



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

Lithium-ion Battery UN38.3 Test Report

Recommendations on the TRANSPORT OF DANGEROUS GOODS

(Manual of Tests and Criteria, Sixth revised edition, Amend 1)

Customer: Lenovo

Model: L19M3PF0

Rating/ Mass: 11.25V, Typical Capacity 3280mAh/ 36Wh

Rated Capacity 3175mAh/ 35Wh/ 171 (g)

Issue date: 2019/05/20

Approved By	Checked By	Prepared By
Assistant Manager	Authorized Signatory	Test Engineer

SIMPLO TECHNOLOGY CO., LTD.

ADD : No. 471 Pa Teh Rd, Sec 2 Hu Kou, Hsinchu Hsien, 303 Taiwan

TEL: +886-3-5695920

FAX: +886-3-5695931



SIMPLO TECHNOLOGY (CHANGSHU) INC.

ADD : No.888 Dongnan Avenue, Changshu New & Hi-Tech Industrial Development Zone, Changshu, Jiangsu, China

TEL: +86-512-52302255

FAX: +86-512-52302277



SIMPLO TECHNOLOGY (CHONGQING) INC.

ADD : No.2 Zongbao Avenue, Shapingba District, ChongQing, China

TEL: +86-23-61718899

FAX: +86-23-61210488



HUAPU TECHNOLOGY (CHANGSHU) INC.

ADD : No.888 Dongnan Avenue, Changshu New & Hi-Tech Industrial Development Zone, Changshu, Jiangsu, China

TEL: +86-512-52302255

FAX: +86-512-52302277



Email : Test_Lab@simplo.com.tw

Website : [http://www.simplo.com.tw/](http://www.simplo.com.tw)

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效，本報告分離使用無效

This test report is valid only to the items, Invalid for separation using.



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

1. Purpose of the Test :

To test each cell/battery is of the type proved to meet the requirements in United Nations Recommendations on the TRANSPORT OF DANGEROUS GOODS, Manual of Tests and Criteria, Sixth revised edition, Amend 1, Section 38.3.

2. Test Result :

Test results of the UN Recommendations on the Transport of Dangerous Goods

No.	Test Item	Test results
T.1	Altitude simulation	PASS
T.2	Thermal test	PASS
T.3	Vibration test	PASS
T.4	Shock test	PASS
T.5	External short circuit	PASS
T.6	Impact, Crush test	PASS
T.7	Overcharge	PASS
T.8	Forced discharge	PASS

3. Test Lab: Email : Test_Lab@simplo.com.tw Website : <http://www.simplo.com.tw/>

●	SIMPLO (Taiwan) Laboratory ADD : No. 471 Pa Teh Rd, Sec 2 Hu Kou, Hsinchu Hsien, 303 Taiwan TEL: +886-3-5695920 FAX: +886-3-5695931
	SIMPLO (CHANGSHU) Laboratory ADD : No.888 Dongnan Avenue, Changshu New & Hi-Tech Industrial Development Zone, Changshu, Jiangsu, China TEL: +86-512-52302255 FAX: +86-512-52302277
	SIMPLO (CHONGQING) Laboratory. ADD : No.2 Zongbao Avenue, Shapingba District, ChongQing, China TEL: +86-23-61718899 FAX: +86-23-61210488

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效，本報告分離使用無效
 This test report is valid only to the items, Invalid for separation using.



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

4. Product manufacturer : Email : Test_Lab@simplo.com.tw Website : <http://www.simplo.com.tw/>

●	SIMPLO (Taiwan) Laboratory ADD : No. 471 Pa Teh Rd, Sec 2 Hu Kou, Hsinchu Hsien, 303 Taiwan TEL: +886-3-5695920 FAX: +886-3-5695931
	SIMPLO (CHANGSHU) Laboratory ADD : No.888 Dongnan Avenue, Changshu New & Hi-Tech Industrial Development Zone, Changshu, Jiangsu, China TEL: +86-512-52302255 FAX: +86-512-52302277
●	SIMPLO (CHONGQING) Laboratory. ADD : No.2 Zongbao Avenue, Shapingba District, ChongQing, China TEL: +86-23-61718899 FAX: +86-23-61210488
	HUAPU TECHNOLOGY (CHANGSHU) INC. ADD : No.888 Dongnan Avenue, Changshu New & Hi-Tech Industrial Development Zone, Changshu, Jiangsu, China TEL: +86-512-52302255 FAX: +86-512-52302277

