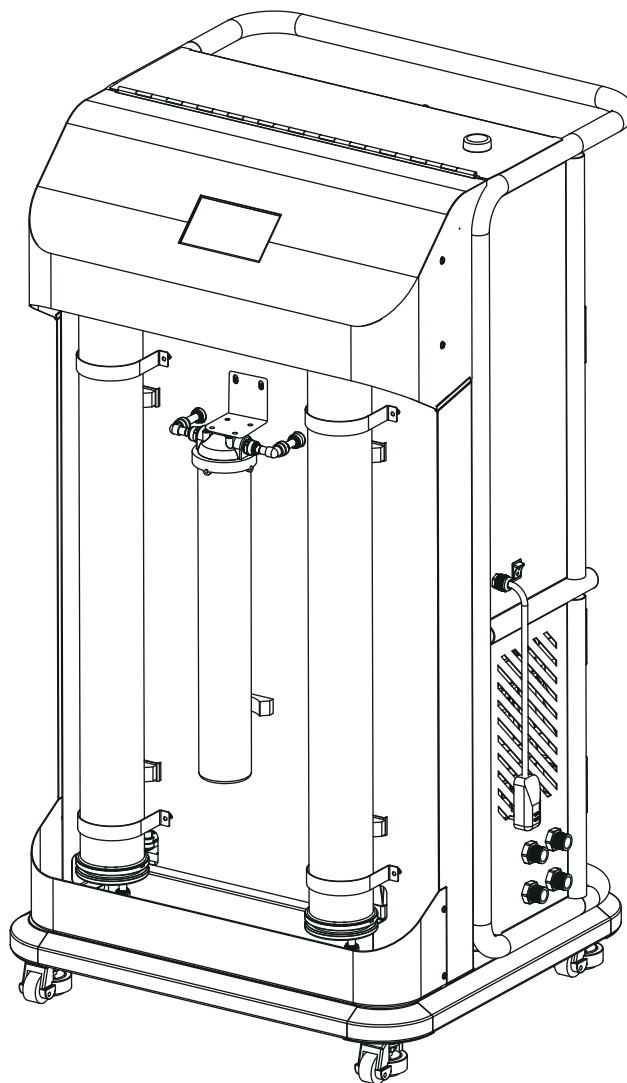


WHOLE HOUSE

iSpring WRO4000 Whole House Reverse Osmosis System



User Manual and Installation Guide

Ver. 08/2026



Support
&
Warranty



Copyright ©2007-2026 ISPRING WATER SYSTEMS, LLC. All rights reserved.



We stand behind our products

Since 2007, iSpring has been committed to delivering safe and clean water solutions to families and businesses worldwide. We provide a wide range of residential and commercial water filtration systems designed to purify your water, ensuring that you and your family enjoy pure, healthy, and great-tasting water every day.

At iSpring, we strive to develop products to the highest standards and aim to make excellent drinking water accessible for all households. With affordable pricing, reliable quality, prompt delivery, and top-notch customer service, we hope to assist in bringing you great water for years to come.

Prior to Installation

Read this instruction manual carefully prior to installation.
Keep this manual readily available for future reference.

Table of Contents

Safety Information	02
Specifications.....	02
System Overview & Filter Lifespan	03
Unpacking the System	04
List of Components	04
Installation	05
System Start-Up	08
System Operation.....	09
Display Functions	10
Smart Connectivity & Features Guide.....	11
Maintenance	12
Error Code	14

Safety Information

- Read this manual carefully before use and keep it for future reference.
- Do not use with water that is microbiologically unsafe or of unknown quality unless adequately disinfected before or after the system.
- Use only with water between 40–100°F (4–38°C).
- Do not use with hot water.
- Install the filter according to the instructions before use.
- Do not use the product if any part is cracked, deformed, or damaged.
- Replace the filter regularly based on water quality and usage.
- If the filtered water develops an unusual taste, odor, or appearance, stop using the product and replace the filter.
- Keep the product away from direct sunlight, heat sources, and freezing conditions.

Specifications

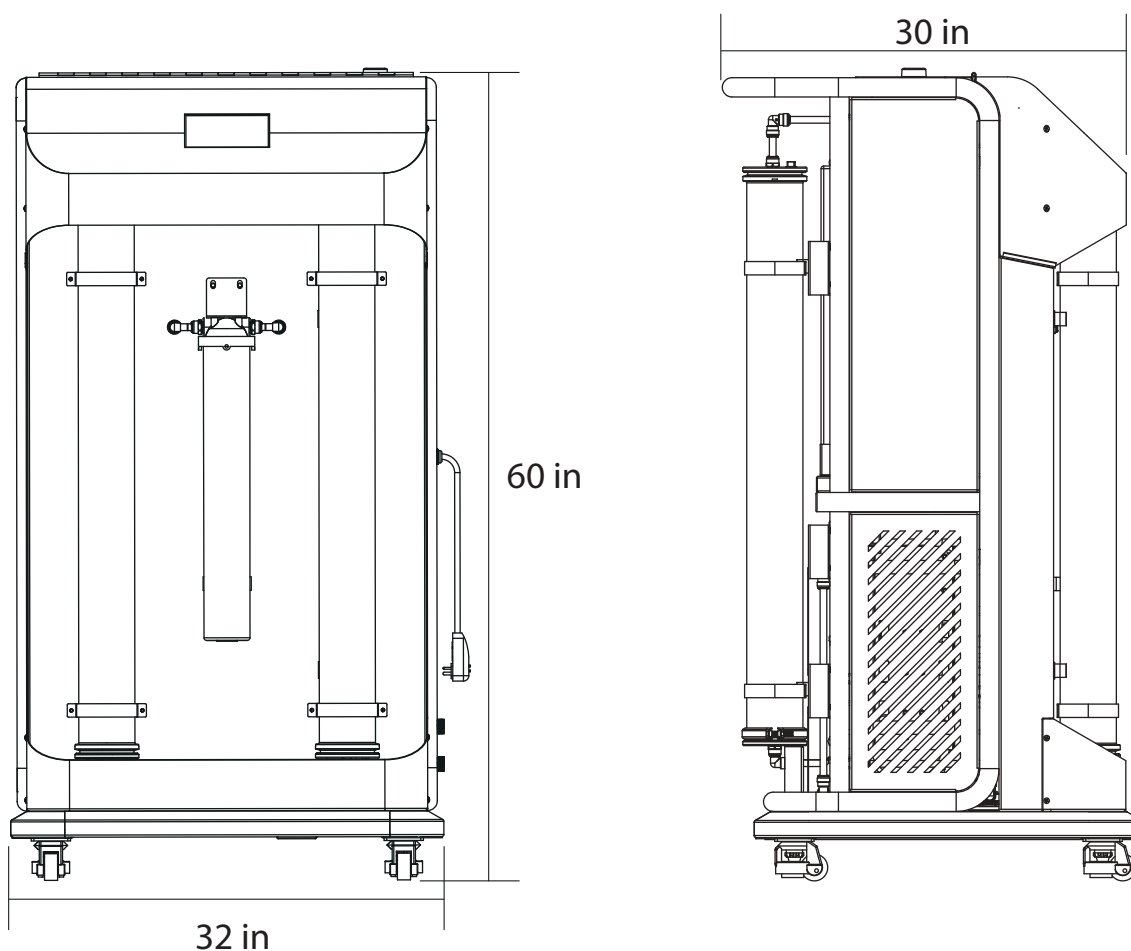
Model	WRO4000
Rated Voltage	110 V
Rated Frequency	60 Hz
Inlet Water Pressure	70–110 psi (4.8–7.6 bar)
Inlet Water Temperature	40–100°F (4–38°C)
Inlet TDS	≤ 1000 ppm
Purified Water Flow Rate	Up to 2.7 GPM (10 L/min) @ 100 psi
Maximum Output Flow Rate	4 GPM (15 L/min)
Tank Capacity	32 gal (120 L)



