

## DURATION SERIES VRLA BATTERY

By combining up-to-date DCP-II formula in the positive plates and enhanced electrolyte for VRLA, bosfa created an innovative range of DC batteries. This range features deep cycling use with higher cyclic life when compared with the standard Duration range. This series is highly suited to cyclic applications such as outdoor applications, small RE systems and electric vehicles.

**12 V** voltage    **200Ah** capacity    **AGM** tech    **Enhanced deep cycling**



### TECHNICAL SPECIFICATIONS

Nominal Voltage (V)	12 (6 cells per unit)
Designed Floating Life (20°C)	12 Years
Nominal Capacity (20°C)	200 Ah @ 10HR-rate (to 1.80Vpc)
Dimension (mm)	L522mm x W238mm x H223mm
Approx. Weight	57.5 kg (126.5 lbs)
Terminal Type	Female Copper Insert M8 (torque:10~12N.m)
Internal Resistance	Approx. 0.003 Ohm (fully charged @ 20°C)
Max. Charge Current	50 A
Max. Discharge Current (5S)	1000 A
Short Circuit Current	4000 A
Self Discharge	Approx. 3% per month @ 20°C
Ambient Temperature	Discharge: -20~60°C Charge: -20~60°C Storage: -20~45°C
Float Charge Voltage (20~25°C)	13.6-13.8V (-3mV/ cell/ °C)
Equalize and cycle Use Charge Voltage (20~25°C)	14.4-14.8V (-5mV/ cell / °C)
Container Material	ABS (UL94-V0 optional)



