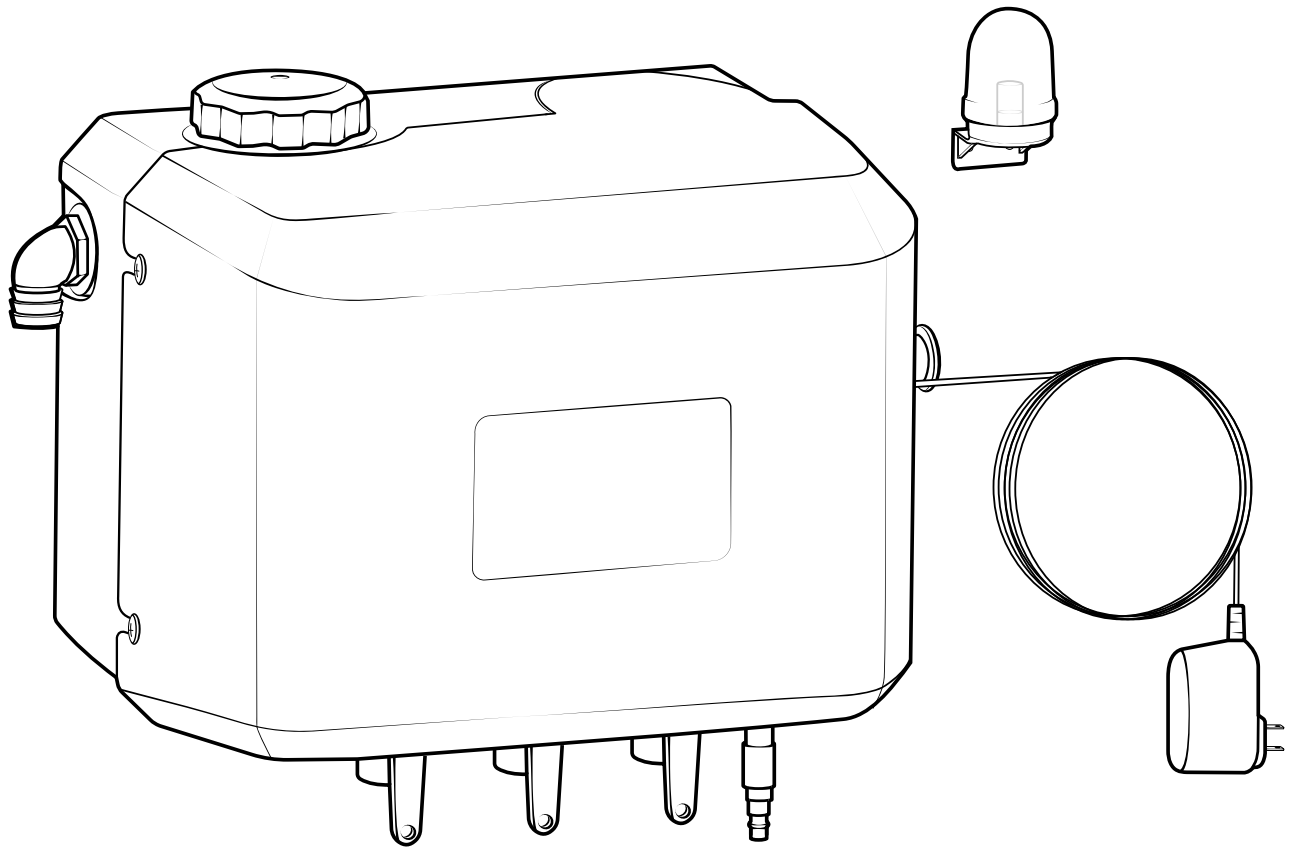


Flooded Suction Tank

Operation Manual

FST-E | FSTV-V | FSTK-T



READ ALL INSTRUCTIONS BEFORE USING OR
SERVICING THIS UNIT. KEEP THIS MANUAL IN A
LOCATION THAT IS READILY AVAILABLE TO USERS
AND SERVICE TECHNICIANS.

English (Original Instructions)



Scan this code for
operation manual



Safety

WARNING

PEOPLE OR OBJECTS CAN BE HURT OR DAMAGED IF THIS UNIT IS NOT USED CORRECTLY!



