

FCC Test Report

Product Name : Savari DSRC unit

Model No. : S-50

FCC ID. : 2AADT-SAV-S50

Applicant : Savari INC.

Address : Suite 131 2005 De La Cruz Blvd, #128,
Santa Clara. CA 95050

Date of Receipt : 2014/12/03

Issued Date : 2015/01/23

Report No. : 14C0219R-RFUSP15V00

Report Version : V1.0



The test results relate only to the samples tested.

The test report shall not be reproduced except in full without the written approval of QuieTek Corporation.

Test Report Certification

Issued Date : 2015/01/23

Report No. : 14C0219R-RFUSP15V00



Product Name : Savari DSRC unit
 Applicant : Savari INC.
 Address : Suite 131 2005 De La Cruz Blvd, #128, Santa Clara. CA 95050
 Manufacturer : Transystem INC.
 Model No. : S-50
 Trade Name : SAVARI
 FCC ID. : 2AADT-SAV-S50
 EUT Voltage : DC 12V
 Applicable Standard : FCC CFR Title 47 Part 15 Subpart C Section 15.249: 2013
 Test Result : Complied

The test results relate only to the samples tested.

The test report shall not be reproduced except in full without the written approval of QuieTek Corporation.

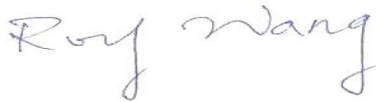
Documented By

: 
 (Carol Tsai / Engineering Adm. Specialist)

Reviewed By

: 
 (Jimmie Liu / Senior Engineer)

Approved By

: 
 (Roy Wang / Director)

Laboratory Information

We, **QuieTek Corporation**, are an independent RF consultancy that was established the whole facility in our laboratories. The test facility has been accredited/accepted (audited or listed) by the following related bodies in compliance with ISO 17025 specified testing scopes:

Taiwan R.O.C.	:	TAF, Accreditation Number: 3024
USA	:	FCC, Registration Number: 365520
Canada	:	IC, Submission No: 150981

The related certificate for our laboratories about the test site and management system can be downloaded from QuieTek Corporation's Web Site: <http://www.quietek.com/chinese/about/certificates.aspx?bval=5>

The address and introduction of QuieTek Corporation's laboratories can be founded in our Web site : <http://www.quietek.com/>

If you have any comments, Please don't hesitate to contact us. Our contact information is as below:

HsinChu Testing Laboratory:

No.75-2, 3rd Lin, Wangye Keng, Yonghxing Tsuen, Qionglin Shiang, Hsinchu County 307, Taiwan, R.O.C.

TEL:+886-3-592-8858 / FAX:+886-3-592-8859

E-Mail : service@quietek.com

Linkou Testing Laboratory:

No.5-22, Ruishukeng, Linkou Dist., New Taipei City 24451, Taiwan, R.O.C.

TEL : 886-2-8601-3788 / FAX : 886-2-8601-3789

E-Mail : service@quietek.com

TABLE OF CONTENTS

Description	Page
1. General Information.....	5
1.1. EUT Description	5
1.2. Test Mode	6
1.3. Tested System Details	7
1.4. Configuration of tested System	7
1.5. EUT Exercise Software	8
1.6. Test Facility.....	9
2. Fundamental Power	10
2.1. Test Equipment.....	10
2.2. Test Setup	10
2.3. Limits	11
2.4. Test Procedure	11
2.5. Test Specification.....	12
2.6. Uncertainty	12
2.7. Test Result.....	13
3. Radiated Emission	34
3.1. Test Equipment.....	34
3.2. Test Setup	34
3.3. Limits	35
3.4. Test Procedure	36
3.5. Test Specification.....	36
3.6. Uncertainty	36
3.7. Test Result.....	37
3.8. Test Photo	45
4. Band Edge.....	47
4.1. Test Equipment.....	47
4.2. Test Setup	47
4.3. Limits	47
4.4. Test Procedure	48
4.5. Test Specification.....	48
4.6. Uncertainty	48
4.7. Test Result.....	49
Attachement.....	61
EUT Photograph.....	61

1. General Information

1.1. EUT Description

Product Name	Savari DSRC unit
Trade Name	SAVARI
Model No.	S-50
Frequency Range / Number of Channels	2452~2482MHz / 4 Channels
Type of Modulation	GFSK
Antenna Type	Soldered on PCB
Antenna Gain	0dBi

Working Frequency of Each Channel			
Channel 01	2452 MHz	Channel 03	2477 MHz
Channel 02	2472 MHz	Channel 04	2482MHz

Note:

1. This device is a Savari DSRC unit included a 2.4GHz transmitting and receiving function.
2. These tests were conducted on a sample of the equipment for the purpose of demonstrating compliance with Part 15 Subpart C Paragraph 15.249.
3. Regards to the frequency band operation; the lowest 、middle and highest frequency of channel were selected to perform the test, and then shown on this report.
4. The radiation measurements are performed in X, Y, Z axis positioning. Only the worst case is shown in the report.
5. This device is a composite device in accordance with Part 15 regulations. The function receiving was measured and made a test report that the report number is 14C0219R-RFUSP01V00 under Declaration of Conformity.

1.2. Test Mode

QuieTek has verified the construction and function in typical operation. All the test modes were carried out with the EUT in normal operation, which was shown in this test report and defined as:

Pre-Test Mode	
EMI	Mode 1: Transmit Mode
Final Test Mode	
TX	Mode 1: Transmit Mode

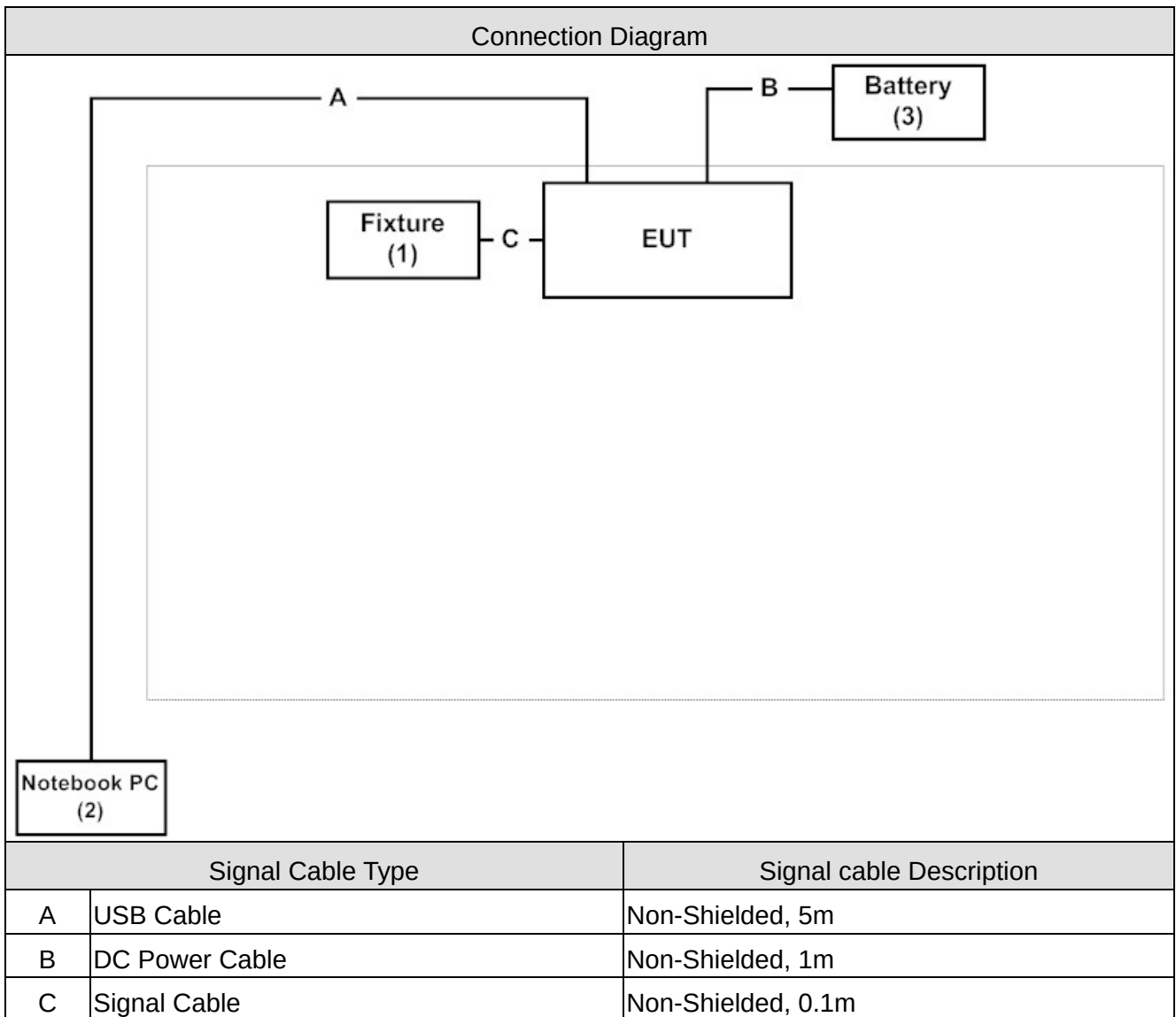
Emission	
Performed Item	Test
Conducted Emission	NO
Fundamental Power	Yes
Radiated Emission	Yes
Band Edge	Yes

1.3. Tested System Details

The types for all equipments, plus descriptions of all cables used in the tested system (including inserted cards) are:

Product	Manufacturer	Model No.	Serial No.	FCC ID	Power Cord
1 Fixture	TI	N/A	N/A	DoC	--
2 Notebook PC	ACER	PAV70	LUSEW0D0371 105FE221601	DoC	Non-Shielded, 2.5m one ferrite core bonded
3 Battery	YUASA	NP7-12	N/A	DoC	--

1.4. Configuration of tested System



1.5. EUT Exercise Software

1	Setup the EUT as shown in Section 1.4.
2	Turn on the power of all equipment.
3	Execute the "SmartRF" function on the laptop .
4	Verify that the EUT works properly.

1.6. Test Facility

Ambient conditions in the laboratory:

Items	Test Item	Required (IEC 68-1)	Actual
Temperature (°C)	FCC PART 15 C 15.209 Fundamental Power	15 - 35	25
Humidity (%RH)		25 - 75	65
Barometric pressure (mbar)		860 - 1060	950-1000
Temperature (°C)	FCC PART 15 C 15.209 Radiated Emission	15 - 35	25
Humidity (%RH)		25 - 75	65
Barometric pressure (mbar)		860 - 1060	950-1000
Temperature (°C)	FCC PART 15 C 15.249 Band Edge	15 - 35	25
Humidity (%RH)		25 - 75	65
Barometric pressure (mbar)		860 - 1060	950-1000

2. Fundamental Power

2.1. Test Equipment

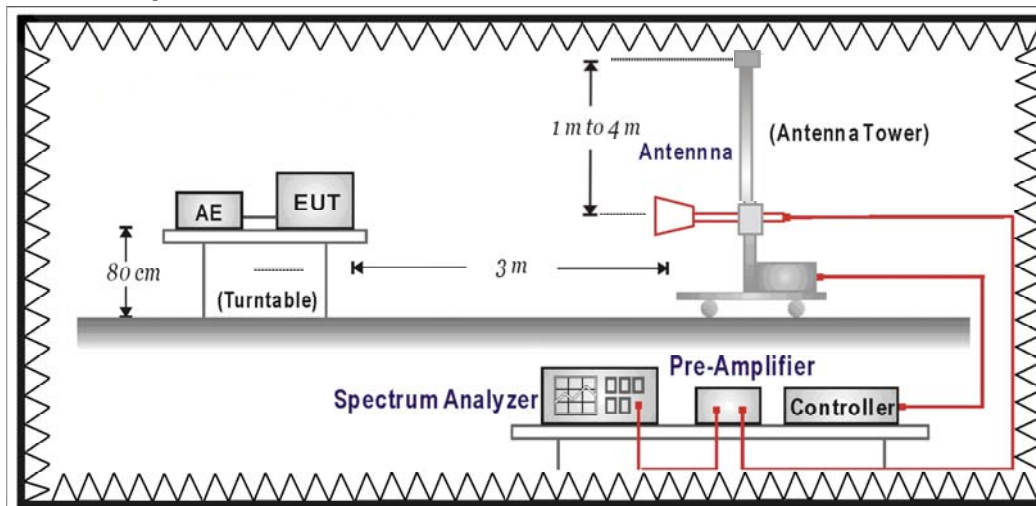
The following test equipments are used during the test:

Fundamental Power / CB1

Instrument	Manufacturer	Type No.	Serial No	Next Cal. Date
Double Ridged Guide Horn Antenna	Schwarzback	BBHA 9120	D743	2015/02/12
Spectrum Analyzer	Agilent	E4440A	MY46187335	2016/01/07
k Type Cable	Huber Suhner	Sucoflex 102	25623/2	2015/02/10

Note: 1. All equipments that need to calibrate are with calibration period of 1 year.

2.2. Test Setup



2.3. Limits

➤ Fundamental and Harmonics Emission Limits

FCC Part 15 Subpart C Paragraph 15.249 Limits				
Fundamental Frequency MHz	Field Strength of Fundamental		Field Strength of Harmonics	
	mV/m	dBuV/m	uV/m	dBuV/m
902-928	50	94	500	54
2400-2483.5	50	94	500	54
5725-5875	50	94	500	54

Remarks : 1. RF Voltage (dBuV) = 20 log RF Voltage (uV)
 2. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.
 3. The emission limit in this paragraph is based on measurement instrumentation employing an average detector.

2.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.

Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.4: 2009 on radiated measurement.

On any frequency or frequencies below or equal to 1000 MHz, the limits shown are based on measuring equipment employing a quasi-peak detector function and on any frequency or frequencies above 1000 MHz the radiated limits shown are based upon the use of measurement instrumentation employing an average detector function. When average radiated emission measurement are included emission measurement below 1000 MHz, there also is a limit on the radio frequency emissions, as measured using instrumentation with a peak detector function, corresponding to 20 dB above the maximum permitted average limit. The bandwidth below 1GHz setting on the field strength meter is 120 kHz and above 1GHz is 1MHz.

