

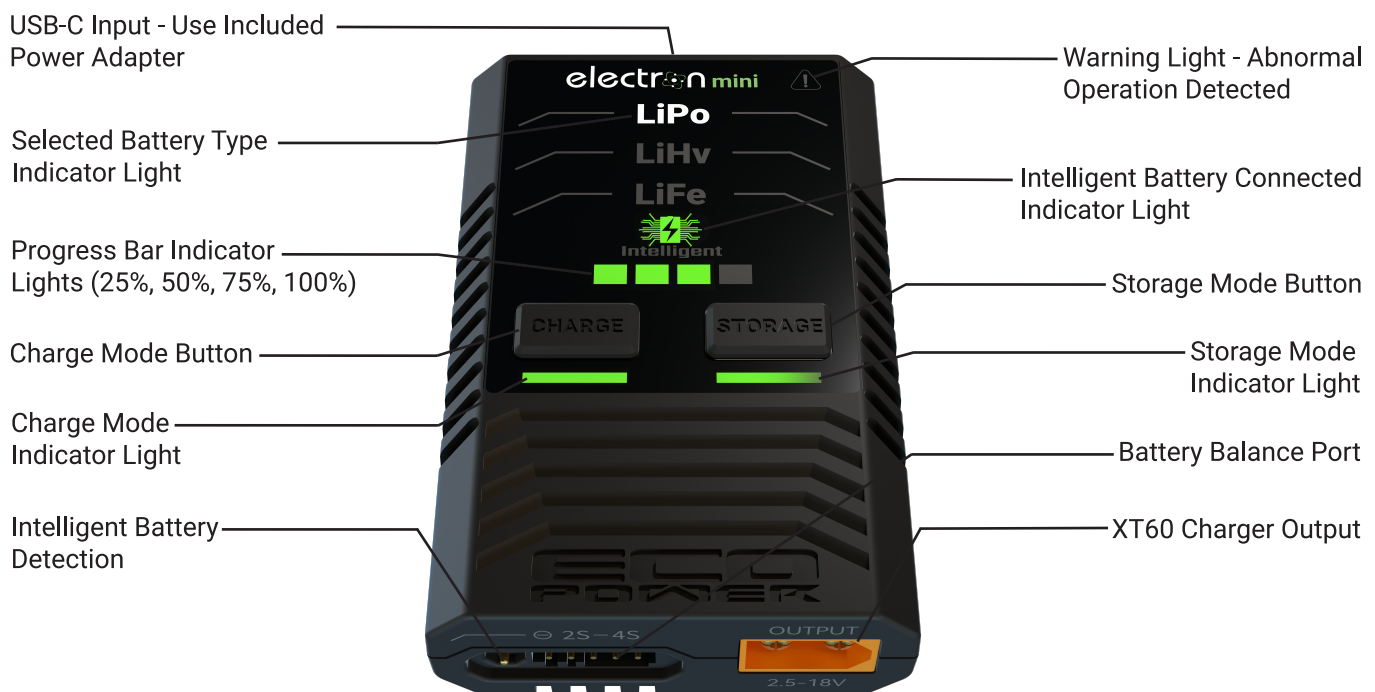


Battery Charger Instruction Manual

Safe Operation Notice

- When using this product for the first time, please read the following safety instructions, and adhere strictly to the manual instructions to ensure safety. Improper operation may cause serious injury to the user.
- Do not use the charger unattended. If there is any abnormality, remove from power immediately.
- Keep the charger away from humid environments and heat sources during use. Please pay attention to ventilation and heat dissipation, and keep away from flammable items.
- Before use, please make sure that the battery and charger are not damaged. Do not use in case of damage.
- Do not put metal objects in the charger or battery, this will lead to equipment damage or injury to the user.
- This product is not a toy and should not be used by children.
- After use, disconnect the input power as soon as possible and remove the battery.
- Do not attempt to charge non-rechargeable dry batteries.
- Do not disassemble the battery or charger. Please contact the manufacturer if the device is damaged.

