



14.8V 50Ah BLUETOOTH

Lithium Iron
Phosphate
Battery
(LiFePO₄)

Item# 1450BT

USER MANUAL

Thank You!



Millertech[®]
— PERFORMANCE LITHIUM BATTERIES

For your business, your trust, and
confidence in Millertech®.

*IT IS OUR PLEASURE
TO SERVE YOU!*



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14.8V 50Ah Battery

SPORT SERIES

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Battery Specifications

Specifications

Capacity	50Ah
Energy Storage	740Wh
Nominal Voltage	14.8V
Float Voltage	N/A
Self Discharge Rate	< 4% / MONTH
Torque Setting	N/A
Dimensions (LxWxH)	6.25in x 4.25in x 5.125in

Charging

Max Charge Voltage	16.8V
Max Charge Current	10A
Recommended Current	5A
Charge Temperature Range	32-150°F
Recommended Cv	15 MIN

Discharging

Max Continuous Discharge Current	20A
Discharge Current 5s	30A
Discharge Temp. Range	-4-140°F
Discharge Cut Off Voltage	10.8V

Product Overview



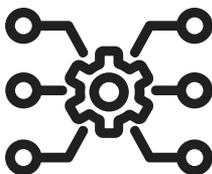
WHAT'S INCLUDED

- 1 — 14.8V 50Ah LiFePO₄ Millertech® Battery

COMPATIBLE WITH
16.8V 5A Lithium
Charger For Marine
Shuttle Battery
Item #1685A
(Sold Separately)



Charging Parameters



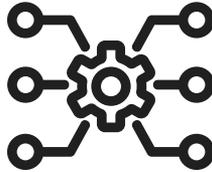
I TEMPERATURE COMPENSATION

Temperature compensation is not needed with our batteries and in some cases, may trigger the built-in BMS to go into protect mode. For this reason we recommend that temperature compensation be shut off or set to 0.

I LOW BATTERY DISCONNECT/SHUT DOWN

If an individual cell falls below 3V/12V during discharge, the battery will shut off the output current. At this time there will be only 1 or 2V present at the terminals. When this happens a standard lead acid battery charger will not be able to recognize the battery and will not start the charging process. For this reason we highly recommend using an approved LiFePO₄ lithium battery charger.

BMS Basic Features



All Millertech® batteries come with a built-in Battery Management System (BMS) that protects the cells for long-term cycling. The BMS protects against the following conditions.

■ HIGH VOLTAGE: >16.8V or 4.2V per cell

If an individual cell voltage exceeds 4.2V during charging, the BMS will prevent a charge current from continuing. Discharge is always allowed under this condition.

■ LOW VOLTAGE: <12V or 3V per cell

If an individual cell falls below 3V during discharge, the BMS will prevent further discharge. Although the battery is in “low-voltage disconnect” mode, it will still allow a charging current.

■ HIGH TEMPERATURE: >150°F

The BMS will not allow a charging current or discharging current.

■ LOW TEMPERATURE: <24°F

The BMS will not allow a charging current.

■ HIGH CURRENT

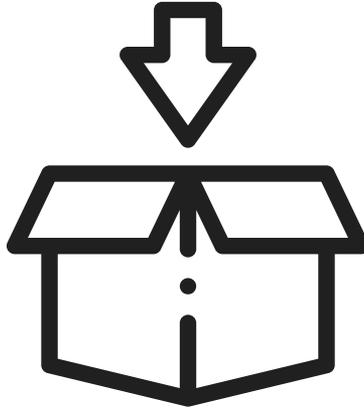
The BMS allows constant current 20A ($\pm 5\%$) amps, 30A ($\pm 10\%$) amps for 3 seconds.

Safety Instructions

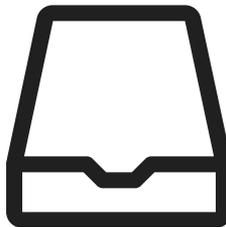


- Do not charge battery with an unregulated alternator or other unapproved chargers!
- Do not cross-circuit battery.
- Do not immerse battery in water.
- This battery is water resistant. Do not use in direct rain, spray or other wet conditions.
- Never charge or discharge battery with more than its rated amps.
- Built-in low temp charging protection. Do not charge if under 32°.
- Failure to follow the above instructions could be dangerous and can void the warranty.
- In case of deformation or leakage of the battery, immediately place outside and away from buildings, and contact a Millertech® representative right away. (see back cover for Millertech Energy Solutions, LLC contact information).