5. Test Quantity :

- 5.1 Four batteries, at first cycle, in fully charged states. (For T.1~T.5)
- 5.2 Four batteries, after 25 cycles ending in fully charged states. (For T.1~T.5)
- 5.3 Five component cells, at first cycle at 50% of the design rated capacity. (For T.6)
- 5.4 Five component cells, after 25 cycles at 50% of the design rated capacity. (For T.6)
- 5.5 Four batteries, at first cycle, in fully charged states. (For T.7)
- 5.6 Four batteries, after 25 cycles ending in fully charged states. (For T.7)
- 5.7 Ten component cells, at first cycle in fully discharge states. (For T.8)
- 5.8 Ten component cells, after 25 cycles ending in fully discharged states. (For T.8)

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

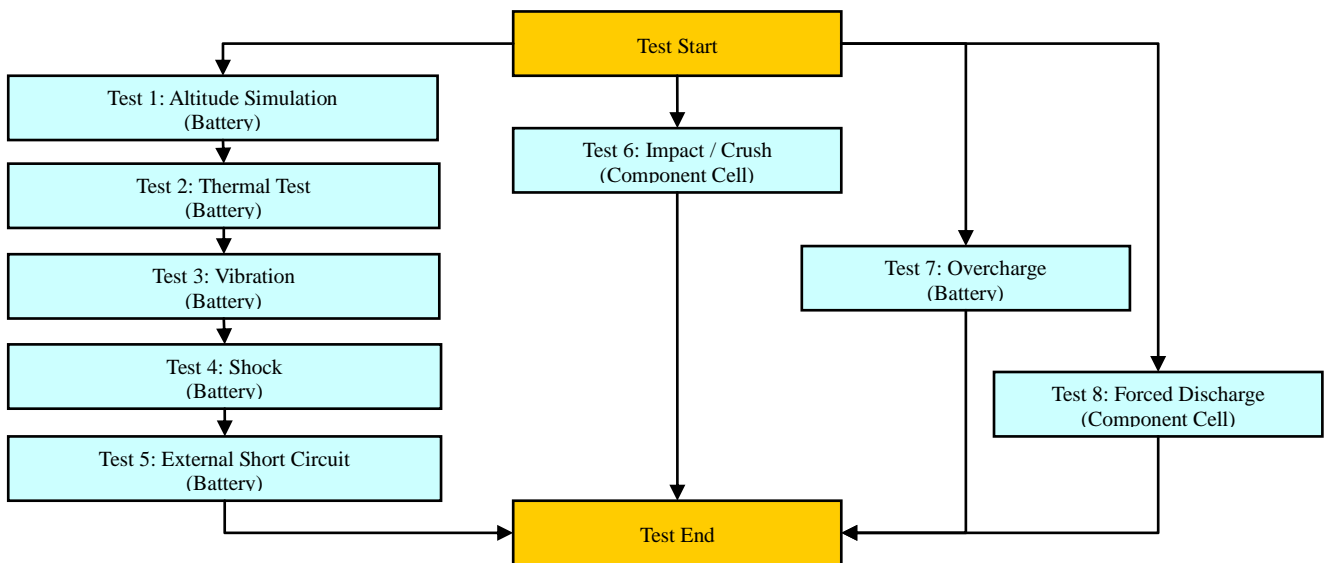
本測試報告僅對上述測試項目有效,本報告分離使用無效
 This test report is valid only to the items, Invalid for separation using.



6. Test Procedure :

6.1 All detailed test procedures must be based on United Nations Recommendations on the TRANSPORT OF DANGEROUS GOODS, Manual of Tests and Criteria, Sixth revised edition, Amend 1, Section 38.3.

6.2 Test flow shall be followed as below.



Conclusion: The samples had passed the test items of UN38.3.

7. Comment : NA



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

8. Test Equipment :

SMP SIMPLO TECHNOLOGY CO., LTD.