Note: The water may initially appear cloudy or milky. New activated carbon cartridges may release small carbon particles and trapped air after installation.

TDS refers to total dissolved solids in the inlet water.

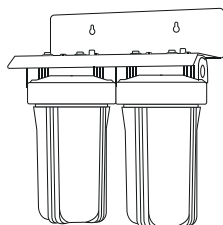
Product Dimensions



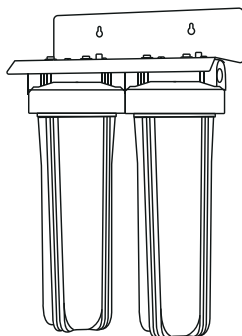
System Overview & Filter Lifespan

Stage	Module	Description	Lifespan
1	WSP Spin-down Pre-Filter	Reduces sediment, rust, suspended solids, insect eggs, algae, and other large particles, protecting downstream filters.	Clean the filter mesh regularly by brushing or soaking in vinegar every few months and replace it as needed based on water quality.
2	EDV2 Electric Descaler	Uses electromagnetic or pulse methods to prevent scale buildup.	No maintenance required.
3	Ultrafiltration (UF) Membrane	Reduces colloids, suspended solids, and organic matter.	Up to 5 years
4	Reverse Osmosis (RO) Membrane	Reduces dissolved contaminants, including heavy metals and total dissolved solids (TDS).	Up to 3 years
5	LED Ultraviolet (UV) Lamp	Uses ultraviolet light in the final treatment stage.	No maintenance required.
6	Post-Carbon Filter	Reduces residual odors and color, while improving overall taste quality.	6–12 months

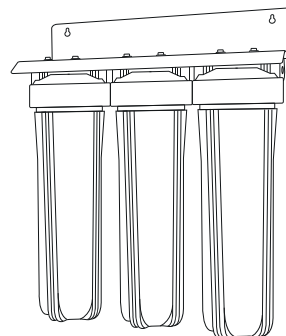
! **Note:** A compatible WGB series pre-filter may be installed as an optional pretreatment, depending on water conditions. If the water contains chlorine or has been chlorinated, an activated carbon pre-filter is required.



WGB21B Series



WGB22B Series

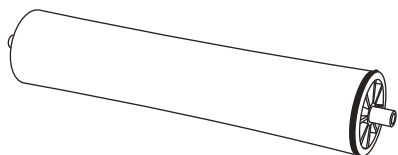


WGB32B Series

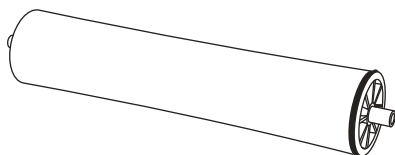
Unpacking the System

- Remove the wrapping on the system and take out the filters.
- Lift the system from the side and remove it from the tray.
- Place the system indoors, such as in a basement or other safe, dry location.

List of Components



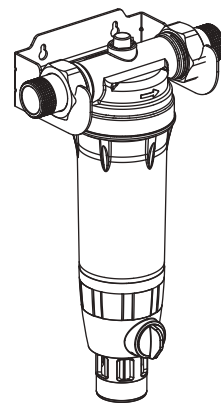
RO Membrane
(Model# MWRO2000)



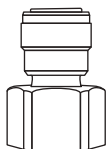
UF Membrane
(Model# FUF4000)



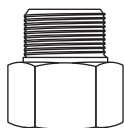
3/8" Tubing and
1/2" Tubing



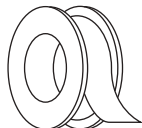
WSP Spin-Down
Filter



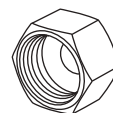
3/4" Female BSP
to 1/2" Quick-Connect
Fitting