2.5. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.249: 2013

2.6. Uncertainty

The measurement uncertainty: 1GHz~26.5GHz as $\pm 3.65\text{dB}$

2.7. Test Result

Product	SAVARI DSRC UNIT		
Test Item	Fundamental Power		
Test Mode	Mode 1: Transmit Mode (2452MHz)		
Date of Test	2014/12/25	Test Site	SR7

Frequency (MHz)	Peak Measurement Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)
Horizontal			
2452MHz (X-axis)	88.975	114	94
2452MHz (Y-axis)	92.490	114	94
2452MHz (Z-axis)	86.909	114	94
Vertical			
2452MHz (X-axis)	84.142	114	94
2452MHz (Y-axis)	88.014	114	94
2452MHz (Z-axis)	88.376	114	94

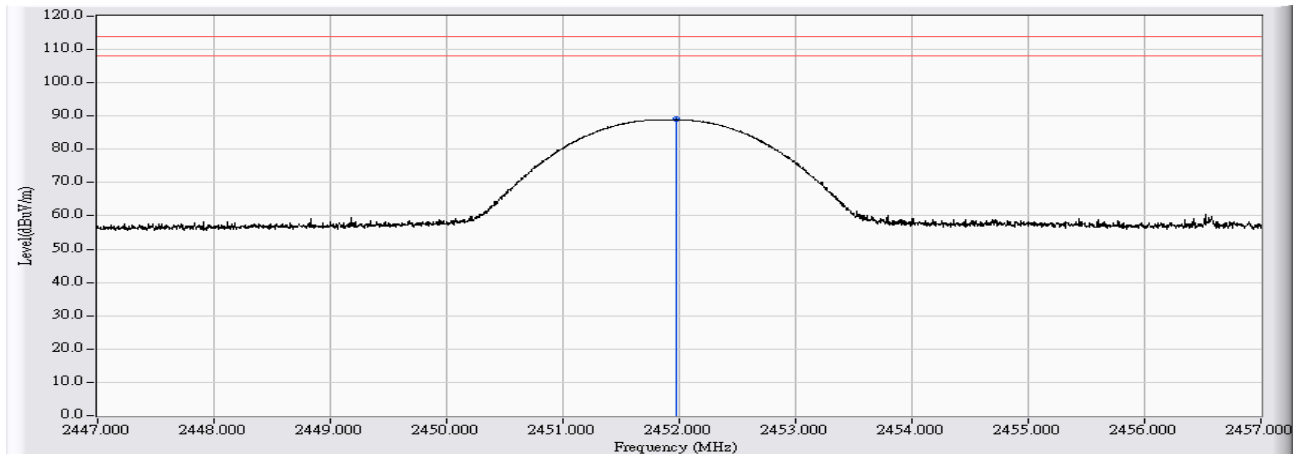
Product	SAVARI DSRC UNIT		
Test Item	Fundamental Power		
Test Mode	Mode 1: Transmit Mode (2477MHz)		
Date of Test	2014/12/25	Test Site	SR7

Frequency (MHz)	Peak Measurement Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)
Horizontal			
2477MHz (X-axis)	90.048	114	94
2477MHz (Y-axis)	91.991	114	94
2477MHz (Z-axis)	88.745	114	94
Vertical			
2477MHz (X-axis)	86.832	114	94
2477MHz (Y-axis)	89.055	114	94
2477MHz (Z-axis)	88.998	114	94

Product	SAVARI DSRC UNIT		
Test Item	Fundamental Power		
Test Mode	Mode 1: Transmit Mode (2482MHz)		
Date of Test	2014/12/25	Test Site	SR7

Frequency (MHz)	Peak Measurement Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)
Horizontal			
2482MHz (X-axis)	84.715	114	94
2482MHz (Y-axis)	86.183	114	94
2482MHz (Z-axis)	82.890	114	94
Vertical			
2482MHz (X-axis)	80.894	114	94
2482MHz (Y-axis)	83.473	114	94
2482MHz (Z-axis)	83.474	114	94

Site : CB1	Time : 2014/12/25 - 19:18
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz X+ axis

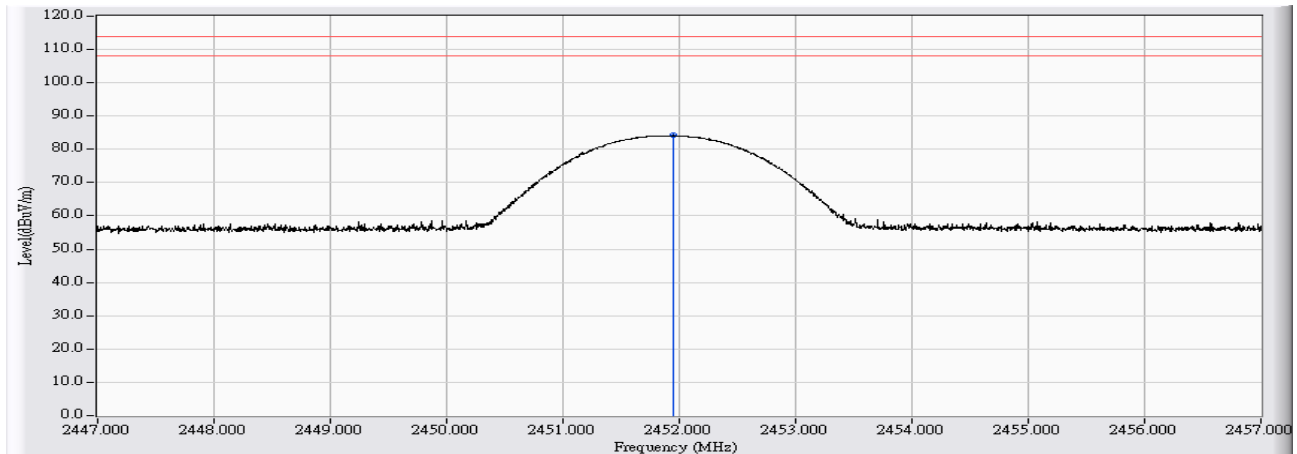


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.970	31.884	57.091	88.975	-25.025	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:20
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz X+ axis

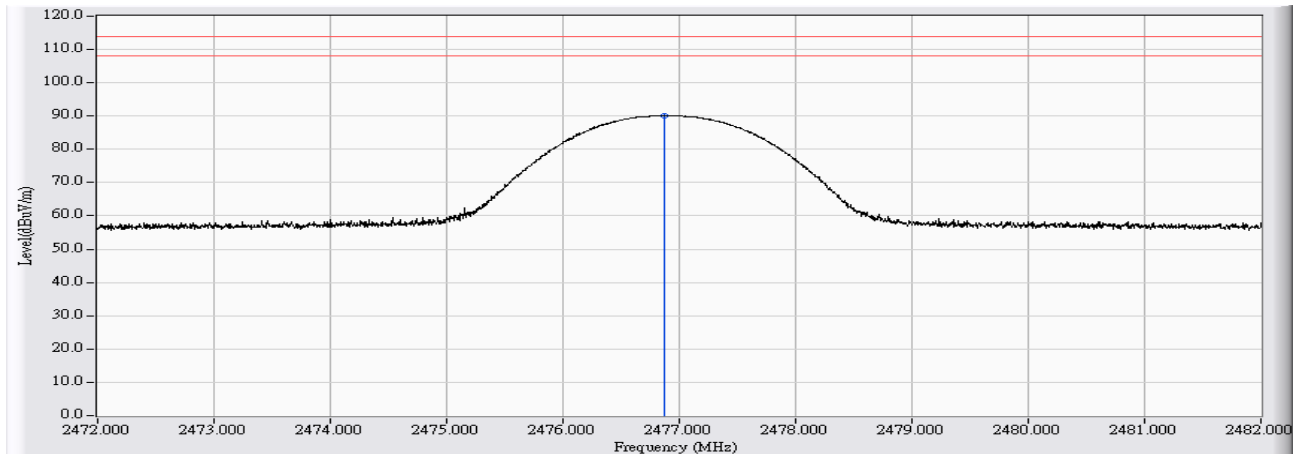


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.955	31.884	52.259	84.142	-29.858	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:24
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz X+ axis

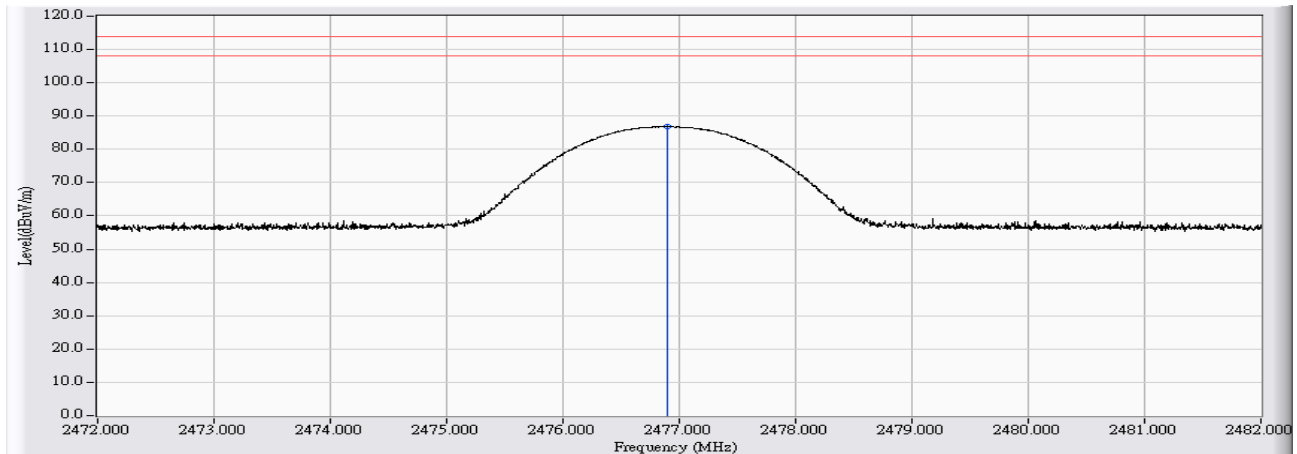


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.875	31.991	58.057	90.048	-23.952	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:23
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz X+ axis

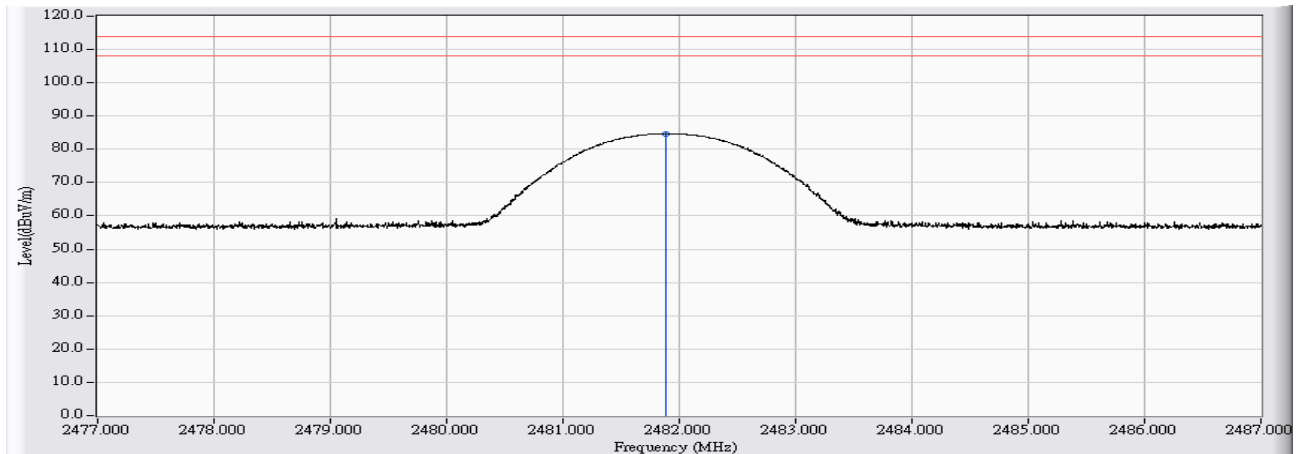


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.900	31.991	54.841	86.832	-27.168	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 17:33
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz X+ axis

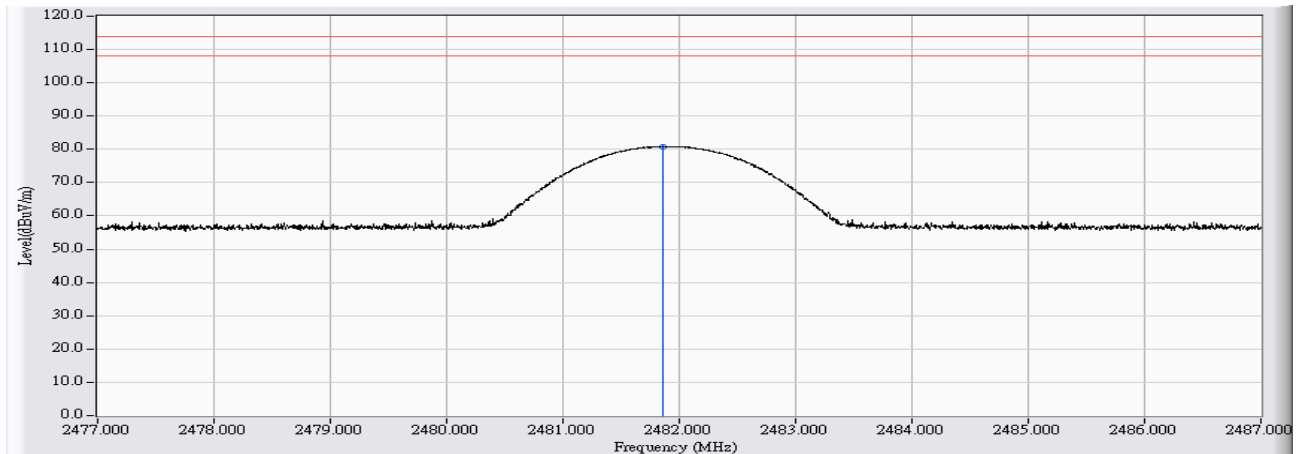


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.885	31.984	52.731	84.715	-29.285	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 17:41
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz X+ axis