Failure to read all the instructions before operating the unit may result in personal injury or death from the improper use or the chemical solution. Anyone handling, operating or using the unit must read and understand the instructions in the manual. The buyer assumes all responsibility for safety and proper use in accordance with the instructions.



Using or servicing the unit without appropriate personal protective equipment (PPE) may result in serious injury such as burns, rashes, eye, throat or lung damage and death. Always wear PPE as indicated in the Safety Data Sheet (SDS) when using or servicing the unit. Protect eyes, skin, and lungs against drifting spray.



Chemical solutions may pose a health risk and death if they contact the skin or eyes, are inhaled or swallowed. Always read and follow all chemical safety precautions and handling instructions provided by the chemical manufacturer and the SDS associated with the chemical solution before using the unit.



Pressure within the equipment may cause an unexpected release of the chemical solution and cause serious injury such as burns, rashes, eye damage, throat or lung damage and death. Always depressurize and clean the unit after each use. Release any remaining air pressure by opening the discharge ball valve. Never leave the unit unattended while pressurized.

Using the unit with fluid temperatures above 100°F (37.8°C) may result in scalding, burns, serious injury or death. DO NOT use a solution with a temperature above 100°F (37.8°C).

Operating the unit when damaged or leaking may result in exposure to chemical solutions, serious injury or death. Never use the unit if it is damaged or leaking.

Never open ball valves with chemical in the tank, unless the ball valves are connected to an appropriate location for chemical discharge. Never point the discharge valves at yourself, another person, or any object you do not want covered in chemical. Never operate unit without the lid on.

Do not use the unit if an overflow hose is not installed. If chemical flows from the overflow port, shut down the unit immediately and correct the problem before proceeding.



Using incoming air pressure exceeding 80 psi (5.5 bar) may result in pressure buildup, explosion, serious injury or death. DO NOT exceed 80 psi (5.5 bar) incoming air pressure when operating the unit.

Use of hydrocarbons and flammable products may result in explosions, fire and serious injury or death. Never use hydrocarbons or flammable products with the unit.



Mixing an alkaline with an acid may result in a chemical reaction. Overheating of the mixture may cause it to splatter caustic compounds or release hazardous fumes, gas and vapors. Always flush unit with fresh water thoroughly when switching from an alkaline to an acid or an acid to an alkaline.

NOTICE

Servicing or modifying this unit with parts not listed in this manual may cause the unit to operate improperly. Do not use unauthorized parts when servicing the unit.

Use of an air lubricator before the unit may result in diminished performance and damage to the unit. Do not use an air lubricator before the unit.

Moisture in the air lines will damage the pump and diminish the pump life. The air must be filtered, clean, dry and free of moisture. If needed, install an air dryer before the unit.

PROTECT THE ENVIRONMENT



Please dispose of packaging materials, old machine components, and hazardous fluids in an environmentally safe way according to local waste disposal regulations



Model No.: FST-E, FSTV-V, FSTK-T

Manufactured by: FOAMit

3833 Soundtech Ct. SE Grand Rapids, MI 49512 US

This equipment has been tested and found to comply with the limits for a **Class A** digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

Product Overview

Requirements

| | |
|-----------------------------|--|
| Compressed air requirements | 60-80 psi (4.1-5.5 bar) with 5-10 CFM (141.6-283.2 l/min) |
| Electrical requirements | 100-240 VAC at 50-60 Hz, 1 amp (GFCI protected outlet) |
| Liquid temperature range | 40-100°F (4.4-37.8°C) |
| Chemical compatibility | Chemical products used with this equipment must be formulated for this type of application and compatible with unit materials and pump seals. For more information on chemical compatibility, consult the manufacturer or SDS for your product or contact our customer service department. |

