NVLAP Lab Code 200087-0

Submittal Application Report

For Class 2 Permissible Change

Grant of Certification

For

Model: WISM Plus
2412-2462 MHz
Broadband Digital Transmission System
FCC ID: KQL-WISMP
IC: 2268C-WISMP

FOR

Laird Technologies

11160 Thompson Avenue

Lenexa KS 66219

Test Report Number: 100909

Authorized Signatory: Scot D Rogers
Scot D. Rogers

NVLAP Lab Code 200087-0

ROGERS LABS, INC.

4405 West 259th Terrace
Louisburg, KS 66053
Phone / Fax (913) 837-3214

Engineering Test Report
For
Class 2 Permissive Change

FOR

CFR47, PART 15C - INTENTIONAL RADIATORS
Paragraph 15.247
Low Power License Exempt Broadband Digital Transmission System
Intentional Radiator

For

Laird Technologies
11160 Thompson Avenue
Lenexa KS 66219

Model: WISM Plus
Broadband Digital Transmission System
Frequency Range 2412-2462 MHz
FCC ID#: KQL-WISMP
IC: 2268C-WISMP

Test Date: September 9, 2010

Certifying Engineer: Scot D Rogers

Scot D. Rogers
Rogers Labs, Inc.
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Forward

This report documents supporting information for requesting Class 2 permissible change to certified equipment. The document offers supporting information and demonstration of compliance for use of addition of antenna model (S151FL-6-PX-2450S) with the WISM Plus module. The electromagnetic emissions compatibility testing required for demonstration of compliance with class 2 permissible change as authorized by CFR47 Dated October 1, 2009, Paragraphs 2.1043, 15.247, and RSS-210 have been conducted on the WISM Plus and antenna system. The results have been reviewed and found to demonstrate compliance with all the requirements investigated for this report.

Name of Applicant:

Laird Technologies
11160 Thompson Avenue
Lenexa KS 66219

Model: WISM Plus

FCC I.D.: KQL-WISMP IC: 2268C-WISMP
Frequency Range: 2412-2462 MHz
Operating Power: 0.062 Watts antenna conducted power

Opinion / Interpretation of Results

Tests Performed	Results
Emissions Tests	
Emissions as per CFR47 paragraphs 2 and 15.205	Complies
Emissions as per CFR47 paragraphs 2 and 15.209	Complies
Emissions as per CFR47 paragraphs 2 and 15.247	Complies
Emissions as per RSS-210 Issue 7, Dated June 2007	Complies

Environmental Conditions

Ambient Temperature	21.7° C
Relative Humidity	48%
Atmospheric Pressure	1015.3mb

List of Test Equipment

A Rohde & Schwarz ESU40 and or Hewlett Packard 8591EM Spectrum Analyzer was used as the measuring device for the emissions testing of frequencies below 1 GHz. A Rohde & Schwarz ESU40 and or Hewlett Packard 8562A Spectrum Analyzer was used as the measuring device for testing the emissions at frequencies above 1 GHz. The analyzer settings used are described in the following table. Refer to the appendix for a complete list of test equipment.

Analyzer Settings		
Conducted Emissions:		
RBW	AVG. BW	Detector Function
9 kHz	30 kHz	Peak / Quasi Peak
Radiated Emissions below 1000 MHz		
RBW	AVG. BW	Detector Function
120 kHz	300 kHz	Peak / Quasi Peak
Radiated Emissions above 1000 MHz		
RBW	Video BW	Detector Function
100 kHz	100 kHz	Peak
1 MHz	1 MHz	Peak / Average

Equipment	Manufacturer	Model	Calibration	Due
LISN	Comp. Design	FCC-LISN-2-MOD.CD	10/09	10/09
Antenna	ARA	BCD-235-B	10/09	10/09
Antenna	EMCO	3147	10/09	10/09
Antenna	EMCO	3143	5/10	5/11
Analyzer	Rohde & Schwarz	ESU40	2/10	2/11
Analyzer	HP	8591EM	5/10	5/11
Analyzer	HP	8562A	5/10	5/11

Units of Measurements

Conducted EMI Data is in dBµV; dB referenced to one microvolt.

Radiated EMI Data is in dBµV/m; dB/m referenced to one microvolt per meter.

Test Site Locations

Conducted EMI — The AC power line conducted emissions tests were performed in a shielded screen room located at Rogers Labs, Inc., 4405 W. 259th Terrace, Louisburg, KS.

Radiated EMI — The radiated emissions tests were performed at the 3 meters, Open Area Test Site (OATS) located at Rogers Labs, Inc., 4405 W. 259th Terrace, Louisburg, KS.

Site Registration — Refer to Appendix for FCC Site Registration Letter, Reference # 90910 and Industry Canada reference IC3401A-1

Application for Certification Information

(1) Manufacturer: Laird Technologies
11160 Thompson Avenue
Lenexa KS 66219

(2) Identification: Model: WISM Plus
FCC I.D.: KQL-WISMP IC: 2268C-WISMP

(3) Instruction Book: Refer to original submittal Exhibit for Instruction Manual.

(4) Description of Circuit Functions:
Refer to original submittal Exhibit of Operational Description

(5) Block Diagram with Frequencies:
Refer to original submittal Exhibit of Block Diagram

(6) Report of Measurements:
Report of measurements in support of change follows in this Report. Refer to original submittal exhibits for additional information.

(7) Photographs: Construction, Component Placement, etc.:
Refer to Exhibit for photographs of test setup and equipment.