Address : No.471, Sec.2, Pa Teh Rd., Hu Kou, Hsin Chu Hsien 303, Taiwan

TEL: +886-3-5695920; FAX: +886-3-5695931

Revised Date: 2019-05-20

Test Instruments Reference List								
Used	Instrument ID	Instrument Name	Type	Range of use	Manufacturer	Calibration Date Last	Calibration Date Next	Remarks
Pretest								
V	ML-761	Learning	715C	0~18V 0~8A	SMP	2019/2/25	2020/2/25	
V	ML-762	Learning	715C	0~18V 0~8A	SMP	2019/1/3	2020/1/3	
V	ML-763	Learning	715C	0~18V 0~8A	SMP	2019/2/26	2020/2/26	
V	ML-764	Learning	715C	0~18V 0~8A	SMP	2019/1/3	2020/1/3	
	ML-925	Learning	750C8	0~60V 0~30A	SMP	2019/1/3	2020/1/3	
T.1 Altitude Simulation								
V	ML-522	Altitude	SVT-120	kPa:30~90	HSIN JIANG	2018/7/18	2019/7/18	
V	ML-257	Multimeter	34401A	Note 1	Agilent	2019/2/26	2020/2/26	
V	ML-494	Electronic Balance	XS1220M-SCS	1-1220 gf	PRECISA	2018/7/18	2019/7/18	
	ML-523	Electronic Balance	MTW-30K	30*0.005kg		2018/9/12	2019/9/12	
V	ML-550	Data Logger	313	15~35 °C; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
V	ML-555	Barometric Air Pressure	C300	750 to 1100 mbar	Lufft	2018/9/18	2019/9/18	
T.2 Thermal Test								
V	ML-789	Thermal Shock	GTST-080-65-AW	T:-40 to 100°C	GF	2019/1/3	2020/1/3	
V	ML-257	Multimeter	34401A	note 1	Agilent	2019/2/26	2020/2/26	
V	ML-494	Electronic Balance	XS1220M-SCS	1-1220 gf	PRECISA	2018/7/18	2019/7/18	
	ML-523	Electronic Balance	MTW-30K	30*0.005kg		2018/9/12	2019/9/12	
V	ML-551	Data Logger	313	15~35 °C; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
T.3 Vibration								
V	ML-233	Vibration	KD-9636-EM-300F2K-30N80	F:5~2000Hz G:0.2~20G	King Design	2018/8/24	2019/8/24	
V	ML-257	Multimeter	34401A	note 1	Agilent	2019/2/26	2020/2/26	
V	ML-494	Electronic Balance	XS1220M-SCS	1-1220 gf	PRECISA	2018/7/18	2019/7/18	
	ML-523	Electronic Balance	MTW-30K	30*0.005kg		2018/9/12	2019/9/12	
V	ML-552	Data Logger	313	15~35 °C; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
T.4 Shock								
V	ML-056	Shock	DP-1200-25	G:10~600G	King Design	2018/8/24	2019/8/24	
V	ML-257	Multimeter	34401A	note 1	Agilent	2019/2/26	2020/2/26	
V	ML-494	Electronic Balance	XS1220M-SCS	1-1220 gf	PRECISA	2018/7/18	2019/7/18	
	ML-523	Electronic Balance	MTW-30K	30*0.005kg		2018/9/12	2019/9/12	
V	ML-551	Data Logger	313	15~35 °C; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
T.5 External Short Circuit								
V	ML-894	Battery Hitester	BT3562	1mΩ ~ 30kΩ	HIOKI	2018/6/11	2019/6/11	
V	ML-459	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200°C	Yokogawa	2018/9/12	2019/9/12	
V	ML-460	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200°C	Yokogawa	2018/9/12	2019/9/12	
V	ML-521	Oven	9031	30~80 °C	YEOW LONG	2018/9/12	2019/9/12	
V	ML-549	Data Logger	313	15~35 °C; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
T.6 Impact / Crush								
V	ML-339	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 150°C	Yokogawa	2019/5/10	2020/5/10	
	ML-076	Impact Tester			JYI SHENG	2019/1/3	2020/1/3	
	ML-553	Crush Tester	BCT-01		Simplo	2019/5/10	2020/5/10	
V	ML-866	Crush Tester	M0654		JYI SHENG	2019/4/8	2020/4/8	
	ML-459	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200°C	Yokogawa	2018/9/12	2019/9/12	

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效,本報告分離使用無效

This test report is valid only to the items, Invalid for separation using.