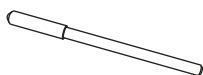
3/4" Female BSP
to 3/4" Male
NPT



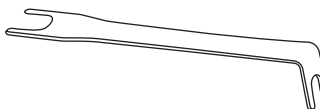
Plumber's
Tape



3/4" Stainless
Steel Stopper



Post Carbon Filter
Housing Wrench

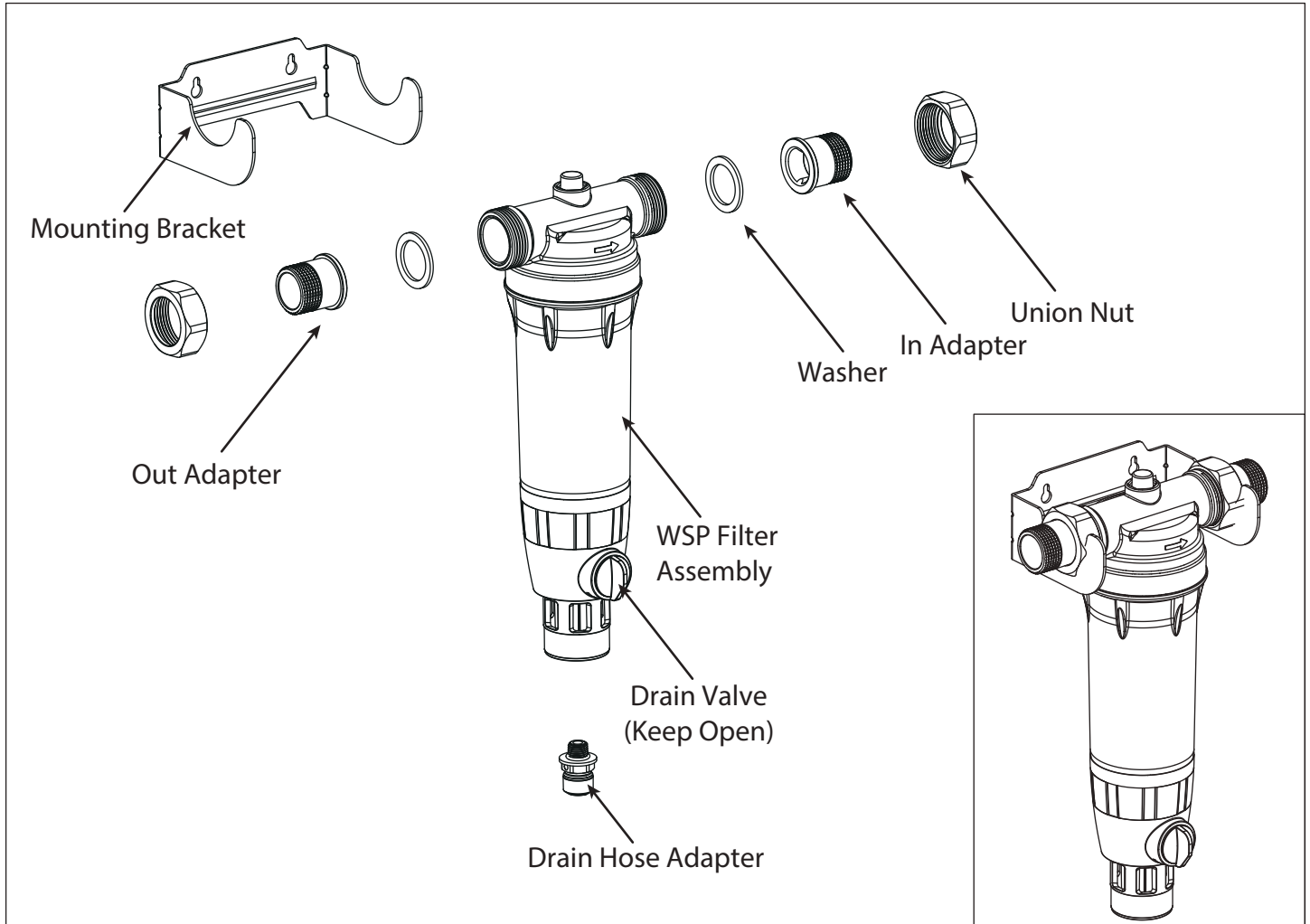


Quick-Connect
Removal Tool

Installation

1 WSP Spin-Down Pre-Filter Installation

Refer to the illustration below to assemble the filter. Keep the drain valve open after installation.



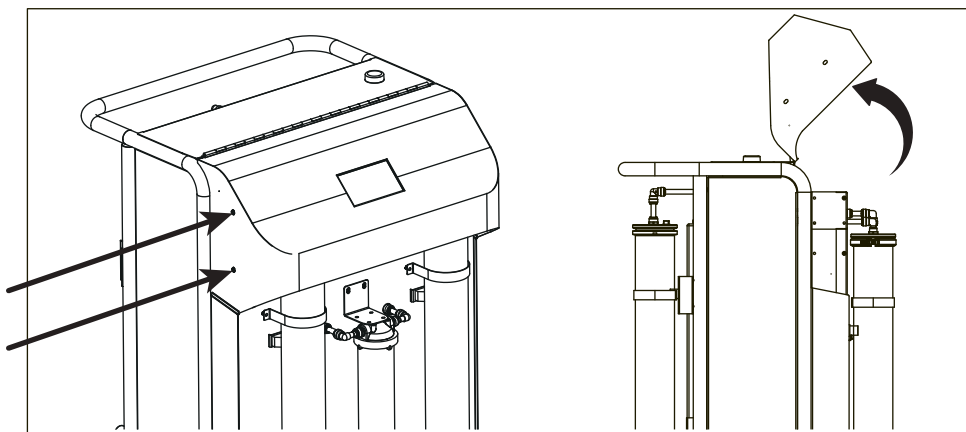
2 Install the filter cartridges correctly according to the **filter installation** instructions.

UF Membrane Installation

- Remove the locking C-clip from the tubing at the top of the UF membrane, then disconnect the tubing.
- Use a wrench to open the membrane housing clamp.
- Use a flat-head screwdriver to remove the end cap through the notches on both sides.
- Apply silicone grease to the fittings on both ends of the UF membrane, then insert the membrane into the housing.
- Reassemble the end cap and housing in the reverse order.

RO Membrane Installation

- a. Remove the screws on both sides of the top cover and lift the cover.

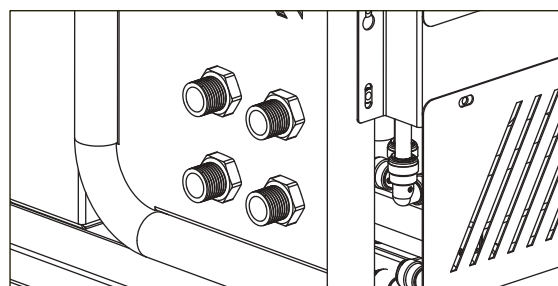


- b. Remove the locking C-clip from the tubing at the top of the RO membrane, then disconnect the tubing.
- c. Use a wrench to open the membrane housing clamp.
- d. Use a flat-head screwdriver to remove the end cap through the notches on both sides.
- e. Apply silicone grease to the fittings on both ends of the RO membrane, then insert the membrane into the housing.
- f. Reassemble the end cap and housing in the reverse order.

Post-Carbon Filter Installation

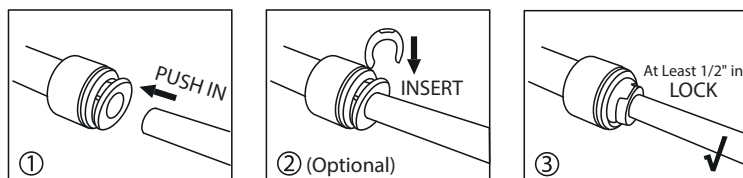
- a. Use the housing wrench to loosen the post-carbon housing, then slowly unscrew the housing by hand.
- b. Remove the packaging from the post-carbon filter, place the filter into the housing, and tighten the housing with the wrench.

- 3** Install the fittings as shown. Apply plumber's tape on stainless steel **INLET** and **PURE** water fittings. **DRAIN** and **TANK** fittings are quick-connect fittings with internal gaskets; no plumber's tape needed.