(8) Peripheral Equipment included interfacing with a development interface support board and external AC/DC power adapter and computer for transmitter control.

(9) Transition Provisions of 15.37 are not being requested.

(10) Not Applicable. The unit is not a scanning receiver.

(11) Not Applicable. The EUT does not operate in the 59 – 64 GHz frequency band.

Applicable Standards & Test Procedures

In accordance with the Federal Communications Code of Federal Regulations, dated October 1, 2009, Part 2, Subpart J, Paragraphs 2.907, 2.911, 2.913, 2.925, 2.926, 2.1043, applicable parts of paragraph 15, and Part 15C Paragraph 15.247, and RSS-210 the following information is submitted.

Test procedures used are the established Methods of Measurement of Radio-Noise Emissions as described in the ANSI 63.4-2003 Document FCC, documents DA00-1407 and DA00-705 and/or TIA/EIA 603-1.

Equipment Function and Testing Procedures

The EUT is a 2401-2471 MHz Broadband Digital Transmission System used to transmit data in applications offering remote wireless connectivity. The transmitter portion of the design is received as a module and placed on support interface board or incorporated into OEM system designs. The unit is marketed for use to incorporate a wireless link module to exchange data information from one point to another. For testing purposes the WISM Plus was connected to the support development board and communicating to the laptop computer allowing for operational control of the transmitter and communications. The WISM Plus receives power form the support circuitry and offers no provision to connect to utility AC power systems. No other interfacing options are provided on the design. For testing purposes the WISM Plus and support equipment were powered from the AC power adapter supply of the support development board and set to transmit in all modes available. The device is marketed as modular solution for incorporation into OEM designed systems and used with approved antennas only. The design continues to comply with the unique antenna connection requirements.

Equipment Tested

Equipment	Model	FCC I.D.#	Industry Canada
EUT	WISM Plus	KQL-WISMP	2268C-WISMP

Antenna option tested
5 dBi dipole

Authorized Antennas
2 dBi and 5 dBi dipole

Change to Equipment

Reason for Class II permissive change:

1) Addition of 5 dBi Dipole Antenna, Nearson model: S151FL-6-PX-2450S

Effect

1) Offer higher gain antenna option for use in OEM designs (antenna 5 dBi Nearson model S151FL-6-PX-2450S).

Equipment and Cable Configurations

Radiated Emission Test Procedure

The EUT was placed on a rotating 1 x 1.5-meter wooden platform, 0.8 meters above the ground plane at a distance of 3 meters from the FSM antenna. EMI energy was maximized by equipment placement, raising and lowering the FSM antenna, changing the antenna polarization, and by rotating the turntable. Each emission was maximized before data was taken using a spectrum analyzer. Refer to photographs in the exhibits for EUT placement.

Subpart C – Intentional Radiators

Operation in the Band 2400-2483.5 MHz

The power output was measured at the antenna port and again on the Open Area Test Site (OATS) at 3 meters distance utilizing the antenna configuration listed. The EUT and test fixture was placed on a wooden turntable 0.8 meters above the ground plane and at a distance of 3 meters from the FSM antenna. The peak and average amplitude of the carrier frequency was measured using a spectrum analyzer. The peak and average amplitude of the spurious emissions above 1000 MHz were measured using a spectrum analyzer then data was recorded from the analyzer display. Refer to figures one through seven for plots of the transmitter radiated emissions taken at a 1meter distance in the screen room. The EUT is a frequency digitally modulated broadband transmission system intentional radiator. Radiated emissions testing demonstrating continued compliance with requirements was performed utilizing the authorized antenna configuration. Band edge compliance was demonstrated measuring radiated emission testing on the OATS. The amplitude of each emission was maximized by varying the FSM antenna height, polarization, and by rotating the turntable. Emissions were measured in dBµV/m at three meters. A Biconilog Antenna was used for measuring emissions from 30 to 1000 MHz, a Log Periodic Antenna for 200 to 5000 MHz, and Double Ridge and/or Pyramidal Horn Antennas from 4 GHz to 40 GHz. Data was taken per Paragraph 2.1046(a), 15.247 and RSS-210.

Sample Calculations:

RFS = Radiated Field Strength

dBµV/m @ 3 m = dBµV + A.F. - Amplifier Gain

dBµV/m @ 3 m = 40.2 + 7.6 - 30

= 17.8

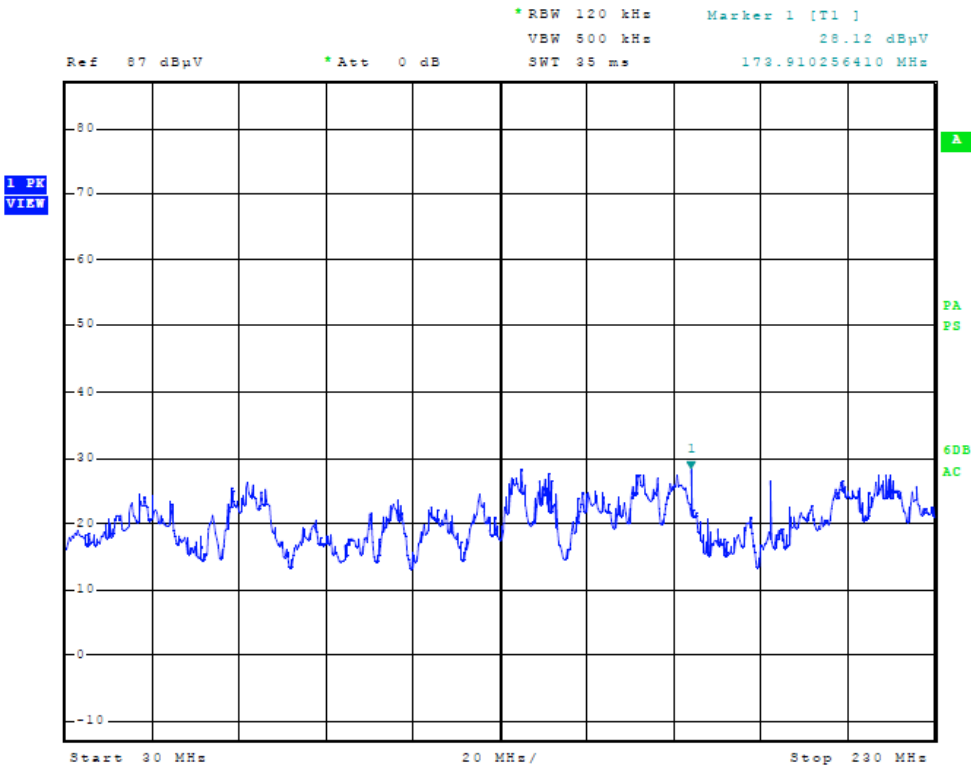

Figure One Plot of radiated emissions taken in screen room

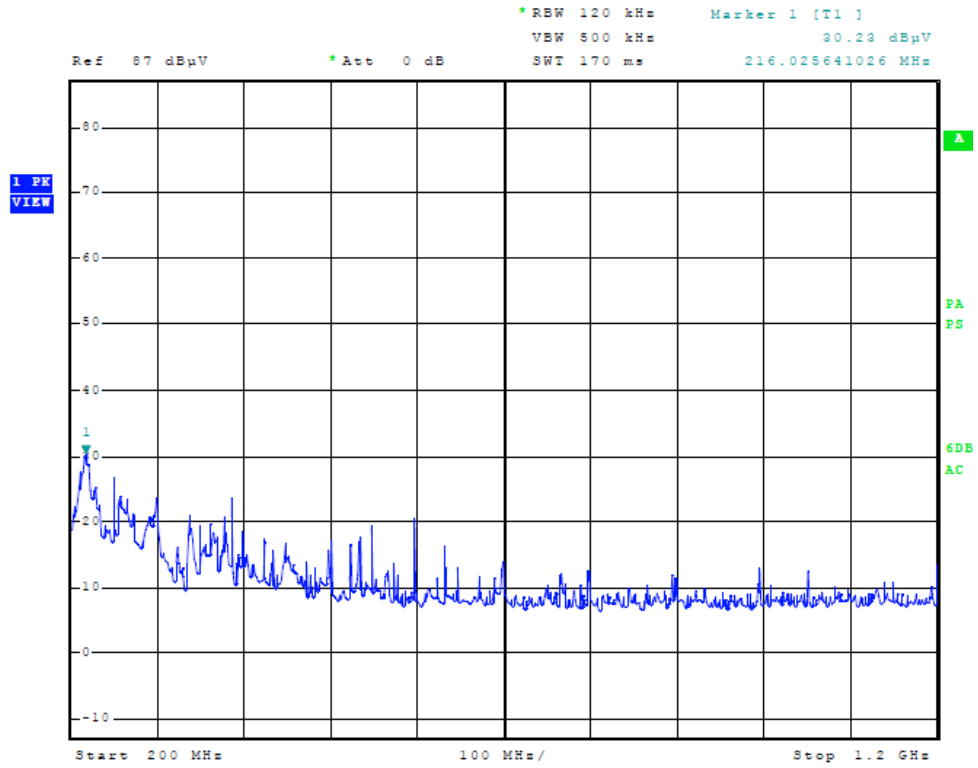

Figure Two Plot of radiated emissions taken in screen room

