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## RADIO TEST REPORT

Report No.: STS1811226W02

Issued for

**Binatone Electronics International Ltd.**

Floor 23A, 9 Des Voeux Road West, Sheung Wan, Hong Kong

<b>Product Name:</b>	Baby Unit(2.8"/3.5"/5" Video Baby Monitor With Wi-Fi®; Wi-Fi® Home Video Camera)
<b>Brand Name:</b>	motorola
<b>Model Name:</b>	MBP667CONNECTBU
<b>Series Model:</b>	FOCUS67, FOCUS67-G, FOCUS67-W, MBP67CONNECT, MBP67CONNECT-G, MBP668CONNECTBU, MBP844CONNECTBU, MBP845CONNECTBU
<b>FCC ID:</b>	VLJ-FOCUS67G
<b>IC ID:</b>	4522A-FOCUS67G
<b>HVIN:</b>	FOCUS67G
<b>Test Standard:</b>	CFR47 FCC Part 15: Subpart C Section 15.247 CFR47 FCC Part 15: Subpart C Section 15.207 CFR47 FCC Part 15: Subpart C Section 15.209 RSS-247 Issue 2 February 2017 RSS-Gen Issue 5 April 2018

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## TEST RESULT CERTIFICATION

**Applicant's name .....**: Binatone Electronics International Ltd.  
Address .....: Floor 23A, 9 Des Voeux Road West, Sheung Wan, Hong Kong

**Manufacture's Name .....**: VTech (Dongguan) Telecommunications Ltd.  
Address .....: VTech Science Park Xia Ling Bei Management Zone, Liaobu, Dongguan, Guangdong 523411, China

### Product description

**Product Name.....**: Baby Unit(2.8"/3.5"/5" Video Baby Monitor With Wi-Fi®; Wi-Fi® Home Video Camera)  
**Brand Name .....**: motorola  
**Model Name .....**: MBP667CONNECTBU  
**Series Model.....**: FOCUS67, FOCUS67-G, FOCUS67-W, MBP67CONNECT, MBP67CONNECT-G, MBP668CONNECTBU, MBP844CONNECTBU, MBP845CONNECTBU  
**Test Standards .....**: CFR47 FCC Part 15: Subpart C Section 15.247  
CFR47 FCC Part 15: Subpart C Section 15.207  
CFR47 FCC Part 15: Subpart C Section 15.209  
RSS-247 Issue 2 February 2017  
RSS-Gen Issue 5 April 2018

**Test procedure .....**: ANSI C63.10: 2013

This device described above has been tested by STS, the test results show that the equipment under test (EUT) is in compliance with the FCC/IC requirements. And it is applicable only to the tested sample identified in the report.

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**Date of Test .....**:

Date (s) of performance of tests .....: 26 Nov. 2018 -11 Dec. 2018

Date of Issue .....: 12 Dec. 2018

Test Result.....: **Pass**

Testing Engineer

( Chris Chen )

Technical Manager

( Sunday Hu )

Authorized Signatory

( Vita Li )





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**Revision History**

Rev.	Issue Date	Report NO.	Effect Page	Contents
00	12 Dec. 2018	STS1811226W02	ALL	Initial Issue





## 1 SUMMARY OF TEST RESULTS

Test procedures according to the technical standards:

KDB 558074 D01 DTS Meas Guidance v05

FCC Part 15, Subpart C RSS-247 Issue 2			
Standard Section	Test Item	Judgment	Remark
FCC Part 15.207(a) RSS-Gen Clause 8.8	Conducted Emission	PASS	
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(b)	20dB Bandwidth	PASS	
RSS-Gen Clause 6.7	99% Bandwidth	PASS	
FCC Part 15.247(a)(1) RSS-247 Clause 5.4(b)	Output Power	PASS	
FCC Part 15.247(d) RSS-247 Clause 3.3	Radiated Spurious Emission	PASS	
FCC Part 15.247(d) RSS-247 Clause 5.5	Conducted Spurious & Band Edge Emission	PASS	
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(b)	Hopping Channel Separation	PASS	
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(d)	Number of Hopping Frequency	PASS	
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(d)	Dwell Time	PASS	
FCC Part 15.205	Restricted Band Edge Emission	PASS	
FCC Part 15.247(d) & 15.209(a) RSS-247 Clause 5.5	Band Edge Emission	PASS	
FCC Part 15.247(b)(4) & 15.203	Antenna Requirement	PASS	
RSS-Gen Clause 6.11	Frequency Stability	PASS	

NOTE:

- 1) 'N/A' denotes test is not applicable in this test report
- 2) All tests were performed according to the procedures in ANSI C63.10: 2013.



## 1.1 TEST FACTORY

Shenzhen STS Test Services Co., Ltd.

Add. : 1/F., Building B, Zhuoke Science Park, No.190, Chongqing Road, Fuyong Street, Bao'an District, Shenzhen, Guangdong, China

CNAS Registration No.: L7649

FCC Registration No.: 625569

IC Registration No.: 12108A

A2LA Certificate No.: 4338.01

## 1.2 MEASUREMENT UNCERTAINTY

The reported uncertainty of measurement  $y \pm U$ , where expended uncertainty  $U$  is based on a standard uncertainty multiplied by a coverage factor of  $k=2$ , providing a level of confidence of approximately 95 %.

No.	Item	Uncertainty
1	Conducted Emission (9KHz-150KHz)	$\pm 2.88\text{dB}$
2	Conducted Emission (150KHz-30MHz)	$\pm 2.67\text{dB}$
3	RF power,conducted	$\pm 0.71\text{dB}$
4	Spurious emissions,conducted	$\pm 0.63\text{dB}$
5	All emissions,radiated (9KHz-30MHz)	$\pm 3.02\text{dB}$
6	All emissions,radiated (30MHz-200MHz)	$\pm 3.80\text{dB}$
7	All emissions,radiated (200MHz-1000MHz)	$\pm 3.97\text{dB}$
8	All emissions,radiated(>1G)	$\pm 3.03\text{dB}$



## 2 GENERAL INFORMATION

### 2.1 GENERAL DESCRIPTION OF EUT

Product Name	Baby Unit(2.8"/3.5"/5" Video Baby Monitor With Wi-Fi®; Wi-Fi® Home Video Camera)												
Trade Name	motorola												
Model Name	MBP667CONNECTBU												
Series Model	FOCUS67, FOCUS67-G, FOCUS67-W, MBP67CONNECT, MBP67CONNECT-G, MBP668CONNECTBU, MBP844CONNECTBU, MBP845CONNECTBU												
Model Difference	All models are fully identical except model name.												
Product Description	<p>The EUT is a baby unit of one of the Video Baby Monitor With Wi-Fi® or Wi-Fi® Home Video Camera which supports 2.4GHz FHSS and Wi-Fi 802.11 b/g/n wireless technologies. This report for 2.4GHz FHSS operation only.</p> <table border="1"><tr><td>Operation Frequency:</td><td>2402 - 2477 MHz</td></tr><tr><td>Modulation Type:</td><td>GFSK</td></tr><tr><td>Bit Rate of Transmitter:</td><td>1 Mbps</td></tr><tr><td>Number Of Channel:</td><td>22 channels</td></tr><tr><td>Antenna Designation:</td><td>Please see Note 4</td></tr><tr><td>Antenna Gain (dBi):</td><td>0dBi</td></tr></table>	Operation Frequency:	2402 - 2477 MHz	Modulation Type:	GFSK	Bit Rate of Transmitter:	1 Mbps	Number Of Channel:	22 channels	Antenna Designation:	Please see Note 4	Antenna Gain (dBi):	0dBi
Operation Frequency:	2402 - 2477 MHz												
Modulation Type:	GFSK												
Bit Rate of Transmitter:	1 Mbps												
Number Of Channel:	22 channels												
Antenna Designation:	Please see Note 4												
Antenna Gain (dBi):	0dBi												
Channel List	Please refer to the Note 2.												
Adapter 1#	Model: S005BNU0500100 (Tenpao) Input: AC 100-240V~50/60Hz, 0.15A Output: DC 5.0V@1000mA												
Adapter 2#	Model: BLJ06W050100P1-U (BLJ) Input: AC 100-240V~50/60Hz, 0.2A Output: DC 5.0V@1000mA												
Battery	N/A												
Hardware version	N/A												
Software version	N/A												
RF Power Setting TEST Software (power class)	1												



Note:

- 1 For a more detailed features description, please refer to the manufacturer's specifications or the User's Manual.

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RF Channel and Frequency			
RF Channel	Freq.(MHz)	RF Channel	Freq.(MHz)
01	2402	12	2445
02	2404	13	2450
03	2406	14	2455
04	2408	15	2460
05	2410	16	2465
06	2415	17	2467
07	2420	18	2469
08	2425	19	2471
09	2430	20	2473
10	2435	21	2475
11	2440	22	2477

3

- Note:
- 1) In section 15.31(m), regards to the operating frequency range over 10 MHz, the Lowest frequency, the middle frequency, and the highest frequency of channel were selected to perform the test;
  - 2) Test frequencies are lowest channel: 2402 MHz, middle channel: 2440 MHz and highest channel: 2477 MHz

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Ant	Brand	Model Name	Antenna Type	Connector	Gain (dBi)	NOTE
1	N/A	MBP667CONNE CTBU	Integral Antenna	N/A	0	2.4G Antenna



## 2.2 DESCRIPTION OF TEST MODES

Each of these EUT operation mode(s) or test configuration mode(s) mentioned above was evaluated respectively.

Worst Mode	Description	Data Rate
Mode 1	TX GFSK CH01	/
Mode 2	TX GFSK CH11	/
Mode 3	TX GFSK CH22	/
Mode 4	Transmitting mode	/

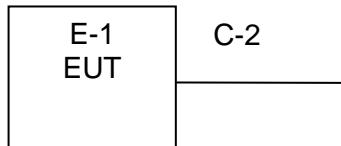
Note:

- 1) The measurements are performed at all Bit Rate of Transmitter, the worst data was reported
- 2) We have been tested for all available U.S. voltage and frequencies (For 120V, 50/60Hz and 240V, 50/60Hz) for which the device is capable of operation, and the worst case of 120V/60Hz is shown in the report
- 3) Controlled using a bespoke application on the laptop PC supplied by the customer. The application was used to enable a continuous transmission mode and to select the test channels, data rates and modulation schemes as required.

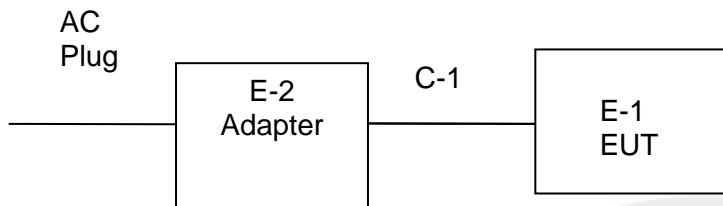


## 2.3 BLOCK DIGRAM SHOWING THE CONFIGURATION OF SYSTEM TESTED

Radiation Test Set



Conduction Test Set



## 2.4 DESCRIPTION OF NECESSARY ACCESSORIES AND SUPPORT UNITS

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

Item	Equipment	Mfr/Brand	Model/Type No.	Serial No.	Note
E-2	Adapter	Tenpao	S005BNU0500100	N/A	Accessories Equipment
E-2	Adapter	BLJ	BLJ06W050100P1-U	N/A	
E-3	Personal computer	HP	500-320cx	4CV428DQYN	Auxiliary Equipment

Item	Shielded Type	Ferrite Core	Length	Note
C-1	Adapter DC Cable	NO	200cm	N/A

Note:

- 1) The support equipment was authorized by Declaration of Confirmation.
- 2) For detachable type I/O cable should be specified the length in cm in 『Length』 column.
- 3) "YES" is means "shielded" "with core"; "NO" is means "unshielded" "without core".



