

HCG-31S Series / Data sheet



36V 60Ah

36V 52Ah

36V 65Ah

Bluetooth



Model Included:

- HCG31S-3660BT** 36V 60Ah LiFePO4 Battery with Bluetooth
- HCG31S-3652BT** 36V 52Ah LiFePO4 Battery with Bluetooth
- HCG31S-3665BT** 36V 65Ah LiFePO4 Battery with Bluetooth

Haicen Advanced Lithium Batteries		Model		
		HCG31S-3652BT	HCG31S-3660BT	HCG31S-3665BT
Electrical Specifications	Nominal Voltage	36V	36V	36V
	Nominal Capacity	52Ah	60Ah	65Ah
	Parallel Connection	Max. 6units	Max. 6units	Max. 6units
	Serial Connection	NO	NO	NO
	BMS	12S60A	12S60A	12S60A
	Bluetooth	Android/IOS	Android/IOS	Android/IOS
	Heat	No	No	No
	Circuit Protection	Over charge, Over discharge, Over current, Over temp, Short, Balance,Low temp		
	Cycle Life	3000times Cycles @100%DOD and 6000times @80% DOD		
	Self Discharge	Less than 3% per month		
	Charge Efficiency	100% @0.2C		
Discharge Efficiency	98-100% @1C			
Charge Specifications	Charge Voltage	43.2±0.6V	43.2±0.6V	43.2±0.6V
	Standard Current	10A	12A	13A
	Fast Current	26A	30A	32A
Discharge Specifications	Standard Current	10A	12A	13A
	Max. Con. Current	52A	60A	60A
	Peak Current	500A(300ms)	500A(300ms)	500A(300ms)
	Cut-off Voltage	30V	30V	30V
Mechanical Specifications	Dimensions (mm)	330×173×216mm (Group 31)		
	Approx Weight(KG)	16.5	17	17
	Terminal Type	M8		
	Case Color/material	Black Plastic case (ABS)		
	IP Rating	IP65		
	Cell Type	Cylinder LiFePO4 cell		
	Cell holder	Yes		
Temperature Specifications	Charge Temp	0°C to 55°C	(32°F to 131°F)	
	Discharge Temp	-20°C to 60°C	(-4°F to 140°F)	
	Storage Temp	-5°C to 45°C	(23°F to 113°F)	

Key Points for Quality control:

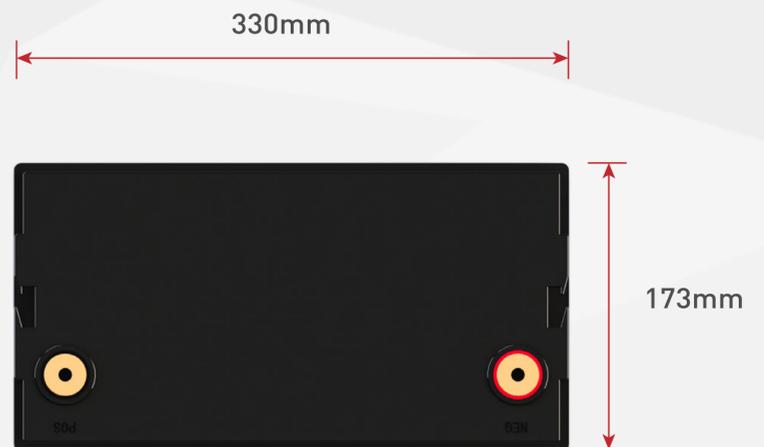
- Cell match:**
 More strict cell matching standard, the difference of Internal resistance is 1mΩ and voltage is 5mV.
- Automatic cells welding:**
 Cells are assembled by Automatic welding equipments to ensure the quality reliability and consistency.
- 100% Cycle test:**
 All battery packs are 100% cycle tested (Fully Discharged→Fully Charged→Fully Discharged→60% Charged) before package and all test reports are stored.
- Unique tracking number:**
 All battery packs are lasered an unique number on the case side for quality tracking.