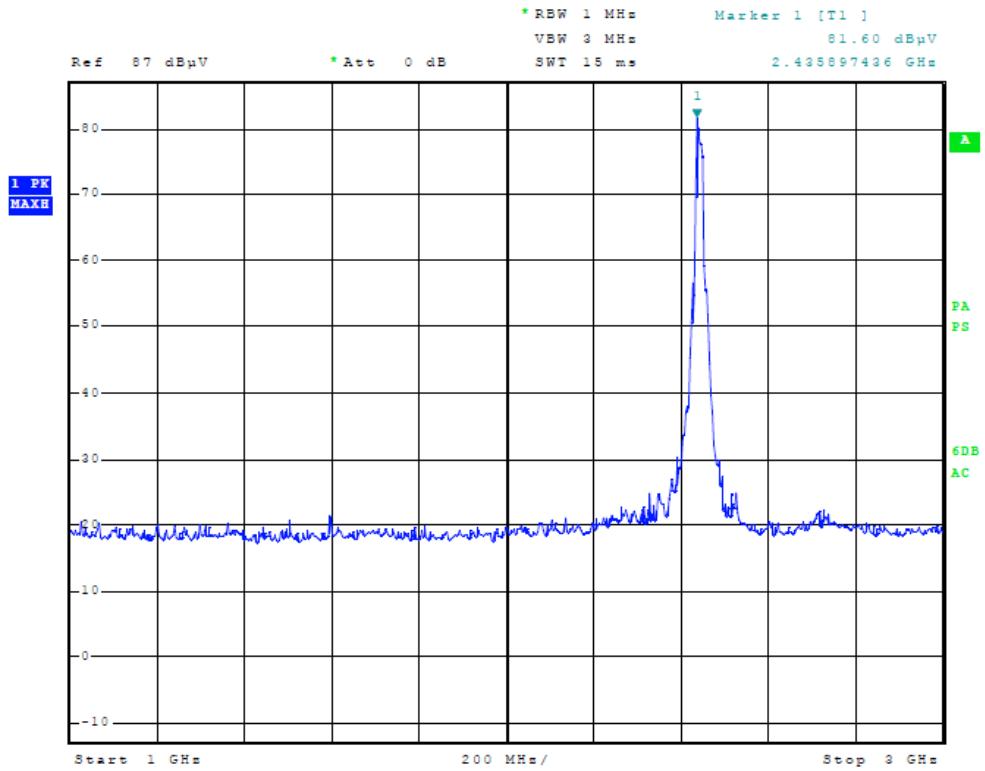

Figure Three Plot of radiated emissions taken in screen room

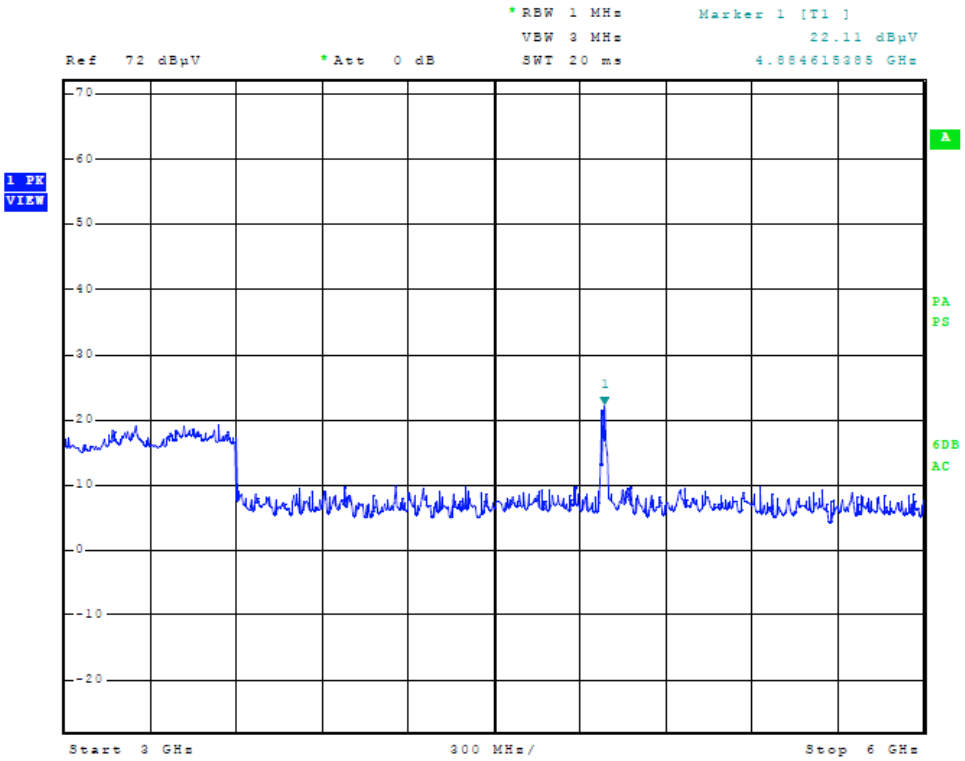

Figure Four Plot of radiated emissions taken in screen room

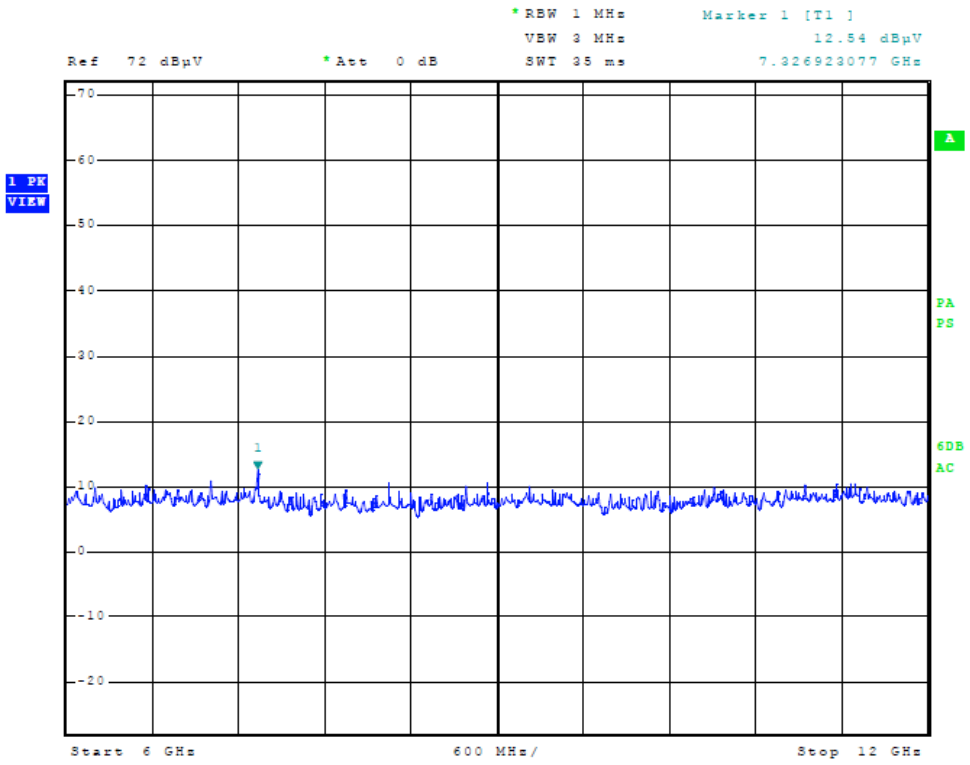

