Quick Start Guide

AXIhycon
5 – 10 H

AXIhycon-EN260218

WARNING:
Please be aware that this is a quick guide. It is absolutely essential to carefully read and follow the complete instructions to ensure proper setup.

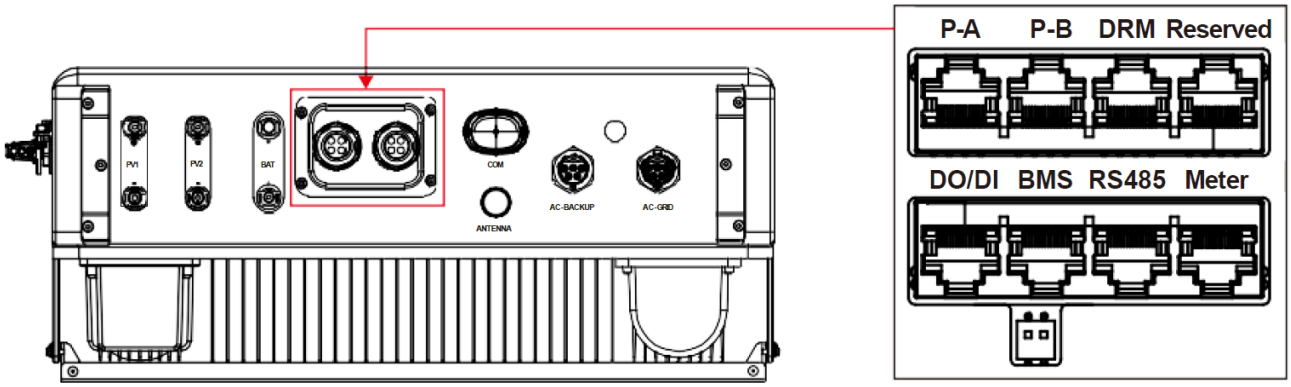
1. PREPARATION FOR STARTUP

- Ensure accessibility to all devices.
- Check the installation and ventilation of the inverter.
- Ensure the top of the inverter is free of obstacles.
- Lay cables in a protected manner.
- Connect the Bluetooth antenna.

2. DOWNLOADING THE APP

1. Search for "AXIcloud" on the Google Play Store or App Store.
2. Scan the QR code to download "AXIcloud."

3. CONNECTORS



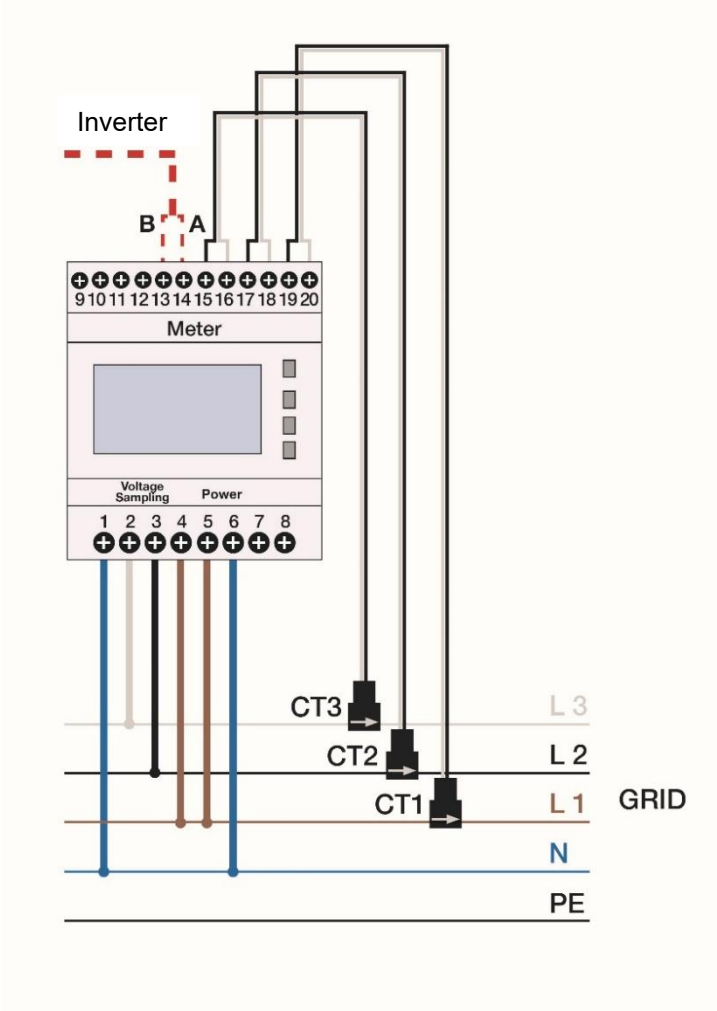
Connector	Function
BMS	Used for CAN communication between inverter and lithium battery BMS.
Meter	Is employed for RS485 communication between the inverter and the smart meter. This is necessary to implement normal hybrid control logic.
RS485	(Optional) Utilized for Modbus RTU communication with external devices or third-party controls.
DRM	(Optional) In the context of implementing demand response or logic interface functions, this feature may be required in the UK and Australia.
P-A/P-B	(Optional) Communication ports for parallel operation (reserved).
DO/DI	(Optional) Connection for potential-free contact (reserved).

