

SCOPE OF ACCREDITATION

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(Conforms with requirements of CAN-P-4E (ISO/IEC 17025:2005))

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CLIENTS SERVED: All interested parties

FIELDS OF TESTING: Electrical/Electronic, Mechanical/Physical

ISSUED ON: 2011-05-24

VALID TO: 2013-10-05

Telecommunications Equipment, Information Technology Equipment, Multimedia Equipment

Radio Equipment

Laboratory Equipment

ELECTRICAL PRODUCTS AND ELECTRONIC PRODUCTS

(Climatic and Mechanical Requirements and Methods for Telecommunications Equipment)

ANSI S12.12 American National Standard Engineering Method for the Determination of Sound Power Levels of Noise Sources using Sound Intensity

CSA C22.2 #94, UL #50 GR-3108	Rain Testing Generic Requirements for Network Equipment in the Outside Plant (OSP) Only for: Section 4 except 4.2.1 Section 6.2.1, 6.2.3 and 6.5 except for class 4 equipment
GR-63-CORE	Network Equipment-Building System (NEBS) Only for: Sections 2.1, 2.2.3, 2.2.4, 2.2.5, 4.2.3, 5.1, 5.2.3 5.3, 5.4.2, 5.4.3, 5.6 and 5.7.1
IEC 60068-2-1, Test Ab and Ad	Low temperature
IEC 60068-2-14, Test Na and Nb	Temperature Shock and Temperature Cycling
IEC 60068-2-18, Test Rb Method 2	Packaged Rain
IEC 60068-2-2, Test Bb and Bd	Dry Heat
IEC 60068-2-27, Test Ea	Shock, 18 ms/30g, 11 msec/50g, 0.5 msec/1500g
IEC 60068-2-29, Test Eb	Bump Vertical and horizontal, 1.25g, 4.75Hz
IEC 60068-2-30, Test Db	Damp Cyclic Heat
IEC 60068-2-31, Test Ec	Drop and Tumble, tip over, drop on face and corner
IEC 60068-2-32, Test Ed	Free-Fall, drop test of portable equipment
IEC 60068-2-6, Test Fc	Vibration, 5-200Hz, 0.5-10g
IEC 60068-2-64, Test Fh	Vibration Broadband Random
IEC 60068-56, Test Cb	Damp Heat, Steady State
MIL-STD-810	Test Method Standard For Environmental Engineering Considerations and Laboratory Tests Only for: Test Methods 501, 502, 503.4 and 507

(EMC, Requirements and Methods for Telecommunications Equipment)

CISPR 11/ EN 55011	Industrial, Scientific and medical (ISM) Radio Frequency equipment - Radio disturbance characteristics - Limits and methods of measurement
CISPR 14-1; 14-2/EN 55014-1; 14-2	Electromagnetic Compatibility - Requirement for household appliances, electric tools and similar apparatus - Part 1: Emission (similar to CISPR 22 but household) Electromagnetic Compatibility - Requirement for household appliances, electric tools and similar apparatus - Part 2: Immunity - Product Family Standard (similar to CISPR 24 but household)
CISPR 22/EN 55022/AS/NZS CISPR 22/ CAN/ CSA CISPR 22 /KN22/ SS IEC CISPR 22	Information technology equipment - Radio disturbance characteristics - Limits and methods of measurement
CISPR 24/EN 55024/KN24	Information technology equipment - Immunity characteristics - Limits and methods of measurement
CNS 13438 Chinese Taipei	Limits and Methods of Measurement of Radio Disturbance Characteristics of Information Technology Equipment
EN 300 386	Electromagnetic compatibility and radio spectrum matters (ERM); Telecommunication network equipment; Electromagnetic compatibility (EMC) requirements

