

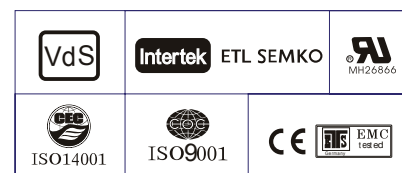
### Specifications

|                                  |  |                               |
|----------------------------------|--|-------------------------------|
| Nominal Voltage                  | 12V  |                               |
| Nominal Capacity(20HR)           | 12.00AH  |                               |
| Dimension                        | Length   | 151 ± 1mm (5.95 inches)       |
|                                  | Width  | 98 ± 1mm (3.86 inches)        |
|                                  | Container Height   | 95 ± 1mm (3.74 inches)        |
|                                  | Total Height (with Terminal)   | 101 ± 1mm (3.98 inches)       |
| Approx Weight                    | Approx 3.56 kg (7.85lbs)   |                               |
| Terminal                         | T1 / T2  |                               |
| Container Material               | ABS  |                               |
| Rated Capacity                   | 12.00 AH/0.582A  | (20hr, 1.80V/cell, 20°C/68°F) |
|                                  | 10.8 AH/1.08A  | (10hr, 1.80V/cell, 20°C/68°F) |
|                                  | 9.80AH/1.96A   | (5hr, 1.75V/cell, 20°C/68°F)  |
|                                  | 8.82 AH/2.94A  | (3hr, 1.75V/cell, 20°C/68°F)  |
|                                  | 7.16AH/7.16A   | (1hr, 1.60V/cell, 20°C)       |
| Max. Discharge Current           | 180A (5s)  |                               |
| Internal Resistance              | Approx 14mΩ  |                               |
| Operating Temp. Range            | Discharge : -15~50°C (5~122°F)   |                               |
|                                  | Charge : 0~40°C (32~104°F)   |                               |
|                                  | Storage : -15~40°C (5~104°F)   |                               |
| Nominal Operating Temp. Range    | 20 ± 3°C (68 ± 5°F)  |                               |
| Cycle Use                        | Initial Charging Current less than 3.6A. Voltage   |                               |
|                                  | 14.25V~14.85V at 20°C(68°F)Temp. Coefficient -30mV/°C  |                               |
| Standby Use                      | No limit on Initial Charging Current Voltage   |                               |
|                                  | 13.4V~13.7V at 20°C(68°F)Temp. Coefficient -20mV/°C  |                               |
| Capacity affected by Temperature | 40°C (104°F)   | 103%                          |
|                                  | 25°C (77°F)  | 100%                          |
|                                  | 0°C (32°F)   | 86%                           |
| Self Discharge                   | XLNT power XLT series batteries may be stored for up to 6 months at 20°C (68°F) and then a freshening charge is required. For higher temperatures the time interval will be shorter. |                               |



### Applications

- ◆ All purpose
- ◆ Uninterruptable Power Supply (UPS)
- ◆ Electric Power System (EPS)
- ◆ Emergency backup power supply
- ◆ Emergency light
- ◆ Railway signal
- ◆ Aircraft signal
- ◆ Alarm and security system
- ◆ Electronic apparatus and equipment
- ◆ Communication power supply
- ◆ DC power supply
- ◆ Auto control system



### Constant Current Discharge (Amperes) at 20°C (68°F)

| F.V/Time   | 5min | 10min | 15min | 20min | 30min | 45min | 1h   | 2h   | 3h   | 4h   | 5h   | 6h   | 8h   | 10h  | 20h   |
|------------|------|-------|-------|-------|-------|-------|------|------|------|------|------|------|------|------|-------|
| 1.85V/cell | 21.7 | 16.7  | 13.8  | 11.9  | 9.23  | 6.80  | 5.73 | 3.43 | 2.68 | 2.18 | 1.78 | 1.56 | 1.26 | 1.05 | 0.576 |
| 1.80V/cell | 29.1 | 21.3  | 16.7  | 14.1  | 10.9  | 7.91  | 6.42 | 3.74 | 2.88 | 2.33 | 1.91 | 1.67 | 1.33 | 1.08 | 0.582 |
| 1.75V/cell | 32.9 | 23.4  | 18.2  | 15.2  | 11.3  | 8.21  | 6.72 | 3.88 | 2.94 | 2.38 | 1.96 | 1.72 | 1.36 | 1.11 | 0.588 |
| 1.70V/cell | 36.2 | 25.5  | 19.5  | 16.0  | 11.8  | 8.54  | 6.93 | 3.97 | 3.02 | 2.44 | 2.01 | 1.75 | 1.38 | 1.13 | 0.598 |
| 1.65V/cell | 39.9 | 27.5  | 20.7  | 17.0  | 12.4  | 8.75  | 7.09 | 4.03 | 3.15 | 2.53 | 2.06 | 1.79 | 1.40 | 1.16 | 0.606 |
| 1.60V/cell | 44.0 | 29.9  | 22.1  | 18.1  | 13.1  | 9.12  | 7.16 | 4.20 | 3.24 | 2.61 | 2.13 | 1.83 | 1.41 | 1.17 | 0.610 |

