



UN38.3测试报告

UN38.3 Test Report

样品名称:	QuikBrick for QuikBeam锂离子电池 电池容量: 10.9V, 3200mAh, 35Wh
Sample name :	QuikBrick for QuikBeam Li-ion Battery Battery Capacity: 10.9V, 3200mAh, 35Wh
型号 Model :	AST-QUKBM-QBK
申请人 :	--
Applicant :	Astera LED Technology GmbH



检测单位: 东莞市中认联科检测技术有限公司
Laboratory: Dongguan ZRLK Testing Technology Co., Ltd.
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申请人信息 Applicant information	名称 Name	Astera LED Technology GmbH
	地址 Address	Schatzbogen 60, 81829 Munich Germany
制造商信息 Manufacturer information	名称 Name	猎光照明科技（深圳）有限公司 Astera Manufacturing Limited
	地址 Address	深圳市龙岗区吉华街道甘坑社区甘李六路7号吓围工业厂区3号厂房 101、201、301、401、501 101, 201, 301, 401, 501, Bldg. 3, CLT Science & Technology Park, No. 7, GanLiliu Road, Jihua subdistrict, Longgang District, Shenzhen, Guangdong Province, P.R. China
	电话 Phone number	+86-18123965006
	邮箱地址 Email address	Nemo@astera-led.email
	网址 Website	--
工厂信息 Factory information	名称 Name	猎光照明科技（深圳）有限公司 Astera Manufacturing Limited
	地址 Address	深圳市龙岗区吉华街道甘坑社区甘李六路7号吓围工业厂区3号厂房 101、201、301、401、501 101, 201, 301, 401, 501, Bldg. 3, CLT Science & Technology Park, No. 7, GanLiliu Road, Jihua subdistrict, Longgang District, Shenzhen, Guangdong Province, P.R. China
	电话 Phone number	+86-18123965006
	邮箱地址 Email address	Nemo@astera-led.email
	网址 Website	--
(电芯) 制造商信息 (Cell) Manufacturer information	名称 Name	LG Energy Solution, LTD.
	地址 Address	188, Munji-ro, Yuseong-gu Daejeon 34122 Republic of Korea
	电话 Phone number	--
	邮箱地址 Email address	--
	网址 Website	--

样品描述及说明 General product information			
样品类型(是否可充电) Sample Type(Rechargeable or not)	<input checked="" type="checkbox"/> 是/Yes		<input type="checkbox"/> 否/No
样品信息 Sample information:			
产品名称 Product Name	QuikBrick for QuikBeam 锂离子电池 QuikBrick for QuikBeam Li-ion Battery	型号 Model	AST-QUKBM-QBK
商标 Trade mark	/	样品编号 Sample No.	B01#~B16# C01#~C30#
标称电压 Nominal Voltage	10.9V	额定容量 Rated Capacity	3200mAh
额定能量 Rated Energy	35Wh	充电截止电压 Charge Cut-off Voltage	12.75V
最大充电电流 Max. Charging Current	3400mA	标准充电电流 Standard Charging Current	1500mA
充电截止电流 Charge Cut-off Current	150mA	放电终止电压 Discharge Cut-off Voltage	7.5V
最大放电电流 Max. Discharging Current	4000mA	标准放电电流 Standard Discharging Current	2000mA
形状 Shape	棱柱形 Prismatic	尺寸 Size	84.8*57.9*26.8mm
样品质量 Sample Mass	199.0g	串并联方式 Connection composition of series-parallel	3S1P
电芯信息 Cell information:			
电芯型号 Cell Model	INR18650MJ1	标称电压 Nominal Voltage	3.635V
额定容量 Rated Capacity	3.40Ah	最大放电电流 Max. Discharging Current	10000mA

样品接收日期 Accepted date	2025-11-14	测试起讫日期 Test date	2025-11-14 ~ 2025-12-06
测试方法和判定标准 Test method and criterion	联合国《试验和标准手册》(第8版) 38.3 节 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3		
测试项目 Test items	高度模拟、温度试验、振动、冲击、外部短路、重物冲击、过度充电、强制放电 Altitude simulation, Thermal test, Vibration, Shock, External short circuit, Impact, Overcharge, Forced discharge.		
测试结论 Conclusion	经测试, 该样品符合联合国《试验和标准手册》ST/SG/AC.10/11/Rev.8, 38.3 标准要求。 The sample has passed the test items of UNITED NATIONS "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8, 38.3. 签发日期(Issue date): 2025-12-06		
备注 Remark	----		
主检(测试工程师) Tested by: (Test engineer)	李奕霖 King Li (Test Engineer)	李奕霖 King Li	
审核(项目工程师) Checker: (Project engineer)	韦雪杏 Stella Wei (Item Engineer)	韦雪杏 Stella Wei	东莞市中认联科检测技术有限公司 Dongguan ZRLK Testing Technology Co., Ltd.
批准(技术总监) Approver: (Technical director)	马孝琴 Ailis Ma (Approved by)	马孝琴 Ailis Ma	