## 2.5 EQUIPMENTS LIST

### Radiation Test Equipment

Kind of Equipment	Manufacturer	Type No.	Serial No.	Last Calibration	Calibrated Until
Test Receiver	R&S	ESCI	101427	2018.10.13	2019.10.12
Bilog Antenna	TESEQ	CBL6111D	34678	2019.10.31	2020.11.01
Horn Antenna	Schwarzbeck	BBHA 9120D(1201)	9120D-1343	2018.10.11	2019.10.12
SHF-EHF Horn Antenna (18G-40GHz)	A-INFO	LB-180400-KF	N/A	2018.03.11	2021.03.10
Temperature & Humidity	HH660	Mieo	N/A	2018.10.09	2019.10.10
Temperature & Humidity	HH660	Mieo	N/A	2018.10.09	2019.10.10
Pre-mplifier (0.1M-3GHz)	EM	EM330	N/A	2018.03.09	2019.03.08
PreAmplifier (1G-18GHz)	SKET	LNPA-01018G-45	SK201808090 1	2018.10.13	2019.10.12
Passive Loop (9K--30MHz)	ZHINAN	ZN30900C	16035	2017.03.11	2020.03.10
Low frequency cable	EM	R01	N/A	2018.10.13	2019.10.12
Low frequency cable	EM	R06	N/A	2018.10.13	2019.10.12
High frequency cable	SCHWARZBECK	R04	N/A	2018.10.13	2019.10.12
High frequency cable	SCHWARZBECK	R02	N/A	2018.10.13	2019.10.12
Semi-anechoic chamber	Changling	966	N/A	2018.10.24	2020.10.23
trun table	EM	SC100_1	60531	N/A	N/A
Antnna mast	EM	SC100	N/A	N/A	N/A
Max-full Antenna Corp	MF	MFA-440H	N/A	N/A	N/A

### Conduction Test Equipment

Kind of Equipment	Manufacturer	Type No.	Serial No.	Last Calibration	Calibrated Until
Test Receiver	R&S	ESCI	101427	2018.10.13	2019.10.12
LISN	R&S	ENV216	101242	2018.10.13	2019.10.12
conduction Cable	EM	C01	N/A	2018.10.13	2019.10.12
Temperature & Humidity	Mieo	HH660	N/A	2018.10.09	2019.10.10



## RF Connected Test

Kind of Equipment	Manufacturer	Type No.	Serial No.	Last Calibration	Calibrated Until
USB RF power sensor	DARE	RPR3006W	15I00041SNO03	2018.10.13	2019.10.12
Spectrum Analyzer	Agilent	N9020A	MY51110105	2018.03.08	2019.03.07
Spectrum Analyzer	Agilent	N9020A	MY49100060	2018.10.13	2019.10.12

## Note:

The temporary antenna connector is soldered on the PCB board in order to perform conducted tests and this temporary antenna connector is listed in the equipment list.





### 3 EMC EMISSION TEST

#### 3.1 CONDUCTED EMISSION MEASUREMENT

##### 3.1.1 POWER LINE CONDUCTED EMISSION LIMITS

operating frequency band. In case the emission fall within the restricted band specified on Part 15. 207(a), 107(a), RSS-Gen Table3 limit in the table below has to be followed.  
This item was performed according to the procedures in ANSI C63.10: 2013.

FREQUENCY (MHz)	Conducted Emission limit (dBuV)	
	Quasi-peak	Average
0.15 -0.5	66 - 56 *	56 - 46 *
0.50 -5.0	56.00	46.00
5.0 -30.0	60.00	50.00

Note:

- 1) The tighter limit applies at the band edges.
- 2) The limit of " \* " marked band means the limitation decreases linearly with the logarithm of the frequency in the range.

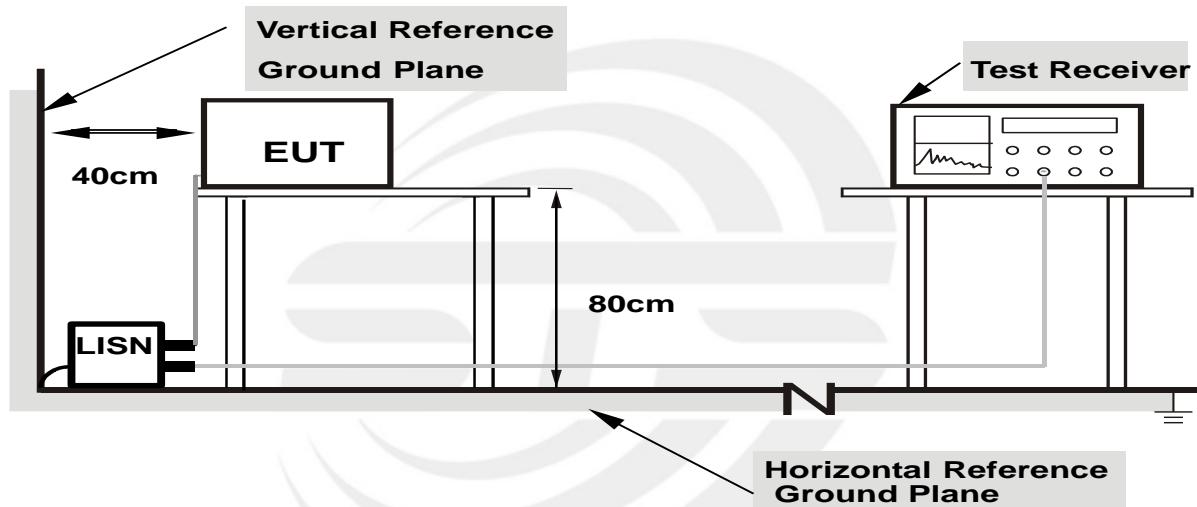
The following table is the setting of the receiver

Receiver Parameters	Setting
Attenuation	10 dB
Start Frequency	0.15 MHz
Stop Frequency	30 MHz
IF Bandwidth	9 kHz

### 3.1.2 TEST PROCEDURE

- a. The EUT was 0.8 meters from the horizontal ground plane and 0.4 meters from the vertical ground plane with EUT being connected to the power mains through a line impedance stabilization network (LISN). All other support equipments powered from additional LISN(s). The LISN provide 50 Ohm/ 50uH of coupling impedance for the measuring instrument.
- b. Interconnecting cables that hang closer than 40 cm to the ground plane shall be folded back and forth in the center forming a bundle 30 to 40 cm long.
- c. I/O cables that are not connected to a peripheral shall be bundled in the center. The end of the cable may be terminated, if required, using the correct terminating impedance. The overall length shall not exceed 1 m.
- d. LISN at least 80 cm from nearest part of EUT chassis.
- e. For the actual test configuration, please refer to the related Item –EUT Test Photos.

### 3.1.3 TEST SETUP



**Note:** 1. Support units were connected to second LISN.  
2. Both of LISNs (AMN) are 80 cm from EUT and at least 80 cm from other units and other metal planes

### 3.1.4 EUT OPERATING CONDITIONS

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.



## 3.1.5 TEST RESULT

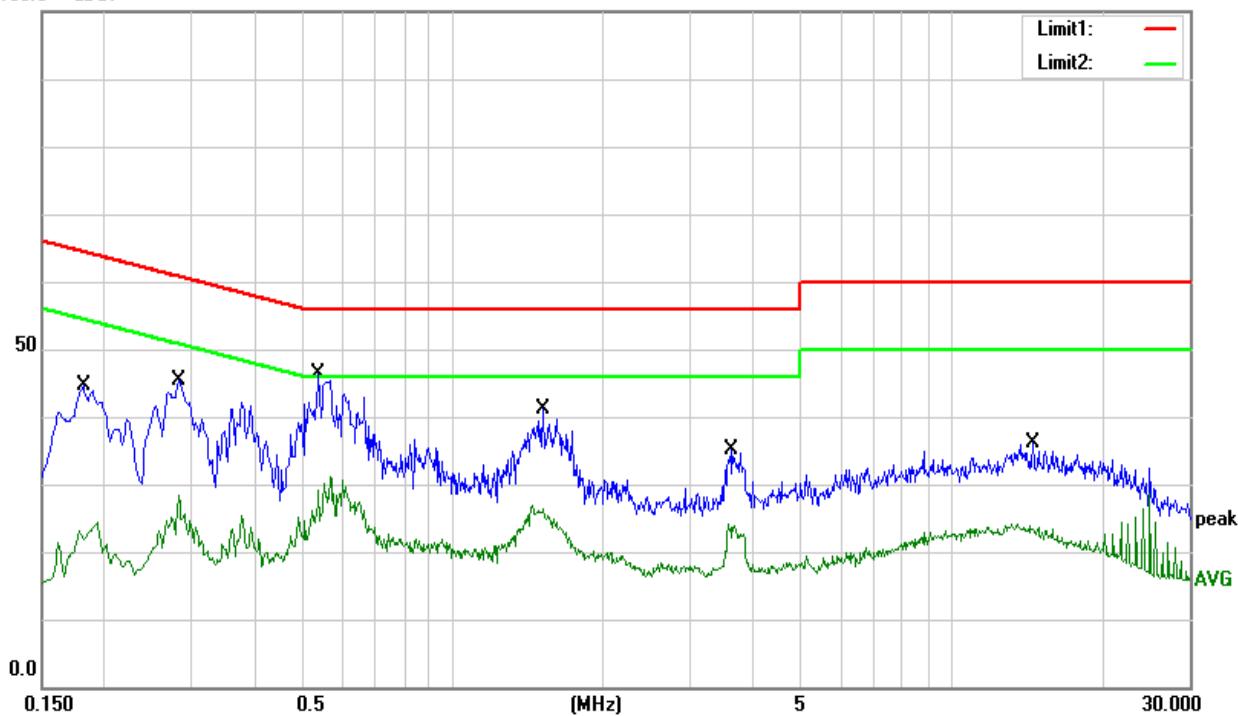
Temperature:	24.2 °C	Relative Humidity:	56%
Test Voltage:	AC 120V/60Hz	Phase:	L
Test Mode:	Mode 4		
Note:	Tenpao		

Frequency (MHz)	Reading (dBuV)	Correct Factor(dB)	Result (dBuV)	Limit (dBuV)	Margin (dB)	Remark
0.1820	24.23	20.28	44.51	64.39	-19.88	QP
0.1820	4.10	20.28	24.38	54.39	-30.01	AVG
0.2820	24.58	20.68	45.26	60.76	-15.50	QP
0.2820	7.70	20.68	28.38	50.76	-22.38	AVG
0.5380	25.96	20.40	46.36	56.00	-9.64	QP
0.5380	10.61	20.40	31.01	46.00	-14.99	AVG
1.5180	20.90	20.16	41.06	56.00	-14.94	QP
1.5180	6.80	20.16	26.96	46.00	-19.04	AVG
3.6100	14.99	20.07	35.06	56.00	-20.94	QP
3.6100	4.13	20.07	24.20	46.00	-21.80	AVG
14.5340	16.43	19.81	36.24	60.00	-23.76	QP
14.5340	8.73	19.81	28.54	50.00	-21.46	AVG

## Remark:

1. All readings are Quasi-Peak and Average values.
2. Margin = Result (Result =Reading + Factor )–Limit

100.0 dBuV



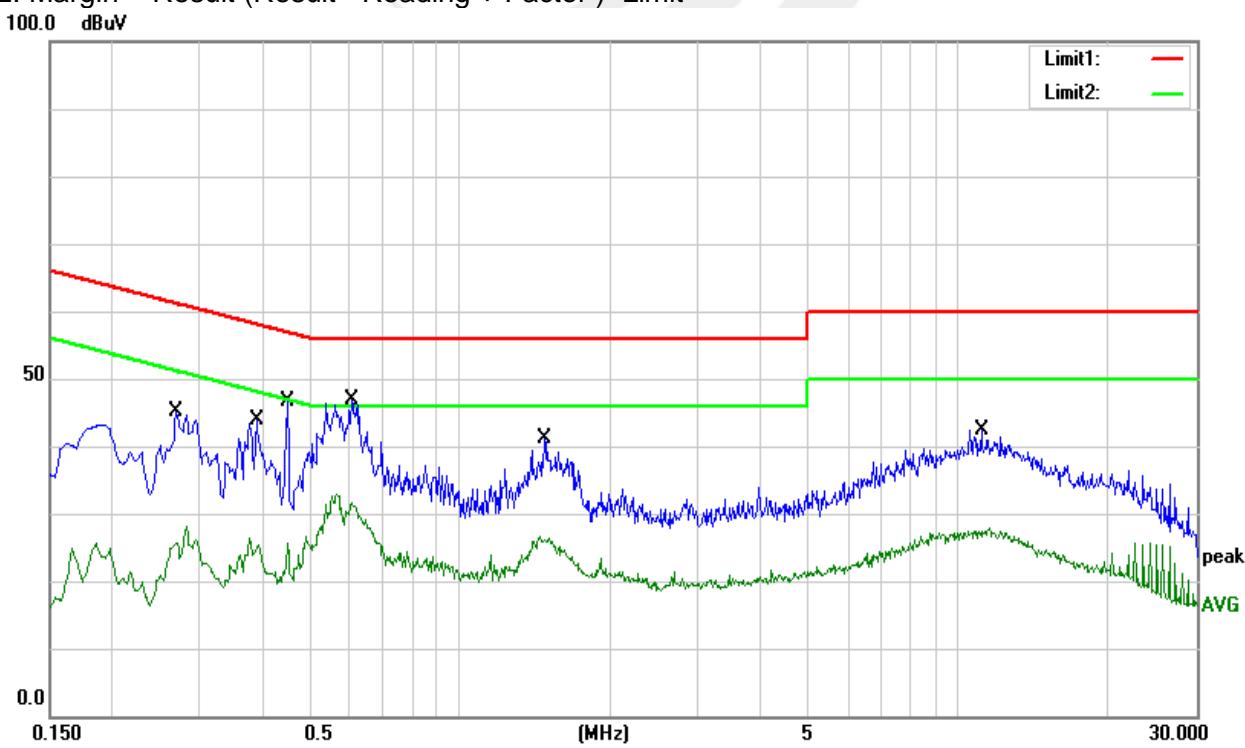


Temperature:	24.2 °C	Relative Humidity:	56%
Test Voltage:	AC 120V/60Hz	Phase:	N
Test Mode:	Mode 4		
Note:	Tenpao		

Frequency (MHz)	Reading (dBuV)	Correct Factor(dB)	Result (dBuV)	Limit (dBuV)	Margin (dB)	Remark
0.2700	24.53	20.63	45.16	61.12	-15.96	QP
0.2700	7.48	20.63	28.11	51.12	-23.01	AVG
0.3900	23.40	20.55	43.95	58.06	-14.11	QP
0.3900	5.83	20.55	26.38	48.06	-21.68	AVG
0.4500	26.18	20.48	46.66	56.88	-10.22	QP
0.4500	12.27	20.48	32.75	46.88	-14.13	AVG
0.6060	26.54	20.35	46.89	56.00	-9.11	QP
0.6060	11.23	20.35	31.58	46.00	-14.42	AVG
1.4780	20.99	20.15	41.14	56.00	-14.86	QP
1.4780	6.56	20.15	26.71	46.00	-19.29	AVG
11.1060	22.63	19.84	42.47	60.00	-17.53	QP
11.1060	8.05	19.84	27.89	50.00	-22.11	AVG

**Remark:**

1. All readings are Quasi-Peak and Average values.
2. Margin = Result (Result =Reading + Factor )–Limit





## 3.2 RADIATED SPURIOUS EMISSION MEASUREMENT

### 3.2.1 RADIATED EMISSION LIMITS

in any 100 kHz bandwidth outside the operating frequency band. In case the emission fall within the Restricted band specified on Part15.205(a)&209(a) and RSS-247 Issue 2 limit in the table and according to ANSI C63.10-2013 below has to be followed.

