

BOOANT

Product Specification Sheet

HIGH-PERFORMANCE E-BIKE BATTERY PACK

48V 30Ah Premium Lithium-Ion PVC Series

48V

NOMINAL VOLTAGE

30Ah

RATED CAPACITY

Smart BMS

BLUETOOTH CONTROL

01 / PRODUCT OVERVIEW

Ultra-High Capacity Power Engineering

Engineered for demanding e-mobility configurations, the BOOANT 48V 30Ah lithium-ion battery package utilizes ultra-premium Samsung 21700 cells combined with high-grade blue PVC insulation film wrapping. This custom form factor optimizes thermal dissipation and volume efficiency by discarding bulk metal casings, delivering unprecedented energy density for top-tier DIY conversion projects and high-wattage e-bikes.

- **Premium Samsung 21700 - 50G Core**

Configured with genuine high-performance 21700 power cells, offering a prolonged lifecycle and superior sustained discharge rates.

- **Advanced Space-Saving Layout**

Industrial-grade PVC heat-shrink wrapping provides lightweight, dense packing, fitting seamlessly into various custom frame configurations.

- **Heavy-Duty 10AWG Wiring**

Standardized with ultra-low resistance 10AWG high-temperature silicone discharge cables to sustain heavy current without voltage drops.



02 / BATTERY MANAGEMENT SYSTEM

Next-Gen JBD Bluetooth Smart BMS

At the heart of the BOOANT 48V 30Ah battery system is an integrated JBD Smart Battery Management System (BMS). Supporting a 50A continuous discharge current capability, this safety architecture monitors, regulates, and secures every cell row against multiple hazard scenarios in real time.