Figure Five Plot of radiated emissions taken in screen room

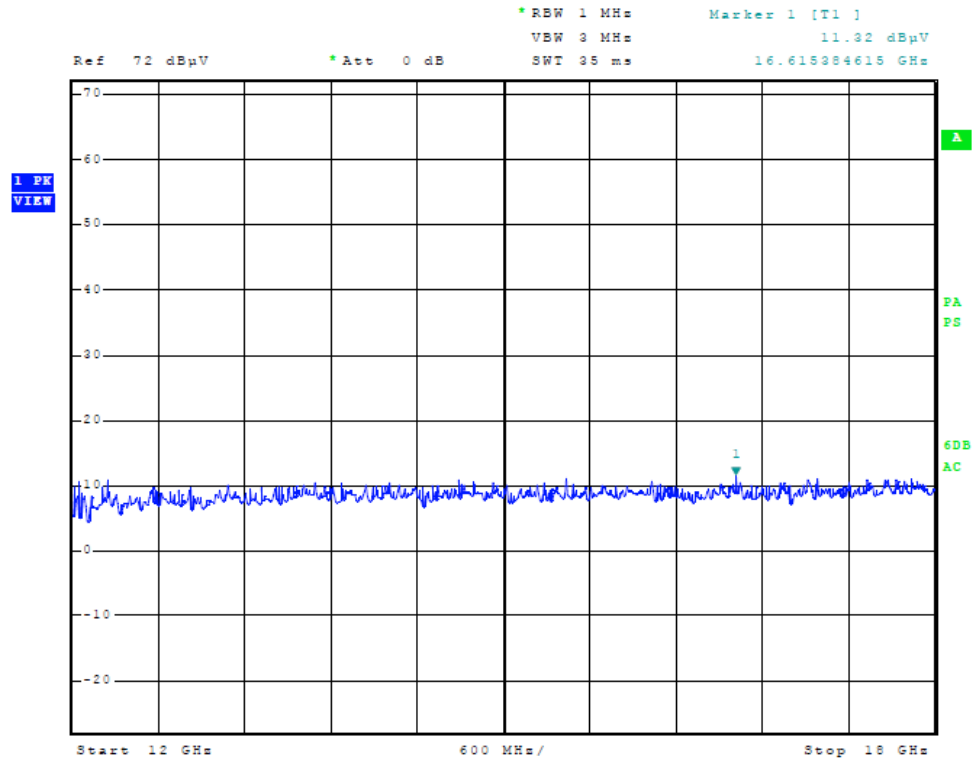

Figure Six Plot of radiated emissions taken in screen room

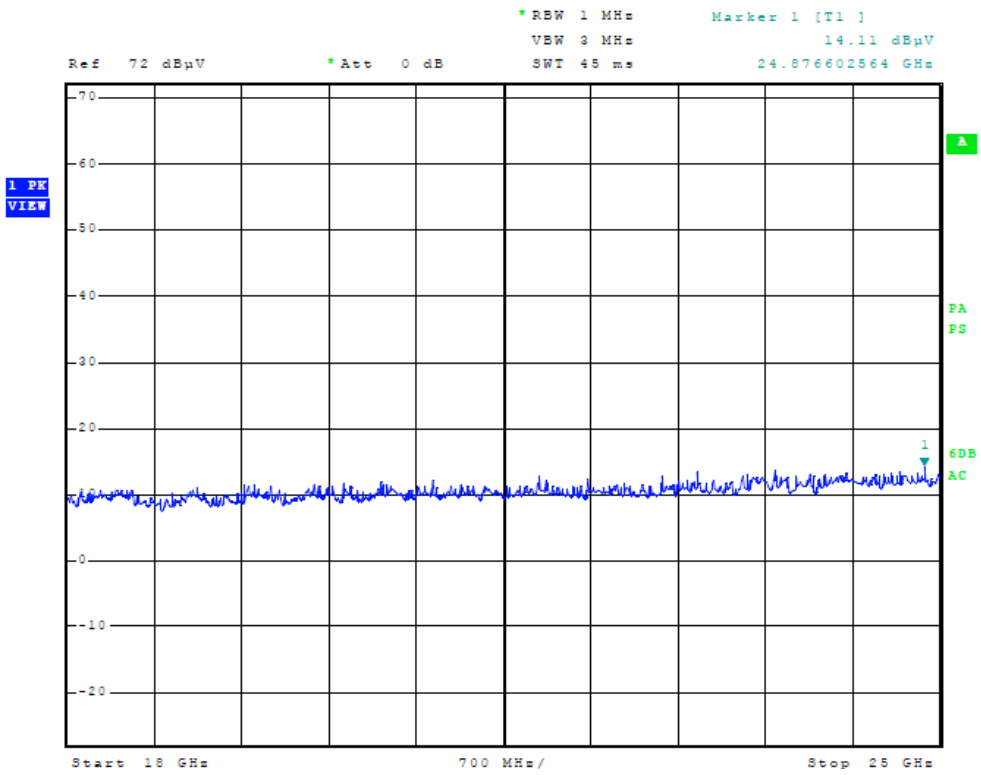

Figure Seven Plot of radiated emissions taken in screen room

Radiated Emissions from EUT Data (Highest Emissions)