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

SMP SIMPLO TECHNOLOGY CO., LTD.

Address : No.471, Sec.2, Pa Teh Rd., Hu Kou, Hsin Chu Hsien 303, Taiwan

TEL: +886-3-5695920; FAX: +886-3-5695931

Revised Date: 2019-05-20

Test Instruments Reference List								
Used	Instrument ID	Instrument Name	Type	Range of use	Manufacturer	Calibration Date Last	Calibration Date Next	Remarks
	T.7 Overcharge							
	ML-482	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-483	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-484	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-486	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-487	Programmable DC Source	DS6024	1-60 Vdc, 0.3-24A	MOTECH	2019/5/9	2020/5/9	
V	ML-549	Data Logger	313	15~35 ℃; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
	ML-459	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200℃	Yokogawa	2018/9/12	2019/9/12	
	ML-460	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200℃	Yokogawa	2018/9/12	2019/9/12	
V	ML-918	Overcharge & Forced discharge tester	T901	3~30 Vdc, Charge: 0.05~20A Discharge: 0.02~10A	SMP	2019/5/10	2020/5/10	
	T.8 Forced Discharge							
	ML-132	Electronic Load	3311C	60V,60A, 300W	Prodigit	2019/2/26	2020/2/26	
	ML-133	Electronic Load	3311C	60V,60A, 300W	Prodigit	2019/2/26	2020/2/26	
	ML-136	Electronic Load	3311C	60V,60A, 300W	Prodigit	2019/2/26	2020/2/26	
	ML-192	Electronic Load	3311C	60V,60A, 300W	Prodigit	2019/2/26	2020/2/26	
	ML-269	Electronic Load	3311C	60V,60A, 300W	Prodigit	2019/2/26	2020/2/26	
	ML-532	DC Electronic Load	33511-01	120V, 240A, 3600W	Prodigit	2018/7/18	2019/7/18	
	ML-482	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-483	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-484	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-486	Programmable DC Source	DS10014	1-100Vdc, 0.3-14.4A	MOTECH	2019/5/9	2020/5/9	
	ML-487	Programmable DC Source	DS6024	1-60 Vdc, 0.3-24A	MOTECH	2019/5/9	2020/5/9	
V	ML-549	Data Logger	313	15~35 ℃; 30~80 %RH	CENTER	2018/9/18	2019/9/18	
	ML-459	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200℃	Yokogawa	2018/9/12	2019/9/12	
	ML-460	Data Acquisition	MX100-E-1D	1-100 Vdc, -50 to 200℃	Yokogawa	2018/9/12	2019/9/12	
V	ML-918	Overcharge & Forced discharge tester	T901	3~30 Vdc, Charge: 0.05~20A Discharge: 0.02~10A	SMP	2019/5/10	2020/5/10	
Note 1: DC Voltage: 0.1-1000V; AC Voltage: 0.5-700V at 60Hz, 1kHz; Resistance: 10Ω-10MΩ; DC Current: 0.1mA-3A; AC Current: 0.01-3A at 60Hz, 0.01-1A, at 1kHz.								

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效,本報告分離使用無效

This test report is valid only to the items, Invalid for separation using.



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

9. T.1~T.8 Detail Reports:

UN 38.3 Test Datasheet UN38.3/ST/SG/AC.10/11/Rev.6/Amend.1

Control Number: SLEU-1905004	Customer: Lenovo	Model Name: L19M3PF0	SMP Project Name: Kylin
Pack P/N: 928QA288H (A)(B)	Configuration: 3S1P	Test Duration: 2019/04/29~2019/05/20	Reviewer: Esmond

Test Sample Identification: Large Battery Small Battery Single-cell Battery

Battery Pack					Component Cell			
Used	Sample No.	Sample State	Used	Sample No.	Sample State	Used	Sample No.	Sample State
V	01~04	1 Cycle, Fully charged	V	05~08	25 Cycles, Fully charged	V	01C~05C	1 Cycle, 50% SOC
V	09~12	1 Cycle, Fully charged	V	13~16	25 Cycles, Fully charged	V	06C~10C	25 Cycles, 50% SOC
						V	11C~20C	1 Cycle, Fully discharged (0% SOC)
						V	21C~30C	25 Cycles, Fully discharged (0% SOC)

