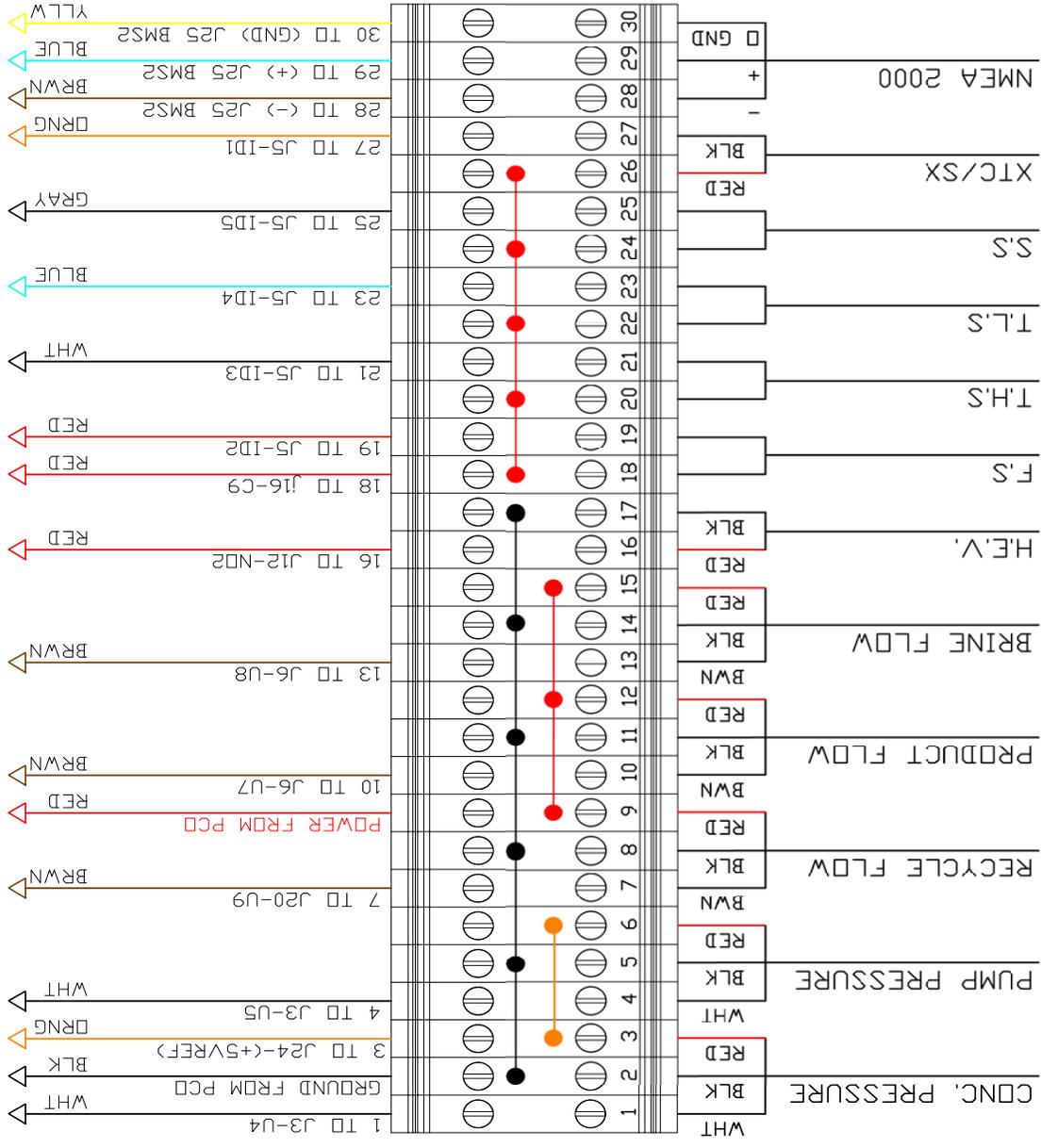
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