ELITE POWER

Valve Regulated Lead Acid Battery

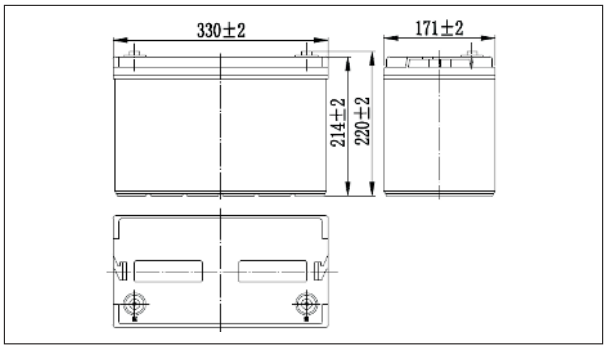
EPG12-100 12V100Ah

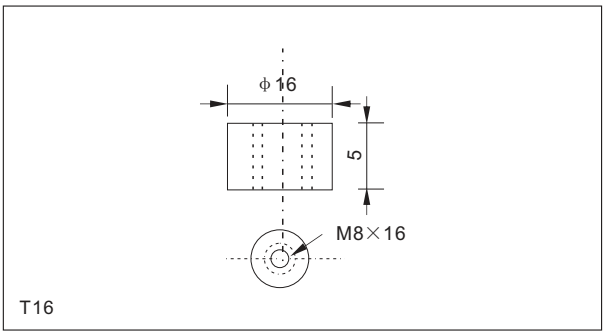


Specifications

Nominal Voltage		12V
Rated capacity (10 hour rate)		100Ah
Dimensions	Length	330±2mm(12.99inch)
	Width	171±2mm(6.73inch)
	Height	214±2mm(8.43inch)
	Total Height	220±2mm(8.66inch)
Approx. Weight		29.3kg(64.6lbs)±3%

Outer dimensions (mm)





Characteristics

Capacity (25℃)	10HR(10.8V)	100Ah
	3HR(10.8V)	72Ah
	1HR(10.5V)	53Ah
Terminal type		T16
Internal resistance (Fully charged,25℃)		Approx.5.5m Ω
Capacity affected by temperature (10HR)	40℃	102%
	25℃	100%
	0℃	85%
	-15℃	65%
Self-discharge (25℃)	3 months	Remaining Capacity:91%
	6 months	Remaining Capacity:82%
	12 months	Remaining Capacity:65%
Nominal operating temperature		25℃ ±3℃(77℉ ±5℉)
Operating temperature range	Discharge	-15℃~50℃(5℉~122℉)
	Charge	-10℃~50℃(14℉~122℉)
	Storage	-20℃~50℃(-4℉~122℉)
Float charging voltage(25℃)		13.50 to 13.80V Temperature compensation: -18mV/℃
Cyclic charging voltage(25℃)		14.40 to 14.70V Temperature compensation: -30mV/℃
Maximum charging current		20A
Maximum discharge current		800A(5 sec.)
Designed floating life(20℃)		12years

Construction

Component	Positive plate	Negative plate	Container	Cover	Separator	Electrolyte	Safety valve	Terminal
Raw material	Lead dioxide	Lead	ABS	ABS	AGM	Gel	Rubber	Copper

Constant Current Discharge Characteristics Unit:A(25℃/77℉)

F.V/Time	10min	15min	30min	60min	2h	3h	4h	5h	8h	10h	20h
9.60V	187	154	93.1	57.6	35.4	25.2	19.8	16.8	11.9	9.87	5.23
9.90V	182	150	91.3	56.8	35.2	25.1	19.7	16.7	11.8	9.86	5.22
10.2V	174	144	88.5	55.3	34.9	24.9	19.5	16.6	11.7	9.86	5.21
10.5V	167	140	86.3	53.6	34.4	24.7	19.4	16.5	11.6	9.77	5.18
10.8V	157	132	83.2	51.9	33.5	24.2	18.8	16.0	11.3	9.70	5.14

