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Lithium Ion Cells and Batteries Used in Electric Self-Balancing Vehicles and Scooters—Safety Technical Specification
电动平衡车、滑板车用锂离子电池和电池组 安全技术规范

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Lithium Ion Cells and Batteries Used in Electric Self-Balancing Vehicles and Scooters—Safety Technical Specification

1 SCOPE

This document specifies the safety requirements for lithium-ion cells and batteries used in electric self-balancing vehicles and scooters and describes the corresponding test methods.

This document is applicable to the lithium-ion cells and batteries used in electric self-balancing vehicles and scooters, and similar products.

2 NORMATIVE REFERENCES

The following normative documents contain provisions which, through normative reference in this text, constitute essential provision of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendment) applies.

GB/T 2423.5	Environmental testing—Part 2: Test methods—Test Ea and guidance: Shock
GB/T 2423.10	Environmental testing—Part 2: Test methods—Test Fc: Vibration (sinusoidal)
GB/T 2423.21	Environmental testing - Part 2: Test methods - Test M: Low air pressure
GB/T 2423.22	Environmental testing - Part 2: Tests methods - Test N: Change of temperature
GB 4943.1-2022	Audio/video, information and communication technology equipment—Part 1: Safety requirements
GB/T 5169.5-2020	Fire hazard testing for electric and electronic products—Part 5: Test flames—Needle-flame test method—Apparatus, confirmatory test arrangement and guidance
GB/T 17626.2	Electromagnetic compatibility—Testing and measurement techniques-Electrostatic discharge immunity test
SJ/T 11685-2017	Specifications of lithium-ion cells and batteries used in self-balancing vehicle

3 TERMS AND DEFINITIONS

For the purpose of this document, the following terms and definitions apply.

3.1 lithium-ion cell

device which achieves the mutual transformation between chemical energy and electric energy depending on the migration of lithium-ions between the anode and the cathode, and is designed to be rechargeable

Note 1: It is hereinafter referred to as cell.

Note 2: This device typically consists of electrodes, separators, electrolyte, container and terminals, etc.

3.2 lithium-ion battery

energy storage device comprising one or more cells electrically connected, which may include the protection and monitoring device that provides information (e.g. cell voltage) to a system

Note 1: It is hereinafter referred to as battery.

Note 2: It may incorporate a protective housing provided by terminals or other interconnection arrangement.

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