Specifications

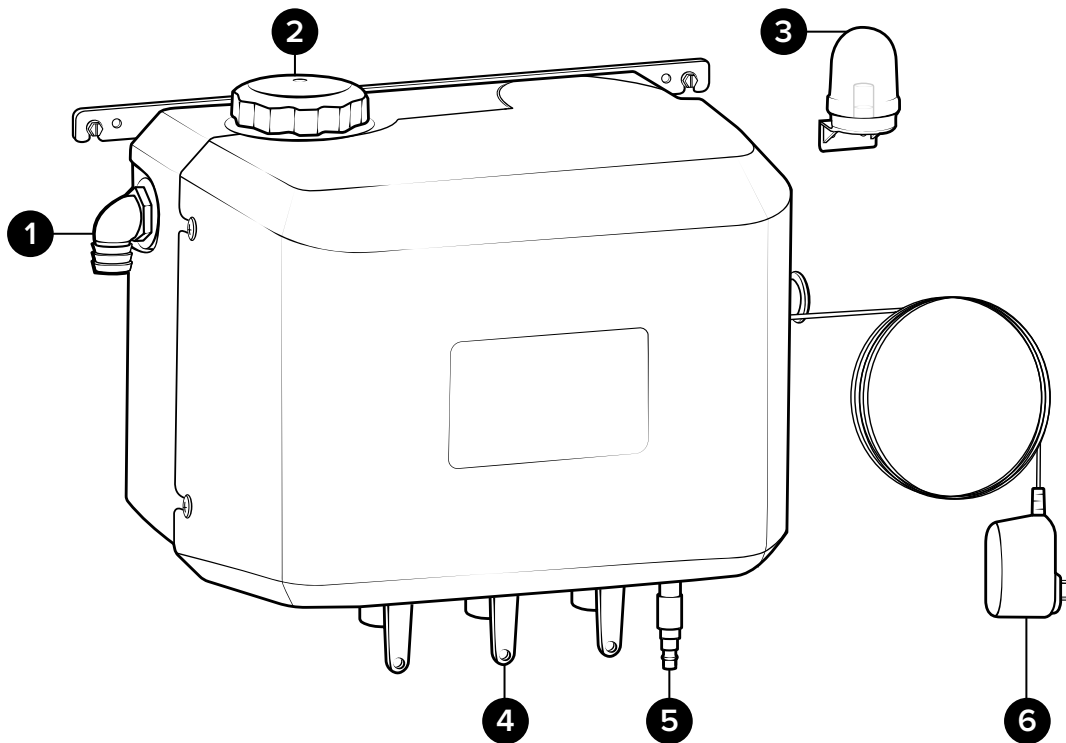
| | |
|---------------------------------------|---|
| Power type | Compressed air and electricity |
| Electrical operating voltage | 24 VDC; Power supply included |
| Rated load of relay signal terminals | 8A 250VAC / 8A 30VDC |
| Chemical pickup type | Draws from concentrated, pre-mixed, or ready-to-use product |
| Number of products unit can draw from | One product |
| Fluid capacity | 3.5 gallons (13.2 liters) |
| Fill rate* | Up to 2.5 gal/min (9.5 l/min) |
| Discharge valve type/material | Polypropylene ball valve with Viton seals |
| Pump seals | Santoprene, Viton, Kalrez |
| Air operated valve seal | EPDM, Viton, Teflon |

*Flow rates given are based on chemical with viscosity of water and factory air pressure settings.

Product Components

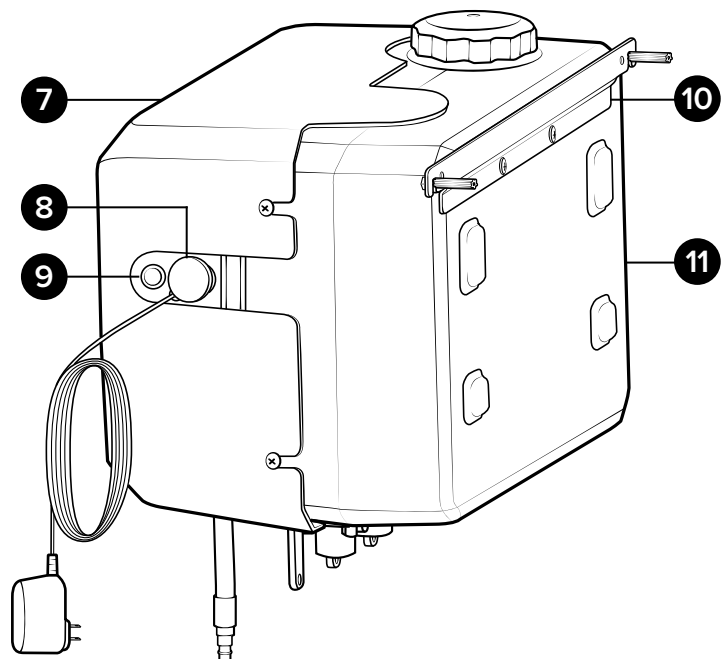
Get to know the components that you will need to use, adjust or assemble.

