



Manuals.plus /

› AMPINVT /

› AMPINVT FT-12V2000W Pure Sine Wave Power Inverter Charger User Manual

AMPINVT FT-12V2000W

AMPINVT FT-12V2000W Pure Sine Wave Power Inverter Charger User Manual

Model: FT-12V2000W

1. SETUP

1.1 Unpacking and Inspection

Upon receiving your AMPINVT FT-12V2000W inverter charger, carefully unpack the unit and inspect it for any signs of damage that may have occurred during transit. Ensure all components listed in the packing list are present.

- Verify the inverter unit is free from physical damage.
- Confirm all accessories, such as cables and documentation, are included.

1.2 Physical Dimensions

Understanding the physical dimensions of the inverter is crucial for proper installation and placement.

2KW

weight: 15.5kg

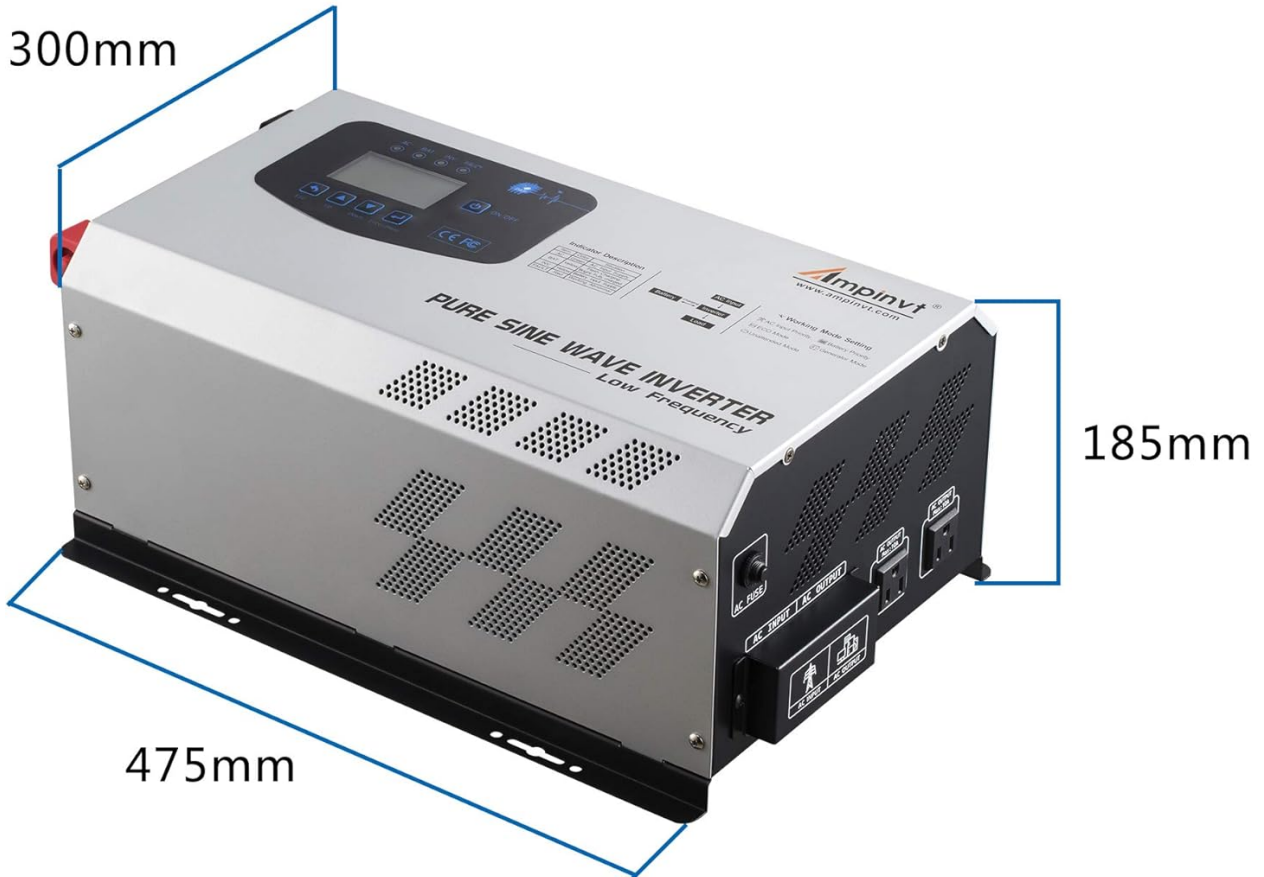


Image 1: The inverter measures approximately 475mm in length, 300mm in width, and 185mm in height. The unit weighs 15.5kg (2KW model).

1.3 Connection Diagram

Follow the connection diagram carefully to ensure correct and safe installation of the inverter charger with your AC input and AC output loads.



