



# OptiSoft Softeners Simple Install Steps 1-17

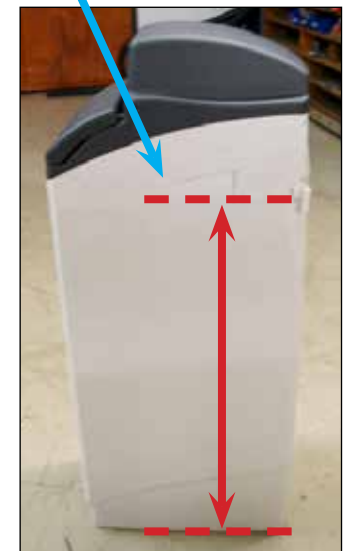
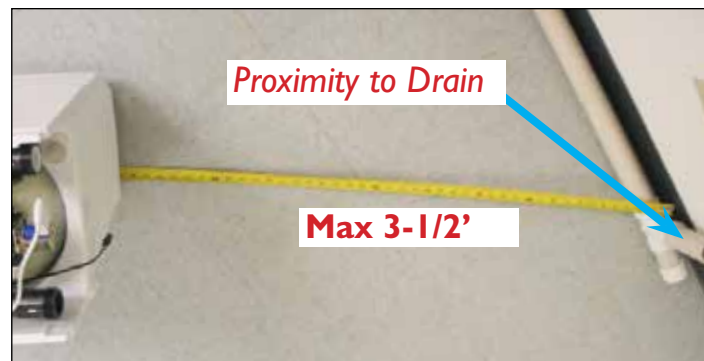
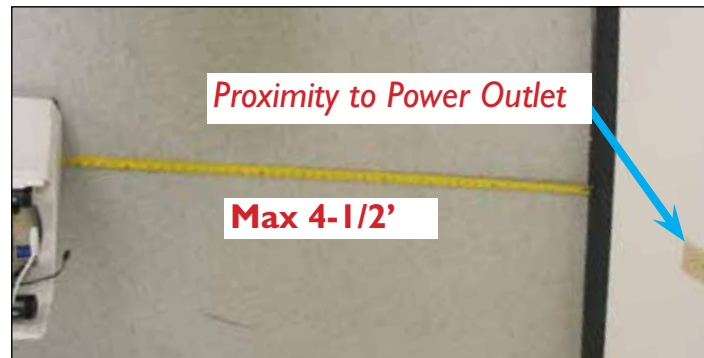
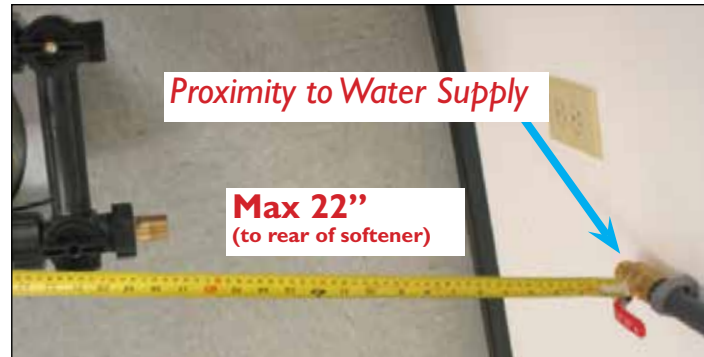
(models OS-10,  
OS-13, OS-20 & OS-29)

Refer to Installation, Operation &  
Maintenance Manual for More Details

**OptiPure**<sup>™</sup>

## ❖ Installation Requirements

- Installation must conform to all local codes and regulations.
- System must be installed indoors, easily accessed for service and maintenance.
- Install System as close as possible to the equipment served.
- Feed water: 20-120 psi/35-120° F (or max 73 psi at 149° F)
- A minimum ½" dedicated water supply with a ¾" ball valve (½" minimum), with ¾" male NPT fitting at outlet, located within 22" of rear of softener.
- Power outlet, 110VAC, 17W, within 4-½ft.
- Drain requirements:
  - Drain within 3-½ft.
  - Drain connection 1-¼" or 1-½" PVC pipe
  - Use supplied air gap fitting
  - Drain as close to the floor as possible.