Frequency in MHz	FSM Horz. (dBµV)	FSM Vert. (dBµV)	A.F. (dB/m)	Amp. Gain (dB)	RFS Horz. @ 3m (dBµV/m)	RFS Vert. @ 3m (dBµV/m)	Limit @ 3m (dBµV/m)
73.1	40.2	48.0	7.6	30	17.8	25.6	40.0
150.0	49.3	43.4	10.3	30	29.6	23.7	43.5
180.7	46.1	46.9	10.4	30	26.5	27.3	43.5
215.4	40.0	42.2	11.1	30	21.1	23.3	43.5
248.3	41.6	43.0	12.2	30	23.8	25.2	46.0
250.0	44.2	43.8	12.2	30	26.4	26.0	46.0
350.0	44.2	44.9	15.3	30	29.5	30.2	46.0
450.0	43.2	44.2	17.0	30	30.2	31.2	46.0
500.0	42.1	44.8	17.0	30	29.1	31.8	46.0

Other emissions present had amplitudes at least 20 dB below the limit.

Transmitter Radiated Emissions Data (5 dBi, S151FL-6-PX-2450S)

Frequency in MHz	FSM Horz. (dBµV)	FSM Vert. (dBµV)	A.F. (dB/m)	Amp. Gain (dB)	RFS Horz. @ 3m (dBµV/m)	RFS Vert. @ 3m (dBµV/m)	Limit @ 3m (dBµV/m)
2412.0	107.0	111.8	28.1	25	110.1	114.9	--
4824.0	20.9	17.3	32.9	25	28.8	25.2	54.0
7236.0	13.6	16.4	36.4	25	25.0	27.8	54.0
9648.0	16.9	17.4	38.1	25	30.0	30.5	54.0
12060.0	9.2	11.6	40.8	25	25.0	27.4	54.0
2442.0	108.5	112.6	28.1	25	111.6	115.7	--
4884.0	15.7	15.5	32.9	25	23.6	23.4	54.0
7326.0	12.4	12.5	36.4	25	23.8	23.9	54.0
9768.0	14.5	14.8	38.1	25	27.6	27.9	54.0
12210.0	11.8	11.7	40.8	25	27.6	27.5	54.0
2462.0	109.5	113..5	28.1	25	112.6	116.6	--
4924.0	15.7	16.1	32.9	25	23.6	24.0	54.0
7386.0	12.9	12.8	36.4	25	24.3	24.2	54.0
9848.0	13.5	13.4	38.1	25	26.6	26.5	54.0
12310.0	9.8	9.9	40.8	25	25.6	25.7	54.0
Band Edge Data							
2390.0	26.3	35.9	28.1	25	29.4	39.0	54.0
2400.0	25.7	35.9	28.1	25	28.8	39.0	54.0
2483.5	17.1	33.6	28.1	25	20.2	36.7	54.0

Other emissions present had amplitudes at least 20 dB below the limit.

Radiated Emissions in Restricted Bands Data (5 dBi, S151FL-6-PX-2450S)

Frequency in MHz	FSM Horz. (dBµV)	FSM Vert. (dBµV)	A.F. (dB/m)	Amp. Gain (dB)	RFS Horz. @ 3m (dBµV/m)	RFS Vert. @ 3m (dBµV/m)	FCC Class B Limit @ 3m (dBµV/m)
2390.0	26.3	35.9	28.1	25.0	29.4	39.0	54.0
2400.0	25.7	35.9	28.1	25.0	28.8	39.0	54.0
2483.5	17.1	33.6	28.1	25.0	20.2	36.7	54.0
4824.0	20.9	17.3	32.9	25.0	28.8	25.2	54.0
4884.0	15.7	15.5	32.9	25.0	23.6	23.4	54.0
4924.0	15.7	16.1	32.9	25.0	16.6	24.0	54.0
7236.0	13.6	16.4	36.4	25.0	25.0	27.8	54.0
7326.0	12.4	12.5	36.4	25.0	23.8	23.9	54.0
7386.0	12.9	12.8	36.4	25.0	16.6	24.2	54.0
12060.0	9.2	11.6	40.8	25.0	25.0	27.4	54.0
12210.0	11.8	11.7	40.8	25.0	27.6	27.5	54.0
12310.0	9.8	9.9	40.8	25.0	16.6	25.7	54.0

Other emissions present had amplitudes at least 20 dB below the limit.

Summary of Results for Radiated Emissions

The EUT demonstrated compliance with the radiated emissions requirements of CFR 47 Part 15C paragraph 15.209 and RSS-210 Intentional Radiators for general emissions 13.9 dB margin. The EUT demonstrated compliance with the radiated emissions requirements of CFR47 paragraph 15.247 and RSS-210. The EUT demonstrated a worst-case margin for harmonic emissions of 23.5 dB below requirements. The EUT demonstrated a worst-case margin for restricted bands of operation of 15.0 dB below requirements. Other measurable emissions in the restricted bands were present with amplitudes less than 20 dB below requirements. Other radiated emissions were present with amplitudes at least 20 dB below requirements. The specifications of 15.247 and RSS-210 were met; there are no deviations or exceptions to the requirements.