Tank assembly • Front view



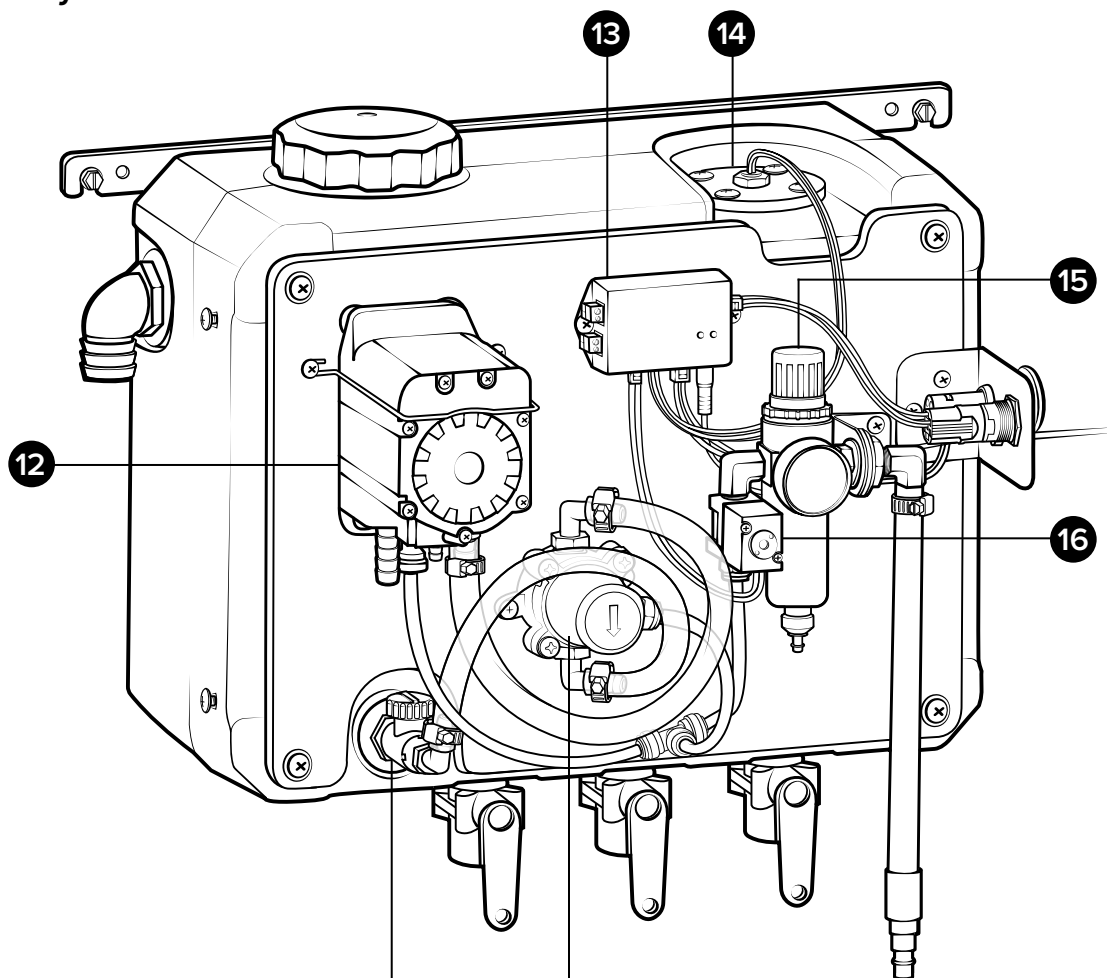
- 1. Overflow port
- 2. Cap
- 3. Indicator light
- 4. Poly ball valve
- 5. Air fitting
- 6. Power supply
- 7. Lid
- 8. E-stop
- 9. Prime button
- 10. Mounting bracket
- 11. Tank