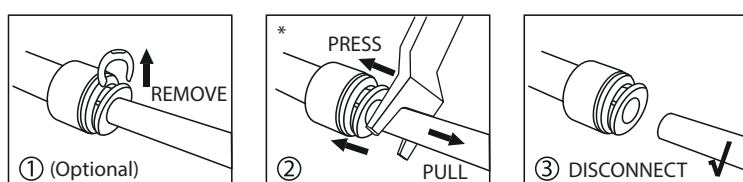


Quick-Connect Fitting Instruction

HOW TO CONNECT



HOW TO DISCONNECT

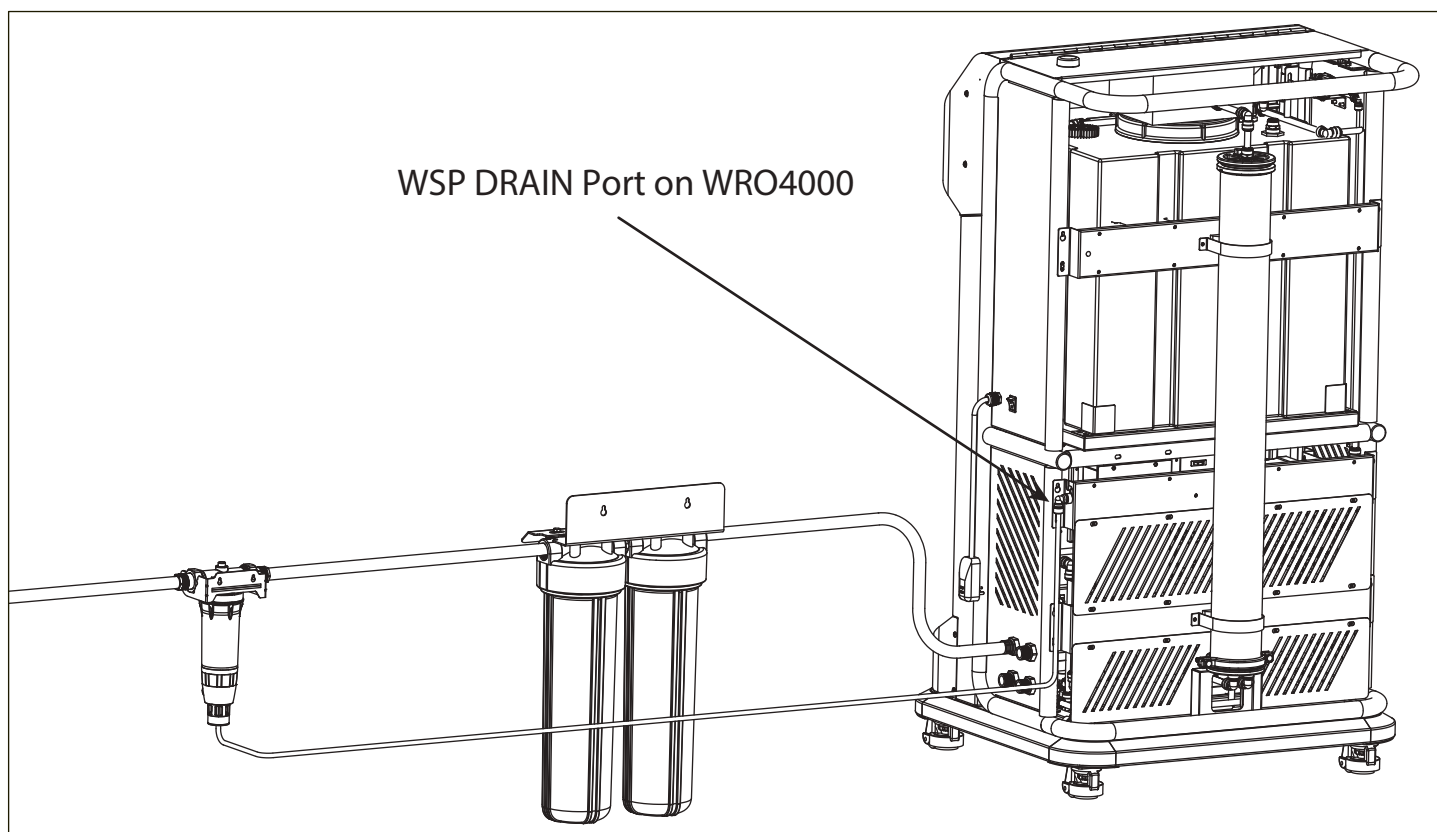
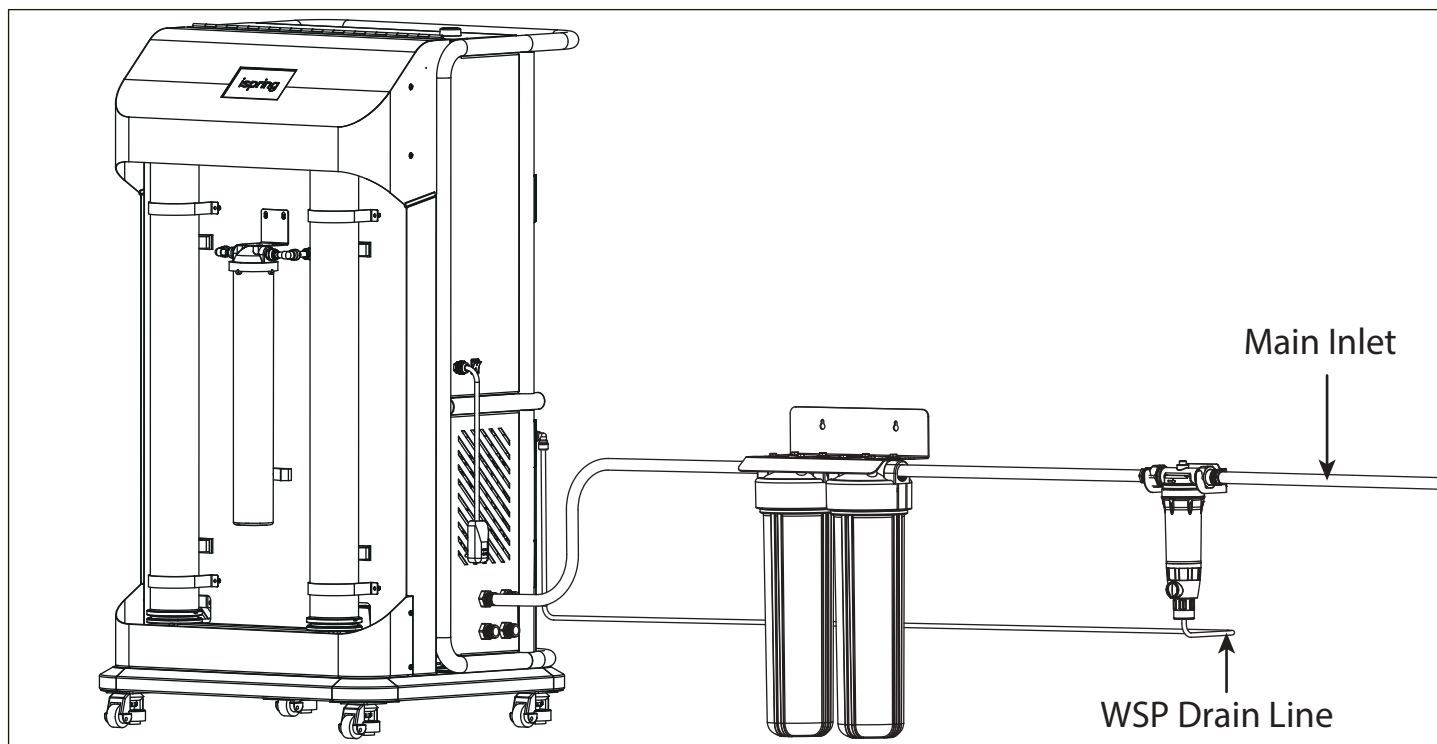