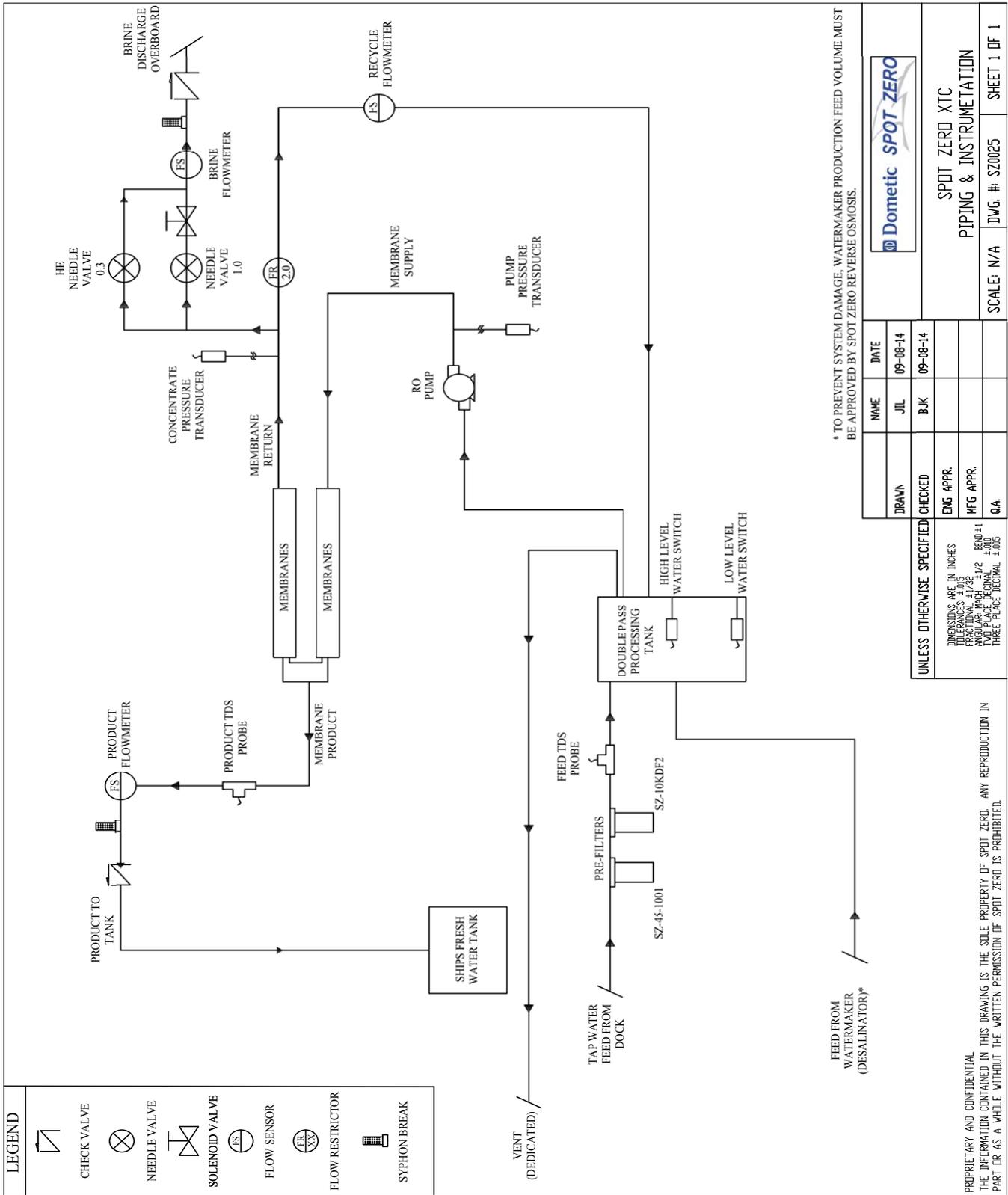
ZTC WIRING DIAGRAM
DETAIL 2

