

# URB1270

## Technical Datasheet



**LITHIUM POWER®**

## Li-Ion LFP Benefits Over SLA

- Uniform voltage during discharge
- No need to provide trickle charging to retain battery's charge
- Significantly lighter weight for the same amount of energy
- Battery does not outgas during use
- Nominal voltage is maintained over a wider temperature range

## Features

- Can be properly charged using a 2 phase SLA charger
- IEC 62133-2:2017 compliant

## Applications

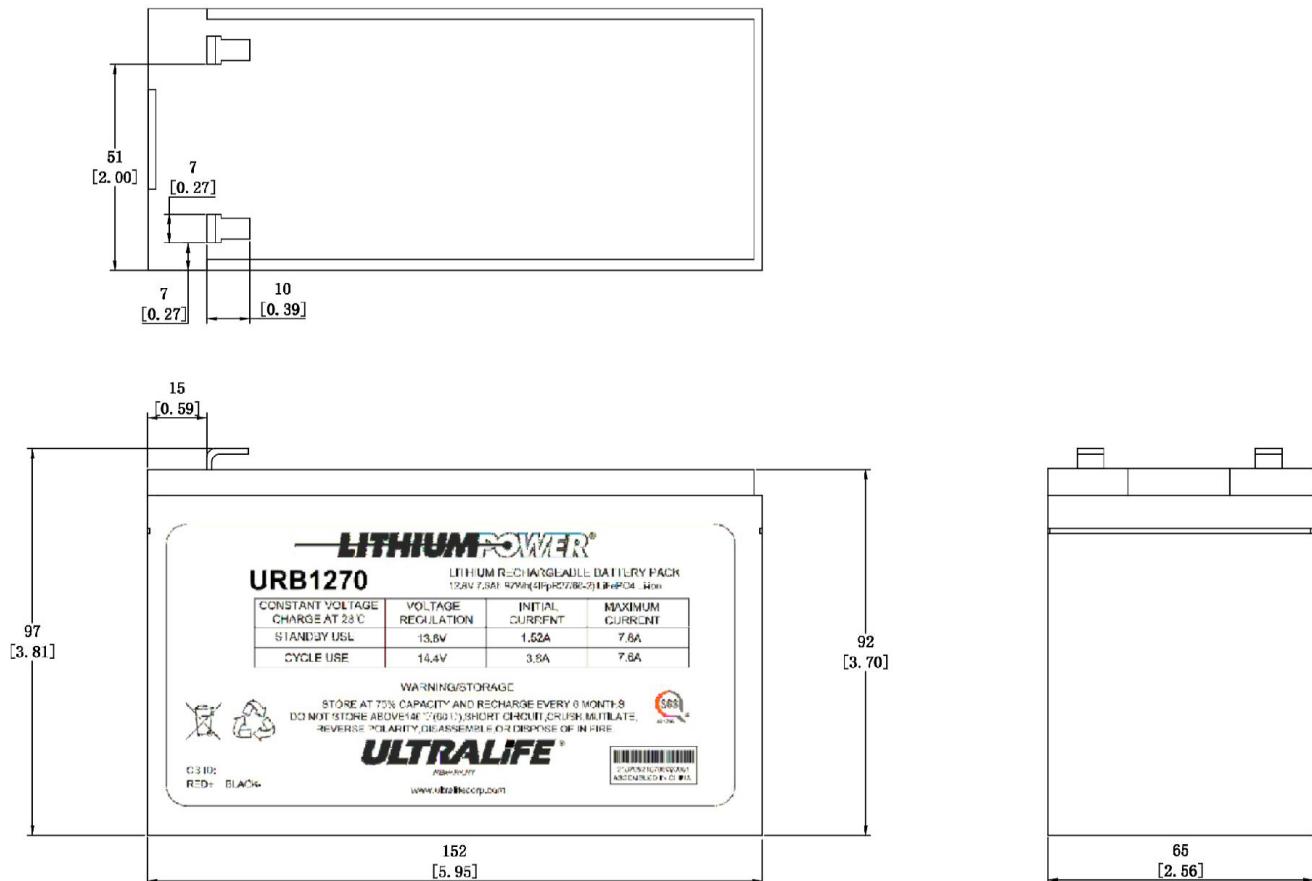
- Scooters / wheelchairs
- UPS battery replacement
- Solar power battery

| Constant Voltage Charge at +23°C | Voltage Regulation | Initial Current | Maximum Current |
|----------------------------------|--------------------|-----------------|-----------------|
| Standby Use                      | 13.6V              | 1.52A           | 7.6A            |
| Cycle Use                        | 14.4V              | 3.8A            | 7.6A            |

