TEST REPORT
EN IEC 62619
Secondary cells and batteries containing alkaline or other non-acid electrolytes – Safety requirements for secondary lithium cells and batteries, for use in industrial applications

Report Number. .....:	TSZ23120591-P01-R01
Date of issue .....:	2024-01-10
Total number of pages.....:	7 Pages
Applicant's name.....:	**Chengdu Greenfaith New Energy Technology Co., Ltd.**
Address .....:	**Room 4008, Building 3, 88 Jitai 5th Road, High-Tech Zone,Pilot Free Trade Zone, Chengdu, Sichuan, P.R.China**
Test specification:	
Standard .....:	EN IEC 62619:2022

General disclaimer:

The test results presented in this report relate only to the object tested.
This report shall not be reproduced, except in full, without the written approval of the Issuing laboratory.

Test item description .....:	**LiFePO4 Battery(Li-ion)**
Trade Mark(s).....:	LVFU
Manufacturer.....:	Sinocat Environmental Technology Co., Ltd. No.88,Gunan Street,High-Tech Zone,Chengdu City, Sichuan, China
Model/Type reference .....:	**LFR51100**
Ratings .....:	51.2V, 100Ah, 5.12kWh

Testing Laboratory:	Shenzhen Tiansu Calibration and Testing Co., Ltd.	
Testing location/ address ..... :	No.2, Jinlong Avenue, Longgang District, Shenzhen, Guangdong, China	
Tested by (name, function, signature) ..... :	Sean Xie /Test engineer	Sean Xie
Reviewed by (name, function, signature) .. :	Davis Ding /Reviewer	Davis Ding
Approved by (name, function, signature) .. :	Duan jiangtao /Approved	Duan jiangtao

SHENZHEN TIANSU CALIBRATION AND TESTING CO., LTD. Report Seal (01-01)

Summary of testing:	
Tests performed (name of test and test clause): N/A	**Testing location:** N/A
The product fulfils the requirements of IEC 62619:2022.	

Copy of marking plate:

The artwork below may be only a draft. The use of certification marks on a product must be authorized by the respective NCBs that own these marks.



Test item particulars.....:	
Classification of installation and use.....:	To be defined in final product
Supply Connection.....:	DC connector
Recommend charging method declared by the manufacturer.....:	Charging the battery with 50A constant current until 57.6V, then constant voltage until charging current reduces to 5.0A
Possible test case verdicts:	
- test case does not apply to the test object.....:	N/A
- test object does meet the requirement.....:	P (Pass)
- test object does not meet the requirement.....:	F (Fail)
Testing.....:	
Date of receipt of test item .....:	N/A
Date (s) of performance of tests.....:	N/A

General remarks:

"(See Enclosure #)" refers to additional information appended to the report.

"(See appended table)" refers to a table appended to the report.

Throughout this report a ☐ comma / ☒ point is used as the decimal separator.

Name and address of factory (ies).....: Same as manufacturer

General product information and other remarks:

The battery of model **LFR51100** is composed of sixteen lithium-ion cells (16S1P), and equipped with overcharge, overdischarge, overcurrent, and short circuit protection circuits.

- Battery (Model: **LFR51100**) has been evaluated to comply with ST/SG/AC.10/11/Rev.7/Section 38.3, test report No.: **TSZ23120118-P02-R01** issued on 2023-12-29, issued by Shenzhen Tiansu Calibration and Testing Co., Ltd.

	Cell	Battery
Model	48173125-100Ah	**LFR51100**
Rated capacity(Ah)	100	100
Nominal voltage(V)	3.2	51.2
Recommended Charge Current(A)	50	50
Maximum Charge Current(A)	130	100
Recommended Discharge Current(A)	50	50
Maximum Discharge Current(A)	130	100
Maximum Charge Voltage(V)	3.65	57.6
End-of-discharge Voltage(V)	2.5	43.2
Charge temperature Range(°C)	0~60	0~55
Discharge temperature Range(°C)	-30~60	-18~58
Nominal mass(kg)	approx. 2.25	48±1
External dimensions(mm)	173.9*132.2*48.0	482.0±1*468.0±1*178.0±1

Remark:
1) At the request of the customer, add applicants and change their corresponding models and product name, other information remains unchanged.
2) Change the applicant's name from " **Chengdu Greenfaith New Energy Technology Co., Ltd.** " to " **Chengdu Greenfaith New Energy Technology Co., Ltd.** ", See Page 1:
3) Change model from " **ZT-51100J** " to " **LFR51100** ", See Page 1
4) Change product name from " **Rack mounted Li-ion battery** " to " **LiFePO4 Battery(Li-ion)** ", See Page 1

For above change, No related test was considered necessary.

