

VIVOHOME

THANK
YOU!

NOTE:

To continuously improve its products, VIVOHOME reserves the right to modify this information without prior notification.

For any questions regarding assembly, please watch the video on the product page or contact our customer service. Our customer service will gladly assist you with any additional questions, comments, or concerns.

Thank you for using VIVOHOME products in your home!

Thank You for Purchasing from

VIVOHOME

Made in China

VIVOHOME

HOW-TO

USER MANUAL



HVAC Condensate Pump



Assembly is EASY!

WE WANT
YOU TO
ENJOY LIFE
AT HOME

GO TO THE PRODUCT LISTING PAGE FOR
AN INSTRUCTIONAL VIDEO!

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This condensate pump is designed for draining condensate water from air conditioning evaporator coils. Controlled by a Hall sensor within its float switch, the pump automatically starts when the water level rises to about 1.4 inches and stops once it falls to about 0.8 inch.

The VIVOHOME Condensate Pump is built with high-grade materials and designed for durable, dependable service. Each unit is thoroughly inspected, tested, and securely packaged to ensure it arrives in perfect working condition.

Upon delivery, please examine the pump and packaging for any damage. If damage is found, please note it on the delivery documentation and contact us promptly. We will assist you with repair or replacement if necessary.

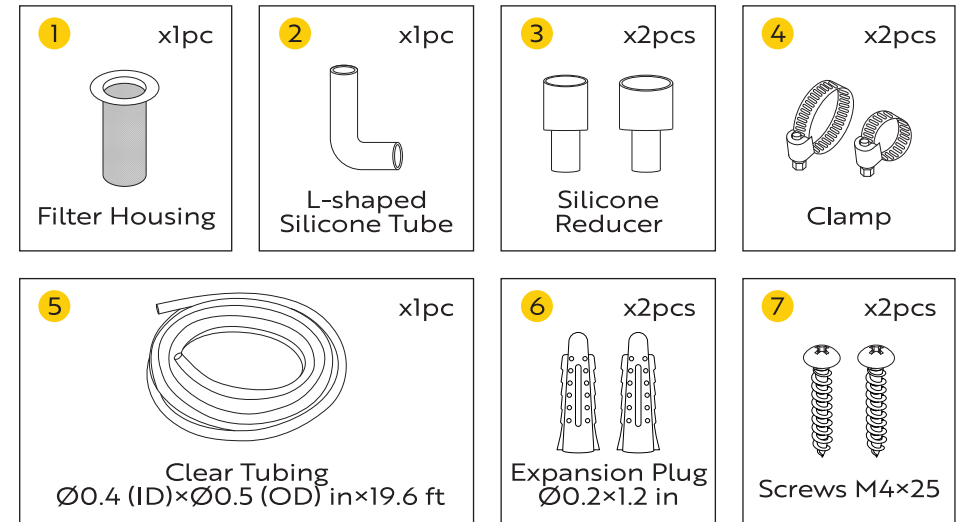
Before installing, operating, or maintaining the pump, read all instructions carefully. Understand the pump's proper applications, limitations, and potential risks. Follow all safety guidelines to prevent injury or property damage. Failure to do so may void the warranty and result in hazardous conditions.

Keep this manual for future reference. Installation and electrical connections must be performed by qualified personnel.