## ❖ Unpack & Open



### Step 1a

Unpack the softener & parts from the box. Place softener upright on floor. Remove the salt lid.



### Step 1b

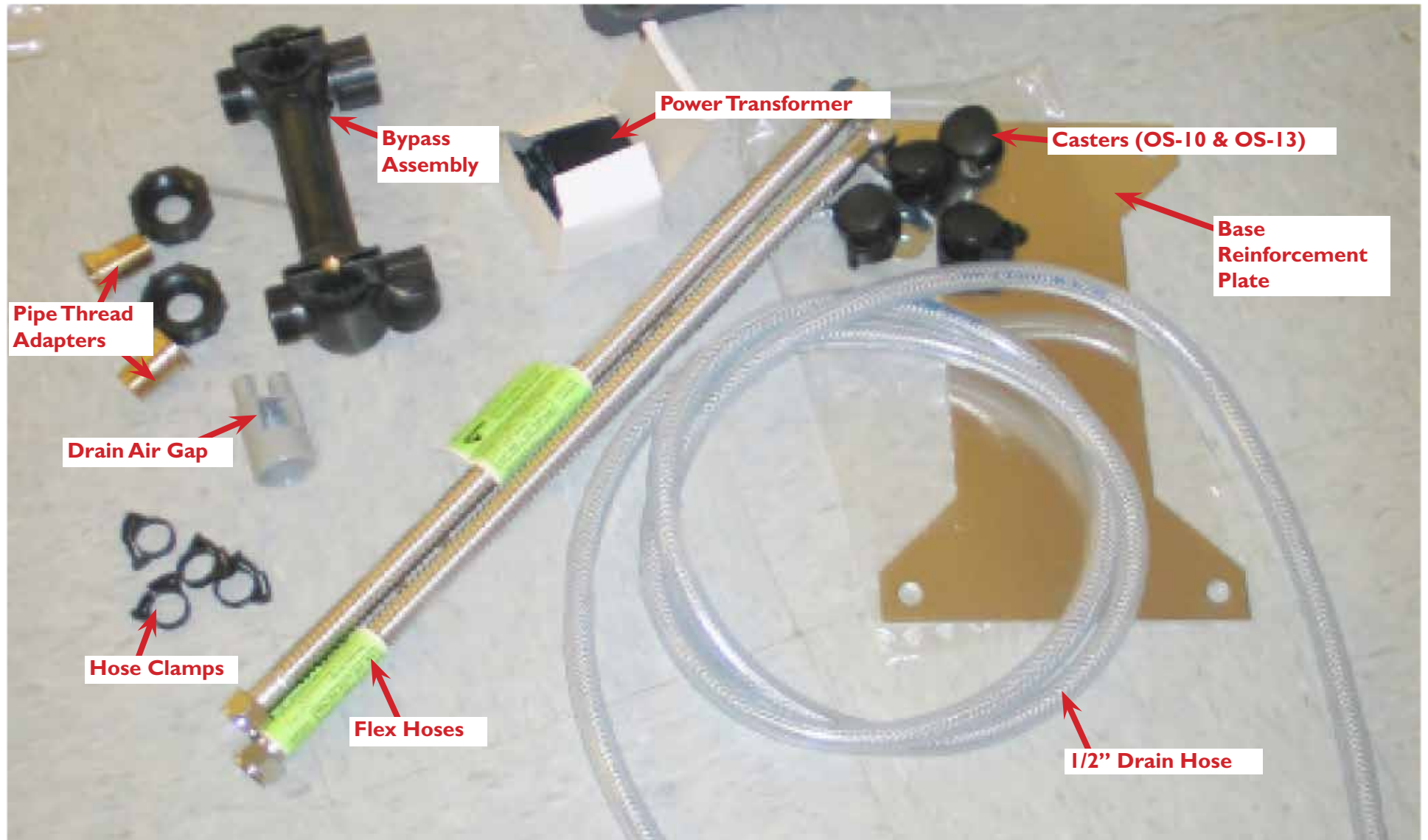
Remove bagged parts from inside the brine tank.