Back view



Product Components

Plate assembly • Without lid



12. Quick-change pump

13. Controller

14. Float level sensor

15. Air regulator

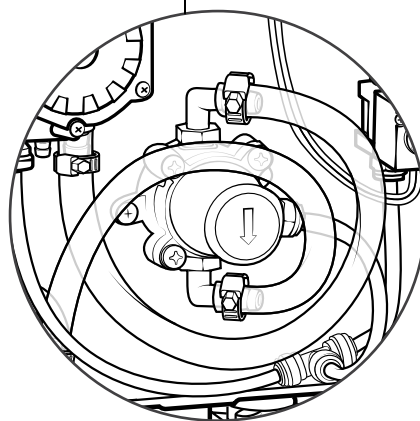
16. Air control valve

17. PVC ball valve

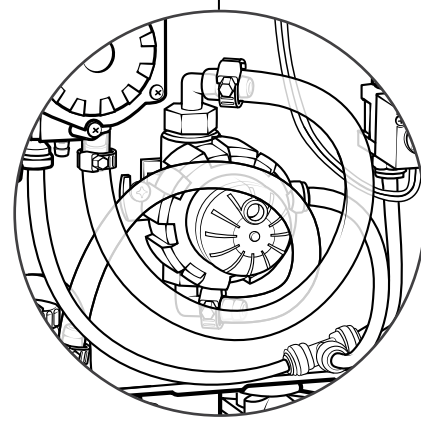
18. Air operated valve -

a. EPDM or Viton seals

b. Teflon seals



EPDM or Viton seals



Teflon seals

Using Your Unit

Installation Instructions

Instructions apply to all unit configurations.

1. Remove all components from packaging and select desired area to mount the unit.
2. Ensure mounting bracket is oriented correctly and secure it to the wall using provided hardware.

Note: Use a $\frac{5}{16}$ in. drill bit to drill holes for plastic anchors. The two holes should be 19 $\frac{3}{4}$ in. (50.2 cm) apart horizontally. Use bracket as a template to drill holes before attaching it to tank.

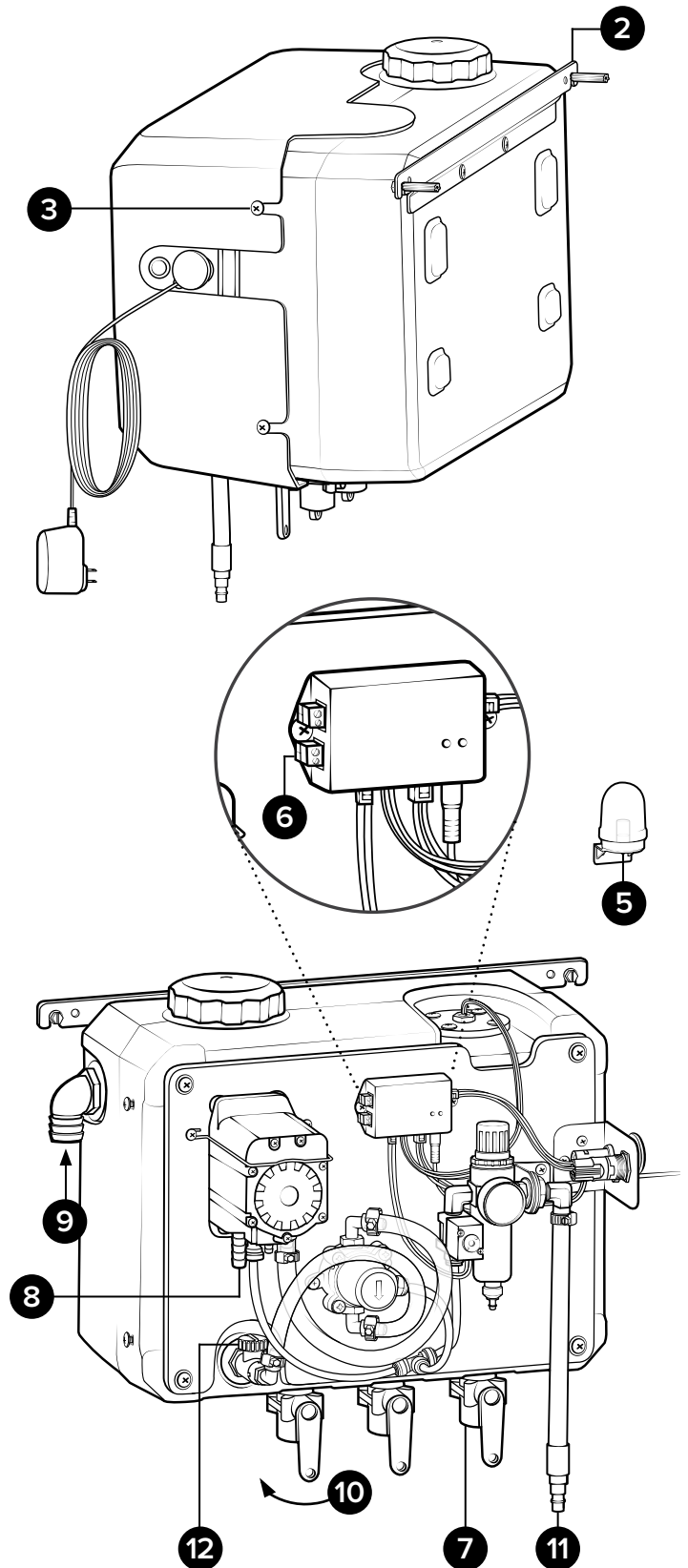
3. Loosen all 4 screws and slowly remove the lid.