## Technical Specifications

|                                   |  |                    |
|-----------------------------------|--|--------------------|
| <b>Part No</b>                    | URB1270  |                    |
| <b>Chemistry</b>                  | Lithium Iron Phosphate (LFP)   |                    |
| <b>IEC Designation</b>            | 4IFpR27/66-2   |                    |
| <b>Average Voltage</b>            | 12.8V  |                    |
| <b>Nominal Capacity</b>           | 7.6Ah (see note 1)   |                    |
| <b>Voltage Range</b>              | 10.0V - 14.4V  |                    |
| <b>Max. Continuous Discharge</b>  | 15.0A  |                    |
| <b>Max. Pulse Discharge</b>       | 55A (see note 2)   |                    |
| <b>Energy</b>                     | 97Wh (see note 1)  |                    |
| <b>Energy Density</b>             | 97Wh/kg, 107Wh/l   |                    |
| <b>Weight</b>                     | Approx. 1.0 ± 0.1kg (2.2 ± 0.2lbs)   |                    |
| <b>Cycle Life</b>                 | >1,500 cycles (see note 3)   |                    |
| <b>Operating Temperature</b>      | -20°C to +60°C discharging<br>0°C to +45°C charging  |                    |
| <b>Storage Temperature</b>        | 0°C to +40°C   |                    |
| <b>Internal Resistance</b>        | ≤70mΩ  |                    |
| <b>Self-Discharge @ +23°C</b>     | <5% per month  |                    |
| <b>Memory Effect</b>              | None   |                    |
| <b>Exterior/Housing</b>           | Hard plastic, ABS  |                    |
| <b>Terminals/Connector</b>        | F1 Faston Tabs   |                    |
| <b>Size</b>                       | Length:  | 152 ± 1mm (5.95in) |
|                                   | Width:   | 65 ± 1mm (2.56in)  |
|                                   | Height:  | 92 ± 1mm (3.70in)  |
| <b>Communications</b>             | None   |                    |
| <b>State of Charge Indicator</b>  | None   |                    |
| <b>Protection</b>                 | Overcharge:  | 3.90V (per cell)   |
|                                   | Over Discharge:  | 2.00V (per cell)   |
|                                   | Over Current:  | 70 ± 10A (5-15ms)  |
|                                   | Over Temperature:  | 65 ± 5°C           |
|                                   | Short Circuit  |                    |
|                                   | Cell Imbalance   |                    |
| <b>Charging</b>                   | Connect the battery to a DC power source using correct polarity and apply a maximum voltage of 14.4V. Limit the current to the recommended rate of 1.52A and hold 14.4V until the current declines to 150mA. Maximum charge rate is 7.6A.<br><br>Alternatively, you may apply a maximum charge voltage of 13.6V (limiting the current to 1.52A) and hold indefinitely to maintain the battery in a continuous standby state-of-charge of between 70-90%. |                    |
| <b>Safety</b>                     | Material Safety Datasheet - MSDS00152<br>Refer also to Safety Guide UBM-5112   |                    |
| <b>Certifications</b>             | CB scheme (ID: FI-51455)<br>UL 2054  |                    |
| <b>Transportation</b>             | UN 3480 Dangerous Good Class 9, Total Energy <100Wh<br>If packed in or with equipment (UN 3481), contact Ultralife for guidance or other questions.<br>UN Testing Summary - UNTS-0258  |                    |
| <b>Harmonized Tariff Schedule</b> | 8507.60.0000   |                    |

## Dimensions



Unit: mm [inches]



### Bar Code Detail:

(Example: 190401190412000001)

1st six digits (190401) = YYMMDD Cell Assembly Date

2nd six digits (190412) = YYMMDD Battery Pack Assembly Date

Final six digits (000001) = Battery Pack Serial Number

## Performance Graphs

