

# DEEP CYCLE MARINE BATTERY



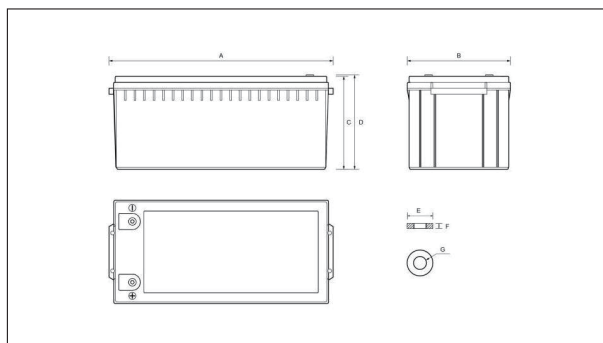
## BB12300FM 12V300Ah

### Specifications

Nominal Voltage		12V
Rated capacity (10 hour rate)		300Ah
Dimensions	Length	525±2mm(20.86inch)
	Width	240±2mm(9.76inch)
	Height	225±2mm(10.62inch)
	Total Height	225±2mm(10.62inch)
Approx. Weight		55.3kg(121.91lbs)±3%



### Outer dimensions (mm)



**NOTE 1:** Dimensions have a ±2 mm (0.08 in) tolerance. Weights may vary.

**NOTE 2:** Refer to terminal guide on web site for torque values.

**NOTE 3:** Extra considerations must be given when designing systems for use at maximum temperatures.

**NOTE 4:** Internal Resistance is approximate.

### FEATURES

#### Maintenance Free

The AGM battery adopts a sealed valve-controlled design, and the gas generated by the internal water splitting can be recombined back into the electrolyte during the discharge process, without the need for regular replenishment of the electrolyte. This makes it safe and reduces labor costs required for maintenance.

#### No Leakage

The internal electrolyte is absorbed by the separator of the AGM battery, and even if the battery case is ruptured, the electrolyte will not leak out easily.

#### Low Risk of Internal Short Circuits

Due to the extremely small voids of AGM battery materials and good puncture resistance, it is difficult for small particles generated by the aging of battery plates to pass through, eliminating the risk of internal short circuits.

### Characteristics

Terminal type		F10
Technology		AGM VRLA
Short Circuit (A)(20°C/68°F)		1600
Self-Discharge (20°C/68°F)		2-3% per month
Internal resistance (Fully charged, 25°C)		Approx. 4.75mΩ
Amp Hours (AH)	10 HR	200
	20 HR	220
Charge Temperature		Min:-10°C(14°F)   Max: 50°C(122°F)
Storage Temperature		Min:-10°C(14°F)   Max: 50°C(122°F)

#### High Output Current

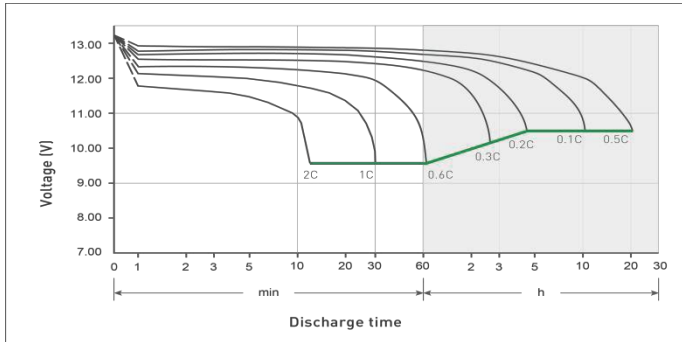
The separator of AGM batteries has many pores filled with electrolyte, resulting in the largest contact area between the plates and the electrolyte, which can generate high instantaneous current. AGM batteries have minimal internal resistance, which allows them to deliver sufficient power pulses when necessary.

#### Excellent Deep Cycle Performance of AGM Batteries

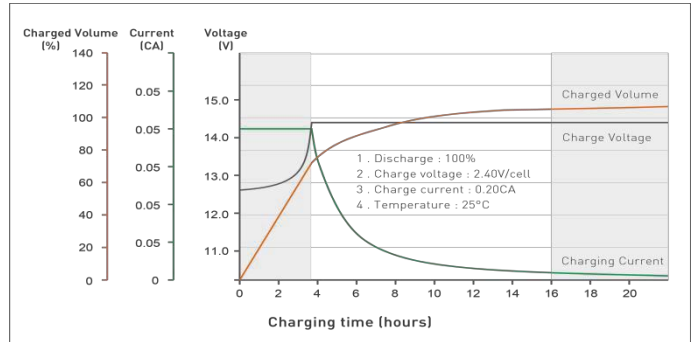
The lead-calcium alloy electrode plate has mature technology and good deep cycle discharge performance. The surface of the plate is not easy to peel off, and it is not easy to crystallize sulfate, thus ensuring a longer cycle life.