Note: Use caution during lid removal; light indicator and power supply are not secured to the unit.

4. Remove indicator light, housing, and installation instructions from the included parts packages.
5. Using the included instructions, attach wiring to the indicator light assembly. Wiring is not included.
6. Once the wiring is secured to the indicator light assembly, attach the opposite end of the wiring to the dedicated terminals on the controller.

Note: Wiring can be connected to the controller terminals in either orientation.

7. Connect one or more of the ball valves on the underside of unit to your existing metering pump(s).
8. Connect a hose to the suction barb of fluid pump. Maximum draw length is 15 ft (4.5 m). Suction hose and strainer are not included with the unit. These can be purchased separately.
9. Connect a hose to the overflow port and run the hose back to your chemical source or to another suitable location for chemical discharge.
10. Verify ball valves on the underside of the unit are in the closed position.
11. Connect compressed air supply to air fitting.
12. Ensure the PVC ball valve is in the open position.
13. Secure lid back to unit and tighten all 4 screws.



Using Your Unit

Operating Instructions

Instructions apply to all unit configurations.

1. Follow all instructions from the chemical manufacturer.
2. Verify all ball valves not being used are closed and/or plugged.
3. Verify cap is secured on top of the tank.
4. Verify pump is connected to chemical source.
5. To power the unit, plug the 24 VDC power adapter to a 100-240 VAC outlet.
6. To activate unit, press the PRIME button when tank is empty. Press PRIME again if unit does not reach the fill level within 90 seconds.

Note: The PRIME button LED will illuminate when tank is empty, and will turn off when product reaches appropriate fill level.

7. When unit is active, the pump will begin to cycle.

Note: Pump will stop cycling when product reaches appropriate fill level.

