

ES 65-12

12V - 65Ah

INTRODUCTION

The most advanced technology of ROCKET, Valve Regulated Lead Acid batteries make them highly useful in a broad range of applications. The use of high-purity calcium alloy maximizes the longevity of ROCKET batteries to ensure excellent performance in any circumstances.

ES Series are specially designed to provide better cyclic life and are ideally suited for areas prone to frequent power failures.

The unique construction coupled with the use of special sealing epoxies and long sealing paths of ROCKET series ensures that no electrolyte leakage can occur from terminals or cases of any ROCKET Batteries. This feature ensures safe & efficient operation of ROCKET batteries in any position.

TECHNICAL FEATURES

- Non-Spillable Sealed Construction
- Absorbent Glass Mat System (AGM System)
- ABS (Acrylonitrile Butadiene Styrene) container and cover
- Gas Recombination
- Maintenance-Free Operation
- Low Pressure Venting System
- Heavy - Duty Grids
- Low Self-Discharge - Long Shelf Life
- Wide Operating Temperature Range

APPLICATIONS

- UPS
- Telecom Communication Equipments
- Fire Alarm & Security Systems
- Medical Instruments
- Emergency Lighting
- Computer Backup

COMPLAINTS STANDARD

- JIS
- IEC 60896 PART 1 & 2
- BS6290-4,
- Eurobat Guide - HIGH Performance

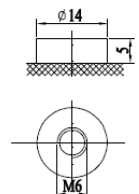
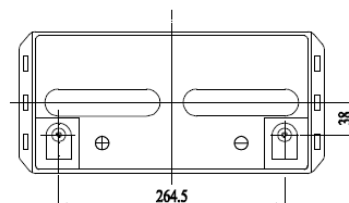
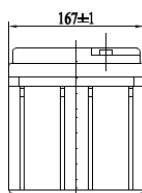
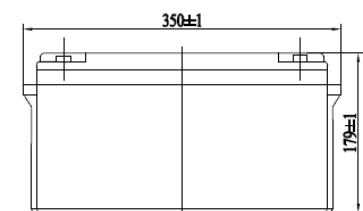
SPECIFICATION

Nominal Voltage		12V
Capacity (20HR, 25°C)		65Ah
Dimension	Length	350mm (13.78inch)
	Width	167mm (6.57inch)
	Height	179mm (7.05inch)
	Total Height	179mm (7.05inch)
Approx Weight		19.5kg (43.0lbs)
Design Life		10 Years

CHARACTERISTICS

Capacity 25°C (77°F)	20 hour rate	65Ah
	10 hour rate	61Ah
	5 hour rate	54.5Ah
	1 hour rate	44.2Ah
Internal resistance (Fully charge, 25°C)		6m Ω
Self-discharge (25°C)	1 month	Remaining Capacity:97%
Operating temperature range	Discharge	-20°C~60°C
	Charge	-10°C~60°C
	Storage	-20°C~60°C
Maximum discharge current		77°F(25°C) 650A(5 Sec.)
Short circuit current		1700A
Charge Methods (Constant Voltage Charge 77°F(25°C)) - Cyclic Use	Cycle Use 14.4 to 14.7V	
	Max. charging Current 19.5A	
	Temp. compensation - 30mV/°C	
Charge Methods (Constant Voltage Charge 77°F(25°C)) - Standby Use	Standby Use 13.6-13.8V	
	Temp. compensation - 20mV/°C	

THE BATTERY CONTAINER AND COVER ARE AVAILABLE BOTH IN ABS plastic and Flame Retardant (FR).



