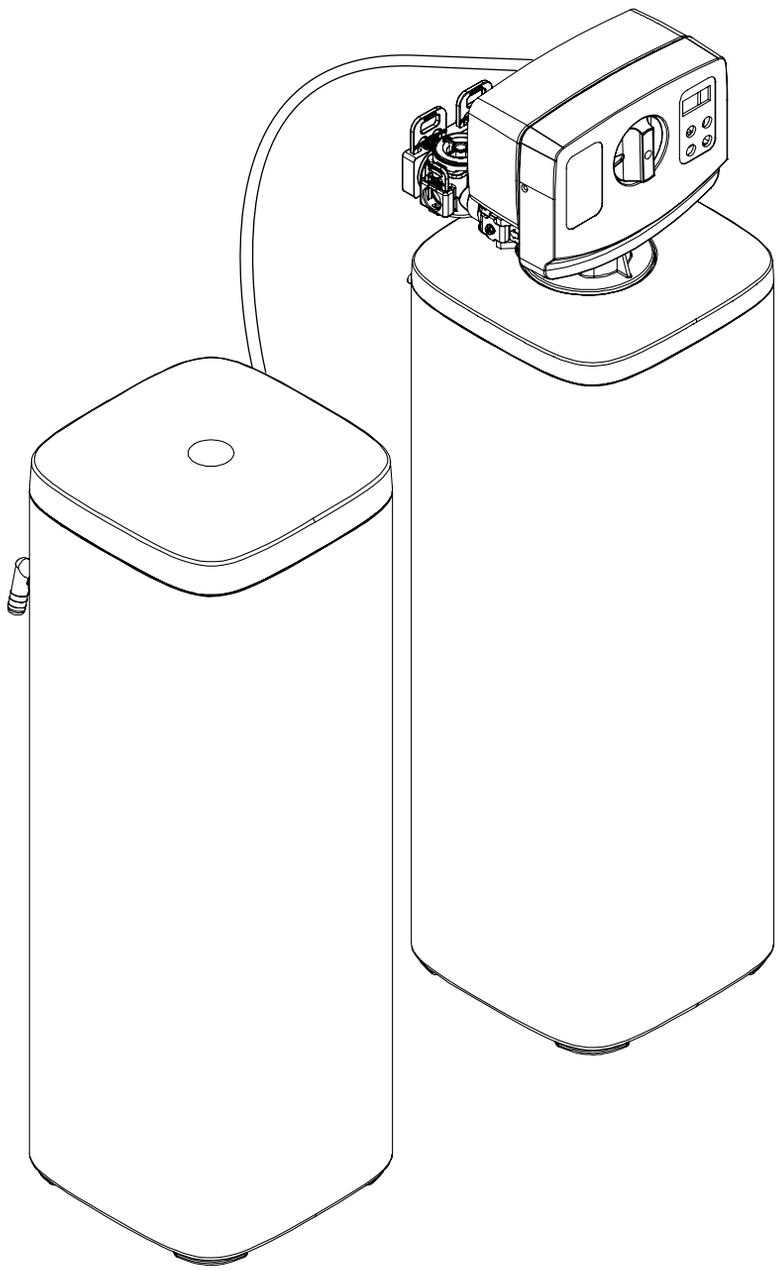
Owners Manual



FLEX-10 / FLEX-15
Water Softener

1. Read all instructions carefully before operation.

2. Avoid pinched o-rings during installation by applying (provided with install kit) NSF certified lubricant to all seals.

3. This system is not intended for treating water that is microbiologically unsafe or of unknown quality without adequate disinfection before or after the system.

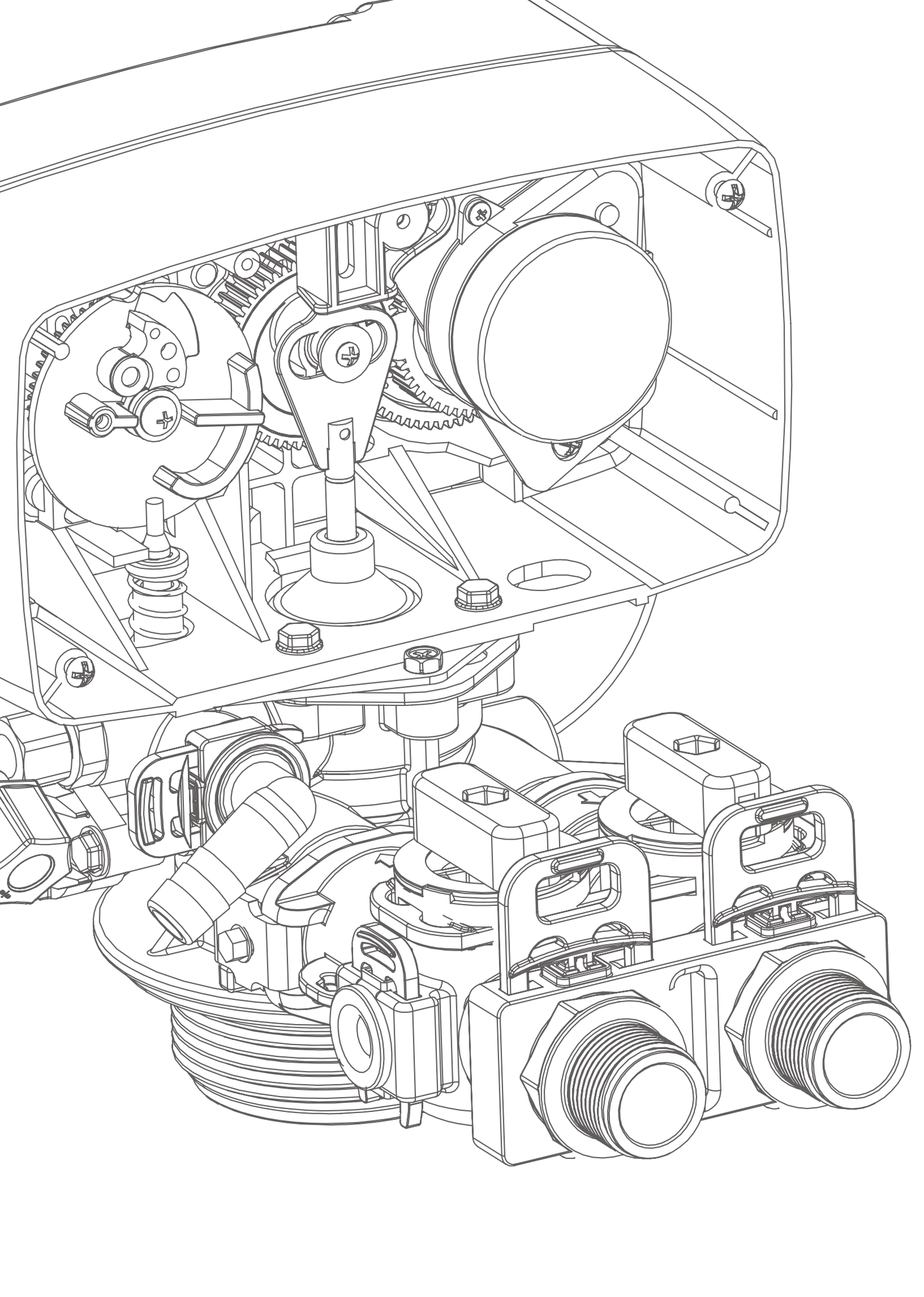


TABLE OF CONTENTS

READ THIS PAGE FIRST
BEFORE STARTING INSTALLATION

► Carefully read this manual before installing or operating your water softener. Failure to follow the instructions in this manual may result in personal injury or property damage.

► This system and its installation must comply with all applicable state and local regulations. Check with your local public works department for plumbing and sanitation codes. If any local codes conflict with the information in this manual, the local codes must be followed.

► The water softener must be operated at pressures between 2 bar (30 psi) and 8.6 bar (125 psi). If the water pressure exceeds 8.6 bar (125 psi), a pressure-reducing valve must be installed in the supply line.

► This unit must be operated at temperatures between 5°C and 40°C (41°F and 104°F).

► Do not use this water softener with hot water supplies

► Do not install the unit in areas exposed to direct sunlight, wet conditions, or temperatures outside the specified range.

► The appliance must only be used with the power supply unit provided.

► The appliance must only be connected to a safety extra-low voltage supply as indicated on the appliance.

► Apply only NSF-certified lubricant to all O-rings during installation. Do not pinch or damage O-rings.

►Softeners exposed to high levels of iron, manganese, sulfur, or sediment may experience damage to pistons, seals, or spacers within the control valve. Such damage is not covered under warranty.

► It is recommended to inspect and service the control valve annually. Cleaning and replacement of pistons, seals, and spacers may be required depending on local water conditions.

►Do not use water that is microbiologically unsafe without adequate disinfection before or after this system.

►This publication is based on information available at the time of printing. Continued design improvements may result in changes not included in this manual.

►This appliance is not intended for use by children. The appliance is not a toy and must not be used or played with.

►This appliance must not be used by persons with reduced physical, sensory, or mental capabilities, or by persons lacking experience and knowledge, unless they are supervised or have been instructed in the safe use of the appliance and understand the hazards involved.

INSTALL NOTES & SAFETY MESSAGES

Watch for the following messages in this manual:

EXAMPLE:

NOTE

Check and comply with your state and local codes. You must follow these guidelines.

EXAMPLE:

⚠ CAUTION

Disassembly while under pressure can result in flooding.

EXAMPLE:

⚠ WARNING

Electrical Shock Hazard! Unplug the unit before removing the cover or accessing any internal control parts.

WATER SOFTENER BASICS

WHAT IS HARD WATER AND HOW IT IS SOFTENED

Hard water contains minerals such as calcium and magnesium. These minerals are picked up as rainwater moves through soil and rock. While not harmful to health, hard water causes scale in pipes and appliances, makes soap less effective, and can leave stains on surfaces.

A water softener solves this problem by using a special resin bed. As water passes through the resin, calcium and magnesium are removed and replaced with small amounts of sodium or potassium. Over time the resin becomes full and needs to be cleaned. The softener does this automatically in a process called regeneration, where it uses salt water (brine) to refresh the resin so it can work again.

