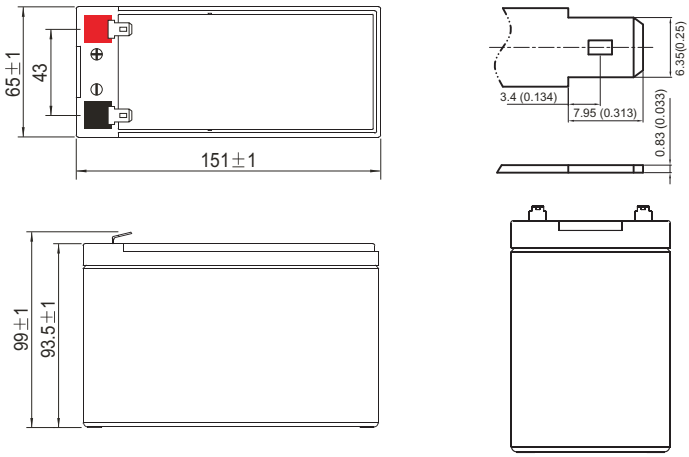
Li-FePO4 battery

LFP12-75E2 (12.8V 7.5Ah)



Features:

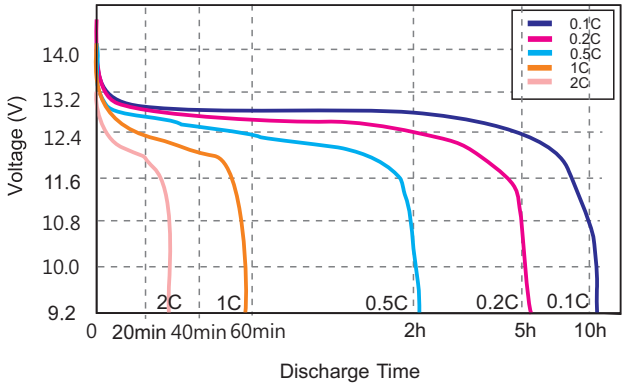
- **Long Cycle life:**
  more than five times longer than SLA battery
- **Superior Safety:**
  Li-FePO4 Chemistry eliminiates its risk of explosion
- **Light Weight:**
  About 35~40% weight of SLA battery.

Specification

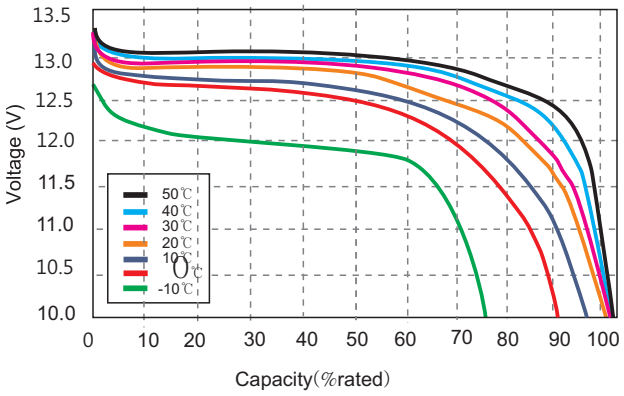
Electrical Characteristics	Nominal Voltage	12.8V
	Nominal Capacity	7.5Ah @0.2C with 100% DOD
	Energy	96Wh
	Internal Resistance	≤60mΩ
	Cycle Life	>2000 cycles @0.2C 100%DOD
	Months Self Discharge	<3%
	Efficiency of Charge	100% @0.5C
	Efficiency of Discharge	96~99% @1C
Standard Charge	Charge Voltage	14.6V
	Charge Mode	0.2C to 14.6V, then14.6V to 0.02C current
	Charger Current	4A
	Max. Charge Current	7.5A
	Charge Cut-off Voltage	15.6V
Standard Discharge	Continuous Current	7.5A
	Max. Pulse Current	20A(<3s)
	Discharge Cut-off Voltage	8V (Recommend 10V)
Environmental	Charge Temperature	0 ℃ to 45 ℃ (32F to 113F) @60±25% Relative Humidity
	Discharge Temperature	-20 ℃ to 60 ℃ (-4F to 140F) @60±25% Relative Humidity
	Storage Temperature	0 ℃ to 40 ℃ (32F to 104F) @60±25% Relative Humidity
	Water Dust Resistance	IP56
Mechanical	Cell & Method	18650 4S5P
	Plastic Case	ABS
	Dimensions (in./mm.)	151*65*94mm
	Weight	1.10KG
	Terminal	F2
	Protocol (optional)	SMBus/RS485
	SOC (optional)	LED

