

ICS 33.100



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

GB/T 4343.2-2020

**Electromagnetic compatibility requirements for household
appliances, electric tools and similar apparatus - Part 2:
Immunity**

(English Translation)

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Table of Contents

Foreword...	3
Introduction...	6
1 Scope...	7
2 Normative References...	9
3 Terms, Definitions and Abbreviations...	10
3.1 General Principles...	10
3.2 General Terms and Definitions...	11
3.3 Abbreviations...	16
4 Apparatus Classification...	16
5 Tests...	17
5.1 Electrostatic Discharge...	17
5.2 Electrical Fast Transient...	17
5.3 Injection Current (0.15 MHz ~ 230 MHz)...	18
5.4 Injection Current (0.15 MHz ~ 80 MHz)...	20
5.5 Radio Frequency Electromagnetic Fields (80 MHz ~ 6 GHz)...	22
5.6 Surge...	22
5.7 Voltage Dips...	23
6 Performance Criteria...	23
7 Applicability of Immunity Test...	24
7.1 General...	24
7.2 Application of Tests for Different Types of Apparatus...	24
8 Test Conditions...	26
8.1 General...	26
8.2 Mains Operation...	27
8.3 DC Power Supply...	28
8.4 Specific Test Conditions...	29
8.5 Test Program...	32
8.6 Multifunction Equipment...	32
8.7 Equipment with Built-in Lighting Function...	33
8.8 Equipment with Radio Functions...	33
9 Compliance with This Document...	34
10 Test Uncertainty...	34

11 Test Report...	34
Appendix A (informative) A Guideline for Permissible Performance Degradation...	36
Bibliography...	37

1 Scope

This document specifies the electromagnetic immunity requirements for the frequency range of

0 Hz to 400 GHz, which are applicable to household appliances, electric tools and similar apparatus as defined below, regardless of whether they are powered by AC or DC (including batteries).

This document specifies the immunity requirements for continuous and transient electromagnetic disturbances caused by conduction and radiation modes.

Unless otherwise specified, this document applies to all equipment included within the scope of CISPR 14-1, namely.

---Household appliances or similar apparatus;

NOTE 1: examples of equipment applications are as follows.

---Typical domestic functions in a home environment, including residences and related buildings, gardens, etc.;

---Typical domestic functions in shops, offices, commercial and other similar working environments;

---Used on farms;

---Used by customers in hotel and other residential environments;

---Induction cooking or air conditioning in residential or commercial environments.

---Electric tools;

NOTE 2: examples of electric tools include handheld tools driven by electric motors or electromagnetically, portable tools, lawn and garden machinery.

---Similar apparatus.

NOTE 3: examples are as follows.

---External power controllers using semiconductor devices;

---Motor-driven electric medical devices;

---Equipment intended for use only in special electromagnetic environments (e.g., areas

with strong electromagnetic fields near broadcast transmission stations or areas within power plants where strong pulses are generated by the power grid);

---Equipment intended for use only in vehicles, ships or aircraft;

---The effects of electromagnetic phenomena related to the safety of the appliances [see IEC 60335 (all parts)].

Single-phase AC equipment with a rated voltage greater than 250 V and multi-phase AC equipment with a rated voltage greater than 480 V are not included in the scope of this document.

Abnormal operation of equipment, for example, simulated circuit fault operation for testing purposes, is not considered in this document.

2 Normative References

The contents of the following documents constitute indispensable clauses of this document through the normative references in the text. In terms of dated references, only the version with the specified date applies to this document. In terms of references without a specified date, the latest version (including all the modifications) is applicable to this document.

GB 4343.1-2024 Electromagnetic Compatibility Requirements for Household Appliances, Electric Tools and Similar Apparatus - Part 1.Emission (CISPR 14-1.2020, IDT)

GB/T 17626.2-2018 Electromagnetic Compatibility - Testing and Measurement Techniques - Electrostatic Discharge Immunity Test (IEC 61000-4-2.2008, IDT)

GB/T 17626.3-2023 Electromagnetic Compatibility - Testing and Measurement Techniques - Part 3.Radiated, Radio-frequency, Electromagnetic Field Immunity Test (IEC 61000-4-3.2020, IDT)

GB/T 17626.4-2018 Electromagnetic Compatibility - Testing and Measurement Techniques - Electrical Fast Transient/burst Immunity Test (IEC 61000-4-4.2012, IDT)

GB/T 17626.6-2017 Electromagnetic Compatibility - Testing and Measurement Techniques - Immunity to Conducted Disturbances, Induced by Radio-frequency Fields (IEC 61000-4-6.2013, IDT)

GB/T 17626.20-2014 Electromagnetic Compatibility - Testing and Measurement Techniques -

Emission and Immunity Testing in Transverse Electromagnetic (TEM) Waveguide (IEC

61000-

4-20.2010, IDT)

GB/T 17626.22-2017 Electromagnetic Compatibility (EMC) - Testing and Measurement Techniques - Radiated Emissions and Immunity Measurements in Fully Anechoic Rooms (FARs) (IEC 61000-4-22.2010, IDT)

CISPR 14-1 Electromagnetic Compatibility - Requirements for Household Appliances, Electric

Tools and Similar Apparatus - Part 1.Emission

NOTE: GB 4343.1-2024 Electromagnetic Compatibility Requirements for Household Appliances, Electric Tools and Similar Apparatus - Part 1.Emission (CISPR 14-1.2020, IDT)

IEC 60050-161 International Electrotechnical Vocabulary (IEV) - Part 161.Electromagnetic Compatibility

NOTE: GB/T 4365-2024 Electrotechnical Terminology - Electromagnetic Compatibility (IEC 60050-161.2021, MOD)

IEC 61000-4-5.2017 Electromagnetic Compatibility (EMC) - Part 4-5.Testing and Measurement Techniques - Surge Immunity Test

NOTE: GB/T 17626.5-2019 Electromagnetic Compatibility - Testing and Measurement Techniques - Surge Immunity Test (IEC 61000-4-5.2014, IDT)

IEC 61000-4-11.2020 Electromagnetic Compatibility (EMC) - Part 4-11.Testing and Measurement Techniques - Voltage Dips, Short Interruptions and Voltage Variations Immunity

Tests for Equipment with Input Current up to 16 A per Phase

NOTE: GB/T 17626.11-2023 Electromagnetic Compatibility - Testing and Measurement Techniques - Part 11.Voltage Dips, Short Interruptions and Voltage Variations Immunity Tests for Equipment with Input Current up to 16 A per Phase (IEC 61000-4-11.2020, MOD)

3.1 General Principles

The terms and definitions defined in IEC 60050-161 and the following terms apply to this document.