LIMITS OF RADIATED EMISSION MEASUREMENT (0.009MHz - 1000MHz)

Frequencies (MHz)	Field Strength (micorvolts/meter)	Measurement Distance (meters)
0.009~0.490	2400/F(KHz)	300
0.490~1.705	24000/F(KHz)	30
1.705~30.0	30	30
30~88	100	3
88~216	150	3
216~960	200	3
Above 960	500	3

LIMITS OF RADIATED EMISSION MEASUREMENT (1000MHz-25GHz)

FREQUENCY (MHz)	(dBuV/m) (at 3M)	
	PEAK	AVERAGE
Above 1000	74	54

Notes:

- (1) The limit for radiated test was performed according to FCC PART 15C.
- (2) The tighter limit applies at the band edges.
- (3) Emission level (dBuV/m)=20log Emission level (uV/m).

For Radiated Emission

Spectrum Parameter	Setting
Attenuation	Auto
Detector	Peak/AV
Start Frequency	1000 MHz(Peak/AV)
Stop Frequency	10th carrier hamonic(Peak/AV)
RB / VB (emission in restricted)	1 MHz /3MHz

For Band edge

Spectrum Parameter	Setting
Detector	Peak/AV
Start/Stop Frequency	Lower Band Edge: 2300 to 2422 MHz Upper Band Edge: 2452 to 2500 MHz
RB / VB (emission in restricted band)	1 MHz /3MHz



Receiver Parameter	Setting
Start ~ Stop Frequency	9kHz~90kHz / RB 200Hz for PK & AV
Start ~ Stop Frequency	90kHz~110kHz / RB 200Hz for QP
Start ~ Stop Frequency	110kHz~490kHz / RB 200Hz for PK & AV
Start ~ Stop Frequency	490kHz~30MHz / RB 9kHz for QP
Start ~ Stop Frequency	30MHz~1000MHz / RB 120kHz for QP

### 3.2.2 TEST PROCEDURE

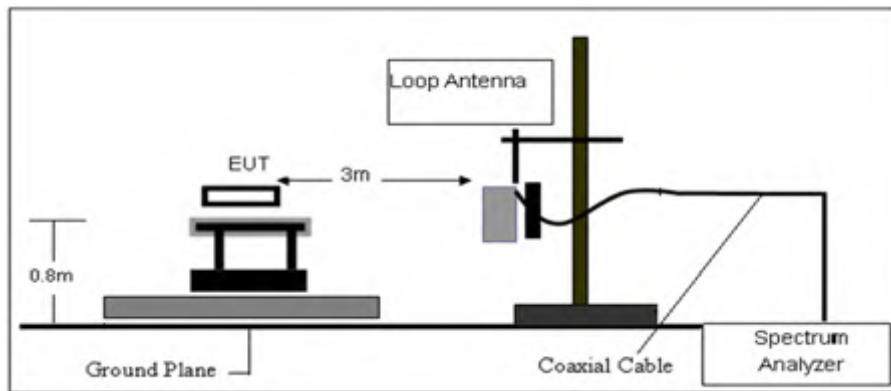
- a) The measuring distance of at 3 m shall be used for measurements at frequency 0.009MHz up to 1GHz. For frequencies above 1GHz, any suitable measuring distance may be used.
- b) The EUT was placed on the top of a rotating table 0.8 meters(above 1GHz is 1.5 m) above the ground at a 3 meter anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
- c) The height of the equipment shall be 0.8 m(above 1GHz is 1.5 m); the height of the test antenna shall vary between 1 m to 4 m. Horizontal and vertical polarizations of the antenna are set to make the measurement
- d) The initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured.
- e) If the Peak Mode measured value compliance with and lower than Quasi Peak Mode Limit, the EUT shall be deemed to meet QP Limits and then no additional QP Mode measurement performed.
- f) For the actual test configuration, please refer to the related Item –EUT Test Photos.

Note:

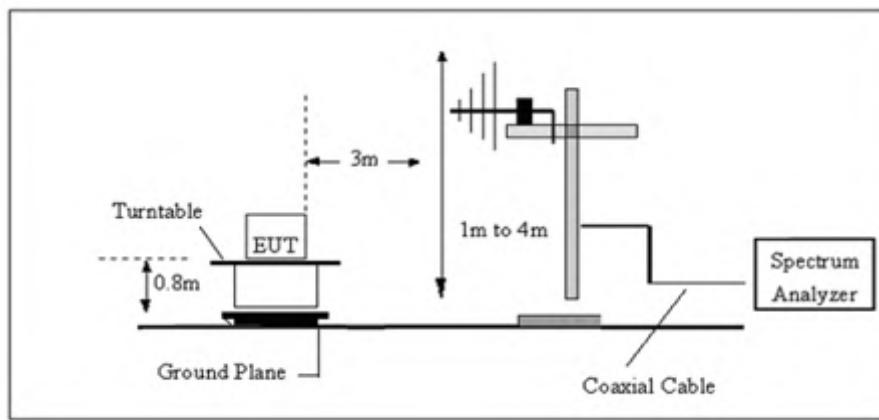
*Both horizontal and vertical antenna polarities were tested and performed test to three orthogonal axis. The worst case emissions were reported*

### 3.2.3 TEST SETUP

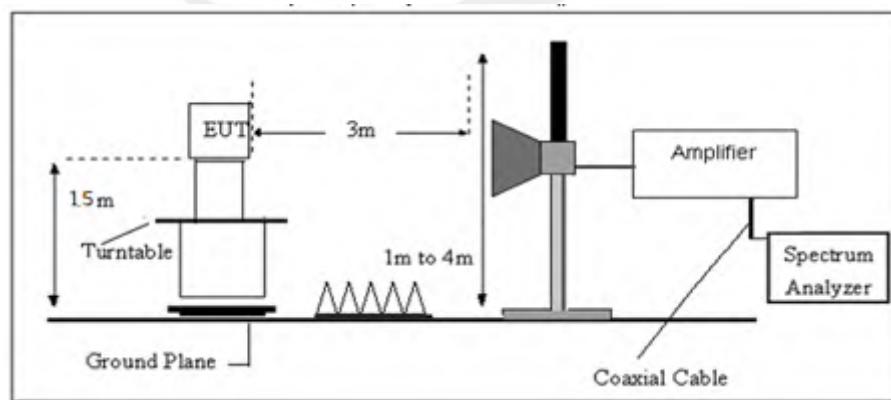
#### a) Radiated Emission Test-Up Frequency Below 30MHz



#### b) Radiated Emission Test-Up Frequency 30MHz~1GHz



#### c) Radiated Emission Test-Up Frequency Above 1GHz



### 3.2.4 EUT OPERATING CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



### 3.2.5 FIELD STRENGTH CALCULATION

The field strength is calculated by adding the Antenna Factor and Cable Factor and subtracting the Amplifier Gain and Duty Cycle Correction Factor (if any) from the measured reading. The basic equation with a sample calculation is as follows:

$$FS = RA + AF + CL - AG$$

Where

FS = Field Strength

CL = Cable Attenuation Factor (Cable Loss)

RA = Reading Amplitude

AG = Amplifier Gain

AF = Antenna Factor

For example

Frequency (MHz)	FS (dB $\mu$ V/m)	RA (dB $\mu$ V/m)	AF (dB)	CL (dB)	AG (dB)	Factor (dB)
300	40	58.1	12.2	1.6	31.9	-18.1

$$\text{Factor} = AF + CL - AG$$

### 3.2.6 TEST RESULT

9KHz-30MHz

Temperature:	20.5 °C	Relative Humidity:	49%
Test Voltage:	AC 120V/60Hz	Polarization:	--
Test Mode:	TX Mode		

Freq. (MHz)	Reading (dB $\mu$ V/m)	Limit (dB $\mu$ V/m)	Margin (dB)	State	Test Result
					P/F
--	--	--	--	--	PASS
--	--	--	--	--	PASS

Note:

The amplitude of spurious emissions which are attenuated by more than 20dB below the permissible value has no need to be reported.

Distance extrapolation factor =  $40 \log(\text{specific distance}/\text{test distance})$  (dB);  
Limit line = specific limits(dBuv) + distance extrapolation factor.



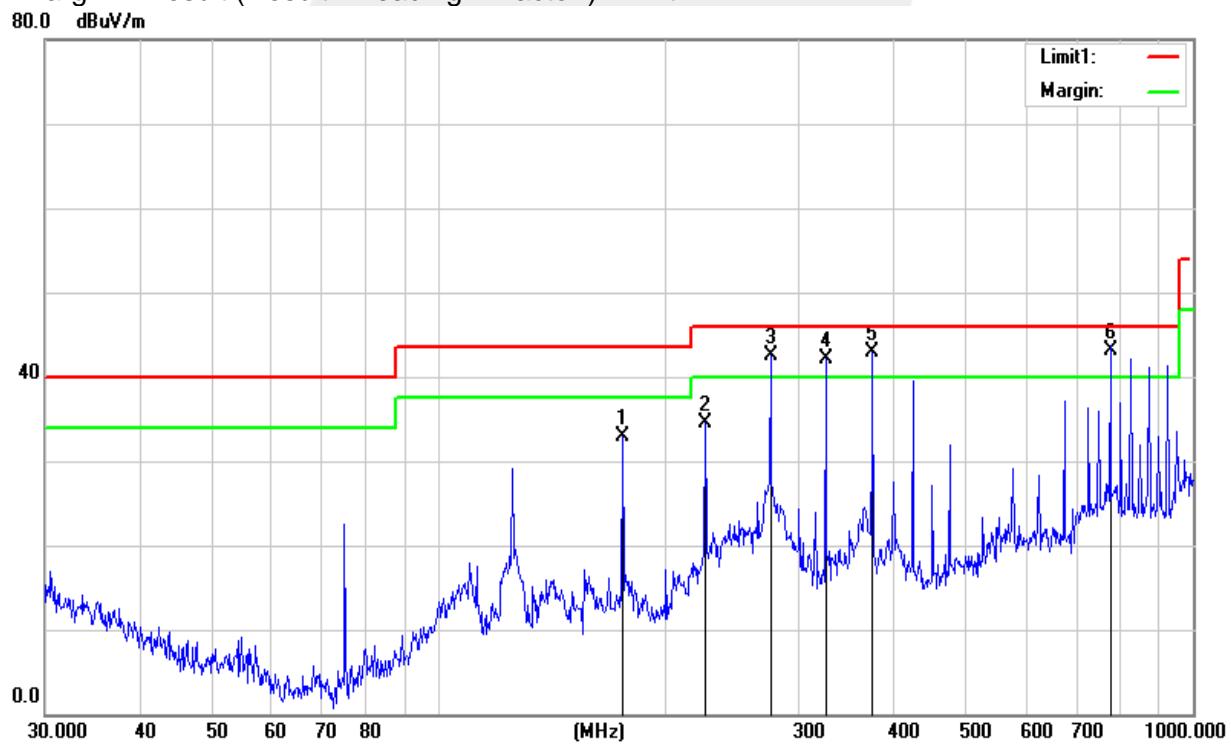
(30MHz - 1000MHz)

Temperature:	20.5 °C	Relative Humidity:	49%
Test Voltage:	AC 120V/60Hz	Polarization:	Horizontal
Test Mode:	Mode 1/2/3 (Mode 1 worst mode)		
Note:	Tenpao		

Frequency (MHz)	Reading (dBuV)	Correct Factor(dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
175.0363	52.21	-19.38	32.83	43.50	-10.67	QP
225.3080	53.25	-18.77	34.48	46.00	-11.52	QP
275.1570	58.09	-15.65	42.44	46.00	-3.56	QP
325.5957	56.13	-14.12	42.01	46.00	-3.99	QP
375.9384	55.73	-12.73	43.00	46.00	-3.00	QP
776.8777	46.30	-3.18	43.12	46.00	-2.88	QP