- Connect the AC power supply.
- Connect additional communication ports (BMS, meter, RS485, DRM, P-A/P-B, DO/DI) as needed.

4. CONNECTING THE SMART METER

4.1 CHECK WIRING

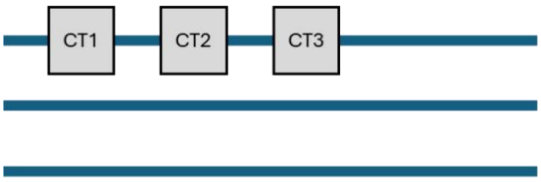
Make sure phase 1 is connected to phase 1 input terminal L1 (4). CT1 must also be connected to phase 1 and connected to the **$S2_1S1$ (19 and 20)** of the meter.
When power is imported into the house (turn off the inverter), the smart meter **shows negative power for all phases**.

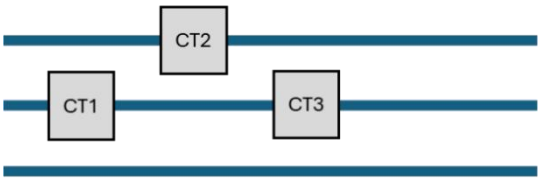


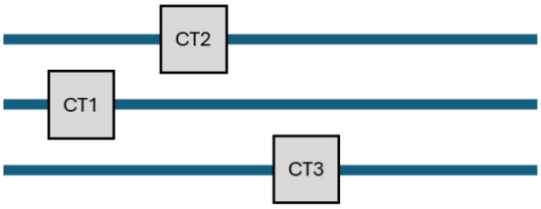
4.2 ATTACH CT-CLAMPS CORRECTLY

Please follow the steps below to attach the CT clamps to the correct phase:

- Switch off the inverter.
- Attach all three CT-clamps to one of the three phases.
- Read the active power (P) on the smart meter. The phase with the greatest negative active power is wired correctly. The other two CT-clamps are connected to the next phase.
- The phase that has already been recognized as correct can now be ignored. The phase of the remaining two with the largest negative active power is wired correctly. Attach the last CT-clamp to the remaining phase.







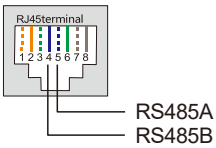
5. CONNECTING AN ENERGY MANAGEMENT SYSTEM (EMS) [OPTIONAL]

CAUTION:
Ensure that the AC cable is completely disconnected from the power source before connecting the smart meter, EMS, and CT clamps.

NOTE:
The pin configuration of the RS485 port follows the EIA/TIA 568B standard.

RS485A is connected to pin 5 with blue/white.

RS485B is connected to pin 4 with blue.



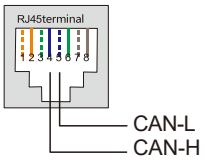
6. CONNECTION OF THE POWER STORAGE SYSTEM

Use the supplied CAN cable to connect one end to the CAN port of the battery and the other end to the BMS port of the inverter.

NOTE:
The pin configuration of the BMS and CAN ports adheres to the EIA/TIA 568B standard.

CAN-H is on pin 4 (blue)

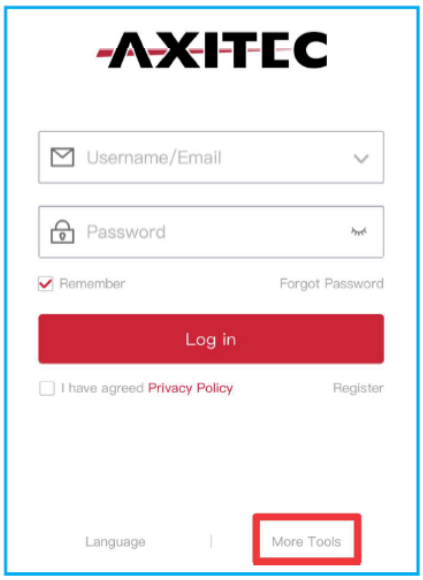
CAN-L is on pin 5 (blue/white).

