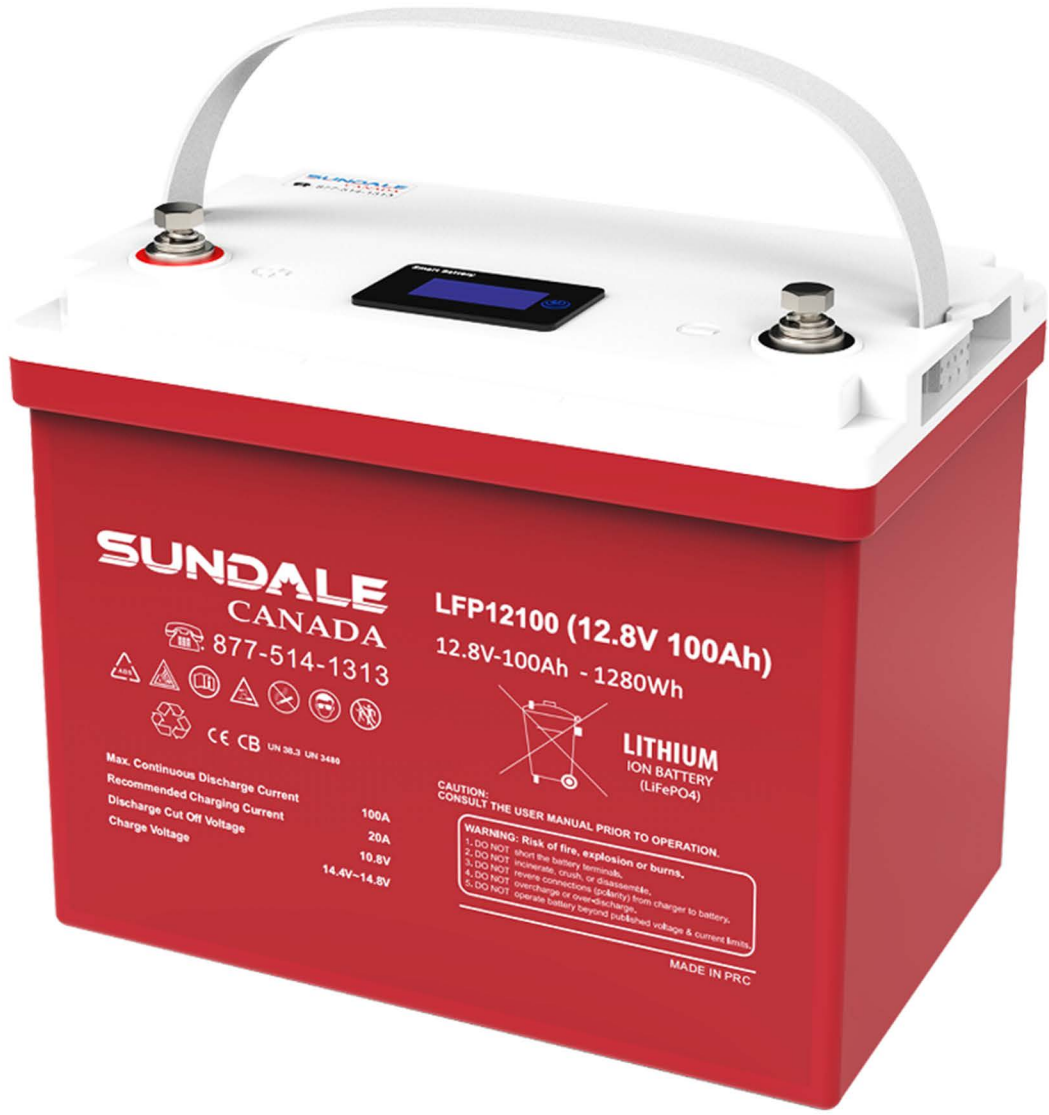
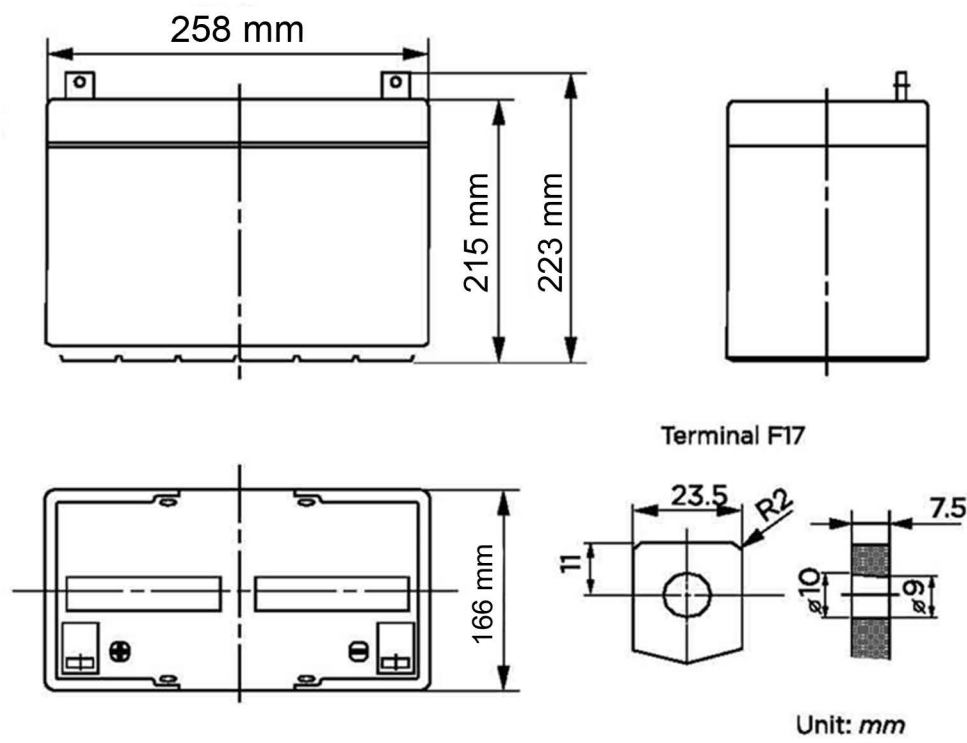


