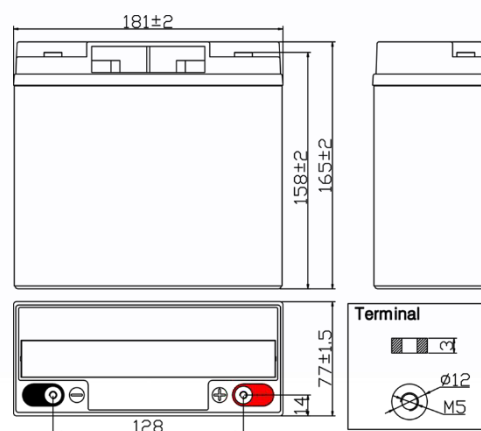


### SPECIFICATION

<b>Nominal Voltage</b>	12V (6 cells in series)	
<b>Rated Capacity</b>	20.0Ah	(C <sub>20</sub> , 1.75V/cell)
<b>Dimensions(mm)</b>	Length	181±2 mm
	Width	77±1.5 mm
	Height	165±2 mm
	Total Height	165±2 mm
<b>Nominal Capacity @25°C (Ah)</b>	20 Hour rate (1.030A to 10.5 volts)	20.6 Ah
	10 Hour rate (1.968A to 10.5 volts)	19.6 Ah
	5 Hour rate (3.518A to 10.5 volts)	17.5 Ah
	1 Hour rate (13.00A to 9.6 volts)	13.0 Ah
	15 min rate (38.50A to 9.6 volts)	9.62 Ah
<b>Approx. Weight</b>	5.9 kg	
<b>Terminal</b>	T10	
<b>Max.Discharge Current</b>	300A @25°C (5s)	
<b>Internal Resistance</b>	12mΩ @25°C (Full Charged Battery)	
<b>DOD 80%</b>	≥450 Cycles @25°C	
<b>Ambient Temperature</b>	Charge:	-15°C~50°C
	Discharge:	-20°C~60°C
	Storage:	-20°C~50°C
<b>Container Material</b>	A.B.S, UL94-HB, UL94-V0, Optional	
<b>Self Discharge</b>	Deep Cycle Battery can be stored for more than 6 months at 25°C. Self-Discharge ratio less than 3% per month at 25°C. Please charge batteries before using.	



### COMPANY CERTIFICATION



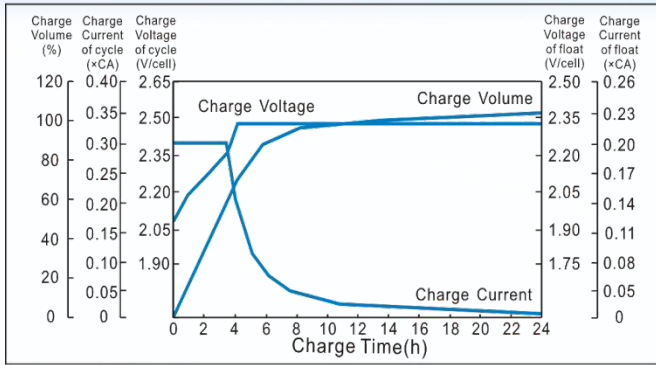
### CONSTANT CURRENT DISCHARGE CHARACTERISTICS (A), (25°C)

F.V/Time	5min	10min	15min	30min	60min	2H	3H	5H	8H	10H	20H
1.60V/cell	78.90	51.70	38.50	20.50	13.00	7.324	5.334	3.598	2.382	2.040	1.092
1.70V/cell	71.60	47.90	36.30	19.90	12.71	7.210	5.202	3.546	2.346	1.988	1.052
1.75V/cell	64.30	44.90	34.30	19.30	12.55	7.150	5.150	3.518	2.326	1.968	1.030
1.80V/cell	57.70	42.00	32.30	18.70	12.37	7.090	5.090	3.478	2.294	1.938	0.988

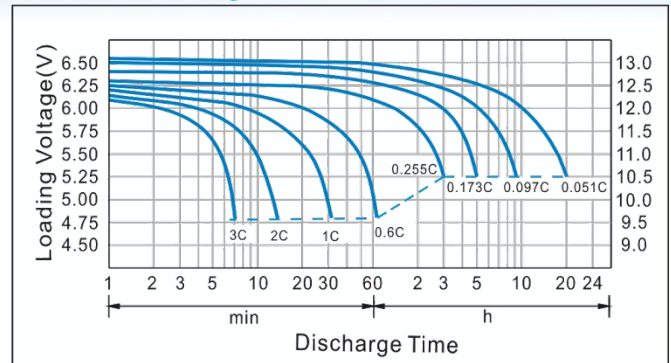
### CONSTANT WATTAGE DISCHARGE CHARACTERISTICS (WATT), (25°C)