WHAT A SOFTENER DOES AND DOES NOT REMOVE

A softener is designed to remove hardness (calcium and magnesium). It can also handle small amounts of dissolved iron (often called "clear-water iron").

A softener cannot remove:

- Iron that has already turned brown or red (rusty water)
- Iron combined with organic matter (tannins)
- Iron bacteria (slimy deposits in pipes)
- Sediment, sand, dirt, or silt
- Bad smells (like sulfur or "rotten egg" odor)
- Microorganisms or unsafe bacteria

For these problems, other filters or treatment systems are needed in addition to a softener.

Some local supplies have low pH and are corrosive to plumbing and fixtures. A softener does not correct low pH or corrosivity. If your analysis indicates low pH or corrosive conditions, install an appropriate conditioning system, such as a neutralizing filter, upstream of the softener.

IRON AND MANGANESE

If your water has a small amount of clear-water iron, the softener can usually handle it. But if iron or manganese levels are higher, it can reduce the softener's performance and damage the resin. In that case, an extra filter should be installed before the softener.

To keep your softener working well, it may need to regenerate more often when iron is present. Using a special resin cleaner every few months (or sooner if you notice stains) will also help keep the system in good condition.

CARE AND MAINTENANCE

To keep your softener running smoothly:

- Always keep salt in the brine tank and use high-quality salt.
- Check occasionally for salt bridges (hard crusts) and break them up if needed.
- Inspect the system regularly for leaks or blockages.
- Use a resin cleaner on a regular basis as recommended for your system and water hardness.

By following these steps, your water softener will give you reliable, soft water and help protect your home from scale and hard water damage.

⚠ CAUTION

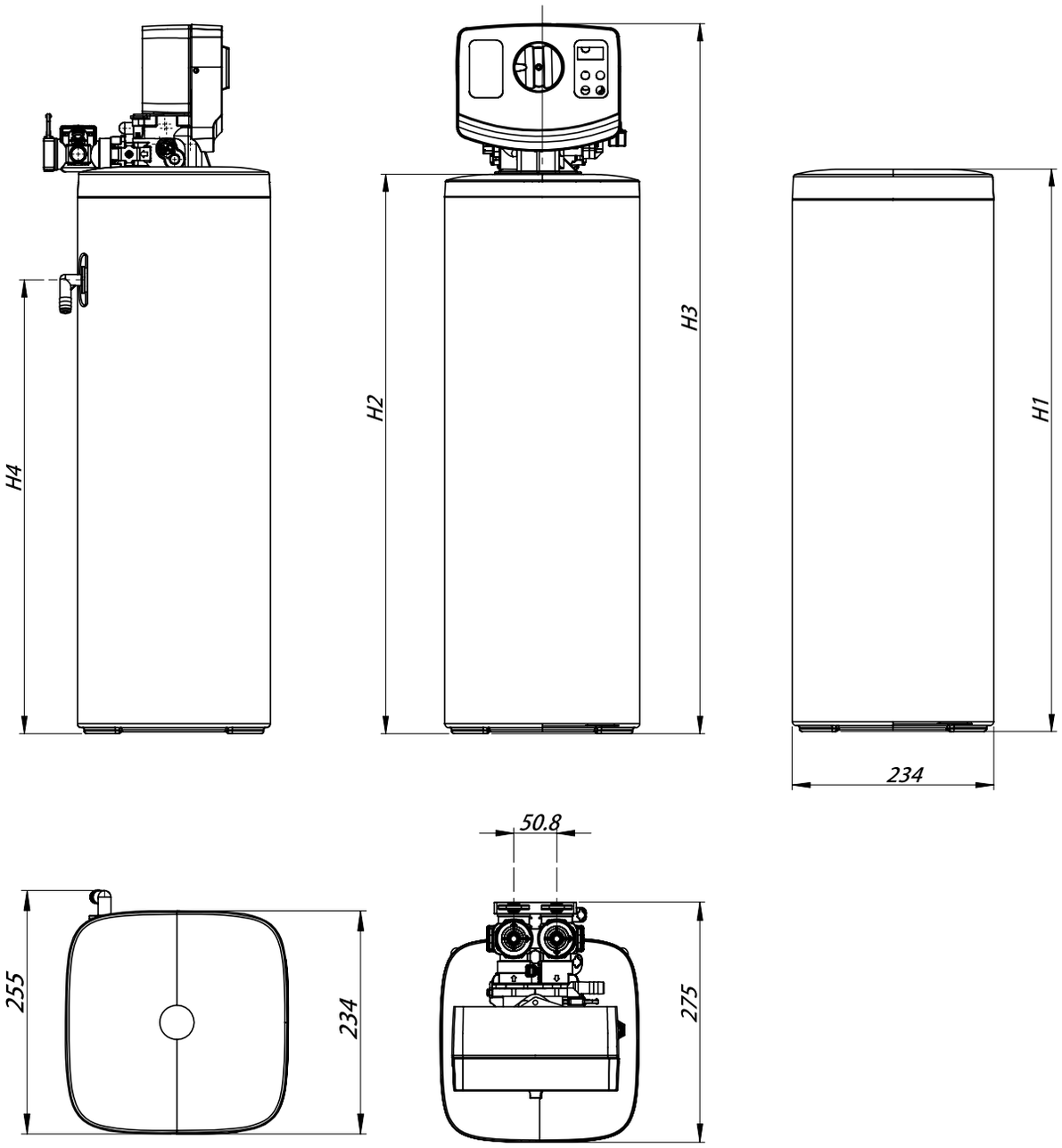
DO NOT USE WATER FILTERED THROUGH THIS SOFTENER WHERE THE WATER IS MICROBIOLOGICALLY UNSAFE OR THE WATER IS OF UNKNOWN QUALITY. THE WATER MUST BE DISINFECTED BEFORE OR AFTER THE UNIT.

SOFTENER SYSTEM SPECIFICATIONS

System Configuration		
Model	FLEX-10	FLEX-15
Control System	BNT1650 Control Valve	
Regeneration Mode	Calendar Clock, Meter Immediate, Meter Delayed, Meter Override	
Tank Size(Inch)	8"x18"	8"x26"
Media Loaded	Yes	Yes
Resin Type	Extremely High Capacity Ion Exchange Resin(001×8FG, Fine Mesh)	
Resin Quantity(L)	10	15
Distributor Pilot	OD 1.05	
Brine Tank	BTS-0818	BTS-0826
Salt Storage Capacity(Kg)	14	20
Valve Configuration		
Regeneration Type	Down Flow	Down Flow
Injector	Black	Black
BLFC(gpm)	0.3	0.3
DLFC(gpm)	1.5	1.5
Recommended Settings		
Backwash Duration Setting(Min)	3	4
Brine Duration Setting(Min)	60	60
Rinse Duration Setting(Min)	3	4
Refill Duration Setting(Min)	3.8	4.2
REG.CAP(Ton)	3.0	4.5
Reg. Days	10	10
Installation Requirements		
Water Supply	Municipal	
Operating Pressure(bar)	2 ～ 8.6	
Water Temperature(℃)	5°C - 40°C (41°F - 104°F).	
Plumbing Connections	3/4" or 1" Fittings Available	
Electrical Requirements	Input 110V-120V / 220-240V AC 50/60Hz	
	Output 12V AC 650mA	

- Capacities of conditioners may deviate from the chart above depending on flow rates and raw water conditions.
- Changing salt settings from factory setting may require changing injector sizes to achieve stated capacities.
- Iron content must not exceed 1 ppm. Beyond 1 ppm an iron softener must be used.
- Do not subject the unit to freezing temperatures.
- Do not use water that is microbiologically unsafe without adequate disinfection before or after the system.
- The manufacturer reserves the right to make product improvements which may deviate from the specifications and descriptions stated herein, without obligation to change previously manufactured products or to note the change.

SOFTENER SYSTEM DIMENSIONS



Model	H1(mm)	H2(mm)	H3(mm)	H4(mm)
FLEX-10	483	473	655	346
FLEX-15	686	676	858	549

UNPACK & INSPECT YOUR WATER SOFTENER

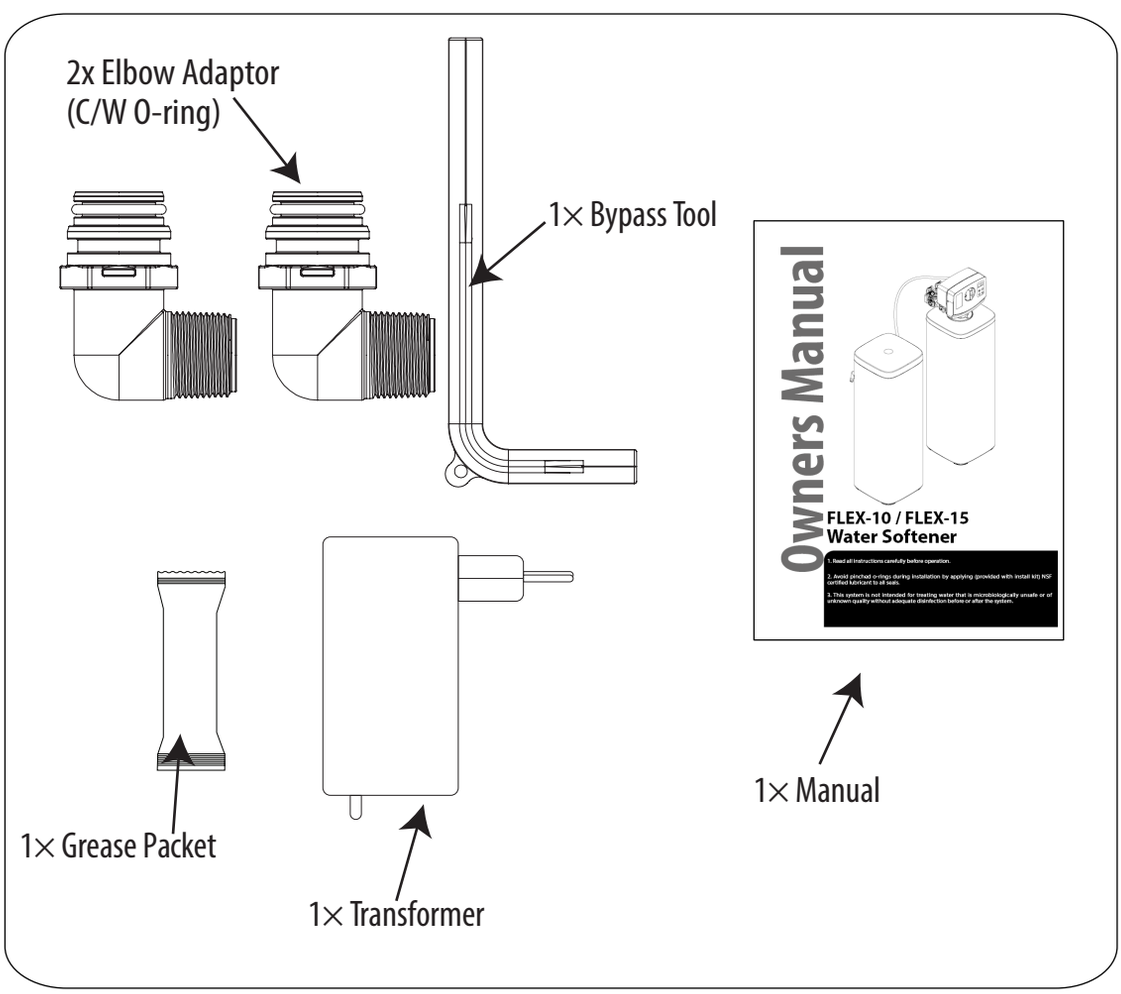
Inspect the water softner for any shipping damage. If damage is found, notify the transportation company and request a damage inspection. Damage to cartons should also be noted.