Detailed Illustration (size in mm)



L	258 mm 10.16 inch
W	166 mm 6.53 inch
H	215 mm 8.46 inch
H. with Term. -	223 mm 8.46 inch
NW	9.9 kg 21.82 lbs
GW	10.2 kg 22.48 lbs
Bat. size	G24

Volts	12.8Volt	Included Hardware	Yes
Battery	M8	Warranty	3 Years

Charge

Recommended Charge Voltage at 25°C	
Stand by / Back Up / Float Use	13.6 - 13.8V
Temperature Coefficient: 0.02V/°C	
Daily Cycle / Bulk / Boost	14.4 - 14.8V
Temperature Coefficient: 0.03V/°C	

Recommended Charge Current:

0 - 10 Celcius	< 10A
10 - 35 Celcius	< 20A
35 - 50 Celcius	< 20A

Maximum Charge Current Upto 100A (High charge current reduces battery life)

Surge Current Limit 330 ± 80A (5s)

Discharge Current VS Performance of Battery at 25°C

Rated Discharge	Dis. Curr.	Battery Running Capacity	
Current Factor (c)	Amps (A)	Time in Hours	Amp Hour (Ah)
0.1	10	10	100
0.2	20	5	100
0.3	30	3.3	99
0.5	50	1.98	99
1	100	0.98 / 59 mins	98.3

As the Discharge Current Factor Increases, the battery service life decreases.
For optimal use, recommended depth of discharge <= 80% at 0.2c draw rate

Charge Temperature Range	0 to 45°C
Dischge Temperature Range	-20°C ~ 60°C
Storage Temperature Range	-20°C ~ 55°C
Self-Discharge at 25°C	2-3% every month

Capacity

Nominal Capacity	100
Total Energy	1280
Nominal Voltage	12.8V
Battery Chemistry	LiFePO4

Relation Between SOC, Stand-By Voltage, Cycle Life & Depth of Discharge

SOC	Stand By Voltage (± 0.1V)	Cycle Life	DOD
100%	13.6		0%
70%	13.4	12000	30%
50%	13.2	8000	50%
20%	12.5	6000	80%
0%	10.5	4500	100%