### Step 1c

Remove rivets at front corners with phillips screwdriver. Remove cover.

## ❖ Identify Parts - Step 1d



## ❖ Install Baseplate & Casters (OS-10 & OS-13 only)

### Step 2a

Place the softener on its side.



### Step 2b

Holding the metal reinforcement plate in place on the bottom of the softener cabinet, screw in and tighten the caster studs at the four corners, using the supplied washers under each nut.



### Step 2c

Place the two casters with brakes at the front of the softener.



### Step 2d

Push each caster into place until it clicks.



### Step 2e

Place the cabinet upright in its final position.

## ❖ Connect Control Valve Drain Hose



### Step 3a

Install the long hose onto the control valve drain hose connection (left side of the control valve).



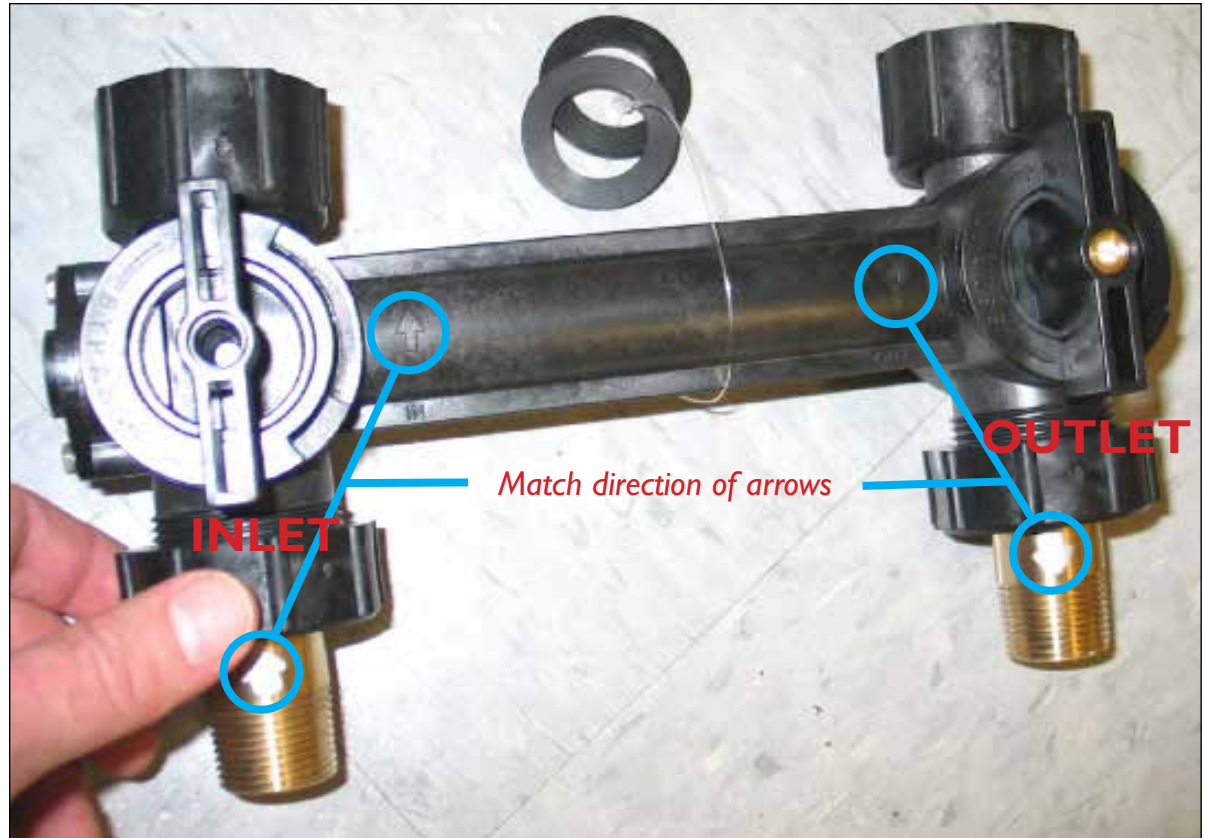
### Step 3b

Secure it with a plastic clamp, and tighten the clamp with pliers.

## ❖ Install Thread Adapters Onto Bypass Assembly

### Step 4a

Identify the pipe thread adapter parts (brass fitting, black plastic nut & gasket). For each adapter, place the nut over the brass fitting & the gasket inside the end of the nut.



### Step 4b

Hold bypass assembly with valve handles facing upward, as shown. Thread the inlet adapter onto the inlet of the bypass assembly. (See arrows on adapters.) Tighten by hand.

