

#### MHB MM Series—Medium-size Battery

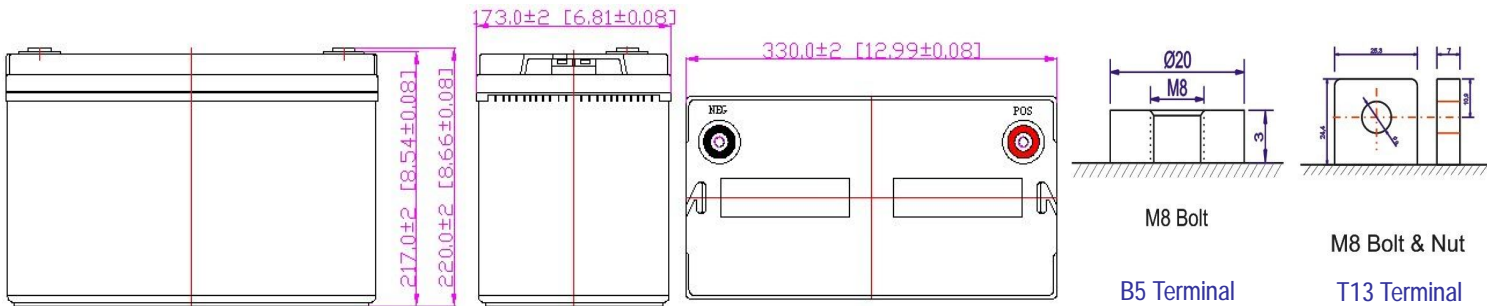
- High performance, completely maintenance-free, low self-discharge
- 100% precise quality testing, stable quality and high reliable performance
- Unique grid alloy formula and updated manufacturing technique
- Floating & standby use: up to 8 years
- Cycle use 1: Up to 260 cycles at 100% DOD
- Cycle use 2: Up to 500 cycles at 50% DOD

#### Application:

- Telecommunications
- Alarm and security system
- Uninterruptable Power Supply (UPS)
- Communication power supply
- Electric Power System (EPS)
- DC power supply
- Emergency backup power supply
- Auto control system

#### Construction:

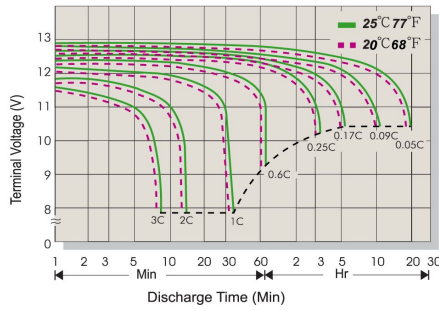
- Component .....Raw material
- Sealant .....Epoxy
- Positive .....Lead dioxide
- Safety valve .... Rubber
- Negative .....Lead
- Terminal .....Copper/Pb
- Container .....ABS
- Separator .....Fiber glass
- Cover .....ABS
- Electrolyte ..... Sulfuric acid



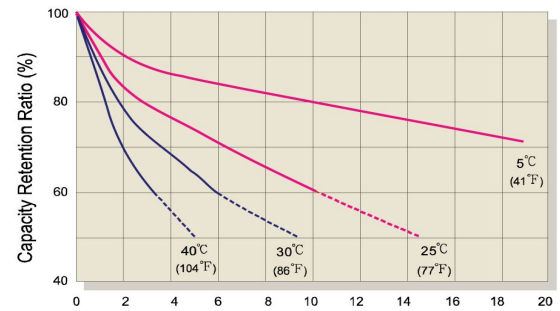
#### Speification:

Battery Model	MM 100-12B 12V100AH			
Designed Floating Life	Up to 8 Years			
Capacity (25°C)	20HR(5.000A,10.8V)	10HR(9.550A,10.8V)	5HR(16.740A,10.5V)	1HR(51.770A,10.5V)
	100.00 AH	95.50 AH	83.70 AH	51.77 AH
Dimensions	Length	Width	Height	Total Height
	330 mm	173 mm	217 mm	220 mm
Approx. Weight	28.00 KG±3%			
Internal Resistance	Full charged at 25°C: ≤7.40mΩ			
Self Discharge	2% of capacity declined per month at (25°C)			
Capacity Affected by Temp.(20HR)	40°C	25°C	0°C	-15°C
	102%	100%	85%	65%
Charge Voltage(25°C)	Cycle use		Float use	
	14.4-14.6V(-30mV/°C), max. Current:25.00A		13.5-13.8V (-20mV/°C)	