We recommend watching our video "[**How to Connect and Disconnect Quick Connect Fittings | DIY Installation**](#)" on YouTube for your reference.

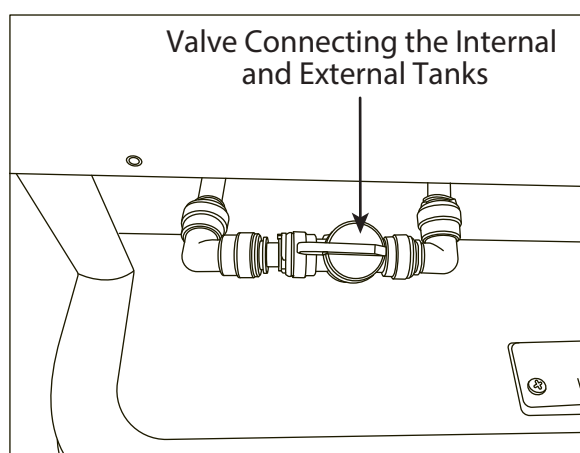
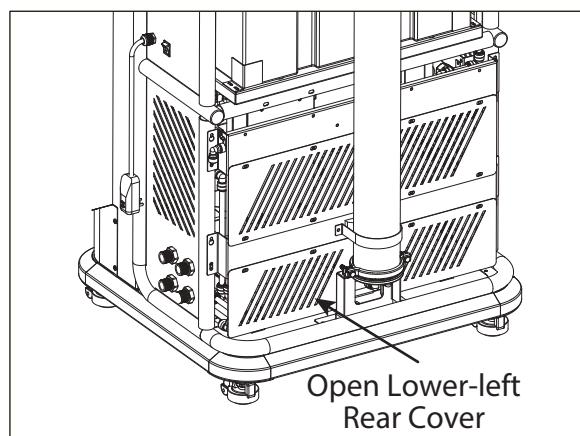
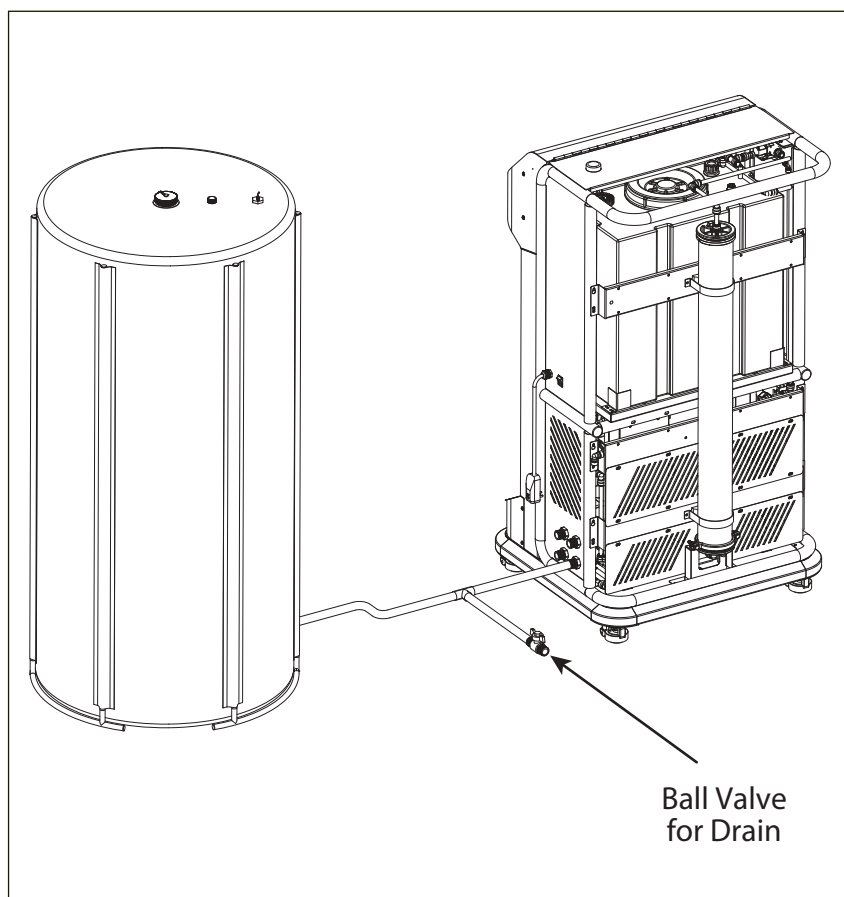
Cut the tubing end evenly with a utility knife or scissors. Insert the tubing into the quick-connect fitting for at least 1/2". Twist the tube slightly and apply pressure to create a seal.

* The quick-connect removal tool can help to disconnect more easily.
The tool should fit snugly around the tubing.

- 4** Before installing to the pipeline, turn off the main inlet valve and open faucets to drain remaining water.
- 5** (Optional) If you have a **WGB** system, install it and connect the outlet to the **WRO4000 INLET**. Apply plumber's tape to the threads to prevent leaks.
- 6** Connect the **WSP** spin-down filter included with the system. If available, install the **WSP** on the **inlet upstream of the WGB**. Ensure that the WSP inlet aligns with the water inlet direction. Use 3/8" tubing to connect the drain to **WSP DRAIN connection on WRO4000**.



