

Rheem XE50T10H45U1

Rheem 50 Gallon Smart Hybrid Heat Pump Water Heater (Model XE50T10H45U1) User Manual

Your guide to installation, operation, and maintenance.

1. PRODUCT OVERVIEW

The Rheem ProTerra Hybrid Electric Heat Pump Water Heater is an advanced, high-efficiency appliance designed to provide hot water for households of 3 to 5 people. This 50-gallon model integrates heat pump technology to significantly reduce energy consumption compared to conventional electric water heaters. It features built-in Wi-Fi connectivity, allowing for remote management and monitoring via the EcoNet app.

Key features include:

- **High Efficiency:** Achieves a 3.88 Uniform Energy Factor (UEF), leading to substantial energy cost savings.
- **Smart Control:** Integrated EcoNet Wi-Fi technology for remote hot water management, energy usage tracking, and scheduling.
- **Durable Construction:** Features a glass-lined steel tank, sediment diffusion system, and premium brass drain valve for extended lifespan and easy maintenance.
- **Flexible Installation:** Designed with new top water connections and a duct-ready configuration for simplified setup.



Front view of the Rheem Hybrid Heat Pump Water Heater, illustrating its smart features and energy efficiency, including potential energy cost savings.

2. SAFETY INFORMATION

Read all safety instructions before installing or operating this water heater. Failure to follow these instructions can result in property damage, personal injury, or death.

- **Electrical Connection:** This appliance requires a dedicated electrical circuit and must be wired into your home's electrical system. It is not a plug-in appliance. Installation must be performed by a qualified electrician in accordance with all local and national electrical codes.
- **Water Temperature:** Hot water can cause severe burns. Exercise caution when setting water temperature. Consult the operating instructions for safe temperature settings.
- **Pressure Relief Valve:** Do not block or tamper with the temperature and pressure relief (T&P) valve. This valve is a critical safety device designed to release pressure in the event of excessive temperature or pressure.
- **Ventilation:** Ensure adequate clearance around the unit for proper airflow, especially for the heat pump components. If ducting exhaust air, follow all instructions for proper installation.
- **Leak Detection:** Regularly inspect the area around the water heater for any signs of water leaks. Address leaks immediately to prevent water damage.

3. SETUP AND INSTALLATION

Proper installation is crucial for the safe and efficient operation of your Rheem Hybrid Heat Pump Water Heater. It is highly

recommended that installation be performed by a qualified professional.

3.1 Pre-Installation Checks

- **Location:** Select a location that provides sufficient space for the unit (26"W x 66"H) and allows for proper airflow around the heat pump. Ensure the floor can support the weight of the unit (178 lbs dry, significantly more when full).
- **Electrical Requirements:** Verify that a dedicated 240-volt electrical circuit with appropriate amperage is available.
- **Water Connections:** The unit features new top water connections and side universal water connections for flexible plumbing.
- **Wi-Fi Signal:** Before final placement, use a phone or tablet to check the Wi-Fi signal strength in the intended installation area to ensure optimal EcoNet connectivity.

3.2 Installation Steps (Summary)

1. **Positioning:** Place the water heater on a level surface.
2. **Plumbing:** Connect the cold water inlet and hot water outlet lines. Install the temperature and pressure relief (T&P) valve and route its discharge pipe according to local codes.
3. **Electrical Wiring:** Connect the unit to the dedicated electrical circuit at the easily accessible electrical junction box.
4. **Ducting (Optional):** If desired, duct the colder exhaust air from the heat pump into an attic, another room, or outside your home using the duct-ready design.
5. **Fill Tank:** Slowly fill the tank with water before turning on the power. Open a hot water faucet in your home to allow air to escape.
6. **Power On:** Once the tank is full and all connections are secure, restore power to the unit.



Detailed view of the Rheem Hybrid Heat Pump Water Heater, pointing out features like top and side water connections, EcoNet Wi-Fi, duct-ready design, brass drain valve, and leak detection.

