

Scope of Accreditation

(Measurement Method)

Accreditation Number : VLAC-008-4
Expiration Date : December 31, 2019

[Name of Laboratory]

Intertek Japan KK

[Test site name]

Nagano Laboratory

[Test site Address]

3226 Yokokawa, Tatsuno-machi, Kamiina-gun, Nagano 399-0511 Japan

[Measurement methods]

Emission test

Radiated disturbance : Enclosure Port

Disturbance electric field test (CISPR16-2-3, ANSI C63.4, FCC Part18/MP-5)

[Test condition] **On the reference ground plane, Measurement distance : 3m/10m**

Measurement Frequency Range : 30 MHz - 40 GHz

[Test condition] **Quasi Free Space**

Measurement Frequency Range : 1 GHz - 40 GHz

Disturbance magnetic field strength measurement

[Test condition] **Loop Antenna, Three axis loop antenna (CISPR16-2-3)**

Disturbance power measurement [Test condition] CMAD (CISPR 16-2-2)

Conducted disturbance Measurement: AC/DC mains port

(CISPR 16-2-1, ANSI C63.4, FCC Part18/MP-5)

[Test condition] **AMN, High impedance voltage probe (CISPR16-1-2)**

Conducted disturbance Measurement: Telecommunication port (CISP R 22, CISPR 32)

[Test condition] **AMN/AAN, Capacitive voltage probe (CISPR22, CISPR 32)**

Conducted disturbance Measurement: Current measurement

[Test condition] **Current probe, (CISPR16-1-2)**

Immunity test

Electro static discharge test

IEC 61000-4-2/EN 61000-4-2

Radiated electromagnetic field strength

IEC 61000-4-3/EN 61000-4-3

Measurement frequency:80 MHz – 6 GHz

Electrical fast transient/burst (EFT/B)

IEC 61000-4-4/EN 61000-4-4

Surge

IEC 61000-4-5/EN 61000-4-5

Mains port, Telecommunication/Signal port

RF conducted interference

IEC 61000-4-6/EN 61000-4-6

Mains port measurement frequency range:150 kHz – 230 MHz

Telecommunication/Signal port measurement frequency range:150 kHz – 230 MHz

Radiated magnetic field

IEC 61000-4-8/EN 61000-4-8

Interruptions and Voltage variations

IEC 61000-4-11/EN 61000-4-11

Harmonic current

Harmonic current test (IEC 61000-3-2/EN 61000-3-2)

Flicker test (IEC 61000-3-3/EN 61000-3-3)

Telecommunication equipment performance test 1

FCC Part15 Subpart C (Up to 26.5 GHz)

ANSI C63.10-2013

Based on European standards/Canadian standards

Telecommunication equipment performance test 2

Exposure to electromagnetic fields : Magnetic field strength (Magnetic field probe),

Voluntary EMC Laboratory Accreditation Center Inc.

Scope of Accreditation

(Test standards)

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[Test standards]

Emission test

VCCI Technical Requirements:V-3/VCCI-CISPR 32

FCC Part15 Subpart B/ANSI C63.4 -2014, FCC Part18/MP-5

CISPR11, CISPR14-1, CISPR15, CISPR22, CISPR32

EN55011, EN55014-1, EN55015, EN55022, EN55032, EN55103-1

Technical requirements under the Electrical Appliances and Materials safety Act appendix 10

Chapter 4, 5 and 7, J55001, J55014-1, J55015, J55022, CISPRJ 32

AS/NZS CISPR11, AS/NZS CISPR14.1, AS/NZS CISPR15, AS/NZS CISPR 22, AS/NZS CISPR32

AS/NZS 3200.1.2, AS/NZS 61000.6.3, AS/NZS 61000.6.4

ICES-001, ICES-003, ICES-005, CNS13803, CNS13438, CNS13783-1, KN22, IEC61000-6-3

IEC61000-6-4, EN61000-6-3, EN61000-6-4

IEC 61326-1/EN 61326-1(Particular requirement IEC 61326-2 series/EN 61326-2 series)

IEC 60601-1-2/EN 60601-1-2(Particular requirement IEC60601-2 series/EN 60601-2 series)

JIS C1806-1, JIS T0601-1-2(Particular requirement JIS T06012 series)

Immunity test

CISPR 14-2, CISPR 24, CISPR 35*, EN 55014-2, EN 55024, EN 55035*

IEC 61000-6-1, IEC 61000-6-2, EN 61000-6-1, EN 61000-6-2

AS/NZS CISPR 14.2, AS/NZS CISPR 24, AS/NZS 3200.1.2, AS/NZS 6100.6.1, AS/NZS 61000.6.2

J1000, JIS C61000-6-1, JIS C61000-6-2, EN 55103-2, KN 24, IEC 61547, EN 61547

IEC61326-1/EN61326-1(Particular requirement IEC61326-2 series/EN 61326-2 series)

IEC60601-1-2/EN60601-1-2(Particular requirement IEC60601-2 series/EN 60601-2 series)

JIS C1806-1, JIS T0601-1-2(Particular requirement JIS T06012 series)

*** : Added as of September 11, 2018**

Harmonic Test in Public Low Voltage Systems

IEC 61000-3-2, IEC 61000-3-3, JIS C61000-3-2

IEC 61000-6-3, IEC 61000-6-4, EN 61000-6-3, EN 61000-6-4, EN 61000-3-2, EN 61000-3-3

AS/NZS 3200.1.2, AS/NZS 61000.3.2, AS/NZS 61000.3.3, AS/NZS 61000.6.3, AS/NZS 61000.6.4

IEC 61326-1/EN 61326-1(Particular requirement IEC 61326-2 series/EN 61326-2 series)

IEC 60601-1-2/EN 60601-1-2(Particular requirement IEC 60601-2 series/EN 60601-2 series)

JIS C1806-1, JIS T0601-1-2(Particular requirement JIS T06012 series)

Telecommunication equipment performance 1

FCC Part15 Subpart C (Up to 26.5 GHz)

ANSI C63.10-2013

IC RSS-Gen, IC RSS-210, IC RSS-310*

EN 301 489-1, EN 301 489-3, EN 301 489-17

EN 300 330

*** : Added as of September 11, 2018**

Telecommunication equipment performance 2

IEC 62311, EN 62311, IEC 62479, EN 62479, IEC 62233, EN 62233

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