



MSJ series MSJ-150



Valve Regulated Lead Acid Battery

Maintenance-Free Sealed Lead Acid Battery.
Absorbent Glass Mat (AGM) technology for efficient gas recombination of up to 99%.

General Design for Standby Power Applications

【Design Life】

Up to 20 Years in Standby Service at 25°C
Eurobat (20°C) : >12 YEARS VERY LONG LIFE

【Operating Temperature Range】

Nominal Operating Temperature : 25°C (77°F)
Discharge : -15°C ~ 50°C (5°F~122°F)
Charge: -15°C ~ 40°C (5°F~104°F)
Storage: -15°C ~ 40°C (5°F~104°F)

【Float Charging Voltage】

2.21 ~ 2.25 VDC/Unit at 25°C (77°F)

【Equalization Charging Voltage】

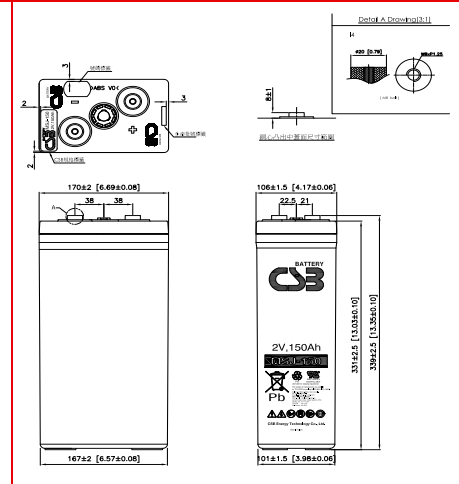
2.35 VDC/Unit at 25°C (77°F)

【Self Discharge】

Less than 10% after 90 days, can be stored up to 6 months at 25°C (77°F);
Fully recharging is required before usage, and charged sooner if stored at higher temperature than 25°C (77°F).

Specification

| | | | |
|----------------------------|---|--------------|-----------------|
| Nominal Voltage | 2V (single cell per unit) | | |
| Nominal Capacity | 150 Ah @10hr-rate to 1.80V per cell @25°C (77°F) | | |
| Weight | Approx. 12.80 Kg (28.81 lbs) | | |
| Maximum Discharge Current | 900 A (5sec) | | |
| Internal Resistance | Approx. 0.54 mΩ | | |
| Short Circuit Current | 2848A | | |
| Maximum Charge Current | 45 A | | |
| Terminal types | I4 thread copper alloy terminal to accept M8 bolt | | |
| Terminal tightening torque | 126±25 Kgf·cm / 109±22 Lbf·in / 12.3±2.5 N·m | | |
| Container Material | Flame Retardant ABS (UL 94-V0) | | |
| Dimensions | Depth (D) | 170.0±2.0 mm | 6.69±0.08 inch |
| | Width (W) | 106.0±1.5 mm | 4.17±0.06 inch |
| | Container height (h) | 331.0±2.5 mm | 13.03±0.10 inch |
| | Overall Height (H) | 339.0±2.5 mm | 13.15±0.10 inch |



Constant Current Discharge Characteristics Unit: A (25°C, 77°F)

| F.V/Time | 15MIN | 30MIN | 60MIN | 2HR | 2.5HR | 3HR | 5HR | 6HR | 8HR | 10HR | 20HR | 24HR |
|----------|-------|-------|-------|------|-------|------|------|------|------|------|------|------|
| 1.60V | 286 | 192 | 117 | 67.2 | 56.0 | 48.2 | 30.4 | 25.7 | 20.1 | 16.6 | 8.32 | 6.93 |
| 1.67V | 256 | 182 | 114 | 66.4 | 55.4 | 47.7 | 30.1 | 25.5 | 19.9 | 16.5 | 8.26 | 6.88 |
| 1.70V | 241 | 176 | 112 | 65.9 | 54.9 | 47.4 | 29.9 | 25.3 | 19.8 | 16.4 | 8.22 | 6.85 |
| 1.75V | 217 | 160 | 107 | 64.4 | 53.8 | 46.5 | 29.4 | 24.9 | 19.6 | 16.2 | 8.11 | 6.76 |
| 1.80V | 185 | 142 | 98.4 | 61.6 | 51.7 | 44.9 | 28.5 | 24.3 | 19.1 | 15.8 | 7.90 | 6.58 |
| 1.83V | 164 | 130 | 92.1 | 58.9 | 49.6 | 43.1 | 27.5 | 23.5 | 18.5 | 15.4 | 7.68 | 6.40 |

Constant Power Discharge Characteristics Unit: W (25°C, 77°F)

| F.V/Time | 15MIN | 30MIN | 60MIN | 2HR | 2.5HR | 3HR | 5HR | 6HR | 8HR | 10HR | 20HR | 24HR |
|----------|-------|-------|-------|-----|-------|------|------|------|------|------|------|------|
| 1.60V | 501 | 348 | 213 | 128 | 107 | 92.0 | 60.3 | 51.7 | 39.6 | 31.0 | 15.5 | 12.9 |
| 1.67V | 466 | 334 | 209 | 127 | 106 | 91.2 | 59.9 | 51.4 | 39.3 | 30.8 | 15.4 | 12.8 |
| 1.70V | 448 | 326 | 206 | 126 | 105 | 90.7 | 59.7 | 51.2 | 39.1 | 30.6 | 15.3 | 12.7 |
| 1.75V | 409 | 305 | 198 | 124 | 103 | 89.2 | 58.9 | 50.5 | 38.5 | 30.2 | 15.1 | 12.6 |
| 1.80V | 367 | 275 | 185 | 119 | 100 | 86.4 | 57.4 | 49.3 | 37.4 | 29.3 | 14.7 | 12.2 |
| 1.83V | 331 | 256 | 174 | 114 | 96.1 | 83.5 | 55.9 | 48.0 | 36.2 | 28.4 | 14.2 | 11.8 |

Please refer to the official site for the latest rating confirmation. URL: www.csb-battery.com

Issued: 201112

Sales Offices

希世比能源科技股份有限公司
CSB Energy Technology Co., Ltd.

BUSINESS HEADQUARTERS

Tel: +886-2-2880-5600
Fax: +886-2-2888-3300

USA OFFICE

Tel: +1-817-244-7777 / 1-(800)3-CSB-USA (272872)
Fax: +1-817-244-4445

SHENZHEN OFFICE (CHINA)

Tel: +86-755-8831-6488/6775/6075
Fax: +86-755-8831-6548

EUROPE (EMEA) OFFICE

Tel: +31(0)180-418-140
Fax: +31(0)180-418-327

SHANGHAI OFFICE (CHINA)

Tel: +86-21-5046-1622/0833/0094
Fax: +86-21-5046-1046

Recognized under UL 1989,
and certified by ISO 9001, 14001, 45001, 50001.



TAIPEI OFFICE

Tel: +886-2-2880-5600
Fax: +886-2-2888-3300

BEIJING OFFICE (CHINA)

Tel: +86-10-6597-8065/8165/8265
Fax: +86-10-6597-8565