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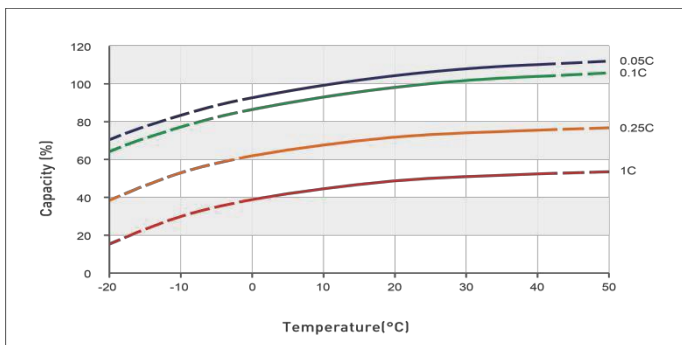
## Discharge characteristics(25°C)



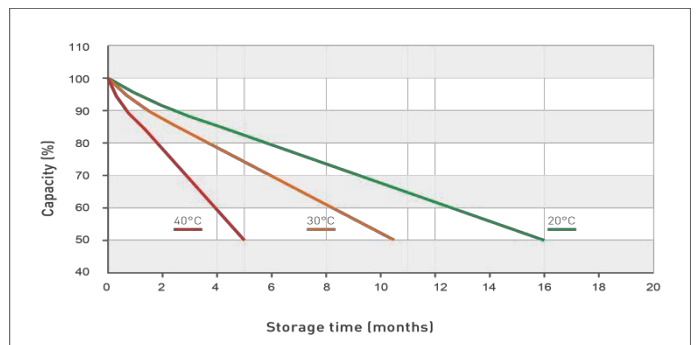
## Charging characteristics (25°C)



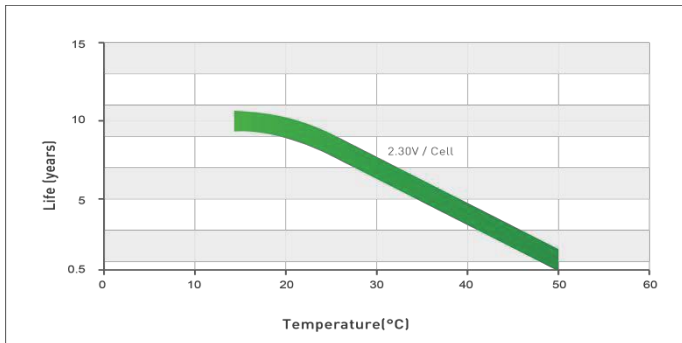
## Temperature effects on Capacity



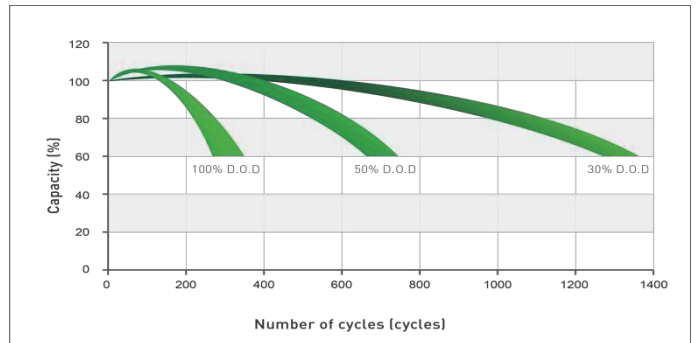
## Self-discharge characteristics



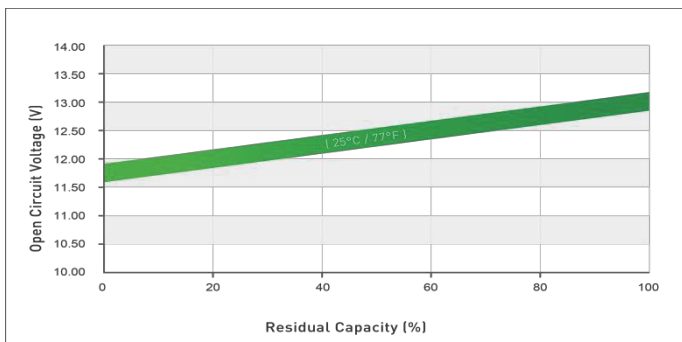
## Floating life on Temperature



## Cycle life on D.O.D (25 °C)



## The relationship for OCV and Capacity (25°C)



## The relationship for Charging voltage and Temperature