F.V/Time	5min	10min	15min	30min	60min	2H	3H	5H	8H	10H	20H
1.60V/cell	142.7	94.35	70.90	39.12	25.78	14.53	10.63	7.178	4.752	4.073	2.184
1.70V/cell	131.9	89.01	68.06	38.31	25.31	14.36	10.39	7.080	4.684	3.976	2.108
1.75V/cell	120.0	84.94	64.88	37.47	25.02	14.25	10.29	7.030	4.648	3.939	2.069
1.80V/cell	108.7	80.15	61.64	36.62	24.68	14.14	10.18	6.956	4.588	3.879	1.984

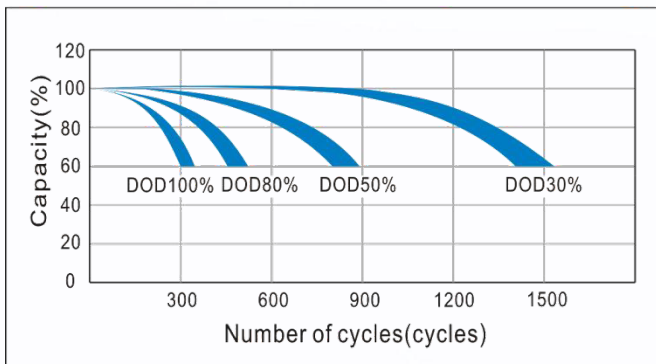
### Charge Characteristics Curve



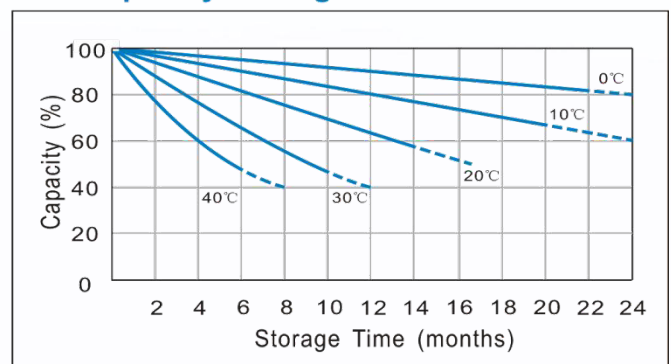
### Discharge Characteristics Curve



### Cycle service life in relation to depth of discharge



### Capacity Storage Characteristics



### CAPACITY FACTORS WITH DIFFERENT TEMPERATURE

Battery type		-20°C	-10°C	0°C	5°C	10°C	20°C	25°C	30°C	40°C	45°C
GEL Battery	6V & 12V	50%	70%	83%	85%	90%	98%	100%	102%	104%	105%
	2V	60%	75%	85%	88%	92%	99%	100%	103%	105%	106%
AGM Battery	6V & 12V	46%	66%	76%	83%	90%	98%	100%	103%	107%	109%
	2V	55%	70%	80%	85%	92%	99%	100%	104%	108%	110%

### MAINTENANCE & CAUTIONS

#### ☑ Charging Procedure:

Application	Charging method	Charge voltage at 25°C	Temperature compensation coefficient of charging voltage	Max. charging current	Temperature
For standby power source	Constant voltage charging (With current restriction)	2.25~2.30 V/cell	-3mV/°C/cell	0.2CA	-15~50°C
For cycle service		2.45~2.50 V/cell	-4mV/°C/cell	0.3CA	

#### ☑ Float service:

Every month, recommend inspection every battery voltage.

Every three months, recommend equalization charge for one time. Equalization charge method: Step 1: Discharge: 100% rate capacity discharge.

Step 2: Charge: Max. Current 0.3CA, constant voltage 2.45-2.50V/Cell charge 24h.

#### ☑ Cycle service:

Avoid battery over discharge, especially battery series connection use.

Charged with recommend voltage, ensure battery can be full recharged.

In general, recharge capacity should be 1.1~1.15 times discharge capacity.

#### ☑ Length of service life will be directly affected by the number of discharge cycles, depth of discharge, Ambient temperature and charging voltage.

#### ☑ Charge the batteries at least once every six months, if they are stored at 25°C. Charging Method:

Constant Voltage :  $-0.2C \times 2h + 2.45 - 2.50V/cell \times 24h$ , Max. Current 0.25CA

Constant Current :  $-0.2C \times 2h + 0.1C \times 12h$

Fast :  $-0.2C \times 2h + 0.3C \times 4h$

#### ☑ Terminal of torque:

Bolt	M5	M6	M8
Terminal	T3, T10	T4, T7, T11, T12, T13	T5, T6, T8, T9, T14
Torque	6~7N.m	8~10N.m	10~12N.m