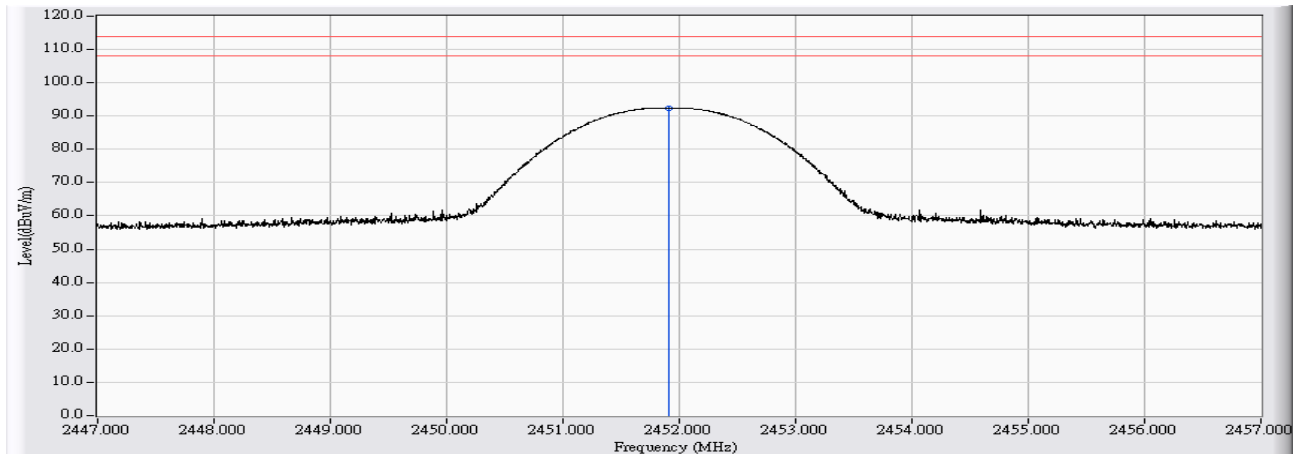


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.865	31.984	48.910	80.894	-33.106	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 18:52
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz Y+ axis

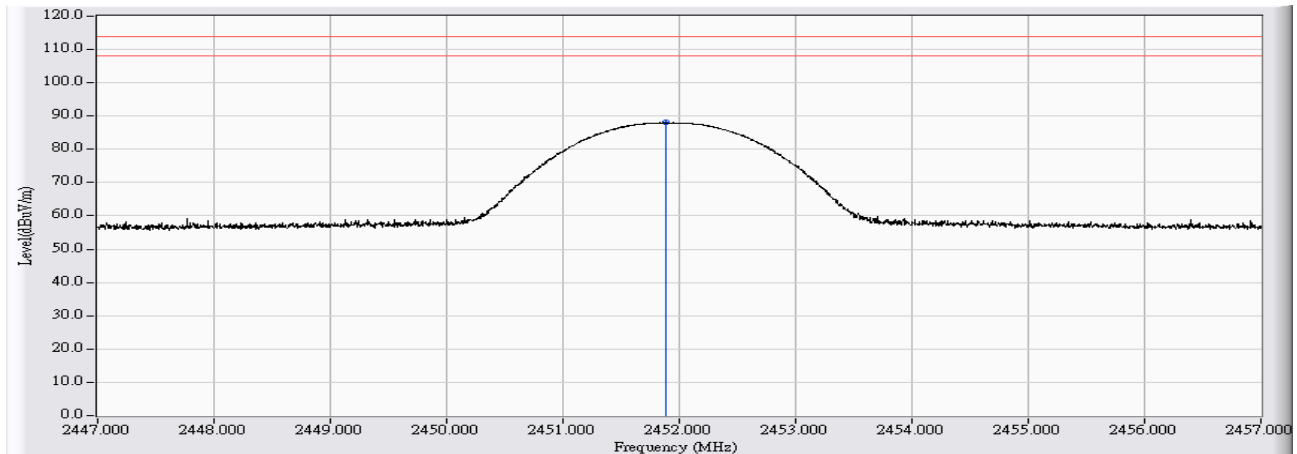


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.915	31.531	60.960	92.490	-21.510	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 18:55
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz Y+ axis

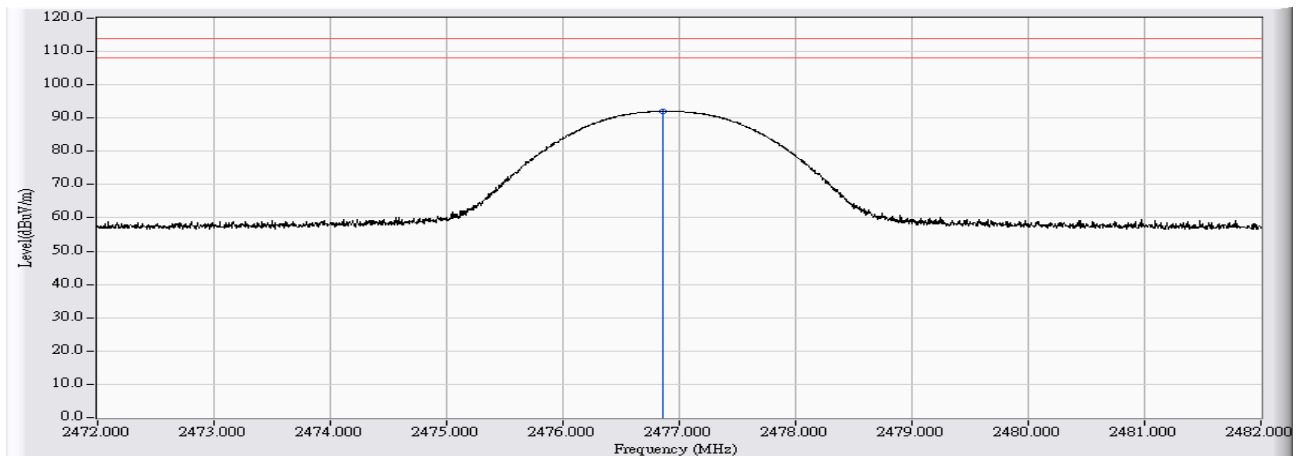


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.890	31.883	56.131	88.014	-25.986	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 18:59
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz Y+ axis

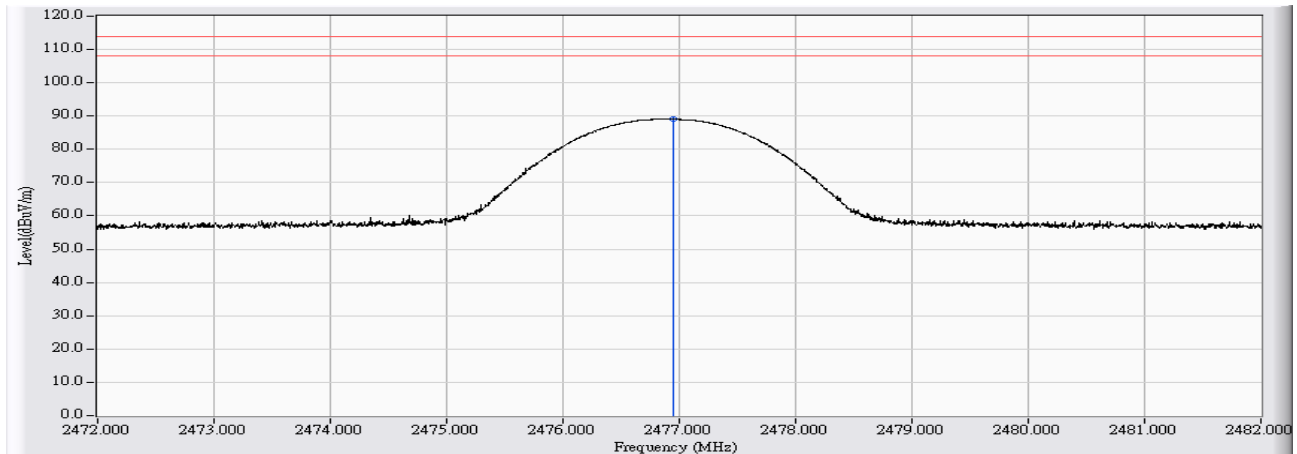


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.865	31.991	60.000	91.991	-22.009	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 18:57
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz Y+ axis

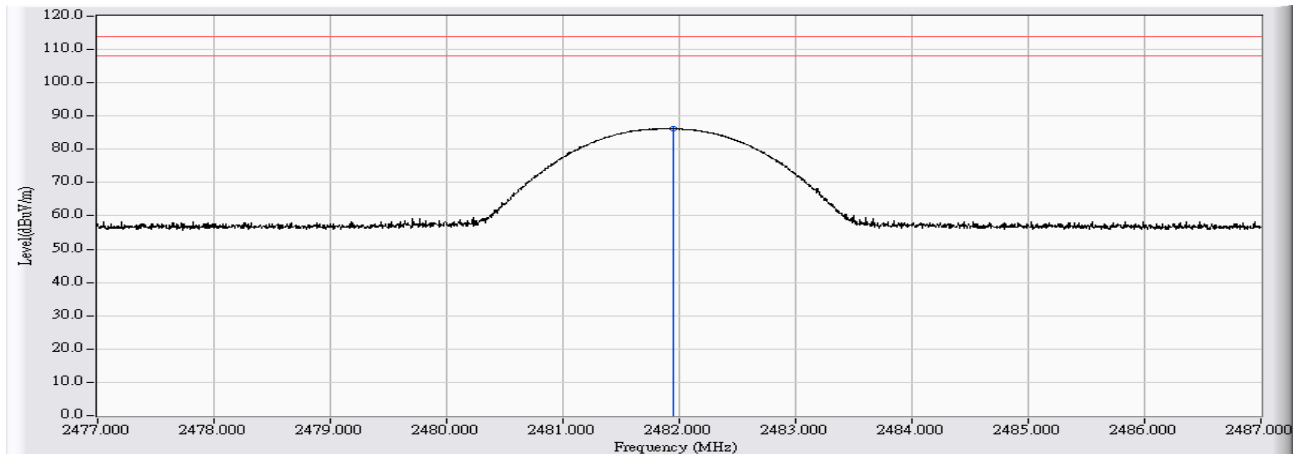


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.945	31.992	57.064	89.055	-24.945	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:03
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz Y+ axis

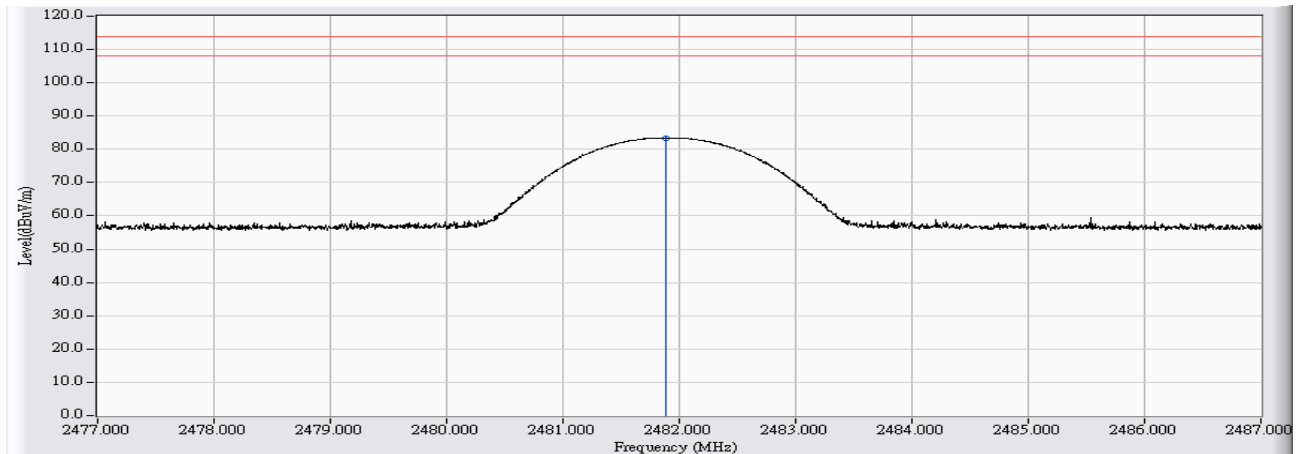


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.950	31.984	54.199	86.183	-27.817	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:05
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz Y+ axis

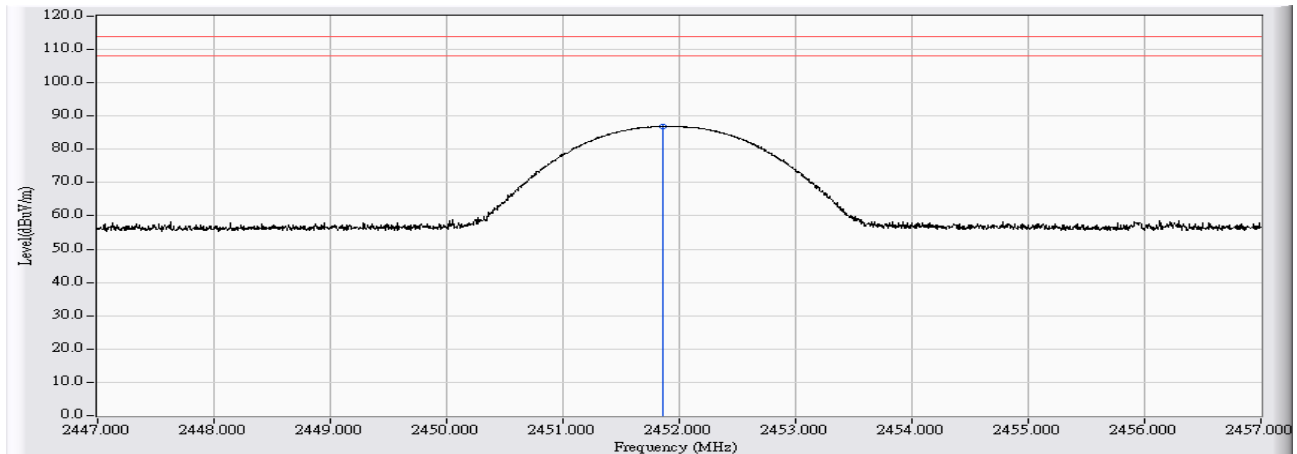


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.885	31.984	51.489	83.473	-30.527	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:15
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz Z+ axis