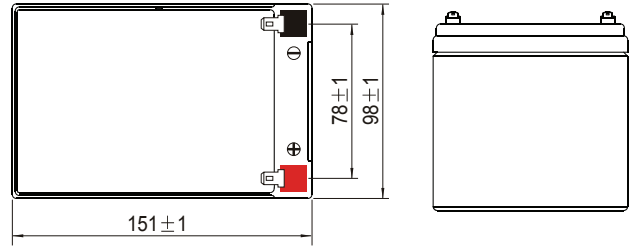
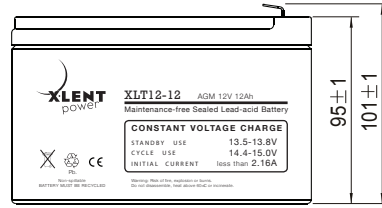
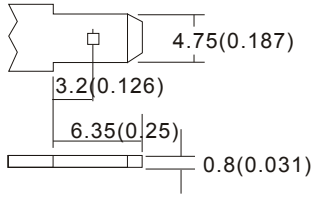
### Constant Power Discharge (Watts) at 20°C (68°F)

| F.V/Time   | 5min | 10min | 15min | 20min | 30min | 45min | 1h   | 2h   | 3h   | 4h   | 5h   | 6h   | 8h   | 10h  | 20h  |
|------------|------|-------|-------|-------|-------|-------|------|------|------|------|------|------|------|------|------|
| 1.85V/cell | 39.7 | 30.8  | 25.8  | 22.5  | 17.6  | 13.1  | 11.1 | 6.65 | 5.23 | 4.26 | 3.48 | 3.06 | 2.48 | 2.08 | 1.14 |
| 1.80V/cell | 52.7 | 38.9  | 30.7  | 26.2  | 20.4  | 15.1  | 12.3 | 7.21 | 5.59 | 4.53 | 3.72 | 3.27 | 2.62 | 2.14 | 1.15 |
| 1.75V/cell | 58.2 | 42.0  | 33.1  | 27.9  | 21.1  | 15.5  | 12.8 | 7.45 | 5.67 | 4.61 | 3.81 | 3.35 | 2.66 | 2.19 | 1.16 |
| 1.70V/cell | 62.3 | 44.8  | 34.9  | 29.1  | 21.8  | 16.1  | 13.2 | 7.62 | 5.82 | 4.72 | 3.90 | 3.42 | 2.70 | 2.24 | 1.18 |
| 1.65V/cell | 67.7 | 47.9  | 36.8  | 30.7  | 22.8  | 16.3  | 13.4 | 7.69 | 6.04 | 4.87 | 3.99 | 3.48 | 2.73 | 2.28 | 1.20 |
| 1.60V/cell | 72.9 | 50.8  | 38.7  | 32.4  | 23.9  | 16.9  | 13.5 | 7.98 | 6.20 | 5.01 | 4.11 | 3.54 | 2.75 | 2.30 | 1.21 |

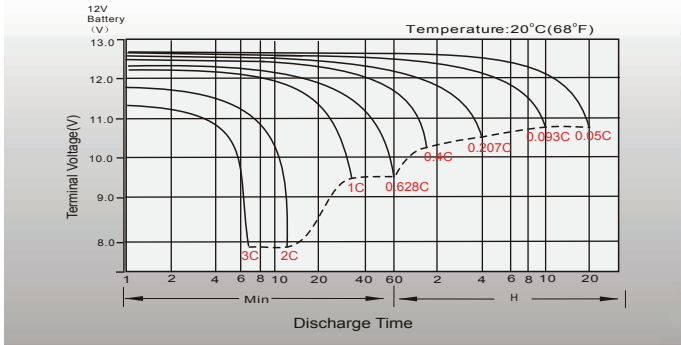
## Dimensions

### T1 Terminal

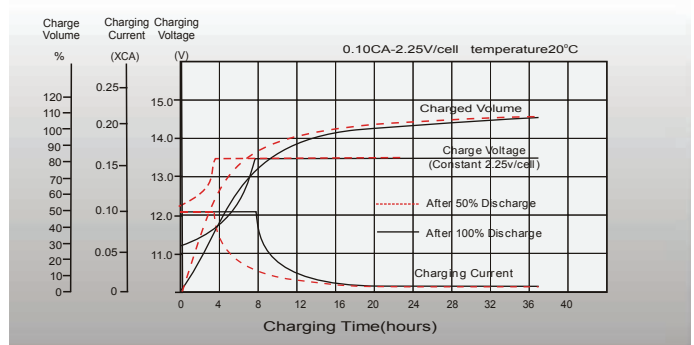
Unit: mm [inches]