Handle the softener unit with care. Do not drop the unit or set on sharp, uneven surfaces. Do not turn the softener unit upside down.

NOTE	IF THERE IS A SEVERE LOSS IN WATER PRESSURE WHEN THE SOFTENER UNIT IS INITIALLY PLACED IN SERVICE, THE SOFTENER TANK MAY HAVE BEEN LAID ON ITS SIDE DURING TRANSIT. IF THIS OCCURS, BACKWASH THE SOFTENER TO "RECLASSIFY" THE MEDIA.

The manufacturer is not responsible for damages in transit. Small parts, needed to install the Softener, are in a parts box.To avoid loss of the small parts, keep them in the parts bag until you are ready to install.

ACCESSORIES CONTENTS :



PRE-INSTALLATION INSTRUCTIONS

Contact your distributor for a complete water analysis and check water hardness with your supplier. Correct water data is essential for proper operation of the softener.

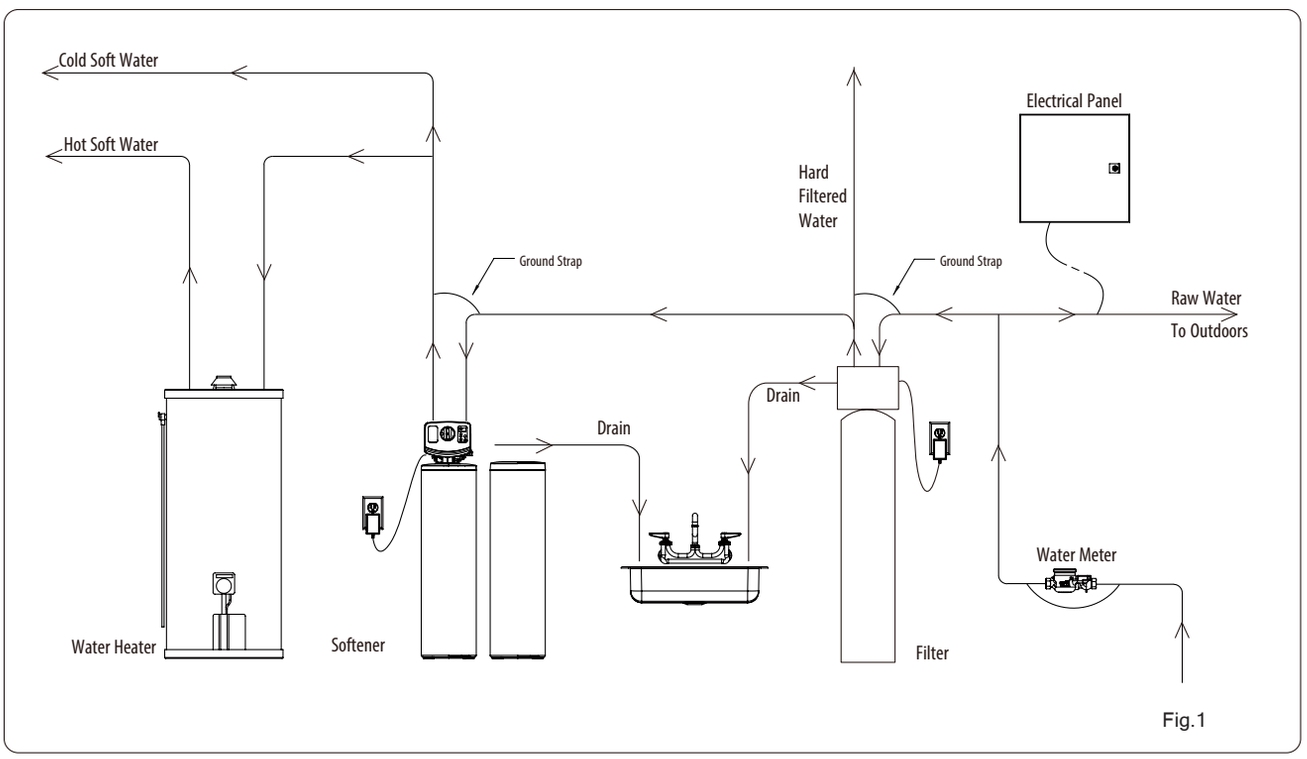


Fig.1

NOTE YOU MUST FOLLOW ALL GOVERNMENT CODES AND REGULATIONS GOVERNING THE INSTALLATION OF THESE DEVICES.

INSTALLATION INSTRUCTIONS

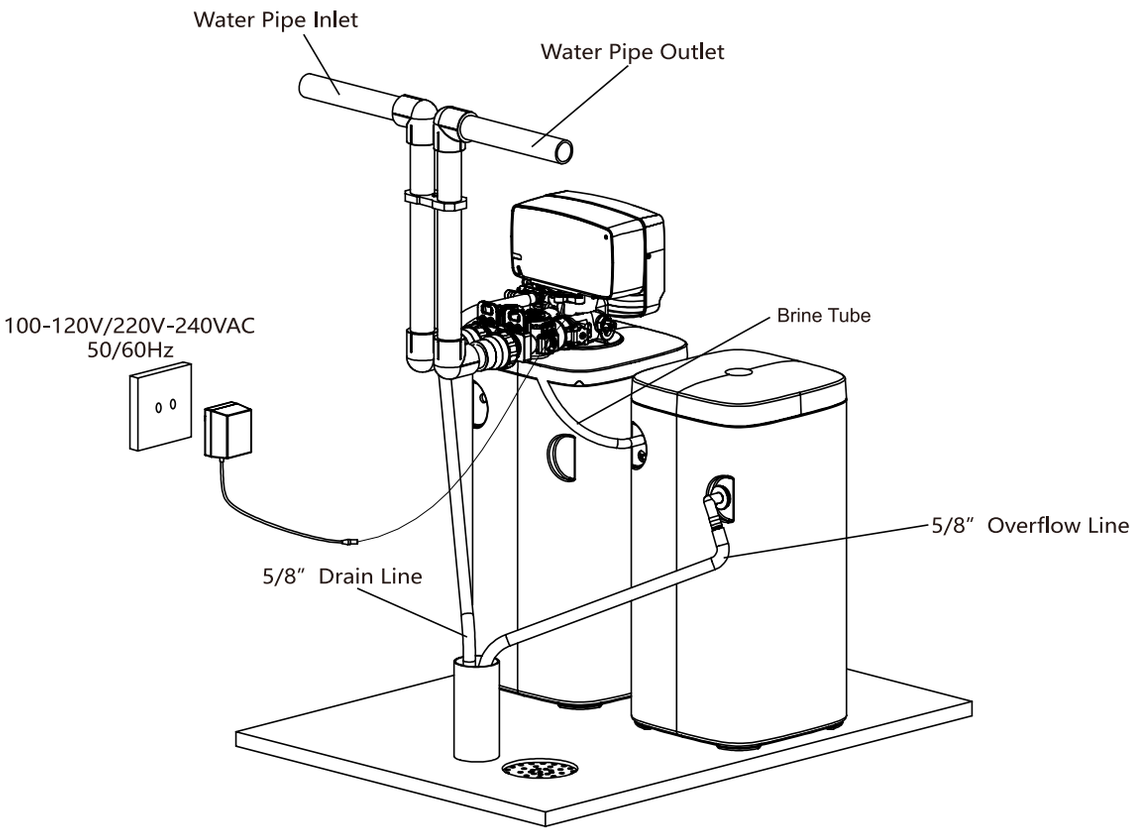
DETERMINE THE CORRECT LOCATION FOR THE WATER SOFTENER

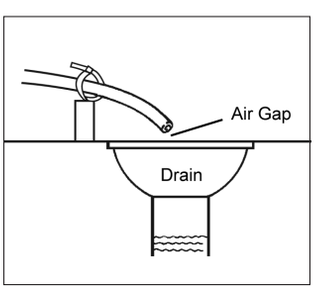
Select the installation location carefully. The following conditions must be reviewed to ensure proper operation and service life:

- Install the softener as close as possible to the main water supply line.
- Position the unit near a suitable drain.
- Ensure the softener is correctly placed in relation to other water treatment equipment (see Fig. 1).
- Always install the softener on the cold water line, before the water heater. Exposure to water temperatures above 104°F (40°C) can damage the softener.
- Do not install the softener in areas where temperatures may drop below freezing. Freezing can cause permanent damage and will void the factory warranty.
- Provide adequate clearance around the unit for inspection, maintenance, and service.
- If your water source is municipal or community-supplied, or if you need to bypass water for applications such as geothermal heat pumps, lawn irrigation, outbuildings, or other high-demand uses, review your plumbing and make modifications as necessary (see Fig. 1).
- Avoid locations exposed to direct sunlight and heat. Excessive heat can cause plastic components to soften or warp.