Constant Power Discharge Characteristics Unit:W(25℃/77℉)

F.V/Time	10min	15min	30min	60min	2h	3h	4h	5h	8h	10h	20h
9.60V	2022	1687	1045	657	410	297	233	199	141	118	62.8
9.90V	1962	1647	1024	647	408	295	231	198	140	118	62.7
10.2V	1881	1586	993	631	404	293	230	196	139	117	62.5
10.5V	1800	1532	969	611	398	291	228	195	138	117	62.1
10.8V	1699	1451	933	591	388	285	221	189	134	116	61.7

Note: The above characteristics data can be obtained within three charge or discharge cycles.

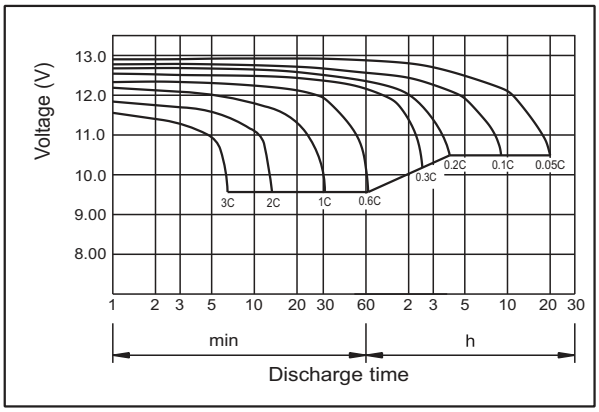
CamScanner

ELITE POWER

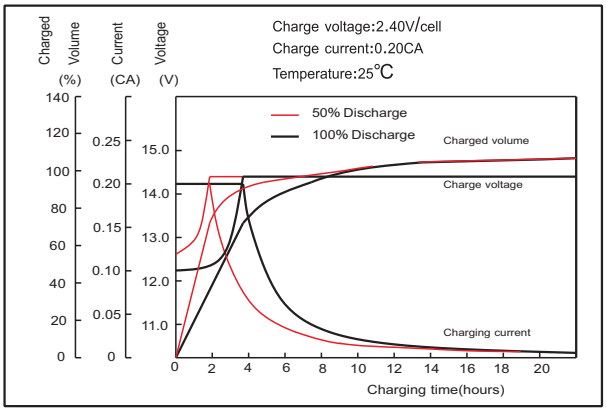
Valve Regulated Lead Acid Battery