T.1 Altitude Simulation

Start time: 2019/05/06 08:40	Ambient temp.: 24.2 °C								Operator: Fulong	
Finish time: 2019/05/06 15:50	Sample 01	Sample 02	Sample 03	Sample 04	Sample 05	Sample 06	Sample 07	Sample 08		
OCV (V)	Before	12.544	12.546	12.540	12.545	12.549	12.542	12.547	12.544	
	After	12.526	12.525	12.517	12.526	12.529	12.520	12.528	12.526	
	Residual OCV %	99.86%	99.83%	99.82%	99.85%	99.84%	99.82%	99.85%	99.86%	
Mass (g)	Before	170.423	171.192	170.949	171.037	171.124	170.541	170.263	170.839	
	After	170.420	171.192	170.945	171.036	171.122	170.541	170.260	170.837	
	Mass loss %	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
Results	P	P	P	P	P	P	P	P	P	

T.2 Thermal Test

Start time: 2019/05/06 16:10	Ambient temp.: 24.0 °C								Operator: Fulong	
Finish time: 2019/05/13 09:00	Sample 01	Sample 02	Sample 03	Sample 04	Sample 05	Sample 06	Sample 07	Sample 08		
OCV (V)	Before	12.526	12.525	12.517	12.526	12.529	12.520	12.528	12.526	
	After	12.384	12.377	12.377	12.380	12.382	12.377	12.384	12.381	
	Residual OCV %	98.87%	98.82%	98.88%	98.83%	98.83%	98.86%	98.85%	98.84%	
Mass (g)	Before	170.420	171.192	170.945	171.036	171.122	170.541	170.260	170.837	
	After	170.408	171.175	170.925	171.023	171.109	170.526	170.241	170.823	
	Mass loss %	0.01%	0.01%	0.01%	0.01%	0.01%	0.01%	0.01%	0.01%	
Results	P	P	P	P	P	P	P	P	P	

T.3 Vibration

Start time: 2019/05/13 09:20	Ambient temp.: 23.5 °C								Operator: Fulong	
Finish time: 2019/05/14 09:40	Sample 01	Sample 02	Sample 03	Sample 04	Sample 05	Sample 06	Sample 07	Sample 08		
OCV (V)	Before	12.384	12.377	12.377	12.380	12.382	12.377	12.384	12.381	
	After	12.364	12.361	12.360	12.361	12.362	12.362	12.363	12.365	
	Residual OCV %	99.84%	99.87%	99.86%	99.85%	99.84%	99.88%	99.83%	99.87%	
Mass (g)	Before	170.408	171.175	170.925	171.023	171.109	170.526	170.241	170.823	
	After	170.407	171.174	170.925	171.020	171.107	170.526	170.241	170.820	
	Mass loss %	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
Results	P	P	P	P	P	P	P	P	P	

T.4 Shock

Start time: 2019/05/14 10:00	Ambient temp.: 23.9 °C								Operator: Fulong	
Finish time: 2019/05/14 14:30	Sample 01	Sample 02	Sample 03	Sample 04	Sample 05	Sample 06	Sample 07	Sample 08		
OCV (V)	Before	12.364	12.361	12.360	12.361	12.362	12.362	12.363	12.365	
	After	12.352	12.353	12.351	12.350	12.354	12.349	12.353	12.353	
	Residual OCV %	99.90%	99.94%	99.93%	99.91%	99.94%	99.89%	99.92%	99.90%	
Mass (g)	Before	170.407	171.174	170.925	171.020	171.107	170.526	170.241	170.820	
	After	170.404	171.174	170.925	171.018	171.106	170.524	170.241	170.817	
	Mass loss %	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	
Results	P	P	P	P	P	P	P	P	P	

Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效，本報告分離使用無效

This test report is valid only to the items, Invalid for separation using.



