

# **SLA Battery**

Capacity (25°C)	20HR (1.0A, 10.5V) = 20.0AH 10HR (1.93A, 10.5V) = 19.3AH 5HR (3.79A, 10.5V) = 18.99AH 1HR (12.98A, 10.5V) = 12.98AH
Operating Temperature Range	Charge = -15°C to +50°C Discharge = -20°C to +60°C Storage = -20°C to +60°C
Approx. Weight	5.70kg
Internal Resistance	Fully charged at 25°C : ≤ 16mΩ
Self Discharge	2% per month at (25°C)
Capacity Affected by Temp. (20HR)	40°C = 102% 25°C = 100% 0°C = 85% -15°C = 65%
Charge Voltage (25°C)	Cycle Use = 14.4-14.7V (-30mV/°C) Max Current = 6A Float Use = 13.5-13.8V (-20mV/°C)
Dimensions (Nominal)	Length: 181mm (7.12 in.) Width: 77mm (3.03 in.) Height: 167mm (6.57 in.) Total Height: 167mm (6.57 in.)

- Completely sealed, maintenance-free, low self-discharge
- State of the art AGM and grid alloy formula technology
- Non-spillable, stable quality and high reliability with excellent re-charging performance
- Floating and standby use up to: 6 years
- Cycle use: Up to 260 cycles at 100% DoD
- Cycle use: Up to 500 Cycles at 50% DoD
- Container and Cover Material –
   ABS UL94-HB (optional UL94-V0)
- Transportation D.O.T., I.A.T.A. & F.A.A.







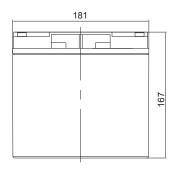


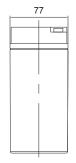


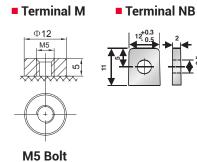
# APPLICATIONS

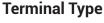
Multipurpose
Telecommunications
UPS
Medical Equipment

Alarm & Security System Comm. Power Supply Elec. Power System (EPS) Emergency Backup Power DC Power Supply
Auto Control System
Traffic Control Signaling
Emergency Lighting



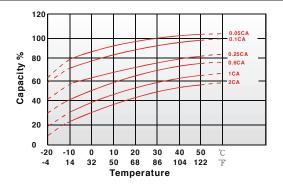




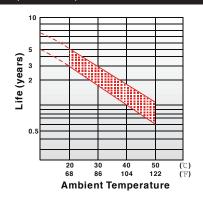


**REV V3.1** 

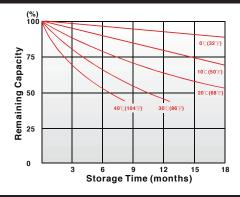
### Effect of Temperature on Capacity 25°C (77°F)



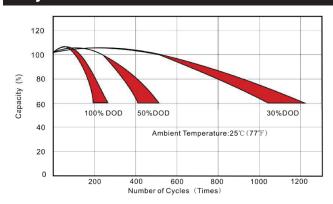
## Trickle (or Float) Service Life



## Capacity Retention Characteristic



### Cycle Service Life



#### Regular Charge / Float Charge / Storage

- Charging voltage temperature compensation needs to be applied when temperature is below 0°C and above +45°C.
- Charging in temperatures below 0°C, the charge current should not exceed 0.1C as the core battery temperature can increase rapidly and damage the battery.
- During floating charge or when in storage, the life of the battery is cut in half for every 8°C temperature rise over 25°C.

#### **Discharge**

- · Discharging at elevated temperatures improves performance of the battery yet shortens its life due to accelerated aging.
- Low temperature affects the battery internal resistance and lowers its capacity. The battery provides 100% specified capacity at 25°C. It will deliver 50% of its stated capacity at -20°C with 0.1C discharge current and 20% with 2C discharge current.

Constant Current Discharge (A) at 25°C (77°F)												
F.V/Time	5min	10min	15min	30min	1h	2h	3h	4h	5h	8h	10h	20h
1.80V/Cell	65.05	45.15	37.09	22.23	12.741	6.838	5.643	4.312	3.729	2.978	1.899	0.982
1.75V/Cell	66.27	46.00	37.79	22.65	12.980	6.966	5.749	4.392	3.799	3.034	1.934	1.000
170V/Cell	68.26	47.38	38.92	23.33	13.369	7.175	5.921	4.524	3.913	3.125	1.992	1.030
1.67V/Cell	70.91	49.22	40.43	24.23	13.889	7.453	6.151	4.700	4.065	3.247	2.070	1.070
1.60V/Cell	74.88	51.98	42.70	25.59	14.667	7.871	6.496	4.963	4.293	3.429	2.186	1.130

Constant Power Discharge (W) at 25°C (77°F)												
F.V/Time	5min	10min	15min	30min	1h	2h	3h	4h	5h	8h	10h	20h
1.80V/Cell	126.8	88.05	72.33	43.35	24.85	13.33	11.00	8.41	7.27	5.81	3.70	1.91
175V/Cell	129.2	89.70	73.69	44.16	25.31	13.58	11.21	8.57	7.41	5.92	3.77	1.95
1.70V/Cell	133.1	92.39	75.90	45.49	26.07	13.99	11.55	8.82	7.63	6.09	3.88	2.01
1.67V/Cell	138.3	95.98	78.84	47.25	27.08	14.53	12.00	9.16	7.93	6.33	4.04	2.09
1.60V/Cell	146.0	101.4	83.27	49.90	28.60	15.35	12.67	9.68	8.37	6.69	4.26	2.20

REV V3.1