## Remark:

1. Margin = Result (Result =Reading + Factor )–Limit



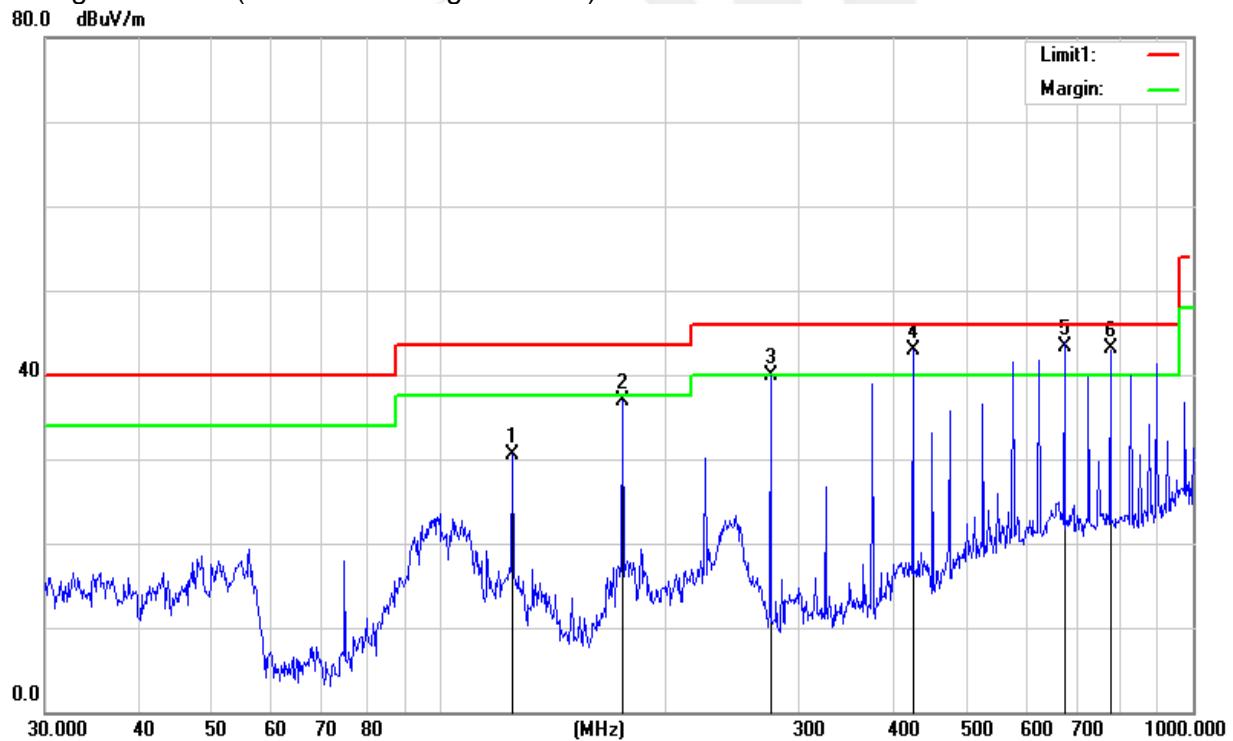


Temperature:	20.5 °C	Relative Humidity:	49%
Test Voltage:	AC 120V/60Hz	Polarization:	Vertical
Test Mode:	Mode 1/2/3 (Mode 1 worst mode)		
Note:	Tenpao		

Frequency (MHz)	Reading (dBuV)	Correct Factor(dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
125.0066	48.18	-17.61	30.57	43.50	-12.93	QP
175.0367	56.23	-19.38	36.85	43.50	-6.65	QP
275.1570	55.60	-15.65	39.95	46.00	-6.05	QP
425.0280	53.83	-10.90	42.93	46.00	-3.07	QP
675.2080	49.19	-5.87	43.32	46.00	-2.68	QP
776.8777	46.30	-3.18	43.12	46.00	-2.88	QP

Remark:.

1. Margin = Result (Result =Reading + Factor )–Limit





## (1000MHz-25GHz) Restricted band and Spurious emission Requirements



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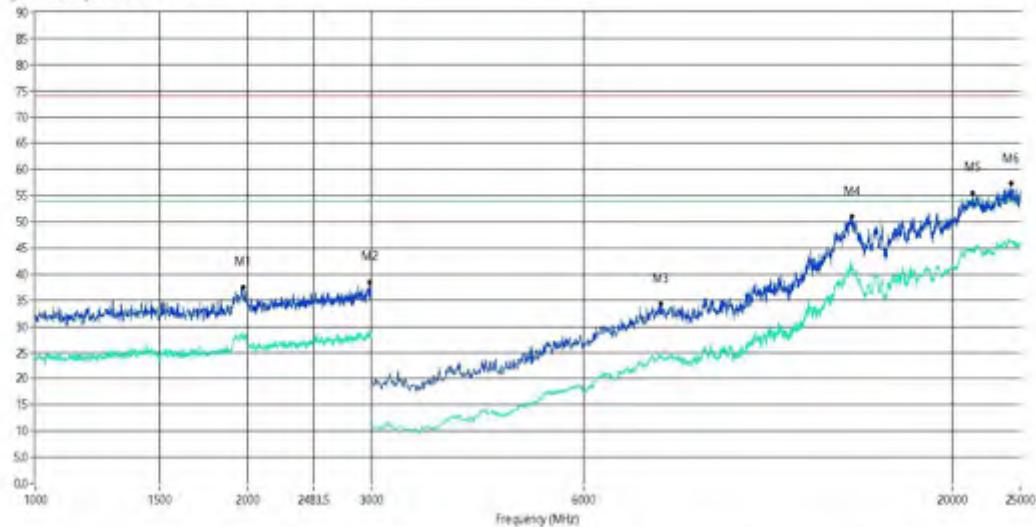
## Test result

Project Number: STS1811226

Test Time: 2018-12-06\_19.03.30

EUT Name:	3.5" Video Baby Monitor With Wi-Fi®	Test Engineer:	Barry
Mode:	2.4G-2402	Test Standard:	FCC 15C
Model:	MBP667CONNECTBU	Work Addition:	Normal
Temp.(oC):	24	Load:	
Hum.:	61%	Remark:	
		Manufacturer:	

RSE\_FCC Test Case\_FCC 15C 10Hz-25GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1970.000	26.59	-0.54	54.0	-25.41	AV	10.00	100	H	Pass
1	1970.000	37.50	-0.54	74.0	-36.50	Peak	10.00	100	H	Pass
2**	2980.000	28.25	1.98	54.0	-25.75	AV	15.00	100	H	Pass
2	2980.000	38.50	1.98	74.0	-35.50	Peak	15.00	100	H	Pass
3**	7710.000	24.51	10.52	54.0	-29.49	AV	15.00	100	H	Pass
3	7710.000	34.29	10.52	74.0	-39.71	Peak	15.00	100	H	Pass
4**	14428.000	41.67	25.10	54.0	-12.33	AV	9.00	100	H	Pass
4	14428.000	50.77	25.10	74.0	-23.23	Peak	9.00	100	H	Pass
5**	21412.000	44.66	24.03	54.0	-9.34	AV	7.00	100	H	Pass
5	21412.000	55.38	24.03	74.0	-18.62	Peak	7.00	100	H	Pass
6**	24231.999	46.49	23.23	54.0	-7.51	AV	4.00	100	H	Pass
6	24231.999	57.27	23.23	74.0	-16.73	Peak	4.00	100	H	Pass



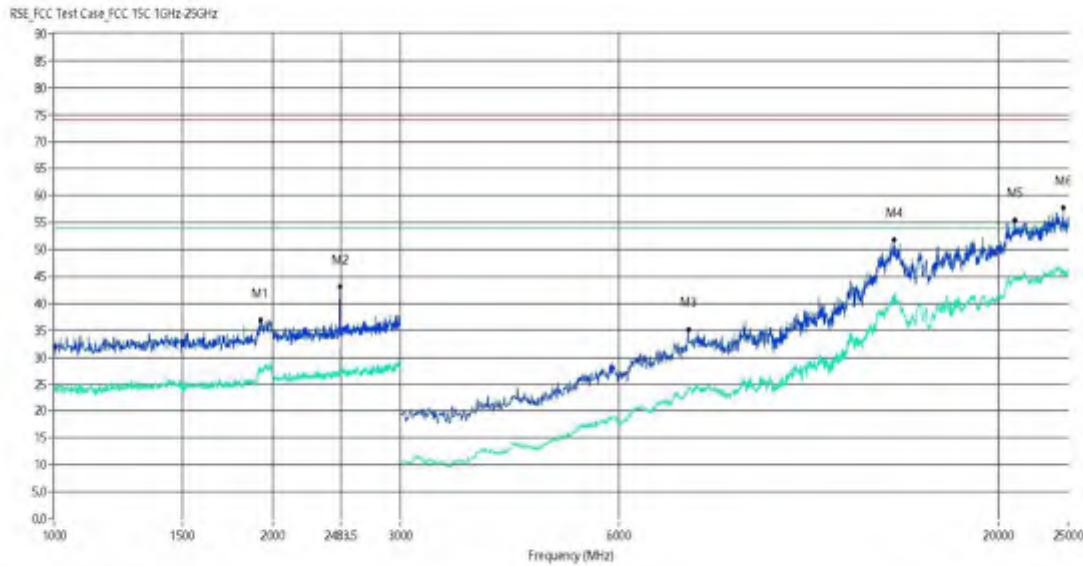
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Zhuoke Science Park, Chongqing Road, Fuyong, Bao'an District, Shenzhen, China  
Tel: +(86)-0755-36886288 FAX: +(86)-0755-36886277 <http://www.stsapp.com>

## Test result

Project Number: STS1811226

Test Time: 2018-12-06\_19.07.22

EUT Name: 3.5" Video Baby Monitor With Test Engineer: Barry  
Wi-Fi®  
Mode: 2.4G-2402 Test Standard: FCC 15C  
Model: MBP667CONNECTBU Work Addition: Normal  
Temp.(oC): 24 Load:  
Hum.: 61% Remark:  
Manufacturer:



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1924.000	27.98	-1.06	54.0	-26.02	AV	7.00	100	V	Pass
1	1924.000	36.89	-1.06	74.0	-37.11	Peak	7.00	100	V	Pass
2**	2474.000	27.49	-0.84	54.0	-26.51	AV	12.00	100	V	Pass
2	2474.000	43.09	-0.84	74.0	-30.91	Peak	12.00	100	V	Pass
3**	7480.000	24.47	10.48	54.0	-29.53	AV	2.00	100	V	Pass
3	7480.000	35.19	10.48	74.0	-38.81	Peak	2.00	100	V	Pass
4**	14368.000	41.51	24.92	54.0	-12.49	AV	13.00	100	V	Pass
4	14368.000	51.77	24.92	74.0	-22.23	Peak	13.00	100	V	Pass
5**	21076.001	44.51	24.12	54.0	-9.49	AV	11.00	100	V	Pass
5	21076.001	55.49	24.12	74.0	-18.51	Peak	11.00	100	V	Pass
6**	24591.999	45.73	23.11	54.0	-8.27	AV	12.00	100	V	Pass
6	24591.999	57.77	23.11	74.0	-16.23	Peak	12.00	100	V	Pass



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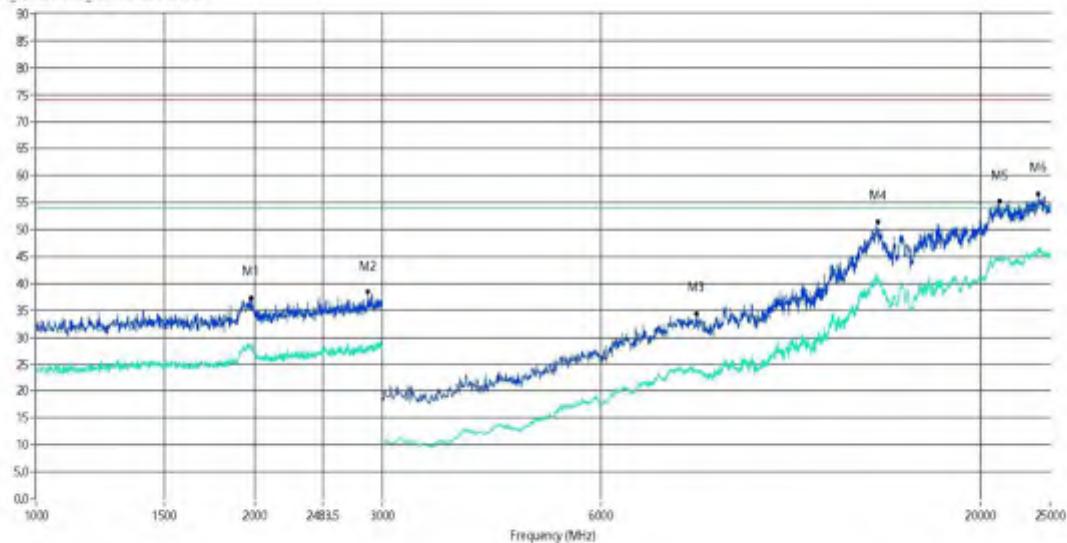
## Test result

