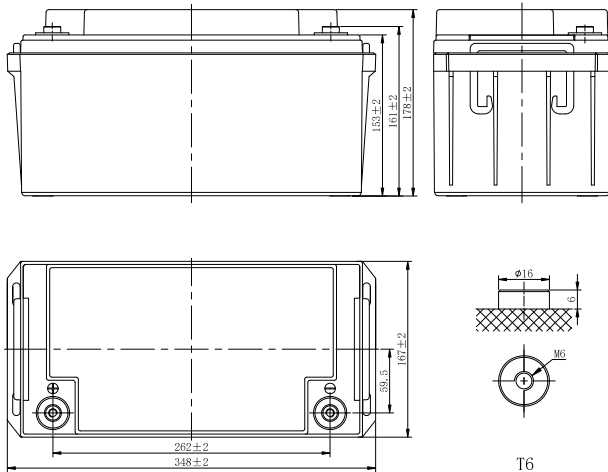


LP SERIES-GENERAL PURPOSE

LP12-70 (12V70Ah)



CHARACTERISTICS

| Item | Specifications | |
|-------------------------------|--|---------------------|
| Rated Voltage | 12V | |
| Nominal Capacity (25°C) | C ₁₀ : 1.80V/cell | 70Ah |
| Dimension | Length | 348mm (13.7inches) |
| | Width | 167mm (6.57inches) |
| | Container Height | 178mm (7.01inches) |
| | Total Height | 178mm (7.01inches) |
| Approx Weight | 21.4kg (47.2lbs) | |
| Terminal | T6(M6) | |
| Container Material | ABS (UL94 HB or V-0 optional) | |
| Short-circuit current | 1610A | |
| Internal Resistance (25°C) | Approx 6.6 mΩ (Fully charged) | |
| Operating Temp. Range | Discharge | -15~50°C (5~122°F) |
| | Charge | -20~40°C (-4~104°F) |
| | Storage | -15~40°C (5~104°F) |
| Nominal Operating Temp. Range | 25±3°C (77±5°F) | |
| Max. Charging Current (25°C) | 0.3C | |
| Charge voltage (25°C) | Standby Use | Cycle Use |
| | 2.25-2.30V/cell | 2.35-2.40V/cell |
| Temp. Coefficient | -3mV/cell/°C | -5mV/cell/°C |
| | 40°C (104°F) | 103% |
| Effect of temp. to Capacity | 25°C (77°F) | 100% |
| | 0°C (32°F) | 86% |
| | ≤3% per month at 25°C (77°F). LP series batteries may be stored up to 6 months at 25°C (77°F) and then a freshening charge is required. For higher temperatures the time interval will be shorter. | |
| Self Discharge | | |