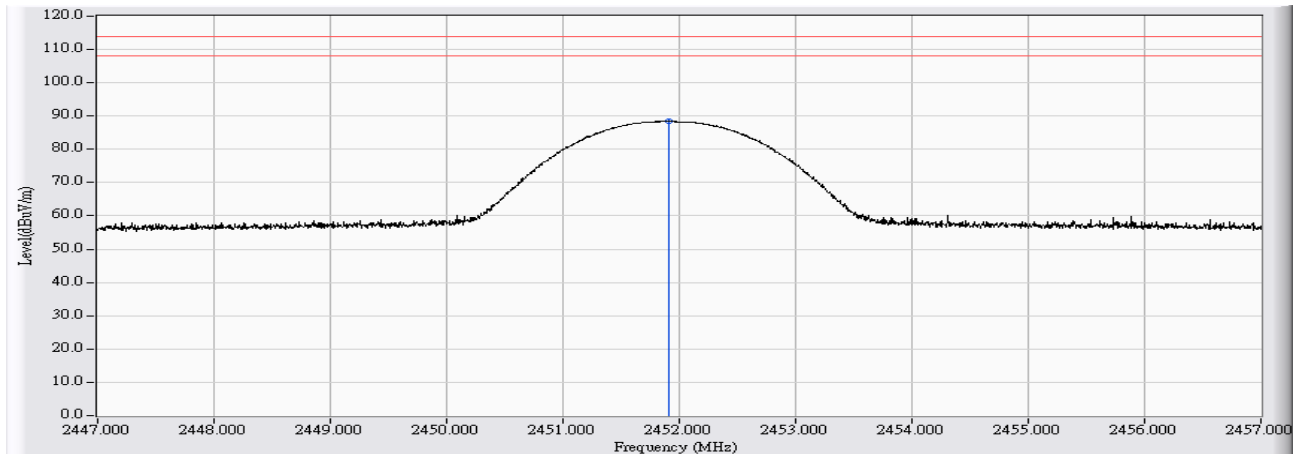


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.865	31.883	55.027	86.909	-27.091	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:14
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz Z+ axis

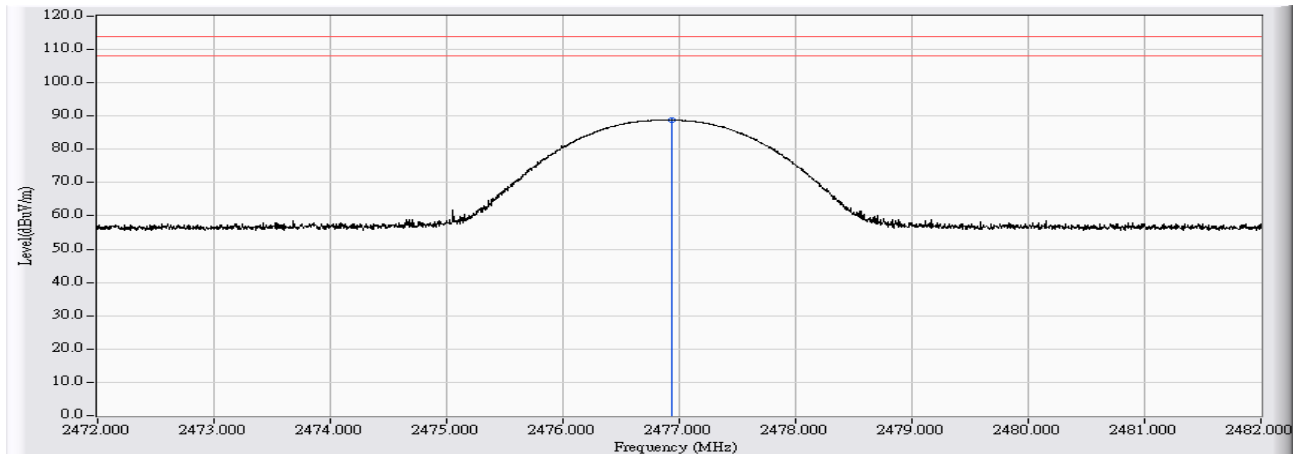


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2451.905	31.883	56.493	88.376	-25.624	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:10
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz Z+ axis

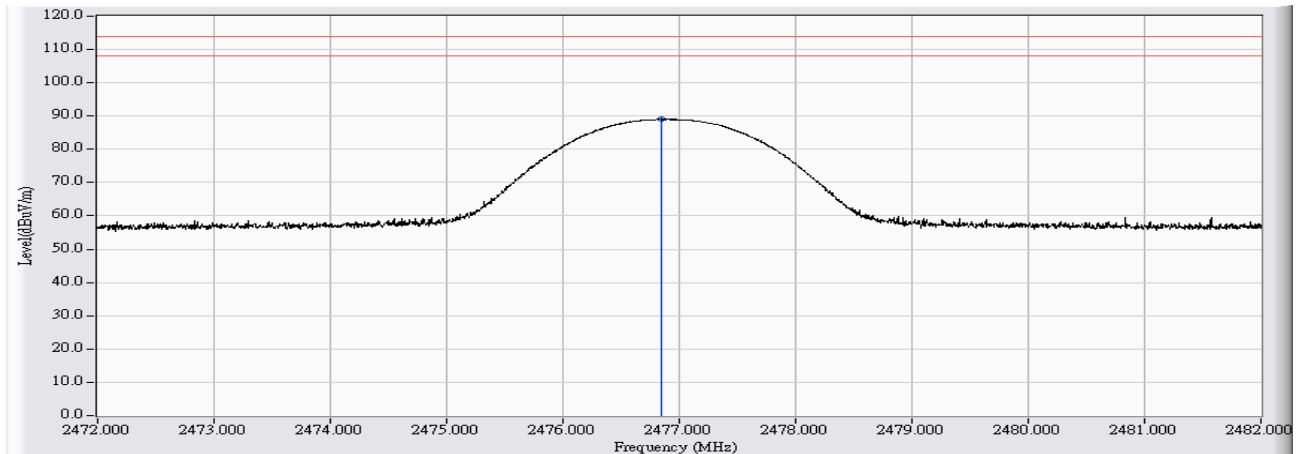


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.935	31.992	56.754	88.745	-25.255	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:12
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz Z+ axis

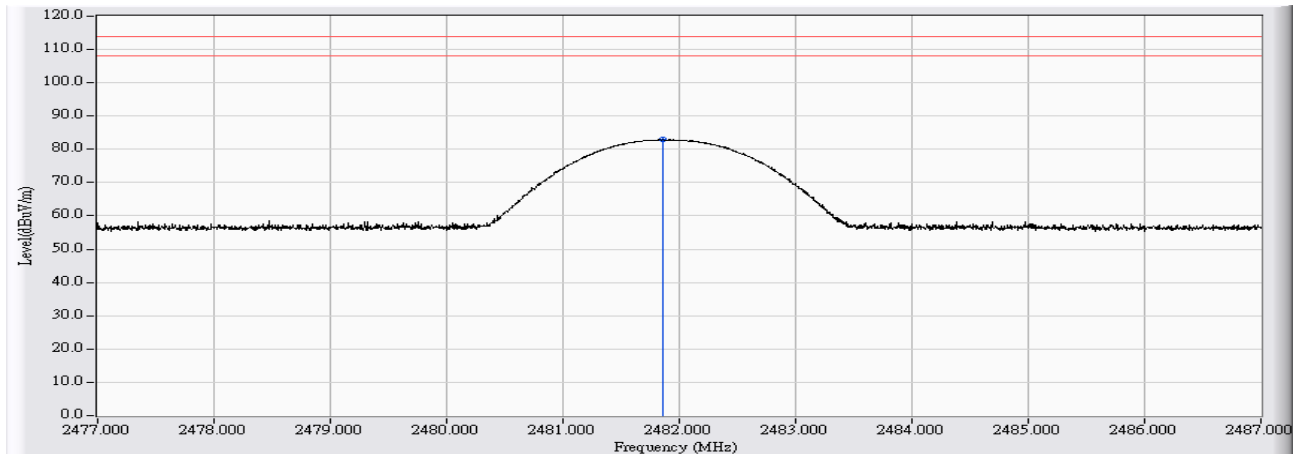


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2476.850	31.991	57.007	88.998	-25.002	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:08
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz Z+ axis

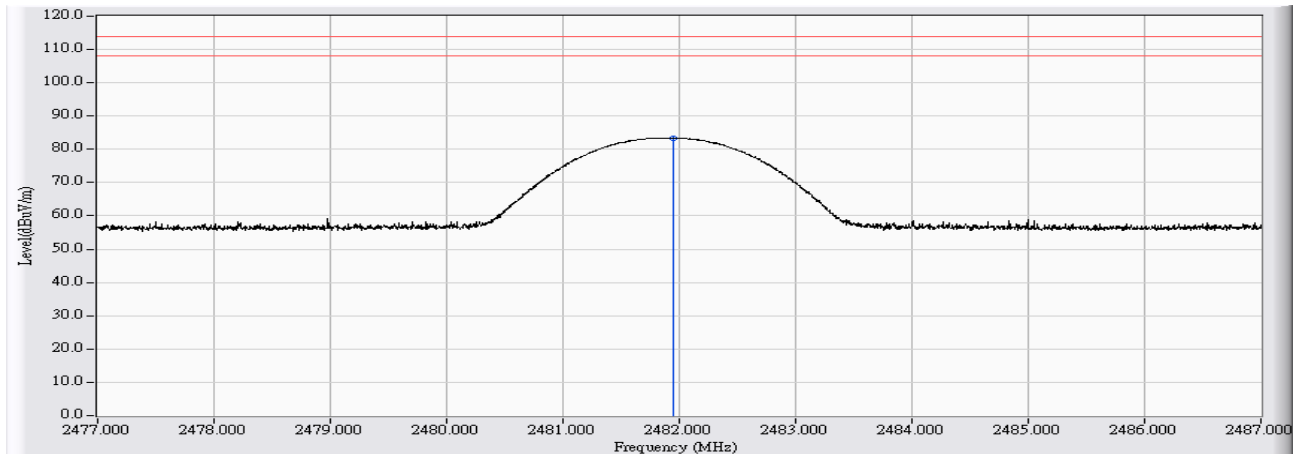


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.865	31.984	50.906	82.890	-31.110	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 19:07
Limit : FCC_SpartC_15.249_F_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz Z+ axis



		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	2481.945	31.984	51.490	83.474	-30.526	114.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

3. Radiated Emission

3.1. Test Equipment

The following test equipment are used during the test:

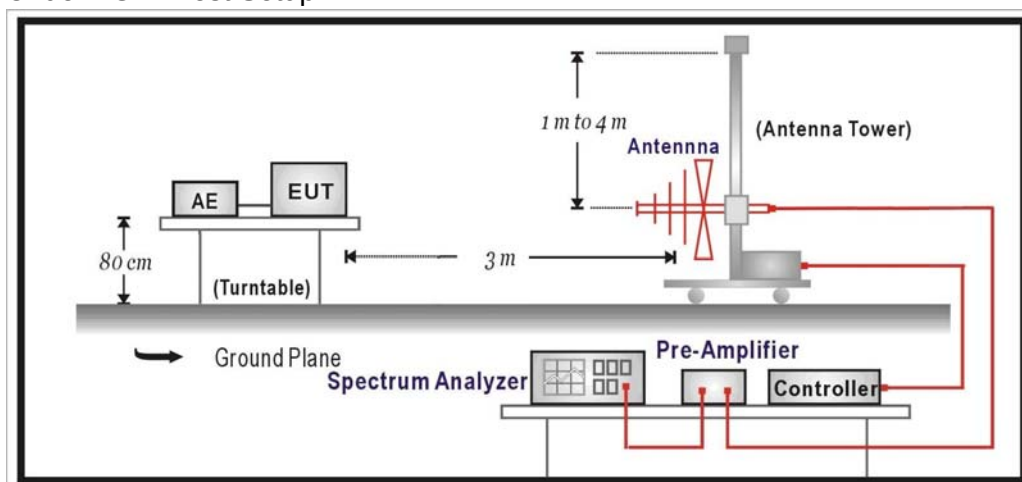
Radiated Emission / CB1

Instrument	Manufacturer	Model No.	Serial No	Next Cal. Date
Bilog Antenna	SCHAFFNER	CBL6112B	2895(CB1)	2015/08/14
Double Ridged Guide Horn Antenna	Schwarzback	BBHA 9120	D743	2015/02/12
Pre-Amplifier	Quietek	AMF-4D.	888003	2015/06/02
Pre-Amplifier	QuieTek	AP-025C	CHM-0706049	2015/02/06
Spectrum Analyzer	Agilent	E4440A	MY46187335	2016/01/07
k Type Cable	Huber Suhner	Sucoflex 102	25623/2	2015/02/10

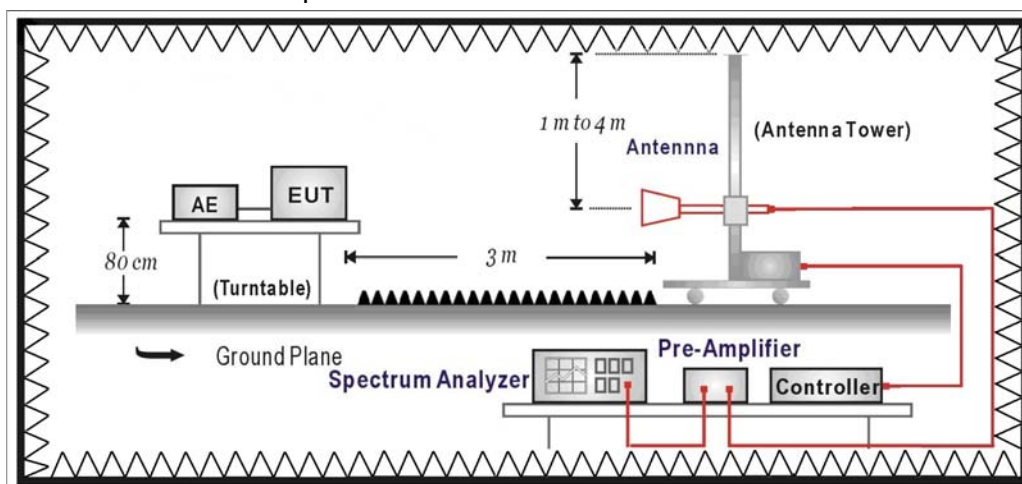
Note: 1. All equipments that need to calibrate are with calibration period of 1 year.