Project Number: STS1811226

Test Time: 2018-12-07\_23.47.09

EUT Name: 3.5" Video Baby Monitor With Test Engineer: Barry  
Wi-Fi®  
Mode: 2.4G-2440 Test Standard: FCC 15C  
Model: MBP667CONNECTBU Work Addition: Normal  
Temp.(oC): 24 Load:  
Hum.: 61% Remark:  
Manufacturer:

RSE\_FCC Test Case FCC 15C 1GHz-25GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1980.000	27.61	-0.46	54.0	-26.39	AV	6.00	100	H	Pass
1	1980.000	37.29	-0.46	74.0	-36.71	Peak	6.00	100	H	Pass
2**	2866.000	28.13	1.49	54.0	-25.87	AV	14.00	100	H	Pass
2	2866.000	38.34	1.49	74.0	-35.66	Peak	14.00	100	H	Pass
3**	8120.000	23.84	10.50	54.0	-30.16	AV	2.00	100	H	Pass
3	8120.000	34.46	10.50	74.0	-39.54	Peak	2.00	100	H	Pass
4**	14439.999	40.41	24.10	54.0	-13.59	AV	13.00	100	H	Pass
4	14439.999	51.42	24.10	74.0	-22.58	Peak	13.00	100	H	Pass
5**	21255.999	44.13	24.07	54.0	-9.87	AV	11.00	100	H	Pass
5	21255.999	55.14	24.07	74.0	-18.86	Peak	11.00	100	H	Pass
6**	24039.999	46.45	23.29	54.0	-7.55	AV	12.00	100	H	Pass
6	24039.999	56.62	23.29	74.0	-17.38	Peak	12.00	100	H	Pass



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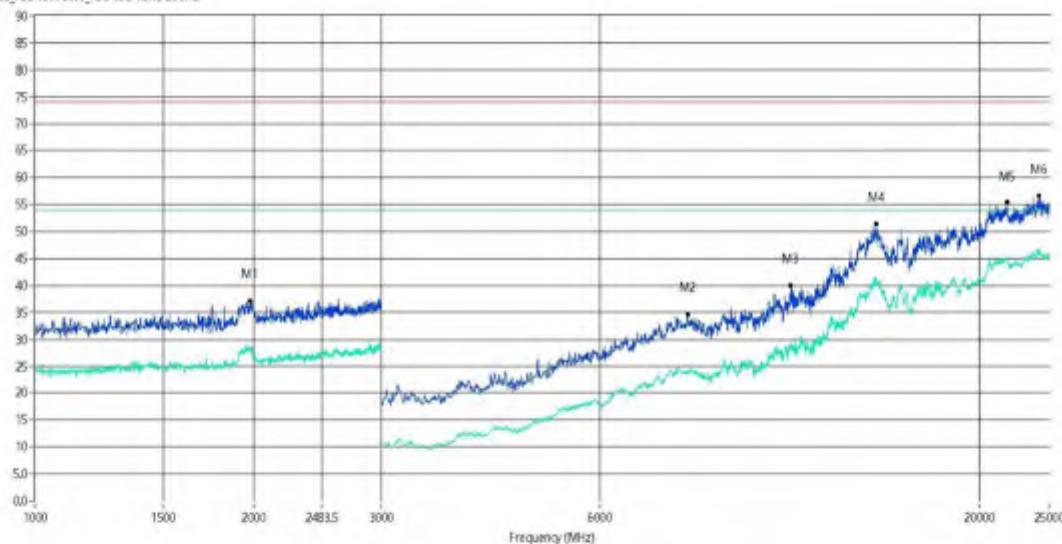
## Test result

Project Number: STS1811226

Test Time: 2018-12-07\_23.43.20

EUT Name: 3.5" Video Baby Monitor With Test Engineer: Barry  
Wi-Fi®  
Mode: 2.4G-2440 Test Standard: FCC 15C  
Model: MBP867CONNECTBU Work Addition: Normal  
Temp.(oC): 24 Load:  
Hum.: 61% Remark:  
Manufacturer:

RSE\_FCC Test Case\_FCC 15C 1GHz-25GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1980.000	27.98	-0.46	54.0	-26.02	AV	2.00	100	V	Pass
1	1980.000	37.04	-0.46	74.0	-36.96	Peak	2.00	100	V	Pass
2**	7930.000	24.07	10.03	54.0	-29.93	AV	6.00	100	V	Pass
2	7930.000	34.54	10.03	74.0	-39.46	Peak	6.00	100	V	Pass
3**	10980.000	29.30	15.71	54.0	-24.70	AV	13.00	100	V	Pass
3	10980.000	39.95	15.71	74.0	-34.05	Peak	13.00	100	V	Pass
4**	14416.000	41.58	25.52	54.0	-12.42	AV	1.00	100	V	Pass
4	14416.000	51.32	25.52	74.0	-22.68	Peak	1.00	100	V	Pass
5**	21856.000	44.86	23.92	54.0	-9.14	AV	11.00	100	V	Pass
5	21856.000	55.34	23.92	74.0	-18.66	Peak	11.00	100	V	Pass
6**	24184.001	45.61	23.25	54.0	-8.39	AV	15.00	100	V	Pass
6	24184.001	56.54	23.25	74.0	-17.46	Peak	15.00	100	V	Pass



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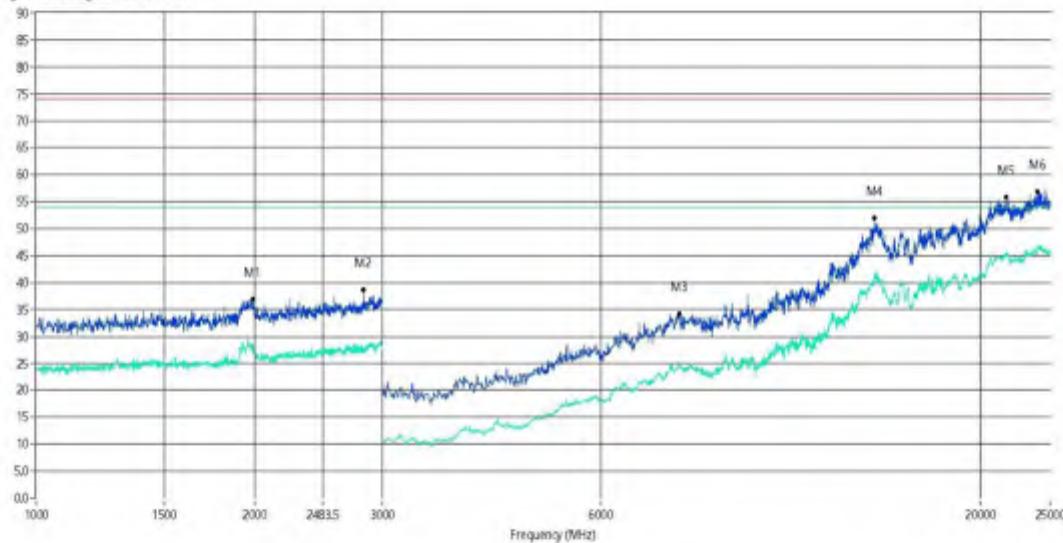
## Test result

Project Number: STS1811226

Test Time: 2018-12-06\_19.11.29

EUT Name: 3.5" Video Baby Monitor With Test Engineer: Barry  
Wi-Fi®  
Mode: 2.4G-2477 Test Standard: FCC 15C  
Model: MBP667CONNECTBU Work Addition: Normal  
Temp.(oC): 24 Load:  
Hum.: 61% Remark:  
Manufacturer:

RSE\_FCC Test Case\_FCC 15C 1GHz-25GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1990.000	28.31	-0.40	54.0	-25.69	AV	1.00	100	H	Pass
1	1990.000	36.90	-0.40	74.0	-37.10	Peak	1.00	100	H	Pass
2**	2826.000	27.15	0.98	54.0	-26.85	AV	12.00	100	H	Pass
2	2826.000	38.65	0.98	74.0	-35.35	Peak	12.00	100	H	Pass
3**	7700.000	24.80	10.88	54.0	-29.20	AV	2.00	100	H	Pass
3	7700.000	34.20	10.88	74.0	-39.80	Peak	2.00	100	H	Pass
4**	14284.000	40.78	24.46	54.0	-13.22	AV	13.00	100	H	Pass
4	14284.000	51.90	24.46	74.0	-22.10	Peak	13.00	100	H	Pass
5**	21724.000	44.99	23.95	54.0	-9.01	AV	7.00	100	H	Pass
5	21724.000	55.82	23.95	74.0	-18.18	Peak	7.00	100	H	Pass
6**	23992.001	46.59	23.31	54.0	-7.41	AV	12.00	100	H	Pass
6	23992.001	56.72	23.31	74.0	-17.28	Peak	12.00	100	H	Pass



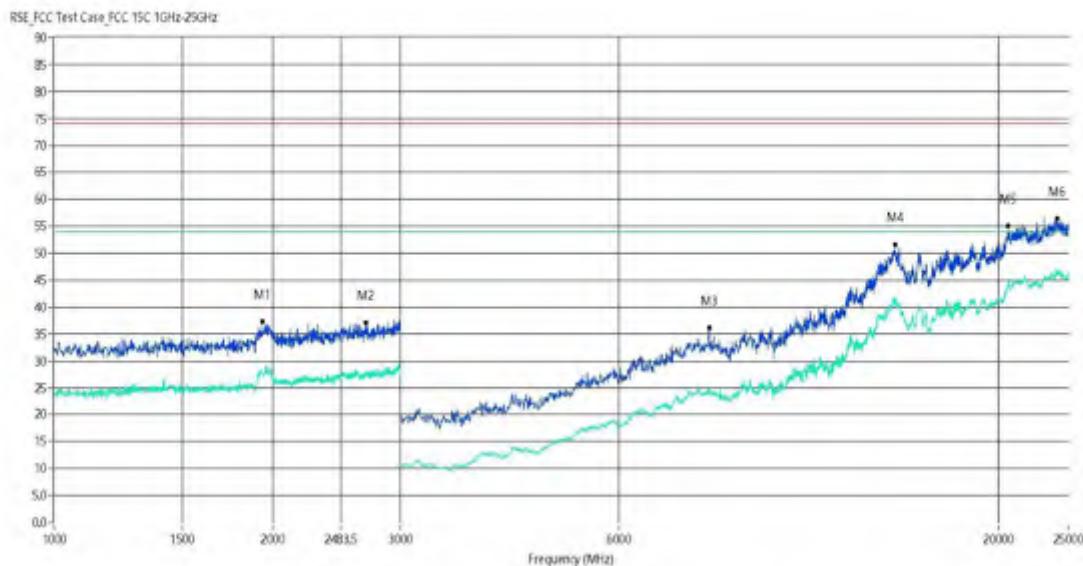
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## Test result

Project Number: STS1811226

Test Time: 2018-12-06\_19.19.32

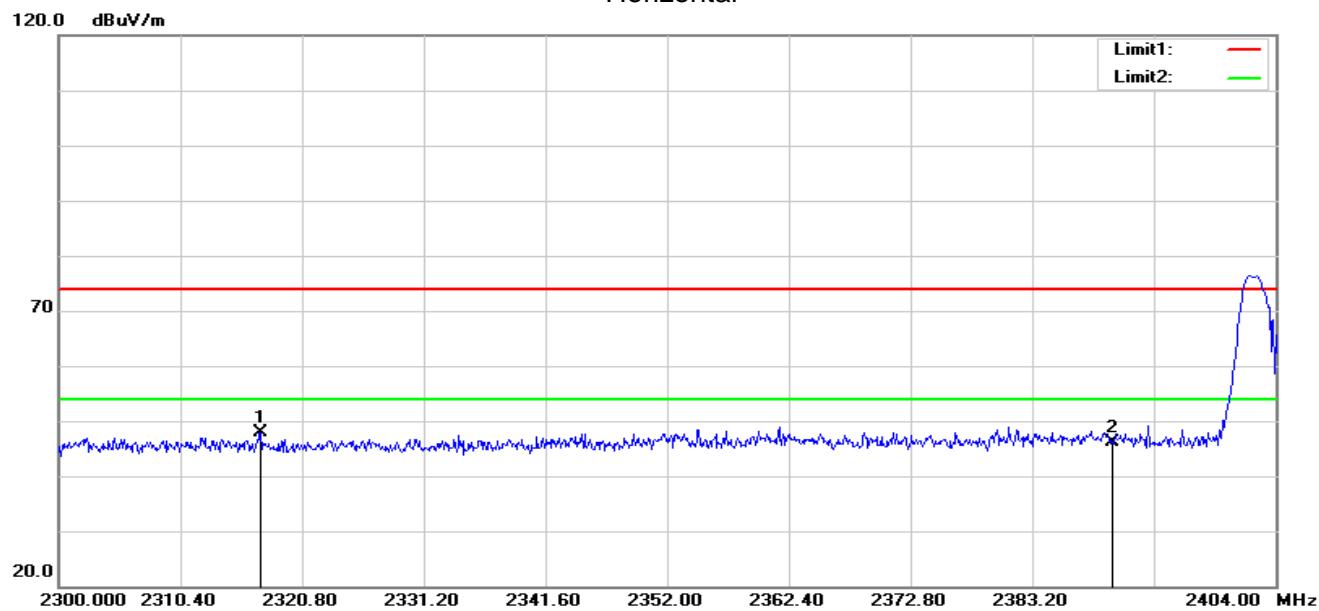
EUT Name: 3.5" Video Baby Monitor With Test Engineer: Barry  
Wi-Fi®  
Mode: 2.4G-2477 Test Standard: FCC 15C  
Model: MBP667CONNECTBU Work Addition: Normal  
Temp.(oC): 24 Load:  
Hum.: 61% Remark:  
Manufacturer:



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Over Limit (dB)	Detector	Table (o)	Height (cm)	ANT	Verdict
1**	1936.000	27.76	-0.89	54.0	-26.24	AV	2.00	100	V	Pass
1	1936.000	37.25	-0.89	74.0	-36.75	Peak	2.00	100	V	Pass
2**	2686.000	27.91	0.40	54.0	-26.09	AV	14.00	100	V	Pass
2	2686.000	37.12	0.40	74.0	-36.88	Peak	14.00	100	V	Pass
3**	7990.000	24.69	10.65	54.0	-29.31	AV	6.00	100	V	Pass
3	7990.000	36.15	10.65	74.0	-37.85	Peak	6.00	100	V	Pass
4**	14416.000	41.81	25.52	54.0	-12.19	AV	9.00	100	V	Pass
4	14416.000	51.65	25.52	74.0	-22.35	Peak	9.00	100	V	Pass
5**	20644.000	44.49	23.84	54.0	-9.51	AV	3.00	100	V	Pass
5	20644.000	55.11	23.84	74.0	-18.89	Peak	3.00	100	V	Pass
6**	24112.001	45.96	23.27	54.0	-8.04	AV	15.00	100	V	Pass
6	24112.001	56.45	23.27	74.0	-17.55	Peak	15.00	100	V	Pass

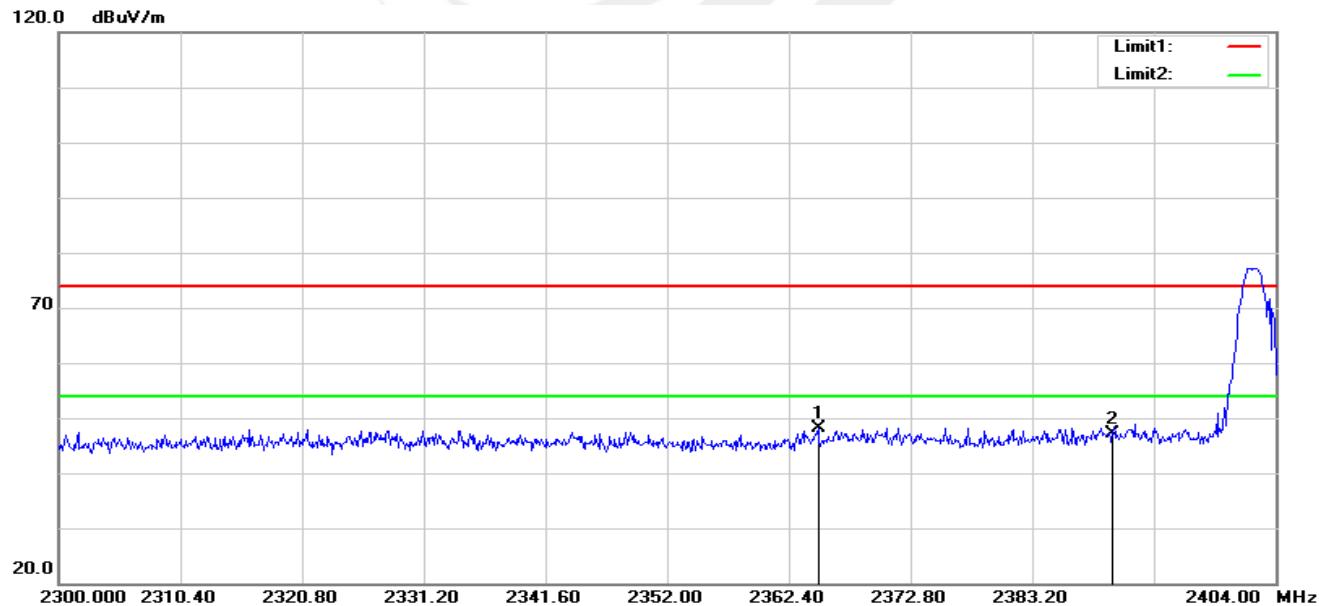


## 3.2.7 TEST RESULTS (RESTRICTED BAND)

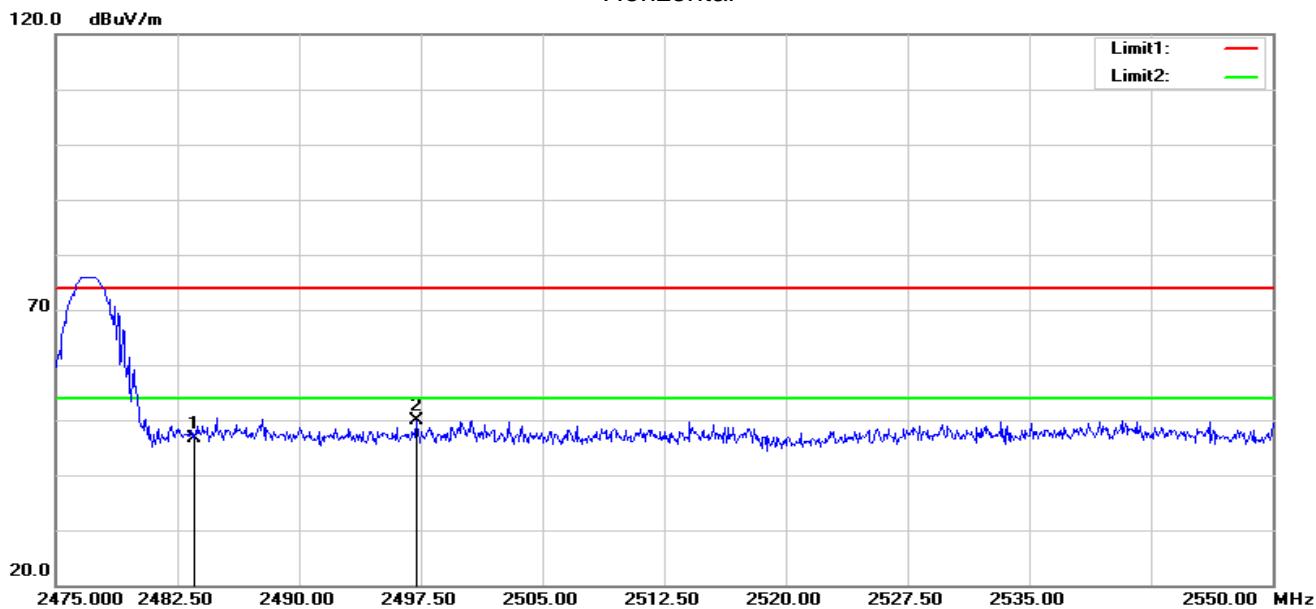
Low  
Horizontal

No.	Frequency (MHz)	Reading (dB <sub>uV</sub> )	Correct Factor(dB/m)	Result (dB <sub>uV/m</sub> )	Limit (dB <sub>uV/m</sub> )	Margin (dB)	Remark
1	2317.264	59.05	-11.22	47.83	74.00	-26.17	peak
2	2390.000	56.94	-10.75	46.19	74.00	-27.81	peak

Vertical

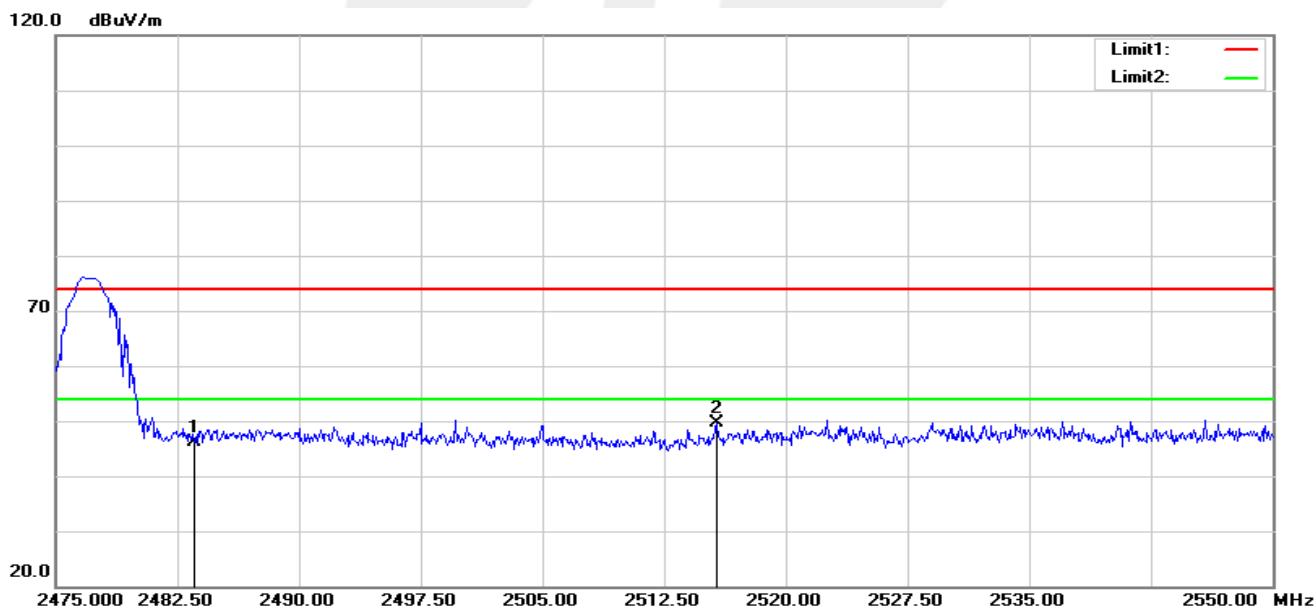


No.	Frequency (MHz)	Reading (dB <sub>uV</sub> )	Correct Factor(dB/m)	Result (dB <sub>uV/m</sub> )	Limit (dB <sub>uV/m</sub> )	Margin (dB)	Remark
1	2364.896	59.02	-10.92	48.10	74.00	-25.90	peak
2	2390.000	57.81	-10.75	47.06	74.00	-26.94	peak

**High**  
Horizontal

No.	Frequency (MHz)	Reading (dBuV)	Correct Factor(dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	2483.500	56.82	-10.29	46.53	74.00	-27.47	peak
2	2497.200	60.02	-10.22	49.80	74.00	-24.20	peak

## Vertical



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor(dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	2483.500	56.53	-10.29	46.24	74.00	-27.76	peak
2	2515.725	59.91	-10.17	49.74	74.00	-24.26	peak



## 4 CONDUCTED SPURIOUS & BAND EDGE EMISSION

### 4.1 APPLIED PROCEDURES / LIMIT

According to FCC Part 15.247(d) and RSS-247 Clause 5.5, in any 100kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20dB below that in the 100kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement.

### 4.2 TEST PROCEDURE

Spectrum Parameter	Setting
Detector	Peak
Start/Stop Frequency	30 MHz to 10th carrier harmonic
RB / VB (emission in restricted band)	100 KHz/300 KHz
Trace-Mode:	Max hold

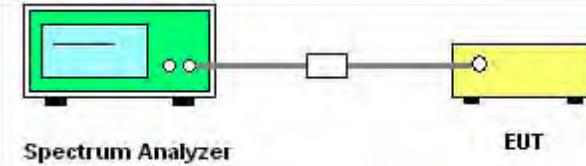
For Band edge

Spectrum Parameter	Setting
Detector	Peak
Start/Stop Frequency	Lower Band Edge: 2300 to 2422 MHz Upper Band Edge: 2452 to 2500 MHz
RB / VB (emission in restricted band)	100 KHz/300 KHz
Trace-Mode:	Max hold

### 4.3 DEVIATION FROM STANDARD

No deviation.

### 4.4 TEST SETUP



The EUT which is powered by the Battery, is coupled to the Spectrum Analyzer; the RF load attached to the EUT antenna terminal is 50Ohm; the path loss as the factor is calibrated to correct the reading.

Make the measurement with the spectrum analyzer's resolution bandwidth (RBW) = 100 kHz. In order to make an accurate measurement, set the span greater than RBW.

