

SA12-100

12V 100AH

AGM Valve Regulated Lead Acid Battery

SA series is a general purpose battery with 12 years design life in float service. It meets with IEC, JIS, BS, GB/T and YD/T standards. With advanced AGM valve regulated technology and high purity raw material, the SA series battery maintains high consistency for better performance and reliable standby service life. It is suitable for UPS/EPs, telecom, power grid, medical equipment, emergency light and security system applications.

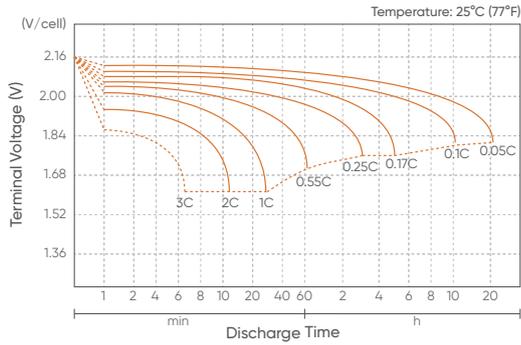


Specification		Dimensions
Cells Per Unit	6	<p>Length 328±2mm (12.9 inches)</p> <p>Width 172±2mm (6.77 inches)</p> <p>Height 215±2mm (8.46 inches)</p> <p>Total Height 220±2mm (8.66 inches)</p> <p>Terminal M5 Value 6-7 N*m</p> <p>Terminal M6 Value 8-10 N*m</p> <p>Terminal M8 Value 10-12 N*m</p>
Voltage Per Unit	12	
Capacity	100Ah@10hr-rate to 1.80V per cell @25°C	
Weight	Approx. 27.5Kg (Tolerance ±3.0%)	
Internal Resistance	Approx. 6.5mΩ	
Terminal	F5(M8) / F12(M8) / L7	
Max. Discharge Current	1000A (5 sec)	
Short Circuit Current	2150A	
Design Life	12 years (Float charging)	
Maximum Charging Current	30.0 A	
Reference Capacity	C3 77.4AH C5 87.0AH C10 100.0AH C20 106.0AH	
Standby Use Voltage	13.6V~13.8V @25°C Temperature Compensation: -3mV/°C/Cell	
Cycle Use Voltage	14.6V~14.8V @25°C Temperature Compensation: -4mV/°C/Cell	
Operating Temperature Range	Discharge: -20°C~60°C Charge: 0°C~50°C Storage: -20°C~60°C	
Normal Operating Temperature Range	25°C ± 5°C	
Self Discharge	SunArk Valve Regulated Lead Acid (VRLA) batteries can be stored for up to 6 months at 25°C and then recharging is recommended. Monthly Self-discharge ratio is less than 3% at 25°C. Please charge batteries before using.	
Container Material	A.B.S. UL94-HB, UL94-V0 Optional	

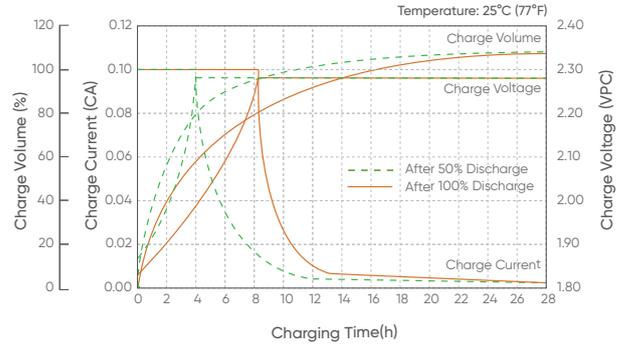
Constant Current Discharge Characteristics: A (25°C)											
F.V/Time	10MIN	15MIN	30MIN	1HR	2HR	3HR	4HR	5HR	8HR	10HR	20HR
1.60V	224.9	179.8	107.3	61.1	36.4	28.2	22.2	18.9	12.7	10.5	5.52
1.65V	206.8	171.9	103.0	59.0	35.2	27.3	21.6	18.4	12.5	10.4	5.43
1.70V	190.4	161.0	98.5	57.1	34.1	26.6	21.0	17.9	12.3	10.3	5.36
1.75V	174.3	149.9	94.1	55.0	32.9	25.8	20.4	17.4	12.2	10.1	5.30
1.80V	157.8	138.4	90.0	52.9	31.7	25.0	19.9	17.0	12.0	10.0	5.25
1.85V	128.9	114.8	77.5	47.4	29.1	23.1	18.5	15.9	11.2	9.41	4.98

Constant Power Discharge Characteristics : WPC (25°C)											
F.V/Time	10MIN	15MIN	30MIN	1HR	2HR	3HR	4HR	5HR	8HR	10HR	20HR
1.60V	372.1	320.9	196.9	114.8	69.0	53.9	42.6	36.4	24.8	20.7	10.9
1.65V	358.4	311.3	191.0	111.5	67.1	52.4	41.6	35.6	24.5	20.5	10.7
1.70V	336.0	295.9	184.4	108.6	65.3	51.2	40.6	34.8	24.2	20.2	10.6
1.75V	313.1	279.4	178.1	105.2	63.3	49.9	39.7	34.0	23.9	20.0	10.5
1.80V	288.3	261.6	171.9	101.8	61.3	48.6	38.7	33.2	23.6	19.8	10.4
1.85V	239.8	220.2	149.5	91.9	56.5	45.1	36.1	31.1	22.2	18.6	9.87

