



FCC RADIO TEST REPORT

FCC ID : 2ADL6MTPT20WB
Equipment : Mobile EFT- POS
Brand Name : AEVI
Model Name : MTPT20-W
Applicant : MITAC COMPUTING TECHNOLOGY CORPORATION
No. 200, Wen Hwa 2nd Rd., Kuei Shan Dist., TAOYUAN,
33383 Taiwan
Manufacturer : Mitac Computer (Shun De) LTD.
1 SHUNDA RD, LUNJIAO, SHUNDE GUANGDONG, CHINA
Standard : FCC Part 15 Subpart C §15.247

The product was received on Mar. 20, 2018 and testing was started from Apr. 23, 2018 and completed on May 22, 2018. We, SPORTON INTERNATIONAL INC., would like to declare that the tested sample has been evaluated in accordance with the test procedures and has been in compliance with the applicable technical standards.

The report must not be used by the client to claim product certification, approval, or endorsement by TAF or any agency of government.

The test results in this report apply exclusively to the tested model / sample. Without written approval of SPORTON INTERNATIONAL INC. EMC & Wireless Communications Laboratory, the test report shall not be reproduced except in full.

Approved by: Jones Tsai

SPORTON INTERNATIONAL INC. EMC & Wireless Communications Laboratory
No. 52, Huaya 1st Rd., Guishan Dist., Taoyuan City, Taiwan (R.O.C.)



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History of this test report

Report No.	Version	Description	Issued Date
FR821203-02C	01	Initial issue of report	Jun. 26, 2018



Summary of Test Result

Report Clause	Ref Std. Clause	Test Items	Result (PASS/FAIL)	Remark
3.1	15.247(a)(2)	6dB Bandwidth	Pass	-
3.1	2.1049	99% Occupied Bandwidth	Reporting only	-
3.2	15.247(b)	Power Output Measurement	Pass	-
3.3	15.247(e)	Power Spectral Density	Pass	-
3.4	15.247(d)	Conducted Band Edges	Pass	-
		Conducted Spurious Emission	Pass	-
3.5	15.247(d)	Radiated Band Edges and Radiated Spurious Emission	Pass	Under limit 0.04 dB at 4924.000 MHz
3.6	15.207	AC Conducted Emission	Pass	Under limit 11.50 dB at 0.179 MHz
3.7	15.203 & 15.247(b)	Antenna Requirement	Pass	-

Reviewed by: Joseph Lin

Report Producer: Nancy Yang



1 General Description

1.1 Product Feature of Equipment Under Test

Bluetooth, Wi-Fi 2.4GHz 802.11b/g/n, and NFC

Product Specification subjective to this standard	
Sample 1	Giant Plus + WNC
Sample 2	KingDisplay + WNC
Sample 3	Giant Plus + Pulse
Sample 4	KingDisplay + Pulse
Antenna Type	WLAN: PIFA Antenna Bluetooth: PIFA Antenna NFC: Loop Antenna

1.2 Modification of EUT

No modifications are made to the EUT during all test items.

1.3 Testing Location

Sportun Lab is accredited to ISO 17025 by Taiwan Accreditation Foundation (TAF code : 1190) and the FCC designation No. TW1190 under the FCC 2.948(e) by Mutual Recognition Agreement (MRA) in FCC Test.

Test Site	SPORTON INTERNATIONAL INC.		
Test Site Location	No.52, Huaya 1st Rd., Guishan Dist., Taoyuan City, Taiwan (R.O.C.) TEL: +886-3-327-3456 FAX: +886-3-328-4978		
Test Site No.	Sportun Site No.		
	TH05-HY	CO05-HY	03CH07-HY

Note: The test site complies with ANSI C63.4 2014 requirement.

1.4 Applicable Standards

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:

- ♦ FCC Part 15 Subpart C §15.247
- ♦ FCC KDB Publication No. 558074 D01 DTS Meas. Guidance v04
- ♦ ANSI C63.10-2013

Remark:

1. All test items were verified and recorded according to the standards and without any deviation during the test.
2. This EUT has also been tested and complied with the requirements of FCC Part 15, Subpart B, recorded in a separate test report.



2 Test Configuration of Equipment Under Test

- a. The EUT has been associated with peripherals and configuration operated in a manner tended to maximize its emission characteristics in a typical application. Frequency range investigated: conduction emission (150 kHz to 30 MHz), radiation emission (9 kHz to the 10th harmonic of the highest fundamental frequency or to 40 GHz, whichever is lower). For radiated measurement, pre-scanned in three orthogonal panels, X, Y, Z. The worst cases (X plane) were recorded in this report.
- b. AC power line Conducted Emission was tested under maximum output power.

2.1 Carrier Frequency and Channel

Frequency Band	Channel	Freq. (MHz)	Channel	Freq. (MHz)
2400-2483.5 MHz	1	2412	7	2442
	2	2417	8	2447
	3	2422	9	2452
	4	2427	10	2457
	5	2432	11	2462
	6	2437		

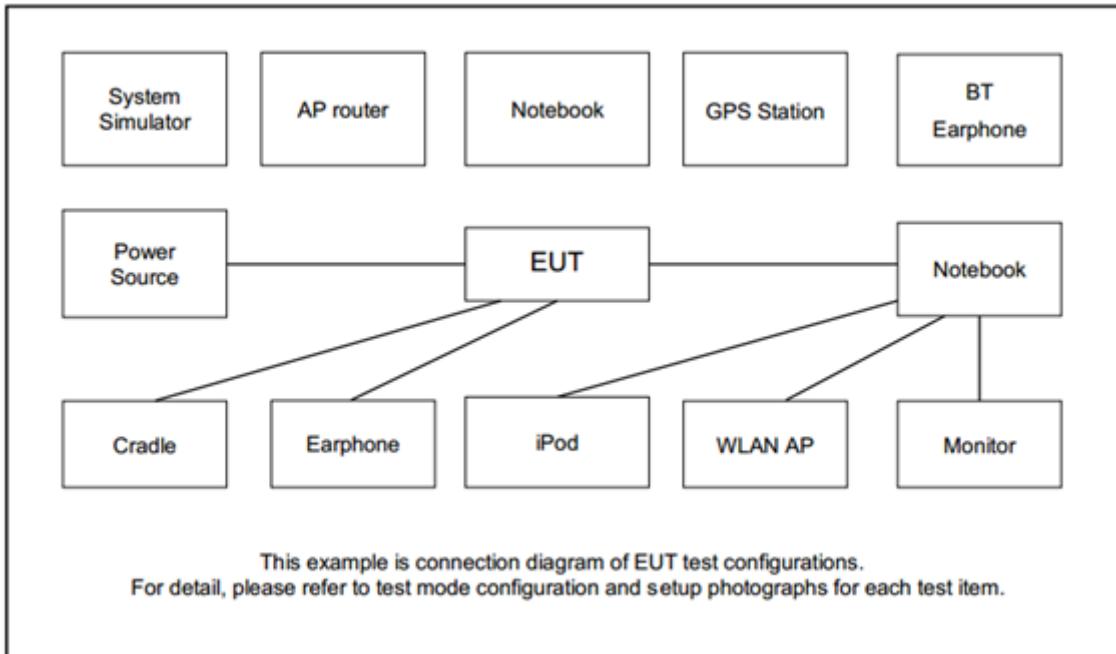
2.2 Test Mode

Final test modes are considering the modulation and worse data rates as below table.

Modulation	Data Rate
802.11b	1 Mbps
802.11g	6 Mbps
802.11n HT20	MCS0
802.11n HT40	MCS0

Test Cases	
AC Conducted Emission	Mode 1: EUT with Cradle (Charging from Adapter 1) + WLAN Link + Bluetooth Link + Earphone + NFC Link + Smart Card + MSR Card (Load) for Sample 1
Remark: For Radiated Test Cases, the tests were performed with Adapter 1.	

2.3 Connection Diagram of Test System



2.4 Support Unit used in test configuration and system

Item	Equipment	Trade Name	Model Name	FCC ID	Data Cable	Power Cord
1.	Bluetooth Earphone	Sony Ericsson	MW600	PY7DDA-2029	N/A	N/A
2.	WLAN AP	ASUS	RT-AC66U	MSQ-RTAC66U	N/A	Unshielded, 1.8m
3.	iPod Earphone	Apple	N/A	Verification	Unshielded, 1.0 m	N/A
4.	Notebook	DELL	Latitude E6320	FCC DoC/ Contains FCC ID: QDS-BRCM1054	N/A	AC I/P: Unshielded, 1.2 m DC O/P: Shielded, 1.8 m
5.	Notebook	DELL	Latitude E3340	FCC DoC/ Contains FCC ID: PD97260NGU	N/A	AC I/P: Unshielded, 1.2 m DC O/P: Shielded, 1.8 m
6.	NFC Card	Metro Taipei	Easy Card	N/A	N/A	N/A

2.5 EUT Operation Test Setup

The RF test items, utility "cmd" was installed in EUT which was programmed in order to make the EUT get into the engineering modes to provide channel selection, power level, data rate and the application type and for continuous transmitting signals.



2.6 Measurement Results Explanation Example

For all conducted test items:

The offset level is set in the spectrum analyzer to compensate the RF cable loss and attenuator factor between EUT conducted output port and spectrum analyzer. With the offset compensation, the spectrum analyzer reading level is exactly the EUT RF output level.

Example:

The spectrum analyzer offset is derived from RF cable loss and attenuator factor.

Offset = RF cable loss + attenuator factor.

Following shows an offset computation example with cable loss 4.2 dB and 10dB attenuator.

Offset(dB) = RF cable loss(dB) + attenuator factor(dB).

$$= 4.2 + 10 = 14.2 \text{ (dB)}$$



3 Test Result

3.1 6dB and 99% Bandwidth Measurement

3.1.1 Limit of 6dB and 99% Bandwidth

The minimum 6 dB bandwidth shall be at least 500 kHz.

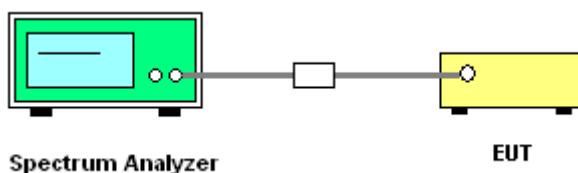
3.1.2 Measuring Instruments

See list of measuring equipment of this test report.

3.1.3 Test Procedures

1. The testing follows FCC KDB Publication No. 558074 DTS D01 Meas. Guidance v04.
2. The RF output of EUT was connected to the spectrum analyzer by RF cable and attenuator. The path loss was compensated to the results for each measurement.
3. Set to the maximum power setting and enable the EUT transmit continuously.
4. Make the measurement with the spectrum analyzer's resolution bandwidth (RBW) = 100 kHz. Set the Video bandwidth (VBW) = 300 kHz. In order to make an accurate measurement. The 6 dB bandwidth must be greater than 500 kHz.
5. For 99% Bandwidth Measurement, the spectrum analyzer's resolution bandwidth (RBW) = 1MHz and set the Video bandwidth (VBW) = 3MHz.
6. Measure and record the results in the test report.