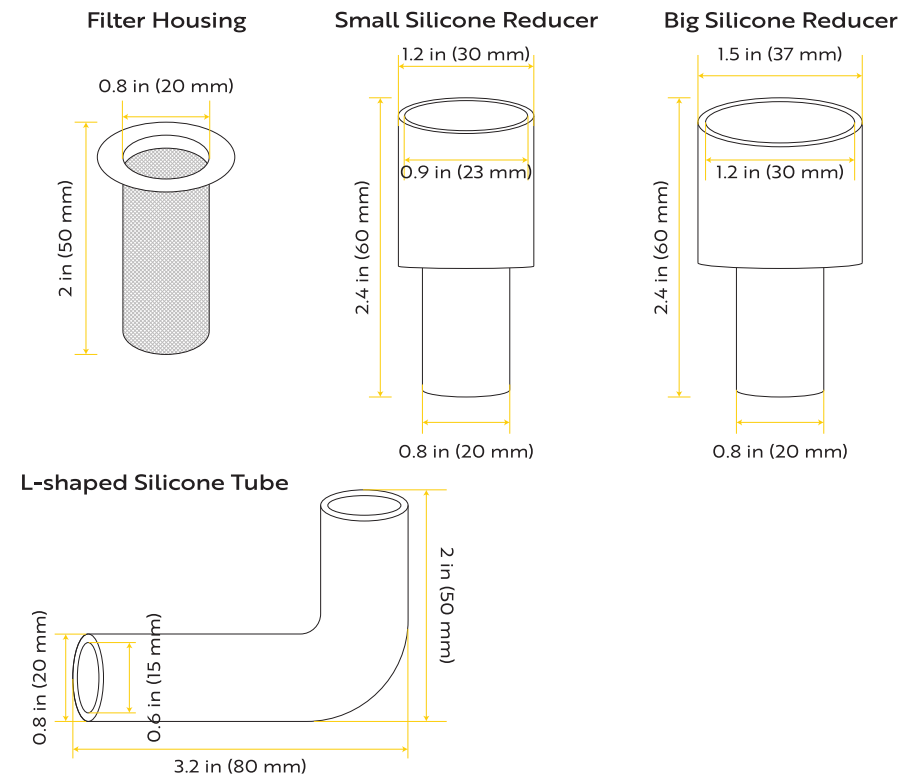
Specifications

Model	Part Number	Volts	Hz	Amps	Watts	Max Head
MD-TPH-3-20-TR	VH1825-TR	100-240	50/60	0.35	25	20 ft
MD-TPH-3-15-TR	VH1826-TR	100-240	50/60	0.35	20	15 ft
MD-TPH-3-20-BK	VH1825-BK	100-240	50/60	0.35	25	20 ft
MD-TPH-3-15-BK	VH1826-BK	100-240	50/60	0.35	20	15 ft

Parts List



Parts Dimensions





Before Getting Started

This equipment should be installed and serviced by technically qualified personnel who are familiar with the correct selection and use of appropriate tools, equipment, and procedures. Failure to comply with national and local electrical and plumbing codes and within VIVO-HOME recommendations may result in electrical shock or fire hazard, unsatisfactory performance, or equipment failure.

Know the product's application, limitations, and potential hazards. Read and follow instructions carefully to avoid injury and property damage. Do not disassemble or repair unit unless described in this manual. Failure to follow installation or operation procedures and all applicable codes may result in the following hazards:

DANGER

Risk of death, personal injury, or property damage due to explosion, fire, or electric shock.

- Do not use to pump flammable or explosive fluids such as gasoline, fuel oil, kerosene, etc.
- Do not use in explosive atmospheres or hazardous locations as classified by the NEC, ANSI/ NFPA70.
- Do not handle a pump or pump motor with wet hands or when standing on a wet or damp surface, or in water.
- During operation, do not touch the motor, pipes, or water until the unit is unplugged or electrically disconnected.
- If the power disconnect is out of sight, lock it in the open position and tag it to prevent unintentional startup.

WARNING

Risk of severe injury or death by electrical shock.

- To reduce risk of electrical shock, disconnect power before any maintenance or servicing.
- Ensure the pump is wired for correct voltage.
Be certain that this pump is connected to a circuit equipped with a Ground Fault Circuit Interrupter (GFCI) if required by code.
- Check electrical outlets with a circuit analyzer to ensure power, neutral, and ground wires are properly connected.
- The pump is supplied with grounding-type attachment plug. To reduce risk of electric shock, be certain that it is connected only to a properly grounded grounding-type receptacle. Do not remove the third prong from the plug. The third prong is to ground the pump to help prevent possible electric shock hazard.
- During wire installation, one side of the line going to the pump is always electrically energized, regardless of whether the liquid level control switch is open or closed. To avoid hazards during installation or servicing, install a double-pole disconnect near the pump.
- The flexible jacketed cord assembly mounted to the pump must not be modified in any way, with the exception of shortening the cord to fit into a control panel. Any splice between the pump and the control panel must be made within a junction box and comply with the National Electrical Code.
- Check local electrical and building codes before installation. The installation must be in accordance with their regulations as well as the most recent National Electrical Code (NEC) and the Occupational Safety and Health Act (OSHA).
- Do not use the power cord for lifting the pump.
- Do not use an extension cord.
- The pump should only be used with liquids compatible with pump component materials. If the pump is used with liquids incompatible with the pump components, the liquid can cause failure to the electrical insulation system, resulting in electrical shock.

