EMC试验标准（EMC test standard）

IEC 77th technical committee on publications

(IEC publications prepared Technical Committee No. 77).

(1) IEC555: by household appliances and similar electrical equipment in power system is introduced in the interference (Disturbances in supply systems under caused by household appliances and similar electrical equipment).

IEC 555-1 (1982) Part 1: definition (Part 1: Definitions).

IEC 555-2 (1982) Part ii: Harmonics (Part 2: Harmonics).

Amendment No. 1, 1984 (Amendment No. 1) (1984).

Amendment No. 2, 1988 (1988).

Amendment No. 3, 1991 (1991).

Diction IEC725 (1981) is used to determine the interference characteristics of household electrical appliances and similar electrical appliances units benchmark impedance Considerations (Considerations on the reference impedances for use in determining the disturbance characteristics of household appliances and similar electrical equipment).

IEC816 (1984) Guide on methods of measurement of short duration transients on low voltage power and signal lines of the low voltage power line and signal line.

The limitation guidelines for voltage fluctuations in household appliances (related to IEC 555-3) are based on IEC 827 (1985).

"Functional and design specifications". 1990 first Amendment No. 1 (1990).

Part 0: evaluation of flicker severity (Part 0: evaluation of flicker severity).

2. Publications (1000 series) published by the IEC 77th technical committee

(IEC publications prepared by Technical Committee No. 77)

Iec 1000: Electromagnetic compatibility (EMC) (EMC).

The first Part of the first Section of the iec1000-1-1 (1992) Section: Section 1: General. Section 1: Application and interpretation of fundamental definitions and terms.

The iec1000-2-1 (1990) part ii: environment. Section 1: introduction of environmental Part: low-frequency conducted interference and signal of Electromagnetic Environment in utility power supply system (Part 2: Environment. Section 1: Description of the Environment - Electromagnetic Environment for low frequency conducted disturbances and signaling in public power supply systems).

The second part of iec 1000-2-2 (1990) : environment. Section 2: low-frequency conducted interference and signal

Compatibility in the public low-voltage power supply system (Part 2; Environment. Section 2: Compatibility levels for low frequency conducted disturbances and signaling in public low - voltage power supply systems).

The second part of the iec 1000-2-3 (1992) : environment. Section 3: the environmental descriptions of the conduction phenomena associated with the radiation and non-network frequencies (Part2: Description of the Environment - radiation and non-network-frequency-related conduct phenomena).

The second part of the iec 1000-2-4 (1994) : environment. Section 3: compatibility of low frequency conduction interference in factory environment (Part 2;

4: the Environment Compatibility levels in industrial the plants for low frequency conducted disturbances).

The third part of the iec 1000-3-3 (1994) : limitations. Section 3: voltage fluctuations and flicker limits for low voltage power supply systems used in low voltage power supply systems for electrical equipment at less than or equal to 16A (Part 3: limits of voltage fluctuations and flicker in low - voltage supply systems for equipment with rated current = 16A).

The third part of the iec 1000-3-5 (1994) : limitations. Section 5: voltage fluctuations and flicker Limits for low voltage power supply systems used in low voltage power supply systems for electrical equipment at or above 16A.

(Part 3: Limits of voltage fluctuations and flicker in low-voltage power supply systems for equipment with rated current greater than 16A).

The third part of the article: the iec 1000-3-6 (1996) : limitations. Section 6: the distortion of voltage and high voltage power supply system in the evaluation of the radiation limit load - Basic EMC publications (Part 3: limits - Section 6: Assessment of emission limits for distorting loads in MV and HV power systems - Basic EMC Publication).

Part 4: testing and measurement techniques (Part 4: testing and measurement techniques).

Section 1: anti-interference test general theory. Basic EMC publications. (Section 1: Overview of immunity tests. Basic EMC Publication).

Part 4: Testing and measurement techniques (Part 4: Testing and measurement techniques).

Section 8: magnetic field anti-interference test of power frequency. Basic EMC publications. (Section 8: Power frequency magnetic field immunity test.basic EMC Publications).

Part 4: Testing and measurement techniques (Part 4: Testing and measurement techniques).

Section 9: pulse field anti-interference test. Basic EMC

publications. (Section 9: Pulse magnetic field immunity test. Basic EMC publication).

Part iv of the iec 1000-4-10 (1993) : testing and measurement techniques. Section 10: anti - interference test of attenuation oscillating magnetic field. Basic EMC publications. (Part 4: Testing and measurement techniques. Section 10: damped the magnetic field immunity test.basic EMC Publication).