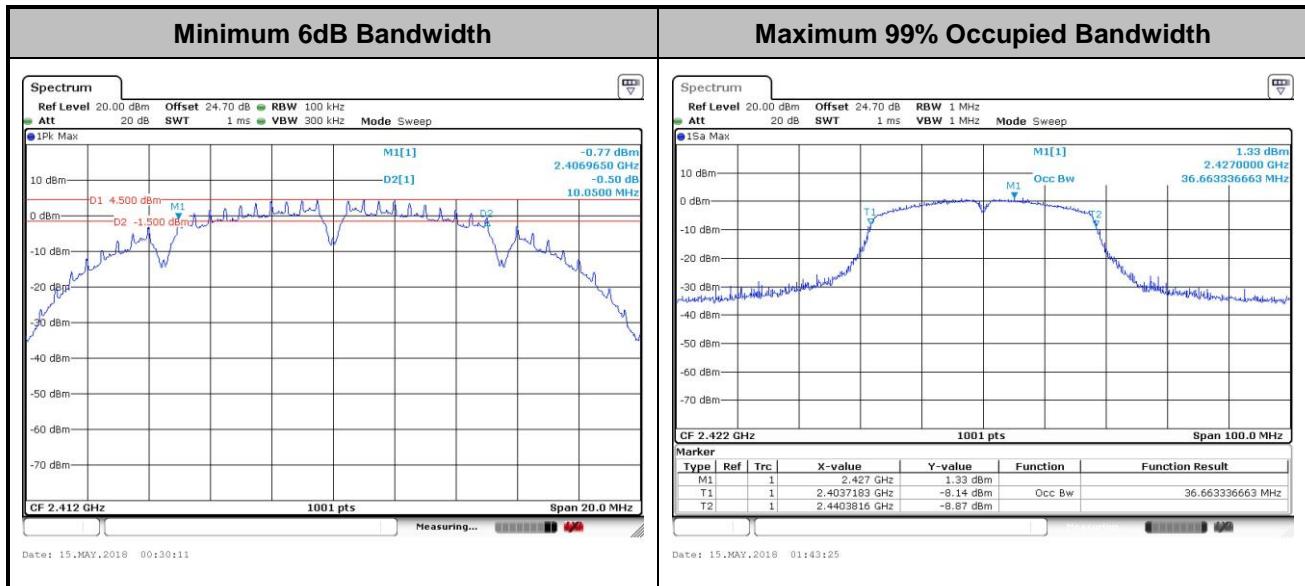
3.1.4 Test Setup





3.1.5 Test Result of 6dB and 99% Occupied Bandwidth

Please refer to Appendix A.



Note: The occupied channel bandwidth is maintained within the band of operation for all of the modulations.



3.2 Output Power Measurement

3.2.1 Limit of Output Power

For systems using digital modulation in the 2400-2483.5MHz, the limit for peak output power is 30dBm. If transmitting antenna with directional gain greater than 6dBi is used, the peak output power from the intentional radiator shall be reduced below the above stated value by the amount in dB that the directional gain of the antenna exceeds 6 dBi. In case of point-to-point operation, the limit has to be reduced by 1dB for every 3dB that the directional gain of the antenna exceeds 6dBi.

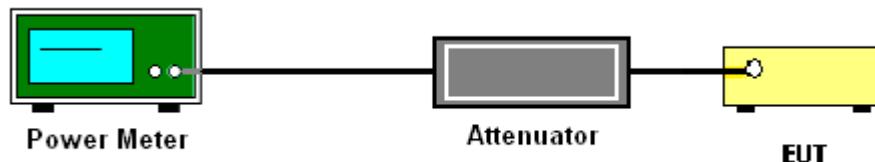
3.2.2 Measuring Instruments

See list of measuring equipment of this test report.

3.2.3 Test Procedures

1. The testing follows the Measurement Procedure of FCC KDB No. 558074 DTS D01 Meas. Guidance v04 section 9.1.3 PKPM1 Peak power meter method.
2. The RF output of EUT was connected to the power meter by RF cable and attenuator. The path loss was compensated to the results for each measurement.
3. Set to the maximum power setting and enable the EUT transmit continuously.
4. Measure the conducted output power and record the results in the test report.

3.2.4 Test Setup



3.2.5 Test Result of Peak Output Power

Please refer to Appendix A.

3.2.6 Test Result of Average output Power (Reporting Only)

Please refer to Appendix A.



3.3 Power Spectral Density Measurement

3.3.1 Limit of Power Spectral Density

The peak power spectral density shall not be greater than 8dBm in any 3kHz band at any time interval of continuous transmission.

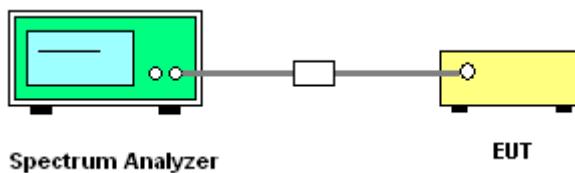
3.3.2 Measuring Instruments

See list of measuring equipment of this test report.

3.3.3 Test Procedures

1. The testing follows Measurement Procedure 10.2 Method PKPSD of FCC KDB Publication No. 558074 D01 DTS Meas. Guidance v04
2. The RF output of EUT was connected to the spectrum analyzer by RF cable and attenuator. The path loss was compensated to the results for each measurement.
3. Set to the maximum power setting and enable the EUT transmit continuously.
4. Make the measurement with the spectrum analyzer's resolution bandwidth (RBW) = 3 kHz. Video bandwidth VBW = 10 kHz In order to make an accurate measurement, set the span to 1.5 times DTS Channel Bandwidth. (6dB BW)
5. Detector = peak, Sweep time = auto couple, Trace mode = max hold, Allow trace to fully stabilize. Use the peak marker function to determine the maximum power level.
6. Measure and record the results in the test report.

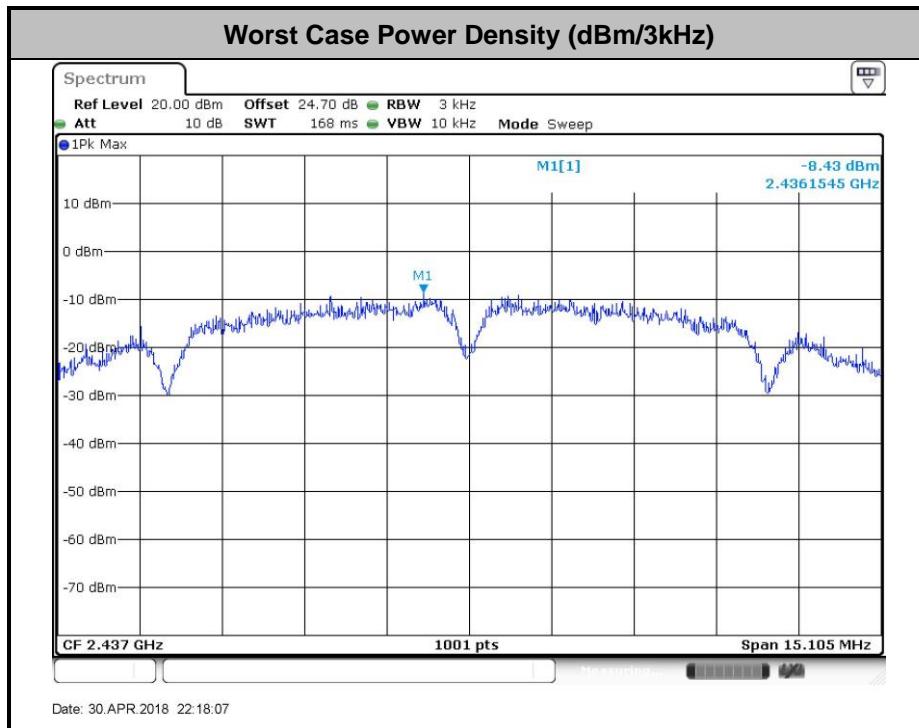
3.3.4 Test Setup





3.3.5 Test Result of Power Spectral Density

Please refer to Appendix A.





3.4 Conducted Band Edges and Spurious Emission Measurement

3.4.1 Limit of Conducted Band Edges and Spurious Emission Measurement

In any 100 kHz bandwidth outside of the authorized frequency band, the emissions which fall in the non-restricted bands shall be attenuated at least 20 dB / 30dB relative to the maximum PSD level in 100 kHz by RF conducted measurement.

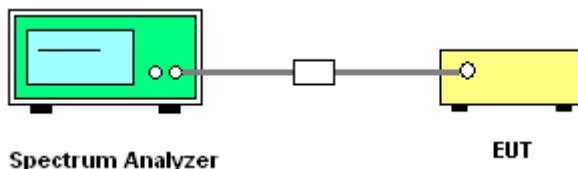
3.4.2 Measuring Instruments

See list of measuring equipment of this test report.

3.4.3 Test Procedures

1. The testing follows FCC KDB Publication No. 558074 D01 DTS Meas. Guidance v04.
2. The RF output of EUT was connected to the spectrum analyzer by RF cable and attenuator. The path loss was compensated to the results for each measurement.
3. Set to the maximum power setting and enable the EUT transmit continuously.
4. Set RBW = 100 kHz, VBW=300 kHz, Peak Detector. Unwanted Emissions measured in any 100 kHz bandwidth outside of the authorized frequency band shall be attenuated by at least 20 dB relative to the maximum in-band peak PSD level in 100 kHz when maximum peak conducted output power procedure is used. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, the attenuation required under this paragraph shall be 30 dB instead of 20 dB per 15.247(d).
5. Measure and record the results in the test report.
6. The RF fundamental frequency should be excluded against the limit line in the operating frequency band.