Statement of Modifications and Deviations

No modifications to the EUT were required for the unit to demonstrate compliance with the requirements of CFR47 15C and RSS-210 requirements. There were no deviations or exceptions to the specifications.

Annex

- Annex A Measurement Uncertainty Calculations
- Annex B Test Equipment List
- Annex C Rogers Qualifications
- Annex D FCC Site Registration Letter
- Annex E Industry Canada Site Registration Letter

Annex A Measurement Uncertainty Calculations

Radiated Emissions Measurement Uncertainty Calculation

Measurement of vertically polarized radiated field strength over the frequency range 30 MHz to 1 GHz on an open area test site at 3m and 10m includes following uncertainty:

Contribution	Probability Distribution	Uncertainty (dB)
Antenna factor calibration	normal (k = 2)	±0.58
Cable loss calibration	normal (k = 2)	±0.2
Receiver specification	rectangular	±1.0
Antenna directivity	rectangular	±0.1
Antenna factor variation with height	rectangular	±2.0
Antenna factor frequency interpolation	rectangular	±0.1
Measurement distance variation	rectangular	±0.2
Site Imperfections	rectangular	±1.5

Combined standard uncertainty $u_c(y)$ is

$$U_c(y) = \pm \sqrt{\left[\frac{1.0}{2}\right]^2 + \left[\frac{0.2}{2}\right]^2 + \left[\frac{1.0^2 + 0.1^2 + 2.0^2 + 0.1^2 + 0.2^2 + 1.5^2}{3}\right]}$$

$U_c(y) = \pm 1.6$ dB

It is probable that $u_c(y) / s(q_k) > 3$, where $s(q_k)$ is estimated standard deviation from a sample of n readings unless the repeatability of the EUT is particularly poor, and a coverage factor of k = 2 will ensure that the level of confidence will be approximately 95%, therefore:

$$s(q_k) = \sqrt{\frac{1}{(n-1)} \sum_{k-1}^{n} (q_k - \bar{q})^2}$$

$U = 2\ U_c(y) = 2 \times \pm 1.6$ dB $= \pm 3.2$ dB

Notes:

1.1 Uncertainties for the antenna and cable were estimated, based on a normal probability distribution with k = 2.

1.2 The receiver uncertainty was obtained from the manufacturer's specification for which a rectangular distribution was assumed.

1.3 The antenna factor uncertainty does not take account of antenna directivity.

1.4 The antenna factor varies with height and since the height was not always the same in use as when the antenna was calibrated an additional uncertainty is added.

1.5 The uncertainty in the measurement distance is relatively small but has some effect on the received signal strength. The increase in measurement distance as the antenna height is increased is an inevitable consequence of the test method and is therefore not considered a contribution to uncertainty.

1.6 Site imperfections are difficult to quantify but may include the following contributions:
-Unwanted reflections from adjacent objects.
-Ground plane imperfections: reflection coefficient, flatness, and edge effects.
-Losses or reflections from "transparent" cabins for the EUT or site coverings.
-Earth currents in antenna cable (mainly effect biconical antennas).

The specified limits for the difference between measured site attenuation and the theoretical value (± 4 dB) were not included in total since the measurement of site attenuation includes uncertainty contributions already allowed for in this budget, such as antenna factor.

Conducted Measurements Uncertainty Calculation

Measurement of conducted emissions over the frequency range 9 kHz to 30 MHz includes following uncertainty:

Contribution	Probability Distribution	Uncertainty (dB)
Receiver specification	rectangular	±1.5
LISN coupling specification	rectangular	±1.5
Cable and input attenuator calibration	normal (k=2)	±0.5

Combined standard uncertainty $u_c(y)$ is

$$U_c(y) = \pm \sqrt{\left[\frac{0.5}{2}\right]^2 + \frac{1.5^2 + 1.5^2}{3}}$$

$U_c(y) = \pm 1.2$ dB

As with radiated field strength uncertainty, it is probable that $u_c(y) / s(q_k) > 3$ and a coverage factor of k = 2 will suffice, therefore:

$U = 2\ U_c(y) = 2 \times \pm 1.2$ dB $= \pm 2.4$ dB

Annex B Test Equipment List For Rogers Labs, Inc.

The test equipment used is maintained in calibration and good operating condition. Use of this calibrated equipment ensures measurements are traceable to national standards.

