

12.8V 320Ah**Bluetooth & Self-heating****LiFePO₄ Battery**

Part Number: L12V320-200-HBT-4-W190

Basic Specification

Nominal Voltage	12.8V
Nominal Capacity	320Ah
Nominal Energy	4096Wh
Internal Resistance	≤40mΩ
Function	Bluetooth & Self-heating
Max. Continuous Output Power	2560W
BMS Board	200A
Max. Batteries in Series and Parallel	4P4S
System Max. Extended Power	40.96kW
System Max. Extended Energy	65.536kWh

Charge Specification

Max. Continuous Charging Current	200A(0.63C)
Recommended Charging Current	60A(0.2C)
Recommended Charging Voltage	14.4±0.2V

Discharge Specification

Max. Continuous Discharging Current	200A(0.63C)
Peak Discharging Current	1000A(3.13C)

Environment Specification

Storage Temperature Range	-10°C - 50°C (14°F - 122°F)
Recommended Storage Temperature	10°C - 35°C (50°F - 95°F)
Charging Temperature Range	-20°C to 50°C (-4°F - 122°F)
Discharging Temperature Range	-20°C - 60°C (-4°F - 140°F)

Mechanical Specification

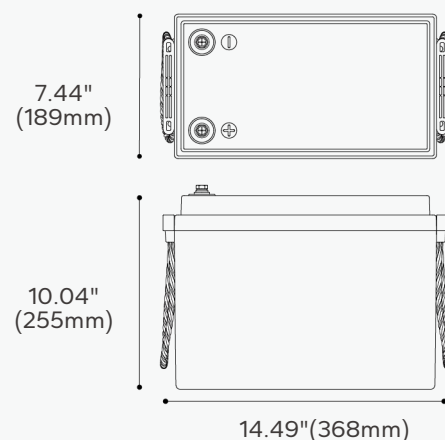
Dimension(L * W * H)	L14.49*W7.44*H10.04 inch 368*189*255mm
Weight	Approx. 57.17 lbs/25.93kg
Terminal Type	M8*16mm
Terminal Torque	13±1 N·m
Case Material	ABS
IP Rating	IP65
Cell Type-chemistry	LiFePO ₄
BCI	190

Self-heating Specification

Minimum charging current/A	15A
Heating time range/temperature -1:	70-90 mins (From -10°C / 14°F)
Heating time range/temperature -2	100-150 mins (From -20°C / -4°F)

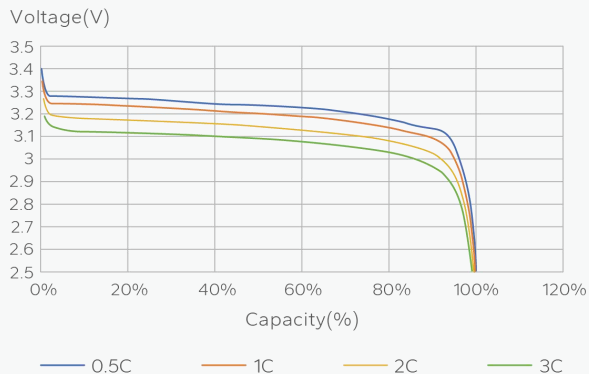
Safety Specification

Certifications	CE, FCC, RoHS, UN38.3, UL-1973
Protection	Over-temperature/Over-discharge/Over-current/Over-voltage/Short-circuit

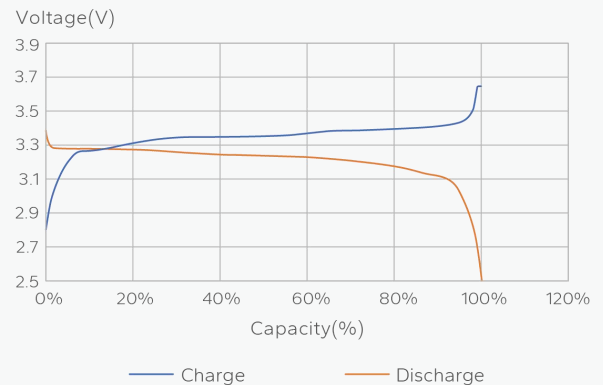
Dimensions

Performance Curves

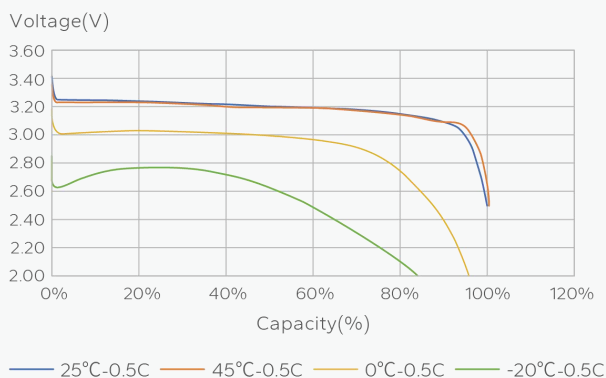
Discharge Performance at 25°C



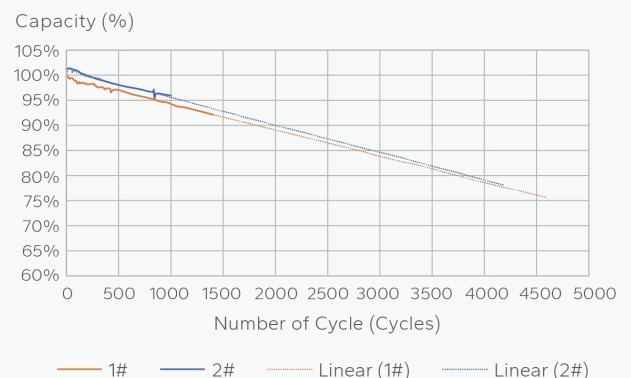
Charge and Discharge at 25°C, 0.5C



Discharge Curves at Different Temperature



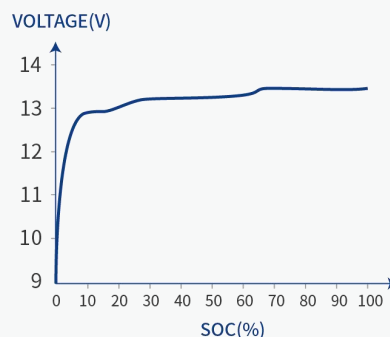
Cycle Life with DOD at 25°C



How to Estimate the Battery Capacity

The battery capacity could be roughly estimated by its **resting voltage** (not charging/discharging voltage). Since the voltage of each battery is slightly different, and the voltage measurement is affected by the measuring instrument, ambient temperature, etc., the following parameters are for reference only.

Resting Voltage: The voltage is measured after the battery has been disconnected from the charger and loads with zero current, and left alone for 30 minutes.



SOC (%)	VOLTAGE (V)
0	10 to 12
25	13 to 13.15
50	13.15 to 13.2
75	13.3 to 13.33
100	≥13.33

① Based on the characteristics of LiFePO4 batteries, the voltage measured by all LiFePO4 batteries during charging/discharging is not the real voltage of the battery. Therefore, after charging/discharging and disconnecting the battery from the power source, the voltage of the battery will gradually drop/increase to its real voltage.