3.4.4 Test Setup

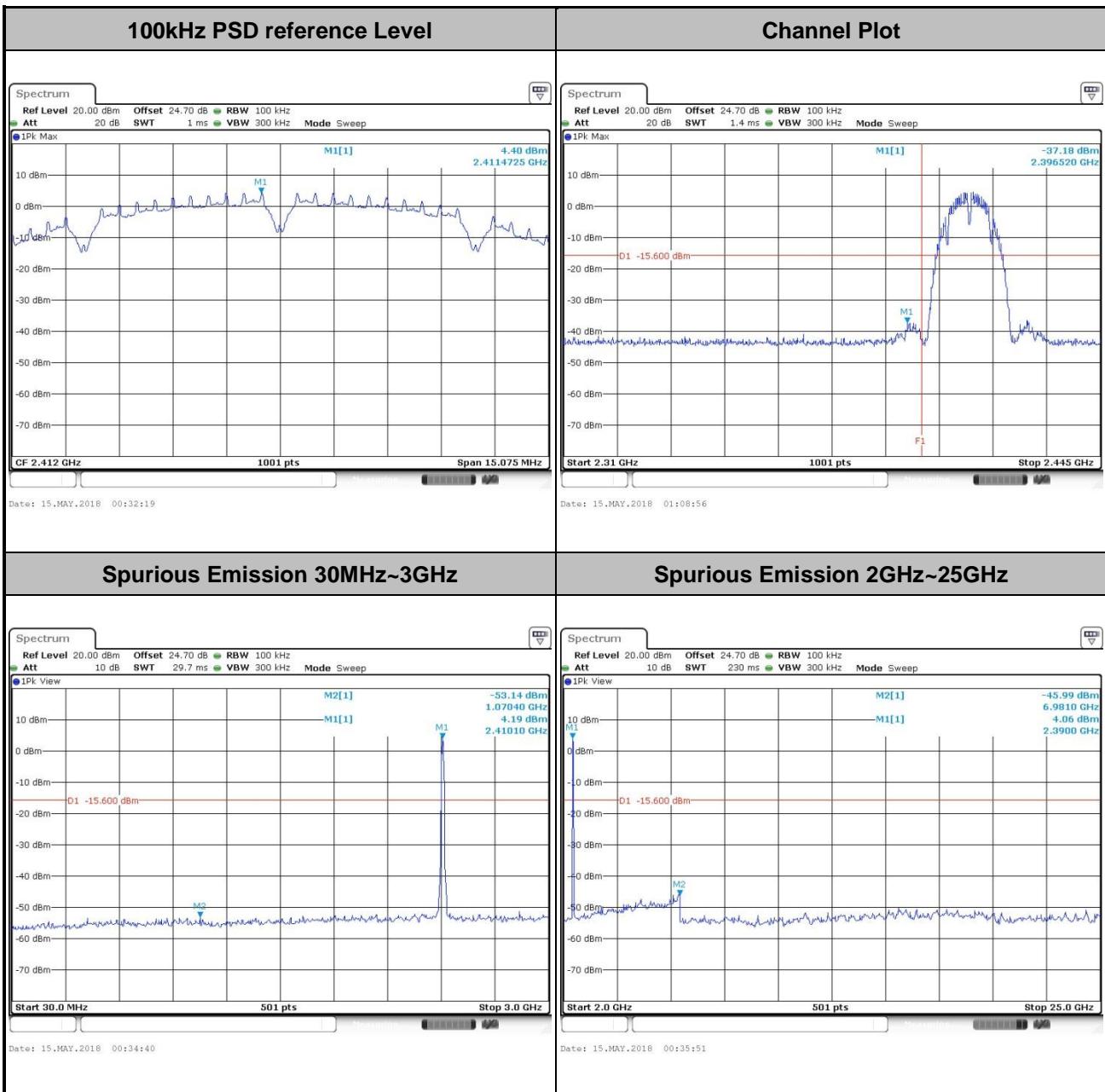




3.4.5 Test Result of Conducted Band Edges and Spurious Emission

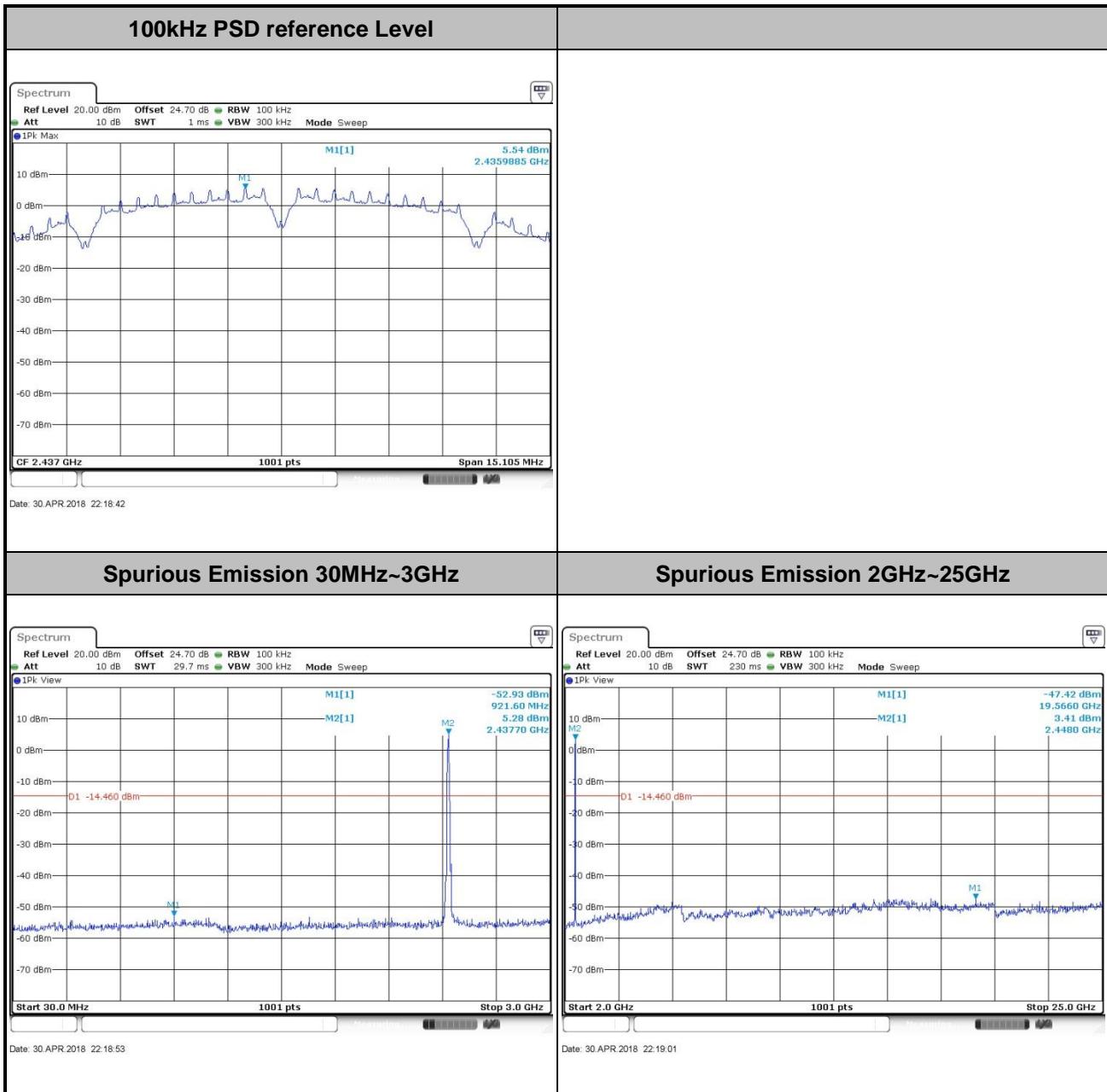
Test Engineer :	Eason Huang and Kai Liao	Temperature :	21~25°C
		Relative Humidity :	51~54%

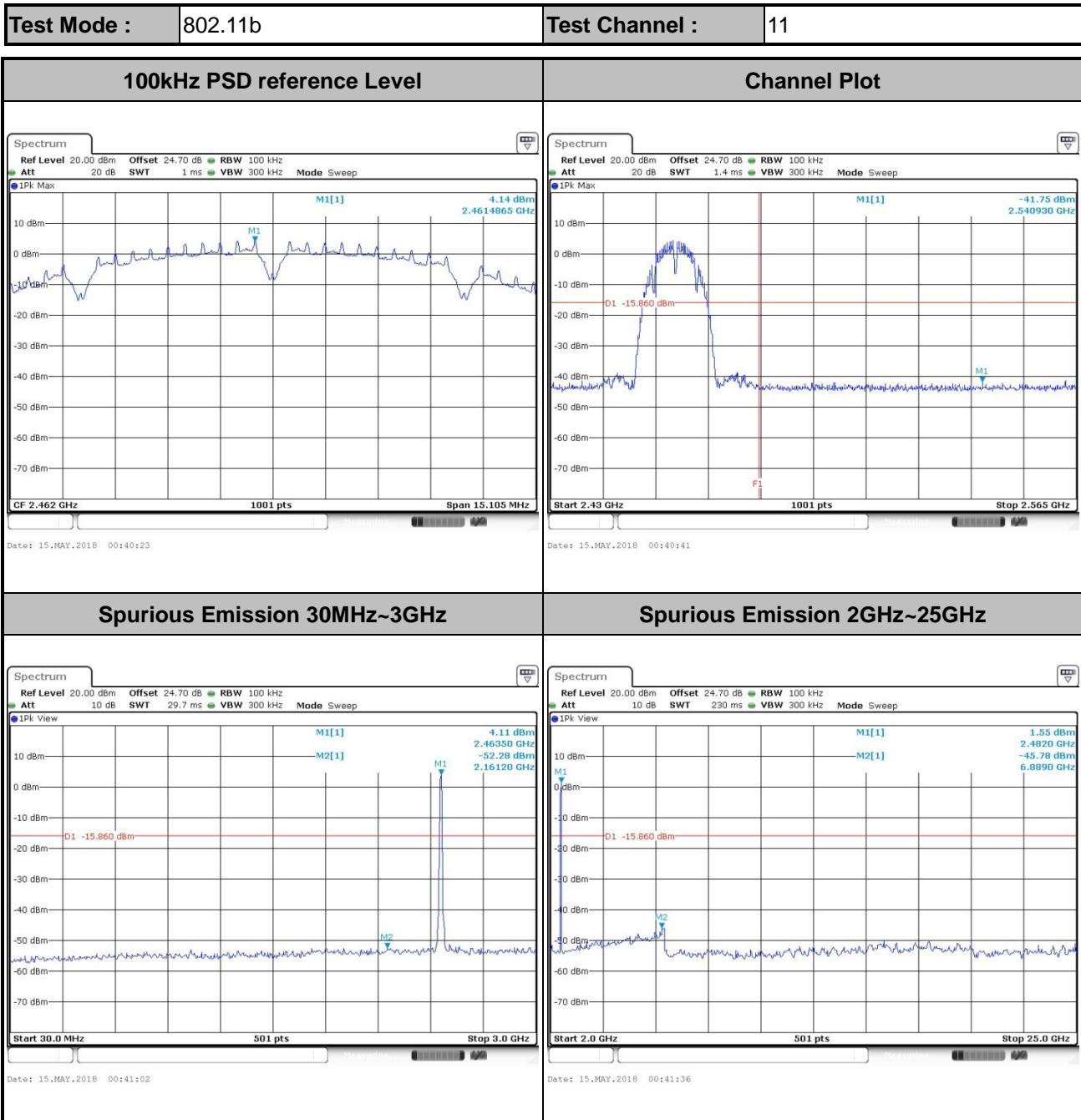
Test Mode :	802.11b	Test Channel :	01
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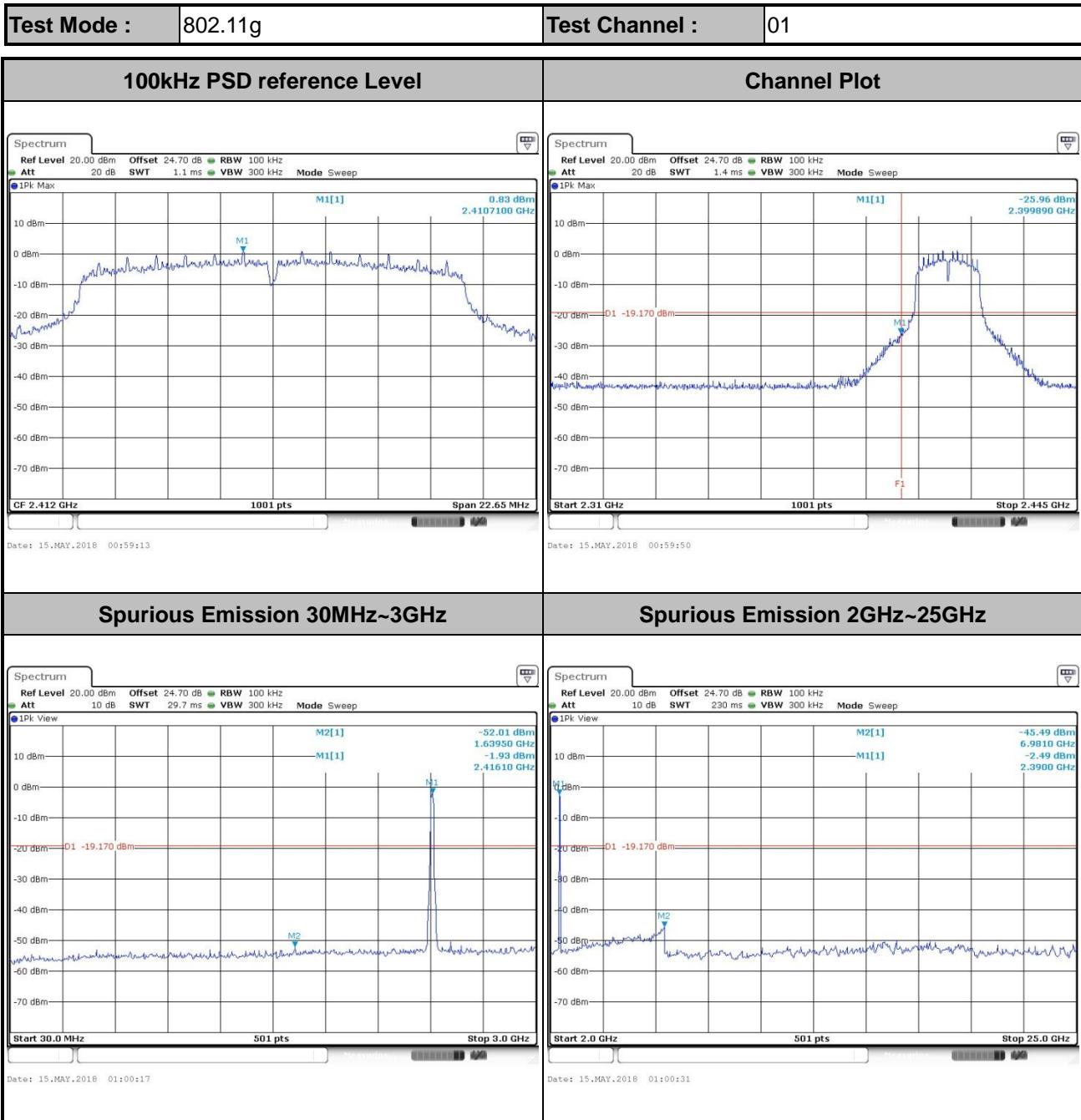




