

# Primary lithium batteries

## LO 25 SX

3.0 V Primary lithium-sulfur dioxide (Li-SO<sub>2</sub>)

High drain capability

“Fat” D-size spiral cell



### Benefits

- High and stable discharge voltage
- Very high pulse capability
- Performance not affected by cell orientation
- Long storage possible before use
- Ability to withstand extreme temperature

### Key features

- Low self-discharge rate  
(less than 3% after 1 year of storage at +20°C)
- Hermetic glass-to-metal sealing
- Built-in safety vent  
(at the negative end of the cell)
- Restricted for transport (class 9)
- UL Component Recognition  
(File Number MH 15076)
- Meets shock, vibration and other environmental requirements of military specifications
- Made in the USA

### Main applications

- Radiocommunications and other military applications
- Beacons and Emergency Location Transmitters
- Sonobuoys
- Missiles

### Cell size reference

“Fat” D

#### Electrical characteristics

*(typical values for cells stored for one year or less)*

Nominal capacity 8.0 Ah

*(at 0.27 A +20°C 2.0 V cut off. The capacity restored by the cell varies according to current drain, temperature and cut off)*

Open circuit voltage (at +20°C) 3.0 V

Nominal voltage (at 0.6 A +20°C) 2.8 V

Maximum recommended continuous current 2.5 A  
*(to avoid over-heating. Higher currents possible, consult Saft)*

Pulse capability : Typically up to 10 A.  
*(The voltage readings may vary according to the pulse characteristics, the temperature, and the cell's previous history. Fitting the cell with a capacitor may be recommended in severe conditions. Consult Saft)*

Storage *(recommended)* +30°C (+86°F) max  
*(possible without leakage)* -60°C / +85°C  
(-76°F / +185°F)

Operating temperature range -60°C / +70°C  
(-76°F / +158°F)

*(Short excursions up to +85°C possible at currents below 1 A)*

#### Physical characteristics

Diameter (max) 39.5 mm (1.56 in)

Height (max; finish without radial tabs) 50.3 mm (1.97 in)

Typical weight 96 g (3.39 oz)

Li metal content 2.6 g

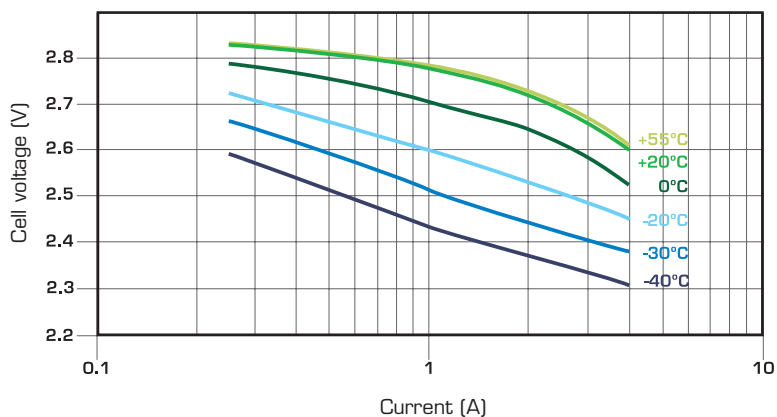
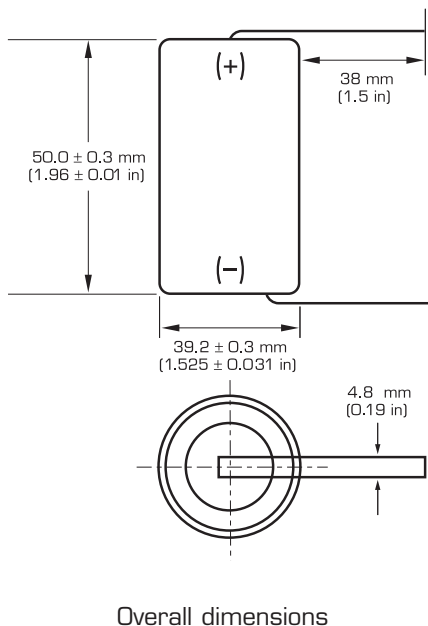
Standard cell comes with resin potting in the topshell area and two radial 0.15 mm - thick nickel tabs

Different configurations available on request.

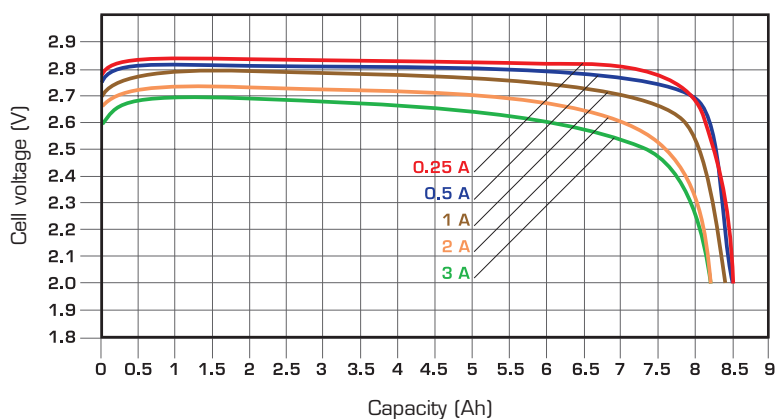


**SAFT**

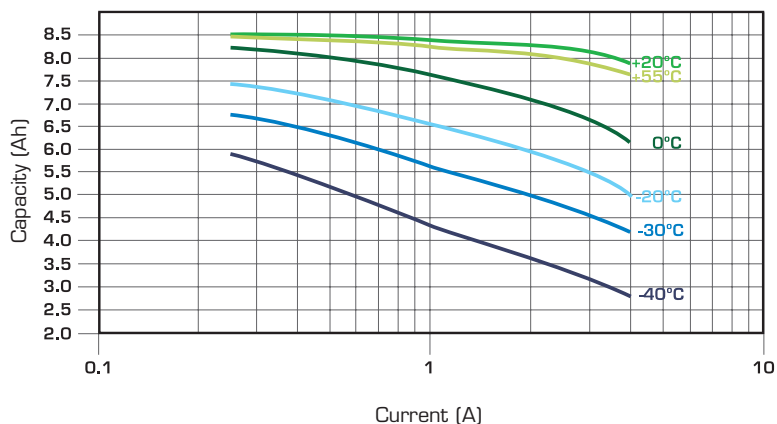
# LO 25 SX



**Voltage at mid-discharge versus Current and Temperature (2.0 V cut off)**



**Typical discharge profiles at +20°C**



**Capacity versus Current and Temperature (continuous discharges - 2.0 V cut off)**

## Handling precautions

- Cell is pressurised.
- Do not puncture, open or mutilate.
- Do not obstruct the safety vent mechanism.
- Do not short circuit or charge.
- Do not expose to fire or temperatures above +70°C (+158°F).

