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Electric Vehicles Safety Requirements

电动汽车安全要求

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Electric Vehicles Safety Requirements

1 SCOPE

This standard specifies the safety requirements and test methods of electric vehicles.

This standard is applicable to the electric vehicles whose maximum working voltage of on-board propulsion system is voltage class B.

This standard is not applicable to the road vehicle which is permanently connected to the power grid during operation.

2 NORMATIVE REFERENCES

The following referenced documents are indispensable for the application of this document. For dated references, only the editions cited apply. For undated references, the latest editions of the normative document (including any amendments) apply.

GB/T 4094.2 Electric vehicles - Symbols for controls, indicators and tell-tales

GB 7258-2017 Technical Specifications for Safety of Power-driven Vehicles Operating on Roads

GB 8410 Flammability of automotive interior materials

GB/T 4208-2017 Degrees of protection provided by enclosure (IP code)

GB 11551 The protection of the occupants in the event of a frontal collision for motor vehicle

GB 17354 Front and rear protective devices for passenger cars

GB/T 18387 Limits and test method of magnetic and electric field strength from electric vehicles

GB/T 19596 Terminology of electric vehicles

GB/T 19836 Instrumentation for electric vehicles

GB 20071 The protection of the occupants in the event of a lateral collision

GB/T 20234.1 Connection set for conductive charging of electric vehicles-Part 1: General requirements

GB 26134 Roof crush resistance of passenger cars

GB/T 31498 The safety requirement of electric vehicle post-crash

GB 34660 Road Vehicles - Requirements and Test Methods of Electromagnetic Compatibility

GB 38031 Electric vehicles traction battery safety requirements

3 TERMS AND DEFINITIONS

For the purpose of this document, the terms and definitions established in GB/T 19596 and the followings apply.

3.1 Rechargeable electrical energy storage system (REESS)

“REESS” means an energy storage system which is rechargeable and can provide electric energy.

3.2 Service disconnect

“Service disconnect” means the device for deactivation of high-voltage electrical circuit when conducting checks or services of the battery pack and fuel cell stack.

3.3 Conductive connection

“Conductive connection” means the conductive connection using conductors.



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