TOOLS REQUIRED FOR INSTALLATION:

► Two adjustable wrenches are required for installation.
► Additional tools may be necessary if modifications to existing plumbing are needed.
► Use copper, brass, or PEX pipe and fittings. Some local codes may also permit PVC pipe.
► Always follow local plumbing regulations.
► Always install the supplied bypass valve, or alternatively use three shut-off valves. A bypass can isolate the softener for service while maintaining water supply to the rest of the home.
► A 5/8" OD drain line is required for proper drainage.





⚠ CAUTION

THE WASTE CONNECTION OR DRAIN OUTLET MUST INCLUDE AN AIR GAP TO THE SANITARY WASTE SYSTEM. THE AIR GAP SHALL BE AT LEAST TWO PIPE DIAMETERS OR 1 INCH (25 MM), WHICHEVER IS GREATER.

⚠ CAUTION

NEVER INSERT THE DRAIN LINE DIRECTLY INTO A DRAIN, SEWER LINE, OR TRAP. ALWAYS ALLOW AN AIR GAP BETWEEN THE DRAIN LINE AND THE WASTE WATER. THIS WILL PREVENT THE POSSIBILITY OF SEWAGE BEING BACK-SIPHONED INTO THE SOFTENER.

NOTE PERFORM ALL PLUMBING ACCORDING TO LOCAL PLUMBING CODES.

WATER BYPASS

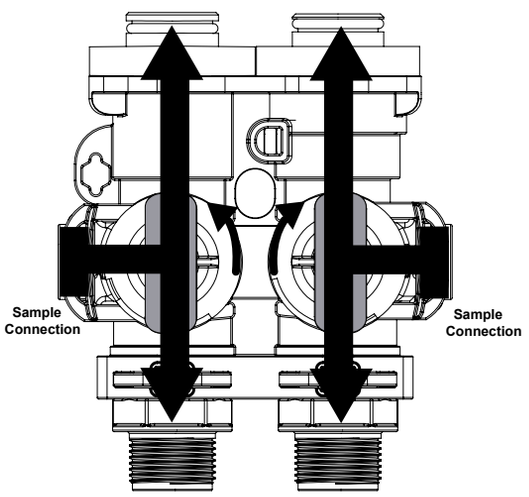
In case of emergency or during softener maintenance, the water softener can be isolated from the household water supply by using the bypass valve located at the back of the control.

Under normal operation, the bypass valve must remain in the SERVICE position, with the ON/OFF knobs aligned with the INLET and OUTLET pipes. To isolate the softener, rotate both knobs to the BYPASS position.

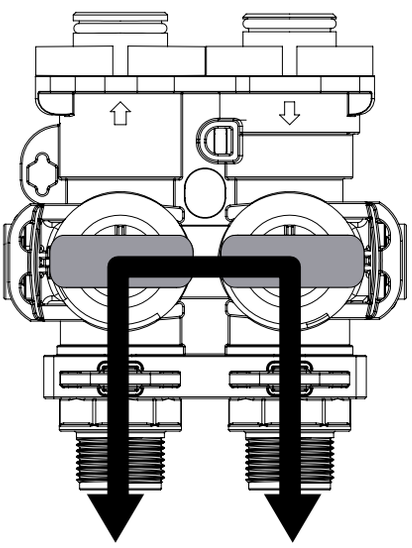
When the unit is in BYPASS mode, household fixtures and appliances will still receive water, but this water will not be softened.

To return to normal operation, rotate the knobs back to the SERVICE position. Always ensure the bypass knobs are fully open. If they are not completely open, hard water may bypass the softener.

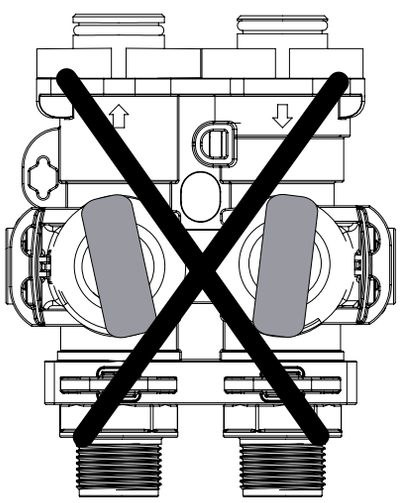
SERVICE



BYPASS



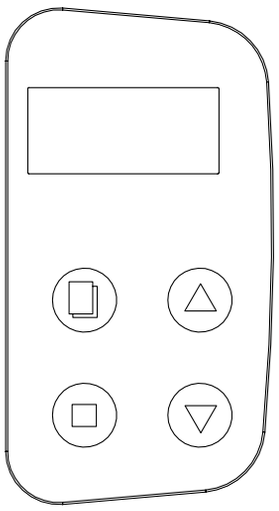
BYPASS NOT ALLOWED POSITION



NOTE Always ensure the bypass knobs are fully open. If they are not completely open, untreated hard water may bypass the softener.

PROGRAMMING GUIDE

FAMILIARIZE WITH KEY PAD CONFIGURATION



Menu

This function opens the basic setup menu used during installation.

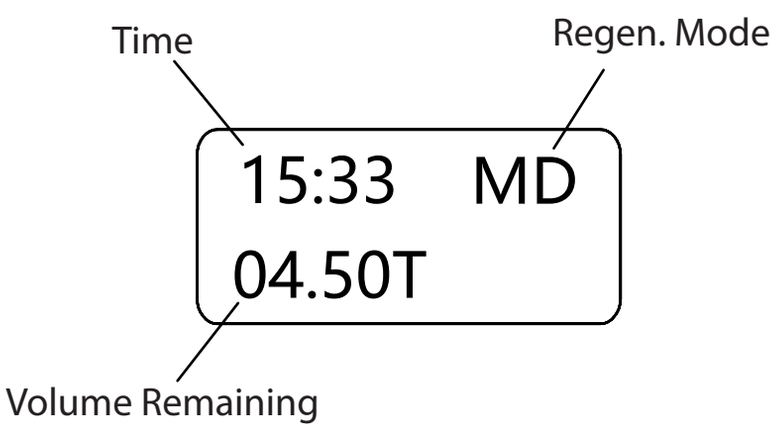
Set/Regen.

This button confirms the selected values and advances to the next page in the menu.

Up **Down**

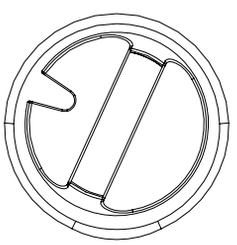
These buttons are used to adjust the setting values up or down during programming mode.

STANDBY DISPLAY



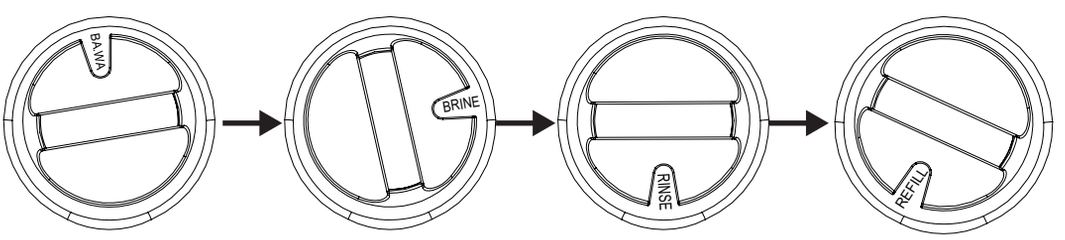
MANUAL REGEN.(KNOB OPERATION)

Manual Start

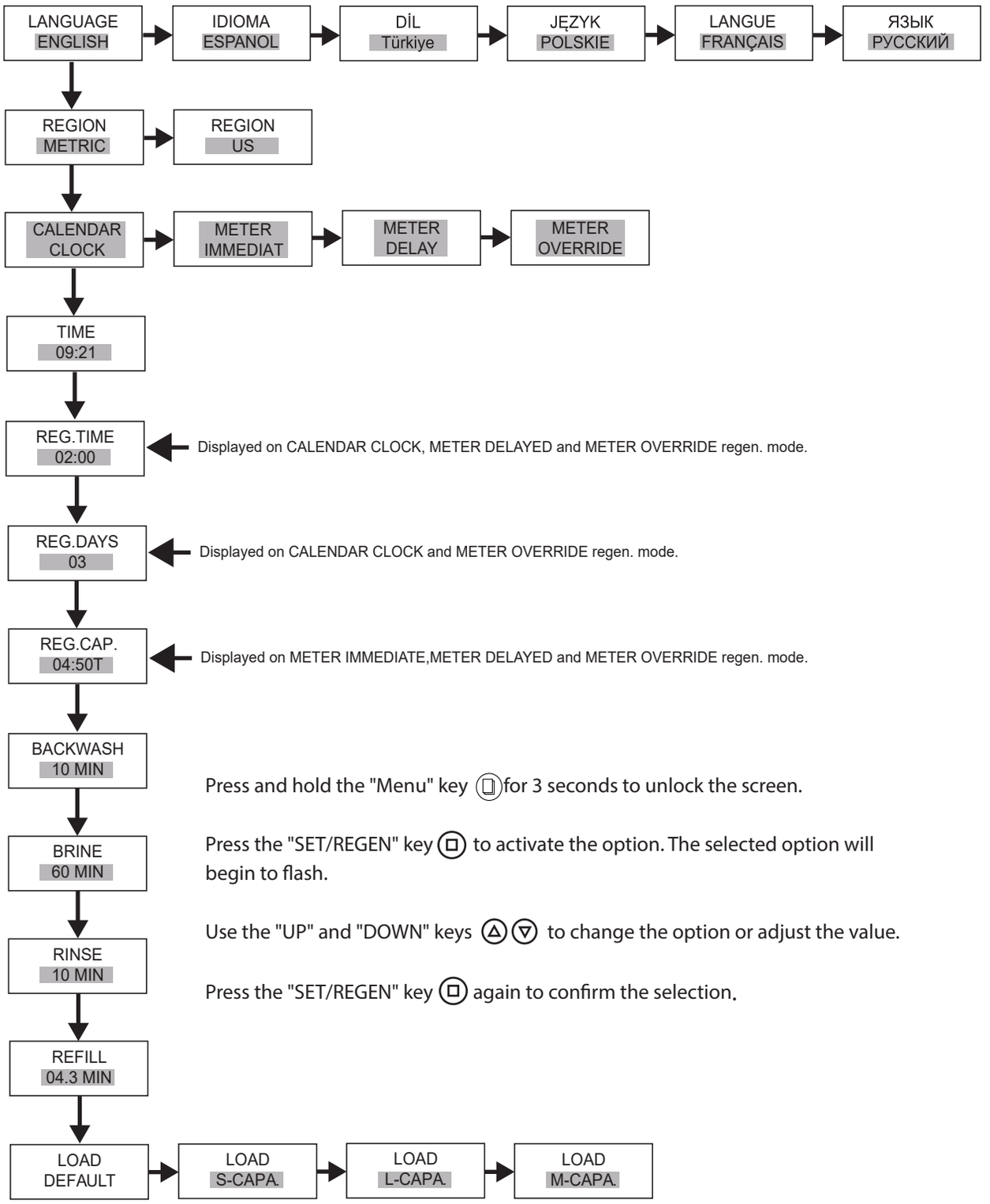


1. Rotate the knob slightly to move the valve out of the SERVICE position.
2. After a few seconds, the valve will automatically go through a standard regeneration process based on the pre-settings.

