Vectronic VRLA Battery

(General purpose)
VDJW12-80 (12V80Ah)

VRLA Battery

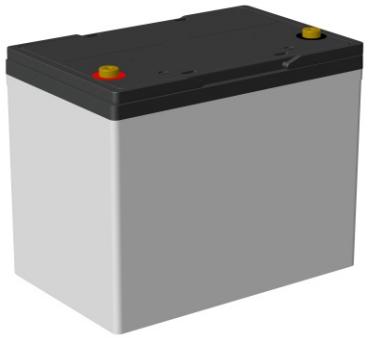
Specifications

Rated Voltage		12V
Nominal Capacity(C_{20},1.75V/cell)		80Ah
Dimension	Length	260±2mm (10.2 inches)
	Width	168±2mm (6.61 inches)
	Container Height	208±2mm (8.19 inches)
	Total Height	214±2mm (8.43 inches)
Approx Weight		21.4kg (47.2 lbs)
Terminal		M6
Container Material		ABS
Rated Capacity(25℃)	80.0 Ah	C20(4.00A,1.75V/cell)
	73.6 Ah	C10(7.36A,1.75V/cell)
	65.0 Ah	C5(13.0A,1.75V/cell)
	58.8 Ah	C3(19.6A,1.75V/cell)
	49.1 Ah	C1(49.1A,1.60V/cell)
5S Max. Discharge Current		800A (5s)
Internal Resistance(25℃)		Approx 7.2mΩ
Operating Temp. Range	Discharge	-20 ~ 55℃ (-4 ~ 131℉)
	Charge	-20 ~ 40℃ (-4 ~ 104℉)
	Storage	-15 ~ 50℃ (5 ~ 122℉)
Nominal Operating Temp. Range		25±5℃ (77±5℉)
Max.Charging Current(25℃)		24A

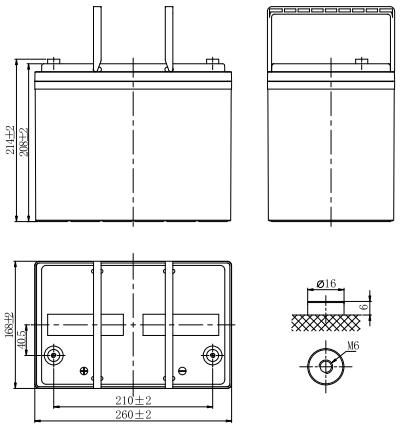
Charge voltage(25℃)	Charge voltage	Temp. Coefficient
Float	2.23~2.27V/cell	-3mV/℃
Equalization	2.35~2.40V/cell	-4mV/℃
Cycle	2.40~2.50V/cell	-5mV/℃

Effect of temp. to Capacity	
40℃ (104℉)	106%
25℃ (77℉)	100%
0℃ (32℉)	86%

Self Discharge	≤3% @ 25℃



Layout



(A)25℃ Constant Current Discharge

F.V/Time	5min	10min	15min	20min	30min	45min	1h	1.5h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	144.3	107.9	89.6	75.8	58.7	44.7	38.5	29.2	23.4	17.6	14.1	11.8	10.3	8.15	6.79	3.74
1.80V/cell	168.2	127.2	104.2	87.3	66.3	49.9	42.6	31.9	25.5	19.1	15.2	12.8	11.0	8.72	7.25	3.95
1.75V/cell	183.6	136.4	110.2	91.7	69.3	52.0	44.2	33.0	26.3	19.6	15.6	13.0	11.3	8.88	7.36	4.00
1.70V/cell	198.8	145.5	116.5	96.4	72.4	53.9	45.8	34.1	27.1	20.2	16.0	13.3	11.5	9.04	7.48	4.05
1.67V/cell	207.6	150.8	120.2	99.2	74.2	55.2	46.8	34.7	27.6	20.5	16.2	13.5	11.7	9.13	7.54	4.08
1.60V/cell	228.8	163.2	128.8	105.6	78.4	58.0	49.1	36.2	28.7	21.2	16.8	13.9	12.0	9.35	7.70	4.15