3.2. Test Setup

Under 1GHz Test Setup:



Above 1GHz Test Setup:



3.3. Limits

➤ Fundamental and Harmonics Emission Limits

FCC Part 15 Subpart C Paragraph 15.249 Limits				
Fundamental Frequency MHz	Field Strength of Fundamental		Field Strength of Harmonics	
	mV/m	dBuV/m	uV/m	dBuV/m
902-928	50	94	500	54
2400-2483.5	50	94	500	54
5725-5875	50	94	500	54

- Remarks :
1. RF Voltage (dBuV) = 20 log RF Voltage (uV)
 2. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.
 3. The emission limit in this paragraph is based on measurement instrumentation employing an average detector.

➤ Spurious electric field strength limits

FCC Part 15 Subpart C Paragraph 15.209 Limits			
Frequency MHz	uV/m	dBuV/m	Measurement distance (meter)
1.705-30	30	29.5	30
30-88	100	40	3
88-216	150	43.5	3
216-960	200	46	3
Above 960	500	54	3

- Remarks :
1. RF Voltage (dBuV) = 20 log RF Voltage (uV)
 2. In the Above Table, the tighter limit applies at the band edges.
 3. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.

3.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.

Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.4: 2009 on radiated measurement.

On any frequency or frequencies below or equal to 1000 MHz, the limits shown are based on measuring equipment employing a quasi-peak detector function and on any frequency or frequencies above 1000 MHz the radiated limits shown are based upon the use of measurement instrumentation employing an average detector function. When average radiated emission measurement are included emission measurement below 1000 MHz, there also is a limit on the radio frequency emissions, as measured using instrumentation with a peak detector function, corresponding to 20 dB above the maximum permitted average limit. The bandwidth below 1GHz setting on the field strength meter is 120 kHz and above 1GHz is 1MHz.

3.5. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.209 and Paragraph 15.249: 2013

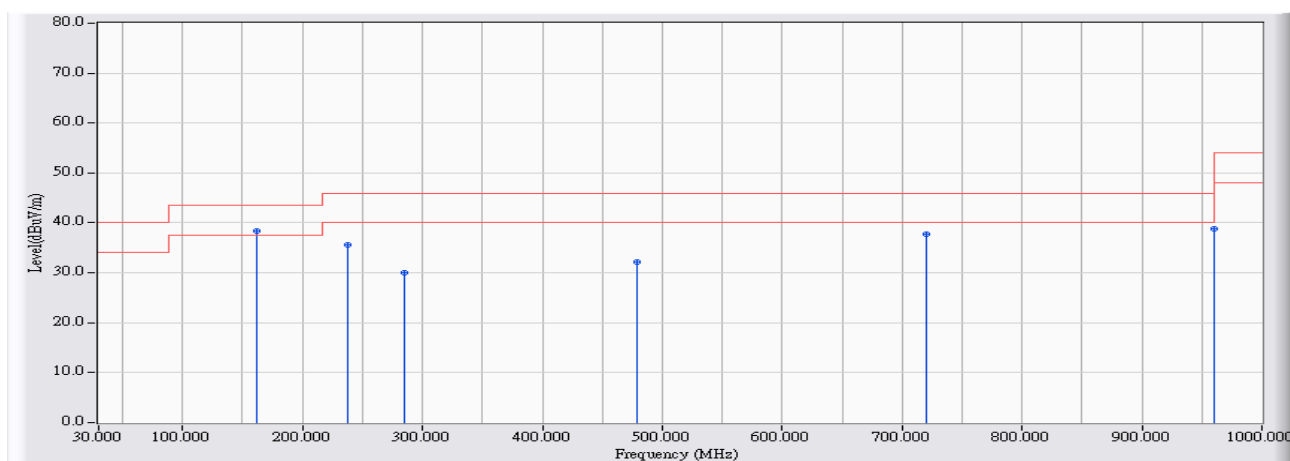
3.6. Uncertainty

The measurement uncertainty
 30MHz~1GHz as $\pm 3.43\text{dB}$
 1GHz~26.5GHz as $\pm 3.65\text{dB}$

3.7. Test Result

30 MHz-1 GHz Spurious:

Site : CB1	Time : 2015/01/19 - 14:30
Limit : FCC_CLASS_B_03M_QP	Margin : 6
Probe : CB1_FCC_30M-1G-4_9161 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz

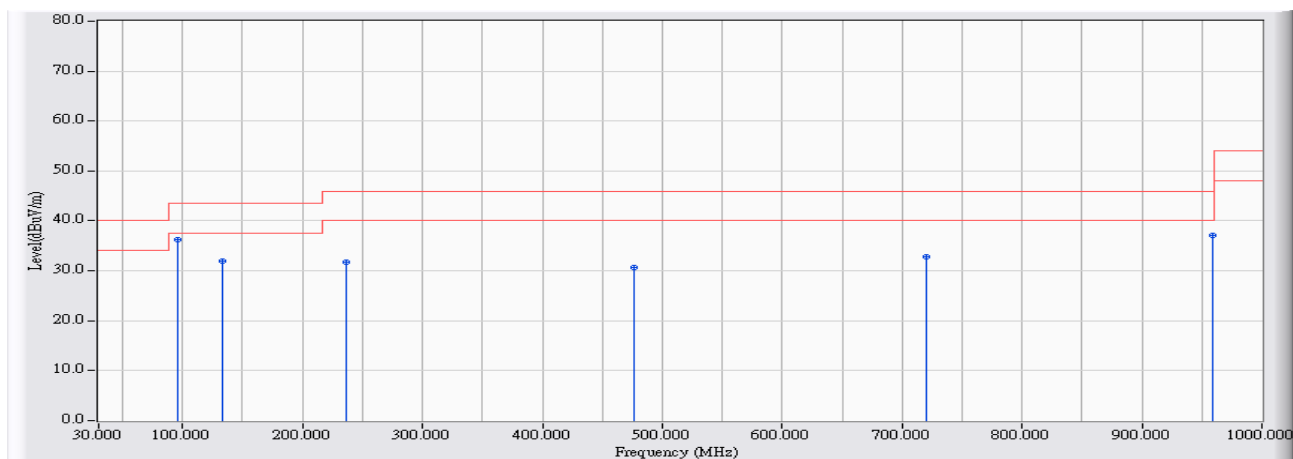


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	161.369	17.713	20.710	38.423	-5.077	43.500	QUASIPeAK
2		237.961	12.050	23.585	35.635	-10.365	46.000	QUASIPeAK
3		284.983	13.344	16.668	30.011	-15.989	46.000	QUASIPeAK
4		478.886	17.500	14.668	32.168	-13.832	46.000	QUASIPeAK
5		719.810	21.313	16.470	37.782	-8.218	46.000	QUASIPeAK
6		959.765	24.024	14.801	38.825	-7.175	46.000	QUASIPeAK

Note:

1. All Reading Levels are Quasi-Peak value.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Site : CB1	Time : 2015/01/19 - 14:37
Limit : FCC_CLASS_B_03M_QP	Margin : 6
Probe : CB1_FCC_30M-1G-4_9161 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz



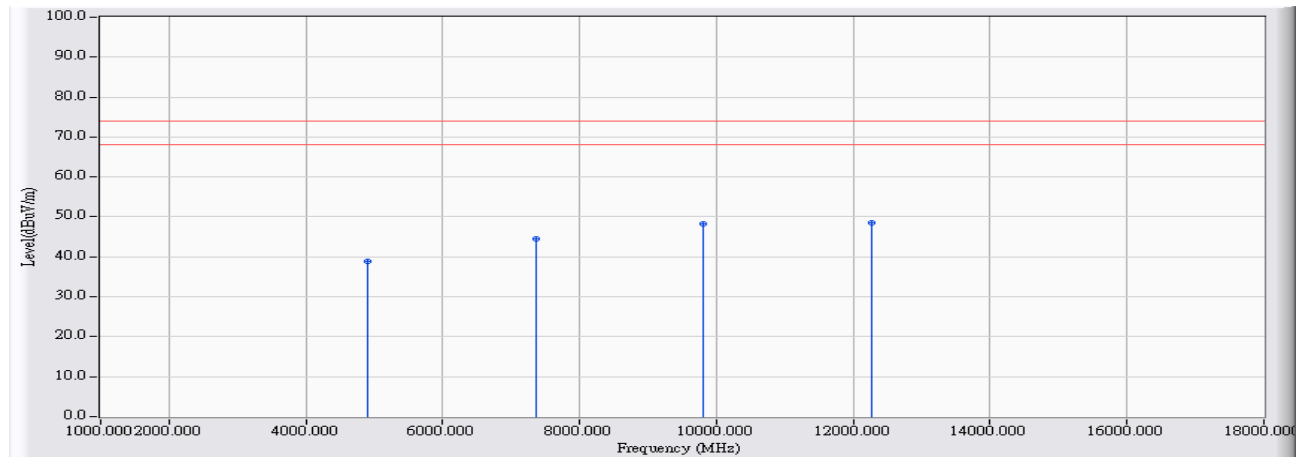
		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	*	95.442	12.144	24.056	36.199	-7.301	43.500	QUASIPeAK
2		133.253	14.822	17.187	32.009	-11.491	43.500	QUASIPeAK
3		236.022	12.072	19.596	31.667	-14.333	46.000	QUASIPeAK
4		475.977	17.465	13.137	30.602	-15.398	46.000	QUASIPeAK
5		719.810	21.313	11.522	32.834	-13.166	46.000	QUASIPeAK
6		959.280	24.019	13.177	37.196	-8.804	46.000	QUASIPeAK

Note:

1. All Reading Levels are Quasi-Peak value.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Above 1GHz Spurious :

Site : CB1	Time : 2015/01/05 - 17:39
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz

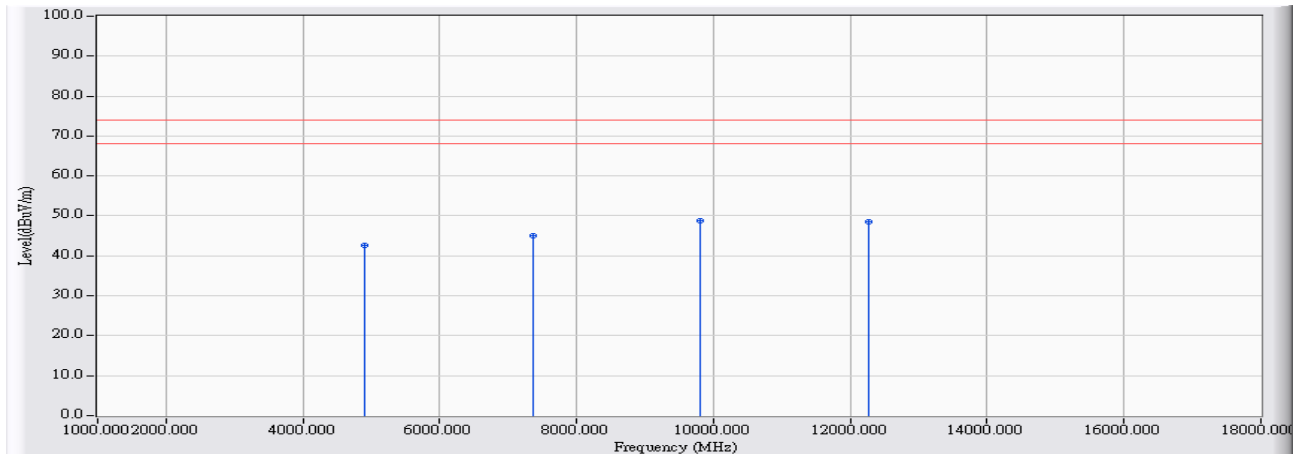


		Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1		4904.000	-0.421	39.344	38.923	-35.077	74.000	PEAK
2		7356.000	5.705	38.901	44.606	-29.394	74.000	PEAK
3		9808.000	10.262	38.010	48.272	-25.728	74.000	PEAK
4	*	12260.000	11.024	37.522	48.546	-25.454	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2015/01/05 - 17:38
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452 MHz

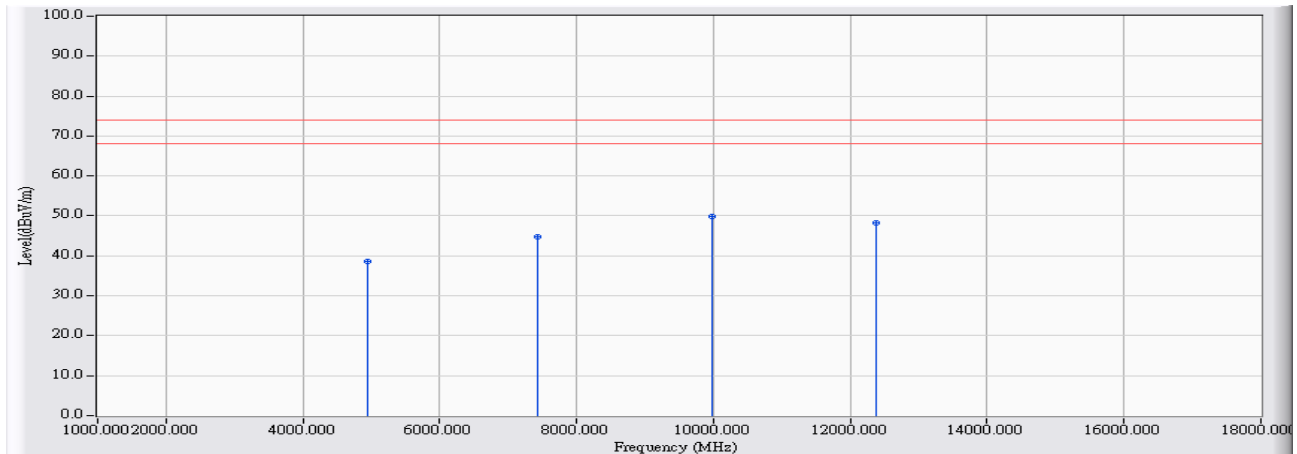


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	4904.000	-0.428	43.113	42.685	-31.315	74.000	PEAK
2	7356.000	5.705	39.326	45.031	-28.969	74.000	PEAK
3	* 9808.000	10.262	38.546	48.808	-25.192	74.000	PEAK
4	12260.000	11.024	37.576	48.600	-25.400	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2015/01/05 - 17:40
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz

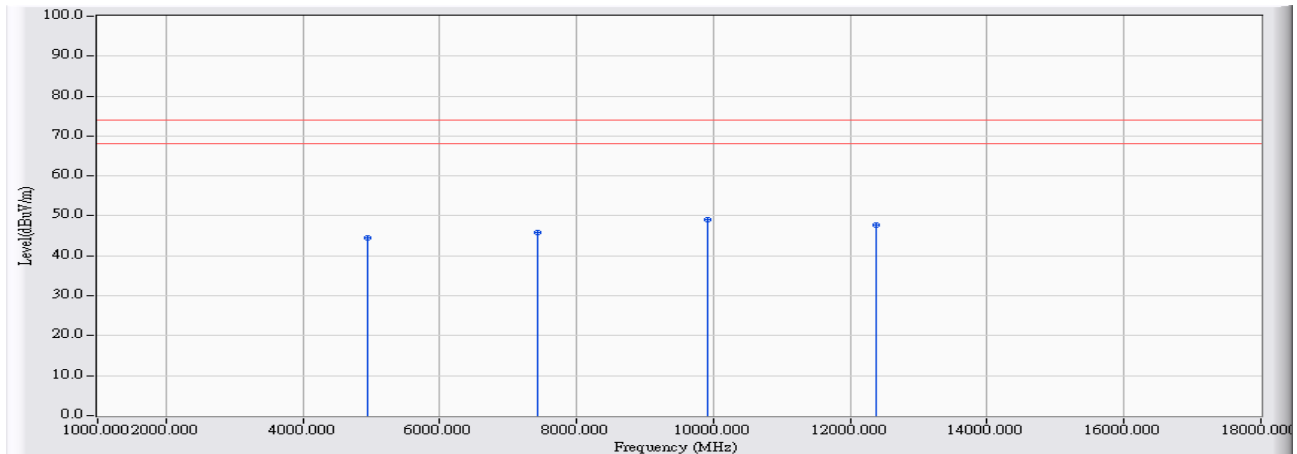


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	4954.000	-0.300	38.895	38.595	-35.405	74.000	PEAK
2	7431.000	5.867	39.012	44.879	-29.121	74.000	PEAK
3	* 9980.000	11.375	38.567	49.942	-24.058	74.000	PEAK
4	12385.000	10.967	37.393	48.360	-25.640	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2015/01/05 - 17:41
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477 MHz

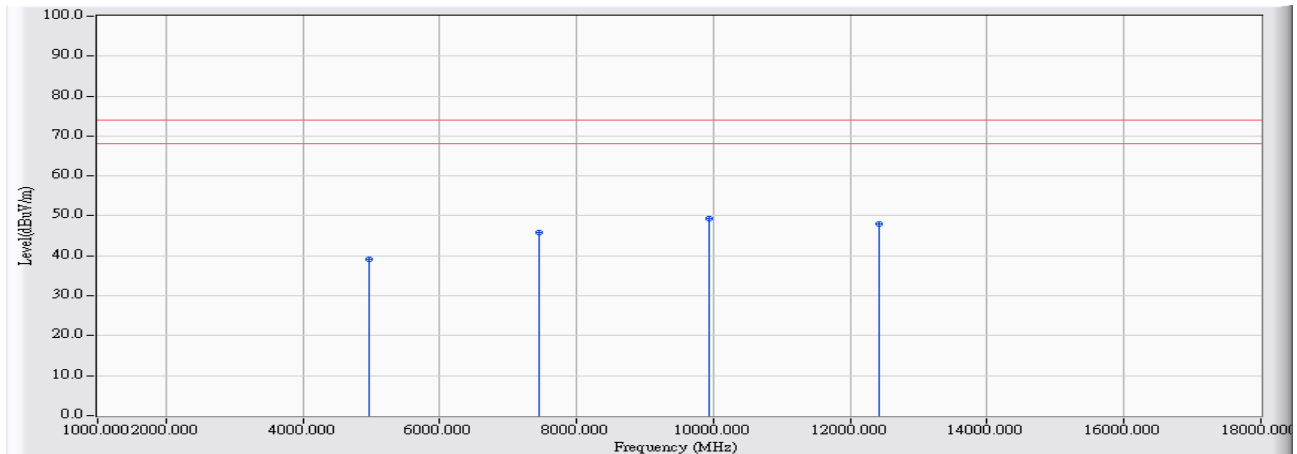


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	4954.000	-0.304	44.701	44.398	-29.602	74.000	PEAK
2	7431.000	5.867	39.922	45.789	-28.211	74.000	PEAK
3	* 9908.000	10.909	38.057	48.966	-25.034	74.000	PEAK
4	12385.000	10.967	36.644	47.611	-26.389	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2015/01/05 - 17:42
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz

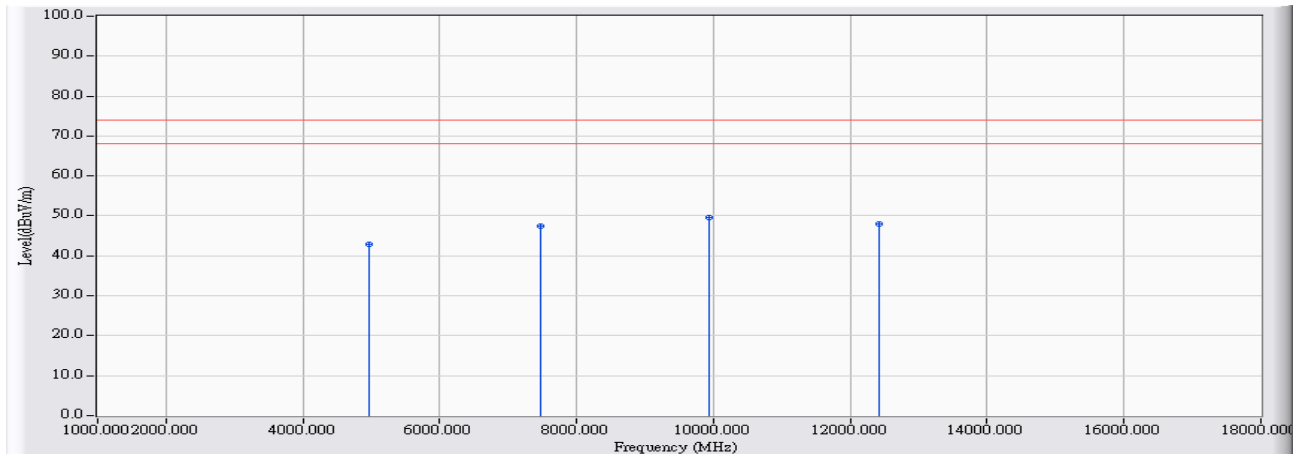


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	4964.000	-0.275	39.453	39.178	-34.822	74.000	PEAK
2	7446.000	5.900	39.868	45.768	-28.232	74.000	PEAK
3	* 9928.000	11.039	38.174	49.213	-24.787	74.000	PEAK
4	12410.000	10.956	37.006	47.962	-26.038	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2015/01/05 - 17:42
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482 MHz



	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	4961.000	-0.282	43.216	42.933	-31.067	74.000	PEAK
2	7446.000	5.948	41.612	47.560	-26.440	74.000	PEAK
3	* 9928.000	11.039	38.490	49.529	-24.471	74.000	PEAK
4	12410.000	10.956	36.990	47.946	-26.054	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. “ * ”, means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

4. Band Edge

4.1. Test Equipment

The following test equipment are used during the test:

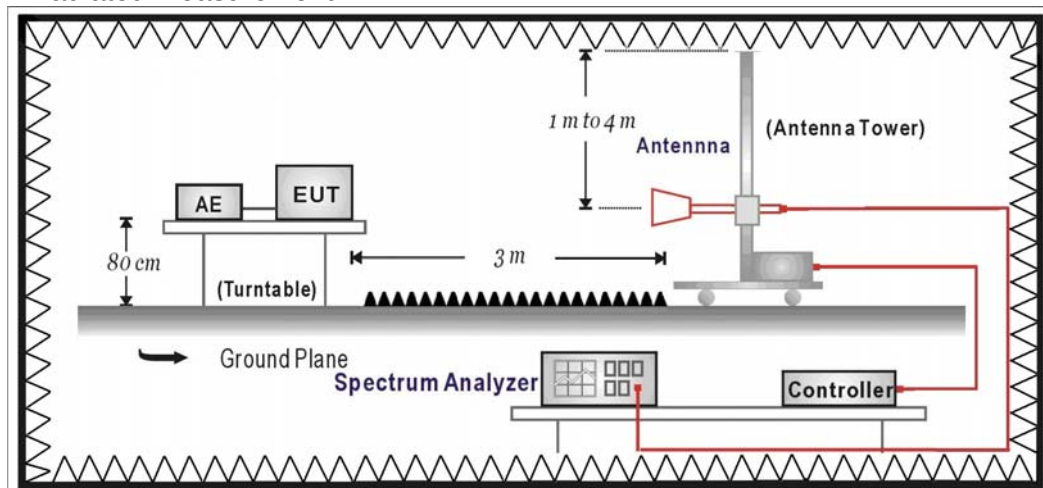
Band Edge / CB1

Instrument	Manufacturer	Type No.	Serial No	Next Cal. Date
Double Ridged Guide Horn Antenna	Schwarzback	BBHA 9120	D743	2015/02/12
Spectrum Analyzer	Agilent	E4440A	MY46187335	2016/01/07
k Type Cable	Huber Suhner	Sucoflex 102	25623/2	2015/02/10

Note: 1. All equipments that need to calibrate are with calibration period of 1 year.

4.2. Test Setup

RF Radiated Measurement:



4.3. Limits

In any 100 kHz bandwidth outside the frequency band in which the spread spectrum intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 50 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement. Attenuation below the general limits specified in Section 15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in Section 15.205(a), must also comply with the radiated emission limits specified in Section 15.209(a) (see Section 15.205(c)).

4.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The EUT was positioned such that the distance from antenna to the EUT was 3 meters.

The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.

Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.4: 2009 on radiated measurement.

The bandwidth below 1GHz setting on the field strength meter is 120 kHz, above 1GHz are 1 MHz.

4.5. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.249: 2013

4.6. Uncertainty

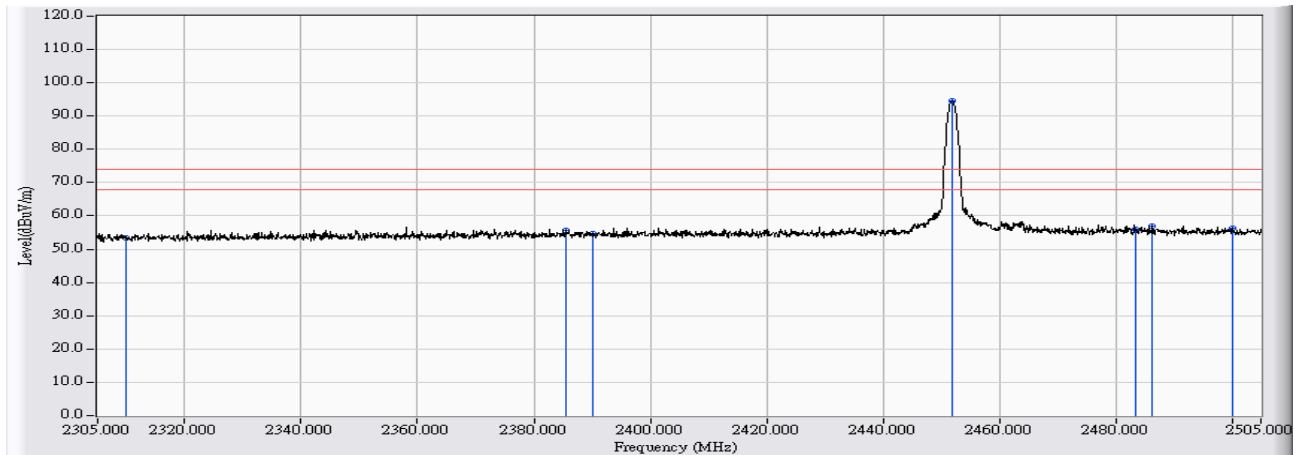
The measurement uncertainty

Conducted is defined as $\pm 1.27\text{dB}$

Radiated is defined as $\pm 3.9\text{dB}$

4.7. Test Result

Site : CB1	Time : 2014/12/25 - 13:09
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452MHz