NAME	DATE
JIL	01-08-15
CHECKED	08-06-14
DRAWN	JJ

SCALE: N/A DWG. NO: SZ0027 SHEET 2 OF 2



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LEGEND	
	CHECK VALVE
	NEEDLE VALVE
	SOLENOID VALVE
	FLOW SENSOR
	FLOW RESTRICTOR
	SYPHON BREAK

* TO PREVENT SYSTEM DAMAGE, WATERMAKER PRODUCTION FEED VOLUME MUST BE APPROVED BY SPOT ZERO REVERSE OSMOSIS.

DRAWN		NAME	JIL	DATE	09-08-14
CHECKED		NAME	BJK	DATE	09-08-14
ENGINEER		NAME		DATE	
MANUFACTURER		NAME		DATE	
QA		NAME		DATE	

UNLESS OTHERWISE SPECIFIED: CHECKED

DIMENSIONS ARE IN INCHES
 DECIMALS - 1/32
 FRACTIONS - 1/2
 ANGULAR - MACH ± 1/2
 TAP PLACES - DECIMAL ± .005
 THREE PLACE DECIMAL ± .003



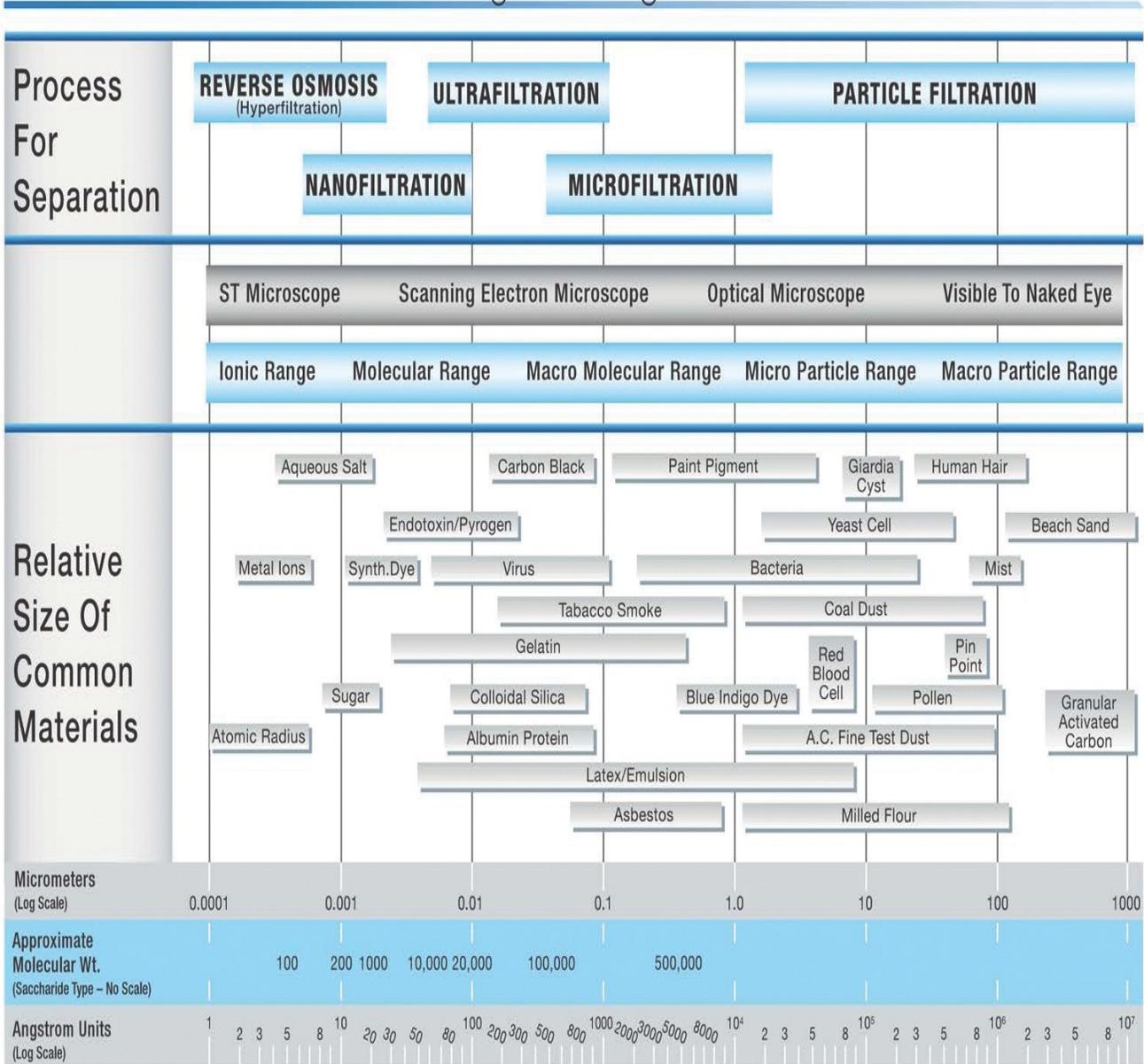
SPOT ZERO XTC
PIPING & INSTRUMENTATION

SCALE: N/A DWG. # SZ0025 SHEET 1 OF 1

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Water Filtration Range & Sizing Table



NOTE: 1 Micron (1 X 10.6 Meters) = 4 X 10.5 Inches (0.00004 Inches)

1 Angstrom Unit = 10.10 Meters = 10.4 Micrometers (Microns)



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