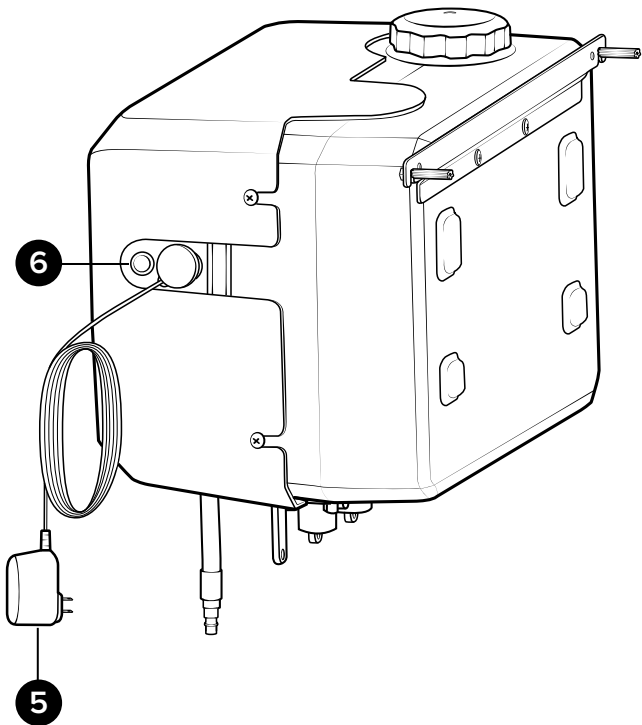
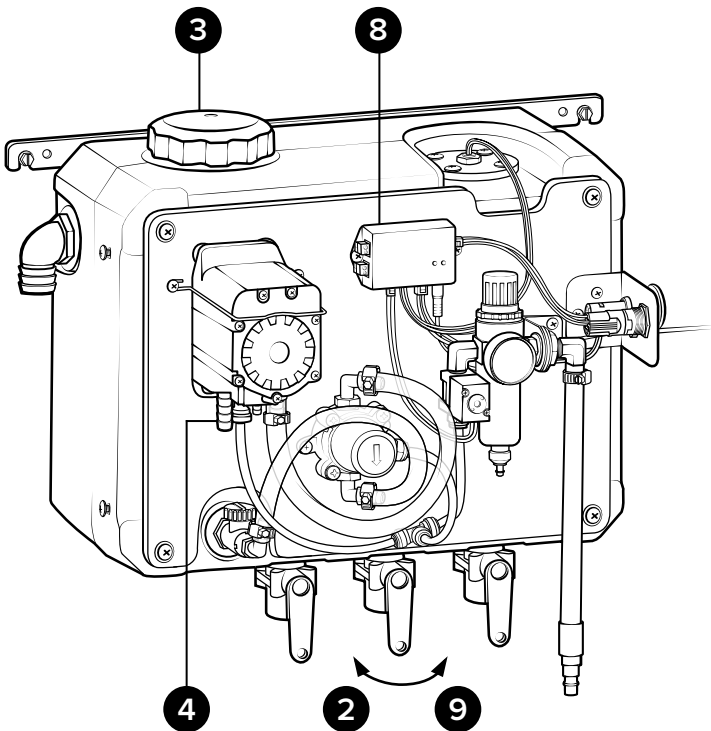
8. Operation cycle of the unit will be indicated by on-board LED lights, listed below:

| Controller LED Color Signals | |
|------------------------------|---|
| Green | Unit is active. Solution is filled to the appropriate level (or) unit is actively filling the tank. |
| Red | Tank has run dry (or) error has occurred with the unit. |

9. Open the ball valve(s) connected to outputs. Any ball valves not connected to an output should remain closed.

After Use Instructions

10. Before shutting down or using unit with another chemistry, thoroughly flush the unit with water.
11. After unit has been completely flushed, unplug 24 VDC power adapter to shut down the unit.



Maintenance

WARNING

Performing any maintenance with the unit connected to the air supply and/or electrical power may result in serious injury or death. Before conducting any maintenance, always ensure that the unit has been drained and disconnected from both compressed air and electrical power. Servicing or modifying this unit with parts not listed in this manual may cause the unit to operate improperly. Do not use unauthorized parts when servicing the unit.

Maintaining Your Unit

To keep your unit operating properly, periodically perform the following maintenance procedures:

- Inspect the pump for wear and leaks.
 - Inspect all hoses for leaks or excessive wear. Make sure all hose clamps are in good condition and properly secured.
 - Replace the filter located within the air regulator as needed. Clean by unthreading the air regulator bowl from the air regulator.
 - Check the suction line and strainer for debris. Clean as needed.
 - Drain your air compressor tank on a regular basis to help extend pump life. An air source with a high moisture content will accelerate pump wear.
- Note:** If your air source has a high moisture content, you may wish to install a water separator before the unit.

Servicing Your Unit

To service your unit, refer to the service manual which includes:

- Troubleshooting procedures.
- Detailed parts breakdowns and illustrations.
- Part numbers of serviceable components and assemblies.



Scan this code for
service manual