### Step 4c

Install the outlet adapter onto the outlet of the bypass assembly. Tighten by hand.

## ❖ Install Bypass Assembly



### Step 5a

Take the gaskets that come with the bypass assembly & place one inside each of the black swivel nuts on the assembly.

### Step 5b

Install the bypass assembly onto the inlet/outlet connections on the rear of the control valve.



### Step 5c

Tighten all the water connections (black swivel nuts) on softener using slip-joint pliers, but do not overtighten & crack the fittings.





## ❖ Connect Feed to Inlet



*Flex hose uses a rubber gasket to seal against end of fitting it is connected to. No thread tape needed.*

*Nut swivels for easy connection*



*Male fitting (3/4" NPT) required at feed valve*

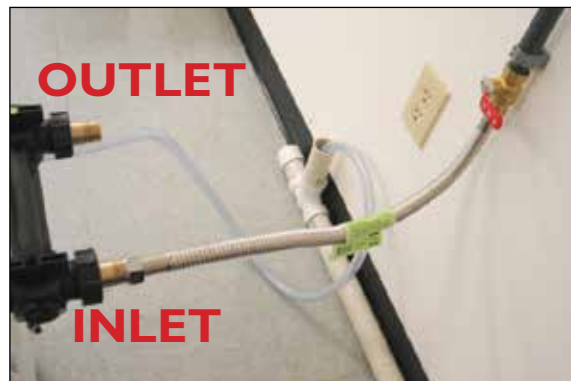
*NOTE: Do not hard-plumb all the way to the softener using metal or plastic pipe.*

### Step 6a

Thread one of the 24" long metal flex hoses onto the feed water supply valve. (Use the one that has no tubing attached to it.)

### Step 6b

Bend the flex hose as needed to route it to softener inlet.



### Step 6c

Connect the other end to the inlet of the bypass assembly.