SOC = State of Charge

DOD = Depth of Discharge

To have the battery serve its design life, we recommend to stop discharge at 13.2V

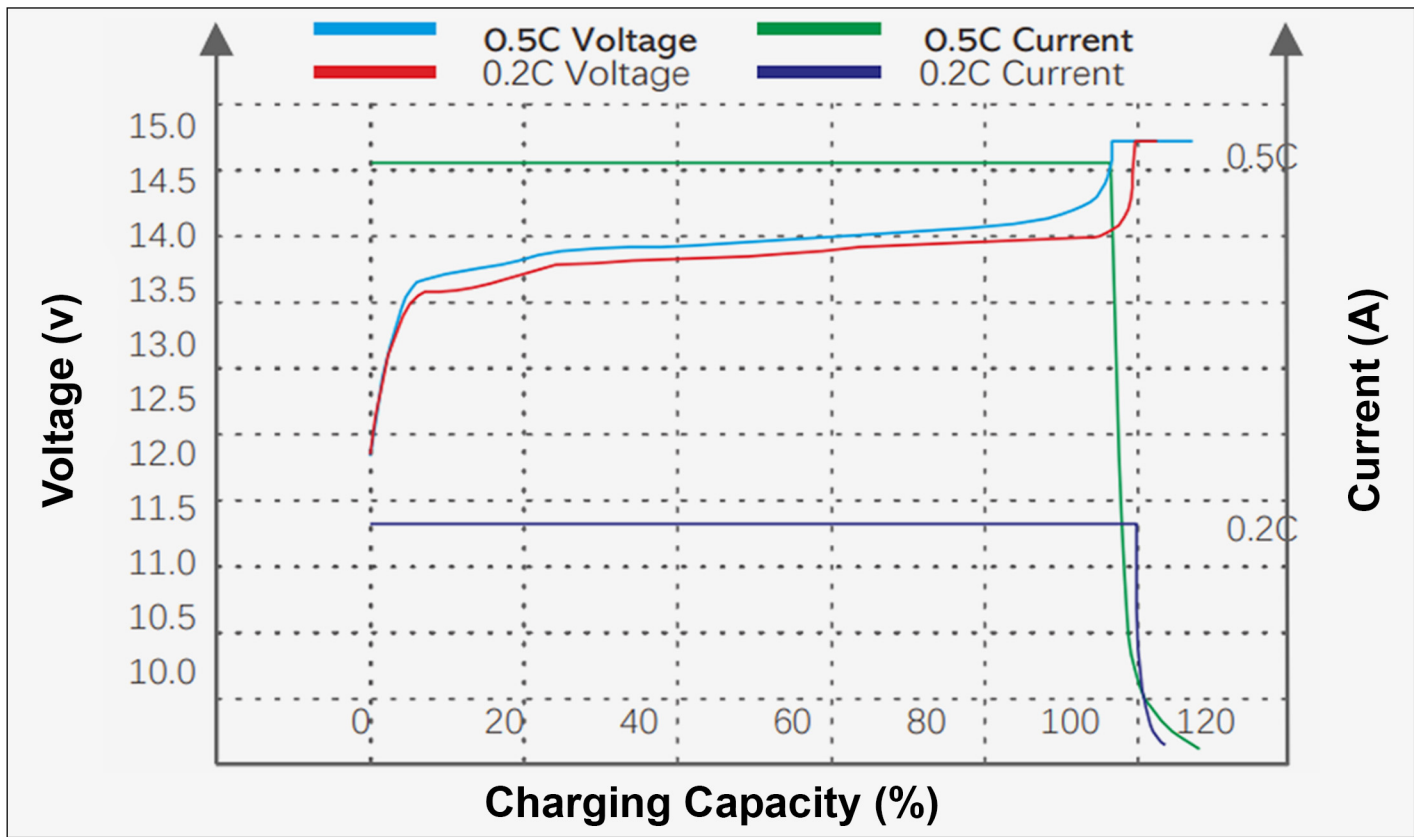
Design

Bluetooth (Yes Or No)	No
Heated (Yes Or No)	Yes
If Heated, at what temperature does heater start	0°C
If Heated, at what temperature does heater cut off	5°C
If Heated, what amps will the heater take from charging source	3.7A