Part iv of the iec 1000-4-11 (1994) : testing and measurement techniques. (Part 4: Testing and measurement techniques). Section 11: anti-interference test for voltage sag, short-term interference and voltage change. (Scetion 11: Voltage dips, short interruptions and Voltage variations immunity tests).

Section 4 of the iec 1000-4-12 (1994) : test and measurement techniques. (Part 4: testing and measurement techniques). Section 12: anti-interference test of oscillation waves. Basic EMC publications. (Scetion 12: the office of the company.

3. Publications (61000 series) published by the IEC 77th technical committee

(IEC publications prepared by Technical Committee No. 77)

Iec 61000: Electromagnetic compatibility (EMC) (EMC).

(Part 1: General section 1: Application and interpretation

of fundamental definitions and terms), the first Part of the iec 61000-1-1 (1992).

The iec 61000-2-1 (1990) part ii: environment. Section 1: introduction of environmental Part: low-frequency conducted interference and signal of Electromagnetic Environment in utility power supply system (Part 2: the Environment Section 1: Description of the Environment, Electromagnetic Environment for low frequency conducted disturbances and signaling in public power supply systems).

The second part of the IEC 61000-2-2 (1990) : the environmental part. Section 2: low-frequency conducted interference and signal Compatibility in the utility power supply system (Part 2: Environment. Section 2: Compatibility levels for low frequency conducted disturbances and signaling in public low - voltage power supply systems).

The second part is the introduction of the environment section. Section 3: Environment Section 3: Description of the Environment - Radiated and non-network - frequency related phenomena related to radiation and non-network frequencies.

The second part of the iec 61000-2-4 (1994) : the environmental part. Section 4: compatible with the level of the conducted interference in the factory Environment (Part 2: Environment. Section 4: Compatibility levels in industrial the plants for low frequency conducted disturbances).

The second part of the iec 61000-2-5 (1995) : the environmental part. Section 5: classification of electromagnetic environment. Basic EMC publications. (Part 2: Environment Section 5: Classification of entertainment environments. Basic EMC publication).

The second part of the iec 61000-2-6 (1995) : the environmental part. Section 6: what about the application of the power supply system in a factory in the low frequency of conducted interference radio flat Assessment (Part 2: the Environment Section 6: Assessment of the emission levels in the power supply of industrial the plants as regards low frequency conducted disturbances).

7. The second part: environment. Section 6: description of the HEMP environment - radiation interference. Basic EMC publications. (Part 2: the Environment Section 6: Discription of HEMP Environment - radiated disturbance. The Basic EMC publication).

The first revision of the first revision (Amendment 1) (2001-08) Electromagnetic compatibility - Part 3-2: limitation - harmonic current radiation limit (equipment per phase input current is less than 16A) (Electromagnetic compatibility (EMC) - Part 3-2: Limits for harmonic current emissions (equipment input current).

⑩ IEC61000-3-3 (1994) in January 2001 the first revised this, Electromagnetic compatibility - 3 - Part 3: Limits, in the low voltage power grid equipment rated input current

acuities were 16 a per phase, rather than due to the cause of the power supply connection utility grid voltage changes, voltage fluctuation and flicker of limited (Amendment 1 1200-01, Electromagnetic compatibility (EMC) - Part 3-3: Limits - Limitation of voltage changes, voltage fluctuations and flicker in public low - voltage supply systems, the for equipment with rated current acuities were 16 a per phase and not subject to conditional connection).

For the first edition of October 1998,

Electromagnetic compatibility - Part 3-4: in the low voltage power grid equipment each phase input current harmonic of 16 a radio or higher rated flow restrictions (First edition 1998-10 Electromagnetic compatibility (EMC) - Part 3-4: Limitation of emission of harmonic currents in low voltage power supply systems for equipment with rated current greater than 16 a).

⑿ IEC 1994, December 1994 the First edition, Electromagnetic compatibility - Part 3: Section 5 - limited - in the low voltage power grid equipment each phase input current rating of 16 a or the Limitation of voltage fluctuation and flicker (First edition in 1994-12. Electromagnetic compatibility (EMC) - Part 3: Limits - Section 5: Limitation of voltage fluctuations and flicker in low voltage power supply systems for equipment with rated current greater than 16 a).

[13] IEC61000-3-6199 six years on October the First edition, Electromagnetic compatibility - Part 3: Section 6 - for the

distortion of voltage and high voltage power supply system in the evaluation of the radiation limit load - Basic EMC publications (First edition in 1996-10. Electromagnetic compatibility (EMC) - Part 3: Limits - Section 6: Assessment of emission Limits for distorting loads in MV and HV power systems - Basic EMC publication).

