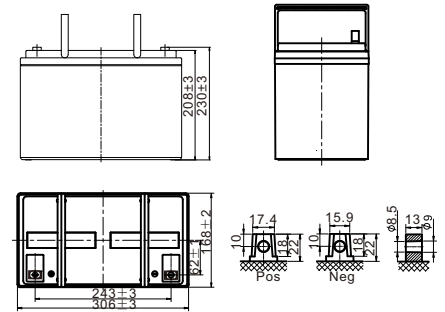


Specifications

Rated Voltage	12V	
Nominal Capacity	90.0Ah	(C ₁₀ , 1.80V/cell)
Dimension	Length	306±3mm (12.05 inches)
	Width	168±2mm (6.61 inches)
	Container Height	208±3mm (8.19 inches)
	Total Height	214±3mm (8.43 inches)
Approx Weight	27.1 Kg (59.76 lbs)	
Terminal	T14	
Container Material	ABS	
Rated Capacity (25°C)	95.4 Ah	(20hr, 4.77A, 1.80V/cell)
	90.0 Ah	(10hr, 9.00A, 1.80V/cell)
	82.5 Ah	(5hr, 16.5A, 1.75V/cell)
	75.3 Ah	(3hr, 25.1A, 1.75V/cell)
	58.0 Ah	(1hr, 58.0A, 1.60V/cell)
Max. Discharge Current	1080A (5s)	
Internal Resistance (25°C)	Approx 5.0mΩ	
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	25±3°C (77±5°F)	
Cycle Use	Initial Charging Current less than 27.0A. Voltage 14.4V~15.0V at 25°C(77°F)Temp. Coefficient -30mV/°C	
	Standby Use	
Effect of temp. to Capacity	Initial Charging Current less than 27.0A. Voltage 13.5V~13.8V at 25°C(77°F)Temp. Coefficient -20mV/°C	
	40°C (104°F)	103%
	25°C (77°F)	100%
Self Discharge	0°C (32°F)	86%
	Batteries may be stored for 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.	



Layout



Constant Current Discharge (Amperes) at 25 °C (77°F)

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	134.5	116.6	91.7	82.0	60.0	50.8	30.9	22.7	17.8	15.5	13.6	10.5	8.68	4.61
1.80V/cell	152.6	132.1	103.7	89.3	63.5	52.6	32.0	24.6	19.0	16.3	14.6	11.0	9.00	4.77
1.75V/cell	165.5	143.0	111.9	91.1	65.8	55.2	33.6	25.1	19.4	16.5	14.8	11.1	9.18	4.82
1.70V/cell	176.5	151.9	118.7	92.9	67.1	56.3	34.3	25.6	19.7	16.8	14.8	11.2	9.27	4.87
1.65V/cell	182.1	156.3	121.9	94.3	68.1	57.1	34.8	25.8	20.0	17.2	14.9	11.4	9.39	4.93
1.60V/cell	188.3	161.2	125.0	95.6	69.1	58.0	35.3	26.1	20.2	17.4	15.0	11.6	9.50	4.99

Constant Power Discharge (Watts/cell) at 25 °C (77°F)

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	253.0	220.8	174.4	156.7	115.3	98.2	60.2	44.4	34.9	30.4	26.9	20.8	17.3	9.17
1.80V/cell	283.0	246.9	195.1	169.2	121.3	101.2	61.9	47.9	37.2	31.9	28.8	21.8	18.1	9.49
1.75V/cell	302.0	263.6	208.2	171.4	125.0	105.7	64.8	48.7	37.7	32.3	28.9	21.9	18.2	9.57
1.70V/cell	317.5	277.1	218.9	173.3	126.6	107.2	65.9	49.5	38.2	32.8	29.0	22.2	18.4	9.66
1.65V/cell	322.7	281.6	222.5	174.5	127.7	108.2	66.6	49.7	38.7	33.3	29.1	22.4	18.6	9.77
1.60V/cell	327.2	285.5	225.6	175.3	128.4	109.0	67.1	49.9	39.0	33.7	29.2	22.7	18.8	9.87

Applications

- UPS and EPS
- Emergency light
- Railway signal and aircraft signal system
- Marine and power stations
- Alarm and security system
- Electronic apparatus and equipment
- Communication power supply, DC power supply

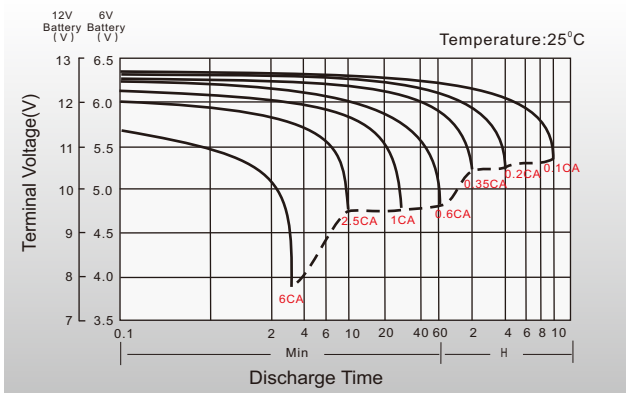
General Features

- 12 years design life(25°C)
- Grid refining technology and the thicker plates are used to extend the battery standby life and reduce the plate grid corrosion speed
- Using oxygen recombination technology: maintenance-free
- Unique vent valve design: control water losing, prevent air and spark going inside

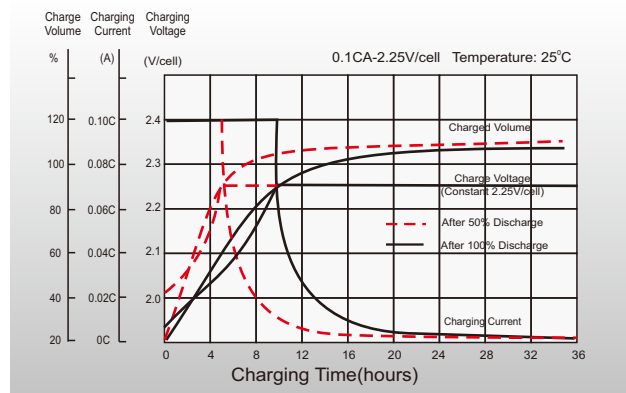
Standards

- Compliance with IEC 60896 standards, EU Battery Directive
- UL, CE Certified
- Manufactured in Leoch@TS16949, OHSAS 18001, ISO 9001 and ISO 14001 certified production facilities

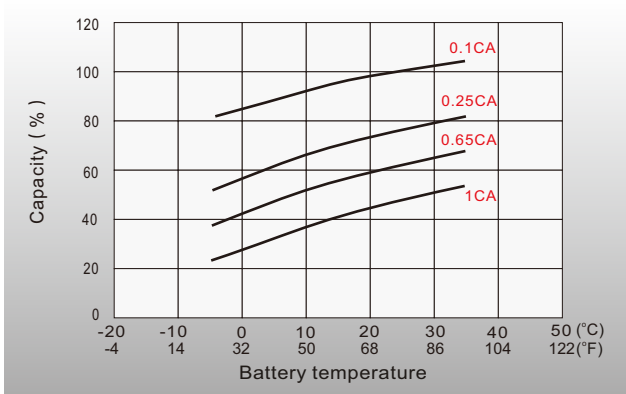
Discharge Characteristics



Float Charging Characteristics



Temperature Effects in Relation to Battery Capacity



Effect of Temperature on Long Term Float Life