新普科技股份有限公司
 新世電子(常熟)有限公司
 新普科技(重慶)有限公司
 華普電子(常熟)有限公司

Control Number: SLEU-1905004

T.5 External Short Circuit

Start time: 2019/05/14 14:50	Ambient temp.: 24.1 °C								Operator: Fulong
Finish time: 2019/05/15 09:00	Sample 01	Sample 02	Sample 03	Sample 04	Sample 05	Sample 06	Sample 07	Sample 08	
OCV (V)	Before	12.352	12.353	12.351	12.350	12.354	12.349	12.353	12.353
	After	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000
Resistance (<100mΩ)		55.3	58.5	57.9	56.4	60.0	55.8	57.2	59.7
Max Temp. (< 170°C)		57.1	57.6	57.3	57.7	57.4	57.3	57.5	57.8
Results		P	P	P	P	P	P	P	P

T.6 Impact / Crush (Component Cell)

UN38.3/ST/SG/AC.10/11/Rev.6/Amend.1

Impact - Cylindrical cells not less than 18.0 mm in diameter

Crush - Prismatic, pouch, coin/button cells and cylindrical cells less than 18.0 mm in diameter

Start time: 2019/05/08 08:50	Ambient temp.: 23.7 °C					Operator: Fulong
Finish time: 2019/05/09 08:40	Sample 01C	Sample 02C	Sample 03C	Sample 04C	Sample 05C	
Initial OCV (V)	3.706	3.713	3.711	3.704	3.719	
Max Temp. (< 170°C)	24.2	23.5	23.8	24.0	24.5	
Results	P	P	P	P	P	
Sample No.	Sample 06C	Sample 07C	Sample 08C	Sample 09C	Sample 10C	
Initial OCV (V)	3.702	3.715	3.703	3.710	3.717	
Max Temp. (< 170°C)	23.9	23.7	23.6	24.3	24.1	
Results	P	P	P	P	P	

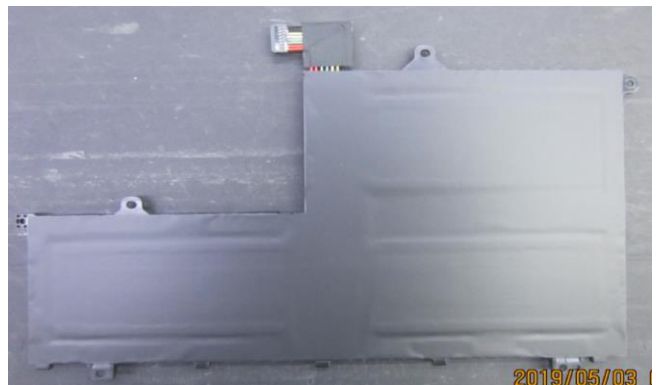
T.7 Overcharge

Start time: 2019/05/10 08:40	Ambient temp.: 24.0 °C								Operator: Fulong
Finish time: 2019/05/20 08:40	Sample 09	Sample 10	Sample 11	Sample 12	Sample 13	Sample 14	Sample 15	Sample 16	
Initial OCV (V)	12.542	12.545	12.543	12.549	12.546	12.544	12.546	12.541	
Results	P	P	P	P	P	P	P	P	

T.8 Forced Discharge (Component Cell)

Start time: 2019/05/09 09:00	Ambient temp.: 23.9 °C								Operator: Fulong
Finish time: 2019/05/17 10:50	Sample 11C	Sample 12C	Sample 13C	Sample 14C	Sample 15C	Sample 16C	Sample 17C	Sample 18C	
Initial OCV (V)	3.437	3.422	3.441	3.428	3.424	3.431	3.453	3.418	
Results	P	P	P	P	P	P	P	P	
Sample No.	Sample 19C	Sample 20C	Sample 21C	Sample 22C	Sample 23C	Sample 24C	Sample 25C	Sample 26C	
Initial OCV (V)	3.426	3.435	3.432	3.449	3.420	3.445	3.442	3.457	
Results	P	P	P	P	P	P	P	P	
Sample No.	Sample 27C	Sample 28C	Sample 29C	Sample 30C					
Initial OCV (V)	3.416	3.452	3.443	3.426					
Results	P	P	P	P					

9. Test Sample:



Form No. : W11-002-B05

本資料為新普科技股份有限公司之智慧財產權，非經本公司書面授權許可，不得透露或使用本資料，亦不得複印、複製或轉變成其它任何形式使用。
 The information contained herein is the exclusive property of SIMPLO TECHNOLOGY CO., LTD, and shall not be distributed, reproduced, or disclosed in whole or in part without prior written permission.

本測試報告僅對上述測試項目有效，本報告分離使用無效

This test report is valid only to the items, Invalid for separation using.