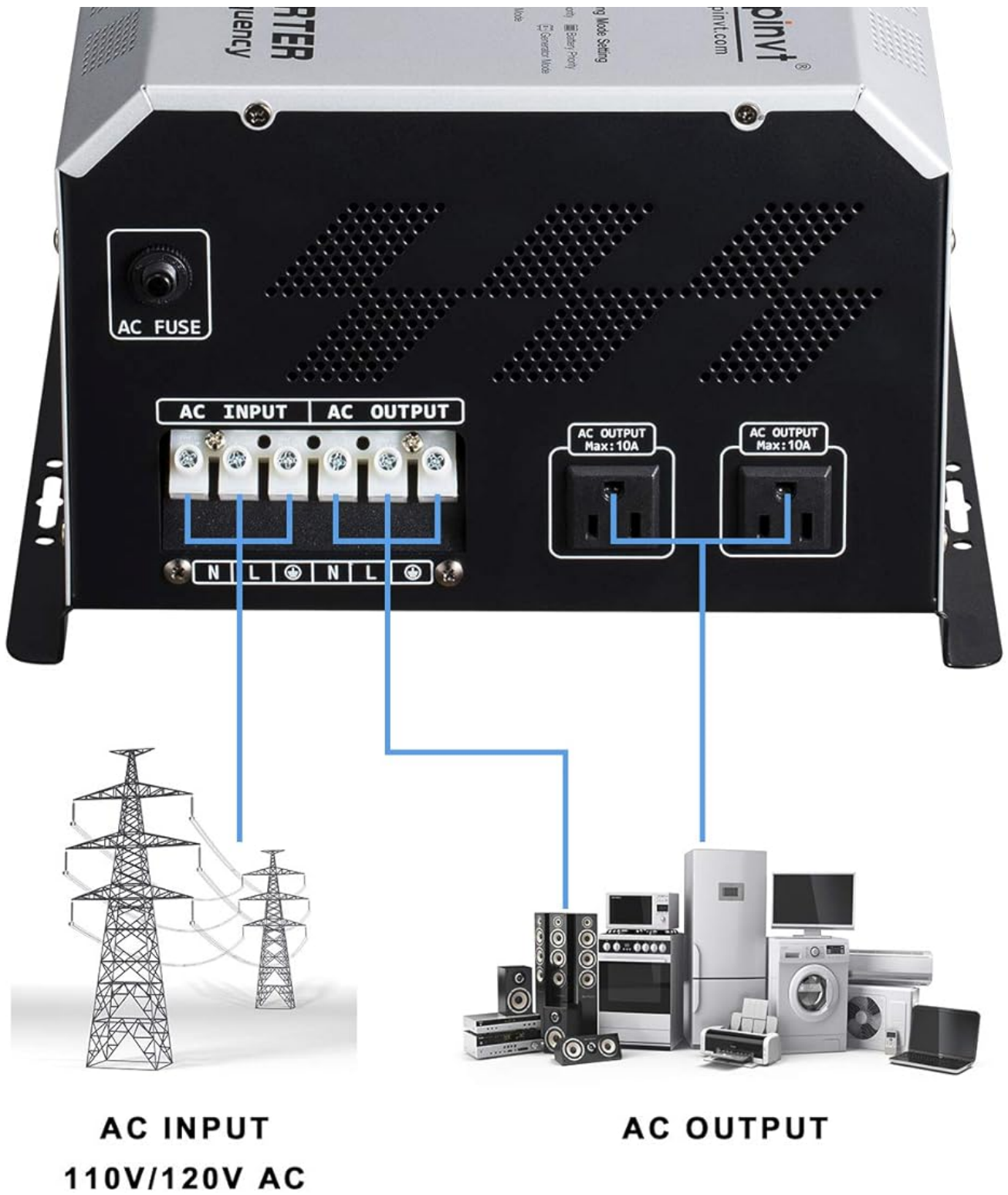
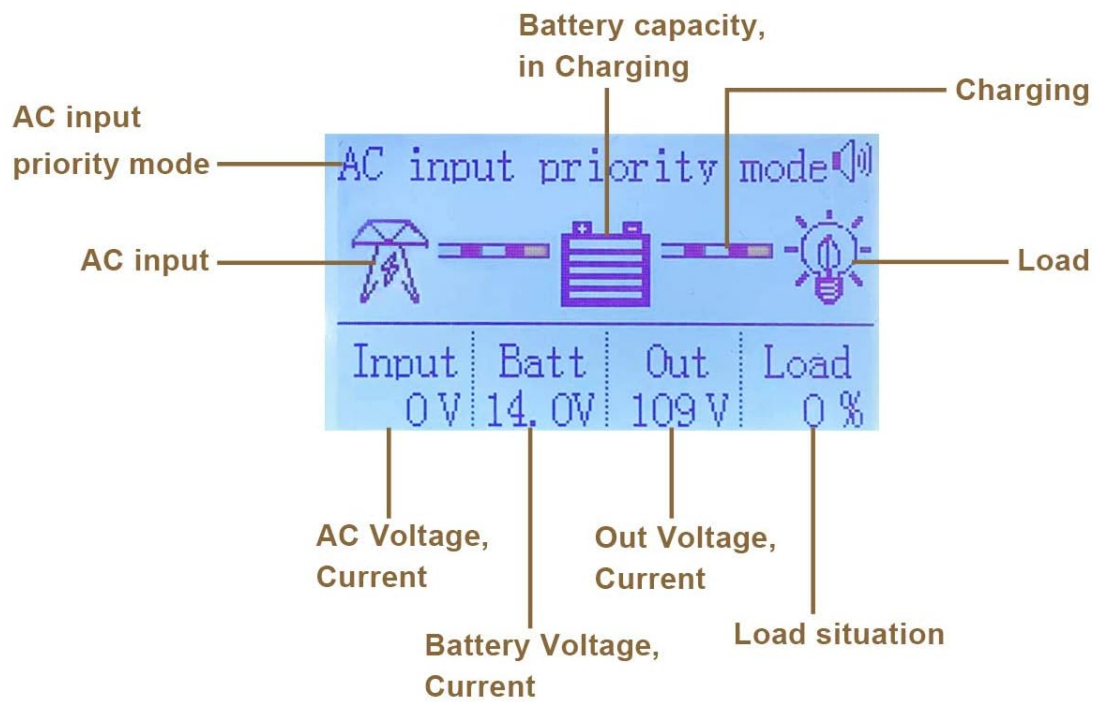


Image 2: This diagram illustrates the AC input (110V/120V AC) connection to the inverter and the AC output connections to various household appliances such as stereos, refrigerators, washing machines, and laptops. The AC input and output terminals are clearly labeled N (Neutral), L (Live), and Ground.

1.4 Battery Connection

Proper battery connection is essential for the inverter's operation. Ensure correct polarity when connecting the battery terminals.

