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**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 46957-2025

**Electrical energy storage systems - General specification of
safety considerations for grid-integrated electrical energy
storage systems**

电力储能系统 并网储能系统安全通用规范

(English Translation)

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Foreword

This document complies with the provisions of GB/T 1.1-2020 "Standardization Work Guidelines Part 1: Structure and Drafting Rules of Standardization Documents".

This document is equivalent to IEC 62933-5-1:2024 "Electric energy storage systems - Part 5-1. Safety general requirements for grid-connected energy storage systems". specification". The following editorial changes have been made to this document.

---The standard name has been changed to "General Safety Specification for Grid-connected Energy Storage Systems".

1 Scope

This document specifies the safety requirements for grid-connected power storage systems in areas such as hazard identification, risk assessment, risk response, and system testing.

All requirements were specified, and the relevant content in the user manual was defined.

This document applies to the general safety management of power storage systems

connected to the power grid.

2 Normative references

The contents of the following documents, through normative references within the text, constitute essential provisions of this document. Dated citations are not included.

For references to documents, only the version corresponding to that date applies to this document; for undated references, the latest version (including all amendments) applies to this document.

GB/T 3836.5-2021 Explosive Atmospheres - Part 5: Equipment Protected by a Positively Pressurized Enclosure "p" (IEC 60079-2:2014) MOD)

Note: The content referenced in GB/T 3836.5-2021 is not technically different from the content referenced in IEC 60079-2:2014.

GB/T 15706-2012 General principles for safety design of machinery. risk assessment and risk reduction (ISO 12100:2010, IDT)

GB/T 16895.21-2020 Low-voltage electrical installations - Part 4-41. Safety protection against electric shock (IEC 60364-4-41) 2017, IDT)

GB/T 16895.23-2020 Low-voltage electrical installations - Part 6: Inspection (IEC 60364-6:2016, IDT)

GB/T 16935.1-2023 Insulation Coordination of Equipment in Low-Voltage Power Supply Systems - Part 1: Principles, Requirements and Tests (IEC) 60664-1:2020, IDT) bustibility test)

Note: GB/T 5464-2010 Test methods for non-combustibility of building materials (ISO 1182:2002, IDT)

ISO 7010 Safety Symbols - Colors and Signs (Registered)

Note: GB/T 31523.1-2015 Security Information Identification Systems - Part 1: Marking (ISO 7010:2011, MOD)

ISO 12100 Safety of machinery design - Risk assessment and risk reduction

Note: GB/T 15706-2012 General principles for safety design of machinery - Risk assessment and risk reduction (ISO 12100:2010, IDT)

ISO 13849 (all parts) Safety of machinery - Safety-related parts of

Note: GB/T 16855 (all parts) - Safety control systems for machinery [ISO 13849 (all parts)] Principles for Design

Note: GB/T 16754-2021 Design principles for emergency stop functions of machinery (ISO 13850:2015, IDT)