

Motive Battery

Energy Storage Battery

Reserve Battery

Motorcycle Battery



Maintenance Free VRLA AGM Battery - Long Life Type

TNL12-65

(12V 65Ah)

GENERAL FEATURES

- ♦ Oxygen recombination technology: maintenance-free, no need to add water or acid
- ♦ The patent grid alloy: less gassing, low self-discharge, excellent corrosion resistance
- ♦ Long life, low self-discharge rate and high reliability, deep discharge recoverability
- ♦ High quality AGM separator: extend cycle life and prevent micro short circuit
- ♦ ABS container: increase the strength of battery (Flame-retardant ABS UL94-V0 is optional)

Dimension

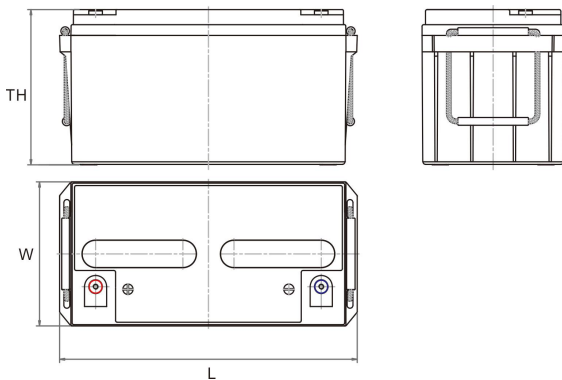
Unit:mm

Length 350±2mm / 13.78inch

Width 167±2mm / 6.57inch

Container Height 180±3mm / 7.09inch

Total Height 180±3mm / 7.09inch



Application

- ♦ Uninterrupted Power Supply (UPS)
- ♦ Communications and electric equipment
- ♦ Emergency lighting equipment
- ♦ Fire alarm and security system
- ♦ Robots, control equipment, and other factory automation equipment
- ♦ Emergency power supply (EPS)
- ♦ Portable VTR/TV, radio and so on
- ♦ Power tools, lawn mowers, vacuum cleaners
- ♦ Cameras and photographic equipment
- ♦ Portable measuring equipment
- ♦ Portable telephone sets
- ♦ Various power toys and hobby equipment
- ♦ Lighting equipment

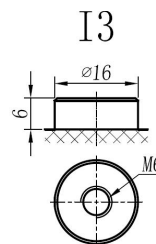
Terminal

Unit:mm

Terminal Type: I3

Weight

21.2kg 46.87lbs



This document is subject to change without prior notification

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TNL12-65

Specificaion

Nominal Voltage	12V	
Rated Capacity(25°C)	70Ah	20hr Rate(1.80V/cell)
	65Ah	10hr Rate(1.80V/cell)
	57Ah	5hr Rate(1.75V/cell)
	54Ah	3hr Rate(1.70V/cell)
	41Ah	1hr Rate(1.60V/cell)
Container Material	ABS (Flame-retardant ABS UL94-V0 is optional)	
Operating Temperature Range	Discharge	-20 ~ +50°C
	Charge	0 ~ +40°C
	Storage	-15 ~ +40°C
Capacity Effected by Temperature	40°C / 104°F	106%
	25°C / 77°F	100%
	0°C / 32°F	86%
	-10°C / 14°F	65%
Charge	Float Voltage	2.23 -2.27V/cell@25°C, Tem.Coefficient : -3mV/cell/°C
	Equalize Voltage	2.35 -2.40V/cell@25°C, Tem.Coefficient : -3mV/cell/°C
	Cycle Voltage	2.40 -2.50V/cell@25°C, Tem.Coefficient : -5mV/cell°C
Max. Charging Current	19.5A (0.3C)	
Max. Discharge Current (5'	780A	
Internal Resistance	7.3mΩ	
Self-Discharge	<3%, TN series stored at 25 °C require a supplementary charge every six months, the charging interval would shrink when the ambient temperature went higher	