(W/cell) 25℃ Constant Power Discharge

F.V/Time	5min	10min	15min	20min	30min	45min	1h	1.5h	2h	3h	4h	5h	6h	8h	10h	20h
1.85V/cell	274.2	206.5	172.2	146.0	113.4	86.6	74.9	56.8	45.8	34.6	27.7	23.3	20.3	16.1	13.4	7.44
1.80V/cell	314.8	240.6	198.1	166.7	127.1	96.1	82.3	61.8	49.6	37.3	29.8	25.0	21.7	17.2	14.3	7.85
1.75V/cell	338.3	254.9	207.4	173.2	131.7	99.3	84.8	63.5	50.8	38.1	30.4	25.5	22.1	17.5	14.5	7.94
1.70V/cell	360.4	268.3	216.7	180.4	136.3	102.2	87.3	65.3	52.2	39.0	31.1	26.0	22.5	17.7	14.7	8.03
1.67V/cell	372.7	275.9	224.1	184.4	139.0	104.0	88.7	66.2	52.9	39.5	31.4	26.3	22.8	17.9	14.8	8.09
1.60V/cell	400.4	292.5	233.8	193.2	145.0	108.2	92.1	68.6	54.7	40.7	32.3	27.0	23.3	18.3	15.1	8.23

Vectronic VRLA Battery

(General purpose)
VDJW12-80 (12V80Ah)

VRLA Battery

Applications

- Telecommunications
- UPS, Data Center
- Energy Storage, Electric Systems
- Emergency Lighting, Security
- Medical, Electronic Equipment
- Motive Power

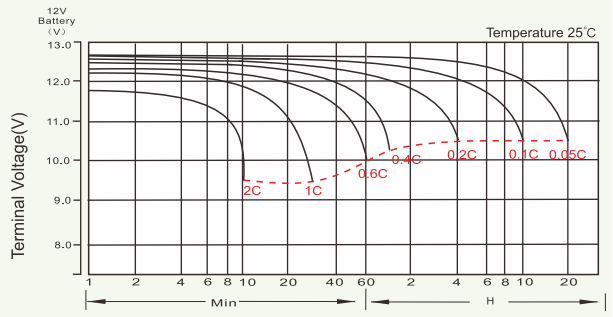
General Features

- Under 25°C, the designed floating life is up to 12 years.
- Self-discharge rate is extremely low
- Wide range of operating temperature
- Good sealing performance
- Good conductivity
- Excellent charge acceptance
- Safe and reliable explosion-proof exhaust system

Standards

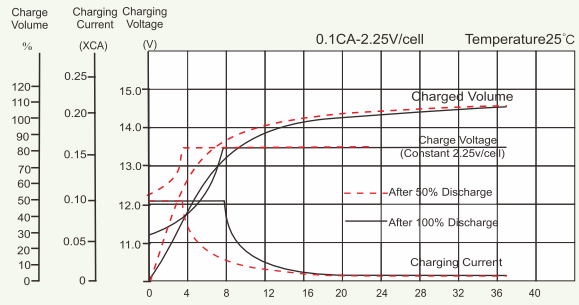
- Compliance with IEC 60896 and YD/T 799 standards
- UL Certified
- Manufactured in Leoch®IATF16949, ISO 45001,ISO 9001 and ISO 14001 certified production facilities

Discharge Characteristics



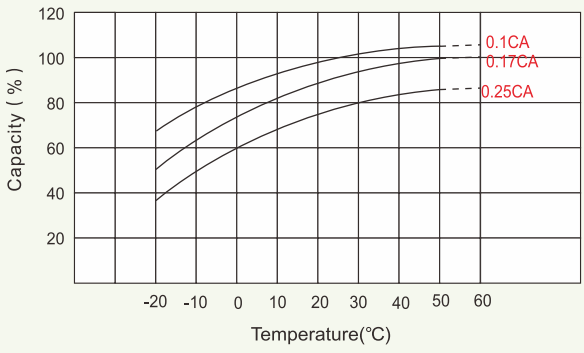
Discharge Time

Float Charging Characteristics

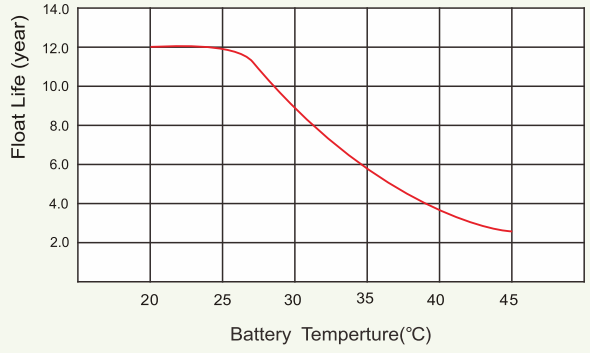


Charging Time(hours)

Temperature Effects in Relation to Battery Capacity



Temperature Effects on Long Term Float Life



Vectronic

Due to product improvement, above specifications are subject to change without prior notice.

© 2025