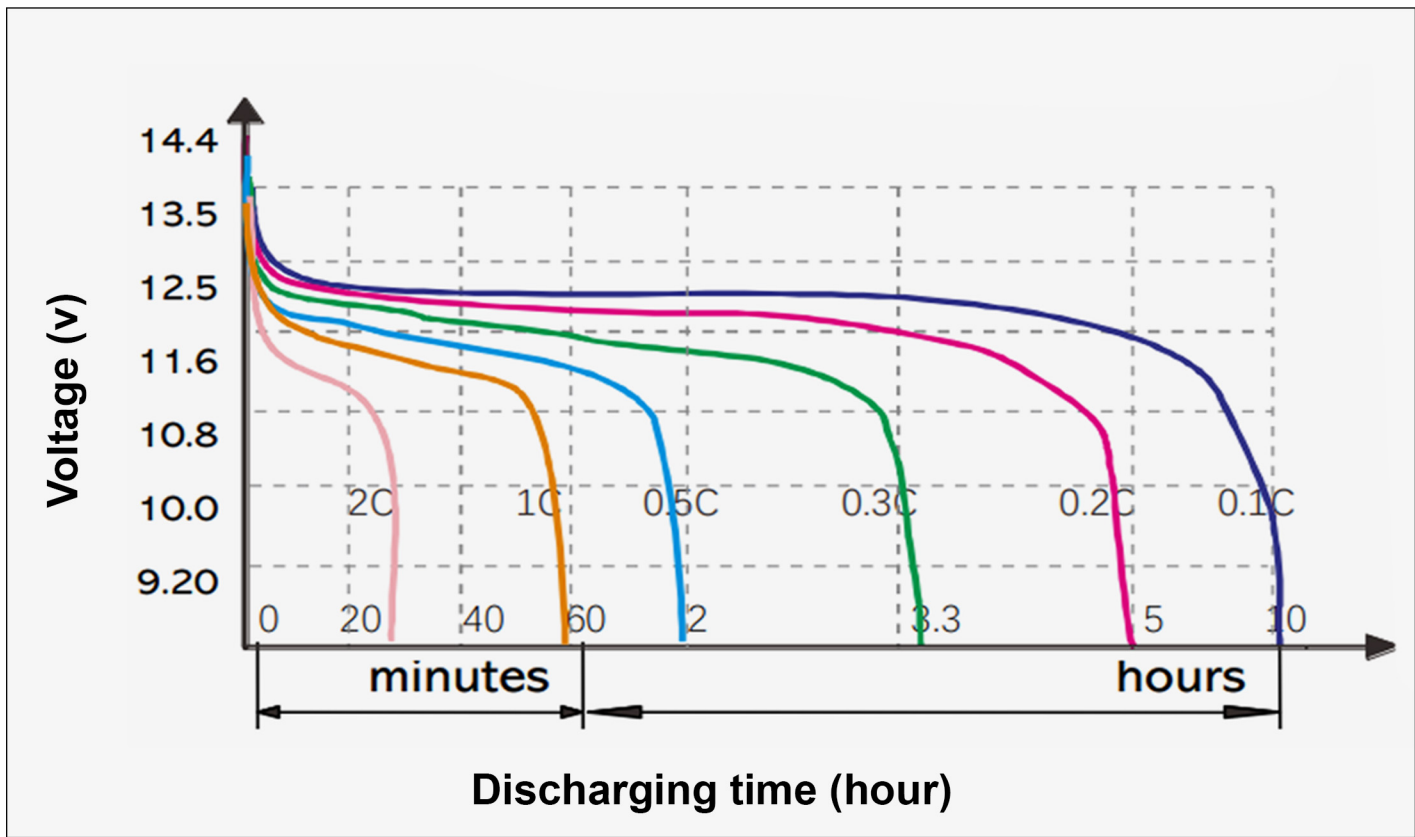
BMS

Independent Charge Protection	YES
Independent Discharge Protection	YES
Short-Circuit Protection	YES
Over-Voltage Protection	YES
Low-Voltage Protection	YES
Over-Current Protection	YES
Low-Temperature Protection	YES
Over-Temperature Protection	YES
Container Material	ABS
Cover Material	ABS
Handles	Fabric
Internal BMS Model No.	J-4S100A
Series Connection (Total How Many Batt)	4PCS
Parallel Connection (Total How Many Batt)	4PCS
System Connection (How Many Parallel & In Series)	4S4P