Certifications:

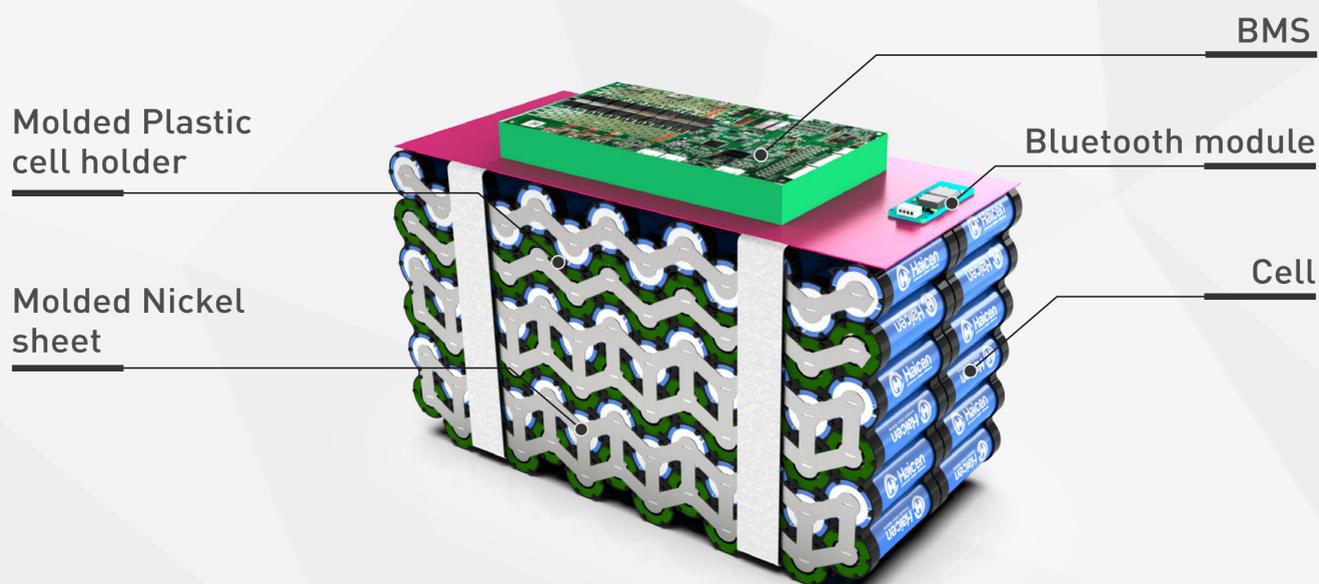
- UL1642 (Cell)
- IEC62133 (Cell)
- IEC62619 (Cell)
- CE (Pack)
- UN38.3 (Cell / Pack)
- ROHS (Cell)



Dimensions:



Internal Structure:



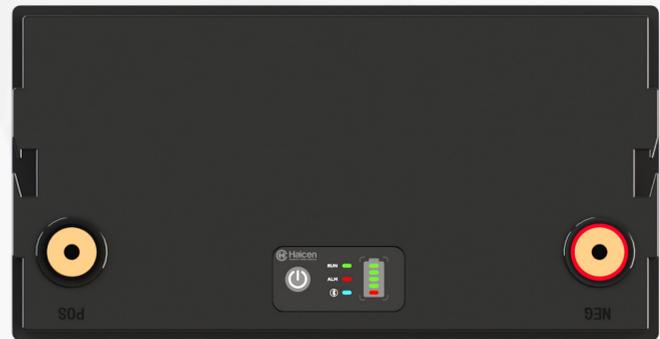
36V 60Ah

36V 52Ah

36V 65Ah

Bluetooth

SOC Display (optional)



ALM

Alarming
The red LED will flash when the battery sends an alarm.

Customized logo is acceptable.

RUN

Working status of the battery
The green LED will be on when charging or discharging.

SOC (State of Charge)

100% SOC (Full Charge)
80% SOC
60% SOC
40% SOC
20% SOC

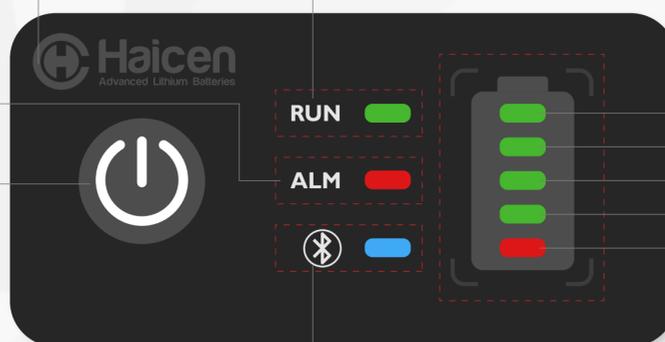
Switch

1. With the standby state, touch the "Switch" key, then the SOC LED will be on to show the current SOC and the RUN LED will be on. After 5s later, all LEDs in panel will turn off.