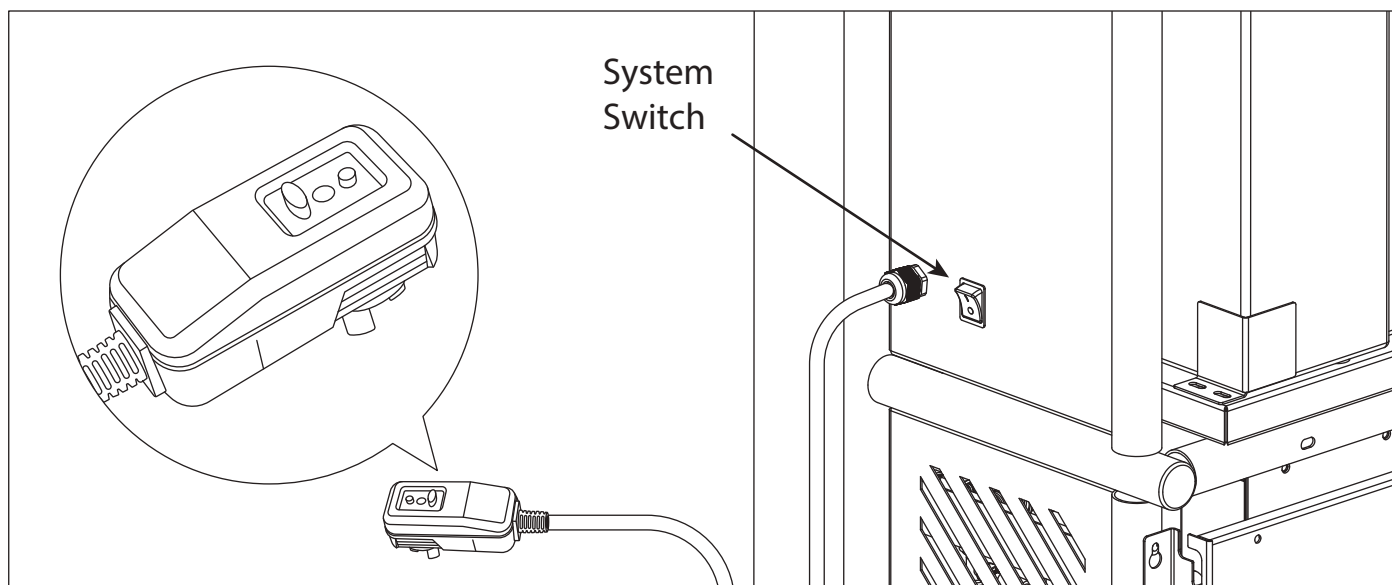
- 7** Connect the **INLET**, **PURE**, and **DRAIN** lines, then open the inlet valve. The **TANK** port is **optional**; if no external tank is connected, route the tank line to the drain like the **DRAIN** line. Use the included 1/2" tubing for drain and tank connections.
- 8** (Optional) For systems using an external tank, connect the tank to the **TANK** port with tubing and install a ball valve for drain, the valve should be closed during system operation. Recommended tank height is 53-61 inches (1350-1550 mm). Remove the lower-left rear cover and open the valve connecting the internal and external tanks.



System Start-Up

After completing the plumbing and electrical installation for the first time, leave the drinking water faucet open. The system will automatically fill the storage tank. Once the tank is at least 50% full, the delivery pump will automatically activate and begin supplying water to the faucet. During the initial startup, trapped air and loose carbon fines may be discharged, causing the water to appear black. This is normal. Flush the system through the faucet for 3–5 minutes, then drain the storage tank before normal use.

- 1 After verifying that the water lines are correctly connected, plug in the power cord to a grounded outlet and turn on the switch next to it.



The GFCI power adapter is equipped with a built-in RESET button. If the system does not power on, press the RESET button once to restore power.

- 2 The system will initiate at the startup screen, performing self-diagnostic and calibration of status, flow rate, temperature, TDS, pressure, and tank level.
- 3 Following the completion of the automatic filter flushing cycle, the system will begin producing water. Flushing takes about 30 seconds for the WSP filter, 30 seconds for the UF membrane, and 2 minutes for the RO membrane.
- 4 Normal water use can begin once the tank level exceeds 50%. For first-time use, it is recommended to wait until the tank is full and the system stops producing water before drawing water.
- 5 When using the filter for the first time, air and carbon fines may come out of the line, which is normal. Let water run for 2 minutes until the system stabilizes.

System Operation

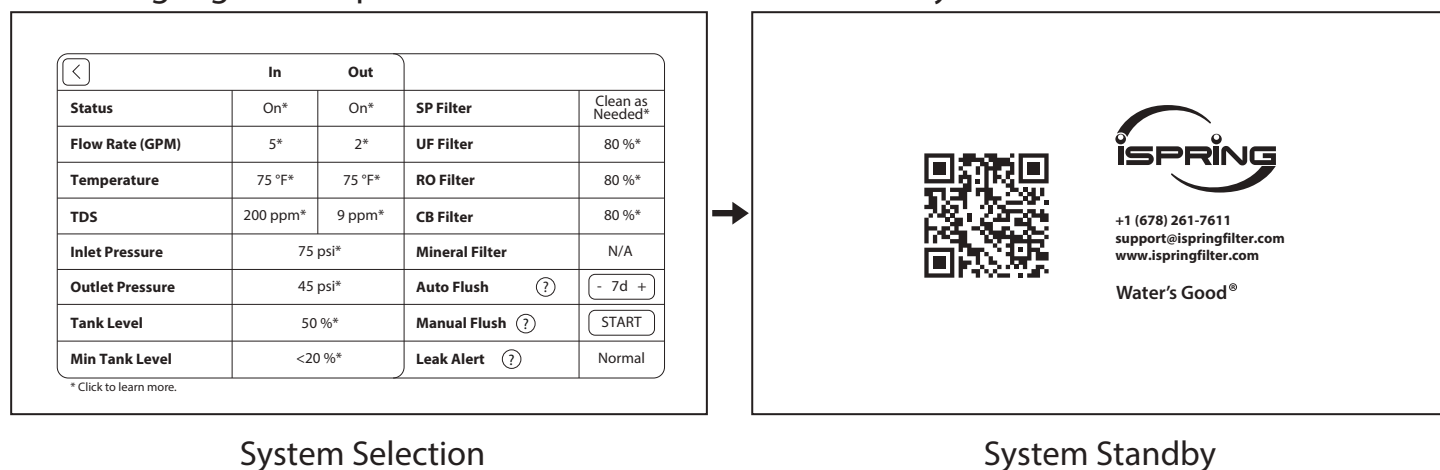
1. In this section, "operation" means the system is powered on or the inlet ball valve is open, keeping it operational.
2. Regularly inspect filters and tubing to ensure safe operation.
3. During the initial operating period, the TDS reading of the filtered water may be higher than normal. After the system runs for a while, the TDS reading will gradually decrease and stabilize.
4. During normal operation, keep the inlet ball valve open. Open the faucet when filtered water is needed, and close it when it is not in use.