EPG12-100 12V100Ah

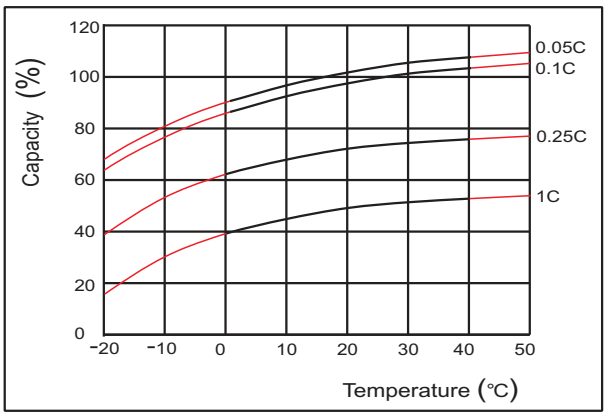
Discharge Characteristics 25℃



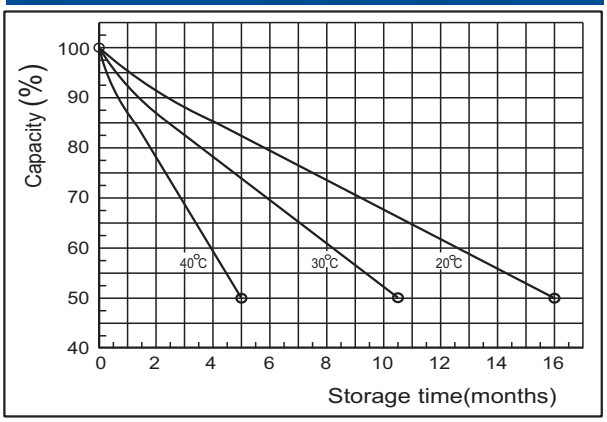
Charging Characteristics 25℃



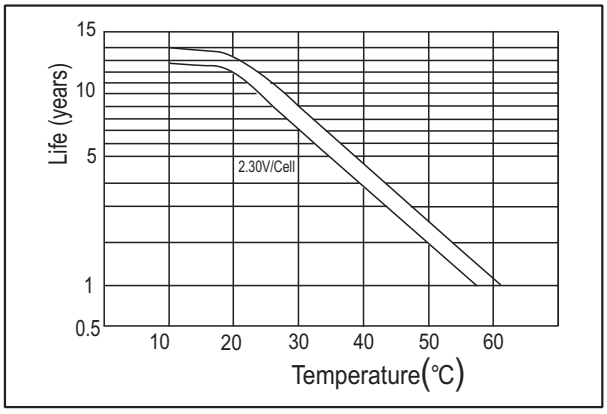
Temperature Effects on Capacity



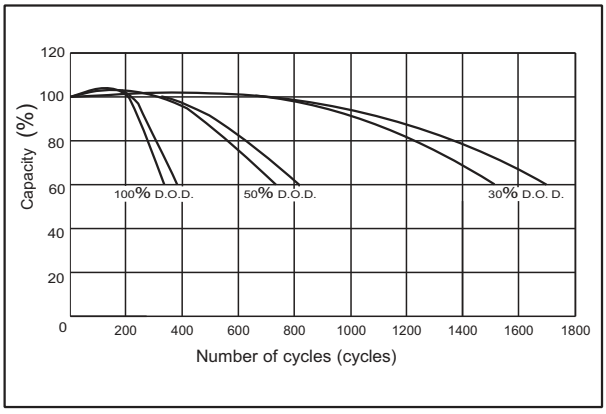
Self-discharge characteristics



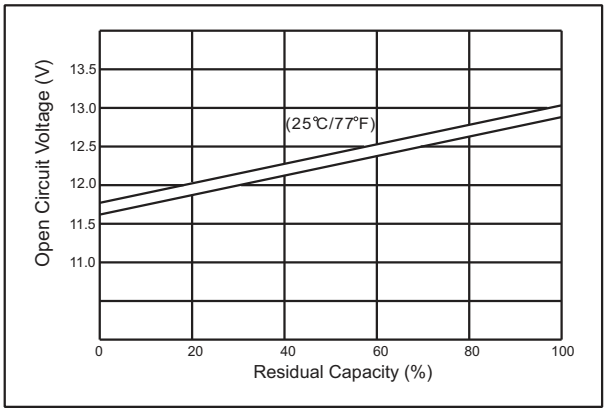
Floating life on Temperature



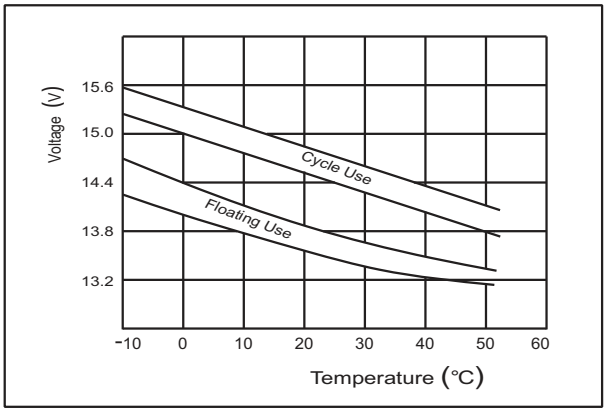
Cycle life on D.O.D (25℃)



The relationship for OCV and Capacity (25℃)



The relationship for Charging voltage and Temperature



MADE IN VIETNAM

CamScanner