2. Press and hold the switch for 3s, then the BMS will immediately go to Sleep mode. With the Sleep state, press on the "Switch" key for 3s, then the BMS will wake up.

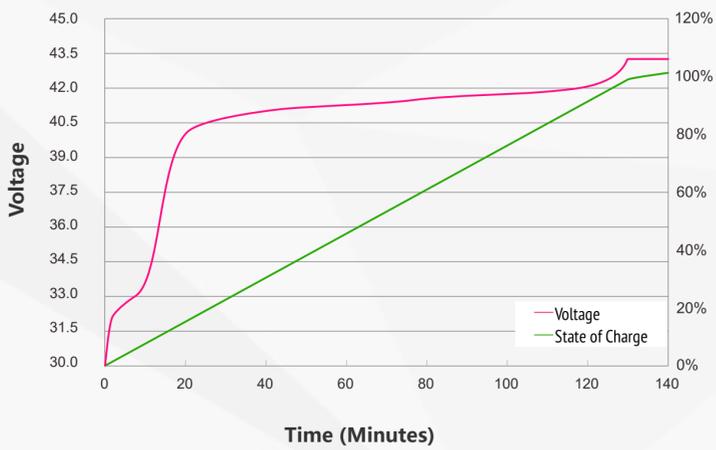
Bluetooth

Bluetooth connection status
The blue LED will be on when the battery is connected to Bluetooth.

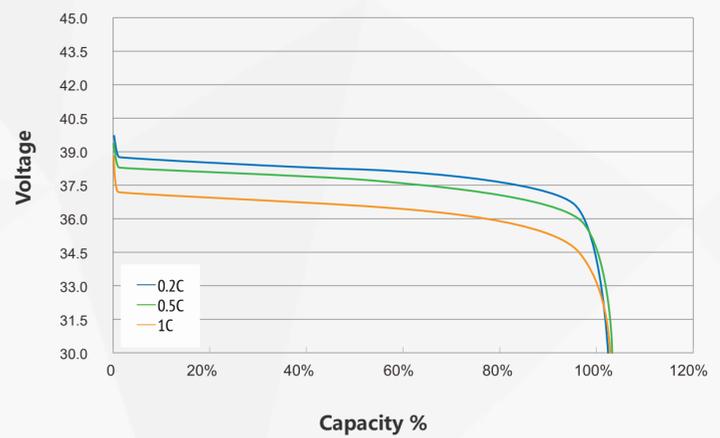


Characteristics Curve:

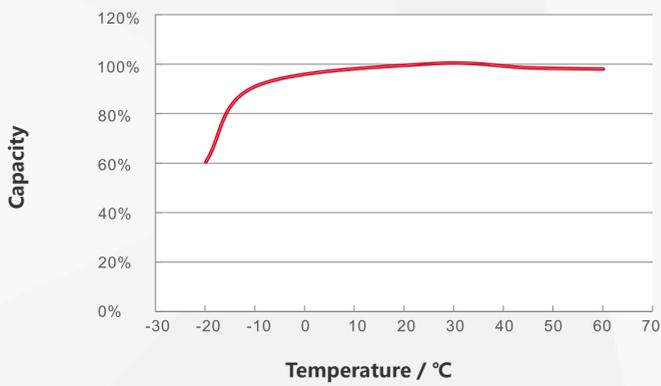
Charging Characteristics (0.5C @25°C)



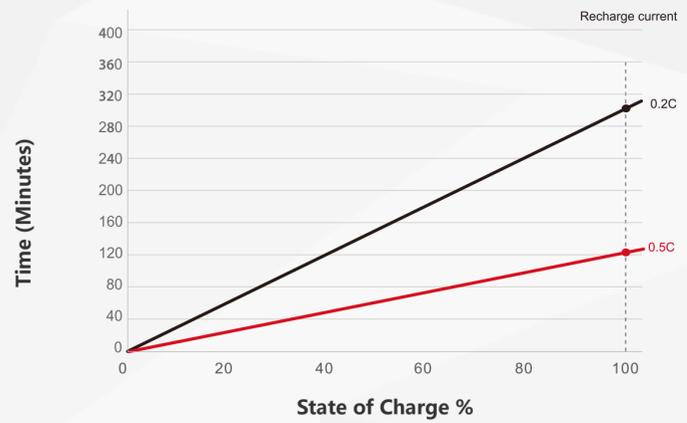
Discharging Characteristics (0.2C, 0.5C, 1C @25°C)