CAUTION

Risk of bodily injury, electric shock, or equipment damage.

- This equipment must not be used by children or persons with reduced physical, sensory or mental abilities, or lacking in experience and expertise, unless supervised or instructed. Children may not use the equipment, nor may they play with the unit or in the immediate vicinity.
- Equipment can start automatically. Lockout-Tagout before servicing equipment.
- An inoperative or malfunctioning pump could lead to flooding, resulting in personal injury or property damage.
- For safe and proper operation, follow the detailed installation and operating instructions in this manual. Please read the manual carefully before the installation and operation. Be sure to save this manual for future reference.

NOTICE

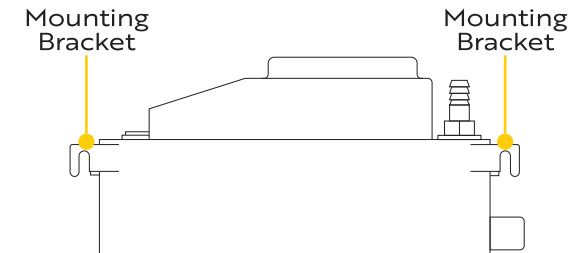
Risk of damage to pump or other equipment.

- Before installing the pump, allow the air conditioner to cycle several times, collecting the condensate in a separate container to help flush any residual oils that may remain in the system. Failure to flush the system may cause damage to the pump and drain line plumbing components.
- When operating in a gas furnace environment, routinely clean or flush the tank with fresh water to maintain the condensate pH above an average of 3.4. This prevents the formation of localized acid pocket, which can create a battery effect and lead to pitting corrosion.
- Support pump and piping when assembling and when installed. Failure to do so may cause piping to break, pump to fail, motor bearing failures, etc.
- Do not install the pump in a manner that will subject it to splashing or spraying.
- Periodically inspect pump and system components, including hoses for wear or damage. Ensure all connections are secure.
- Routine maintenance shall be performed as scheduled and in accordance with the Maintenance Section of this manual.
- Pump is for indoor use only.
- Do not use this pump inside an air plenum.



Physical Installation

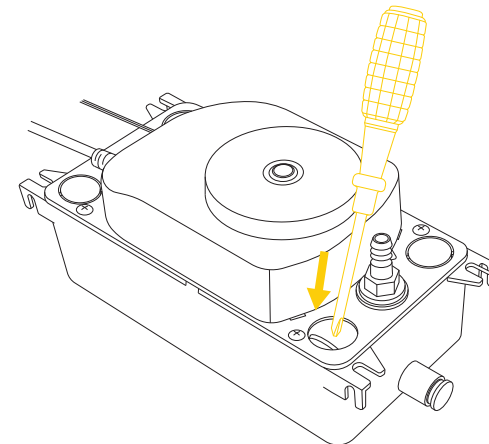
1. Install the pump on a flat, level surface with the inlet below the coil drain, making sure not to block the air vents around the motor housing.
2. The mounting surface must support the weight of the pump and the water filled tank. The pump can also be mounted on a wall using the mounting slots at each end of the tank.



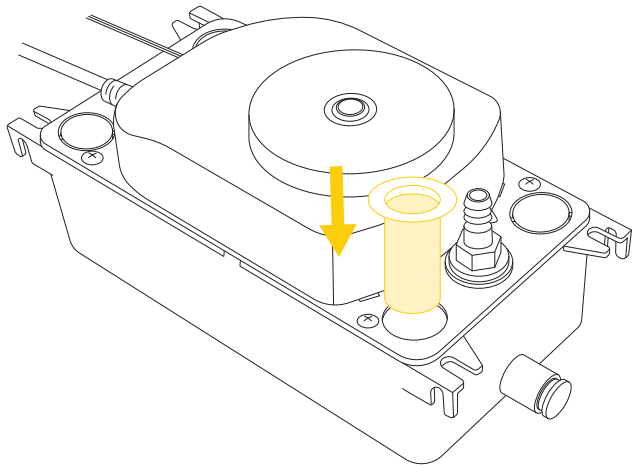
Step 1: Inlet Pipe Installation (Two methods are provided)

Option 1:

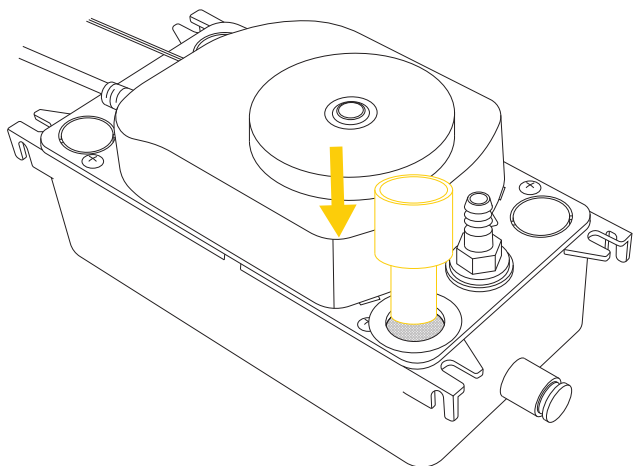
- ① Select one of the four inlet openings (Ø1 in/ Ø25 mm) on the tank cover at the desired location. Knock out the pre-scored tab.



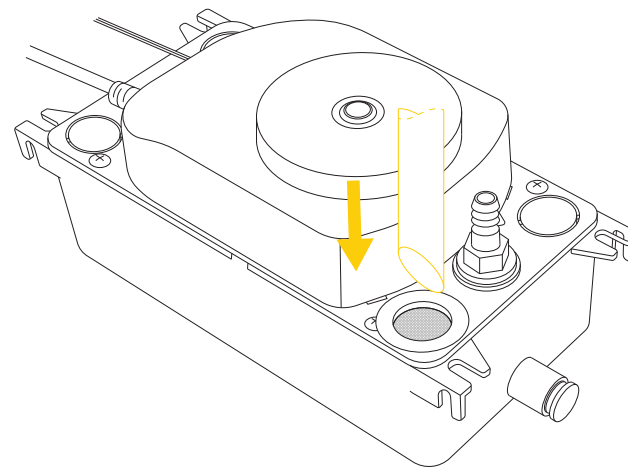
- ② Insert the provided strainer into the selected inlet.



- ③ If the inlet pipe is too large to fit into the strainer, select the appropriate silicone reducer from the two provided (large: Ø1.2 in/ Ø30 mm; small: Ø0.9 in/ Ø23 mm) to match your pipe size.

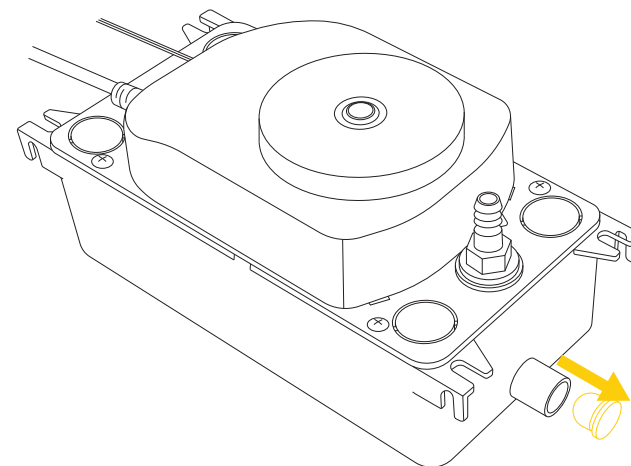


- ④ Cut the end of the drain pipe from the evaporator or furnace drain at a 45° angle to prevent the pipe from sealing flat against the strainer bottom, which can block the outlet.

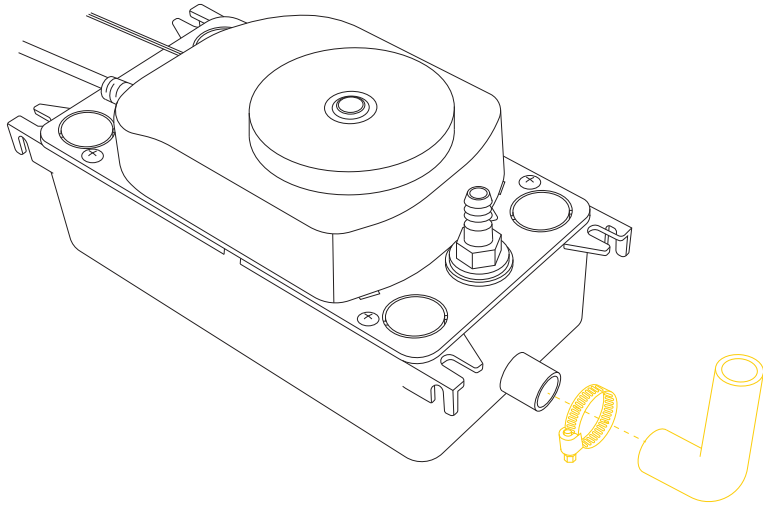


Option 2:

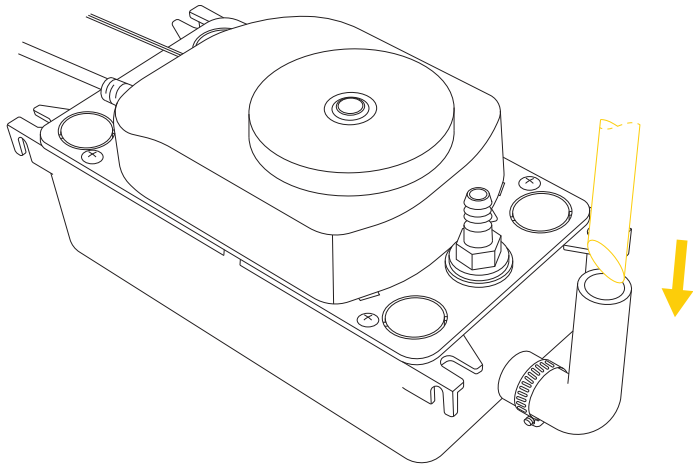
- ① Remove the rubber plug from the side inlet of the tank.



- ② Attach the L-shaped silicone tube to the side inlet (inner diameter: $\text{\O}0.5$ in/ $\text{\O}13$ mm) and secure it with the larger hose clamp (provided).

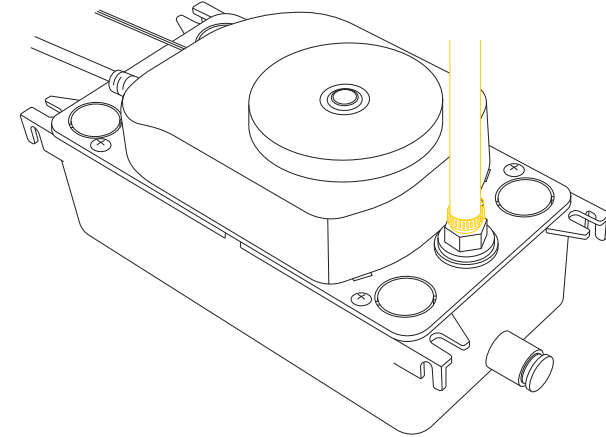


- ③ Cut the end of the drain pipe from the evaporator or furnace drain at a 45° angle to prevent the pipe from sealing flat against the bottom of the silicone tube, which can block the outlet.

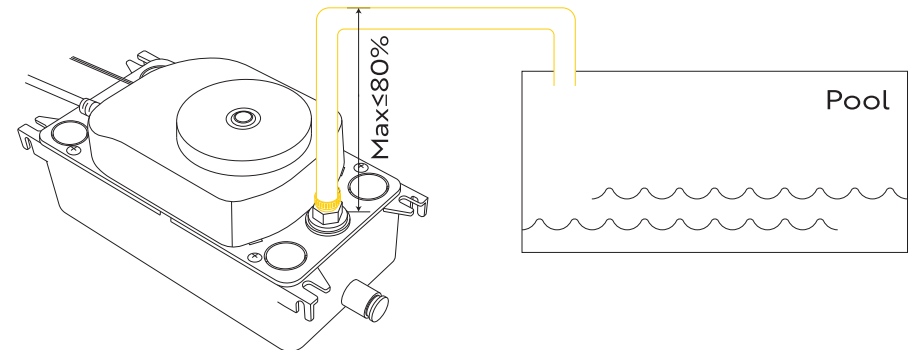


Step 2: Outlet Hose Installation

- ① Connect the outlet hose (provided, inner diameter: $\text{\O}0.4$ in/ $\text{\O}10$ mm) to the outlet check valve (outer diameter: $\text{\O}0.4$ in/ $\text{\O}10$ mm) and secure it with the smaller hose clamp (provided).



- ② Route the outlet hose to the drainage area. The vertical lift shall not exceed 80% of the pump's total head.