4. OPERATING INSTRUCTIONS

Your Rheem Hybrid Heat Pump Water Heater offers various operating modes and smart features for optimized performance and energy savings.

4.1 Initial Startup and Settings

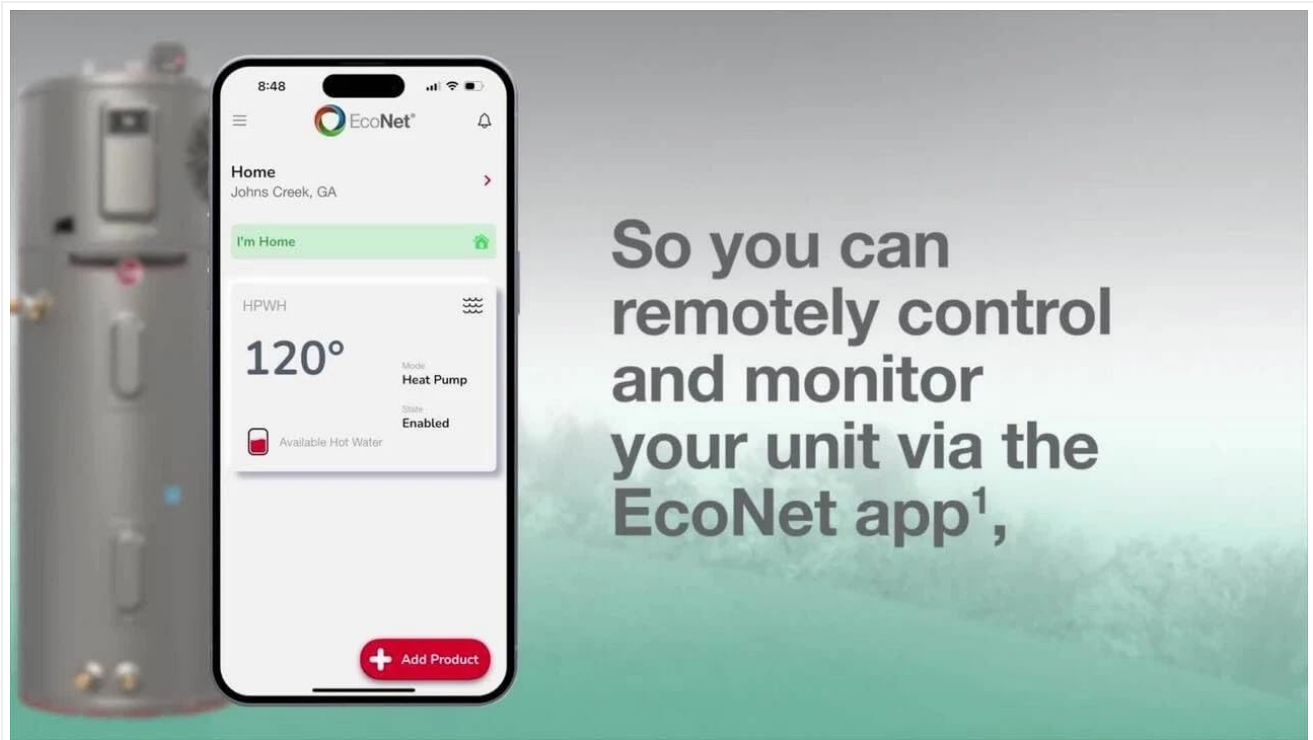
1. **Power On:** After installation and filling the tank, turn on the electrical power to the unit. The digital display will illuminate.
2. **Set Temperature:** Use the controls on the digital display to set your desired water temperature. Refer to the safety section regarding hot water temperatures.
3. **Select Operating Mode:** Choose from available modes such as Efficiency, Performance, or Hybrid, depending on your hot water demand and energy saving preferences.

4.2 EcoNet Wi-Fi Connectivity

The built-in EcoNet Wi-Fi technology allows you to manage your water heater remotely.

1. **Download App:** Download the EcoNet app to your mobile device.
2. **Connect:** Follow the in-app instructions to connect your water heater to your home Wi-Fi network.