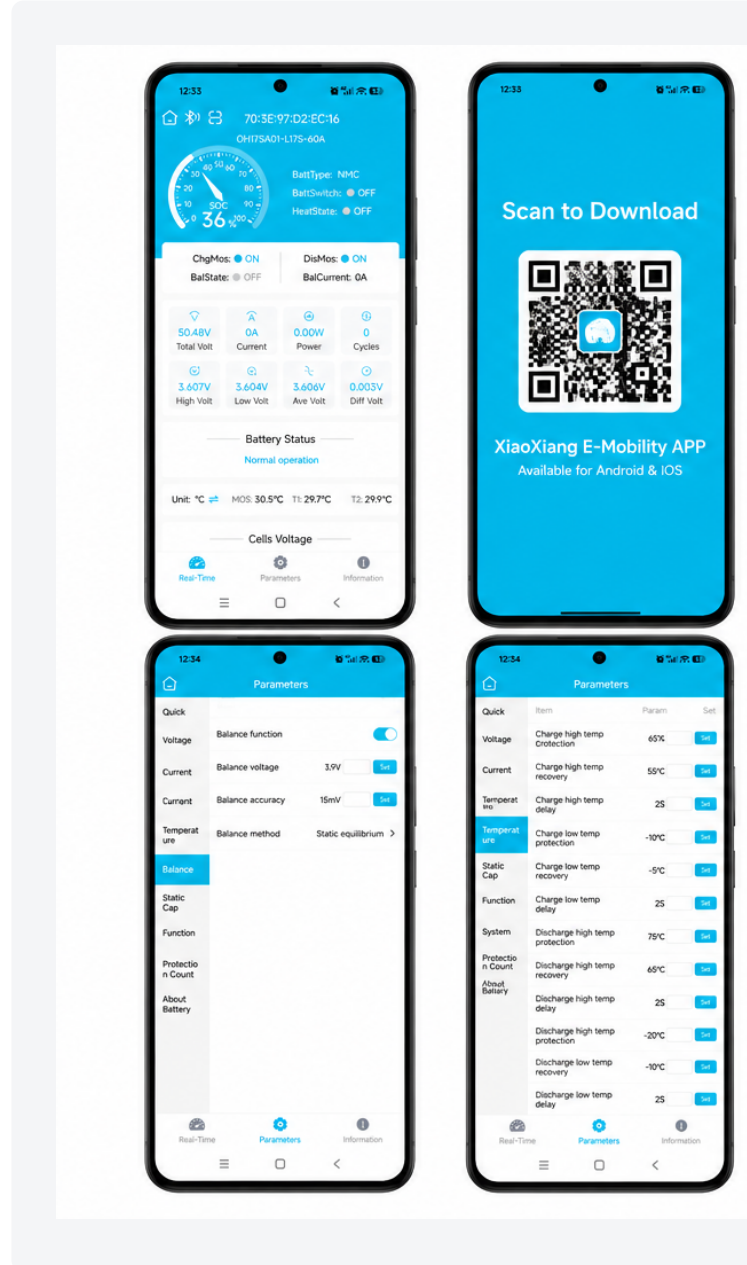


03 / APP INTEGRATION

XiaoXiang E-Mobility Ecosystem

The embedded Bluetooth module unlocks direct pairing with Android and iOS smartphones via the authorized XiaoXiang E-Mobility App. Users get detailed live parameter tracking, system profiling, and safety adjustment control panels.

- **Real-Time Metric Dashboard**
Monitor exact State of Charge (SOC) percentage, aggregate voltage, operating current, real-time power wattage, and localized temperatures.
- **Individual Cell Row Supervision**
Track precise individual voltages for the 13S configuration down to millivolt thresholds, highlighting any internal imbalances immediately.
- **Advanced Parameter Fine-Tuning**
Read and calibrate precise charging cutoff values, low-voltage thresholds, and review historical cycle counters safely.

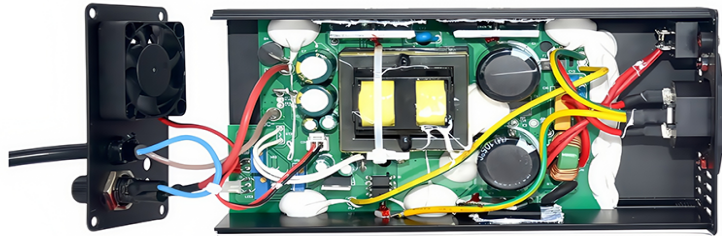
**Scan to Download**

XiaoXiang E-Mobility application. Fully compatible with all iOS and Android smartphone ecosystems.

04 / DEDICATED CHARGING SYSTEM

Pro-Grade Aluminum Smart Charger

Every BOOANT kit is matched with a heavy-duty, aluminum-cased smart fast charger. Operating on a CC/CV (Constant Current / Constant Voltage) optimized algorithm, the internal engineering protects against cellular stress while filling the 30Ah reservoir securely.



05 / TECHNICAL SPECIFICATIONS

Comprehensive Data Matrix

The complete electrical and mechanical design parameters for the BOOANT 48V 30Ah PVC series lithium battery pack are detailed below.

Nominal Voltage	48V
Rated Capacity	30Ah
Cell Configuration	13S6P (Samsung 21700 Base Cells)
Continuous Discharge Current	50A
Peak Discharge Current	150A
Discharge Cut-off Voltage	39V
Charge Voltage Target	54.6V (CC/CV Profile)
Standard Charge Current	5A Maximum

MECHANICAL & ENVIRONMENTAL PARAMETERS

Outer Enclosure Wrapping	Industrial High-Density Insulated PVC Film Wrap
Discharge Port Harness	10AWG High-Temperature Flexible Silicone Wire
Standard Connector Terminal	XT60 / XT90 Fitted Female Options
Smart Bluetooth Integration	JBD Bluetooth Transceiver (XiaoXiang App compatible)
Operating Charge Temperature	0°C to 45°C
Operating Discharge Temperature	-20°C to 60°C
Design Lifecycle Range	≥ 800-1000 Cycles (Retention ≥ 80% Initial Value)



OFFICIAL STOREFRONT

www.booant.com

PRODUCT LINK REFERENCE

<https://booant.com/products/48v-30ah-ebike-battery-pvc>

SUPPORT & ENGINEERING QUERIES

support@booant.com

Disclaimer: Lithium-ion battery packs require precise handling, correct chargers, and professional management. Ensure proper safety clearance, shock isolation, and water exposure barriers when mounting your custom BOOANT PVC-wrapped unit onto any e-mobility framework.

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