EN 301 489-1 to EN 301 489-26 except EN 301 489-21	Electromagnetic compatibility and Radio spectrum Matters (ERM); Electromagnetic Compatibility (EMC) standard for radio equipment and services; Part 1: to Part 26: (except Part 21)
FCC 47, CFR Part 15 Using ANSI C63.4 GR-1089-CORE	Federal Communications Commission: Operation of Radio Frequency Devices EMC and Electrical Safety Generic Criteria for Network Telecommunications Equipment Except for: Section 3.2.3.2: Conducted Emission Requirements for Analog Voiceband Leads Only for: Section 2: System-Level Electrostatic Discharge (ESD) and Electrical Fast Transient (EFT) & and Section 3: Electromagnetic Interference, and Section 5: Steady State Power Induction
ICES-002	Industry Canada: Spark Ignition Systems of Vehicles and Other Devices Equipped with Internal Combustion Engines.
ICES-003	Industry Canada: Interference causing equipment STD standard (Digital Apparatus)
IDA TS EMC	EMC Requirements for Telecommunication Equipment
IEC 61000-3-11/ EN 61000-3-11	Electromagnetic compatibility (EMC) - Part 3-11: Limits--Limitations of voltage changes, voltage fluctuations and flicker in public low-voltage supply systems--Equipment with rated current ≤ 75 A and subject to conditional connection
IEC 61000-3-12/ EN 61000-3-12 up to 18.5A	Electromagnetic compatibility (EMC) - Part 3-12: Limits C Limits for harmonic currents produced by equipment connected to public low-voltage systems with input current >16 A and ≤ 75 A per phase
IEC 61000-3-2/ EN 61000-3-2	Electromagnetic compatibility (EMC) - Part 3-2: Limits - Limits for harmonic current emissions (equipment input current up to and including 16 A per phase)
IEC 61000-3-3/ EN 61000-3-3	Electromagnetic compatibility (EMC) - Part 3: Limits - Section 3: Limitation of voltage fluctuations and flicker in low-voltage supply systems for equipment with rated current ≤ 16 A
IEC 61000-4-11 / EN 61000-4-11 / KN61000-4-11	Electromagnetic compatibility (EMC) - Part 4: Testing and measuring techniques - Section 11: Voltage dips, short interruptions and voltage variations immunity tests
IEC 61000-4-2 / EN 61000-4-2 / KN61000-4-2	Electromagnetic compatibility (EMC) - Part 4-2: Testing and measurement techniques - Electrostatic discharge immunity test
IEC 61000-4-3 / EN 61000-4-3 / KN61000-4-3	Electromagnetic compatibility (EMC) - Part 4-3: Testing and measurement techniques - Radiated, radio-frequency, electromagnetic field immunity test
IEC 61000-4-4 / EN 61000-4-4 / KN61000-4-4	Electromagnetic compatibility (EMC) - Part 4: Testing and measurement techniques - Section 4: Electrical fast transient/burst immunity test. Basic EMC Publication
IEC 61000-4-5 / EN 61000-4-5 / KN61000-4-5	Electromagnetic compatibility (EMC) - Part 4: Testing and measurement techniques - Section 5: Surge immunity test

IEC 61000-4-6 / EN 61000-4-6 / KN61000-4-6	Electromagnetic compatibility (EMC) - Part 4: Testing and measurement techniques - Section 6: Immunity to conducted disturbances, induced by radio-frequency fields
IEC 61000-4-8 / EN 61000-4-8 / KN61000-4-8	Electromagnetic compatibility (EMC) - Part 4: Testing and measurement techniques - Section 8: Power frequency magnetic field immunity test
IEC 61000-4-9/EN 61000-4-9	Electromagnetic compatibility (EMC) - Part 4: Testing and measurement techniques - Section 6: Immunity to conducted disturbances, induced by radio-frequency fields
IEC 61000-6-1/ EN 61000-6-1	Electromagnetic Compatibility (EMC) - Part 6-1: Generic Standards - Immunity for residential, commercial, and light industrial environments
IEC 61000-6-2/ EN 61000-6-2	Electromagnetic Compatibility (EMC) - Part 6-2: Generic Standards - Immunity for industrial environments
IEC 61000-6-3/ EN 61000-6-3	Electromagnetic Compatibility (EMC) - Part 6-3: Generic Standards - Emission standards for residential, commercial, and light industrial environments
IEC 61000-6-4/ EN 61000-6-4	Electromagnetic Compatibility (EMC) - Part 6-4: Emission standard for industrial environments
IEC 61326-1/EN 61326-1	Electrical equipment for measurement, control and laboratory use - EMC requirements
IEC 61326-2-1 to 2-5/EN 61326-2-1 to 2-5	
IEC 61326/EN 61326	
RRL Notice No. 2008-11	
RRL Notice No. 2008-12	
RRL Notice No. 2008-38	Test Method for EMI
RRL Notice No. 2008-39	Test Method for EMS
VCCI V3	Criteria for EMI
	Criteria for EMS
	Agreement of Voluntary Control Council for Interference by Information Technology Equipment