Test Mode :	802.11b	Test Channel :	06
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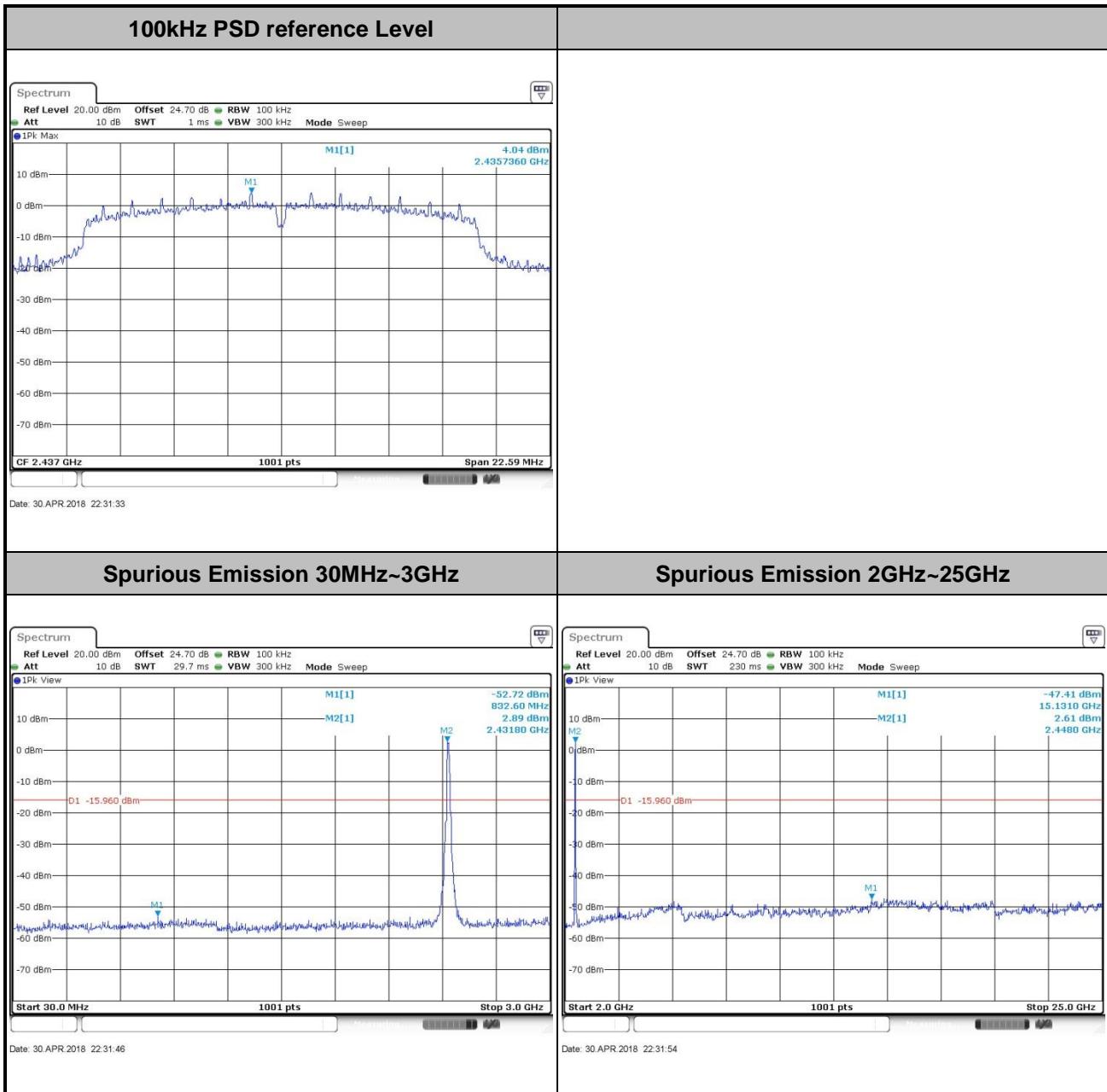






