

Report No.: BTEK240509016AE002

Page: 1 of 5

# TEST REPORT

Test Result:	Pass*		
Date of Issue:	2024-07-09		
Date of Test:	2024-06-14 to 2024-07-08		
Date of Receipt:	2024-06-13		
	447498 D01 General RF Exposure Guidance v06		
Standard(s) :	47 CFR Part 2 Subpart J Section 2.1091		
FCC ID:	2BDSV-36100		
Trade Mark:	Litime		
	38.4V 100Ah Self-Heating, 38.4V 100Ah BT		
	38.4V 100Ah Group 31, 38.4V 100Ah Group 22, 38.4V 100Ah LTCP,		
	38.4V 100Ah GC2, 38.4V 100Ah Group 24, 38.4V 100Ah H190,		
	38.4V 100Ah Mini, 38.4V 100Ah GC, 38.4V 100Ah GC Smart,		
	38.4V 100Ah Plus, 38.4V 100Ah Pro, 38.4V 100Ah Max,		
Adding Model(s):	38.4V 100Ah TM, 38.4V 100Ah Smart, 38.4V 100Ah Smart TM,		
Test Model.:	38.4V 100Ah		
EUT Name:	Litime 38.4V 100Ah LiFePO4 Battery		
CEquipment Under Test (I	Baolong 5th Road, Baolong Community, Baolong Street, Longgang Distric Shenzhen, China		
Address of Manufacture			
Manufacturer:	Shenzhen Litime Technology Co., Ltd		
Address of Applicant:	Room 301, Building B, Tongzhou Electronics Longgang Factory, No. 1, Baolong 5th Road, Baolong Community, Baolong Street, Longgang Distric Shenzhen, China		
Applicant:	Shenzhen Litime Technology Co., Ltd		
Application No.:	BTEK240509016AE		

\* In the configuration tested, the EUT complied with the standards specified above.

n Car ño

Lion Cai/ Approved & Authorized EMC Laboratory Manager





Report No.: BTEK240509016AE002

Page: 2 of 5

Revision Record				
Version	Chapter	Date	Modifier	Remark
V0		2024-07-09		Original
	$\bigcirc$			

Authorized for issue by		
BTEK	Zora . Huang	
	Zora Huang/Project Engineer	
0	June Li	
	June Li/Reviewer	0 0

#### Remarks:

The results shown in this test report refer only to the sample(s) tested, this test report cannot be reproduced, except in full, without prior written permission of the company. The report would be invalid without specific stamp of test institute and the signatures of compiler and approver.



# 2 Contents

Report No.: BTEK240509016AE002

Page: 3 of 5

# Page 1 Cover Page. 2 Contents 3 3 General Information 4 3.1 Details of E.U.T. 3.2 Description of Support Units 4 3.3 Test Location 3.4 Deviation from Standards 3.5 Abnormalities from Standard Conditions 4 4.1Assessment Result









Page: 4 of 5

# **General Information**

#### 3.1 Details of E.U.T.

DC 38.4V 100Ah	
2402MHz to 2480MHz	
V5.0 BLE	
GFSK	
40	
PCB Antenna	
1.2dBi	
BTEK240509016AE-01	
	2402MHz to 2480MHzV5.0 BLEGFSK40PCB Antenna1.2dBi

Remark: The information in this section is provided by the applicant or manufacturer, BANTEK is not liable to the accuracy, suitability, reliability or/and integrity of the information.

Model No.: 38.4V 100Ah , 38.4V 100Ah TM, 38.4V 100Ah Smart, 38.4V 100Ah Smart TM,

38.4V 100Ah Plus, 38.4V 100Ah Pro, 38.4V 100Ah Max, 38.4V 100Ah Mini, 38.4V 100Ah GC,

38.4V 100Ah GC Smart, 38.4V 100Ah GC2, 38.4V 100Ah Group 24, 38.4V 100Ah H190,

38.4V 100Ah Group 31, 38.4V 100Ah Group 22, 38.4V 100Ah LTCP, 38.4V 100Ah Self-Heating, 38.4V 100Ah BT

Only the model 38.4V 100Ah was tested. According to the declaration from the applicant, the electrical circuit design, layout, components used, internal wiring and functions of other models are identical for the above models, with only difference on Model No.

#### 3.2 Description of Support Units

Description	Manufacturer	Model No.	Serial No.
1			1

#### 3.3 Test Location

All tests were performed at:

Shenzhen BANTEK Testing Co., Ltd.,

A5&A6, Building B1&B2, No.45 Gangtou Road, Bogang Community, Shajing Street, Bao'an District, Shenzhen, Guangdong, China 518103

Tel:0755-2334 4200 Fax: 0755-2334 4200

FCC Registration Number: 264293

Designation Number: CN1356

No tests were sub-contracted.

# 3.4 Deviation from Standards

None

# 3.5 Abnormalities from Standard Conditions

None





Report No.: BTEK240509016AE002

Page: 5 of 5

### **4 Test Requirement**

According to §1.1307(b)(1) and KDB 447498 D01 General RF Exposure Guidance v06, system operating under the provisions of this section shall be operating in a manner that the public is not exposed to radio frequency energy level in excess limit for maximum permissible exposure.

Limits for Maximum Permissible Exposure (MPE)

Frequency range (MHz)	Electric field strength (V/m)	Magnetic field strength (A/m)	Power density (mW/cm <sup>2</sup> )	Averaging time (minutes)
(A) Limits for Occup	oational/Controlled E	xposures		
0.3–3.0	614	1.63	*(100)	6
3.0–30	1842/f	4.89/f	*(900/f <sup>2</sup> )	6
30–300	61.4	0.163	1.0	6
300–1500	alter		f/300	6
1500–100,000			5	6
(B) Limits for Gener	ral Population/Uncor	ntrolled Exposure		
0.3–1.34	614	1.63	*(100)	30
1.34–30	824/f	2.19/f	*(180/f <sup>2</sup> )	30
30–300	27.5	0.073 0.2 3		30
300–1500	0	0	f/1500	30
1500–100,000	0	<u> </u>	1.0	30

f = frequency in MHz

Friis transmission formula: Pd = (Pout\*G)/(4\*pi\*r<sup>2</sup>)

#### Where

**Pd** = power density in  $mW/cm^2$ , **Pout** = output power to antenna in mW;

G = gain of antenna in linear scale, Pi = 3.1416;

**R** = distance between observation point and center of the radiator in cm

Pd id the limit of MPE, 1 mW/cm<sup>2</sup>. If we know the maximum gain of the antenna and the total power input to the antenna, through the calculation, we will know the distance r where the MPE limit is reached.

#### 4.1Assessment Result

⊠ Passed

Not Applicable

Fr	requency (MHz)	Conducted Power (dBm)	Maximum Tune-up (dBm)	Power Density (mW/cm2)	Limit (mW/cm2)	Result
	2440	2.38	2.50	0.0005	1.0000	Pass

- End of the Report -