► LCD Display



AC Input parameter	
Voltage:	0 V
Freq:	0Hz
Status:	AC input loss

Battery parameter	
Battery voltage:	14.0V
Battery capacity:	100 %
Charging voltage:	13.8V

Charging current setting	
Rated current:	60%

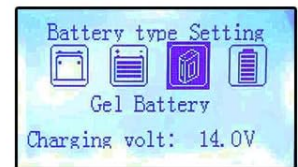
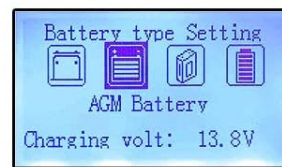
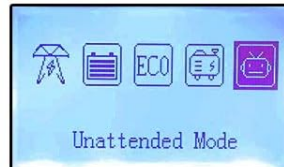
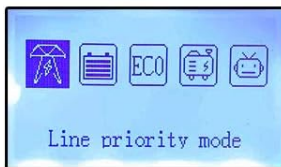


Image 3: The image shows the positive (+) and negative (-) battery terminals on the rear of the inverter, ready for connection to a 12V battery. The battery cables should be securely fastened.

1.5 Remote Panel Connection

The inverter supports an intelligent remote panel for convenient monitoring and control. The remote panel needs to be purchased separately.



Intelligent remote panel connection port



REMOTE SCREEN



Need to purchase separately

Image 4: This image highlights the RS485 intelligent remote panel connection port located on the rear of the inverter. A blue Ethernet-style cable is shown, which is used to connect the remote panel. The remote panel itself measures 17cm x 12cm x 3cm and features an LCD display and control buttons.

2. OPERATING INSTRUCTIONS

2.1 Powering On/Off

To power on the inverter, ensure all connections are secure, then press and hold the 'On/Off' button on the front panel until the display illuminates. To power off, press and hold the 'On/Off' button again until the display turns off.

2.2 LCD Display Overview

The LCD provides real-time status and operational parameters of the inverter charger.



► Status Indicator

Identification	Indicator light name	Status
①	AC	AC Normal
②	Battery	Flash: Charging; long bright: full
③	Inverter	Battery inverter power supply
④	Fault	Warning/work abnormal

- LCD Display——⑤: Detailed display information

Identification	Indicator light name	Function
⑥	Return	Return to the previous interface menu or exit the settings interface (do not save the settings)
⑦	UP	Page turning; switching options; adding settings value
⑧	Down	Page turning; switching options; minus setting values
⑨	Confirm	Press and hold for 5 seconds to enter the setting interface; short press to confirm the saving settings to enter the setting submenu
⑩	Turn On/Off	Turn on and shutdown operation

► UPS switching voltage is adjustable

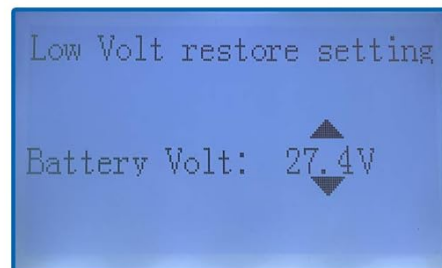
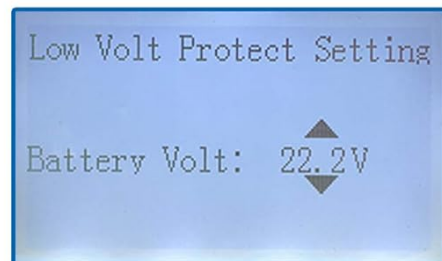


Image 6: This image provides a comprehensive view of the LCD panel, including status indicators and control buttons. The status indicators (AC, BAT, INV, FAULT) show the current operational state. The buttons (ESC, Up, Down, Enter/Menu, On/Off) are used for navigation and setting adjustments. A table describes the function of each button: ESC (Return to previous interface), Up (Page turning, switching options, adding settings value), Down (Page turning, switching options, minus setting values), Enter/Menu (Press and hold for 5 seconds to enter the setting interface, short press to confirm the saving settings), On/Off (Turn on and shutdown operation).