Electrical Connections

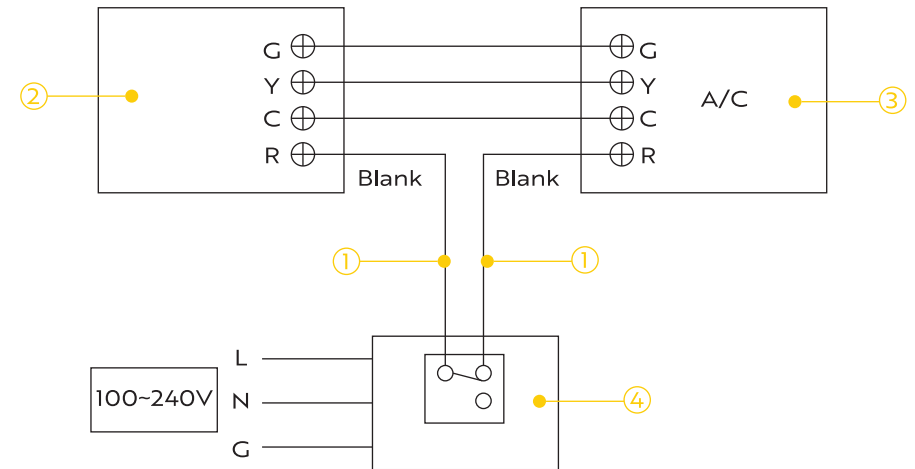
1. Before making any connections, disconnect power at the fuse box or circuit breaker panel. All wiring must comply with local electrical codes.
2. Line Voltage: Connect the power plug to a power supply that matches the rated voltage on the nameplate.
 - The pump must be wired to a dedicated circuit. Do not share a circuit with other appliances, equipment, fans, or any intermittently operated devices.
 - The fuse or circuit breaker must be of adequate capacity.

Safety Switch Connection

⚠ CAUTION

- In applications where pump failure or leakage due to power outage, drain blockage, or any other reason could result in property damage and/ or personal injury, a backup system (e.g. an auxiliary switch) and/ or an alarm device shall be installed and monitored.
- Safety Switch: The overflow safety switch shall be connected to a Class II low-voltage circuit. The switch is factory-wired to the COM and NO terminals. To interrupt the heating/ cooling system, connect the switch leads in series with the low-voltage thermostat circuit. For a typical "NO" circuit connection, refer to the diagram below.