### 4.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



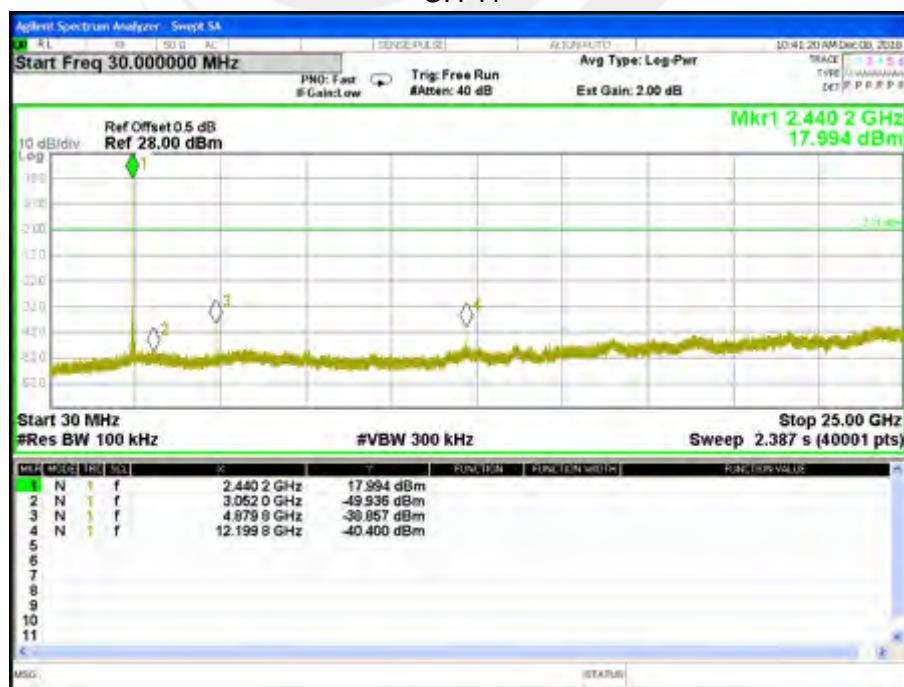
## 4.6 TEST RESULTS

Temperature :	25 °C	Relative Humidity :	60%
Test Voltage :	AC 120V/60Hz	Test Mode :	TX Mode /CH01, CH11, CH22

CH 01

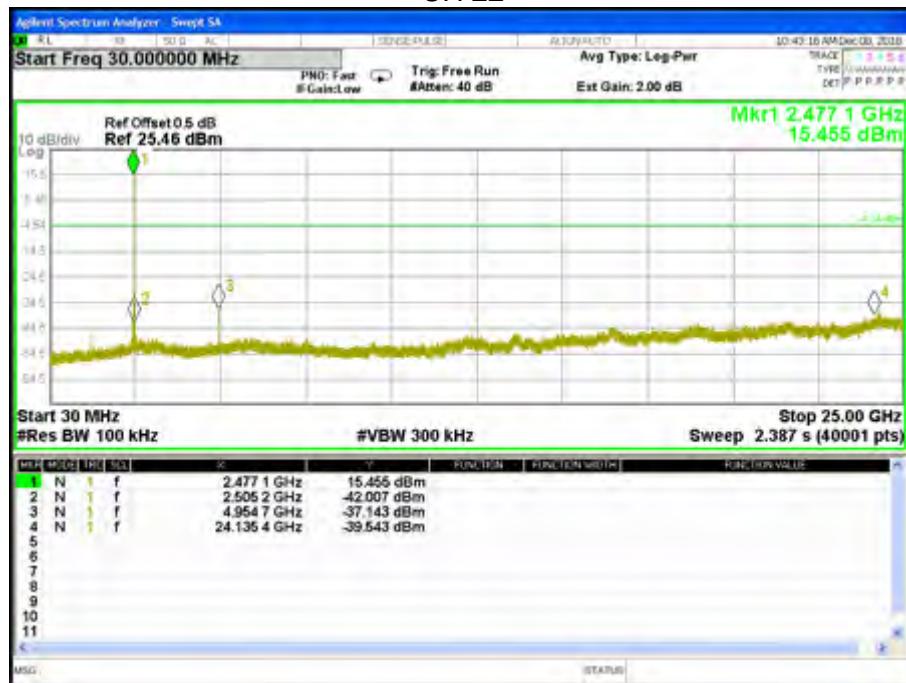


CH 11





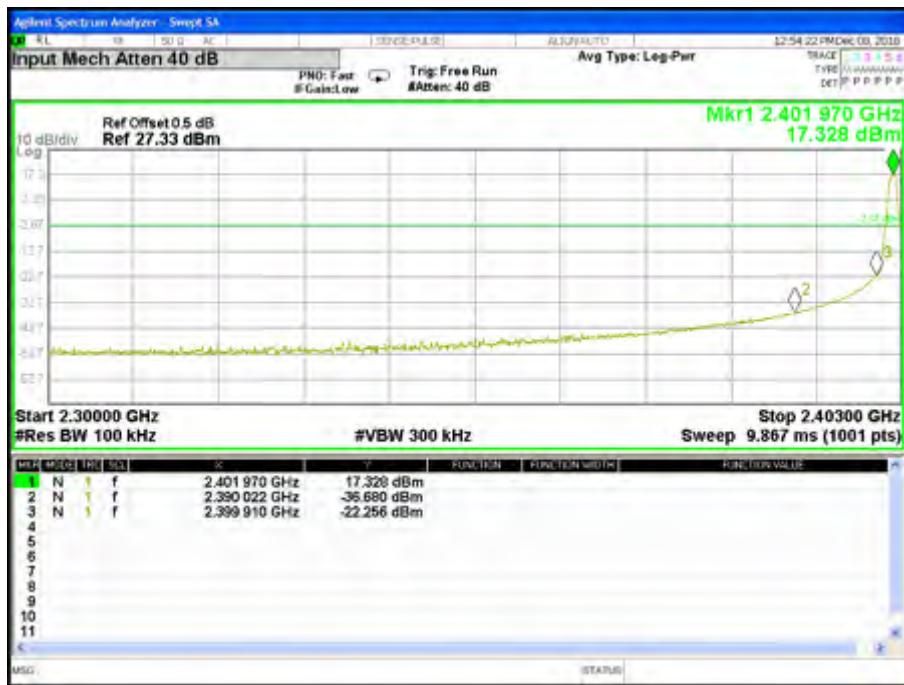
CH 22



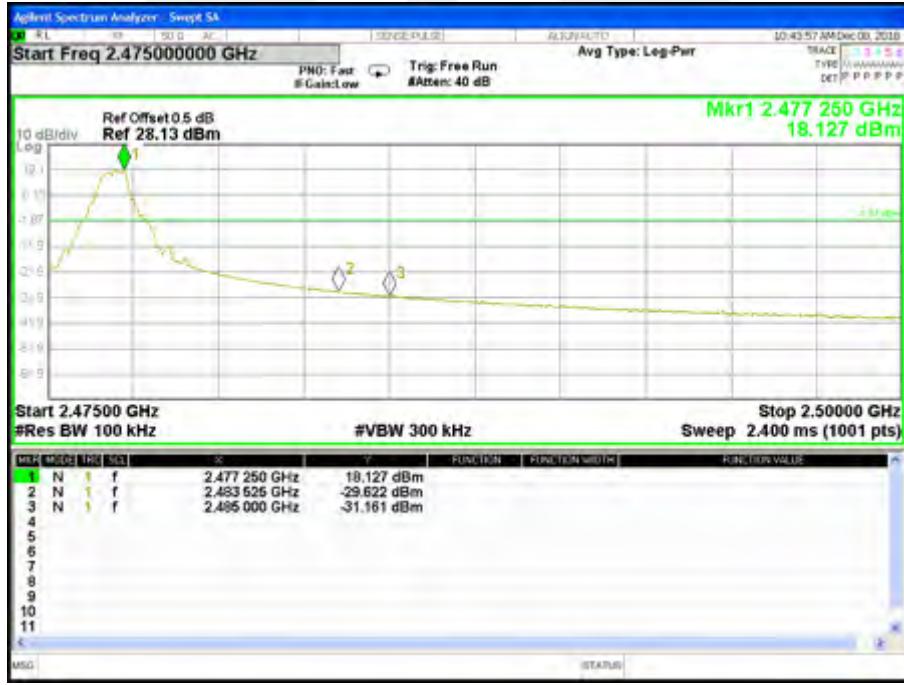


Band edge

CH 01



CH 22



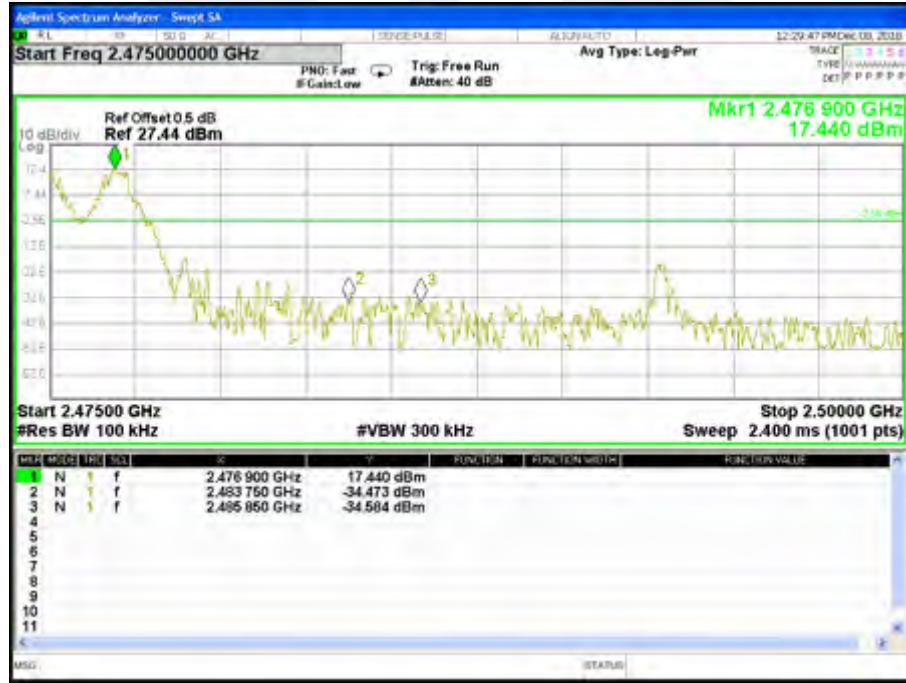


Hopping Band edge

CH 01



CH 22





## 5 NUMBER OF HOPPING CHANNEL

### 5.1 APPLIED PROCEDURES / LIMIT

FCC Part 15.247,Subpart C RSS-247 Issue 2				
Section	Test Item	Limit	Frequency Range (MHz)	Result
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(d)	Number of Hopping Channel	≥15	2400-2483.5	PASS

Spectrum Parameters	Setting
Attenuation	Auto
Span Frequency	> Operating FrequencyRange
RB	1MHz
VB	1MHz
Detector	Peak
Trace	Max Hold
Sweep Time	Auto

### 5.2 TEST PROCEDURE

- 1) The EUT was directly connected to the spectrum analyzer and antenna output port as show in the block diagram below
- 2) Spectrum Setting : RBW= 1MHz, VBW=1MHz, Sweep time = Auto.

### 5.3 DEVIATION FROM STANDARD

No deviation.

### 5.4 TEST SETUP



### 5.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



## 5.6 TEST RESULTS

Temperature:	25 °C	Relative Humidity:	60%
Test Voltage:	AC 120V/60Hz	Test Mode:	Hopping mode

Number of Hopping Channel **22**

### Hopping channel





## 6 AVERAGE TIME OF OCCUPANCY

### 6.1 APPLIED PROCEDURES / LIMIT

FCC Part 15.247,Subpart C RSS-247 Issue 2				
Section	Test Item	Limit	Frequency Range (MHz)	Result
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(d)	Average Time of Occupancy	0.4sec	2400-2483.5	PASS

### 6.2 TEST PROCEDURE

- 1) The transmitter output (antenna port) was connected to the spectrum analyzer
- 2) Set RBW =1MHz/VBW =3MHz.
- 3) Use a video trigger with the trigger level set to enable triggering only on full pulses.
- 4) Sweep Time is more than once pulse time.
- 5) Set the center frequency on any frequency would be measure and set the frequency span to zero span.
- 6) Measure the maximum time duration of one single pulse.
- 7) Measure the maximum burst number of one hopping period.
- 8) A Period Time =  $22 \times 0.4 = 8.8$  S

### 6.3 DEVIATION FROM STANDARD

No deviation.