Charging and Discharging Characteristics

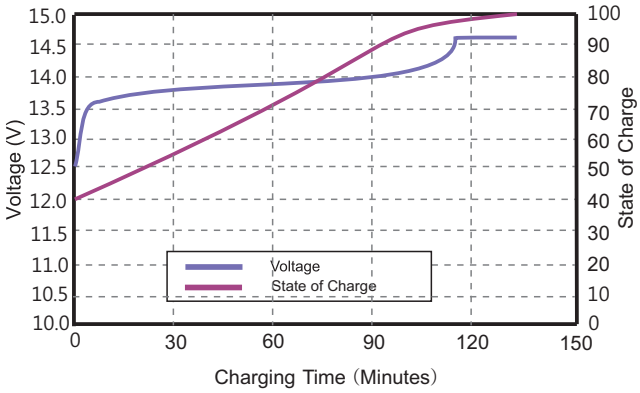
Different Rate Discharge Curve @25℃



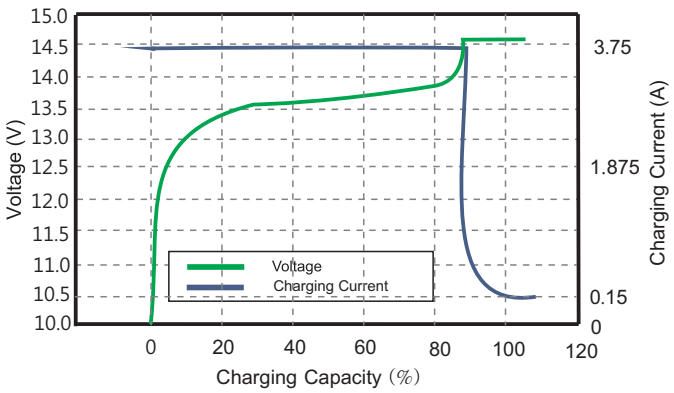
Different Temperature Discharge Curve @0.5C



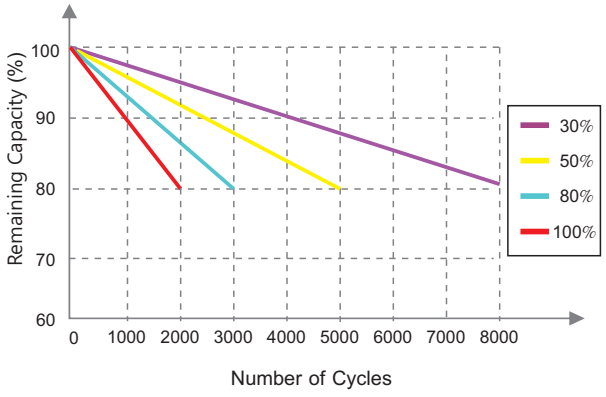
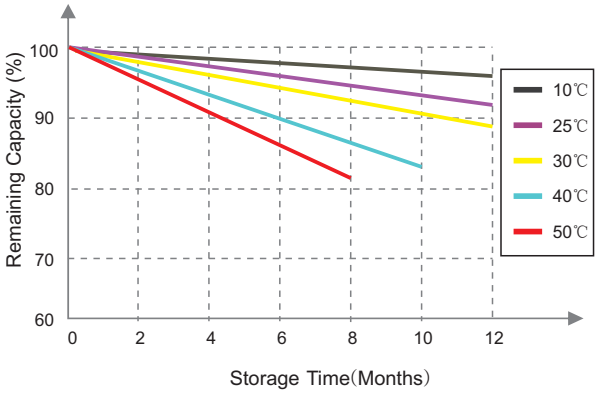
State of Charge Curve @0.5C 25℃



Charging Characteristics @0.5C 25℃



Different DOD Discharge Cycle Life Curve @0.5C



Different Temperature Self Discharge Curve