序号 No.	测试项目名称 Name of test	标准要求或标准条款号 Standard requirement or the clause number of standard	测试结果 Test result	本项结论 Test conclusion	备注 Remarks
1	高度模拟 Altitude simulation	联合国《试验和标准手册》（第8版）38.3 节试验 T.1 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.1	见附表 1 See Appendix 1	合格 Passed	/
2	温度试验 Thermal test	联合国《试验和标准手册》（第8版）38.3 节试验 T.2 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.2	见附表 2 See Appendix 2	合格 Passed	/
3	振动 Vibration	联合国《试验和标准手册》（第8版）38.3 节试验 T.3 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.3	见附表 3 See Appendix 3	合格 Passed	/
4	冲击 Shock	联合国《试验和标准手册》（第8版）38.3 节试验 T.4 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.4	见附表 4 See Appendix 4	合格 Passed	/
5	外部短路 External short-circuit	联合国《试验和标准手册》（第8版）38.3 节试验 T.5 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.5	见附表 5 See Appendix 5	合格 Passed	/
6	重物冲击 Impact	联合国《试验和标准手册》（第8版）38.3 节试验 T.6 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.6	见附表 6 See Appendix 6	合格 Passed	/
7	过度充电 Overcharge	联合国《试验和标准手册》（第8版）38.3 节试验 T.7 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.7	见附表 7 See Appendix 7	合格 Passed	/
8	强制放电 Forced discharge	联合国《试验和标准手册》（第8版）38.3 节试验 T.8 UN "Manual of Tests and Criteria" ST/SG/AC.10/11/Rev.8/Subsection 38.3 Test T.8	见附表 8 See Appendix 8	合格 Passed	/
测试环境条件 Test environment condition		环境温度: 20°C - 25°C; 环境湿度: 45% - 75% Ambient temperature: 20°C - 25°C, Ambient humidity: 45% - 75%			

Procedure 说明

Test T.1 to test T.5 must be conducted in sequence on the same cell or battery. Test T.6 and test T.8 shall be conducted using not otherwise tested cells or batteries.

必须用相同的电芯或电池按顺序进行试验 1 到试验 5。试验 6 和试验 8 须用没进行过其它试验的电芯或电池。为了测试循环后的电池，试验 7 可用试验 1 到试验 5 后没损坏的电池。

Batteries of B01#~B08# are full charged after one cycle;

电池 B01#~B08#为 1 次循环满电状态;

Batteries of B09#~B16# are full charged after 25th cycle;

电池 B09#~B16#为 25 次循环满电状态;

Cells of C01#~C05# are 50% charged after one cycle;

电芯 C01#~C05#为 1 次循环后 50%充电状态;

Cells of C06#~C10# are 50% charged after 25th cycle;

电芯 C06#~C10#为 25 次循环后 50%充电状态;

Cells of C11#~C20# are full discharged after one cycle;

电芯 C11#~C20#为 1 次循环完全放电状态;

Cells of C21#~C30# are full discharged after 25th cycle.