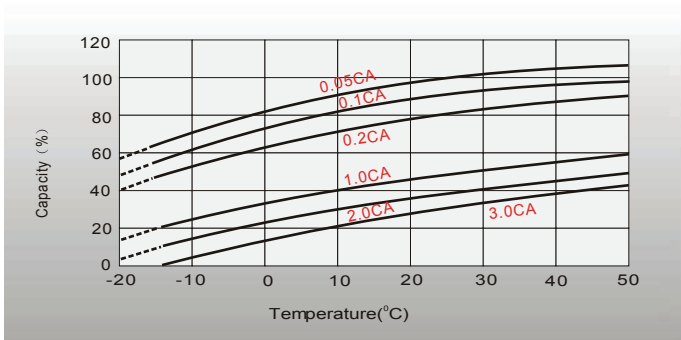
## Discharge Characteristics



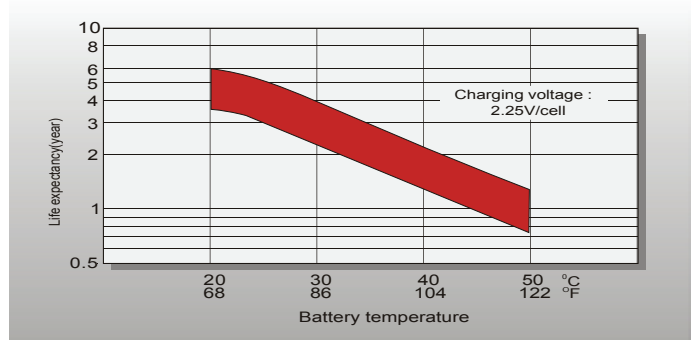
## Float Charging Characteristics



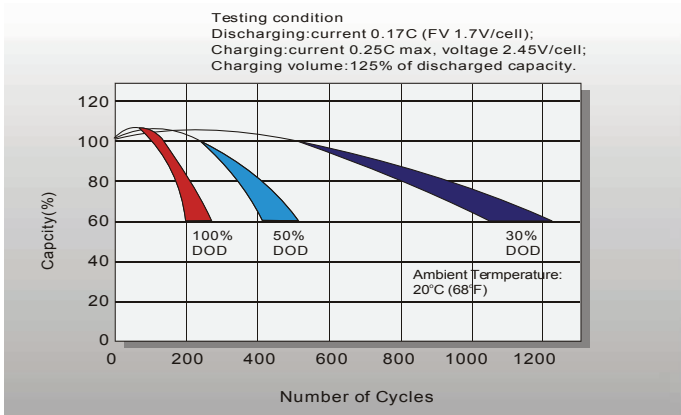
## Temperature Effects in Relation to Battery Capacity



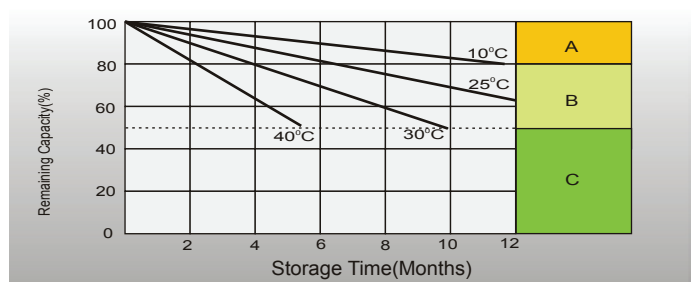
## Effect of Temperature on Long Term Float Life



## Cycle Life in Relation to Depth of Discharge



## Self Discharge Characteristics



- A** No supplementary charge required (Carry out supplementary charge before use if 100% capacity is required.)
- B** Supplementary charge required before use. Optional charging way as below:  
 1. Charged for above 3 days at limited current 0.25CA and constant voltage 2.25V/cell.  
 2. Charged for above 20 hours at limited current 0.25CA and constant voltage 2.45V/cell.  
 3. Charged for 8-10 hours at limited current 0.05CA.
- C** Supplementary charge may often fail to recover the capacity. The battery should never be left standing till this is reached.