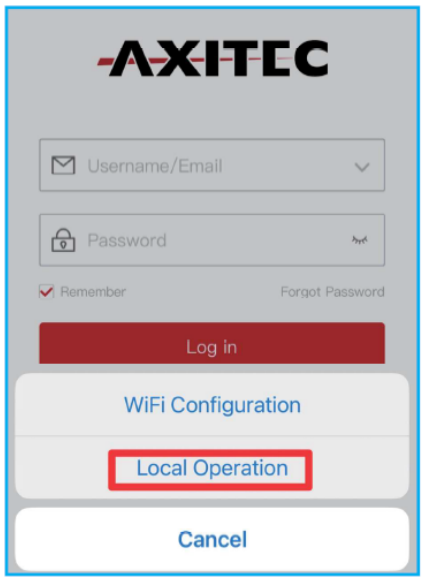


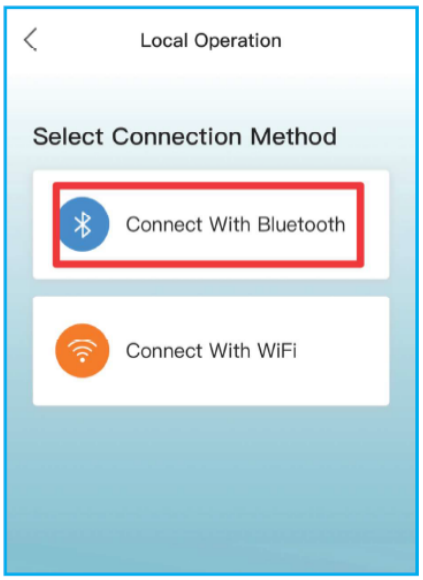
7. CONNECTING THE DC CONNECTIONS

- Check the polarity of the photovoltaic (PV) and battery strings.
- Measure the AC voltage and frequency.
- Connect the photovoltaic and battery power cables to the inverter.

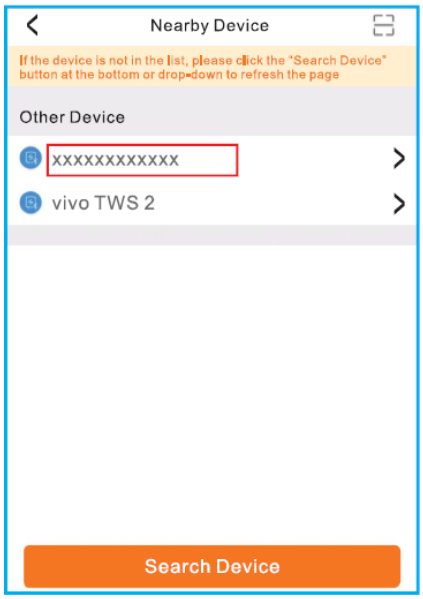
8. INSTALLATION OF THE INVERTER (OFFLINE)