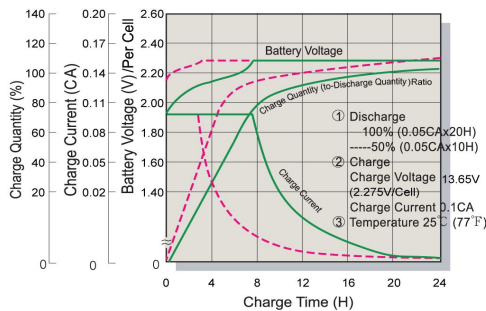
### Terminal Voltage (V) and Discharge Time



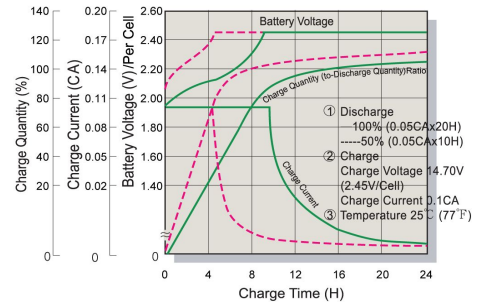
### Capacity Retention Characteristic



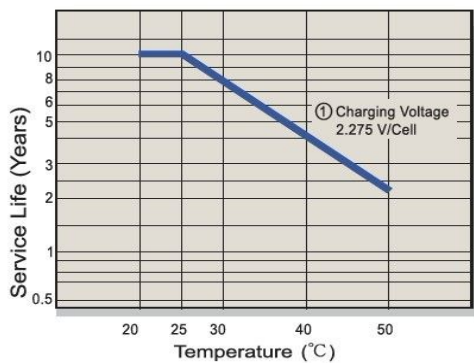
### Battery Voltage and Charge Time for Standby Use



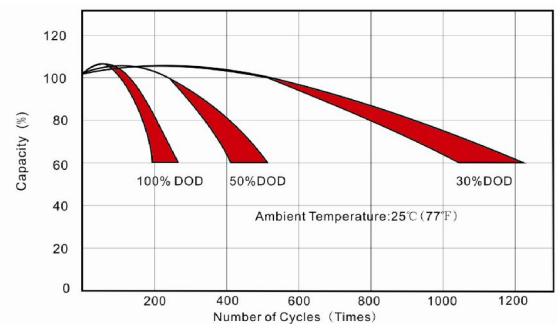
### Battery Voltage and Charge Time for Cycle Use



### Tickle(or Float) Service Life



### Cycle Service Life



### Constant Current Discharge (CC, Unit: A) at 25°C (77°F)

F.V/Time	5Min	10Min	15Min	30Min	1Hr	2Hr	3Hr	4Hr	5Hr	6Hr	10Hr	20Hr
1.80V/Cell	295.7	201.2	137.8	83.77	51.33	32.03	24.91	19.59	16.60	11.09	9.55	5.00
1.75V/Cell	298.3	202.9	138.9	84.48	51.77	32.31	25.12	19.75	16.74	11.19	9.69	5.08
1.70V/Cell	305.7	208.0	142.4	86.60	53.06	33.11	25.74	20.25	17.16	11.47	9.84	5.15
1.67V/Cell	313.2	213.0	145.9	88.71	54.35	33.92	26.37	20.74	17.58	11.75	9.98	5.23
1.60V/Cell	327.1	222.5	152.4	92.66	56.77	35.43	27.55	21.67	18.36	12.27	10.12	5.30

### Constant Power Discharge (CP, Unit: W) at 25°C (77°F)

F.V/Time	5Min	10Min	15Min	30Min	1Hr	2Hr	3Hr	4Hr	5Hr	6Hr	10Hr	20Hr
1.80V/Cell	576.7	392.3	268.6	163.4	100.1	62.47	48.57	38.20	32.38	21.63	18.62	9.75
1.75V/Cell	581.6	395.7	270.9	164.7	100.9	63.00	48.98	38.52	32.65	21.81	18.90	9.90
1.70V/Cell	596.1	405.5	277.7	168.9	103.5	64.57	50.20	39.48	33.47	22.36	19.18	10.04
1.67V/Cell	610.7	415.4	284.4	173.0	106.0	66.15	51.43	40.45	34.28	22.90	19.46	10.19
1.60V/Cell	637.9	433.9	297.1	180.7	110.7	69.09	53.72	42.25	35.81	23.92	19.74	10.34