Charger Overview



Charger Specifications

| | |
|--|--|
| Max. Charge Power: 60W | Input Port: QC/PD/BC1.2/Type-C V1.4/SDP/CDP Apple 5V/2.4A (Does not support 5V/1A Adapter Input) |
| Charge Current: 1-5A, Max. 5A (Auto Adjusting) | Output Reverse Connection Protection & Alarm: Yes |
| Max. Storage Power: 3W Discharge, 60W Charge | Balance Port Reverse Connection Protection & Alarm: Yes |
| Input Voltage: 5~20V | Supported Battery Types: LiPo/LiHv/LiFe (2~4S) |
| Output Voltage: DC 2.5~18V | Working Temperature: 0~40°C (32~104°F) |
| Max. Input Current: DC 3A | Storage Temperature: -20~60°C (-4~140°F) |
| Balance Current: 0.4A/Cell X2 | Charger Dimensions: 85 x 55 x 21mm (3.35 x 2.16 x 0.83 inches) |
| Abnormal Battery Voltage Alarm: Yes | Net Weight: Approximately 64g (0.14 pounds) |

Instructions

The EcoPower Electron Mini USB Charger is an Intelligent charger designed for EcoPower Intelligent batteries, but it is also compatible with non-Intelligent batteries. When an EcoPower Intelligent battery is connected to the charger, the charger will automatically identify the correct battery type, voltage, and charging current recommended by EcoPower, and then the charger will automatically begin working according to the preset parameters. For non-Intelligent batteries, it is necessary to select the battery type and the mode to get started. The charger then intelligently adjusts the charge current to charge at 1C or less by analyzing the charging curve of the non-Intelligent battery.

1. When the charger is connected to the power supply, there is a power-on tone and all the LED lights will light up in sequence for about 0.5 seconds for each light. The LiPo battery type will be selected as default.
2. In the idle state, short-press the CHARGE or STORAGE button to select the battery type. If an Intelligent battery is connected, pressing the button will not change the battery type.
3. When an Intelligent battery is connected, the charger will automatically recognize the battery information and automatically enter the Intelligent charging mode after 5 seconds, but the battery must be successfully connected to the charger through the XT60 Output and the Intelligent Balance Port. If you short-press any button within 5 seconds, it will cancel the automatic charging. If you still want to enter the charging or storage mode after canceling the Intelligent charging, you must press and hold the corresponding function button for 2 seconds.
4. When charging a non-Intelligent battery, first select the battery type by short-pressing any button until the correct battery type is selected and then press and hold the CHARGE button for 2 seconds to begin charging, but the battery must be successfully connected to the charger through the XT60 Output and the Balance Port. After successfully entering the charging mode, the charger will beep, and the Charge Mode Indicator Light will flash at a frequency of 1Hz. The charger will intelligently adjust the charging current according to the battery voltage fluctuation. During the charging process, the Progress Bar Indicator will display the real-time battery status. The charger will beep when the battery is fully charged, and the Charge Mode Indicator Light will remain on.
5. When using the STORAGE mode on a non-Intelligent battery, first select the battery type by short-pressing any button until the correct battery type is selected and then press and hold the STORAGE button for 2 seconds to begin, but the battery must be successfully connected to the charger through the XT60 Output and the Balance Port. After successfully entering the storage mode, the charger will beep, and the Storage Mode Indicator Light will flash at a frequency of 1Hz. The Progress Bar Indicator will display the real-time battery status during the storage process. When the storage process is complete, the charger will beep, and the Storage Mode Indicator Light will remain on.
6. To cancel charging or storage, press and hold the CHARGE or STORAGE button for 2 seconds. After the cancellation is successful, the charger will beep and return to the idle state. The Progress Bar Indicator, the Charge Mode Indicator, and the Storage Mode Indicator Lights will turn off.

Troubleshooting

When the charger fails, the charger will beep, the red Warning Light in the upper right corner of the charger will turn on, and the Progress Bar Indicator will flash. The Progress Bar Indicator Lights will display different combinations corresponding to different faults shown in the following table. Short-press the CHARGE or STORAGE button to clear the alert. If the warning sign persists, please disconnect the battery from the charger.

| FAULT DISPLAY | FAULT DESCRIPTION |
|--|---|
| 25% Light Flashing (First Light from the Left Flashing) | Charging connector or Balance connector is reversed |
| 50% Light Flashing (Second Light from the Left Flashing) | After charger starts Charging or Storage, the connection is interrupted - Charging connector or Balance Port is off |
| 75% Light Flashing (Third Light from the Left Flashing) | After charger starts Charging or Storage, the charger has enabled over-temperature protection |
| 100% Light Flashing (Fourth Light from the Left Flashing) | After charger starts Charging or Storage, the power supply voltage is abnormal or unstable |
| 25%+50% Lights Flashing (First & Second Lights from the Left Flashing) | After charger starts Charging or Storage, there is a large voltage difference between cells or severely low voltage |
| 50%+75% Lights Flashing (Third & Fourth Lights from the Left Flashing) | After charger starts Charging or Storage, the wrong battery type is selected or voltage exceeds expectations |



For Product Support
Call Us: 1-800-705-2215

CPSIA:

NOT FOR CHILDREN UNDER 14 YEARS. THIS IS NOT A TOY.

WARNING: Cancer & Reproductive Harm. www.P65Warnings.ca.gov