1. Safety Switch Terminals (COM/ NO not distinguished)
2. Thermostat
3. Air Conditioner/ Furnace
4. Condensate Pump

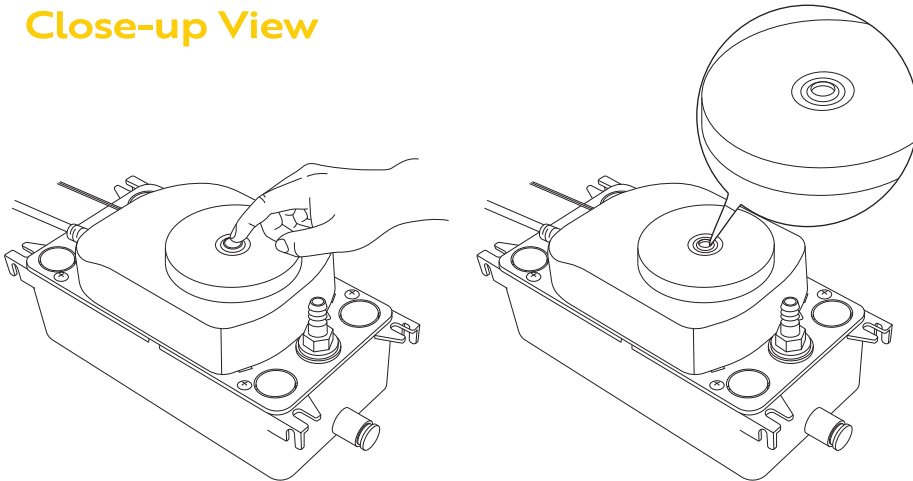




Alarm Switch

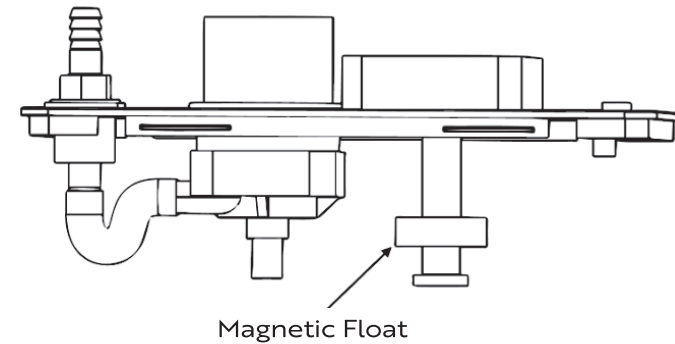
1. To activate the alarm: Press the switch down. When the water level in the tank exceeds the warning level, the unit will sound a buzzer to alert you and help prevent overflow.
2. To deactivate the alarm: Leave the switch in the up (unpressed) position. The alarm function will be off, and no alert will sound if the water level rises above the warning level.
3. If an alarm sounds: Check the unit promptly. Press the switch again to reset it (the button will pop up), which will silence the alarm. After addressing the issue, press the switch down again to reactivate the alarm function.

Close-up View



NOTE

To ensure continuous operation of the alarm function, the Alarm Switch must remain in the depressed (ON) position. Do not deactivate it unless necessary, otherwise the system will fail to provide an alert in case of an abnormal condition.



1. Disconnect the pump from the power supply.
2. Remove the tank cover and the tank assembly, keeping them level.
3. Gently lift the float by hand. The motor will start once the float rises about 1.4 in (35 mm). Continue raising it another 0.2 in (5 mm) to activate the safety switch. The motor will stop when the float returns to the 0.8 in (20 mm) position.
4. Lifting the float to activate the safety switch triggers an intermittent buzzer. Press the button to silence it.
5. Reinstall the motor and cover assembly onto the tank.

This pump is suitable for condensing gas furnaces. To prevent localized corrosion, it is essential to clean or flush the tank regularly with fresh water to ensure the condensate acidity does not fall below an average pH of 3.4.

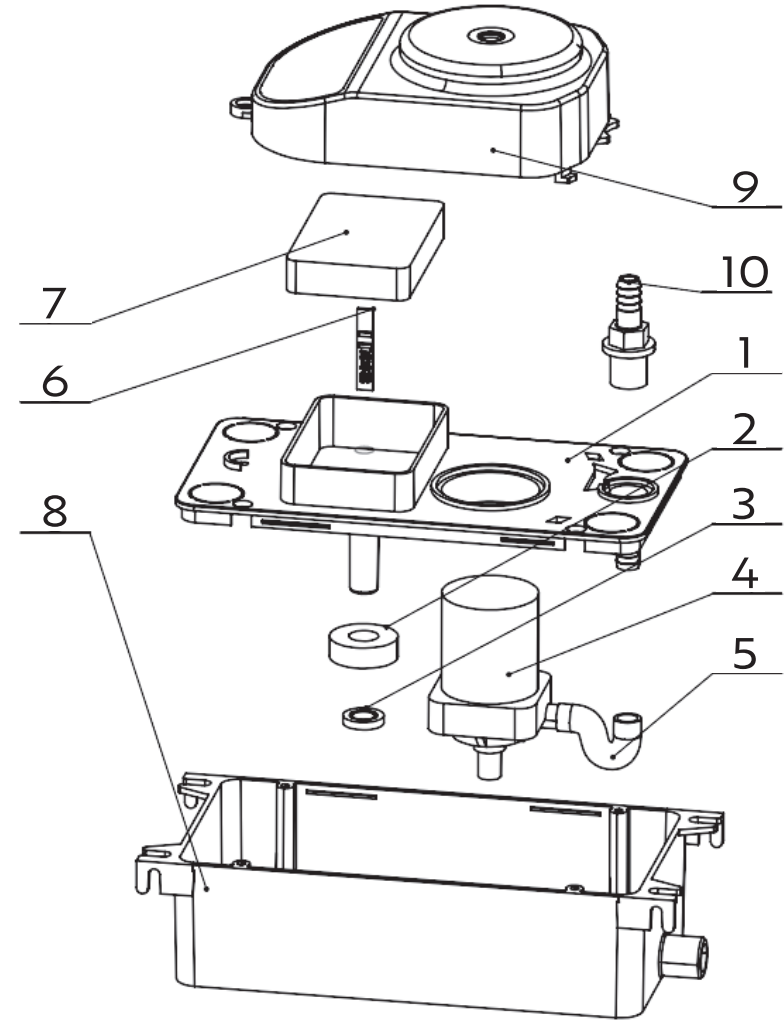


CAUTION

- Do not allow the tank to overflow during this maintenance.
- Inspect and test the condensate drainage system every six months for proper condition and operation (More frequent checks recommended for heavy-use applications).

