



VRLA Battery

**MM 200 - 12** 12V 200Ah

**MM Series SLA Battery**

**MHB MS Series--Small-size batteries**

- 100% before shipment testing, stable and reliable long-term quality
- patented grid alloy formula and updated manufacturing technique
- completely sealed and maintenance-free, low self-discharge
- Excellent charging and re-charging acceptance
- Cycle use: More than 260 cycles at 100% DOD
- Floating & standby use: 3-5 years

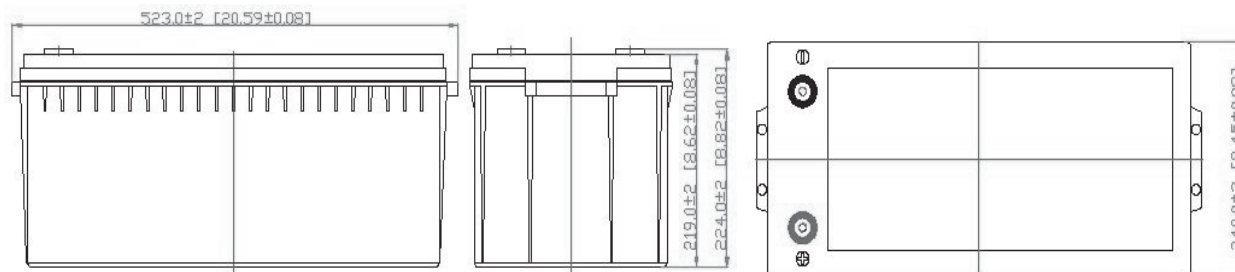
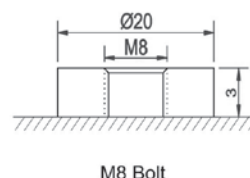


**Application:**

- Alarm System
- Cable Television
- Communication Equipment
- Emergency Power System
- Security System
- Medical Equipment
- UPS
- Power tools
- Control Equipment
- Toys

**Construction:**

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



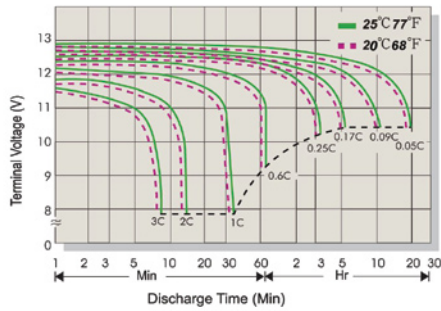
**Specification:**

Battery Model	MM 200 - 12 12V 200AH			
Designed Floating Life	Up to 8 Years			
Capacity@(40°C)	20HR (10.61A,10.8V)	10HR (20.0A,10.8V)	5HR (38.9A,10.5V)	1HR (130.3A,10.5V)
	212.2 AH	200.0AH	194.5AH	130.3AH
Dimensions	Length	Width	Height	Total Height
	523mm(20.59inch)	240mm(9.45inch)	219mm(8.62inches)	224mm (8.82inch)
Approx. Weight	57.90Kg (127.67 lbs)			
Internal Resistance	Full charged at 25°C: ≤ 4.5m Ω			
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: 60A		13.6-13.8V (-20mV/°C)	

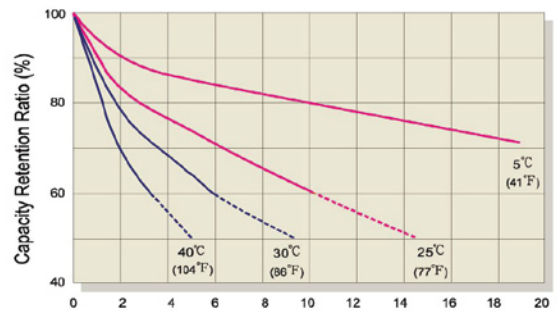
**FUJIAN MINHUA POWER SOURCE CO., LTD.**

www.mhb-battery.com

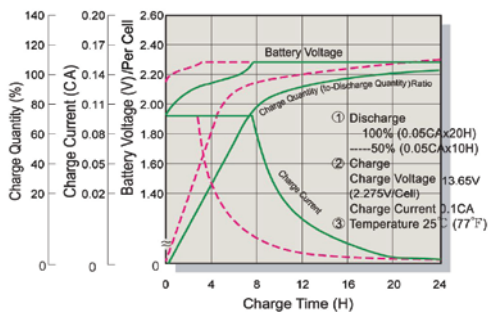
### Terminal Voltage (V) and Discharge Time