Iec61000-3-7, first edition of October 1996, electromagnetic compatibility - part 3: limitation. Section 7 - assessment of the amplitude of the fluctuating load of medium and high voltage power supply systems - basic EMC publications. (First edition in 1996-10. Electromagnetic compatibility (EMC) - Part 3: Limits - Section 7: Assessment of emission Limits for fluctuating loads in the MV and HV power systems - Basic EMC publication).

The first edition of the electromagnetic compatibility - part 3: limitations. Section 8 - signal in low voltage electrical equipment installation of the radio, band and Electromagnetic interference level (First edition 1997-08, Electromagnetic compatibility (EMC) - Part3: Limits - Section 8: Signalling on low voltage electrical installations, emission levels, frequency bands and Electromagnetic disturbance levels).

Has displayed IEC61000-3-11200 in August, the First edition of the Electromagnetic compatibility - Part 3-11: Limits, because the power connection and Equipment rated current 75 a or less common low voltage power supply system of voltage fluctuation and flicker, voltage change limit (First edition 2000-08 Electromagnetic compatibility (EMC) - Part

3-11: Limits - limitation of voltage changes, voltage fluctuations and flicker in public low - voltage supply systems and Equipment with rated current 75 a or less and subject to conditional connection).

⑰ IEC61000-4-1 (1992), the fourth part: testing and measurement techniques - section 1: general anti-interference test. Basic EMC publication (Part 4: Testing and measurement techniques -- Section 1: Overview of immunity tests.basic EMC publication).

The fourth part of the iec 61000-4-2 (1995) : test and measurement techniques - section 2: electrostatic discharge testing. Basic EMC publications. (Part 4: Testing and measurement techniques - Section 2: Electrostatic discharge test. The Basic EMC publication).

Iec61000-4-4 (1995) part 4: test and measurement technology - section 4: the rapid change/mutation resistance test for electrical signals. Basic EMC publications. (Part 4: Testing and measurement techniques -- Section 4: Electrical fast transent/burst immunity test.basic EMC publication).

⑳ IEC 61000-4-6 (1996), the fourth part: testing and measurement techniques - section 6: because the radio frequency electromagnetic wave is introduced into the conducted interference of anti-jamming. (Part 4: Testing and measurement techniques - Section 6: Immunity to conducted disturbances, induced by radio - frequency fields).

(21) of IEC 61000-4-7 (1991). Part 4: Testing and measurement techniques - Section 7: about used for power supply system and connected with the harmonic and harmonic between test and test equipment of General principles (Part 4: Testing and measurement techniques - Section 7: General guide on harmonics and interharmonics measurements and instrumentation, for power supply systems and equipment connected thereto).

(22) IEC 61000-4-8 (1993) fourth part: test and measurement technology - section 8: anti-interference test of power frequency electromagnetic field. Basic EMC publications. (Part 4: Testing and measurement techniques -- Section 8: Power frequency magnetic field immunity test.basic EMC publication).

(23) IEC 61000-4-9 (1993) part iv: testing and measurement techniques - section 9: anti-interference tests of pulsed electromagnetic fields. Basic EMC publications. (Part 4: Testing and measurement techniques -- Section 9: Pulse magnetic field immunity test.basic EMC publication).

(24) IEC 61000-4-10 (1993) section 4: test and measurement techniques - section 10: anti-interference test for the attenuated oscillating electromagnetic field. Basic EMC publications. (Part 4: Testing and measurement techniques -- Section 10: Damped traditional magnetic field immunity test.basic EMC publication).

(25) IEC 61000-4-11 (1994) part iv: testing and measurement techniques - section 11: anti-interference tests of voltage

sag, short-term interference and voltage change. (Part 4: Testing and measurement techniques - Section 11: Voltage dips, short interruptions and Voltage variations immunity test).

(26) IEC 61000-4-12 (1995) part iv: testing and measurement techniques - section 12: anti-interference tests of oscillation waves. Basic EMC publications. (Part 4: Testing and measurement techniques -- Section 12:

(27) iec 61000-4-24 (1997) part iv: test and measurement techniques - section 24: test methods for protective devices for HEMP conduction interference. Basic EMC publications. (Part 4: Testing and measurement techniques - Section 24: Test methods for protective devices for HEMP conducted disturbance. The Basic EMC publication).

(28) iec 61000-5-1 (19996) part v: installation and change guide. Section 1: General considerations (Partie 5: Installation and mitigation guidelines -- Section 1: General considerations).

(29) iec 61000-5-4 (1996) section 5: installation and change guide - section 4: anti-interference of HEMP - technical indicators of protective devices for anti-hemp radiation interference. Basic EMC publications.

(Part 5: Installation and mitigation guidelines - Section 4: Immunity to HEMP - Specifications for protective devices against HEMP radiated disturbance. The Basic EMC publication).