Auto. Regen.



MENU SETTINGS PAGE



Press and hold the "Menu" key for 3 seconds to unlock the screen.

Press the "SET/REGEN" key to activate the option. The selected option will begin to flash.

Use the "UP" and "DOWN" keys to change the option or adjust the value.

Press the "SET/REGEN" key again to confirm the selection.

OPERATION DURING A POWER FAILURE

In the event of a power failure, the valve retains the correct time and day. All programmed settings are stored in non-volatile memory and will not be lost.
If power fails while the unit is in regeneration, the valve will automatically resume and complete the regeneration cycle from the point where it stopped once power is restored. If a scheduled regeneration is missed due to a power failure, the valve will automatically queue the regeneration and carry it out at the next scheduled time after power is restored.

PARAMETER	DESCRIPTION
LANGUAGE	System language used on the valve display.
REGION	Unit of measure the system uses. Options: Metric (liters) or US (gallons).
CALENDAR CLOCK	The unit will initiate a regeneration at the next pre-set regeneration time based on the interval of regeneration days.
METER IMMEDIATE	The unit will initiate a regeneration immediately after the volume remaining reaches zero.
METER DELAY	When the volume remaining reaches zero, the system will initiate a regeneration at the next pre-set regeneration time.
METER OVERRIDE	When the volume remaining reaches zero, the system will initiate a regeneration at the next pre-set regeneration time. If the days between regeneration are reached before the volume remaining reaches zero, the system will override the meter setting and initiate a regeneration.
TIME	Current time setting.
REG.TIME	This setting determines the time of day to perform a scheduled regeneration.
REG.DAYS	This value is the interval (days) between regenerations. It is used to determine how many days between regenerations.
REG.CAP.	This value is the total capacity between regenerations. It is used to determine how many water can be treated between regenerations.
BACKWASH	Control the backwash duration during regeneration cycle.
BRINE	Control the brine duration during regeneration cycle.
RINSE	Control the rinse duration during regeneration cycle.
REFILL	Control the refill duration during regeneration cycle.
LOAD DEFAULT	The function of this option is to load pre-set values of BACKWASH, BRINE, RINSE, and REFILL for large, medium, and small capacity systems.

Hardness (°dH)	REG. CAP.	
	FLEX-10	FLEX-15
5	4,80 T	7,20 T
6	4,00 T	6,00 T
7	3,40 T	5,10 T
7.5	3,20 T	4,80 T
8	3,00 T	4,50 T
9	2,60 T	4,00 T
10	2,40 T	3,60 T
11	2,10 T	3,20 T
12	2,00 T	3,00 T
13	1,80 T	2,70 T
14	1,70 T	2,50 T
15	1,60 T	2,40 T
16	1,50 T	2,20 T
17	1,40 T	2,10 T
18	1,30 T	2,00 T
19	1,20 T	1,90 T

Table 1a: Programming guide REG. CAP. Hardness < 20°dH

Hardness (°dH)	REG. CAP.	
	FLEX-10	FLEX-15
20	1,20 T	1,80 T
21	1,10 T	1,70 T
22	1,00 T	1,60 T
23	1,00 T	1,50 T
24	1,00 T	1,50 T
25	0,90 T	1,40 T
26	0,90 T	1,30 T
27	0,80 T	1,30 T
28	0,80 T	1,20 T
29	0,80 T	1,20 T
30	0,80 T	1,20 T
31	0,70 T	1,10 T
32	0,70 T	1,10 T
33	0,70 T	1,00 T
34	0,70 T	1,00 T
35	0,60 T	1,00 T

Table 1b: Programming guide REG. CAP. Hardness > 20°dH

START-UP INSTRUCTIONS

1. Add two liters of water into the cabinet at the time of installation. This is for the unit to achieve proper capacity in the first time of regeneration.

2. Plug the power transformer into an approved power source. Connect the power cord to the valve.

3. When power is supplied to the control, the screen displays “WAIT PLEASE” while it finds the service position.

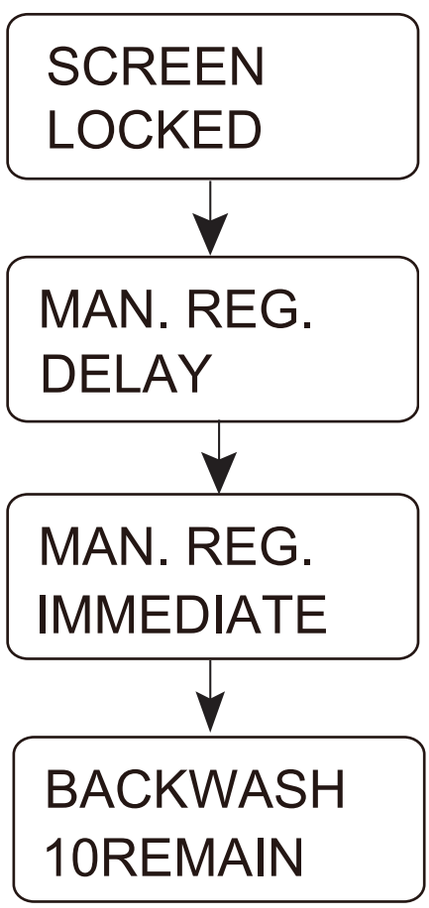
4. Manually advance the valve to the BACKWASH position. If the screen is locked, the display will show “SCREEN LOCKED.” Unlock the screen before proceeding. Follow the instructions below to step the valve into the BACKWASH position. Once the valve has reached the BACKWASH position, disconnect the power supply and leave the valve in this position.

4.1 Press and hold "Menu" key for 5s to unlock.

4.2 Press and hold "Set/Regen." key to enter Manual Regen. display. Press "Set/Regen." key again to activate Manual Regen. option.

4.3 Press "Up" or "Down" key to select Immediate Regen. option.

4.4 Press "Menu" key to start an Immediate Regen.



5. Once the valve is in the BACKWASH cycle, slowly open the inlet on the bypass valve to allow water to enter the unit. Let all air escape from the unit before fully opening the water supply. Allow the water to run to drain for 3–4 minutes, or until all media fines have been rinsed out and the drain water runs clear.

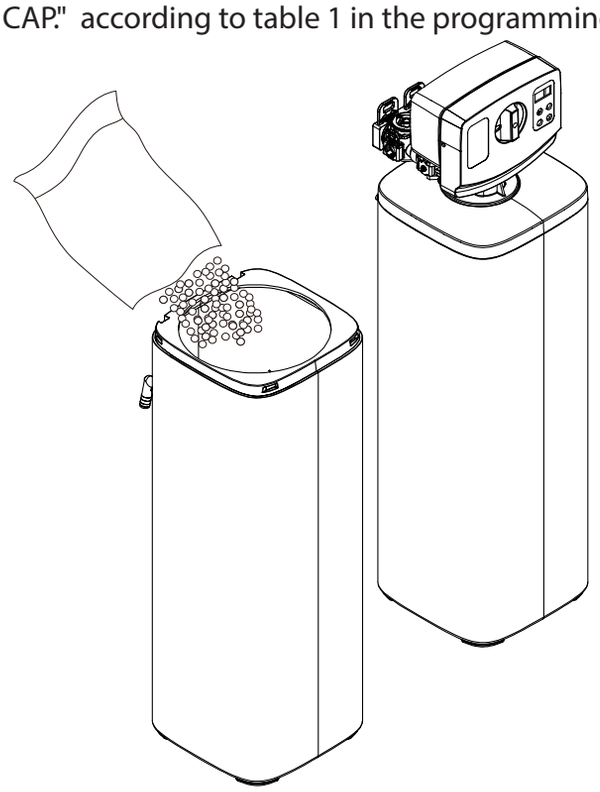
6. Reconnect the power. Press any button to advance the valve to the BRINE position. Once it reaches BRINE, press any button again to advance to the RINSE position. Check the drain line flow and allow water to run for 3–4 minutes, or until the drain water is clear.

7. Press any button to advance to the REFILL position. Confirm that the valve is filling water into the brine tank. Allow the refill to continue for the full duration displayed on the screen to ensure a proper brine solution for the next regeneration.

8. The valve will automatically advance to the SERVICE position. Open the outlet knob on the bypass using the supplied bypass tool. With the bypass open, turn on the nearest treated water faucet and allow water to run until it is clear.

9. Add salt to the cabinet. Use 12 kg of water softener salt for the FLEX-10 cabinet model and 16 kg of water softener salt for the FLEX-15 cabinet model. The system will automatically fill the correct water level during the next regeneration.

10. Program "TIME" with the current time and "REG. CAP." according to table 1 in the programming guide.



⚠ CAUTION LIQUID BRINE WILL IRRITATE EYES, SKIN AND OPEN WOUNDS - GENTLY WASH EXPOSED AREA WITH FRESH WATER. KEEP CHILDREN AWAY FROM YOUR WATER SOFTENER.