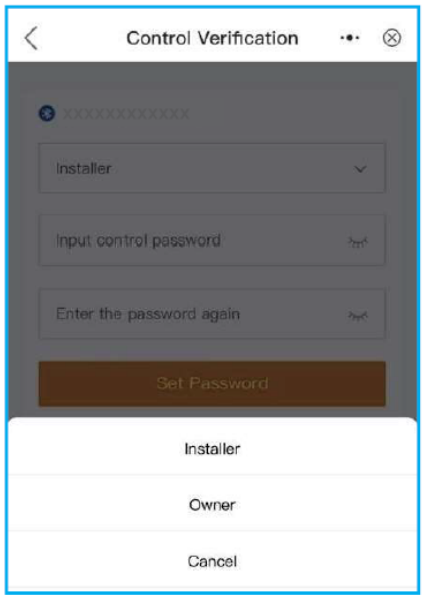


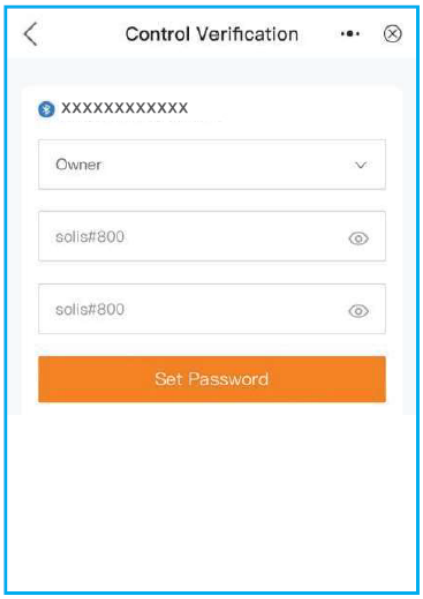


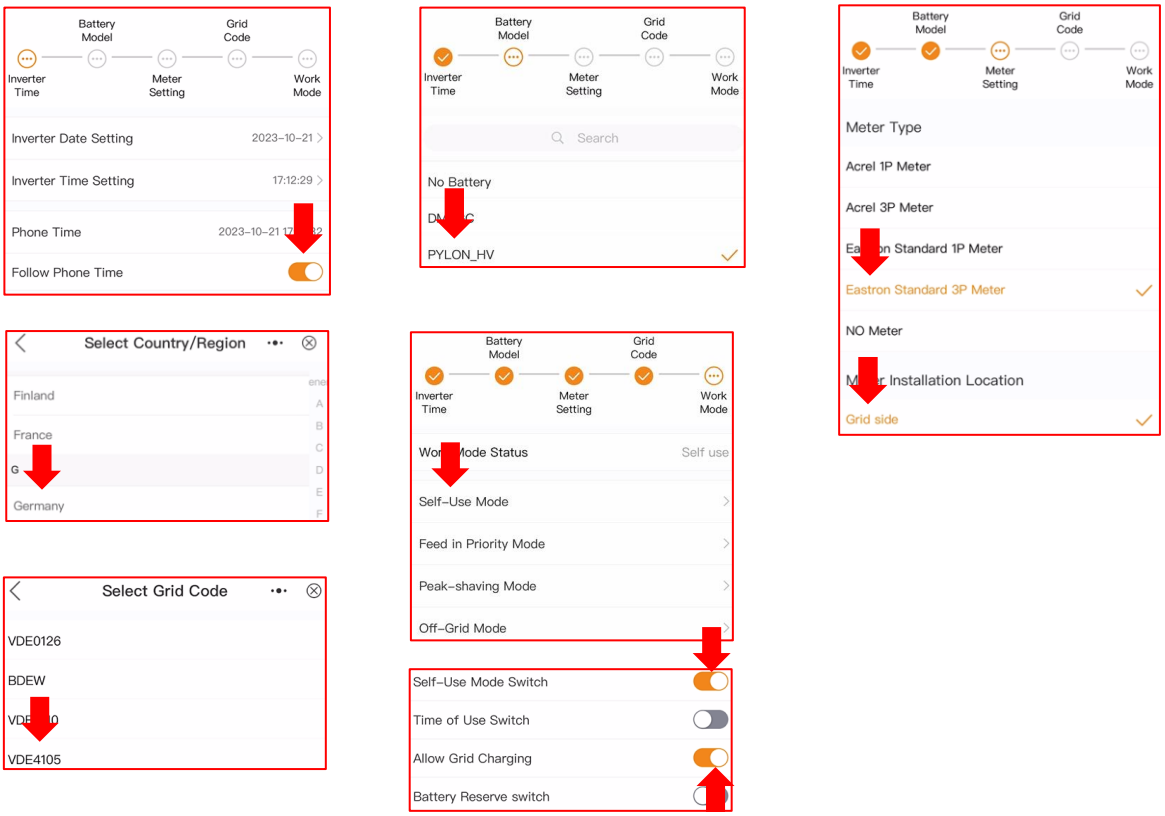


- Connect with the device INV_...
- During the initial setup, you will be prompted to set a password. Please follow the on-screen instructions.









9. INTERNET CONNECTION INVERTER + BATTERY (RECOMMENDED)

9.1 LAN-CONNECTION INVERTER

Step 1: Turn on the external AC switch.
Step 2: Connect the data logger via the COM port.
Step 3: Connect the data logger to the router using an LAN cable.

- All LEDs on the data logger should be lit steadily.

CAUTION:
No other device should be connected to the inverter via USB except for the data logger, as this may cause damage to the inverter.