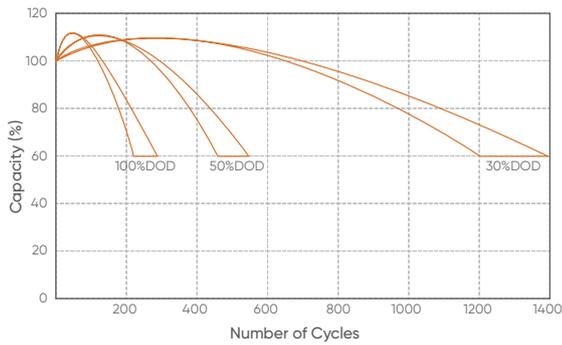
Discharge Characteristics Curve



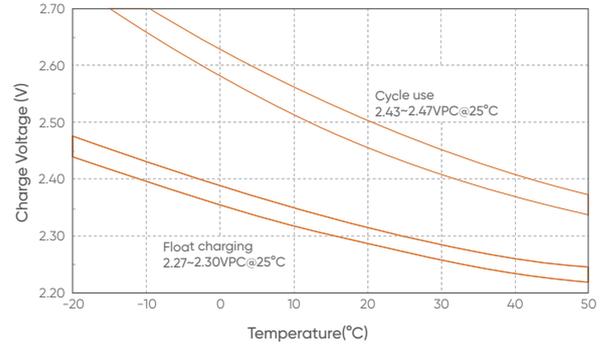
Charge Characteristic Curve for Standby Use



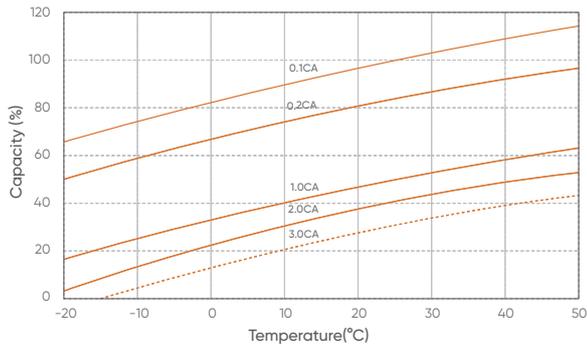
Cycle Life in Relation to Depth of Discharge



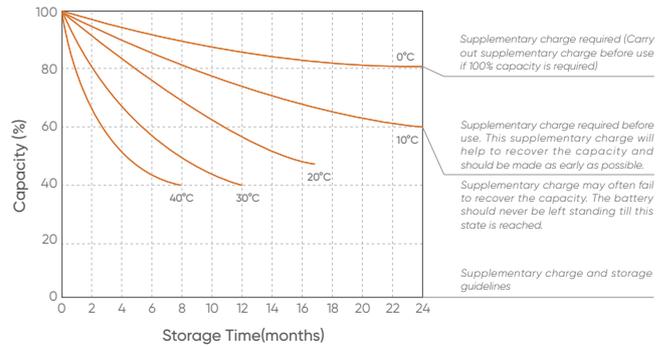
Relationship Between Charging Voltage and Temperature



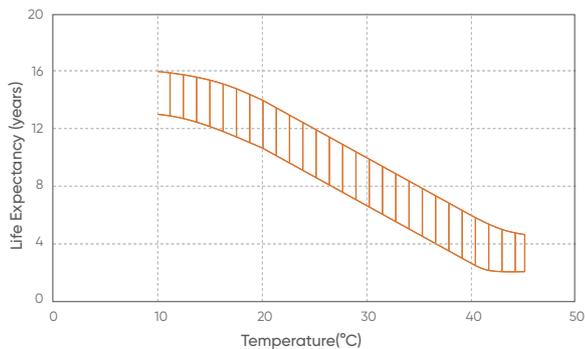
Temperature Effects on Capacity



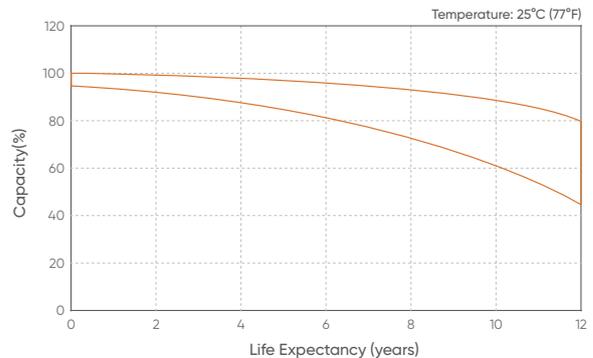
Storage Characteristics



Effect of Temperature on Long Term Life



Life Characteristics Of Standby Use



(Note) All above information shall be changed without prior notice, SunArk reserves the right to explain and update the latest information.