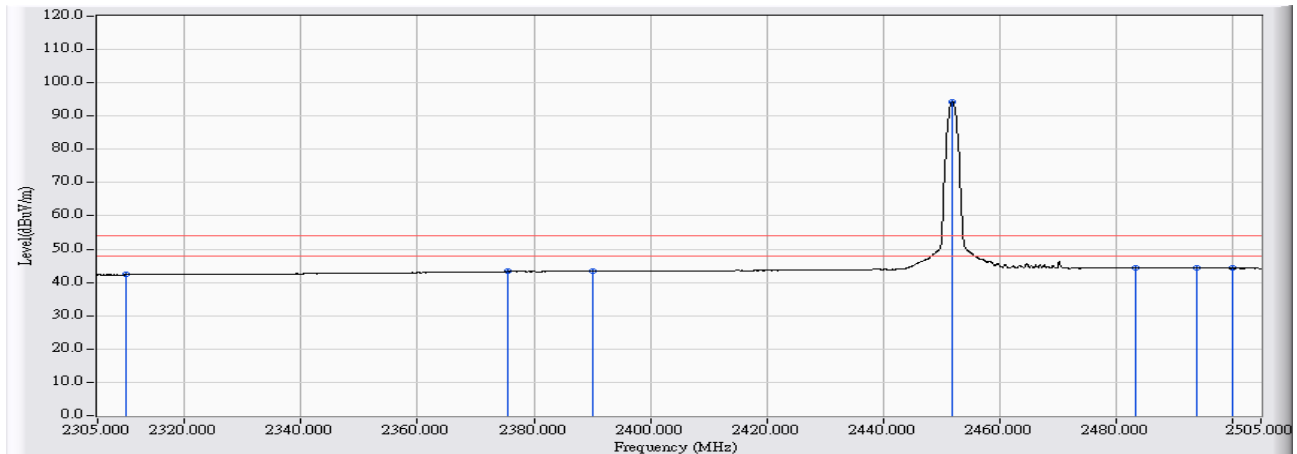


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	23.097	53.508	-20.492	74.000	PEAK
2	2385.500	31.194	24.590	55.784	-18.216	74.000	PEAK
3	2390.000	31.241	23.435	54.676	-19.324	74.000	PEAK
4	* 2451.900	31.883	62.609	94.492	20.492	74.000	PEAK
5	2483.500	31.980	23.927	55.906	-18.094	74.000	PEAK
6	2486.400	31.972	25.067	57.039	-16.961	74.000	PEAK
7	2500.000	31.934	24.459	56.394	-17.606	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 13:07
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452MHz

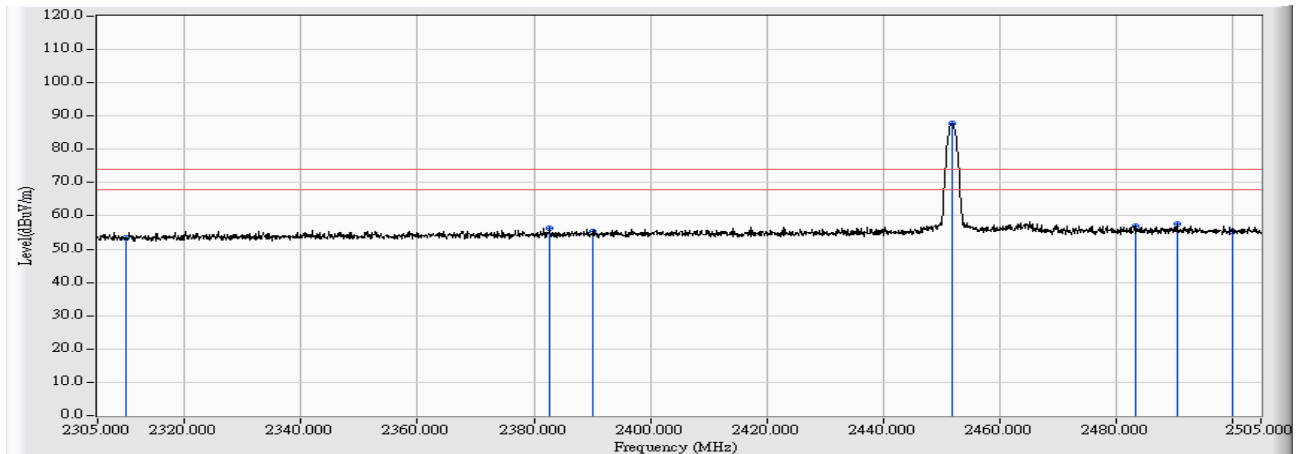


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.929	42.340	-11.660	54.000	AVERAGE
2	2375.400	31.089	12.186	43.276	-10.724	54.000	AVERAGE
3	2390.000	31.241	12.137	43.378	-10.622	54.000	AVERAGE
4	* 2452.000	31.884	62.475	94.359	40.359	54.000	AVERAGE
5	2483.500	31.980	12.298	44.277	-9.723	54.000	AVERAGE
6	2493.900	31.951	12.348	44.299	-9.701	54.000	AVERAGE
7	2500.000	31.934	12.314	44.249	-9.751	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 13:11
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452MHz

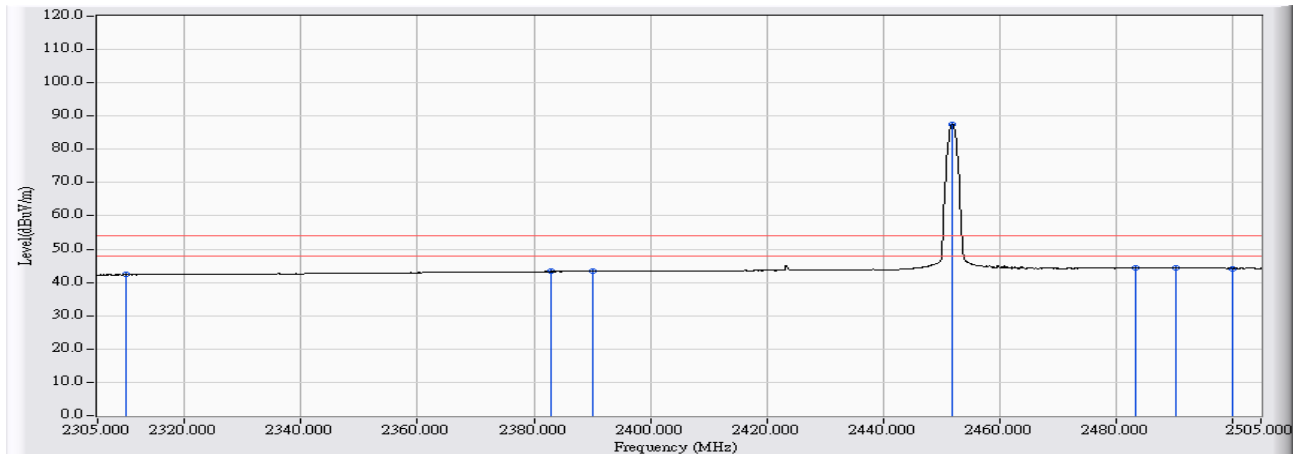


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	22.983	53.394	-20.606	74.000	PEAK
2	2382.800	31.167	25.213	56.379	-17.621	74.000	PEAK
3	2390.000	31.241	24.178	55.419	-18.581	74.000	PEAK
4	* 2451.900	31.883	55.836	87.719	13.719	74.000	PEAK
5	2483.500	31.980	25.010	56.989	-17.011	74.000	PEAK
6	2490.600	31.960	25.489	57.449	-16.551	74.000	PEAK
7	2500.000	31.934	23.253	55.188	-18.812	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 13:13
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2452MHz

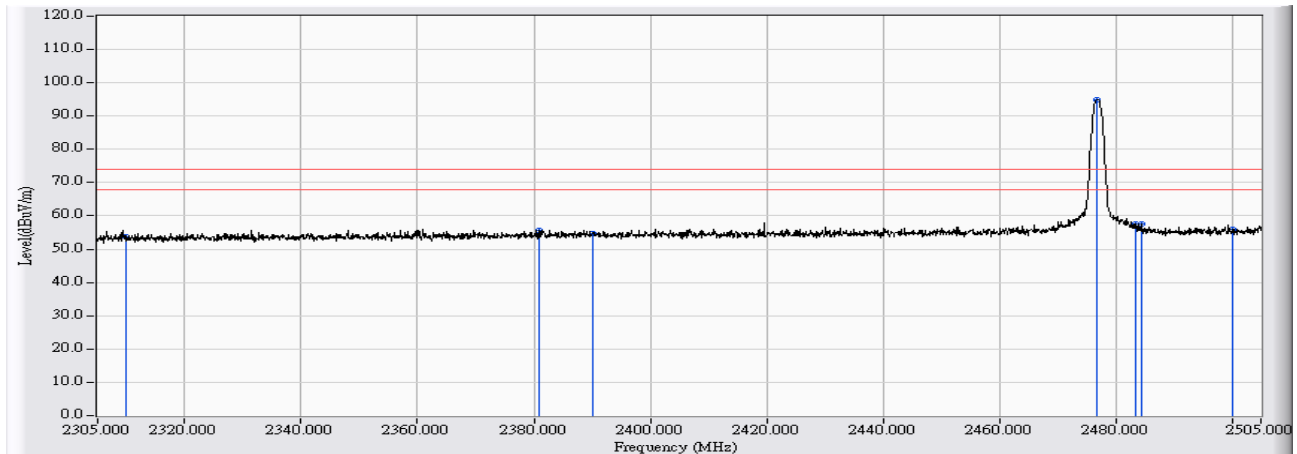


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.914	42.325	-11.675	54.000	AVERAGE
2	2383.000	31.168	12.105	43.273	-10.727	54.000	AVERAGE
3	2390.000	31.241	12.131	43.372	-10.628	54.000	AVERAGE
4	* 2451.900	31.883	55.656	87.539	33.539	54.000	AVERAGE
5	2483.500	31.980	12.344	44.323	-9.677	54.000	AVERAGE
6	2490.300	31.961	12.396	44.357	-9.643	54.000	AVERAGE
7	2500.000	31.934	12.297	44.232	-9.768	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:56
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz

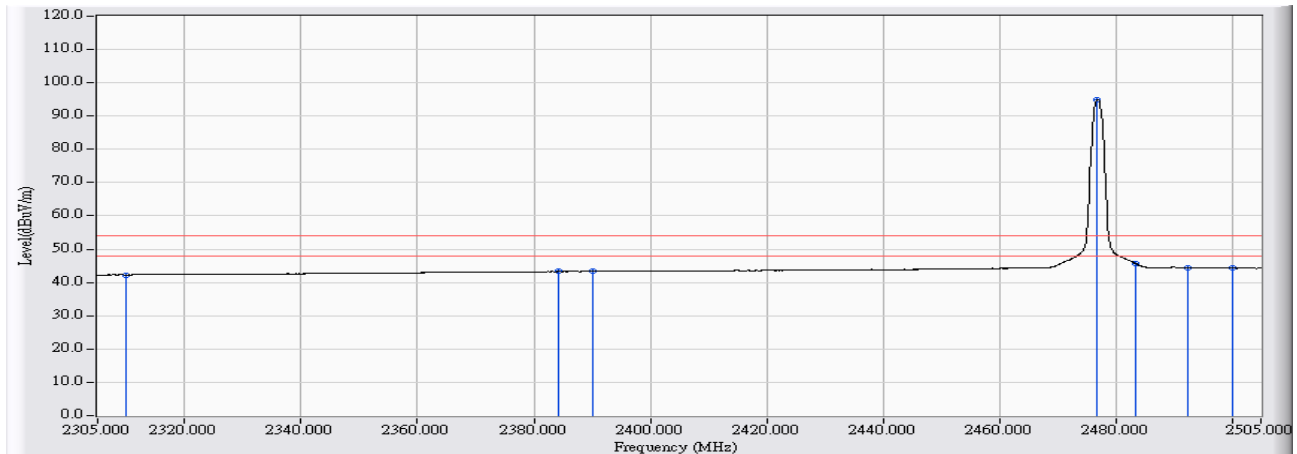


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	23.402	53.813	-20.187	74.000	PEAK
2	2380.800	31.145	24.617	55.763	-18.237	74.000	PEAK
3	2390.000	31.241	23.342	54.583	-19.417	74.000	PEAK
4	* 2476.800	31.991	63.026	95.017	21.017	74.000	PEAK
5	2483.500	31.980	25.690	57.669	-16.331	74.000	PEAK
6	2484.400	31.977	25.679	57.656	-16.344	74.000	PEAK
7	2500.000	31.934	24.026	55.961	-18.039	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:57
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz

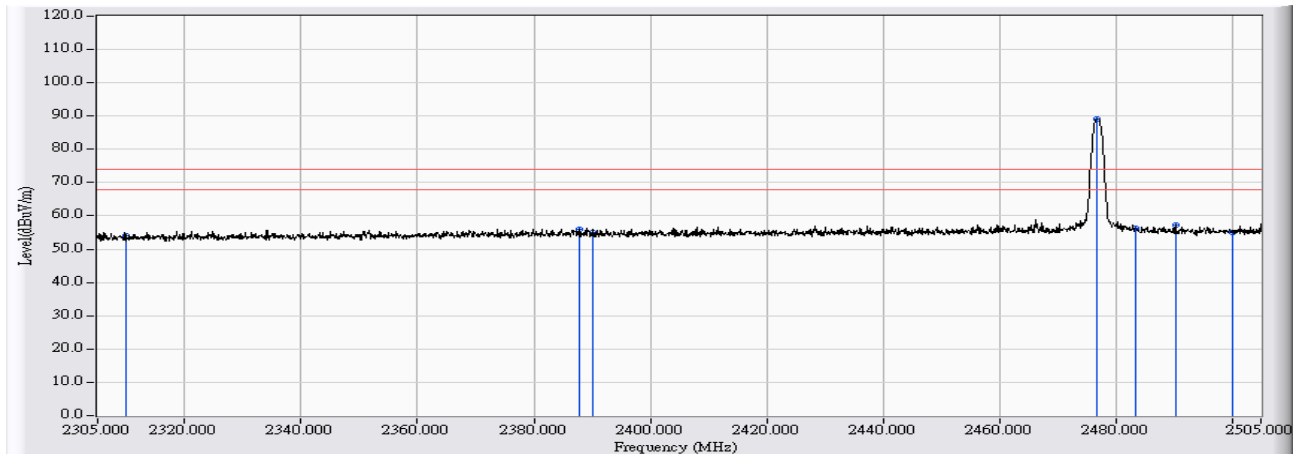


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.878	42.289	-11.711	54.000	AVERAGE
2	2384.200	31.180	12.107	43.288	-10.712	54.000	AVERAGE
3	2390.000	31.241	12.136	43.377	-10.623	54.000	AVERAGE
4	* 2476.900	31.991	62.992	94.983	40.983	54.000	AVERAGE
5	2483.500	31.980	13.664	45.643	-8.357	54.000	AVERAGE
6	2492.400	31.955	12.372	44.327	-9.673	54.000	AVERAGE
7	2500.000	31.934	12.344	44.279	-9.721	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:54
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz

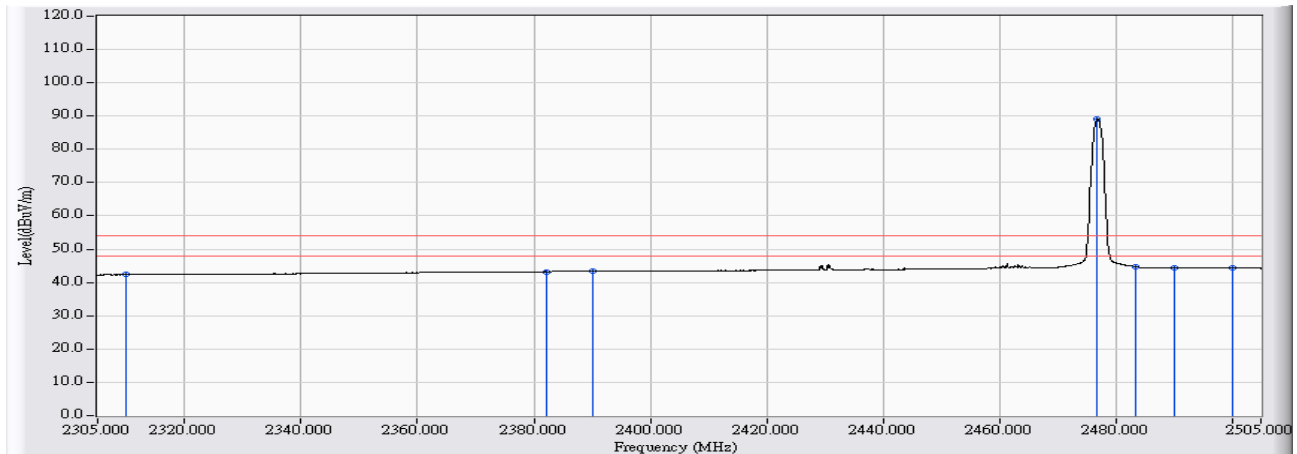


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	23.590	54.001	-19.999	74.000	PEAK
2	2387.700	31.217	24.603	55.820	-18.180	74.000	PEAK
3	2390.000	31.241	23.676	54.917	-19.083	74.000	PEAK
4	* 2476.900	31.991	57.276	89.267	15.267	74.000	PEAK
5	2483.500	31.980	24.350	56.329	-17.671	74.000	PEAK
6	2490.300	31.961	25.240	57.201	-16.799	74.000	PEAK
7	2500.000	31.934	23.101	55.036	-18.964	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:52
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2477MHz

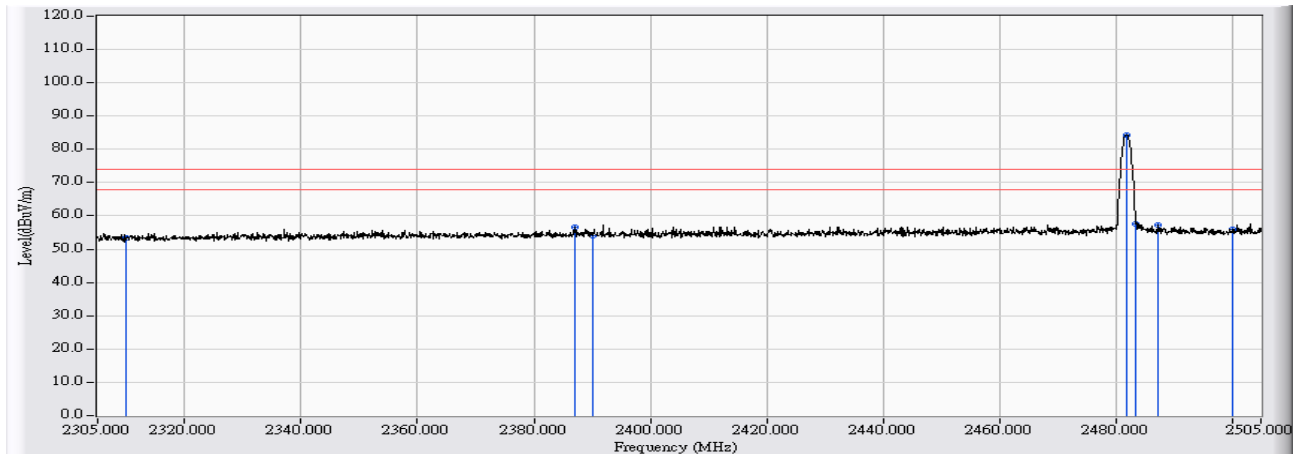


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.915	42.326	-11.674	54.000	AVERAGE
2	2382.200	31.160	12.107	43.267	-10.733	54.000	AVERAGE
3	2390.000	31.241	12.152	43.393	-10.607	54.000	AVERAGE
4	* 2476.900	31.991	57.030	89.021	35.021	54.000	AVERAGE
5	2483.500	31.980	12.738	44.717	-9.283	54.000	AVERAGE
6	2490.100	31.961	12.449	44.411	-9.589	54.000	AVERAGE
7	2500.000	31.934	12.331	44.266	-9.734	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:39
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482MHz

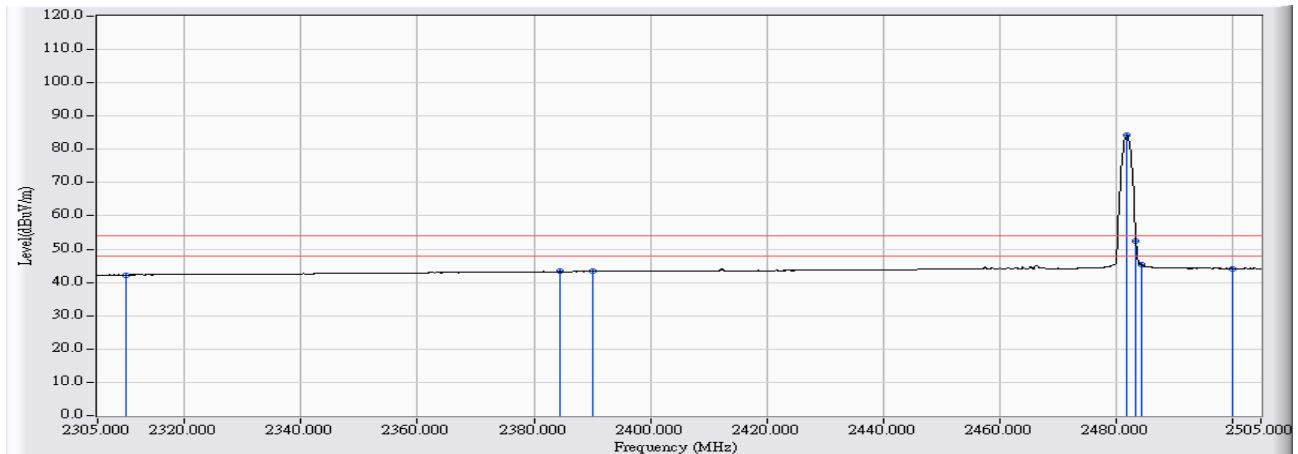


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	22.961	53.372	-20.628	74.000	PEAK
2	2387.100	31.211	25.466	56.677	-17.323	74.000	PEAK
3	2390.000	31.241	22.859	54.100	-19.900	74.000	PEAK
4	* 2481.800	31.984	52.446	84.430	10.430	74.000	PEAK
5	2483.500	31.980	25.615	57.594	-16.406	74.000	PEAK
6	2487.400	31.969	25.213	57.182	-16.818	74.000	PEAK
7	2500.000	31.934	24.132	56.067	-17.933	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:36
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - HORIZONTAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482MHz

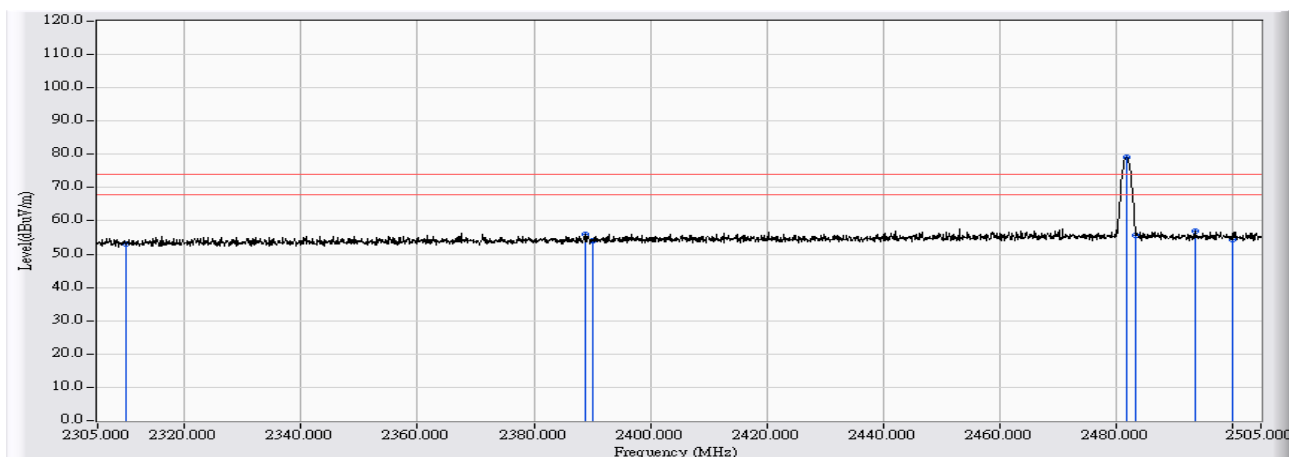


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.887	42.298	-11.702	54.000	AVERAGE
2	2384.400	31.183	12.106	43.289	-10.711	54.000	AVERAGE
3	2390.000	31.241	12.117	43.358	-10.642	54.000	AVERAGE
4	* 2481.900	31.984	52.165	84.149	30.149	54.000	AVERAGE
5	2483.500	31.980	20.573	52.552	-1.448	54.000	AVERAGE
6	2484.400	31.977	13.289	45.266	-8.734	54.000	AVERAGE
7	2500.000	31.934	12.273	44.208	-9.792	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:44
Limit : FCC_SpartC_15.249_H_03M_PK	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482MHz

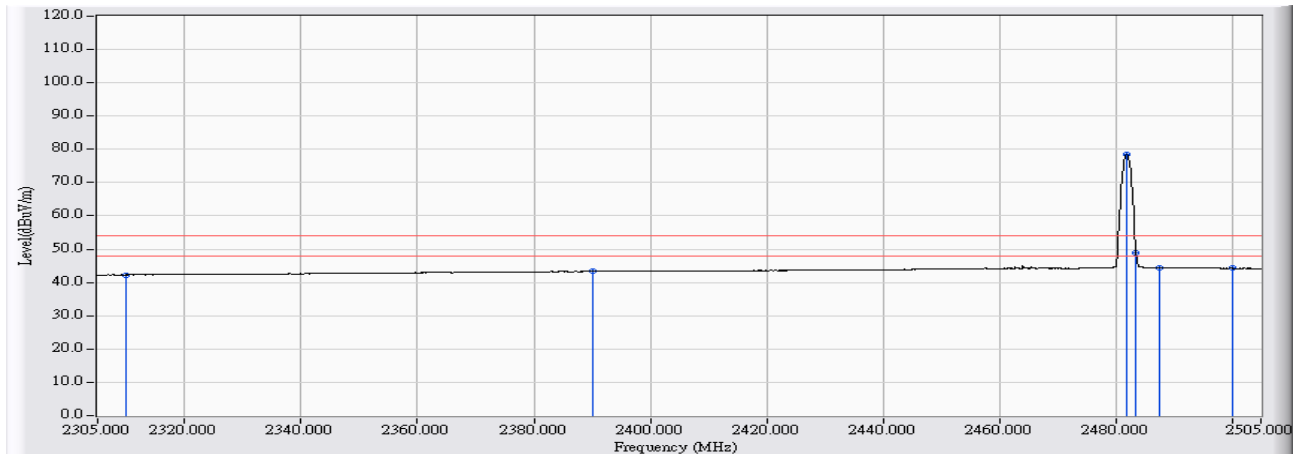


	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	22.769	53.180	-20.820	74.000	PEAK
2	2388.800	31.229	24.600	55.828	-18.172	74.000	PEAK
3	2390.000	31.241	22.838	54.079	-19.921	74.000	PEAK
4	* 2481.900	31.984	47.142	79.126	5.126	74.000	PEAK
5	2483.500	31.980	23.592	55.571	-18.429	74.000	PEAK
6	2493.600	31.952	24.962	56.914	-17.086	74.000	PEAK
7	2500.000	31.934	22.293	54.228	-19.772	74.000	PEAK

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Site : CB1	Time : 2014/12/25 - 11:47
Limit : FCC_SpartC_15.249_H_03M_AV	Margin : 6
Probe : CB1_FCC_EFS_1-18G-1_0901 - VERTICAL	Power : DC 12V
EUT : Savari DSRC unit	Note : 2482MHz



	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Measure Level (dBuV/m)	Margin (dB)	Limit (dBuV/m)	Detector Type
1	2310.000	30.411	11.891	42.302	-11.698	54.000	AVERAGE
2	2390.000	31.241	12.097	43.338	-10.662	54.000	AVERAGE
3	* 2481.900	31.984	46.479	78.463	24.463	54.000	AVERAGE
4	2483.500	31.980	17.070	49.049	-4.951	54.000	AVERAGE
5	2487.600	31.969	12.399	44.367	-9.633	54.000	AVERAGE
6	2500.000	31.934	12.311	44.246	-9.754	54.000	AVERAGE

Note:

1. All Readings below 1GHz are Peak, above are performed with peak and/or average measurements as necessary.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.