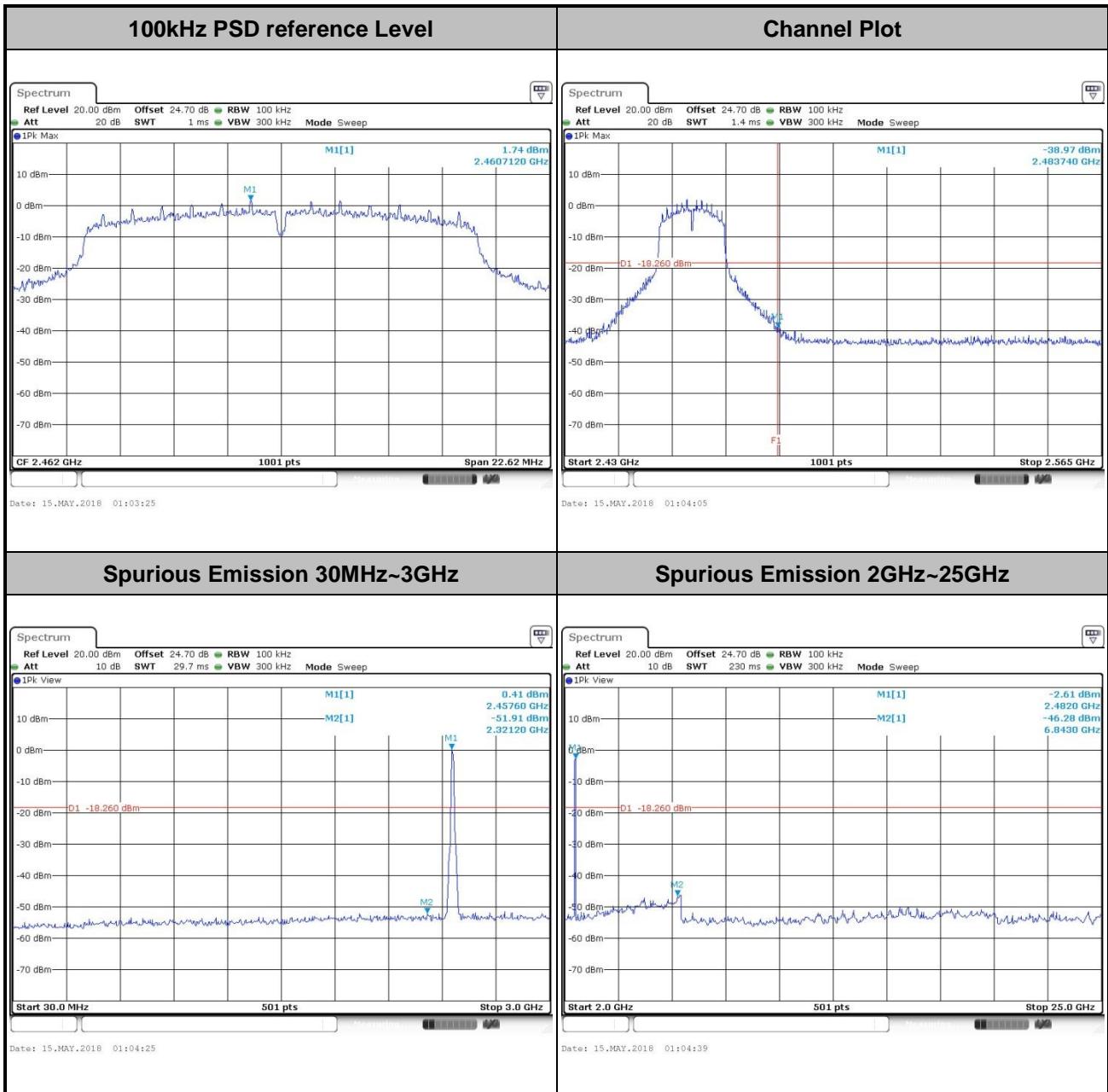


Test Mode :	802.11g	Test Channel :	06
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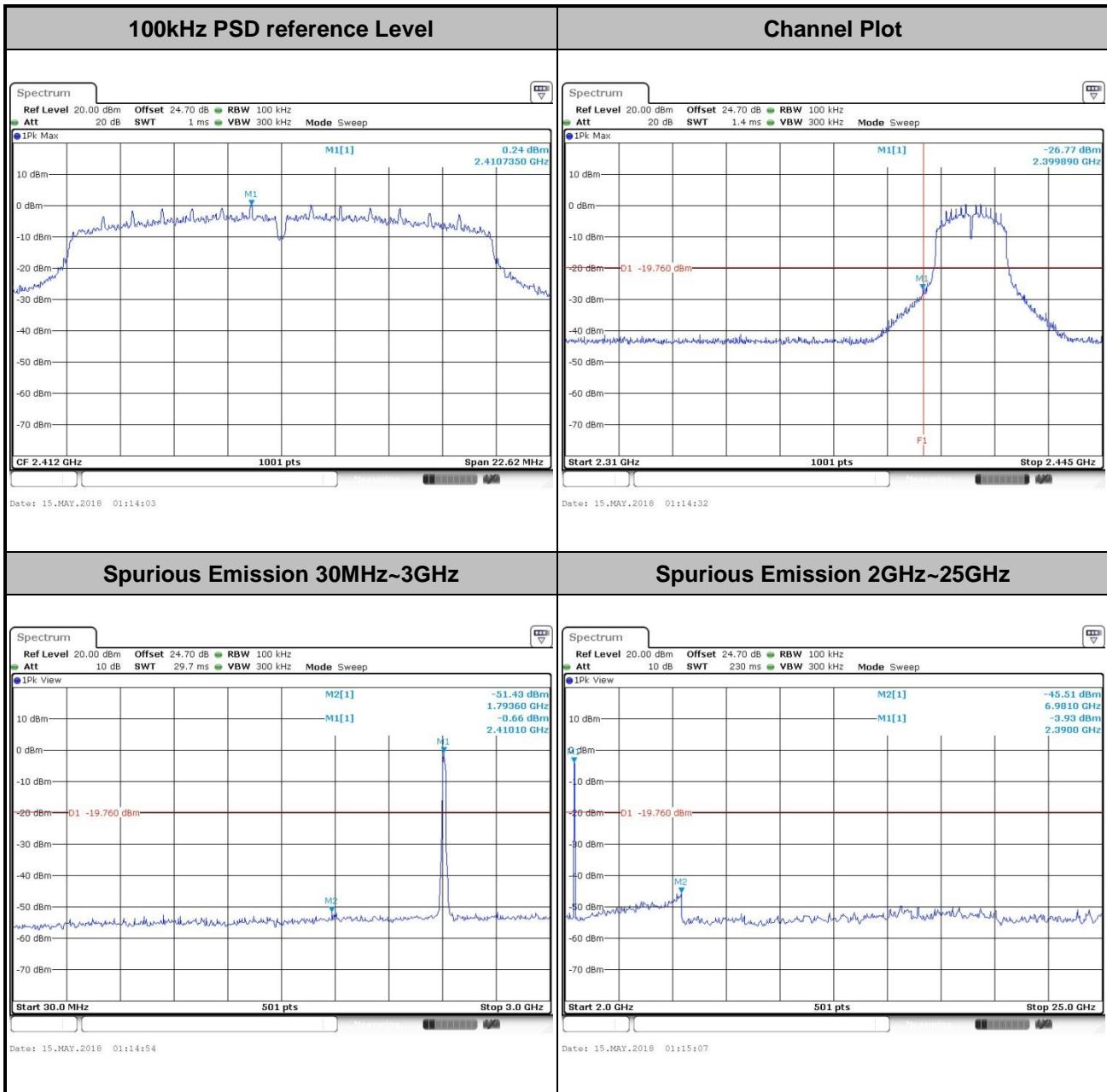


Test Mode :	802.11g	Test Channel :	11
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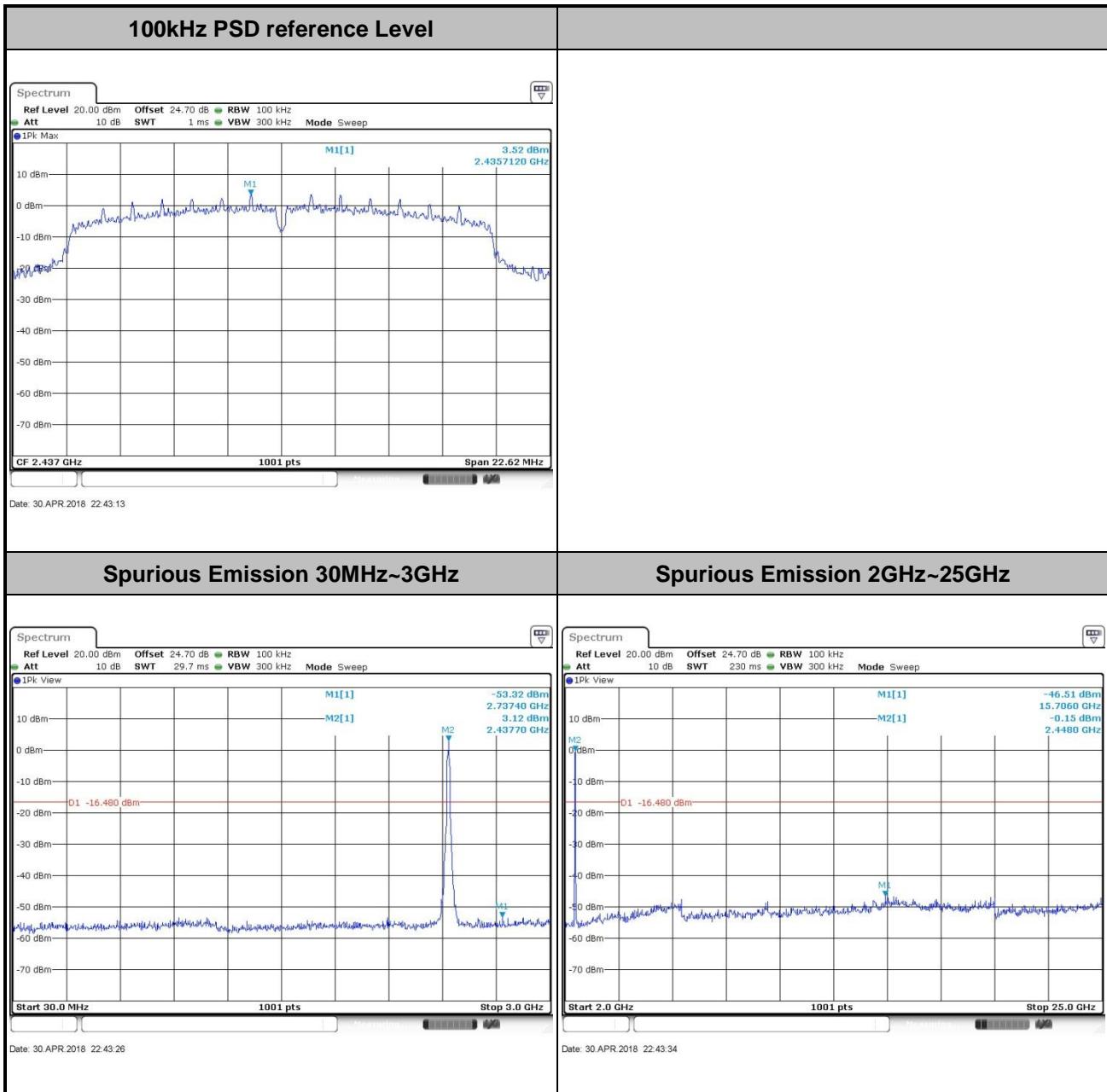


Test Mode :	802.11n HT20	Test Channel :	01
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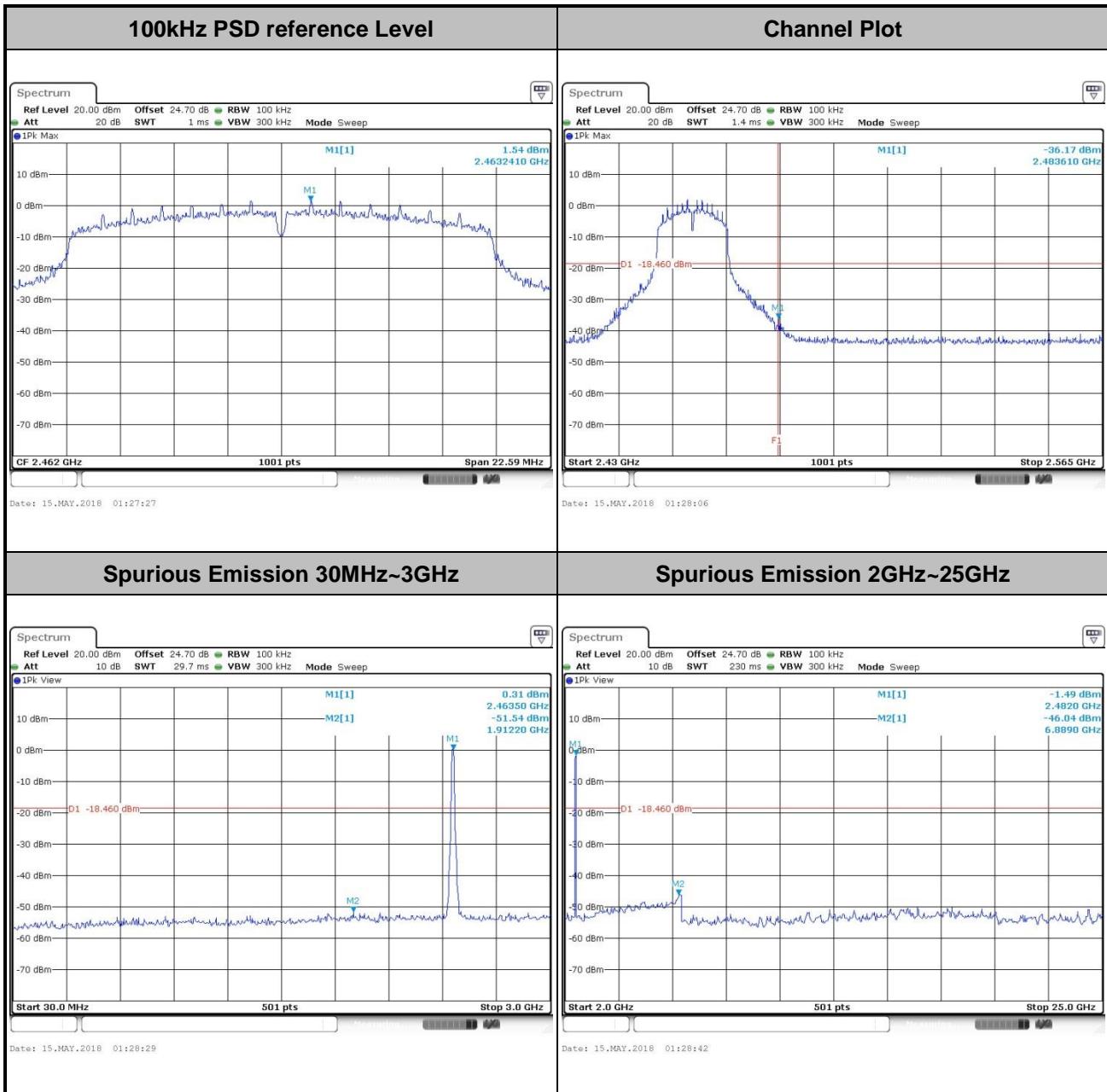