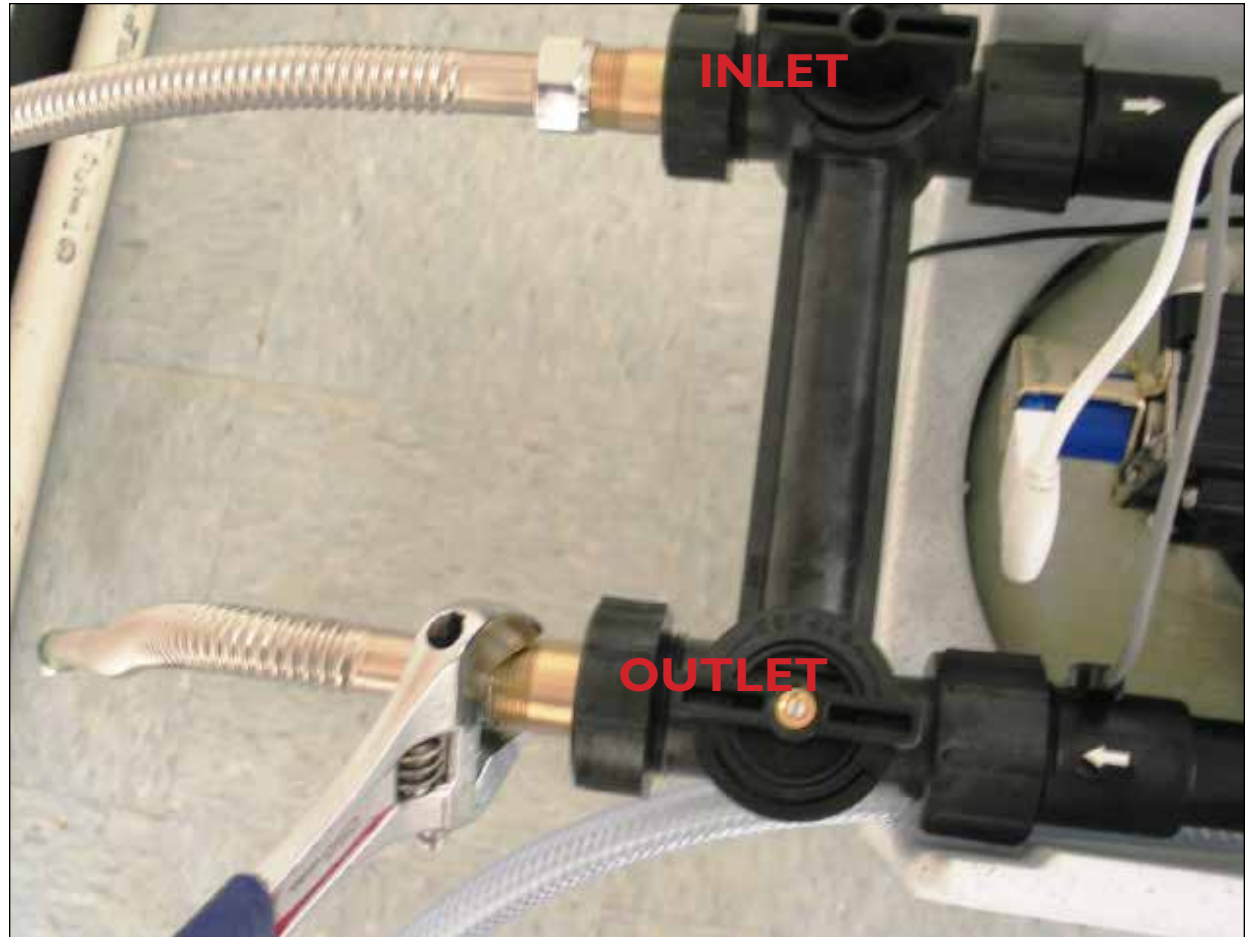
### Step 6d

Tighten the nuts at both ends snugly with a wrench, but **NOT as tight as ordinary pipe fittings**; over-tightening will damage the rubber seals.

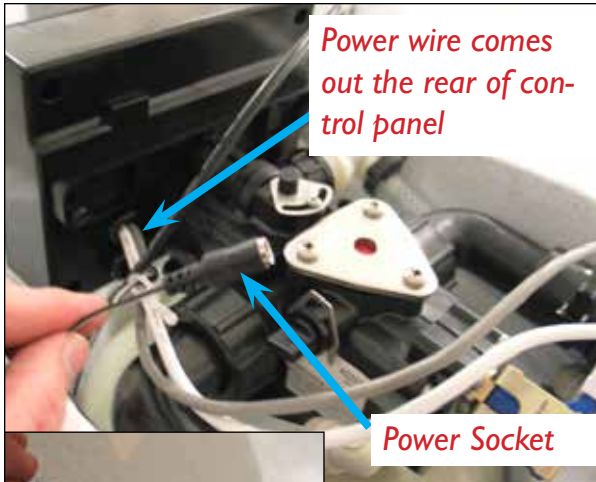
## ❖ Connect Outlet to Drain

### Step 7

Attach the other end of the flex hose to the outlet of the bypass assembly and tighten the nut.