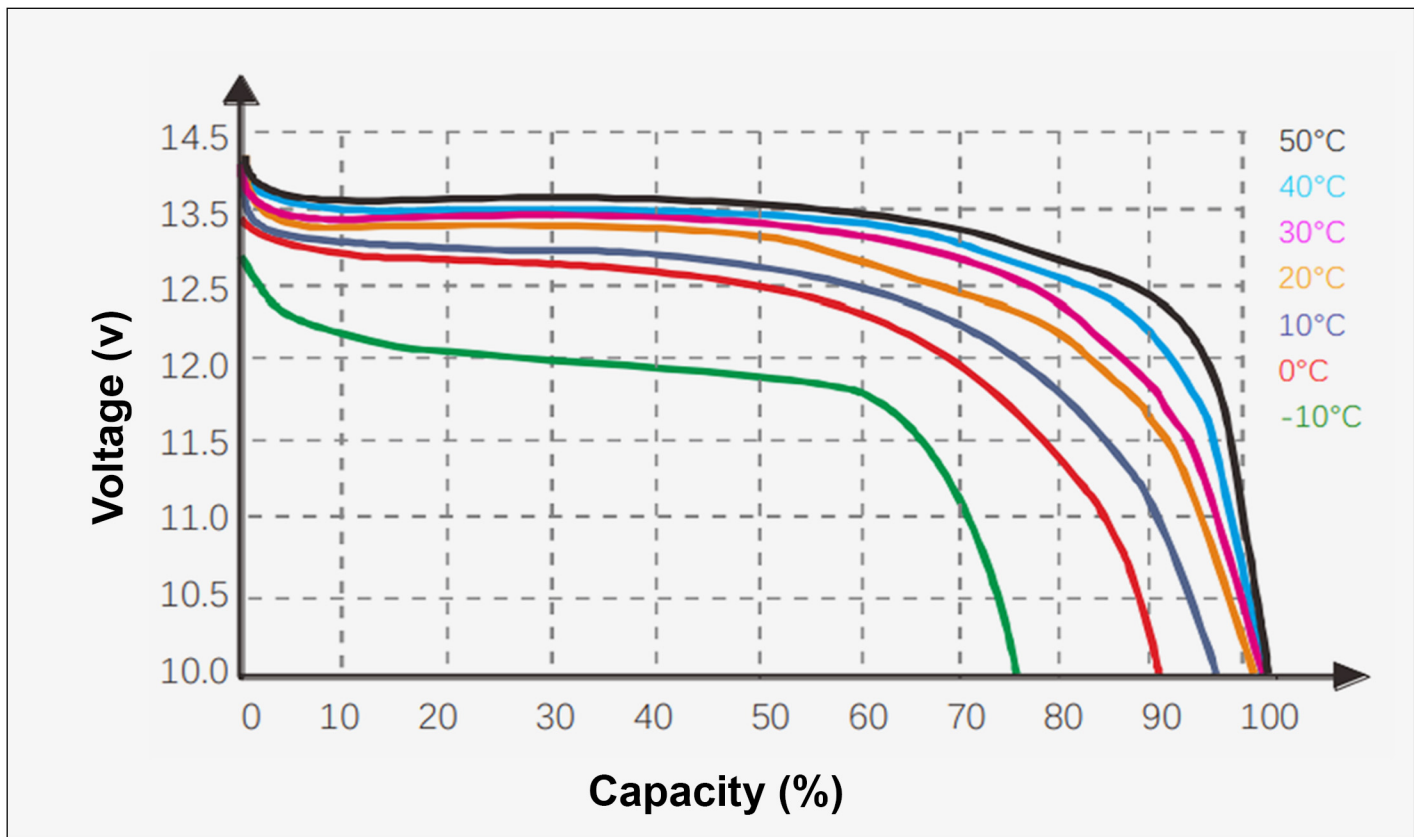
Charge characteristics (25°C)