AUTOMATIC WATER BYPASS DURING REGENERATION

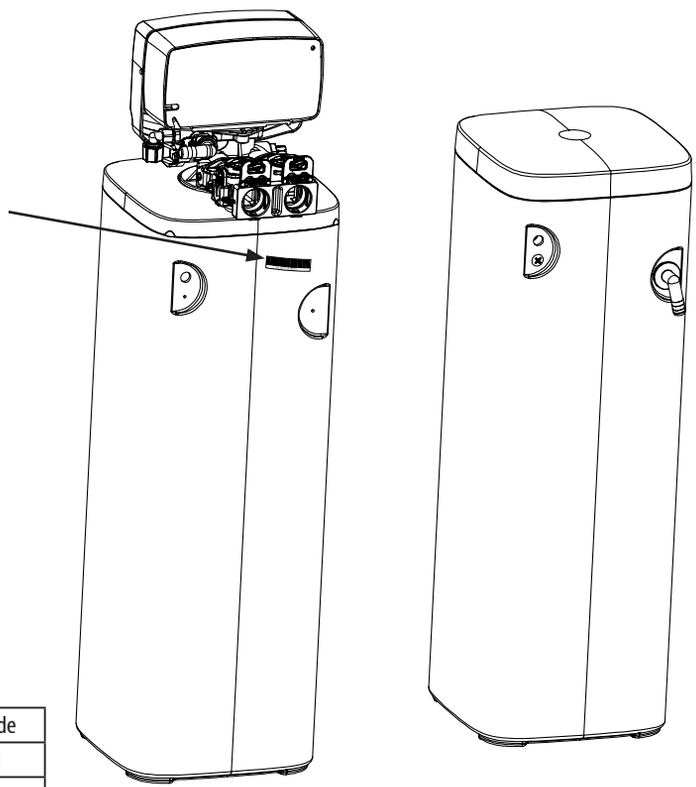
The regeneration cycle lasts approximately 70 minutes, after which softened water service will be restored. During regeneration, untreated hard water is automatically bypassed into the household supply. Hot water use should be minimized during this period to prevent hard water from entering and filling the water heater. For this reason, automatic regeneration is typically scheduled during the night, and manual regenerations should be started at times when little or no water will be used in the home.

TROUBLE SHOOTING GUIDE

Problem	Possible Solutions
1. SOFTENER DELIVERS HARD WATER	
A. Bypass valve is open	**A.** Close bypass valve
B. No salt in brine tank	**B.** Add salt to brine tank and maintain salt level above water level
C. Injector or screen clogged	**C.** Replace injectors and screen
D. Insufficient water entering brine tank	**D.** Check brine refill time and clean brine line flow control if clogged
E. Leak at distributor tube	**E.** Inspect distributor tube for cracks; check O-ring and tube pilot
F. Internal valve leak	**F.** Replace seals and spacers and/or piston
G. Flow meter jammed	**G.** Remove obstruction from flow meter
H. Flow meter cable disconnected or not plugged into meter cap	**H.** Check meter cable connection to timer and meter cap
I. Improper programming	**I.** Reprogram the control to the proper regeneration type, inlet water hardness, capacity or flow meter size.
2. CONDITIONER FAILS TO REGENERATE	
A. Electrical service to unit has been interrupted	**A.** Ensure permanent electrical service (check fuse, plug, chain or switch)
B. Timer is not operating properly	**B.** Replace timer
C. Defective valve drive motor	**C.** Replace drive motor
D. Improper programming	**D.** Check programming and reset as needed
3. UNIT USES TOO MUCH SALT	
A. Improper salt setting	**A.** Check salt usage and salt setting
B. Excessive water in brine tank	**B.** See #7
C. Improper programming	**C.** Check and reset programming
4. LOSS OF WATER PRESSURE	
A. Iron build-up in line to water conditioner	**A.** Clean supply line to water softener
B. Iron build-up in water conditioner	**B.** Clean control lavle and add resin cleaner to resin bed. Increase frequency of regeneration
C. Inlet of control plugged due to foreign material broken loose from pipes by recent work done on plumbing system.	**C.** Remove piston and clean control
5. LOSS OF RESIN THROUGH DRAIN LINE	
A. Air in water system	**A.** Assure that well system has proper air eliminator control.
B. Drain line flow control is too large	**B.** Ensure drain line flow control is correctly sized
6. IRON IN CONDITIONED WATER	
A. Fouled resin bed	**A.**Check backwash, brine draw and brine tank fill. Increase frequency of regeneration. Increase backwash time.
B. Iron content exceeds recommended parameters	**B.** Add iron removal filter system
7. EXCESSIVE WATER IN BRINE TANK	
A. Plugged drain line flow control	**A.** Clean flow control
B. Brine valve failure	**B.** Replace brine valve
C. Improper programming	**C.** Check programming and reset as needed
8. SALT WATER IN SERVICE LINE	
A. Plugged injector system	**A.** Clean injector and replace screen
B. Timer not operating properly	**B.** Replace timer
C. Foreign material in brine valve	**C.** Clean or replace brine valve
D. Foreign material in brine line flow control	**D.** Clean brine line flow control
E. Low water pressure	**E.** Raise water pressure
F. Improper programming	**F.** Check programming and reset as needed
9. CONDITIONER FAILS TO DRAW BRINE	
A. Drain line flow control is plugged	**A.** Clean drain line flow control
B. Injector is plugged	**B.** Clean or replace injectors
C. Injector screen is plugged	**C.** Replace screen
D. Line pressure is too low	**D.** Increase line pressure (line pressure must be at least 20 psi at all times)
E. Internal control leak	**E.** Change seals and spacers and/or piston assembly
F. Improper programming	**F.** Check programming and reset as needed
G. Timer not operating properly	**G.** Replace timer
10. CONTROL CYCLES CONTINUOUSLY	
A. Timer not operating properly	**A.** Replace timer
B. Faulty microswitches and/or harness	**B.** Replace faulty microswitch or harness
C. Faulty cycle cam operation	**C.** Replace cycle cam or reinstall
11. DRAIN FLOWS CONTINUOUSLY	
A. Foreign material in control	**A.** Remove piston assembly and inspect bore. Remove foreign material and check control in various regeneration positions
B. Internal control leak	**B.** Replace seals and/or piston assembly
C. Control valve jammed in backwash, brine or rinse position	**C.** Replace piston and seals and spacers
D. Timer motor stopped or jammed teeth	**D.** Replace timer motor and check all gears for missing teeth
E. Timer not operating properly	**E.** Replace timer

CHECK THE SOFTENER SERIAL NUMBER

XXXXXXXXXX-Y15-02-0001



XXXXXXXXXX-Y15-02-0001

Product Part # | Year | Month | Date | Batch code | Sequence #

Year

Year	Code
2021	V
2022	W
2023	X
2024	Y
2025	Z
2026	AA
2027	AB
2028	AC
2029	AD
...	...
2052	BA
2053	BB
2054	BC
2055	BD
...	...

Month

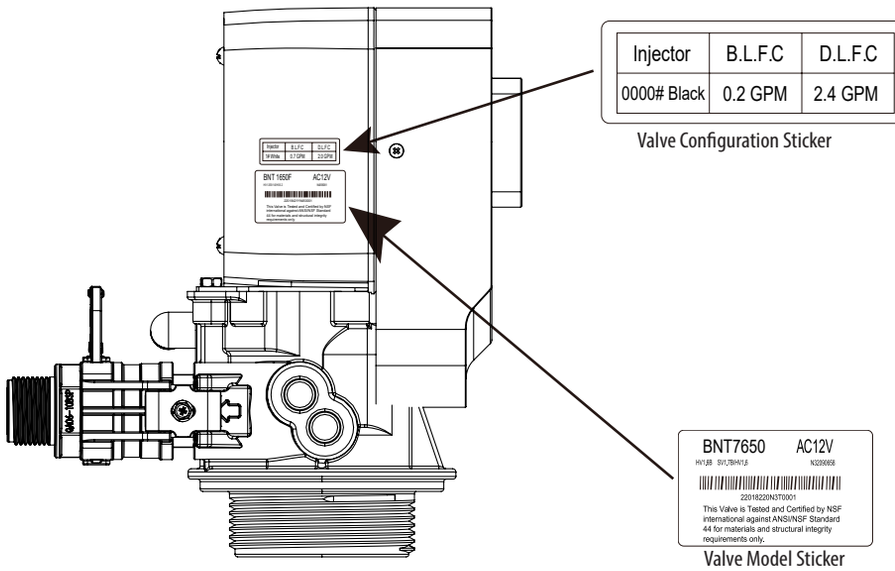
Month	Code
1	1
2	2
3	3
4	4
5	5
6	6
7	7
8	8
9	9
10	A
11	B
12	C

Date

Date	Code
1	1
2	2
3	3
4	4
5	5
6	6
7	7
8	8
9	9
10	A
11	B
12	C
13	D
14	E
15	F
16	G
17	H
18	I
19	J
20	K
21	L
22	M
23	N
24	O
25	P
26	Q
27	R
28	S
29	T
30	U
31	V

CHECK THE VALVE SERIAL NUMBER AND VALVE TYPE

Check to make sure the valve type matches what you ordered. The valve configuration sticker will show the injector, BLFC and DLFC size. The valve model sticker shows model, hardware/software version, serial # and batch code of the control valve. Serial numbers are important for trouble shooting.



XXXXXXXXXX-Y15-02-0001

VALVE SERIAL NUMBER:

XXXXXXXXXX-Y15-02-0001

Year/Month/Date

Batch code

Sequence #

Year

Year	Code
2021	V
2022	W
2023	X
2024	Y
2025	Z
2026	AA
2027	AB
2028	AC
2029	AD
...	...
2052	BA
2053	BB
2054	BC
2055	BD
...	...