NOTE:
The red LED indicates that the data logger is powered,
the yellow LED signifies a connection between the data logger and the inverter,
the green LED indicates that the data logger has established a connection to AX-Icloud.

9.2 WIFI-CONNECTION INVERTER

Step 1: Activate the external AC switch.
Step 2: Connect the data logger via the COM port (LEDs should illuminate).

CAUTION:
Es darf kein anderes Gerät außer dem Datenlogger über USB mit dem Wechselrichter verbunden, da sonst Schäden am Wechselrichter entstehen können.

NOTE:
Die Rote LED gibt an, dass der Datenlogger mit Strom versorgt wird, die gelbe LED zeigt an, dass eine Verbindung zwischen Datenlogger und Wechselrichter besteht. Die grüne LED gibt an, dass der Datenlogger eine Verbindung zur AXIcloud aufgebaut hat.

Step 3: Ensure that your mobile phone/laptop does not automatically connect to the home Wi-Fi.
Step 4: Connect to the Wi-Fi of the data logger "D_..." Password: "123456789".
Step 5: Open the browser and enter the IP address: "10.10.100.254".
- Username: "admin", Password: "123456789".

Step 6: Click on "Quick Set," select the home network, enter the home network password, and click on Save.

- All LEDs on the data logger should remain lit continuously.

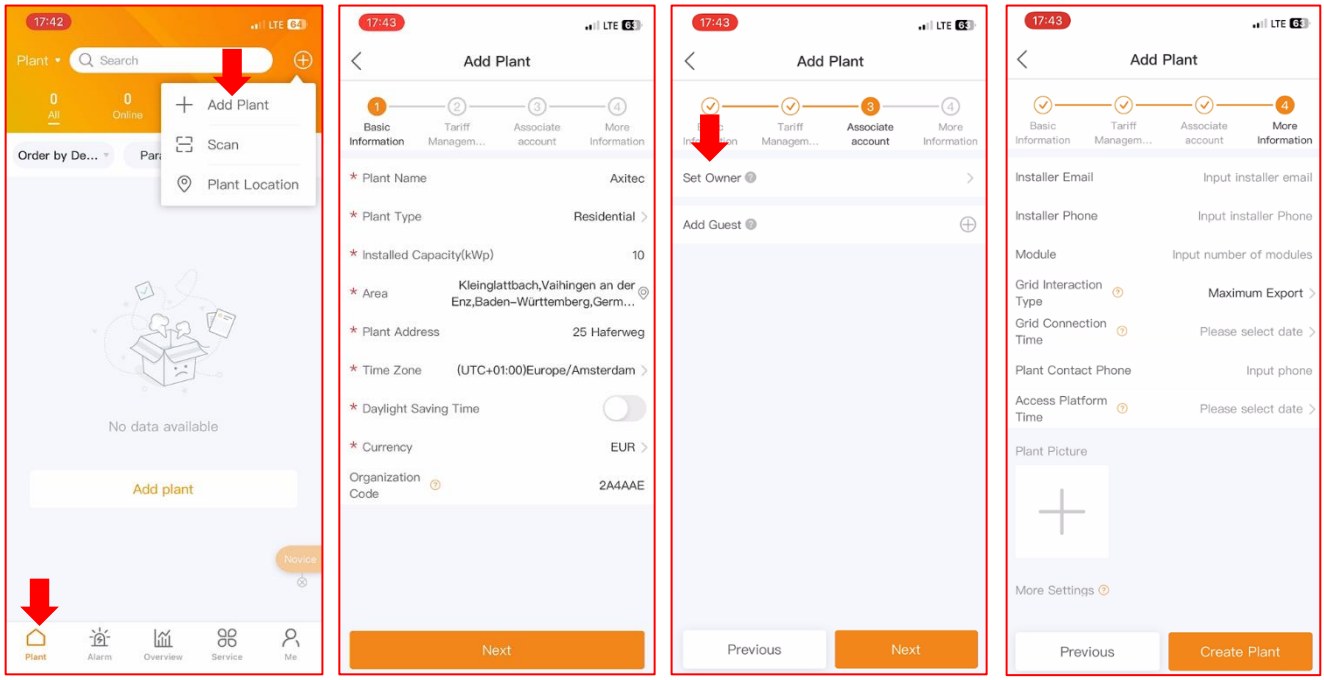
9.3 WIFI-CONNECTION BATTERY

Step 1: Turn on the DC isolator switch.
Step 2: Press the red start button for 5 seconds.
Step 3: Make sure your phone/laptop doesn't automatically connect to the home Wi-Fi.
Step 4: Connect to the batteries Wi-Fi named "AP_...".
Step 5: Open the browser and enter the IP address: "10.10.100.254".
- Username: "admin" Password: "admin".