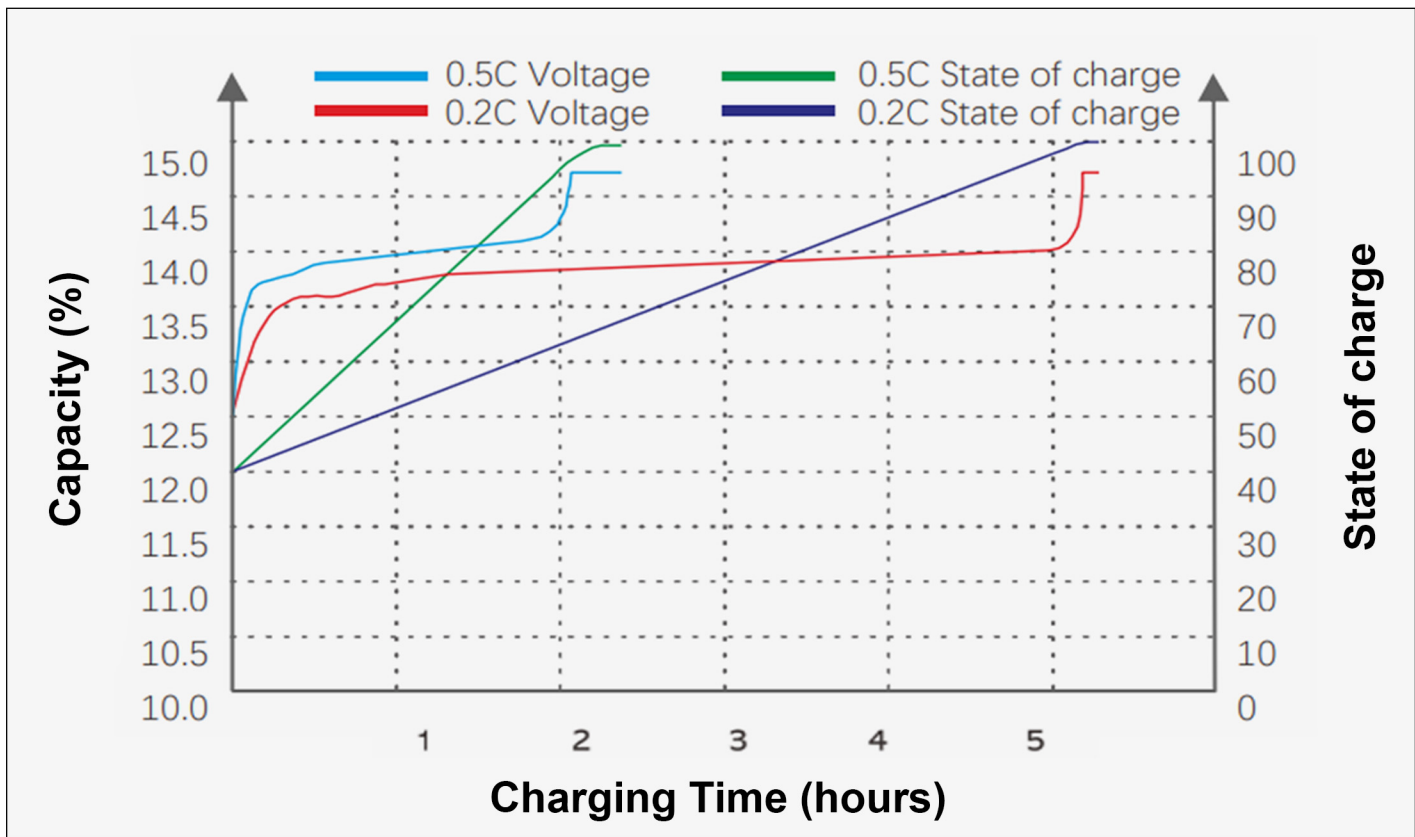
Discharge characteristics (25°C)