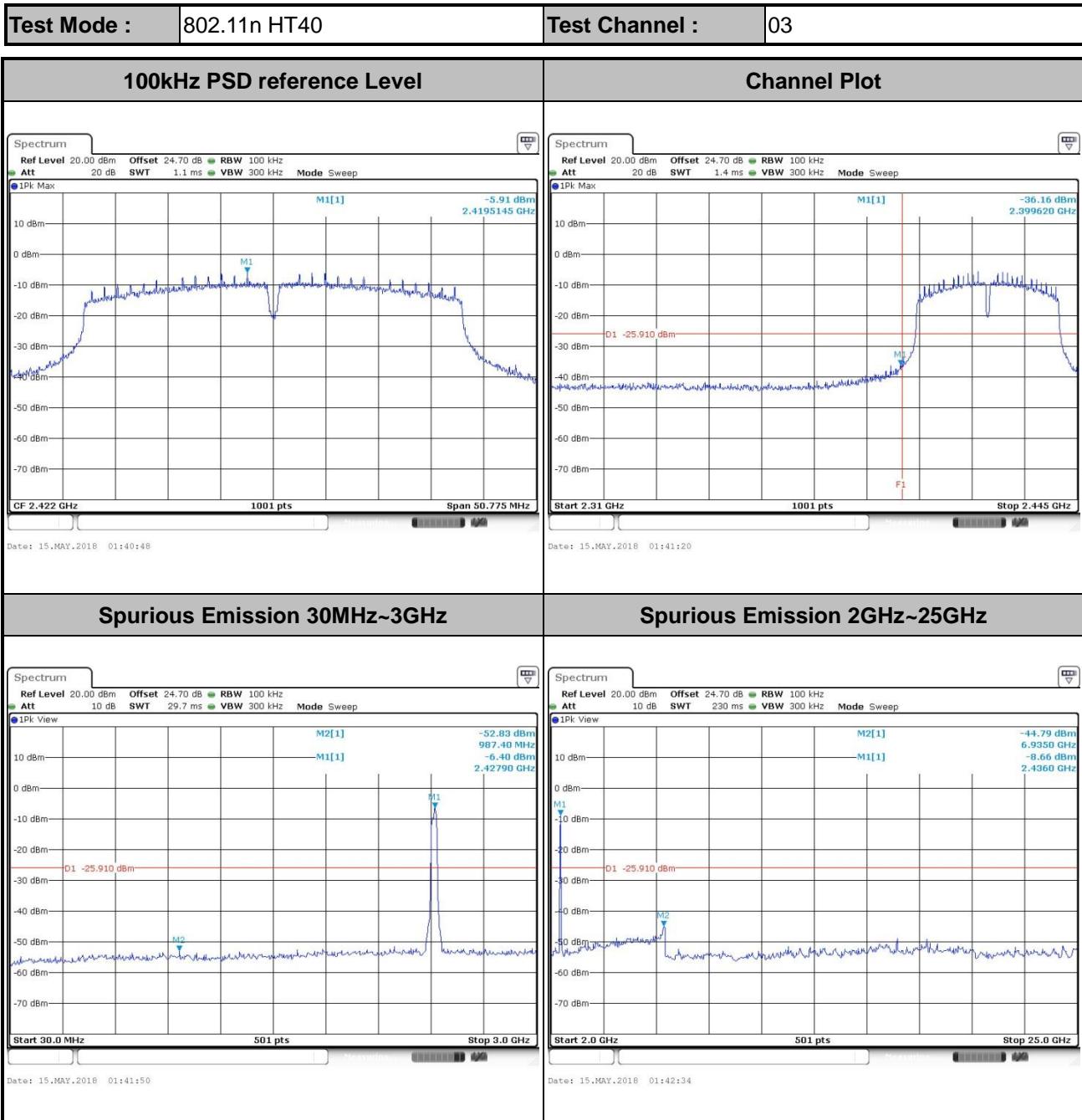
Test Mode :	802.11n HT20	Test Channel :	06
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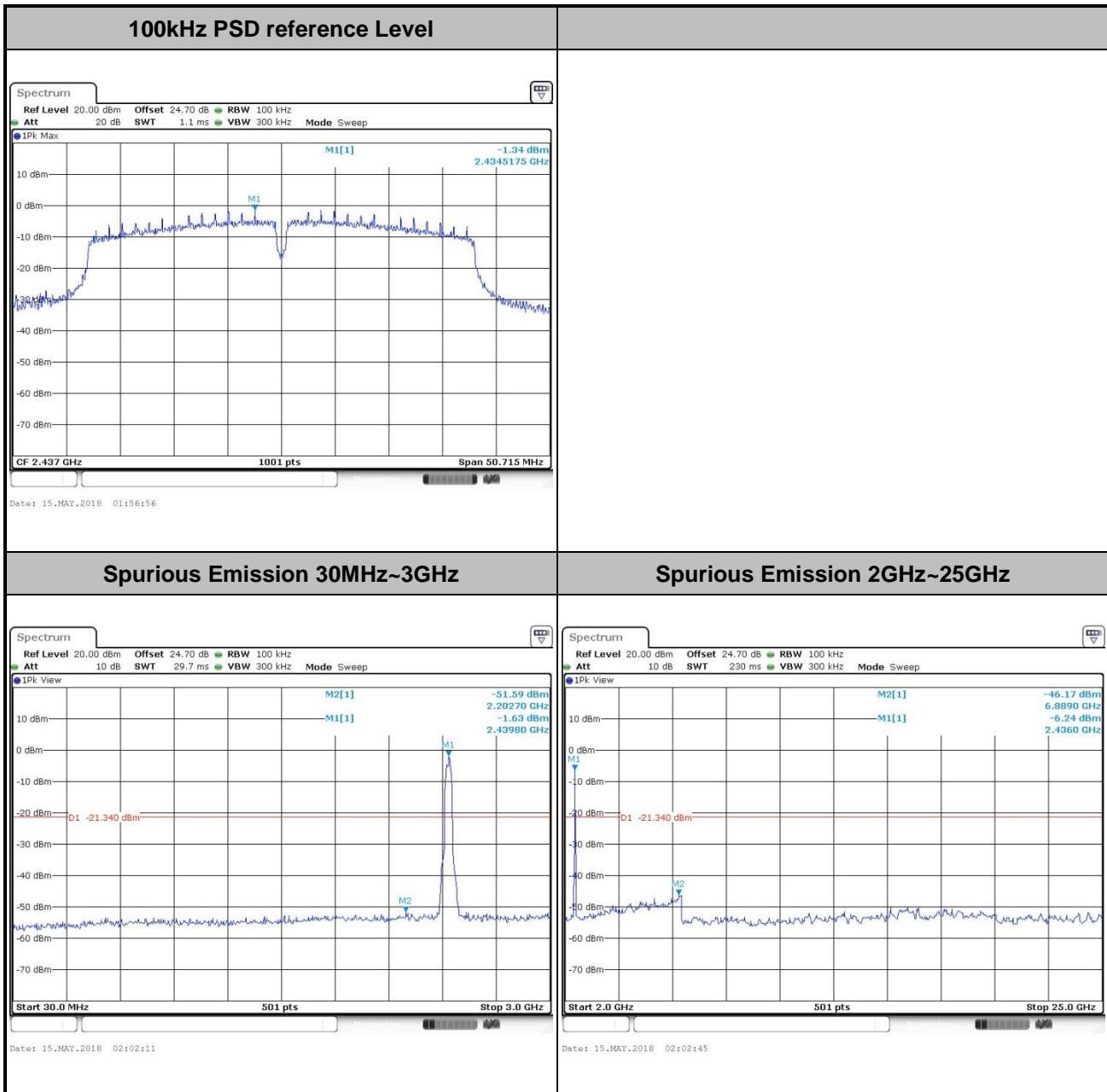
Test Mode :	802.11n HT20	Test Channel :	11
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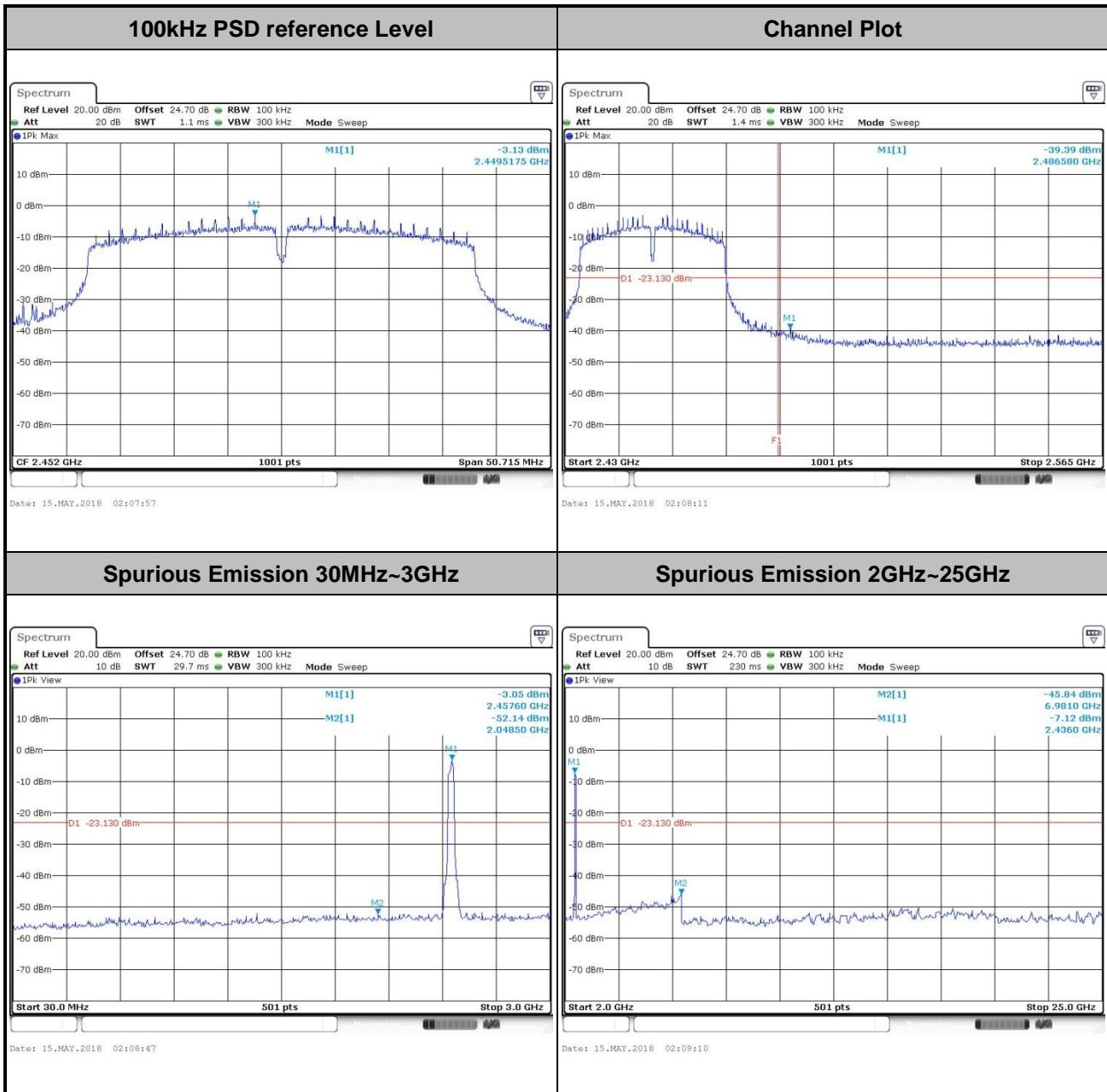


Test Mode :	802.11n HT40	Test Channel :	06
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Test Mode :	802.11n HT40	Test Channel :	09
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3.5 Radiated Band Edges and Spurious Emission Measurement

3.5.1 Limit of Radiated band edge and Spurious Emission Measurement

In any 100 kHz bandwidth outside the intentional radiator frequency band, all harmonics/spurious must be at least 20 dB below the highest emission level within the authorized band. If the output power of this device was measured by spectrum analyzer, the attenuation under this paragraph shall be 30 dB instead of 20 dB. In addition, radiated emissions which fall in the restricted bands must also comply with the limits as below.

Frequency (MHz)	Field Strength (microvolts/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

3.5.2 Measuring Instruments

See list of measuring equipment of this test report.