## ❖ Power Up Control Panel



### Step 8a

Plug the power transformer output connector to the softener power socket. Secure the wires together with the twist clamp to prevent them from inadvertently coming unplugged.



### Step 8b

Plug the transformer into the electrical outlet.



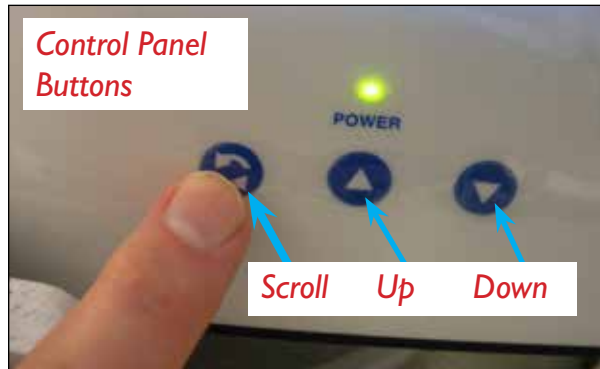
## ❖ Do a Hardness Test

### Step 9

Perform a total hardness test on the feed water, & record the result, noting the units used. (Grains, or “gpg,” are preferred. If your test results are in “mg/L” or “ppm”, divide this number by 17.1 to convert to grains.)



## ❖ Setup Control Panel



### IMPORTANT:

After completing the following settings, the up or down button **MUST** be pressed for any setting changes to be saved.

**Step 10a** - On the control panel, press and **hold** the SCROLL button until display shows:

Language:English

### Step 10b

Press and release SCROLL -

Shows: Set time: 8:01AM

- then press UP or DOWN to set the current time.

### Step 10c

Press and release SCROLL -

shows: HardUnit: Grns

- then press UP or DOWN to change to the desired units for hardness.

### Step 10d

Press and release SCROLL -

shows: Set Hardn: 10 gpg

- then press UP or DOWN to set the hardness to that of your feed water (determined in step 10).

### Step 10e

Press and release SCROLL -

shows: Exit

- then press UP or DOWN to save the settings you entered and return to normal operating mode.



## ❖ Startup Softener



### Step 1 Ia

Ensure both valves on the bypass assembly are in "bypass" position.

### Step 1 Ib

Use flathead screwdriver to close the hardness blend adjustment valve: turn all the way clockwise.



### Step 1 Ic



Slowly open valve at the water supply. Allow a little water to run to drain.

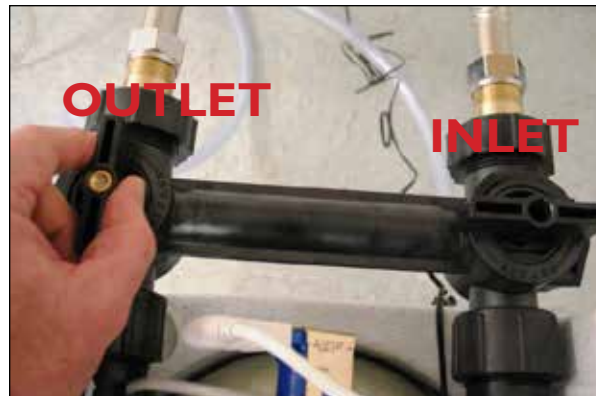


### Step 1 Ie

Open the inlet valve.

### Step 1 Id

Open the outlet valve.