(Radio Requirements)

EN 300 328-1	Electromagnetic compatibility and Radio spectrum Matters (ERM); Wideband Transmission systems; data transmission equipment operating in the 2,4 GHz ISM band and using spread spectrum modulation techniques; Part 1: Technical characteristics and test conditions
EN 300 328-2	Electromagnetic compatibility and Radio spectrum Matters(ERM); Wideband Transmission systems; data Transmission equipment operating in the 2,4 GHz ISM band and using spread spectrum modulation techniques; Part 2: Harmonized EN covering essential requirements under article 3.2 of the R&TTE Directive
FCC Part 101	FIXED MICROWAVE SERVICES
FCC Part 22	PUBLIC MOBILE SERVICES
FCC Part 24	PERSONAL COMMUNICATIONS SERVICES
Industry Canada RSS 102	Evaluation Procedure for Mobile and Portable Radio Transmitters with respect to Health Canada's Safety Code 6 for Exposure of Humans to Radio Frequency Fields

	(Excluding SAR tests)
Industry Canada RSS 128	800 MHz Dual-Mode Cellular Telephones
Industry Canada RSS 133	2 GHz Personal Communication Services
Industry Canada RSS 210	Low Power License-Exempt Radio communication Devices (All Frequency Bands)

(Safety & Power Robustness Requirements and Methods for Telecommunications Equipment)

ANSI T1.315	Voltage Levels for DC Powered Equipment Used in Telecommunications Environment
ANSI Z136.1	Safe Use of Lasers
ANSI Z136.2	Safe Use of Optical Communication Systems Utilizing Laser Diode and LED sources
ATT-TP-76200	Network equipment Power, Grounding, Environmental and Physical Design requirements Only for: Section 7: DC POWER
CSA/UL/EN/IEC 60950-1	Safety of Technology Equipment With the exclusion of component level Certification tests as per Annexes B, C, E, K, U, NAF and the following general tests : Abrasion (2.10.8.4), Flaming Oil (A.3), UV & Ionizing radiation (4.3.13.2 Ionizing radiation, 4.3.13.3 Effect of ultraviolet (UV) radiation on material, 4.3.13.4 Human exposure to ultraviolet (UV) radiation, 4.3.13.5 Lasers for non fiber optics lasers, and Annex H), Minimum clearance (Annex G), Acoustic (Annex NAD)
ETS 300 132-2	Equipment Engineering EE; Power Supply Input at the interface to Telecommunications Equipment; Part 2; Operated by Direct Current (DC)
ETS 300 132-3	Environment Engineering; Power Supply interface at the input to telecommunication equipment; Part 3: Operated by rectified current source, alternating current source or direct source up to 400V
GR-1089-CORE	EMC and Electrical Safety Generic Criteria for Network Telecommunications Equipment Only for: Section 4, 7, & 9
IEC 60825-1	Safety of Laser Products Part 1: Equipment Classification, requirements and user s guide Only for: Fibre optics
IEC 60825-2	Safety of Laser Products Part 2: Safety of optical fibre communication systems
ITU-T K.20	Resistibility of telecommunication equipment installed in a telecommunications centre to overvoltages and overcurrents Except for: Clause 2.1.6a Enhanced, Clause 2.2.2a & b Enhanced, Clause 4.4.4a &b Enhanced, Clause 5.1.2a &b Enhanced, Clause 5.5.2a Enhanced

ITU-T K.44

Resistibility tests for telecommunication equipment
exposed to overvoltages and overcurrents - Basic
Recommendation

Notes:

CAN-P-4E (ISO/IEC 17025): General Requirements for the Competence of Testing and Calibration
Laboratories (ISO/IEC 17025-2005)

S. Cross, Director, Conformity Assessment

Date: 2011-05-24

Number of Scope Listings: 72

SCC 1003-15/163

Partner File #0

Partner: None