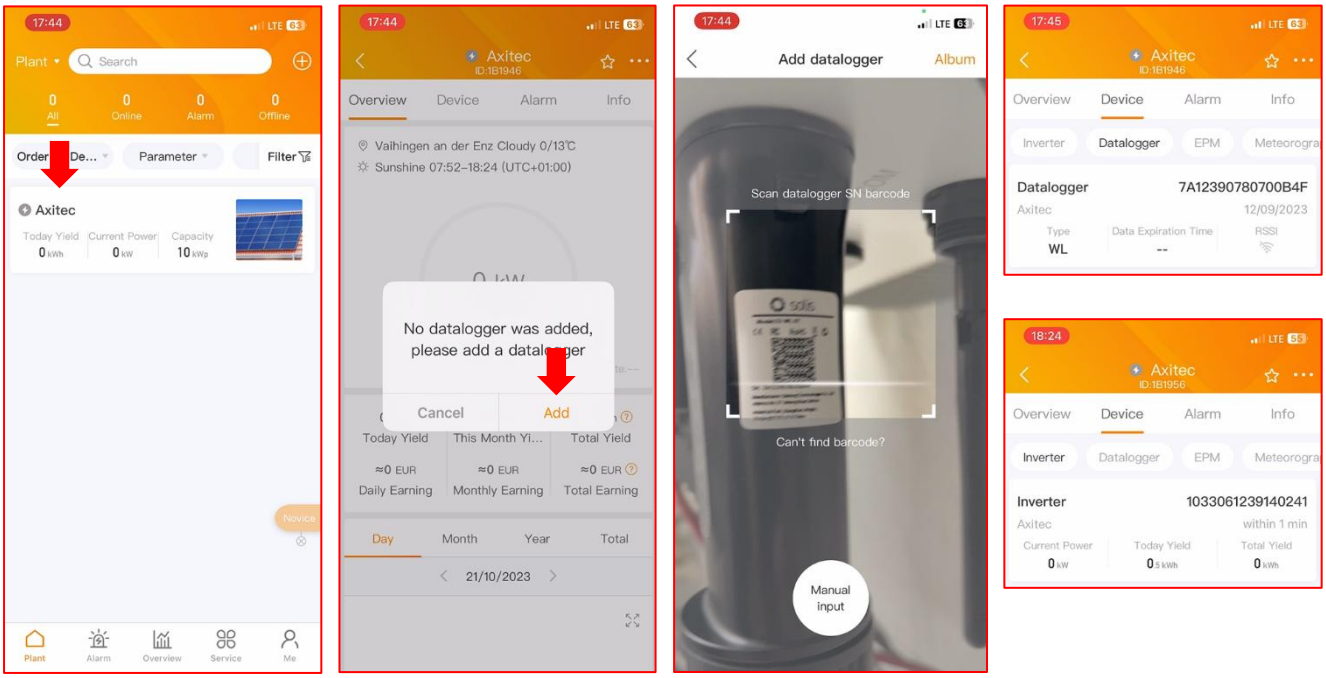
Step 6: Click on "Quick Set", select the home network, enter the home network password, and click Save.
Step 7: For updates, please provide us with the batteries Wi-Fi name (AP_...).

9.4 CREATING PLANT AND ADDING DATA LOGGER

- Log in to the AXIcloud app.
- Fill in all necessary fields.
- **Enter the owner's email address to allow them to monitor their plant.**



- Add the logger.
- The inverter will appear automatically after a short period.



10. TURNING ON THE SYSTEM

Step 1: Turn on the AC breaker at the power connection point.
Step 2: Turn on the DC switch of the inverter.
Step 3: Turn on the battery switch.

11. TURNING OFF THE SYSTEM

Step 1: Turn off the AC breaker at the power connection point.
Step 2: Turn off the battery switch.
Step 3: Turn off the DC switch of the inverter.
Step 4: Wait until the device is powered off, and the system shutdown is complete.

In case of discrepancies in this user manual, please refer to the actual products.
If you encounter any issues with the inverter, please identify the inverter's serial number (S/N) and contact us.
We will strive to respond to your inquiry as quickly as possible.

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