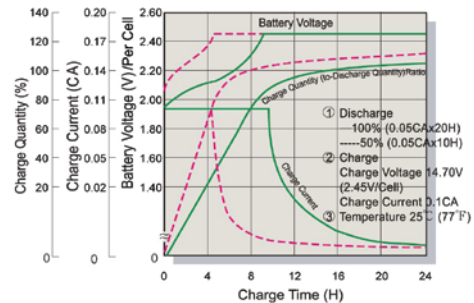
### Capacity Retention Characteristic



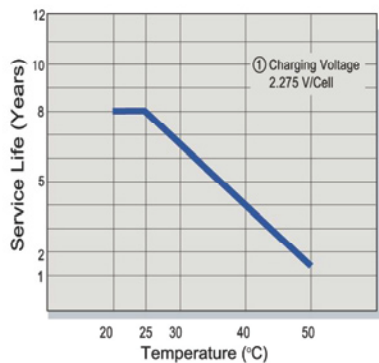
### Battery Voltage and Charge Time for Standby Use



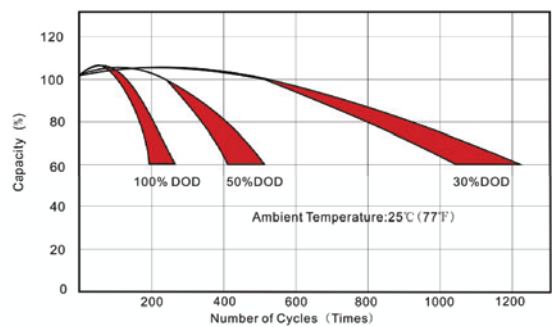
### Battery Voltage and Charge Time for Cycle Use



### Tickle(or Float) Service Life



### Cycle Service Life



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

F.V/Time	5Min	10Min	15Min	30Min	1Hr	2Hr	3Hr	4Hr	5Hr	6Hr	10Hr	20Hr
1.85V/Cell	710.96	419.69	329.86	215.02	125.49	72.54	55.71	45.74	37.48	30.56	19.65	10.41
1.80V/Cell	724.54	427.71	336.16	219.13	127.89	73.93	56.77	46.62	38.20	31.14	20.00	10.61
1.75V/Cell	738.12	435.72	342.46	223.24	130.28	75.31	57.83	47.49	38.92	31.73	20.40	10.81
1.70V/Cell	804.55	461.87	363.01	232.14	132.58	76.64	58.85	48.33	39.60	32.28	20.76	11.00
1.67V/Cell	885.75	501.08	393.83	245.11	134.00	77.46	59.48	48.84	40.03	32.63	20.98	11.12

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

F.V/Time	5Min	10Min	15Min	30Min	1Hr	2Hr	3Hr	4Hr	5Hr	6Hr	10Hr	20Hr
1.85V/Cell	1386.3	818.39	643.22	419.29	244.71	141.46	108.62	89.20	73.09	59.59	38.32	20.31
1.80V/Cell	1412.8	834.03	655.51	427.30	249.38	144.16	110.70	90.90	74.49	60.73	39.00	20.70
1.75V/Cell	1439.3	849.66	667.80	435.31	254.05	146.86	112.78	92.61	75.89	61.86	39.78	21.08
1.70V/Cell	1568.8	900.64	707.86	452.68	258.53	149.44	114.76	94.24	77.22	62.95	40.48	21.45
1.67V/Cell	1727.2	977.11	767.96	477.97	261.30	151.05	115.99	95.25	78.05	63.63	40.91	21.68