Display Functions

Initialization

The system enters standby mode after 5 minutes of inactivity. The screen will turn off after an additional 2 minutes.

Tap any area within the diagram to display the system water flow layout. The selected sensor will be highlighted. Tap a blank area to return to the standby screen.



Parameters and Descriptions

Parameter	Description
Status	Displays system status. ON when water is flowing; OFF when no flow is detected.
Flow Rate (GPM)	Displays inlet and outlet flow rate.
Temperature	Displays inlet and outlet water temperature.
TDS	Displays inlet and outlet TDS values.
Inlet Pressure	Displays inlet water pressure.
Outlet Pressure	Displays outlet water pressure.
Tank Level	Displays real-time tank water level.
Min Tank Level	Displays the minimum tank level. When below 24%, the indicator turns red.



Note: When the tank level drops below 24%, the system will automatically activate the UF water supply to ensure continuous water availability.

Parameter	Description
SP Filter	Displays remaining WSP spin-down filter lifespan.
UF Filter	Displays remaining UF membrane lifespan.
RO Filter	Displays remaining RO membrane lifespan.
CB Filter	Displays remaining CTO activated carbon block filter lifespan.
Mineral Filter	Remineralization function (future feature).
Auto Flush	Sets the automatic flushing interval (1–28 days).
Manual Flush	Initiates the manual flushing sequence (SP → UF → RO).
Leak Alert	Automatic leak detection. When the indicator turns red, a leak is detected.

Smart Connectivity & Features Guide

The WRO4000 system integrates an Internet of Things (IoT) function. For the best user experience, please register the system before use.

1 Device Registration

Scan the QR code on the system to open the registration page. New users should create an account, while existing users can simply sign in. On the binding page, the **Serial Number** and **Model** are filled in automatically. After entering the remaining information, click the button to verify and bind the device. Once the process is successful, you will be redirected to the **My Devices** page, where you can access your devices.

2 My Devices

The **My Devices** page lists all linked devices and shows information for each device. Tap **View Details** to view details for the device. The **Bind New Device** button is available on this page.

3 Device Overview

The device details page, where TDS information can be reviewed. If the system has not yet produced water, TDS data may be unavailable. Scroll down to access **Water Usage**, **Filter Info**, and **Support**.

4 Water Usage

The **Water Usage** section monitors water consumption. Users are able to select data by **Day**, **Month**, or **Year**, and specify the time.

5 Filter Info

The **Filter Info** page displays information of each filter, including its remaining lifespan. After replacing a filter, tap **Reset** to reset corresponding filter lifespan. You can also set scheduled flushing and sterilization for the filter or system.

6 Support

The **Support** page opens the after-sales support ticket.

Maintenance

Flushing the Filters

As water passes through the WSP spin-down pre-filter, UF membrane, and RO membrane, impurities and microorganisms may accumulate on the membrane surfaces. Regular flushing helps maintain performance.

Automatic Flushing

- At each startup, the WSP flushes automatically for 30 seconds, the UF membrane flushes for 30 seconds, and the RO membrane flushes for 120 seconds.
- There are two ways to count down the automatic system flush: by days and by water usage.
- The automatic **Flush Frequency** can be set from 1 to 28 days on the display, with a default setting of 7 days. During scheduled flushes, the UF membrane flushes for 30 seconds, followed by the RO membrane for 120 seconds.
- After the RO membrane reaches 528 gallons (2,000 L) of cumulative water production, it automatically flushes for 120 seconds.
- After the UF membrane reaches 5,283 gallons (20,000 L) of cumulative water production, it automatically flushes for 60 seconds.
- After the WSP reaches 15,850 gallons (60,000 L) of cumulative water production, it automatically flushes for 60 seconds.

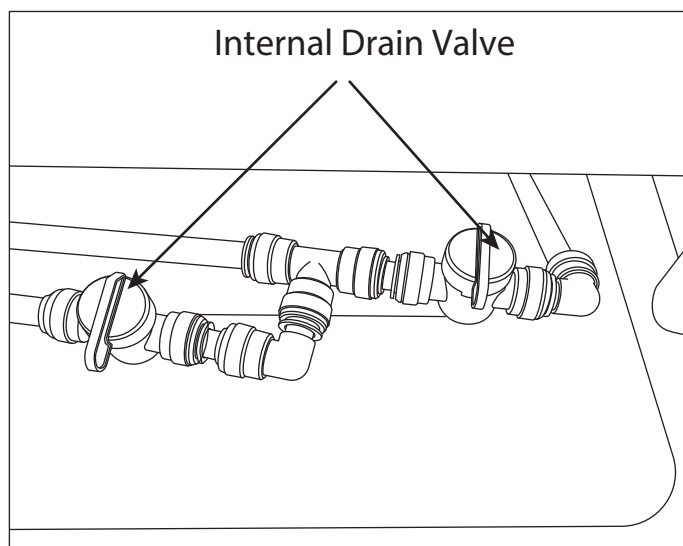
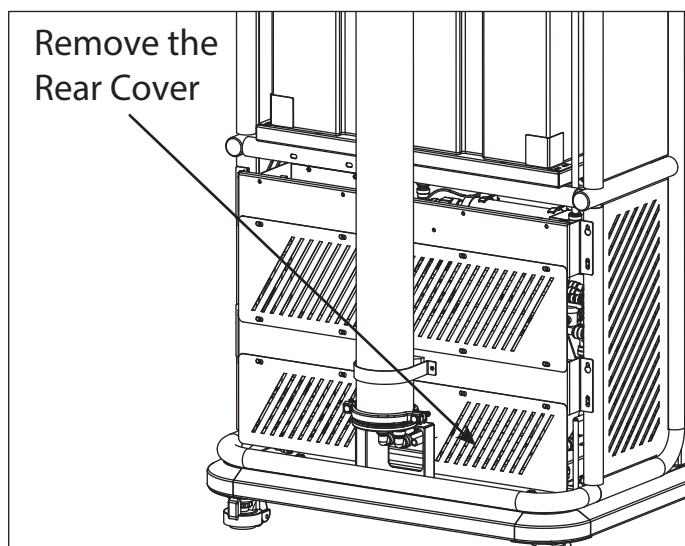
Manual Flush

- Tap **Manual Flush** on the display to start a manual flush cycle.
- The system will flush the WSP for 30 seconds, the UF membrane for 30 seconds, and the RO membrane for 120 seconds.