ES 65-12

12V - 65Ah

CONSTANT CURRENT DISCHARGE (Amperes) at 25°C

End Point Volts/Cell	5mi n	10mi n	15mi n	20mi n	25mi n	30mi n	35mi n	40mi n	45mi n	50mi n	55mi n
1.60V	212	151	126	98.8	82.4	75.4	63	57.4	53	49.5	46.6
1.65V	201	144	121	93.2	78.7	73.3	61.5	56.6	52.8	48.5	44.9
1.70V	189	137	115	91.2	76.8	71.3	59.4	54.2	50.1	46.7	43.8
1.75V	177	129	109	88.1	75.6	69.2	59.2	53.9	49.8	46.2	43.3
1.80V	164	120	102	81.9	70.4	66.9	55.6	50.9	47.3	43.7	40.7

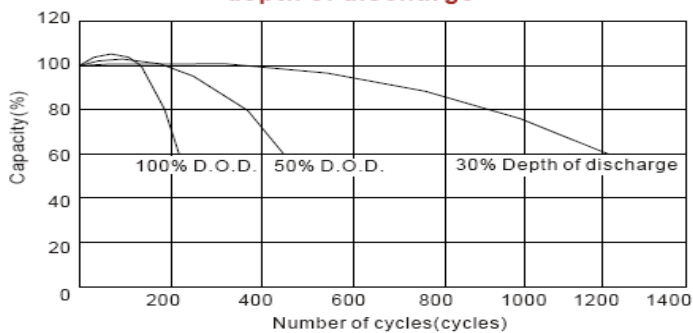
End Point Volts/Cell	1h	1.25h	1.5h	1.75h	2h	2.25h	2.5h	2.75h	3h	4h	5h	6h	7h	8h	9h	10h	12h	24h
1.60V	45.1	36.2	30.9	27.5	24.3	22.2	20.3	19.2	18.4	14.2	11.8	10.4	9.19	8.28	7.58	6.70	5.9	3.2
1.65V	44.0	35.0	29.5	26.7	23.3	21.6	19.6	18.7	18	13.7	11.6	10.1	8.96	8.1	7.43	6.58	5.81	3.12
1.70V	43.0	33.9	29.2	25.9	23.1	21.0	19.4	18.2	17.6	13.5	11.3	9.92	8.79	7.95	7.29	6.56	5.75	3.06
1.75V	41.9	32.7	28.8	25.1	22.8	20.4	19.2	17.7	17.2	13.3	11.0	9.74	8.62	7.78	7.13	6.53	5.62	2.97
1.80V	41.0	31.5	27.3	24.3	21.8	19.8	18.5	17.2	16.9	13	10.7	9.57	8.47	7.65	7.01	6.50	5.53	2.86

CONSTANT POWER DISCHARGE (Watts per cell) at 25°C

End Point Volts/Cell	5mi n	10mi n	15mi n	20mi n	25mi n	30mi n	35mi n	40mi n	45mi n	50mi n	55mi n
1.60V	378	275	207	167	145	129	117	106	99.1	91.1	85.5
1.65V	356	261	203	164	142	128	114	104	97.6	89.5	83.8
1.70V	335	246	200	160	139	127	108	100	95.7	87.6	81.9
1.75V	314	231	196	156	136	124	106	98.3	93.6	85.6	80
1.80V	302	215	187	152	132	122	104	96.9	91.3	84.7	79.4

End Point Volts/Cell	1h	1.25h	1.5h	1.75h	2h	2.25h	2.5h	2.75h	3h	4h	5h	6h	7h	8h	9h	10h	12h
1.60V	81.8	66.3	57.7	51.5	47.5	42.5	39.1	37.2	33.8	27.2	22.5	19.6	17.3	15.5	14.2	13.1	11.1
1.65V	80.0	65.7	56.4	50.5	46.6	41.5	38.3	36.3	33.2	26.8	22.3	19.4	17.1	15.3	14	12.9	11
1.70V	78.3	65.2	55.5	49.5	45.6	40.6	38.1	35.4	32.5	26.6	22.0	19.2	16.9	15.2	13.9	12.8	10.9
1.75V	76.5	64.6	53.9	48.5	44.5	39.6	36.7	34.4	31.8	25.9	21.7	18.9	16.7	15	13.7	12.7	10.8
1.80V	75.7	64	53.4	47.5	43.3	38.6	36	33.5	31.1	25.5	21.4	18.7	16.5	14.9	13.6	12.6	10.7

Cycle service life in relation to depth of discharge



Discharge characteristic (25°C)

