



Reserve Battery

Motorcycle Battery

Energy Storage Battery-Tubular Flooded Technology-OPzS Series

OPzS200

(2V 200Ah)

GENERAL FEATURES

- 20 years design life at floating condition
- Wide operating temperature range from -40°C to +60°C
- Tubular positive plate with prolonged cycle life
- Special filter and seal design ensure no acid mist overflow
- Excellent deep discharge recovery capability
- Flooded design, transparent containers, convenient to observe and replenish the lost water
- Low maintenance

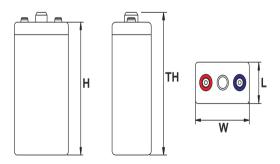
Application

- Renewable energy system
- Hybrid solar power system
- Uninterrupted Power Supply (UPS)
- Communications and electric equipment
- Emergency lighting equipment
- Fire alarm and security systems
- Control equipment, and other factory automation equipment
- Emergency power supply (EPS)
- Lighting equipment

Dimension

Unit:mm

Length 103±2mm / 4.06inch Width 206±2mm / 8.11inch Container Height 355±3mm / 13.98inch **Total Height** 410±3mm / 16.14inch







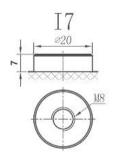




Terminal

Unit:mm

Terminal Type:



Weight

Without electrolyte

12.8kg 28.2lbs

With electrolyte

17.5kg 38.6lbs

This document is subject to change without prior notification

Tianneng Battery Group Co., Ltd. Changxing Tianying Import & Export Co., Ltd.

Motive Battery	Energy Storage	Battery		
Reserve Battery	Motorcycle Bat	tery	V	

OPzS200

Specificaion							
Nominal Voltag	e	2V					
		213Ah	20hr Rate(1.80V/cell)				
		200Ah	10hr Rate(1.80V/cell)				
Rated Capacity(25°C)		170Ah	5hr Rate(1.75V/cell)				
		150Ah	3hr Rate(1.70V/cell)				
		115Ah	1hr Rate(1.60V/cell)				
Container Mate	rial	SAN					
Operating	Discharge	-40 ~ +60°C	-40 ~ +60°C				
Temperature Range	Charge	0 ~ +40°C	0 ~ +40°C				
	Storage	-20 ~ +40°0	-20 ~ +40°C				
	40°C / 104°F	106%	106%				
Capacity Effected by	25°C / 77°F	100%	100%				
Temperature	0°C / 32°F	86%	86%				
·	-20°C / -4°F	60%	60%				
Float Voltage		2.23V/cell@	2.23V/cell@25°C,Compensation Factor: -3mV/cell/°C				
Charge Voltage	Equalize Voltage	2.35 -2.40V/	2.35 -2.40V/cell@25°C, Compensation Factor: -3mV/cell/°C				
	Cycle Voltage	2.40 -2.50V/	2.40 -2.50V/cell@25°C, Compensation Factor: -5mV/cell°C				
Max Charging Current		40A (0.2C)	40A (0.2C)				
Max. Discharge	Current (5S)	1200A					
Internal Resista	nce	0.9mΩ					
Self Discharge			4%, OPzS 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	30min	1h	2h	3h	5h	8h	10h	20h	
1.85V/cell	116	93.8	61.0	46.4	32.2	23.2	19.8	10.5	
1.80V/cell	137	101	64.3	47.9	33.4	23.9	20.0	10.6	
1.75V/cell	150	106	66.9	49.1	34.1	24.5	20.6	11.0	
1.70V/cell	156	109	68.7	50.2	34.7	25.0	21.0	11.1	
1.65V/cell	163	112	70.3	51.0	35.2	25.3	21.0	11.2	
1.60V/cell	168	115	71.8	51.8	35.6	25.4	21.2	11.3	

Constant Power Discharge Table (25°C/77°F) Unit: W									
F.V/Time	30min	1h	2h	3h	5h	8h	10h	20h	
1.85V/cell	272	187	127	96.5	64.6	47.8	39.4	20.9	
1.80V/cell	284	202	132	101	66.4	49.1	41.2	21.8	
1.75V/cell	295	214	137	104	69.6	51.5	43.4	23.0	
1.70V/cell	308	227	141	107	72.2	52.4	44.2	23.4	
1.65V/cell	322	242	143	109	73.2	53.1	44.8	23.8	
1.60V/cell	340	261	144	109	73.7	53.4	45.1	23.9	

Motive Battery

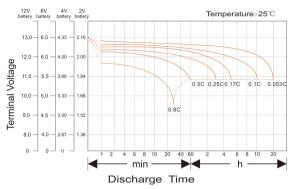
Energy Storage Battery



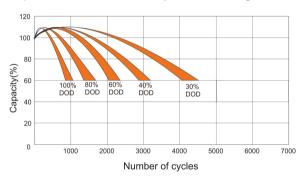
Reserve Battery

Motorcycle Battery

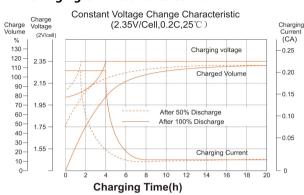
Discharge Characteristics Curve



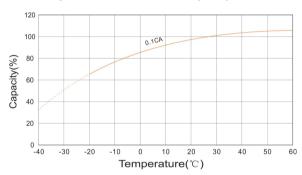
Cycle life in relation to depth of Discharge



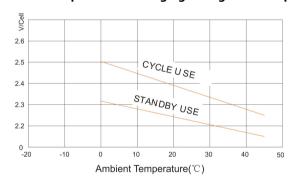
Charging Characteristics Curve



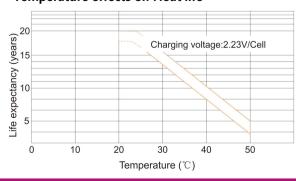
Temperature effects on Capacity



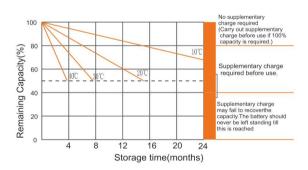
Relationship between charging voltage and temperature



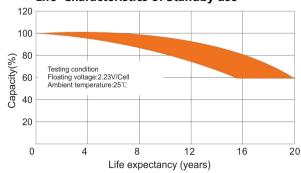
Temperature effects on Float life



Self-discharge Characteristics



Life Characteristics of Standby use



ianneng Battery Group Co., Ltd. Cha

Changxing Tianying Import & Export Co., Ltd.

www.tiannenggroup.com

V1.0

Release Date: 2019/7/19