3.5.3 Test Procedures

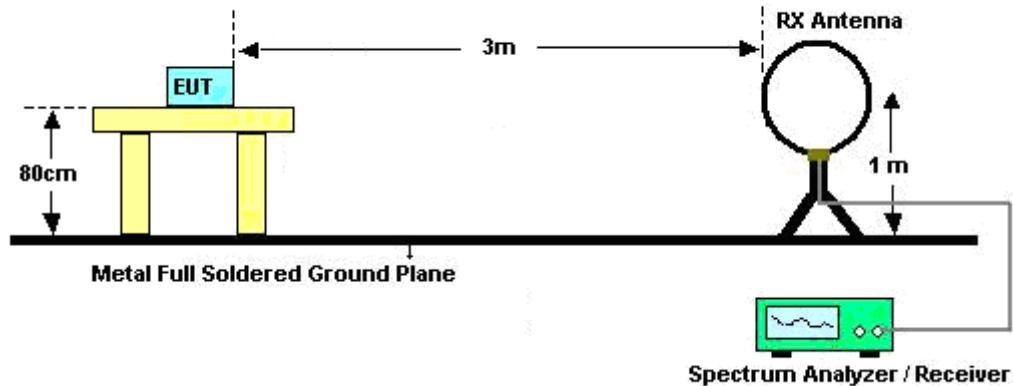
1. The testing follows FCC KDB Publication No. 558074 D01 DTS Meas. Guidance v04.
2. The EUT was arranged to its worst case and then tune the antenna tower (from 1 m to 4 m) and turntable (from 0 degree to 360 degrees) to find the maximum reading. A pre-amp and a high pass filter are used for the test in order to get better signal level.
3. The EUT was placed on a turntable with 0.8 meter for frequency below 1GHz and 1.5 meter for frequency above 1GHz respectively above ground.
4. The EUT was set 3 meters from the interference receiving antenna, which was mounted on the top of a variable height antenna tower.
5. Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level
6. For testing below 1GHz, if the emission level of the EUT in peak mode was 3 dB lower than the limit specified, then peak values of EUT will be reported, otherwise, the emissions will be repeated one by one using the CISPR quasi-peak method and reported.
7. For testing above 1GHz, the emission level of the EUT in peak mode was 20dB lower than average limit (that means the emission level in average mode also complies with the limit in average mode), then peak values of EUT will be reported, otherwise, the emissions will be measured in average mode again and reported.
8. Use the following spectrum analyzer settings:
 - (1) Span shall wide enough to fully capture the emission being measured;
 - (2) Set RBW=100 kHz for $f < 1$ GHz; VBW \geq RBW; Sweep = auto; Detector function = peak; Trace = max hold;
 - (3) Set RBW = 1 MHz, VBW= 3MHz for $f \geq 1$ GHz for peak measurement.

For average measurement:

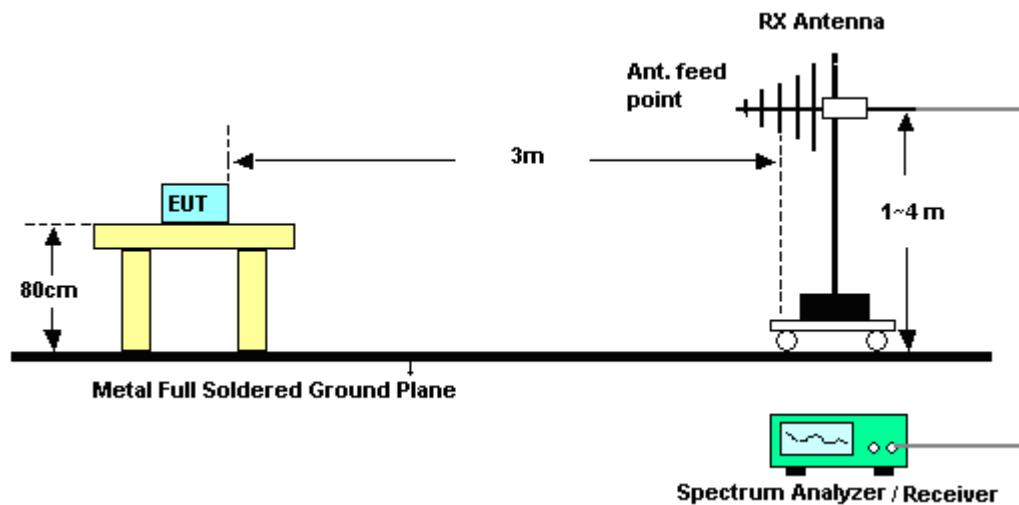
 - VBW = 10 Hz, when duty cycle is no less than 98 percent.
 - $VBW \geq 1/T$, when duty cycle is less than 98 percent where T is the minimum transmission duration over which the transmitter is on and is transmitting at its maximum power control level for the tested mode of operation.

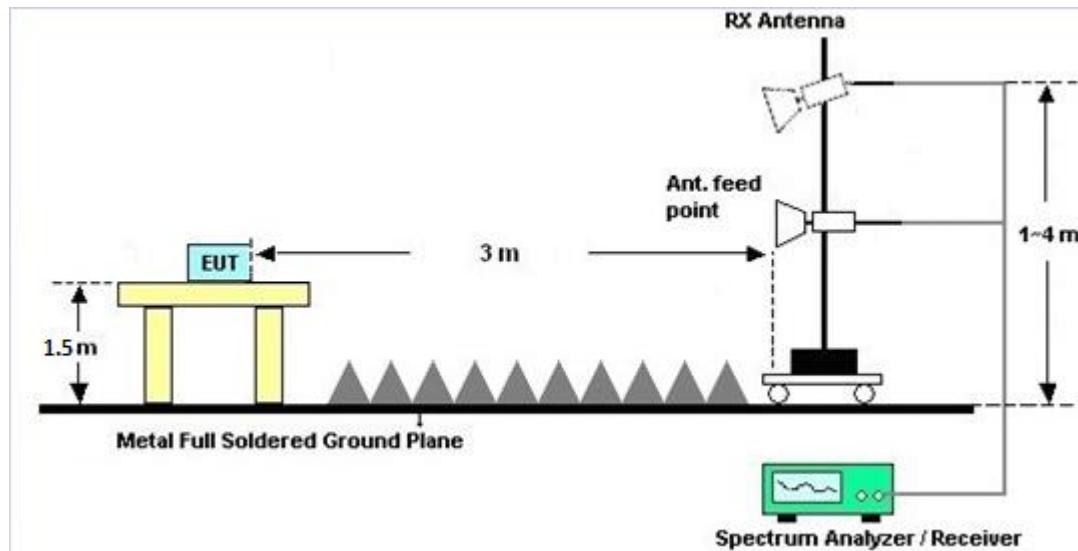
3.5.4 Test Setup

For radiated emissions below 30MHz



For radiated emissions from 30MHz to 1GHz



For radiated emissions above 1GHz**3.5.5 Test Results of Radiated Spurious Emissions (9kHz ~ 30MHz)**

The low frequency, which started from 9 kHz to 30MHz, was pre-scanned and the result which was 20dB lower than the limit line was not reported.

There is a comparison data of both open-field test site and semi-Anechoic chamber, and the result came out very similar.

3.5.6 Test Result of Radiated Spurious at Band Edges

Please refer to Appendix C and D.

3.5.7 Duty Cycle

Please refer to Appendix E.

3.5.8 Test Result of Radiated Spurious Emission (30MHz ~ 10th Harmonic)

Please refer to Appendix C and D.



3.6 AC Conducted Emission Measurement

3.6.1 Limit of AC Conducted Emission

For equipment that is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC power line on any frequency or frequencies within the band 150 kHz to 30 MHz shall not exceed the limits in the following table.

Frequency of Emission (MHz)	Conducted Limit (dB μ V)	
	Quasi-Peak	Average
0.15-0.5	66 to 56*	56 to 46*
0.5-5	56	46
5-30	60	50

*Decreases with the logarithm of the frequency.

The verified testing which follows the KDB 174176 D01 Q5 to make sure the 13.56MHz signal is coupling by NFC antenna.

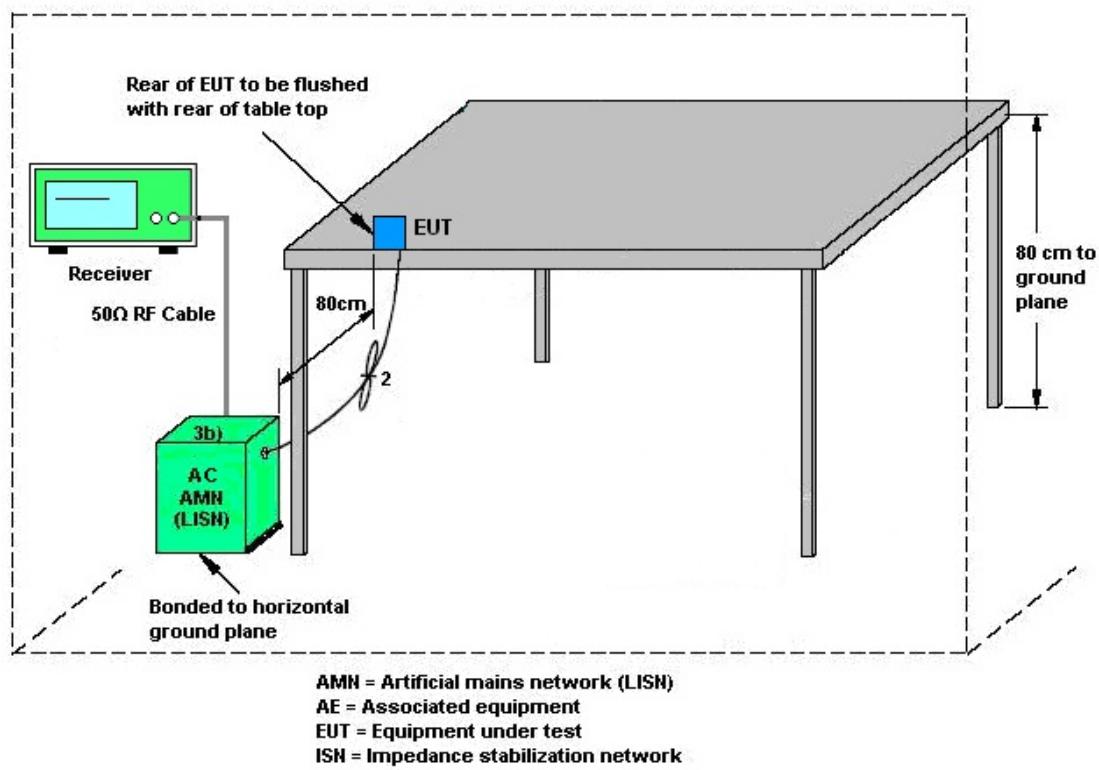
3.6.2 Measuring Instruments

See list of measuring equipment of this test report.

3.6.3 Test Procedures

1. The EUT was placed 0.4 meter from the conducting wall of the shielding room, and it was kept at least 80 centimeters from any other grounded conducting surface.
2. Connect EUT to the power mains through a line impedance stabilization network (LISN).
3. All the support units are connecting to the other LISN.
4. The LISN provides 50 ohm coupling impedance for the measuring instrument.
5. The FCC states that a 50 ohm, 50 microhenry LISN should be used.
6. Both sides of AC line were checked for maximum conducted interference.
7. The frequency range from 150 kHz to 30 MHz was searched.
8. Set the test-receiver system to Peak Detect Function and specified bandwidth (IF bandwidth = 9kHz) with Maximum Hold Mode.

3.6.4 Test Setup



3.6.5 Test Result of AC Conducted Emission

Please refer to Appendix B.