Discharge Performance

Constant Current Discharge Table (25°C/77°F) Unit: A

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	76.1	64.0	56.8	47.1	36.9	31.54	20.42	15.35	12.58	10.58	9.22	7.40	6.305	3.364
1.80V/cell	87.1	71.9	62.8	51.2	39.8	33.29	21.95	16.49	13.37	11.22	9.77	7.79	6.507	3.481
1.75V/cell	98.9	81.0	69.4	55.6	43.4	36.29	22.83	17.15	13.83	11.48	10.08	8.05	6.682	3.569
1.70V/cell	111.7	89.9	76.6	60.7	46.7	38.40	24.05	18.06	14.45	12.14	10.56	8.39	6.938	3.660
1.67V/cell	120.0	96.3	81.5	64.1	49.4	39.72	24.93	18.78	15.02	12.52	10.93	8.67	7.132	3.774
1.60V/cell	132.0	105.4	88.5	68.4	51.4	40.90	25.57	19.26	15.35	12.83	11.16	8.82	7.282	3.835

Constant Power Discharge Table (25°C/77°F) Unit: W

F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	142.1	120.7	108.2	90.7	70.6	60.61	39.51	29.82	24.50	20.67	18.16	14.63	12.603	6.731
1.80V/cell	160.8	133.8	117.9	97.0	75.6	63.64	42.19	31.85	25.90	21.80	19.16	15.35	12.986	6.955
1.75V/cell	179.7	149.0	129.1	104.6	81.6	69.06	43.71	33.00	26.71	22.24	19.70	15.83	13.320	7.123
1.70V/cell	198.4	163.0	141.4	113.6	87.6	72.85	45.96	34.67	27.85	23.48	20.61	16.48	13.822	7.299
1.67V/cell	211.1	173.2	149.3	118.9	91.9	74.81	47.37	35.91	28.84	24.14	21.27	16.99	14.186	7.517
1.60V/cell	227.0	186.6	160.5	126.0	95.0	76.65	48.34	36.67	29.39	24.64	21.65	17.25	14.460	7.628

动力电池

储能电池

备用电池

摩托车电池



阀控式免维护AGM电池-长寿命系列

TNL12-65

(12V 65Ah)

产品特点

- ◆ 阀控式免维护设计，寿命期间无需加水或加酸
- ◆ 专利稀土合金板栅，减少气体产生，自放电率低，抗腐蚀能力出众
- ◆ 电池寿命长，自放电率低具有高可靠性，深放电恢复能力出色
- ◆ 高质量AGM隔板：防止微短路，延长循环寿命
- ◆ ABS壳盖：电池外壳强度高（阻燃壳体UL94-V0可选）



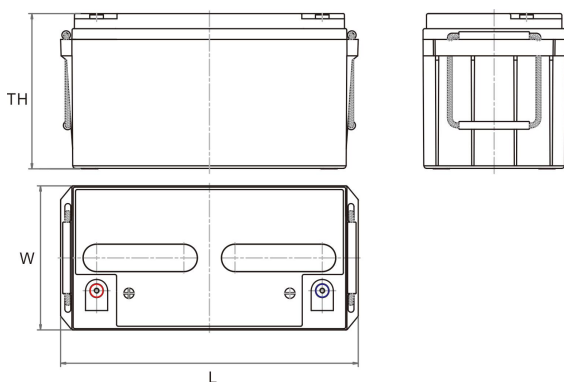
产品应用

- ◆ 不间断电源(UPS)
- ◆ 通信和电力设备
- ◆ 紧急照明设备
- ◆ 火灾报警及安防系统
- ◆ 机器人、控制设备及其他机械自动化设备
- ◆ 应急电源系统
- ◆ 便携式音频设备
- ◆ 电动工具，割草机，真空吸尘器
- ◆ 照相设备
- ◆ 便携式测量工具
- ◆ 便携式通话设备
- ◆ 各式电动玩具及娱乐设施
- ◆ 照明设备