3. **Remote Control:** Through the app, you can check hot water availability, track weekly, monthly, and yearly energy usage, manage heating schedules, and adjust operating modes.
4. **Vacation Mode:** Utilize the vacation mode feature via the app or digital display to save energy when you are away from home.



Screenshot of the Rheem EcoNet mobile application interface, showing remote control and monitoring capabilities for the water heater.

5. MAINTENANCE

Regular maintenance ensures the longevity and efficient operation of your water heater.

- **Draining the Tank:** Periodically drain a few gallons of water from the tank using the premium brass drain valve to remove sediment buildup. This helps prolong tank life and maintain efficiency.
- **T&P Valve Test:** Test the temperature and pressure relief valve at least once a year to ensure it is operating correctly. Follow the manufacturer's instructions carefully.
- **Anode Rod Inspection:** Have a qualified professional inspect and replace the anode rod every 3-5 years, or more frequently in areas with hard water. The anode rod protects the tank from corrosion.
- **Clean Air Filter:** The heat pump section may have an air filter that needs periodic cleaning or replacement to ensure optimal heat transfer. Refer to the full manual for specific instructions.
- **External Cleaning:** Keep the exterior of the water heater clean and free from obstructions.

6. TROUBLESHOOTING

This section provides basic troubleshooting steps for common issues. For more complex problems, contact customer support.

6.1 No Hot Water or Insufficient Hot Water

- **Check Power:** Ensure the circuit breaker for the water heater is not tripped.
- **Thermostat Setting:** Verify the temperature setting on the digital display or EcoNet app.
- **Operating Mode:** Confirm the unit is not in a low-demand or vacation mode.
- **Reset:** Some models have a reset button for the high-limit thermostat. Consult the full manual for its location and

procedure.

6.2 Leaks

- **Identify Source:** Determine the exact location of the leak. Common sources include plumbing connections, the T&P valve, or the drain valve.
- **Tighten Connections:** If the leak is from a connection, try gently tightening it. Do not overtighten.
- **T&P Valve:** If the T&P valve is leaking, it may indicate excessive pressure or temperature, or the valve itself may be faulty. Do not attempt to repair; contact a professional.

6.3 Wi-Fi Connectivity Issues

- **Router:** Ensure your Wi-Fi router is powered on and functioning correctly.
- **Signal Strength:** Check the Wi-Fi signal strength near the water heater. Relocate the router or use a Wi-Fi extender if necessary.
- **App:** Ensure the EcoNet app is updated to the latest version.
- **Re-pair:** Follow the EcoNet app instructions to re-pair the device if connection is lost.

7. SPECIFICATIONS

Brand	Rheem
Model Number	XE50T10H45U1
Capacity	50 Gallons
Power Source	Corded Electric
Voltage	240 Volts
Wattage	4500 watts
Product Dimensions (W x H)	26"W x 66"H
Item Weight (Empty)	178 Pounds
Efficiency	Super High Efficiency (3.88 UEF)
Mount Type	Floor
Material Type	Glass-lined Steel
Special Features	Demand Response Ready, Digital Display, Energy Usage Tracking, Glass-Lined Tank, Overheat Protection, Temperature Pressure Relief Valve, Vacation Mode, WiFi
UPC	020352813233

8. WARRANTY INFORMATION

The Rheem 50 Gallon Smart Hybrid Heat Pump Water Heater (Model XE50T10H45U1) comes with a comprehensive warranty:

- **Tank and Parts:** 10-year warranty.
- **In-Home Labor:** 1-year in-home labor warranty.

Please retain your proof of purchase for warranty claims. For full details and terms, refer to the warranty document included with your product or visit the official Rheem website.

9. CUSTOMER SUPPORT

For technical assistance, troubleshooting, or warranty inquiries, please contact Rheem customer support:

- **Phone:** 1-800-866-3307
- **Online:** Visit the official Rheem website for additional resources, FAQs, and contact options.





Close-up of the Rheem ProTerra Hybrid Electric Water Heater packaging, highlighting key features and customer support information.