



GP series

GP 12400 12V 40AH

Valve Regulated Lead Acid Battery

Maintenance-Free Sealed Lead Acid Battery.

Absorbent Glass Mat (AGM) technology for efficient gas recombination of up to 99%.

Design for Standby Power Applications

【Design Life】

Up to 5 Years in Standby Service at 25°C
Eurobat (20°C) : 3-5 years, Standard Commercial

【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】

13.5 ~ 13.8 VDC/Unit at 25°C (77°F)

【Equalization Charging Voltage】

14.4 ~ 15.0 VDC/Unit at 25°C (77°F)

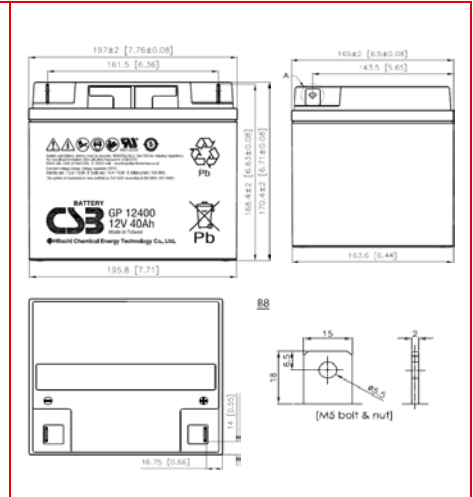
【Self Discharge】

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

Design according with IEC 61056-1/2: 2012

| | | |
|---------------------------|---|----------------------------------|
| Nominal Voltage | 12V (6 cells per unit) | |
| Nominal Capacity | 40 Ah @20hr-rate to 1.75V per cell @25°C (77°F) | |
| Weight | Approx. 12.63 Kg (27.84 lbs) | |
| Maximum Discharge Current | 400A (5sec) | |
| Internal Resistance | Approx. 8.5mΩ | |
| Short Circuit Current | 1012A | |
| Maximum Charge Current | 12.0A | |
| Terminal types | B8 terminal to accept M5 bolt | |
| Terminal hardware Torque | 59 Kgf-cm / 51 Lbf-in / 5.73 N-m | |
| Container Material | ABS (UL 94-HB) & Flame Retardant (94-V0) available upon request | |
| Dimensions | Length (L) | 197.0±2.0 mm 7.76±0.08 inch |
| | Width (W) | 165.0±2.0 mm 6.50±0.08 inch |
| | Container Height (h) | 170.4±2.0 mm 6.71±0.08 inch |
| | Overall Height (H) | 170.4±2.0 mm 6.71±0.08 inch |



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

| F.V/Time | 5 MIN | 10MIN | 15MIN | 30MIN | 60MIN | 90MIN | 2HR | 3HR | 5HR | 8HR | 10HR | 20HR |
|----------|-------|-------|-------|-------|-------|-------|------|------|------|------|------|------|
| 1.60V | 176 | 113 | 85.0 | 51.8 | 30.6 | 22.2 | 17.7 | 12.6 | 8.01 | 5.25 | 4.28 | 2.21 |
| 1.67V | 157 | 105 | 81.0 | 50.8 | 30.3 | 22.1 | 17.6 | 12.5 | 7.98 | 5.19 | 4.19 | 2.11 |
| 1.70V | 149 | 101 | 78.7 | 50.1 | 30.2 | 21.9 | 17.5 | 12.4 | 7.96 | 5.17 | 4.16 | 2.08 |
| 1.75V | 135 | 95.0 | 75.5 | 49.0 | 30.0 | 21.8 | 17.4 | 12.3 | 7.93 | 5.10 | 4.09 | 2.00 |
| 1.80V | 121 | 88.3 | 71.7 | 47.6 | 29.8 | 21.7 | 17.3 | 12.2 | 7.88 | 5.03 | 4.03 | 1.93 |
| 1.85V | 107 | 81.7 | 67.8 | 46.2 | 29.4 | 21.5 | 17.2 | 12.1 | 7.85 | 4.96 | 3.96 | 1.85 |

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

| F.V/Time | 5MIN | 10MIN | 15MIN | 30MIN | 60MIN | 90MIN | 2HR | 3HR | 5HR | 8HR | 10HR | 20HR |
|----------|------|-------|-------|-------|-------|-------|-----|-----|------|------|------|------|
| 1.60V | 2110 | 1350 | 1020 | 622 | 367 | 266 | 212 | 151 | 96.1 | 63.0 | 51.3 | 26.5 |
| 1.67V | 1886 | 1259 | 972 | 606 | 364 | 264 | 211 | 150 | 95.7 | 62.3 | 50.4 | 25.4 |
| 1.70V | 1790 | 1214 | 945 | 600 | 363 | 263 | 210 | 149 | 95.5 | 62.0 | 50.0 | 24.9 |
| 1.75V | 1620 | 1140 | 902 | 585 | 360 | 262 | 209 | 148 | 95.2 | 61.2 | 49.2 | 24.1 |
| 1.80V | 1450 | 1060 | 860 | 571 | 357 | 260 | 208 | 147 | 94.8 | 60.4 | 48.3 | 23.2 |
| 1.85V | 1280 | 980 | 814 | 555 | 353 | 258 | 207 | 146 | 94.2 | 59.6 | 47.5 | 22.4 |

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

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