尺寸

单个尺寸

长	350±2mm
宽	167±2mm
高	180±3mm
总高	180±3mm



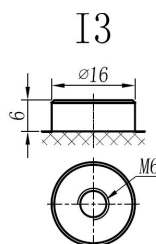
端子类型

单位:mm

端子类型 I3

重量

21.2kg 46.87lbs



内容如有改动，恕不另行通知

动力电池

储能电池

备用电池

摩托车电池



TNL12-65

规格书

额定电压	12V	
容量(25°C)	70Ah	20hr Rate(1.80V/cell)
	65Ah	10hr Rate(1.80V/cell)
	57Ah	5hr Rate(1.75V/cell)
	54Ah	3hr Rate(1.70V/cell)
	41Ah	1hr Rate(1.60V/cell)
壳体材料	ABS (阻燃ABS壳体可选)	
使用温度范围	放电	-20 ~ +50°C
	充电	0 ~ +40°C
	储存	-15 ~ +40°C
不同温度下 电池容量系数	40°C / 104°F	106%
	25°C / 77°F	100%
	0°C / 32°F	86%
	-10°C / 14°F	65%
充电	浮充电压	2.23 -2.27V/单格@25°C, 温度补偿系数: -3mV/单格/°C
	均充电压	2.35 -2.40V/单格@25°C, 温度补偿系数: -3mV/单格/°C
	循环使用电压	2.40 -2.50V/单格@25°C, 温度补偿系数: -5mV/单格/°C
最大充电电流	19.5A (0.3C)	
最大放电电流 (5S)	780A	
电阻	7.3mΩ	
自放电	<3%, TN系列储存在25°C 时需每6个月进行一次补充充电, 环境温度更高时则充电间隔时间越短	

放电性能

恒电流放电表 (25°C/77°F) 单位: A														
F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	117.1	98.5	87.4	72.5	56.7	48.52	31.41	23.62	19.35	16.28	14.19	11.39	9.700	5.175
1.80V/cell	134.0	110.6	96.6	78.7	61.2	51.21	33.77	25.38	20.57	17.26	15.04	11.98	10.010	5.355
1.75V/cell	152.2	124.7	106.8	85.5	66.7	55.83	35.12	26.39	21.28	17.66	15.51	12.38	10.279	5.491
1.70V/cell	171.9	138.3	117.9	93.4	71.9	59.07	37.00	27.78	22.23	18.68	16.25	12.90	10.674	5.631
1.67V/cell	184.6	148.1	125.4	98.6	76.1	61.10	38.36	28.89	23.11	19.26	16.82	13.34	10.973	5.806
1.60V/cell	203.1	162.2	136.2	105.2	79.0	62.93	39.33	29.64	23.62	19.73	17.17	13.57	11.203	5.900

恒功率放电表 (25°C/77°F) 单位: W														
F.V/Time	10min	15min	20min	30min	45min	1h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	142.1	120.7	108.2	90.7	70.6	60.61	39.51	29.82	24.50	20.67	18.16	14.63	12.603	6.731
1.80V/cell	160.8	133.8	117.9	97.0	75.6	63.64	42.19	31.85	25.90	21.80	19.16	15.35	12.986	6.955
1.75V/cell	179.7	149.0	129.1	104.6	81.6	69.06	43.71	33.00	26.71	22.24	19.70	15.83	13.320	7.123
1.70V/cell	198.4	163.0	141.4	113.6	87.6	72.85	45.96	34.67	27.85	23.48	20.61	16.48	13.822	7.299
1.67V/cell	211.1	173.2	149.3	118.9	91.9	74.81	47.37	35.91	28.84	24.14	21.27	16.99	14.186	7.517
1.60V/cell	227.0	186.6	160.5	126.0	95.0	76.65	48.34	36.67	29.39	24.64	21.65	17.25	14.460	7.628