Product Photo

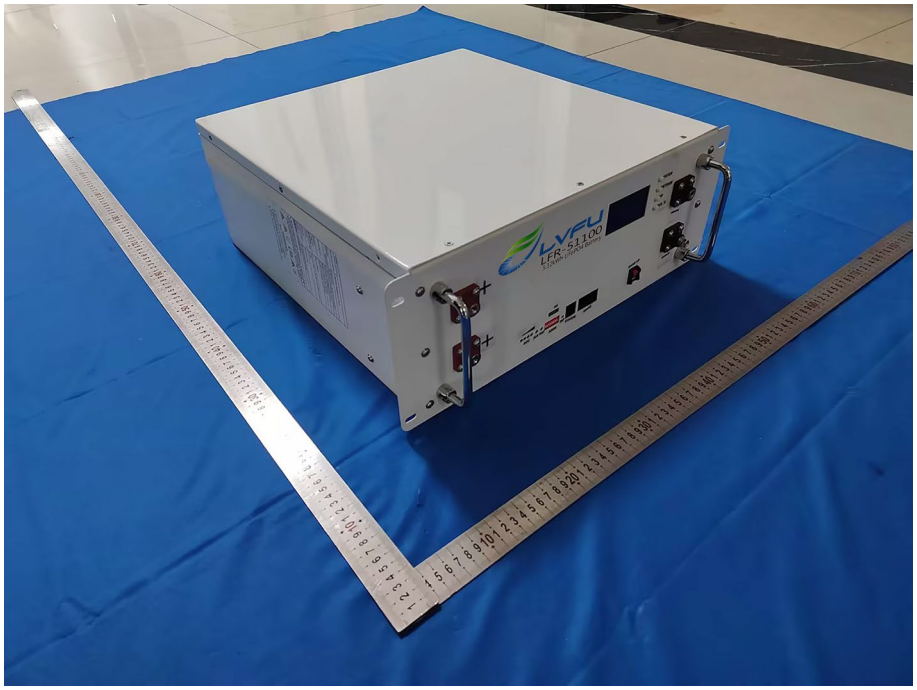


Figure 1 Front view of battery system

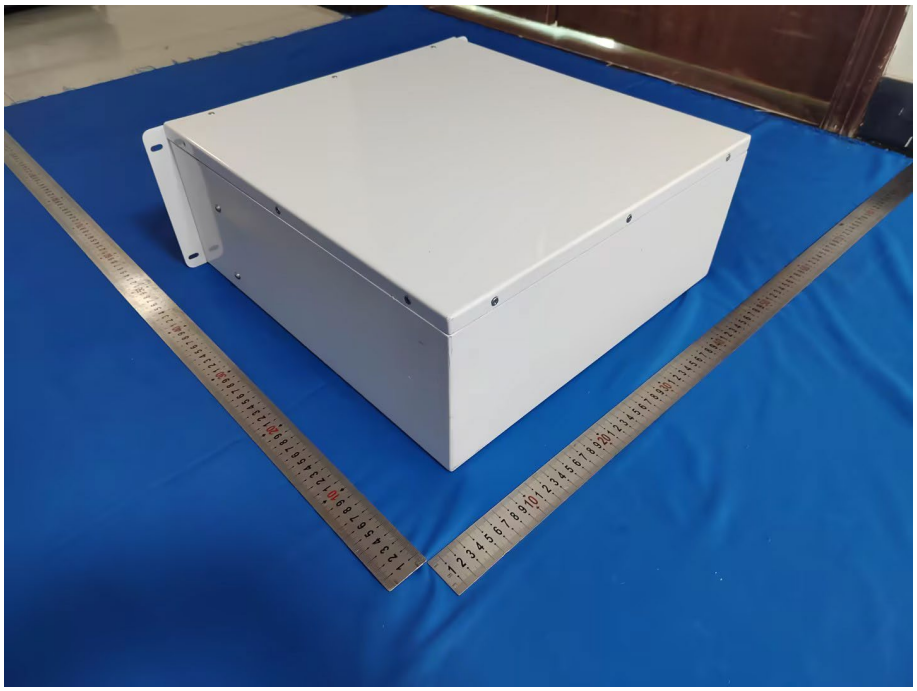


Figure 2 Back view of battery system

Amendment sheet:

Revision	Issue Date	Revision Content	Revised By
0	2024-01-10	Original report	Sean Xie
1	2024-01-10	At the request of the customer, add applicants and change their corresponding models and product name, other information remains unchanged. This report is based on the report No. TSZ23120180-P01-R01, there is no need to retest, this report is invalid without the original report	Sean Xie