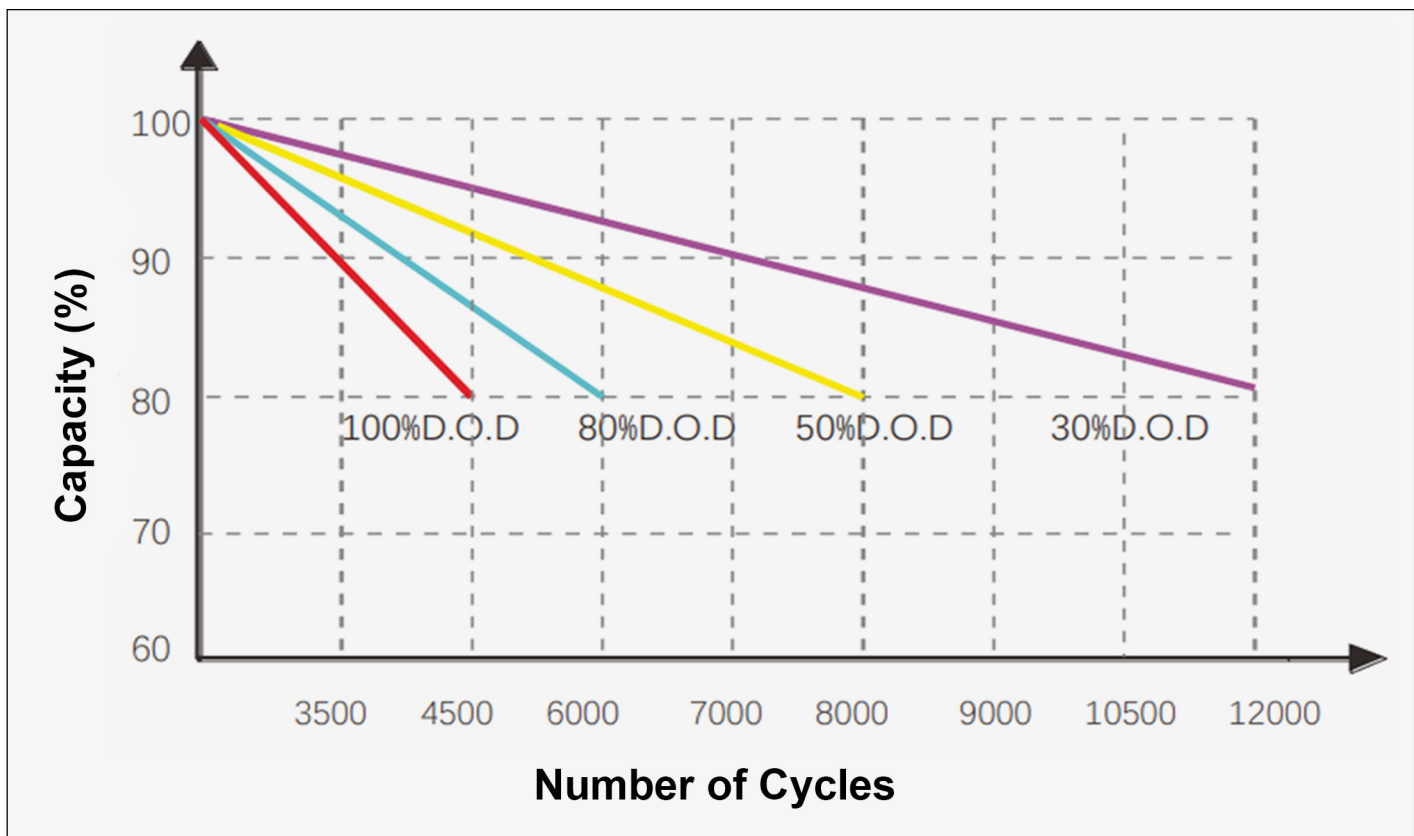
Temperature effect on discharging (0.5C)



State of Charge Curve (25°C)



Cycle Life On D.O.D 0.2C Rate (25°C)



Self-Discharging Curve