### 6.4 TEST SETUP



### 6.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



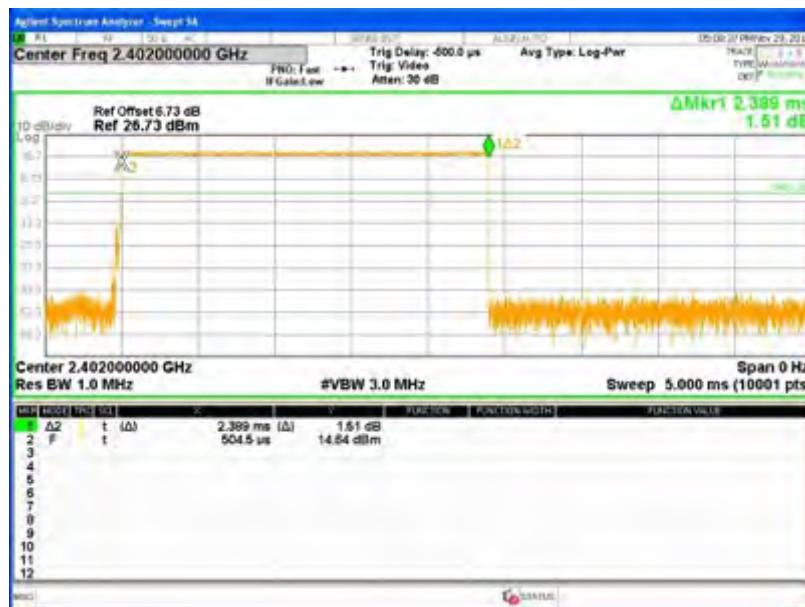
## 6.6 TEST RESULTS

Temperature:	25 °C	Relative Humidity:	60%
Test Voltage:	AC 120V/60Hz	Test Mode:	Hopping mode

Frequency (MHz)	Pulse Duration(ms)	Pulse number	Dwell Time(s)	Limits(s)
2402MHz	0.209	103	0.246	0.4

CH01

Pulse Duration



Pulse number





## 7 HOPPING CHANNEL SEPARATION MEASUREMENT

### 7.1 APPLIED PROCEDURES / LIMIT

Frequency hopping systems shall have hopping channel carrier frequencies separated by a minimum of 25 kHz or the 20 dB bandwidth of the hopping channel, whichever is greater. Alternatively, frequency hopping systems operating in the 2400-2483.5 MHz band may have hopping channel carrier frequencies that are separated by 25 kHz or two-thirds of the 20 dB bandwidth of the hopping channel, whichever is greater, provided the systems operate with an output power no greater than 125 mW.

Spectrum Parameter	Setting
Attenuation	Auto
Span Frequency	> 20 dB Bandwidth or Channel Separation
RB	30 kHz (20dB Bandwidth) / 30 kHz (Channel Separation)
VB	100 kHz (20dB Bandwidth) / 100 kHz (Channel Separation)
Detector	Peak
Trace	Max Hold
Sweep Time	Auto

### 7.2 TEST PROCEDURE

- 1) The transmitter output (antenna port) was connected to the spectrum analyser in peak hold mode.
- 2) The resolution bandwidth of 30 kHz and the video bandwidth of 100 kHz were utilised for 20 dB bandwidth measurement.
- 3) The resolution bandwidth of 30 kHz and the video bandwidth of 100 kHz were utilised for channel separation measurement.

### 7.3 DEVIATION FROM STANDARD

No deviation.

### 7.4 TEST SETUP



### 7.5 EUT OPERATION CONDITIONS

The EUT was programmed to be in continuously transmitting mode.



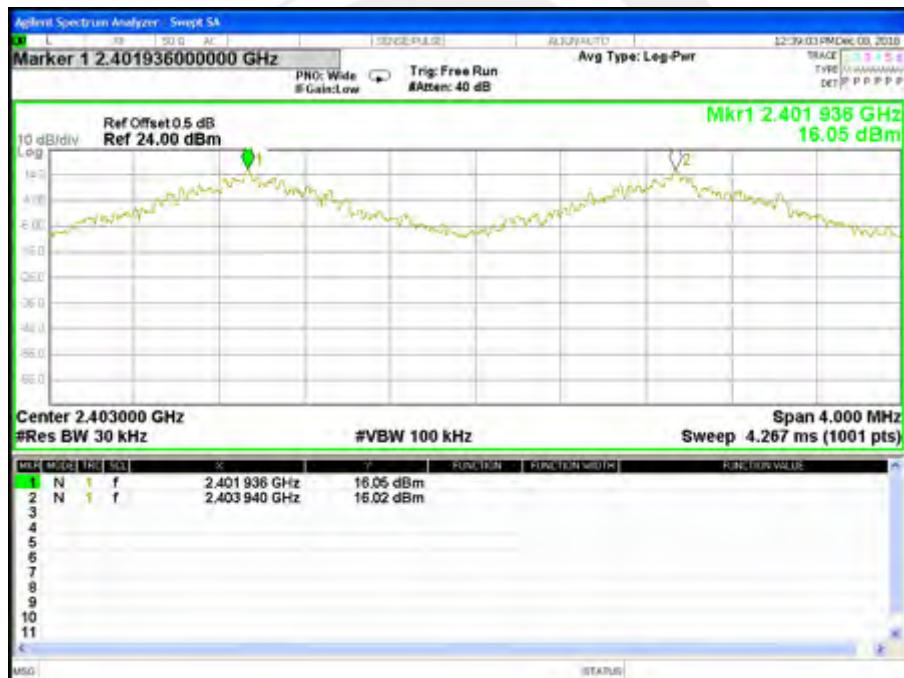
## 7.6 TEST RESULTS

Temperature:	25 °C	Relative Humidity:	60%
Test Voltage:	AC 120V/60Hz	Test Mode:	Hopping mode

Test Mode	Frequency	Ch. Separation (MHz)	Limit	Result
TX	2402 MHz	2.004	0.919	Complies
	2441 MHz	2.052	0.899	Complies
	2480 MHz	2.052	0.928	Complies

Ch. Separation Limits: > two-thirds 20dB bandwidth

CH01

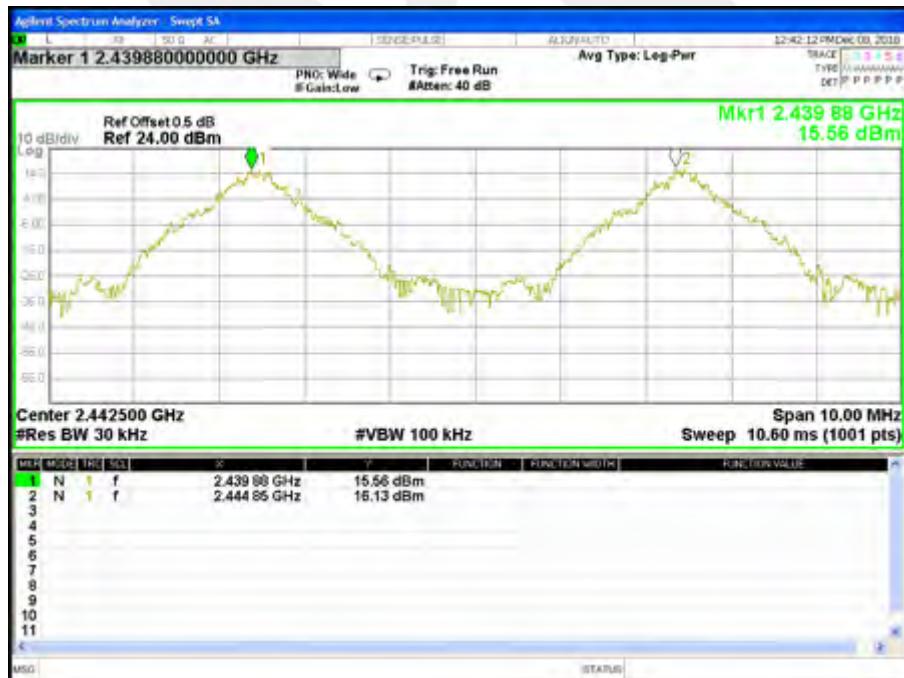




## CH11



## CH22





## 8 BANDWIDTH TEST

### 8.1 APPLIED PROCEDURES / LIMIT

FCC Part 15.247,Subpart C RSS-247 Issue 2 & RSS-Gen Issue 5				
Section	Test Item	Limit	Frequency Range (MHz)	Result
FCC Part 15.247(a)(1) RSS-247 Clause 5.1(b)	Bandwidth	(20dB Bandwidth)	2400-2483.5	PASS
RSS-Gen Clause 6.7	99% Bandwidth	-	2400-2483.5	PASS

### 8.2 TEST PROCEDURE

The automatic bandwidth measurement capability of an instrument may be employed using the X dB bandwidth mode with X set to 6 dB, if the functionality described above (i.e., RBW = 1% - 5% OBW, VBW $\geq$ 3RBW, peak detector with maximum hold) is implemented by the instrumentation function. When using this capability, care shall be taken so that the bandwidth measurement is not influenced by any intermediate power nulls in the fundamental emission that might be $\geq$ 6 dB.

### 8.3 DEVIATION FROM STANDARD

No deviation.

### 8.4 TEST SETUP



### 8.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



## 8.6 TEST RESULTS

Temperature:	25 °C	Relative Humidity:	60%
Test Voltage:	AC 120V/60Hz	Test Mode:	TX b Mode /CH01, CH11, CH22

Remark: PEAK DETECTOR IS USED

Test Mode	Frequency (MHz)	20dB Bandwidth (MHz)	99% Bandwidth (MHz)	Limit of 20dB Bandwidth (MHz)	Result
TX	2402.00	1.378	1.403	N/A	PASS
	2440.00	1.348	1.394	N/A	PASS
	2477.00	1.392	1.424	N/A	PASS

TX CH 01





## TX CH 11



## TX CH 22





## 9 PEAK OUTPUT POWER TEST

### 9.1 APPLIED PROCEDURES / LIMIT

FCC Part 15.247,Subpart C RSS-247 Issue 2				
Section	Test Item	Limit	Frequency Range (MHz)	Result
FCC Part 15.247(a)(1) RSS-247 Clause 5.4(b)	Output Power	1 W or 0.125W if channel separation > 2/3 bandwidth provided the systems operate with an output power no greater than 125 mW(20.97dBm)	2400-2483.5	PASS

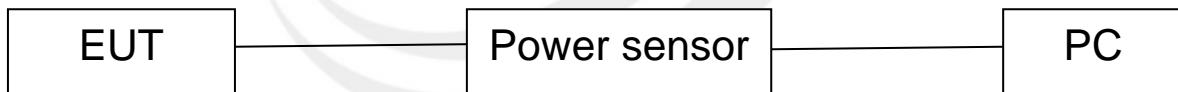
### 9.2 TEST PROCEDURE

- The EUT was directly connected to the Power Sensor&PC

### 9.3 DEVIATION FROM STANDARD

No deviation.

### 9.4 TEST SETUP



### 9.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 2.3 Unless otherwise a special operating condition is specified in the follows during the testing.



## 9.6 TEST RESULTS

Temperature :	25 °C	Relative Humidity :	60%
Test Voltage :	AC 120V/60Hz		

Test Channel	Frequency (MHz)	Conducted Output Power		Limit (dBm)
		Peak(dBm)	AVG(dBm)	
CH01	2402.00	18.82	15.08	20.97
CH11	2440.00	19.32	15.42	20.97
CH22	2477.00	19.38	15.62	20.97

Note:

- 1) The cable loss and antenna gain are taken into account in results.
- 2) Antenna gain(G): 0 dBi





## 10 ANTENNA REQUIREMENT

### 10.1 STANDARD REQUIREMENT

15.203 and RSS-Gen Issue 5 requirement: For intentional device, according to 15.203 and RSS-Gen Issue 5: an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device.

### 10.2 EUT ANTENNA

The EUT antenna is Integral Antenna. It comply with the standard requirement.





## 11 FREQUENCY STABILITY

### 11.1 LIMITS OF FREQUENCY STABILITY MEASUREMENT

The frequency tolerance of the carrier signal shall be maintained within +/-0.02% of the operating frequency over a temperature variation of -30 degrees to 50 degrees C at normal supply voltage, and for a variation in primary supply voltage from 85% to 115% of the rated supply voltage at a temperature of 20 degrees.

### 11.2 TEST PROCEDURE

- 1.The EUT was placed inside the environmental test chamber and powered by nominal DC voltage.
- 2.Turn the EUT on and couple its output to spectrum analyzer.
- 3.Turn the EUT off and set the chamber to the highest temperature specified.
- 4.Allow sufficient time (approximately 30 min) for the temperature of the chamber to stabilize, turn the EUT on and measure the operating frequency after 2.5, and 10 minutes.
- 5.Repeat step 2 and 3 with the temperature chamber set to the lowest temperature.
- 6.The test chamber was allowed to stabilize at +20 degree C for a minimum of 30 minutes. The supply voltage was then adjusted on the EUT from 85% to 115% and the frequency record.

### 11.3 TEST RESULT

Channel 11 (2440MHz)

Voltage vs. Frequency Stability

Voltage vs. Frequency Stability Voltage(V)	Measurement Frequency(MHz)
5.75	2440.0023
5	2440.0013
4.25	2440.0019
Max.Deviation(MHz)	0.0023
Max.Deviation(ppm)	0.94

Rated working voltage:DC 5V

Temperature vs. Frequency Stability

Temperature(°C)	Measurement Frequency(MHz)
-30	2440.0028
-20	2440.0019
-10	2440.0021
0	2440.0020
10	2440.0022
20	2440.0024
30	2440.0026
40	2440.0022
50	2440.0021
Max.Deviation(MHz)	0.0028
Max.Deviation(ppm)	1.15