Month

Month	Code
1	1
2	2
3	3
4	4
5	5
6	6
7	7
8	8
9	9
10	A
11	B
12	C

Date

Date	Code
1	1
2	2
3	3
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5	5
6	6
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8	8
9	9
10	A
11	B
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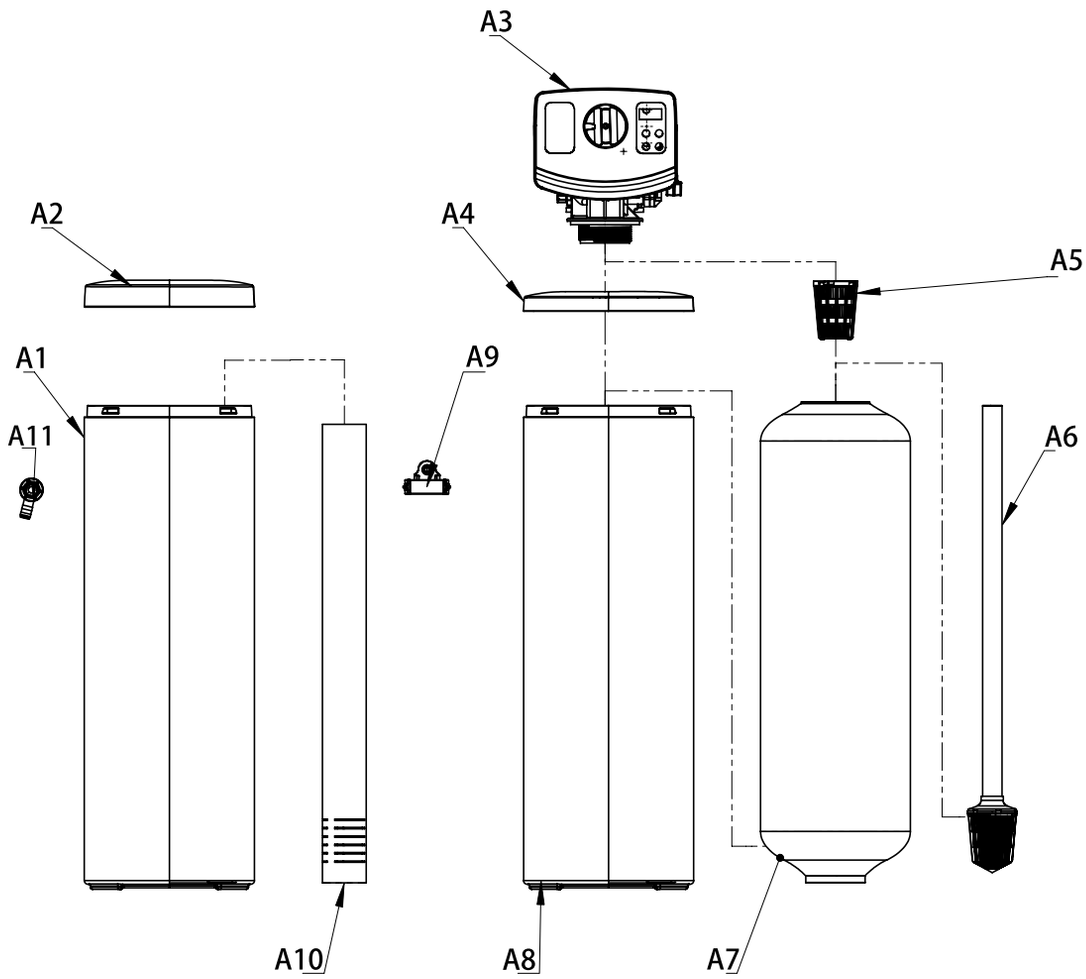
13	D
14	E
15	F
16	G
17	H
18	I
19	J
20	K
21	L
22	M
23	N
24	O
25	P
26	Q
27	R
28	S
29	T
30	U
31	V

PARTS BREAKDOWN

SOFTENER PARTS LIST

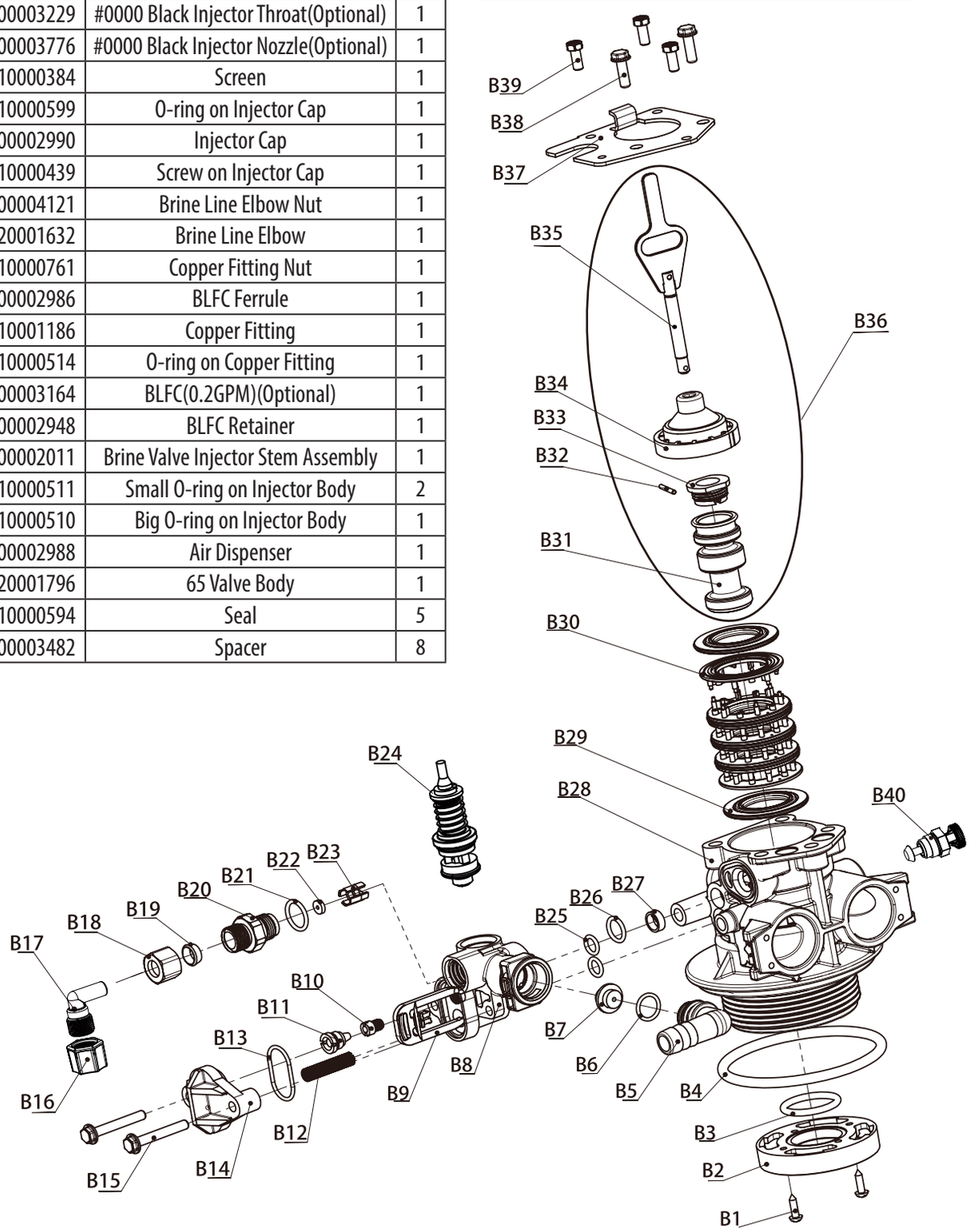


No.	Part #	Description	Qty
A1	2020010357	Brine Tank-DS03-0818	1
	2020010353	Brine Tank-DS03-0826	1
A2	2020010358	Brine Tank Lid	1
A3	2010004910	Control Valve Assy	1
A4	2020010323	Cabinet Cover	1
A5	2020001520	Top Distributor	1
A6	2010001114	Distribution Assy(18")	1
	2010001111	Distribution Assy(26")	1
A7	2010000273	0818 Pressure Tank(Black)	1
	2010000282	0826 Pressure Tank(Black)	1
A8	2020010356	Cabinet-DS03-0818	1
	2020010354	Cabinet-DS03-0826	1
A9	2020003450	Brine Well Clamp Assy	1
A10	2020010490	Brine Valve&Brine Well Assy 0217	1
	2020010491	Brine Valve&Brine Well Assy 0226	1
A11	2020007651	Overflow Assy	1