List of Test Equipment	Calibration Date
Oscilloscope Scope: Tektronix 2230	2/10
Wattmeter: Bird 43 with Load Bird 8085	2/10
Power Supplies: Sorensen SRL 20-25, SRL 40-25, DCR 150, DCR 140	2/10
H/V Power Supply: Fluke Model: 408B (SN: 573)	2/10
R.F. Generator: HP 606A	2/10
R.F. Generator: HP 8614A	2/10
R.F. Generator: HP 8640B	2/10
Spectrum Analyzer: Rhode & Schwarz ESU 40	5/10
Spectrum Analyzer: HP 8562A, Mixers: 11517A, 11970A, 11970K, 11970U, 11970V, 11970W HP Adapters: 11518, 11519, 11520	5/10
Spectrum Analyzer: HP 8591EM	5/10
Frequency Counter: Leader LDC825	2/10
Antenna: EMCO Biconilog Model: 3143	5/10
Antenna: EMCO Log Periodic Model: 3147	10/09
Antenna: Antenna Research Biconical Model: BCD 235	10/09
Antenna: EMCO Dipole Set 3121C	2/10
Antenna: C.D. B-101	2/10
Antenna: Solar 9229-1 & 9230-1	2/10
Antenna: EMCO 6509	2/10
Audio Oscillator: H.P. 201CD	2/10
R.F. Power Amp 65W Model: 470-A-1010	2/10
R.F. Power Amp 50W M185- 10-501	2/10
R.F. Preamp CPPA-102	2/10
LISN 50 µHy/50 ohm/0.1 µf	10/09
LISN Compliance Eng. 240/20	2/10
LISN Fischer Custom Communications FCC-LISN-50-16-2-08	2/10
Peavey Power Amp Model: IPS 801	2/10
Power Amp A.R. Model: 10W 1010M7	2/10
Power Amp EIN Model: A301	2/10
ELGAR Model: 1751	2/10
ELGAR Model: TG 704A-3D	2/10
ESD Test Set 2010i	2/10
Fast Transient Burst Generator Model: EFT/B-101	2/10
Current Probe: Singer CP-105	2/10
Current Probe: Solar 9108-1N	2/10
Field Intensity Meter: EFM-018	2/10
KEYTEK Ecat Surge Generator	2/10
Shielded Room 5 M x 3 M x 3.0 M	

Annex C Qualifications

Scot D. Rogers, Engineer

Rogers Labs, Inc.

Mr. Rogers has approximately 17 years experience in the field of electronics. Engineering experience includes six years in the automated controls industry and remaining years working with the design, development and testing of radio communications and electronic equipment t.

Positions Held:

Systems Engineer: A/C Controls Mfg. Co., Inc. 6 Years

Electrical Engineer: Rogers Consulting Labs, Inc. 5 Years

Electrical Engineer: Rogers Labs, Inc. Current

Educational Background:

Bachelor of Science Degree in Electrical Engineering from Kansas State University

Bachelor of Science Degree in Business Administration Kansas State University

Several Specialized Training courses and seminars pertaining to Microprocessors and Software programming

Scot D Rogers

Scot D. Rogers

NVLAP Lab Code 200087-0

Annex D FCC Site Registration Letter

FEDERAL COMMUNICATIONS COMMISSION

Laboratory Division
7435 Oakland Mills Road
Columbia, MD 21046

May 18, 2010

Registration Number: 90910

Rogers Labs, Inc.
4405 West 259th Terrace,
Louisburg, KS 66053

Attention: Scot Rogers,

Re: Measurement facility located at Louisburg
~~3 & 10 meter site~~
Date of Renewal: May 18, 2010

Dear Sir or Madam:

Your request for renewal of the registration of the subject measurement facility has been received. The information submitted has been placed in your file and the registration has been renewed. The name of your organization will remain on the list of facilities whose measurement data will be accepted in conjunction with applications for Certification under Parts 15 or 18 of the Commission's Rules. Please note that the file must be updated for any changes made to the facility and the registration must be renewed at least every three years.

Measurement facilities that have indicated that they are available to the public to perform measurement services on a fee basis may be found on the FCC website www.fcc.gov under E-Filing, OET Equipment Authorization Electronic Filing, Test Firms.

Sincerely,

Phyllis Parrish
Industry Analyst

NVLAP Lab Code 200087-0

Annex E Industry Canada Site Registration Letter

Industry Canada Industrie Canada

May 26, 2010

OUR FILE: 46405-3041
Submission No: 140719

Rogers Labs Inc.
4405 West 259th Terrace
Louisburg, KY, 66053
USA

Attention: Mr. Scot D. Rogers

Dear Sir/Madame:

The Bureau has received your application for the renewal of a 3/10m OATS. Be advised that the information received was satisfactory to Industry Canada. The following number(s) is now associated to the site(s) for which registration / renewal was sought **(3041A-1).** Please reference the appropriate site number in the body of test reports containing measurements performed on the site. In addition, please keep for your records the following information;

- Your primary code is: **3041**

- The company number associated to the site(s) located at the above address is: **3041A**

Furthermore, to obtain or renew a unique site number, the applicant shall demonstrate that the site has been accredited to ANSI C63.4-2003 or later. A scope of accreditation indicating the accreditation by a recognized accreditation body to ANSI C63.4-2003 or later shall be accepted. Please indicate in a letter the previous assigned site number if applicable and the type of site (example: 3 metre OATS or 3 metre chamber). If the test facility is not accredited to ANSI C63.4-2003 or later, the test facility shall submit test data demonstrating full compliance with the ANSI standard. The Bureau will evaluate the filing to determine if recognition shall be granted.

The frequency for re-validation of the test site and the information that is required to be filed or retained by the testing party shall comply with the requirements established by the accrediting organization. However, in all cases, test site re-validation shall occur on an interval not to exceed two years. There is no fee or form associated with an OATS filing. OATS submissions are encouraged to be submitted electronically to the Bureau using the following URL;
http://strategis.ic.gc.ca/epic/internet/inceb-bhst.nsf/en/h_tt00052e.html.

If you have any questions, you may contact the Bureau by e-mail at certification.bureau@ic.gc.ca Please reference our file and submission number above for all correspondence.

Yours sincerely,

Dalwinder Gill

Dalwinder Gill
For: Wireless Laboratory Manager
Certification and Engineering Bureau
3701 Carling Ave., Building 94
P.O. Box 11490, Station "H"
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