ISO9001



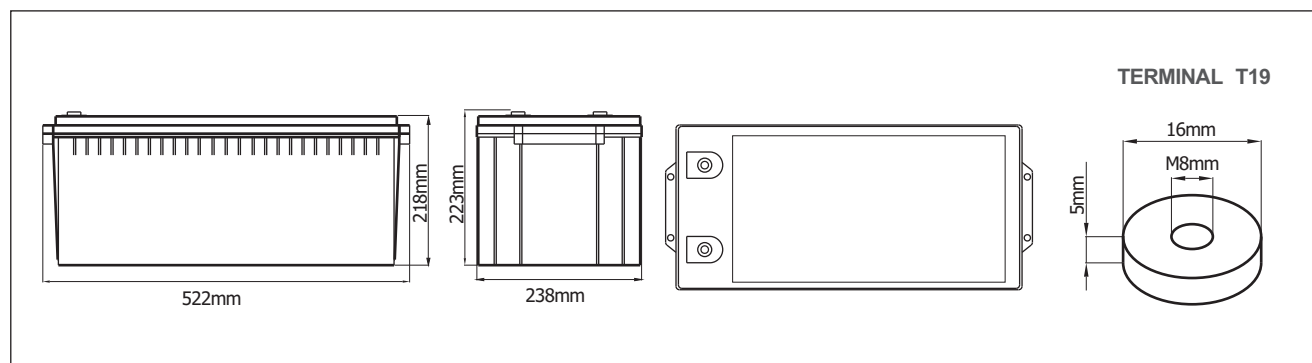
ISO14001



#### Complied standards

- IEC 60896-21/22
- JIS C8704
- GB/T19638

### BATTERY DIMENSIONS

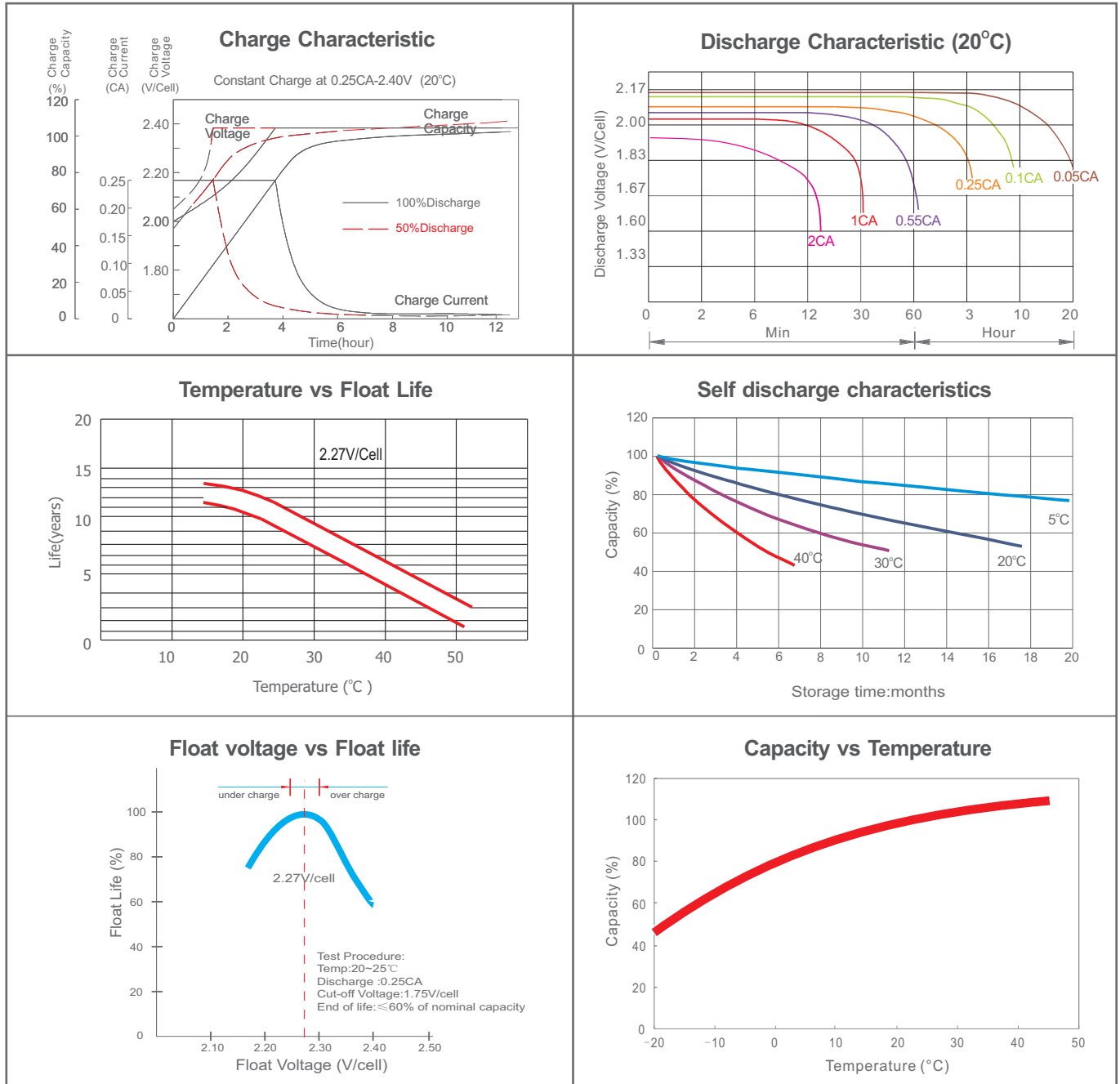


### BATTERY DISCHARGE TABLE

Constant Current Discharge Characteristics: Amps (25°C)											
F.V/Time	10 m in	15 m in	30 m in	1 h	2 h	3 h	4 h	5 h	8 h	10 h	20 h
1.60V	384	317	195	131	77.7	56.1	45.2	37.6	25.7	21.2	11.4
1.67V	353	298	186	128	76.4	55.4	44.6	37.1	25.4	20.9	11.2
1.70V	321	282	179	125	75.4	54.8	44.1	36.8	25.1	20.7	10.9
1.75V	298	262	173	122	74.1	53.9	43.6	36.4	24.7	20.4	10.7
1.80V	271	244	166	118	72.5	52.9	42.6	35.5	24.1	20.0	10.5
1.85V	244	222	156	113	69.7	51.2	41.4	34.6	23.6	19.5	10.3

Constant Power Discharge Characteristics: W/cell (25°C)											
F.V/Time	10 m in	15 m in	30 m in	1 h	2 h	3 h	4 h	5 h	8 h	10 h	20 h
1.60V	689	578	361	244	131	95.3	77.1	64.5	44.5	36.9	19.9
1.67V	642	548	346	240	130	94.8	76.5	64.1	44.1	36.6	19.6
1.70V	589	523	336	236	129	94.3	76.3	64.0	43.9	36.4	19.3
1.75V	554	491	327	233	128	93.7	76.1	63.7	43.7	36.2	19.1
1.80V	509	462	316	227	126	92.7	75.0	62.7	43.0	35.8	18.9
1.85V	464	425	301	219	123	90.4	73.5	61.7	42.3	35.0	18.5

**CHARACTERISTICS**



**FINAL VOLTAGE SETTINGS RECOMMENDED ACCORDING TO THE DISCHARGE CURRENT**

Discharge Current I (A)	$I \leq 0.08C$	$0.08C \leq I < 0.2C$	$0.2C \leq I < 0.6C$	$0.6C \leq I < 1.0C$	$I \geq 1.0C$
Final of Voltage	$\geq 1.85V_{pc}$	$\geq 1.80V_{pc}$	$\geq 1.75V_{pc}$	$\geq 1.70V_{pc}$	$\geq 1.60V_{pc}$