Getting Started & Storage



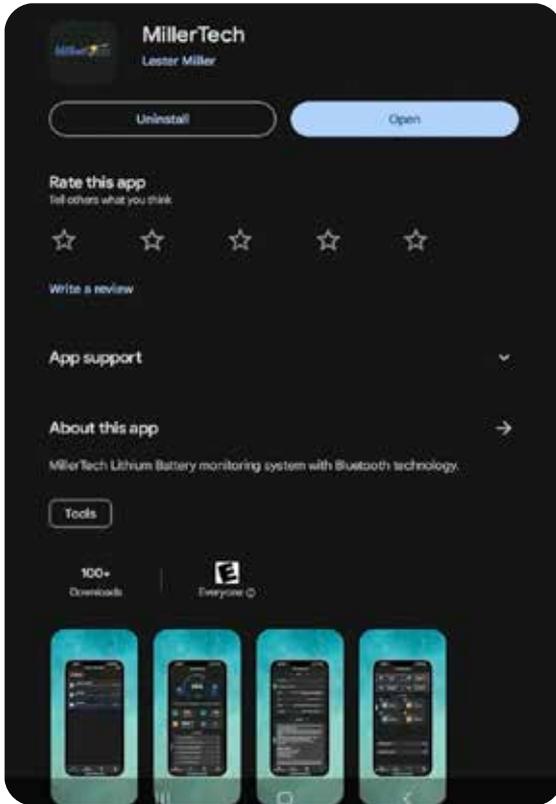
- After removing your battery from the box and packaging, connect it to a charger and charge it completely. Batteries are not fully charged upon arrival due to shipping restrictions.
- Connect with app (Bluetooth versions) and familiarize yourself with it's basic features and functions.
- After the battery has been charged you are ready to install the battery in your application. If you have any questions about your install application, please feel free to contact us (see back cover for contact info).



■ STORAGE

Storage could not be easier. Simply charge the batteries to at least 50% / 14V state of charge and disconnect from any charge or discharge and repeat this every quarter/3 months.

About The App



- Download the Millertech® app on your device from wherever you normally download your apps.
- Get as close as possible to the batteries you wish to connect with and open the app.
- Allow permissions so your device can connect with your batteries via Bluetooth.
- Compare the available device names to the labels on top of the batteries.

About the App

- Tap the device name with which you wish to connect. After connection has been made, swipe left on the device to access auto-connect feature.
- On the bottom of the screen, tap dashboard or control panel, and you can now see all the info on the battery.
- To connect to multiple batteries, simply return to Bluetooth screen and tap devices you wish to add.





| WILL NOT CHARGE:

- Ensure charger works by connecting with another battery.
- Make sure battery is warm enough.
Place in heated building at least 24 hours and retry charging.
- Check temp on dashboard/control panel.
- Check app for fault codes.

| WILL NOT DISCHARGE:

- Ensure battery has enough charge left.
- Check loads to see if load is excessive.
- Check for short circuit.
- Check app for fault codes.

Troubleshooting



I FOUR THINGS TO DO BEFORE YOU CALL TECH SUPPORT

- Have battery size/model.
- Calculate approximate purchase date.
- Be able to connect to the battery with phone app while on live call (Bluetooth models).
- Brand and model of charger being used.





The Millertech Sports Series Lithium Battery 10-Year Guaranteed Warranty **is Simple!**



TERMS:

From the date of your charger purchase through year number 10 of ownership, your battery is covered. If it stops working during this time, we will repair or replace it with a battery of equal or greater value for FREE!



SHIPPING:

We cover all shipping costs associated with shuttling your battery back and forth for repair or replacement. It is our warranty; it is our cost — not yours.



EXCLUSIONS:

THERE ARE NONE! You trusted Millertech, and if it's within the warranty period, your Millertech battery is completely covered for everything!



PROOF OF PURCHASE:

You don't need one. If it's Millertech, it's covered!

SPORT SERIES 

Millertech[®]
— PERFORMANCE LITHIUM BATTERIES

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