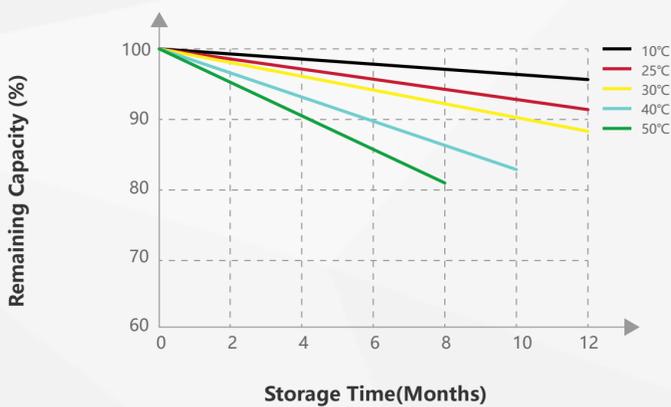
Different Temperature Capacity Curve



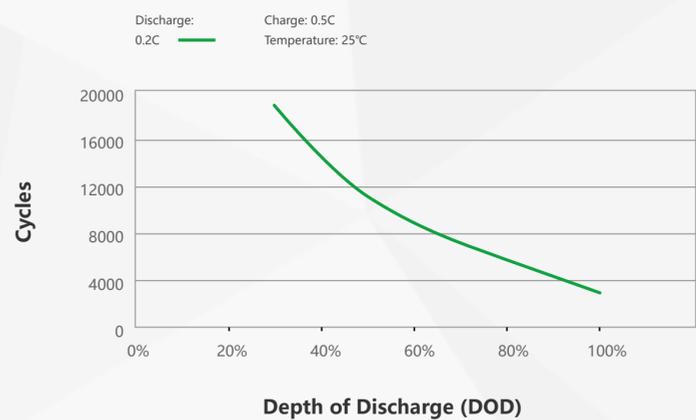
Typical Charge Time Curve



Different Temperature Self Discharge Curve



Different DOD Discharge Cycle Life Curve



36V 60Ah

36V 52Ah

36V 65Ah

Bluetooth

Key Benefits:

- Higher qualified cylindrical cell:**
 UL1642, IEC62619, IEC62133 listed with Cycle life more than 3000times and excellent consistency.
- Bluetooth:**
 can monitor the battery status(charge, discharge, current, temperature, cycle life and so on) and change the data for different applications.
- Heat:**
 Uniform internal heating is an important feature of our cold-weather performance batteries, as many external heating blanket options currently available cannot sense the internal temperature of the cells and may not be completely effective at heating the battery throughout. The system features proprietary technology that draws power from the charger itself, requiring no additional components. The entire process of heating and charging is completely seamless. Simply plug the battery into the regular lithium charger and the internal heating and monitoring system takes care of the rest.
- More stable and firm internal structure:**
 Cell holders can well protect and separate the cells to avoid any circuit short risk caused by vibration or impact or over current, and improve the heat dissipation.
- Smaller size and less weight:**
 The size of our battery is just 3/4 size of the standard 36V 60Ah battery from other suppliers.

Market Applications:



Trolling motor



Marine



RV



Cleaning



Golf cart



Energy storage



Light EV



Robotics

Package:

20' Container=10Pallets=600Cartons=600Units;
 40' Container=20Pallets=1200Cartons=1200Units;



Internal Package
Forming pearl foam

1Carton=1Unit



Weight: 18Kg/carton
Size(L×W×H): 410×250×310mm

1Pallet=60Cartons



Weight: 1095Kg/pallet
Size(L×W×H)=1.2×1×1.7m ≈ 2CBM

Customized items:

- Bluetooth App design:** Help you to design and upload customized App, or supply you our Source code for your design.
- Case color:** Customized case color is acceptable based on quantity more than 300pcs per batch.
- Label design:** We can help you to design customized label on the battery.
- Carton design:** Customized carton is acceptable based on quantity more than 200pcs per batch.
- Certificates:** 50% discount on certificates cost for first bulk order and 100% reback for future orders.
- NDA agreement:** NDA agreement is allowed and necessary to protect your benefits.