## ❖ Test Hardness



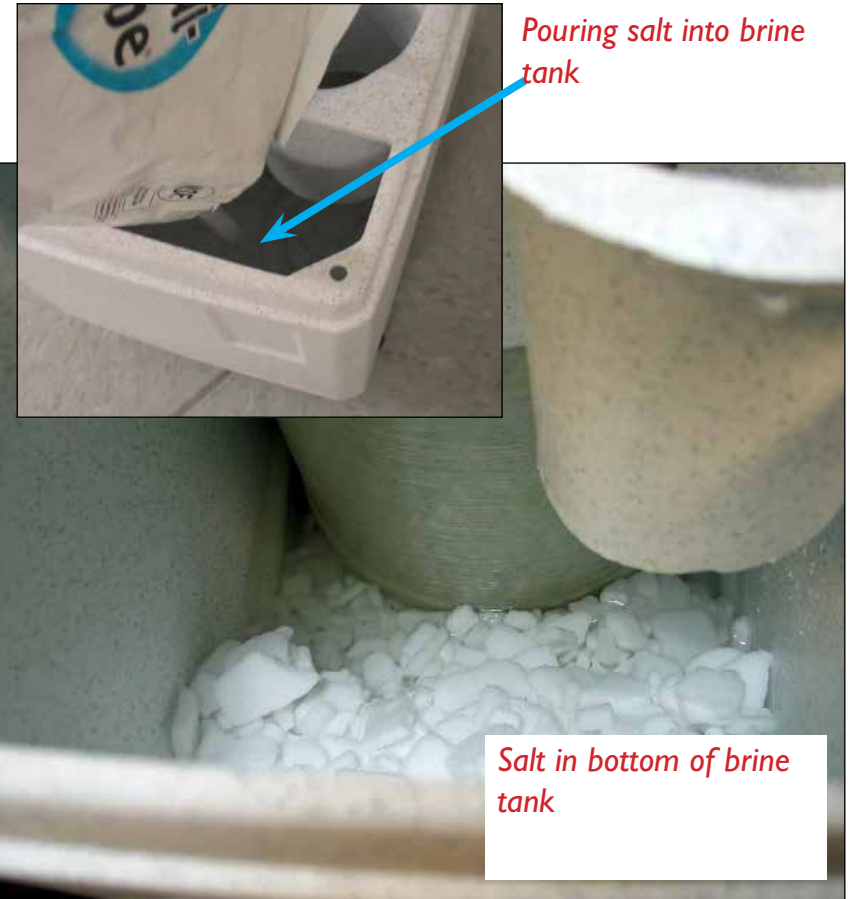
## Step 12

Verify effectiveness of the softener. Perform a total hardness test on the treated water coming from the outlet, & record the result. (Bubbles or discoloration of treated water will not affect hardness test.) If results are in “mg/L” or “ppm”, divide by 17.1 to convert to grains. As long as blend valve remains closed, the hardness should be very low.

## ❖ Fill Brine Tank & Complete Flush

### Step 13

Add salt to the brine tank, until cabinet is 1/3 to 2/3 full. Do not fill higher than 2/3.



## ❖ Complete the Connections

### Step 14a

Close the water supply valve.



### Step 14b



Glue supplied air gap in drain pipe (may be fitted over the outside of a 1-1/4" plastic pipe, or inside a 1-1/2" pipe).



### Step 14c

Connect each of the drain hoses to the air gap, securing each with a clamp.



### Step 14d

Connect outlet flex hose to the plumbing feeding the downstream equipment.

## ❖ Place in Service



### Step 15a

Open the water supply valve.

### Step 15b

Check all connections for any leaks.

## ❖ Notes

- ❖ Monitor salt level daily & replenish salt when cabinet is less than 1/3 full.
- ❖ Softener can be bypassed by putting valves in “bypass” position (see Step 12a).
- ❖ Periodically test the hardness of the feed and treated water to ensure proper hardness.
- ❖ Softener will automatically regenerate resin when necessary, at 2 am. During this process (which takes an hour and fifteen minutes), downstream demand for water is met with unsoftened feed water.



**OptiPure**<sup>™</sup>

Access manuals, spec sheets and additional educational materials for foodservice water treatment at our website.

[www.optipurewater.com](http://www.optipurewater.com)