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BATTERY LIFE CERTIFICATE

PRODUCT LFP12100AFTHT 12V100AH VRLA BATTERIES WITH DESIGNED FLOATING APPLICATION OF 14 YEARS AT 25 CENTIGRADE DEGRAEES

Note :

1. The positive plates dimensions are 228*120*3.1mm

The negative plates dimensions are 228*120*2.0mm

The material of positive plate are PbO₂.

The material of negative plates is Pb.

The grid of positive plate is Pb-Ca(0.08%) -Sn(0.9%)-Al(0.025%)alloy grids.

The grid of negative plate is Pb-Ca(0.1%)-Sn(0.25%)-Al(0.025%) alloy grids.

2. This battery is with dimensions of 395*110*286mm at present .

Floating life at temperature (60℃)

Battery model : LFP12100AFTHT (Gel, 12V100AH)

Method: The battery will be subject to charge at constant voltage (2.3V/cell)

under the ambient temperature at $140^\circ F(60^\circ {\rm C})$.Then check the capacity

every 3 weeks (3h current discharge up to 1.70V/cell at $77^{\circ}F$,25 $^{\circ}C$) 3 weeks are equivalent to one cycle .

Standard: The floating life will be ended if the residual capacity less than 80% of the nominal capacity(C3).

Note : One cycle is equivalent to One year float life at 25° C.

Test results:

Cycle	LFP12100AFT HT (12V100AH)
	Discharge time
Initial	3h30min
1	3h33min
2	3h34min
3	3h31min
4	3h28min
5	3h25min
6	3h20min
7	3h16min
8	3h09min
9	3h05min
10	3h01min
11	2h55min
12	2h50min
13	2h44min
14	2h35min
15	
Results	14 cycles

Conclusion :

LFP12100AFTHT battery can operate at high temperatures(140°F (60°C)

for floating charge over 14 cycles, it is equal to battery floating life is 14 years

at 25℃(equal to 7years at 35℃)



2020-10-22