



OPzS-490 (2V500Ah)

Rechargeable Lead Acid Battery

www.oremabattery.com

General Features

The battery is manufactured with porous rubber and rubber separator and transparent AS case. The tubular positive plate, pasted negative plate and cid-proof bolt is applied. The recombination plugs may be applied for maintance-free over 5 years .

- (1) The battery has a long service life, under float charging, ambient temperature 25°C, it can operate over 20 years**
- (2) Maxium cycle stability and durability.**
- (3) The battery meet the standard specified in IEC896-1 and DIN40736.**
- (4) High Quality, highest reliability.**

Typical Applications

- Energy storage for solar/wind power generation system
- DC power supply and backup power supply used in electricity utility and nuclear power stations
- Traffic systems: signling systems, lighting
- Telecommunication: mobile phone /BTS stations.
- Backup power for UPS and emergency light etc.

Dimensions and Weight



Length (mm / inch).....166 / 6.53
 Width (mm / inch)206 / 8.11
 Height (mm / inch) 470 / 18.5
 Total Height (mm / inch).....524 / 20.6
 Approx.Weight(Kg / lbs)
 ... (dry)..... 27.1/ 59.6
 ... (flooded)... 37.9/83.4

Performance Characteristics

Nominal Voltage	2V
Number of cell	1
Design Life	20years
Nominal Capacity 77°F(25°C)	
240 hour rate(3.03A, 1.85V)	727Ah
100 hour rate(6.00A, 1.85V)	600Ah
10 hour rate(50.0A, 1.80V)	500Ah
5 hour rate(84.0A, 1.80V)	420Ah
3 hour rate (125A, 1.75V)	375Ah
1 hour rate(265A, 1.67V)	265Ah
Self-Discharge -- 4.5% of capacity declined per 28days at 20°C(average)	
Operation Temperature Range	
Discharge	-20~65°C
Charge	-10~65°C
Storage	-20~65°C
Max.Discharge Current 77°F(25°C)	
.....	2500A(5s)
Short Circuit Current	3850A

Charge Method

Application	Initial charge	Equalizing charge	Float charge
Charging method	Constant Current Charging	Constant Voltage Charging	Constant Voltage Charging
Charging Voltage at 20°C	---	2.38~2.42v	2.23~2.27V
Temperature compensation coefficient of charging voltage	----	-3 mV/°C	-3 mV/°C
Charging current	25A	50A (Max. Current)	50A (Max. Current)
Charging time 20°C	100% discharge	60h	36h
	50% discharge	48h	24h
Temperture	0~45°C (32~113°F)		



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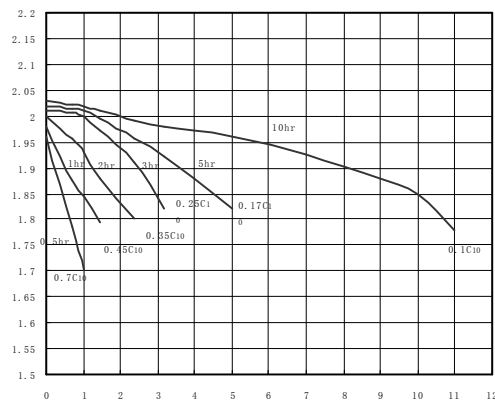
Discharge Constant Current (Amperes at 77°F/25°C)

EndPoint Volts/Cell	30'	1h	2h	3h	4h	5 h	6h	8h	10h	24h	48h	100h	120h	240h
1.70V	328	253	165	128	103	87.0	76.0	61.0	51.0	-----	----	----	-----	-----
1.75V	300	236	160	125	102	85.0	75.0	60.0	51.0	26.5	14.5	----	-----	----
1.80V	283	221	155	119	100	84.0	72.5	59.0	50.0	26.0	14.5	----	-----	----
1.85V	258	216	145	116	95.0	79.0	70.0	57.5	48.5	25.5	14.0	6.00	5.20	3.03
1.90V	248	203	130	110	88.5	76.5	67.5	55.0	46.5	24.0	13.5	5.90	5.10	3.00

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

EndPoint Volts/Cell	30'	1h	2h	3h	4h	5 h	6h	8h	10h	24h	48h	100h	120h	240h
1.70V	600	474	312	243	196	166	146	118	98.5	-----	----	----	-----	-----
1.75V	555	447	304	239	195	164	144	116	98.5	52.8	29.0	-----	-----	----
1.80V	533	420	297	228	193	162	141	115	98.0	51.8	29.2	----	---	----
1.85V	490	415	280	225	185	155	138	114	96.0	51.0	28.4	12.2	10.6	6.25
1.90V	475	394	254	216	175	152	134	110	93.0	48.4	27.5	12.0	10.5	6.15

Discharge characteristic



Note: 1.0C = 500A in above figure