DISCHARGE TABLE

| Constant Current Discharge (Amperes) at 25°C (77°F) | | | | | | | | | | | | | | | | |
|--|-------|-------|-------|-------|-------|-------|------|------|------|------|------|------|------|------|------|------|
| F.V/Time | 5min | 10min | 15min | 20min | 30min | 45min | 1h | 1.5h | 2h | 3h | 4h | 5h | 6h | 8h | 10h | 20h |
| 1.85V/cell | 139.8 | 99.4 | 89.8 | 70.6 | 63.1 | 46.2 | 39.1 | 28.3 | 23.8 | 17.5 | 13.7 | 11.9 | 10.5 | 8.07 | 6.69 | 3.55 |
| 1.80V/cell | 159.0 | 112.8 | 101.7 | 79.8 | 68.7 | 48.9 | 40.5 | 29.3 | 24.6 | 19.0 | 14.6 | 12.5 | 11.3 | 8.49 | 7.00 | 3.68 |
| 1.75V/cell | 172.7 | 122.4 | 110.2 | 86.2 | 70.1 | 50.7 | 42.5 | 30.8 | 25.9 | 19.3 | 14.9 | 12.7 | 11.4 | 8.53 | 7.07 | 3.71 |
| 1.70V/cell | 184.6 | 130.5 | 117.0 | 91.4 | 71.5 | 51.7 | 43.4 | 31.4 | 26.4 | 19.7 | 15.2 | 13.0 | 11.5 | 8.66 | 7.14 | 3.75 |
| 1.67V/cell | 191.1 | 134.6 | 120.4 | 93.9 | 72.6 | 52.5 | 44.0 | 31.9 | 26.8 | 19.9 | 15.4 | 13.2 | 11.6 | 8.79 | 7.23 | 3.80 |
| 1.60V/cell | 197.8 | 139.2 | 124.1 | 96.3 | 73.6 | 53.2 | 44.6 | 32.3 | 27.2 | 20.1 | 15.6 | 13.4 | 11.7 | 8.90 | 7.32 | 3.84 |
| Constant Power Discharge (Watts/cell) at 25°C (77°F) | | | | | | | | | | | | | | | | |
| F.V/Time | 5min | 10min | 15min | 20min | 30min | 45min | 1h | 1.5h | 2h | 3h | 4h | 5h | 6h | 8h | 10h | 20h |
| 1.85V/cell | 261.1 | 187.0 | 164.9 | 130.3 | 117.0 | 87.0 | 73.4 | 53.3 | 45.0 | 33.1 | 26.1 | 22.7 | 20.1 | 15.5 | 12.9 | 6.85 |
| 1.80V/cell | 292.1 | 209.2 | 184.5 | 145.7 | 126.4 | 91.6 | 75.6 | 54.9 | 46.2 | 35.8 | 27.8 | 23.8 | 21.5 | 16.3 | 13.5 | 7.09 |
| 1.75V/cell | 311.8 | 223.3 | 196.9 | 155.5 | 128.0 | 94.3 | 79.0 | 57.4 | 48.4 | 36.4 | 28.2 | 24.2 | 21.6 | 16.4 | 13.6 | 7.15 |
| 1.70V/cell | 327.7 | 234.7 | 207.0 | 163.5 | 129.5 | 95.5 | 80.1 | 58.3 | 49.2 | 37.0 | 28.6 | 24.5 | 21.7 | 16.6 | 13.7 | 7.22 |
| 1.67V/cell | 333.1 | 238.6 | 210.3 | 166.2 | 130.4 | 96.4 | 80.8 | 58.9 | 49.7 | 37.1 | 28.9 | 24.9 | 21.8 | 16.8 | 13.9 | 7.30 |
| 1.60V/cell | 337.7 | 241.9 | 213.3 | 168.5 | 130.9 | 96.9 | 81.4 | 59.3 | 50.1 | 37.3 | 29.1 | 25.1 | 21.9 | 16.9 | 14.0 | 7.37 |

LP SERIES-GENERAL PURPOSE

LP12-70 (12V70Ah)



APPLICATIONS

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

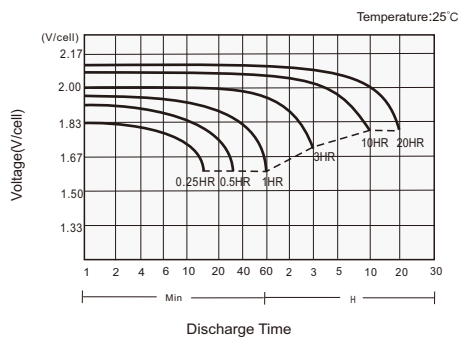
GENERAL FEATURES

- 10 years design life (25°C)
- Lead calcium alloy, sealed design, no watering required
- Puncture resistant micro-porous glass mat separators extend life
- Unique technology optimizes power capacity, cell consistency, and long-term reliability
- Designed for a wide range of applications

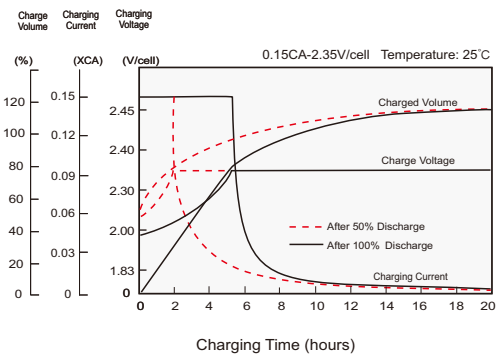
STANDARDS

- Compliance with IEC 60896 standards, EU Battery Directive
- UL, CE Approved
- Manufactured in Leoch@IATF 16949, ISO 45001, ISO 9001 and ISO 14001 certified production facilities

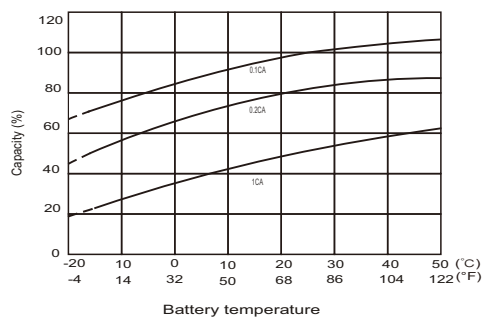
Discharge Characteristics



Charging Characteristics



Effects of Temperature on Capacity



Self Discharge Characteristics