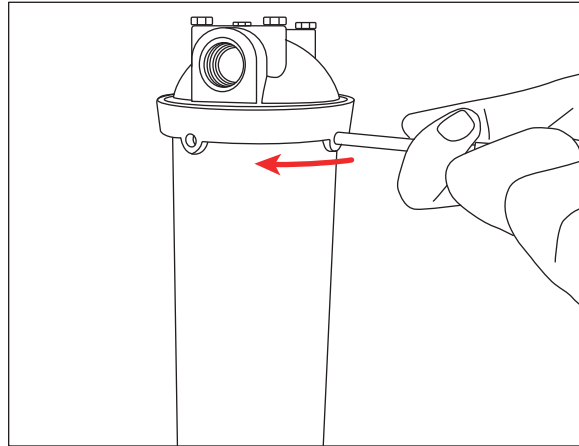
Replacing Filters

- Turn off the water supply and power before replacing the filter.

Important: If replacing the **UF** or **RO membrane**, remove the rear cover, open the internal drain valve, and allow the water inside the membrane housing to drain completely. If replacing the **CB post-carbon filter**, be careful of any water remaining inside the housing.



- Replace the filter cartridges according to the filter installation instructions on page 4.
- Remove the old **UF** or **RO membrane** with pliers before installing the new one.
- **Post carbon filter replacement:** Position the housing wrench in the removal slot on the filter housing and turn it counterclockwise to loosen the housing. As the housing will drop free once fully loosened, support it with one hand during removal to prevent it from falling and to avoid spilling any water remaining inside.

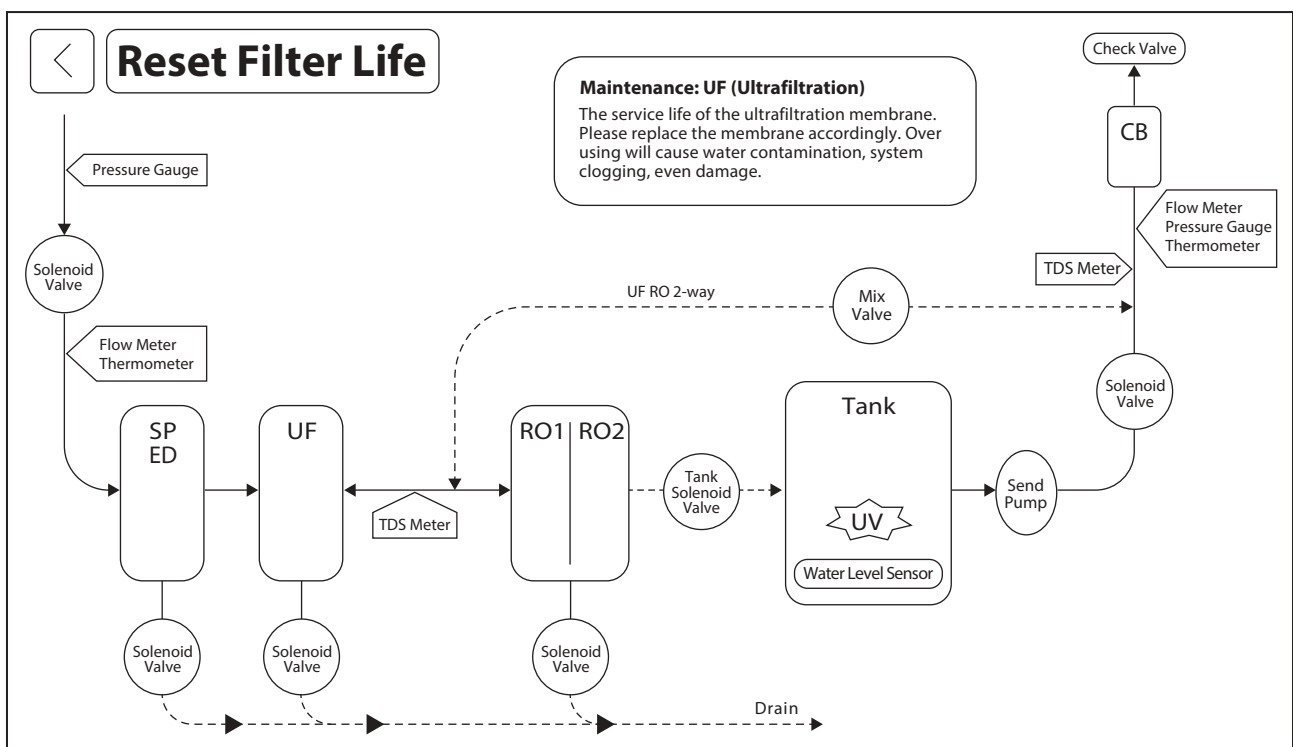


- After the replacement, restore the water and power supply.
- After replacing the post-carbon filter, fill the tank completely, then run water for two minutes before normal use.

Resetting Filter Lifespan

After replacing a filter, tap the corresponding filter icon on the screen to reset its life status. See the **Display Functions** section for details.

Tap the **filter life value** to access the **reset prompt**, then tap **Reset Filter Life** in the top-left corner to reset.



■ Long-Term Non-Use and Draining the Tank

If the system will not be used for an extended period, turn off the water supply and power, and drain the tank.

- **Without an external tank:** Remove the lower-left rear cover and open the valve connecting the internal and external tanks to drain the stored water.
- **With an external tank:** Open the external ball valve to drain the stored water.

Error Codes

Error Code	Error	Cause	Solution
E1	Abnormal Data Monitoring	Sensor or control board failure. *If the water tank overflows, the float switch will cut off power to the main inlet solenoid valve.	Contact iSpring.
E2	Abnormal Load Operation	Control board failure. *If the water tank overflows, the float switch will cut off power to the main inlet solenoid valve.	Contact iSpring.
E3	Insufficient Incoming Water	The inlet pressure sensor reads below 14.5 psi (1 bar) .	Ensure the incoming water supply valve is open and check the water supply status. When pressure exceeds 14.5 psi (1 bar) , the water supply is considered normal.
E4	Leak Detected	The leak detector detects liquid.	Disconnect the power and water supply, inspect leaks, clean and dry the leak detector, then turn the system back on.
E5	System Time Out	Continuous water output for 3 hours.	Disconnect the power supply and check if there is a leak keeping the system running, then power the system on again.
E6	Low Inlet Water Pressure	Inlet water pressure is below 70 psi (4.8 bar) .	A pop-up reminder appears on system startup. It doesn't affect operation but slows water production. Installing a booster pump is recommended.



Like our products?

Please show your support by writing a product review on the marketplace where you made your purchase. Even just a quick review means a lot to us.

Thank you!

iSpringFilter.com



Scan to get your FREE warranty

For questions, comments, or technical support, please contact us at:

✉ support@ispringfilter.com

☎ +1 (678) 261-7611

Monday–Friday 9:00 a.m.–5:00 p.m. EST

Water's Good®