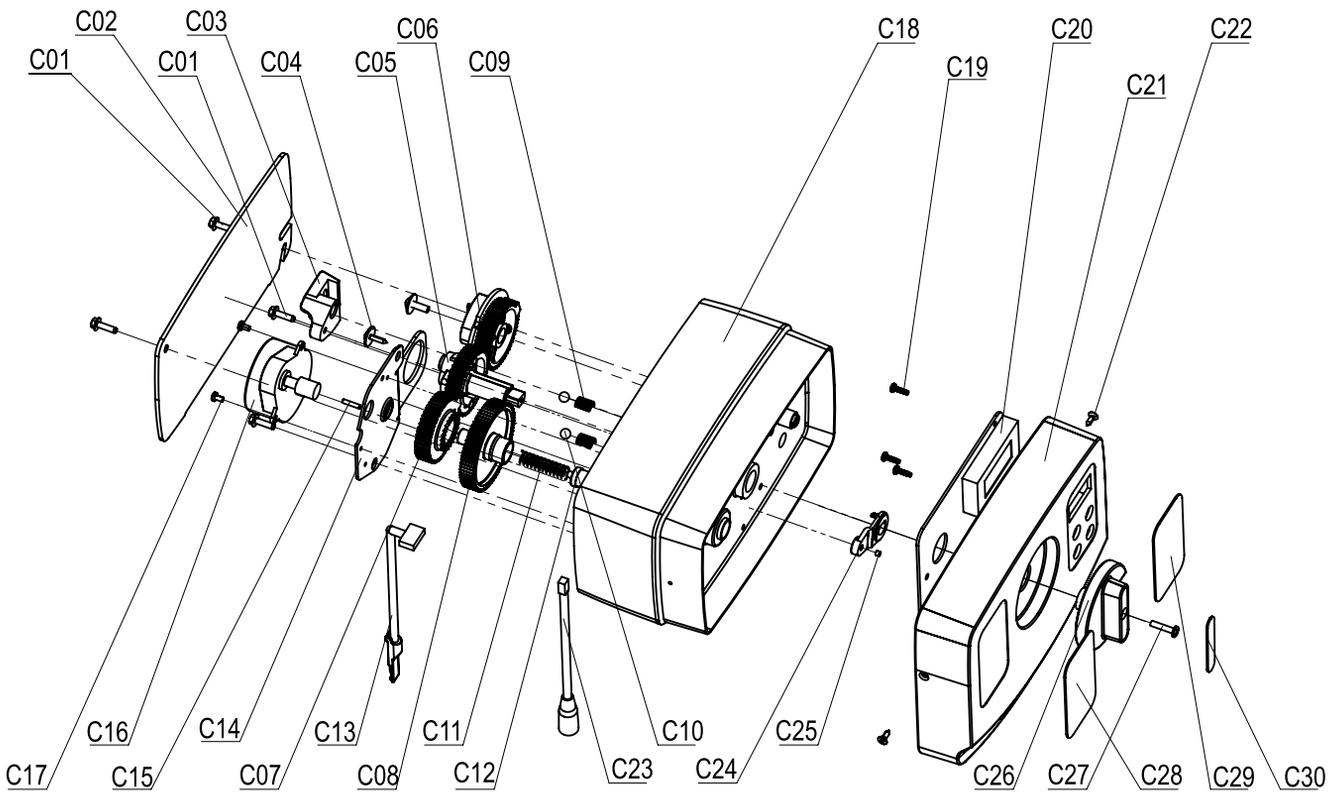
VALVE BODY PARTS LIST

No.	Part #	Description	Qty
B1	3010000495	Screw on Valve Bottom Connector	2
B2	1200003004	Valve Bottom Connector	1
B3	3010000538	Distributor O-ring	1
B4	3010000509	Tank Mouth O-ring	1
B5	1200002984	Drain Elbow	1
B6	3010000597	O-ring of Drain Line Elbow	1
B7	1200002871	DLFC(2.4GPM)(Optional)	1
B8	1200002998	Injector Body	1
B9	1200004116	Secure Clip-S	1
B10	1200003229	#0000 Black Injector Throat(Optional)	1
B11	1200003776	#0000 Black Injector Nozzle(Optional)	1
B12	3010000384	Screen	1
B13	3010000599	O-ring on Injector Cap	1
B14	1200002990	Injector Cap	1
B15	3010000439	Screw on Injector Cap	1
B16	1200004121	Brine Line Elbow Nut	1
B17	2020001632	Brine Line Elbow	1
B18	3010000761	Copper Fitting Nut	1
B19	1200002986	BLFC Ferrule	1
B20	3010001186	Copper Fitting	1
B21	3010000514	O-ring on Copper Fitting	1
B22	1200003164	BLFC(0.2GPM)(Optional)	1
B23	1200002948	BLFC Retainer	1
B24	1200002011	Brine Valve Injector Stem Assembly	1
B25	3010000511	Small O-ring on Injector Body	2
B26	3010000510	Big O-ring on Injector Body	1
B27	1200002988	Air Dispenser	1
B28	2020001796	65 Valve Body	1
B29	3010000594	Seal	5
B30	1200003482	Spacer	8

B31	3010000667	Piston	1
B32	3010000444	Piston Pin	1
B33	2020001798	Piston Retainer	1
B34	1200007649	End Plug	1
B35	3010000641	Piston Rod	1
B36	1200001568	Piston Assembly	1
B37	3010000710	End Plug Retainer	1
B38	3010000498	Screws M5×16	2
B39	3010000497	Screws M5×12	3
B40	2020007695	Blending Valve Assy	1



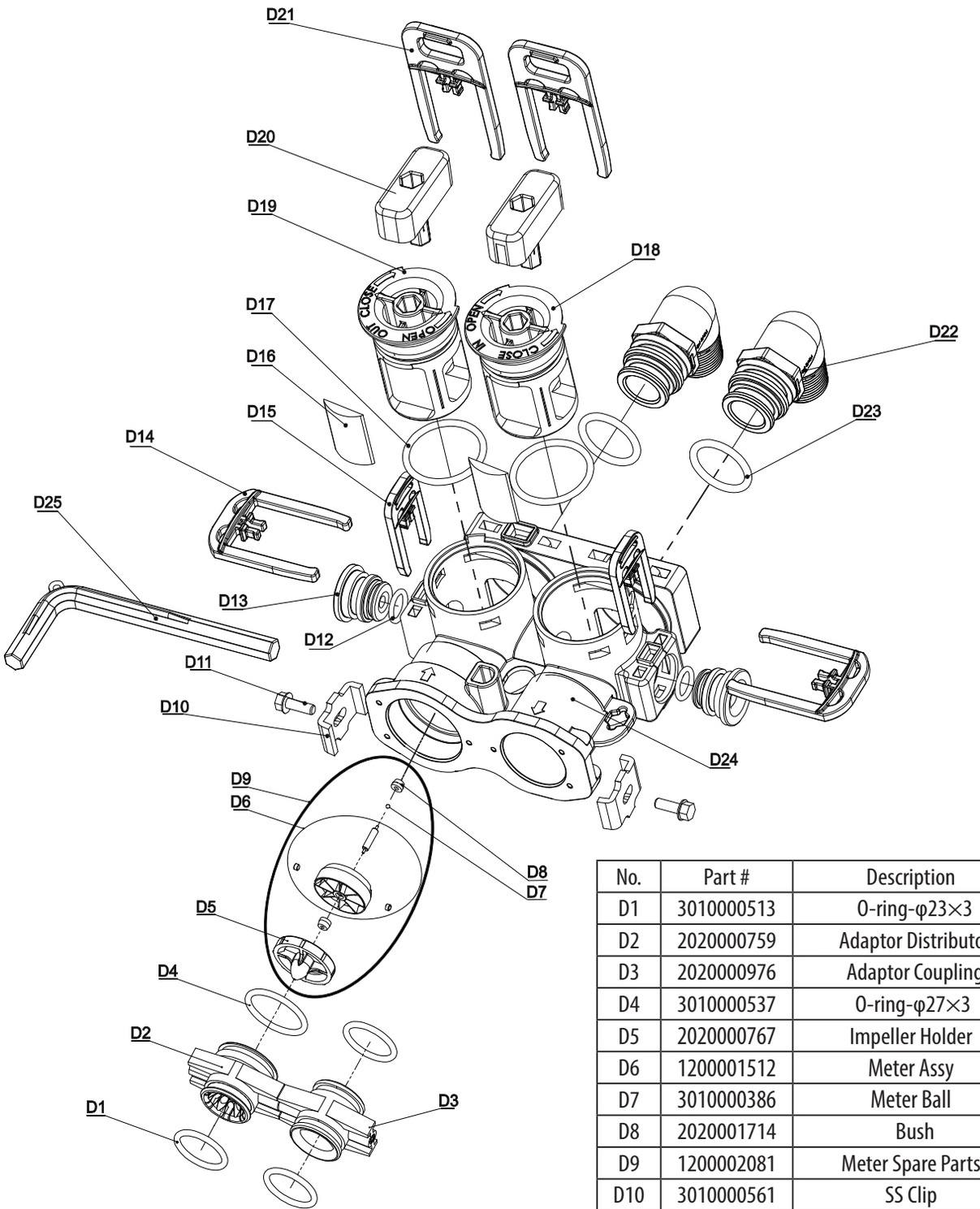
POWER HEAD PARTS LIST



No.	Part #	Description	Qty
C1	3010000447	Screw 3.5×13	4
C2	2020000968	Back Cover	1
C3	1200003810	Piston Stem Holder	1
C4	3010006544	Screw 2.9×13(c/w washer)	1
C5	1200003666	Main Gear	1
C6	1200003698	Brine Gear	1
C7	2020001035	Idler Gear	1
C8	1200003615	Drive Gear	1
C9	3010000722	Spring Detent	2
C10	2020000955	Housing	1
C11	3010000722	Spring Detent	2
C12	3010000443	SS Ball	2
C13	3010000911	Meter Cable	1
C14	3010000554	Motor Mounting Plate	1
C15	3010000445	Motor Pin	1

C16	3010009662	Motor	1
C17	3010000436	Screw M3×5	2
C18	2020000955	Housing	1
C19	3010000493	Screw 2.9×10	3
C20	3010000380	Display PCB	1
C21	2020008308	Front Cover	1
C22	3010000449	Screw 2.9×9.5	2
C23	3010009661	Power Cable	1
C24	2020001037	Magnet Holder	1
C25	3010000692	Magnet-φ3×2.7	1
C26	2020008307	Knob	1
C27	3010000415	Screw 3.5×16	1
C28	3010019582	Decoration Label	1
C29	3010019581	Operation Label	1
C30	3010019583	Knob Label	1

BYPASS PARTS LIST



No.	Part #	Description	Qty
D1	3010000513	O-ring-φ23×3	3
D2	2020000759	Adaptor Distributor	1
D3	2020000976	Adaptor Coupling	1
D4	3010000537	O-ring-φ27×3	1
D5	2020000767	Impeller Holder	1
D6	1200001512	Meter Assy	1
D7	3010000386	Meter Ball	1
D8	2020001714	Bush	2
D9	1200002081	Meter Spare Parts	1
D10	3010000561	SS Clip	2
D11	3010000468	Screw M4×12	2
D12	3010000597	O-ring(12×2)	2
D13	2020000997	Bypass Plug	2
D14	2020001636	Shaft Clip	2
D15	1200004116	Plug Clip	2
D16	3010000621	Shaft Seal	2
D17	3010000570	O-ring(30×2.65)	2
D18	2020001026	Bypass Shaft(Inlet)	1
D19	2020001027	Bypass Shaft(Outlet)	1
D20	2020001030	Bypass Knob	1
D21	2020001635	Connector Clip	2

D22	2020001604	Connector 3/4" Straight	2
D23	3010000539	O-ring(22.4×3.55)	2
D24	2020001025	063 Bypass Body	1
D25	1200003802	Bypass Tool	1