电芯 C21#~C30#为 25 次循环后完全放电状态。

Remark: Circular preprocessing is provided by customers

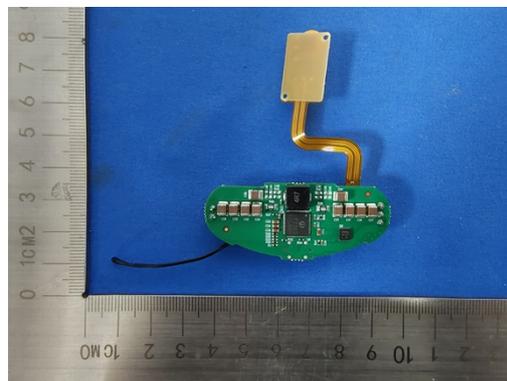
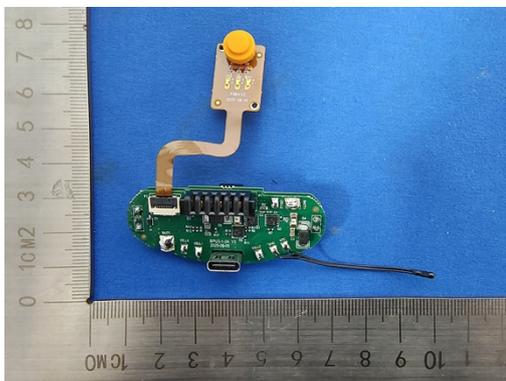
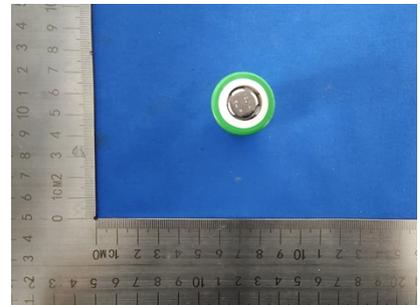
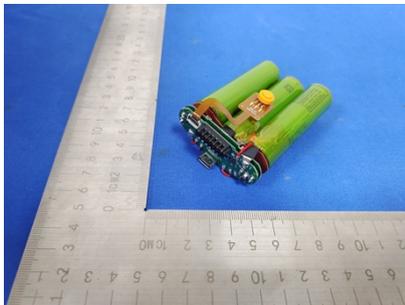
备注：循环预处理由客户提供

附表 8

Appendix 8

序号 No.	8	测试项目名称 Name of Test Items	强制放电 Forced discharge	
样品编号 Sample No.	样品状态 Sample status	测试结果 Test result	备注 Remark	
C11#	首次完全放电 1 CYC Fully Discharged	O	/	
C12#	首次完全放电 1 CYC Fully Discharged	O	/	
C13#	首次完全放电 1 CYC Fully Discharged	O	/	
C14#	首次完全放电 1 CYC Fully Discharged	O	/	
C15#	首次完全放电 1 CYC Fully Discharged	O	/	
C16#	首次完全放电 1 CYC Fully Discharged	O	/	
C17#	首次完全放电 1 CYC Fully Discharged	O	/	
C18#	首次完全放电 1 CYC Fully Discharged	O	/	
C19#	首次完全放电 1 CYC Fully Discharged	O	/	
C20#	首次完全放电 1 CYC Fully Discharged	O	/	
C21#	25 次完全放电 25 CYC Fully Discharged	O	/	
C22#	25 次完全放电 25 CYC Fully Discharged	O	/	
C23#	25 次完全放电 25 CYC Fully Discharged	O	/	
C24#	25 次完全放电 25 CYC Fully Discharged	O	/	
C25#	25 次完全放电 25 CYC Fully Discharged	O	/	
C26#	25 次完全放电 25 CYC Fully Discharged	O	/	
C27#	25 次完全放电 25 CYC Fully Discharged	O	/	
C28#	25 次完全放电 25 CYC Fully Discharged	O	/	
C29#	25 次完全放电 25 CYC Fully Discharged	O	/	
C30#	25 次完全放电 25 CYC Fully Discharged	O	/	
注: D-解体; F-起火; O-无解体、无起火。 Note: D-Disassembly, F-Fire, O-No disassembly & no fire				

样品照片 Sample photo



***** The end *****

注意事项

Important Notice

1. 本报告无 ZRLK 盖章无效。
The test report is invalid without the official stamp of ZRLK.
2. 未经本试验室书面同意，不得复制或部分地复制本报告。
Nobody is allowed to photocopy or partly photocopy this report without written permission of ZRLK.
3. 本报告无批准人、审核人及编制人签名无效。
The test report is invalid without the signatures of Approver, Checker and Compiler.
4. 客户必须如实提供样品及资料，并保证申报品名和样品以及运输货物相同，否则本检测单位不承担任何相关责任。
The client should provide samples and relevant data, at the same time, they should guarantee the consistence of the product's name the declared, the samples they provided and the goods to be transported. Otherwise we will not bear any relevant responsibilities.
5. 本报告涂改无效。
The test report is invalid if altered.
6. 对检验报告若有异议，应于收到报告之日起十五天内向检验单位提出。
Objection to the test report must be submitted to ZRLK within 15 days.
7. 本报告仅对送检样品负责。
The test report is valid for the tested samples only.
8. 任何情况下检测单位的赔偿责任都不会超过检测单位就本次检测所收取的检测费用。
ZRLK's liability under no circumstance will exceed the testing fee received from applicant for test conducted hereof this testing report.
9. 本报告中的中文内容仅供参考。
The Chinese contents in this report are only for reference.