2.3 Working Modes

The inverter supports different working modes to optimize power usage:

- **AC Input Priority Mode:** The inverter primarily uses AC utility power to supply loads and charge batteries. If AC power fails, it switches to battery power.
- **Battery Priority Mode:** The inverter primarily uses battery power. When battery voltage drops below a set threshold, it switches to AC utility power.
- **Unattended Mode (ECO Mode):** This mode conserves energy by shutting down the inverter when the load is very low, and automatically restarting when a significant load is detected.

2.4 Settings Adjustment

To adjust settings, press and hold the 'Enter/Menu' button for 5 seconds. Use the 'Up' and 'Down' buttons to navigate through options and change values. Short press 'Enter/Menu' to confirm and save settings. Press 'ESC' to exit the menu.

2.5 Battery Type Setting

The inverter allows you to select the battery type to ensure optimal charging. Options typically include AGM Battery, Gel Battery, and Flooded Battery. Select the type that matches your connected battery for correct charging voltage and current.

2.6 UPS Switching Voltage Setting

The UPS switching voltage is adjustable, allowing you to set the low volt protect setting and low volt restore setting for your battery. This feature helps protect your battery from over-discharge and ensures reliable power transfer.

2.7 Product Testing Video

Your browser does not support the video tag.

Video 1: This video demonstrates the testing process of the AMPINVT Low Frequency Pure Sine Wave Power Inverter. It shows the inverter being connected to a power source, powered on, and its output voltage being measured with a multimeter, confirming its operational status and output stability.

3. MAINTENANCE

Regular maintenance ensures the longevity and optimal performance of your inverter charger.

- **Cleaning:** Keep the inverter's ventilation openings clear of dust and debris to prevent overheating. Use a dry cloth for cleaning.
- **Connections:** Periodically check all electrical connections (battery, AC input, AC output) for tightness and corrosion. Loose connections can cause overheating and poor performance.
- **Battery Health:** Monitor your battery's health and charge level regularly. Ensure the battery type setting on the inverter matches your battery.
- **Environment:** Ensure the inverter is installed in a cool, dry, and well-ventilated area, away from direct sunlight, moisture, and flammable materials.

4. TROUBLESHOOTING

This section provides solutions to common issues you might encounter with your inverter charger.

Problem	Possible Cause	Solution
Inverter does not turn on	Low battery voltage; Loose battery connections; Blown DC fuse.	Charge battery or check battery voltage; Tighten battery terminals; Replace DC fuse if necessary.
No AC output	Overload; Over-temperature; Battery voltage too low; AC output circuit breaker tripped.	Reduce load; Allow inverter to cool down; Charge battery; Reset AC output circuit breaker.
Charging not working	No AC input; Incorrect battery type setting; Faulty battery.	Check AC input connection; Verify battery type setting; Test battery health.
LCD display is blank or unreadable	Power issue; Display fault.	Check power connections; If problem persists, contact support.

5. SPECIFICATIONS

Detailed technical specifications for the AMPINVT FT-12V2000W inverter charger.

Feature	Value
Brand	AMPINVT
Model Number	FT-12V2000W
Power Source	Battery Powered
Output Power (Continuous)	2000 Watts
Peak Output Power	6000 Watts
Input Voltage	12 Volts DC
Output Voltage	120 Volts AC
Frequency	0.5 Hz (<i>Note: This value appears unusually low and may be a data entry error. Standard AC frequency is 50/60 Hz.</i>)
Total Power Outlets	2
Display Type	LCD
Standby Power Shutoff	90%
Item Weight	40.4 Pounds
Manufacturer	Top One Power

6. WARRANTY AND SUPPORT

For warranty information and technical support, please refer to the official AMPINVT resources. Keep your purchase receipt for warranty claims.

- **Warranty:** This product typically comes with a manufacturer's warranty covering defects in materials and workmanship. Specific terms and duration may vary.
- **Support:** For assistance with setup, operation, troubleshooting, or warranty claims, please visit the AMPINVT Store or contact their customer service.