To inspect and clean the tank and other components, please follow these steps:

1. **Disconnect the pump from the power supply.**
2. **Remove the tank cover.**
 - The tank cover is secured to the tank with screws. Remove all four screws.
 - Insert a flat-head screwdriver into the provided gap between the tank cover and the tank side. Gently pry the cover up and carefully lift it off horizontally, holding it level.
3. **Check the floats:** Ensure all floats move freely. Clean them if necessary.
4. **Clean the check valve:** Remove the check valve and backwash the drain outlet on the volute over a sink.
5. **Clean the tank** with warm water and non-abrasive mild soap.
6. **Rinse the tank** with fresh water to prevent any residual condensate from forming localized acid pocket that could cause pitting corrosion.
7. **Check the piping:** Inspect all inlet and outlet piping. Clean if necessary, and ensure there are no kinks that could inhibit flow.
8. **Check the check valve:** Inspect the check valve and clean it with warm water and non-abrasive mild soap if needed.
9. **Reinstall the cover:** Replace the tank cover assembly.
10. **System test:** Test the system for proper operation.



Item	Name	Qty	Material
1	Tank Cover	1	Flame-retardant ABS
2	Float	1	/
3	Float Base	1	ABS
4	Submersible Pump	1	Flame-retardant ABS
5	Silicone Elbow Hose	1	Silicone
6	Hall Sensor Board	1	/
7	Circuit Board	1	/
8	Tank	1	ABS
9	Cover Housing	1	Flame-retardant ABS
10	Outlet Connector	1	PA66 + Glass Fiber



Problem	Possible Cause	Solution
The pump can't start working	Unlevel installation	Level the tank
	Sludge accumulation inside the tank	Clean the inside of the tank and float
	No power supply	Connect the pump to a proper power supply
Condensate is overflowing from the unit	No power supply	Connect the pump to a proper power supply
	Inflow exceeds pump capacity	Require a higher capacity pump and connect the safety switch to your system
	Unlevel installation	Level the tank
	Excessive discharge head	Lower the drainage outlet head
	Sludge accumulation inside the tank	Clean the inside of the tank and float
The pump runs continuously	Inflow exceeds pump capacity	Require a higher capacity pump
	Sludge accumulation inside the tank	Clean the inside of the tank and float
	Outlet or inlet blockage	Clear all inlet and outlet piping to ensure lines are not kinked or blocked



The VIVOHOME warranty program is our commitment to you. We are committed to providing you with a high-quality product that meets your needs and expectations. To demonstrate our confidence in the durability and performance of our products, we offer the following warranty.

WARRANTY COVERAGE

This warranty applies to all orders, purchases, or use of products sold only by VIVOHOME and is valid for 1 year from the purchase date. Please note, this warranty only covers the original order. If a replacement is provided within the warranty period, it does not extend the warranty.

WARRANTY EXCLUSIONS

This warranty does not cover damages caused by misuse, accidents, unauthorized modifications, or any factors unrelated to product manufacturing and design, including but not limited to:

- Loss of parts during use.
- Normal wear and tear of products or parts.
- Incorrect installation (e.g., using the wrong voltage) or improper assembly.
- Overloading the product's bearing capacity.
- Usage in extremely harsh conditions.
- Improper cleaning or lack of maintenance.
- Damage resulting from unintended use of the product.
- Damage resulting from unauthorized modifications or service.
- Indirect losses or damages related to the product.

HOW TO MAKE A WARRANTY CLAIM

If you encounter any defects affecting the product's functionality or if the product fails and cannot be repaired during the warranty period, please reach out to our customer service team via email, Amazon, or our app's messaging service at your earliest convenience. To expedite your claim, kindly include:

- Order number
- Photos and/or videos illustrating the issue
- A detailed description of the problem

VIVOHOME will provide technical support, replacement, refund, or other solutions based on the issue's specifics. If you wish to return the original package for any reason, please contact us for confirmation before initiating the return. You can expect a response within 48 hours.

Thank you for choosing VIVOHOME. We are dedicated to ensuring your satisfaction and the quality of your purchase. If you have any questions or need further assistance, please don't hesitate to reach out to our customer service team.