3.7 Antenna Requirements

3.7.1 Standard Applicable

If directional gain of transmitting Antennas is greater than 6dBi, the power shall be reduced by the same level in dB comparing to gain minus 6dBi. The use of a permanently attached Antenna or of an Antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the rule.

3.7.2 Antenna Anti-Replacement Construction

An embedded-in antenna design is used.

3.7.3 Antenna Gain

The antenna peak gain of EUT is less than 6 dBi. Therefore, it is not necessary to reduce maximum peak output power limit.



4 List of Measuring Equipment

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Test Date	Due Date	Remark
Power Meter	Anritsu	ML2495A	1240001	N/A	Sep. 07, 2017	Apr. 23, 2018 ~ May 15, 2018	Sep. 06, 2018	Conducted (TH05-HY)
Power Sensor	Anritsu	MA2411B	1207349	300MHz~40GHz	Sep. 07, 2017	Apr. 23, 2018 ~ May 15, 2018	Sep. 06, 2018	Conducted (TH05-HY)
Signal Analyzer	Rohde & Schwarz	FSV40	101408	10Hz~40GHz	Jul. 20, 2017	Apr. 23, 2018 ~ May 15, 2018	Jun. 19, 2018	Conducted (TH05-HY)
AC Power Source	ChainTek	APC-1000W	N/A	N/A	N/A	May 15, 2018~ May 22, 2018	N/A	Conduction (CO05-HY)
EMI Test Receiver	Rohde & Schwarz	ESR3	102388	3.6GHz	Dec. 08, 2017	May 15, 2018~ May 22, 2018	Dec. 07, 2018	Conduction (CO05-HY)
LISN	Rohde & Schwarz	ENV216	100080	9kHz~30MHz	Nov. 30, 2017	May 15, 2018~ May 22, 2018	Nov. 29, 2018	Conduction (CO05-HY)
Test Software	Rohde & Schwarz	EMC32 V10.30	N/A	N/A	N/A	May 15, 2018~ May 22, 2018	N/A	Conduction (CO05-HY)
LF Cable	HUBER + SUHNER	RG-214/U	LF01	N/A	Jan. 03, 2018	May 15, 2018~ May 22, 2018	Jan. 02, 2019	Conduction (CO05-HY)
Pulse Limiter	Rohde & Schwarz	ESH3-Z2	100851	N/A	Jan. 03, 2018	May 15, 2018~ May 22, 2018	Jan. 02, 2019	Conduction (CO05-HY)
Bilog Antenna	TESEQ	CBL 6111D&00800 N1D01N-06	35419&03	30MHz to 1GHz	Dec. 18, 2017	May 04, 2018 ~ May 10, 2018	Dec. 17, 2018	Radiation (03CH07-HY)
Double Ridge Horn Antenna	ESCO	3117	00075962	1GHz ~ 18GHz	Aug. 23, 2017	May 04, 2018 ~ May 10, 2018	Aug. 22, 2018	Radiation (03CH07-HY)
Loop Antenna	Rohde & Schwarz	HFH2-Z2	100315	9 kHz~30 MHz	Nov. 10, 2017	May 04, 2018 ~ May 10, 2018	Nov. 09, 2018	Radiation (03CH07-HY)
Preamplifier	MITEQ	AMF-7D-0010 1800-30-10P	1590075	1GHz ~ 18GHz	Apr. 25, 2018	May 04, 2018 ~ May 10, 2018	Apr. 24, 2019	Radiation (03CH07-HY)
Preamplifier	Agilent	8449B	3008A023 62	1GHz~ 26.5GHz	Oct. 30, 2017	May 04, 2018 ~ May 10, 2018	Oct. 29, 2018	Radiation (03CH07-HY)
Spectrum Analyzer	Agilent	N9010A	MY534701 18	10Hz~44GHz	Apr. 17, 2018	May 04, 2018 ~ May 10, 2018	Apr. 16, 2019	Radiation (03CH07-HY)
Antenna Mast	Max-Full	MFA520BS	N/A	1m~4m	N/A	May 04, 2018 ~ May 10, 2018	N/A	Radiation (03CH07-HY)
Turn Table	ChainTek	Chaintek 3000	N/A	0~360 Degree	N/A	May 04, 2018 ~ May 10, 2018	N/A	Radiation (03CH07-HY)
Amplifier	MITEQ	TTA1840-35-HG	1871923	18GHz~40GHz, VSWR : 2.5:1 max	Jul. 18, 2017	May 04, 2018 ~ May 10, 2018	Jul. 17, 2018	Radiation (03CH07-HY)
SHF-EHF Horn Antenna	SCHWARZBECK	BBHA9170 251	BBHA9170 251	18GHz- 40GHz	Nov. 10, 2017	May 04, 2018 ~ May 10, 2018	Nov. 09, 2018	Radiation (03CH07-HY)
Amplifier	SONOMA	310N	187231	9kHz~1GHz	Jan. 08, 2018	May 04, 2018 ~ May 10, 2018	Jan. 07, 2019	Radiation (03CH07-HY)
EMI Test Receiver	Agilent	N9038A (MXE)	MY532900 53	20Hz to 26.5GHz	Jan. 16, 2018	May 04, 2018 ~ May 10, 2018	Jan. 15, 2019	Radiation (03CH07-HY)
Test Software	Audix	E3 6.2009-8-24	N/A	N/A	N/A	May 04, 2018 ~ May 10, 2018	N/A	Radiation (03CH07-HY)



5 Uncertainty of Evaluation

Uncertainty of Conducted Emission Measurement (150 kHz ~ 30 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ($U = 2U_{c(y)}$)	2.7
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Uncertainty of Radiated Emission Measurement (30 MHz ~ 1000 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ($U = 2U_{c(y)}$)	5.7
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Uncertainty of Radiated Emission Measurement (1000 MHz ~ 18000 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ($U = 2U_{c(y)}$)	5.5
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Uncertainty of Radiated Emission Measurement (18000 MHz ~ 40000 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ($U = 2U_{c(y)}$)	5.2
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Appendix A. Test Result of Conducted Test Items

Test Engineer:	Eason Huang / Kai Liao	Temperature:	21~25	°C
Test Date:	2018/04/23~2018/05/15	Relative Humidity:	51~54	%

TEST RESULTS DATA
6dB and 99% Occupied Bandwidth

2.4GHz Band								
Mod.	Data Rate	N _{Tx}	CH.	Freq. (MHz)	99% Occupied BW (MHz)	6dB BW (MHz)	6dB BW Limit (MHz)	Pass/Fail
					Ant 1	Ant 1		
11b	1Mbps	1	1	2412	14.84	10.05	0.50	Pass
11b	1Mbps	1	6	2437	14.74	10.07	0.50	Pass
11b	1Mbps	1	11	2462	14.84	10.07	0.50	Pass
11g	6Mbps	1	1	2412	18.98	15.10	0.50	Pass
11g	6Mbps	1	6	2437	21.72	15.06	0.50	Pass
11g	6Mbps	1	11	2462	18.98	15.08	0.50	Pass
HT20	MCS0	1	1	2412	19.78	15.08	0.50	Pass
HT20	MCS0	1	6	2437	21.03	15.08	0.50	Pass
HT20	MCS0	1	11	2462	19.68	15.06	0.50	Pass
HT40	MCS0	1	3	2422	36.66	33.85	0.50	Pass
HT40	MCS0	1	6	2437	36.46	33.81	0.50	Pass
HT40	MCS0	1	9	2452	36.56	33.81	0.50	Pass

TEST RESULTS DATA
Peak Output Power

2.4GHz Band										
Mod.	Data Rate	Ntx	CH.	Freq. (MHz)	Peak Conducted Power (dBm)	Conducted Power Limit (dBm)	DG (dBi)	EIRP Power (dBm)	EIRP Power Limit (dBm)	Pass /Fail
					Ant 1	Ant 1	Ant 1	Ant 1	Ant 1	
11b	1Mbps	1	1	2412	15.84	30.00	1.30	17.14	36.00	Pass
11b	1Mbps	1	6	2437	17.00	30.00	1.30	18.30	36.00	Pass
11b	1Mbps	1	11	2462	15.31	30.00	1.30	16.61	36.00	Pass
11g	6Mbps	1	1	2412	18.84	30.00	1.30	20.14	36.00	Pass
11g	6Mbps	1	6	2437	19.32	30.00	1.30	20.62	36.00	Pass
11g	6Mbps	1	11	2462	19.31	30.00	1.30	20.61	36.00	Pass
HT20	MCS0	1	1	2412	18.78	30.00	1.30	20.08	36.00	Pass
HT20	MCS0	1	6	2437	19.34	30.00	1.30	20.64	36.00	Pass
HT20	MCS0	1	11	2462	19.25	30.00	1.30	20.55	36.00	Pass
HT40	MCS0	1	3	2422	15.42	30.00	1.30	16.72	36.00	Pass
HT40	MCS0	1	6	2437	19.04	30.00	1.30	20.34	36.00	Pass
HT40	MCS0	1	9	2452	18.87	30.00	1.30	20.17	36.00	Pass

Note: Measured power (dBm) has offset with cable loss.

TEST RESULTS DATA
Average Output Power

2.4GHz Band							
Mod.	Data Rate	Ntx	CH.	Freq. (MHz)	Duty Factor (dB)	Average Conducted Power (dBm)	
						Ant 1	Ant 1
							SUM
11b	1Mbps	1	1	2412	0.12	13.77	
11b	1Mbps	1	6	2437	0.12	15.16	
11b	1Mbps	1	11	2462	0.12	13.55	
11g	6Mbps	1	1	2412	0.63	11.97	
11g	6Mbps	1	6	2437	0.63	14.99	
11g	6Mbps	1	11	2462	0.63	12.45	
HT20	MCS0	1	1	2412	0.67	11.09	
HT20	MCS0	1	6	2437	0.67	14.15	
HT20	MCS0	1	11	2462	0.67	12.10	
HT40	MCS0	1	3	2422	1.28	7.56	
HT40	MCS0	1	6	2437	1.28	11.84	
HT40	MCS0	1	9	2452	1.28	10.15	

Note: Measured power (dBm) has offset with cable loss.

TEST RESULTS DATA
Peak Power Spectral Density

2.4GHz Band								
Mod.	Data Rate	N _{Tx}	CH.	Freq. (MHz)	Peak PSD (dBm/3kHz)	DG (dBi)	Peak PSD Limit (dBm/3kHz)	Pass/Fail
					Ant 1	Ant 1	Ant 1	
11b	1Mbps	1	1	2412	-8.84	1.30	8.00	Pass
11b	1Mbps	1	6	2437	-8.43	1.30	8.00	Pass
11b	1Mbps	1	11	2462	-9.47	1.30	8.00	Pass
11g	6Mbps	1	1	2412	-12.08	1.30	8.00	Pass
11g	6Mbps	1	6	2437	-10.67	1.30	8.00	Pass
11g	6Mbps	1	11	2462	-12.58	1.30	8.00	Pass
HT20	MCS0	1	1	2412	-14.17	1.30	8.00	Pass
HT20	MCS0	1	6	2437	-11.12	1.30	8.00	Pass
HT20	MCS0	1	11	2462	-12.47	1.30	8.00	Pass
HT40	MCS0	1	3	2422	-20.83	1.30	8.00	Pass
HT40	MCS0	1	6	2437	-17.17	1.30	8.00	Pass
HT40	MCS0	1	9	2452	-17.59	1.30	8.00	Pass

Measured power density (dBm) has offset with cable loss.



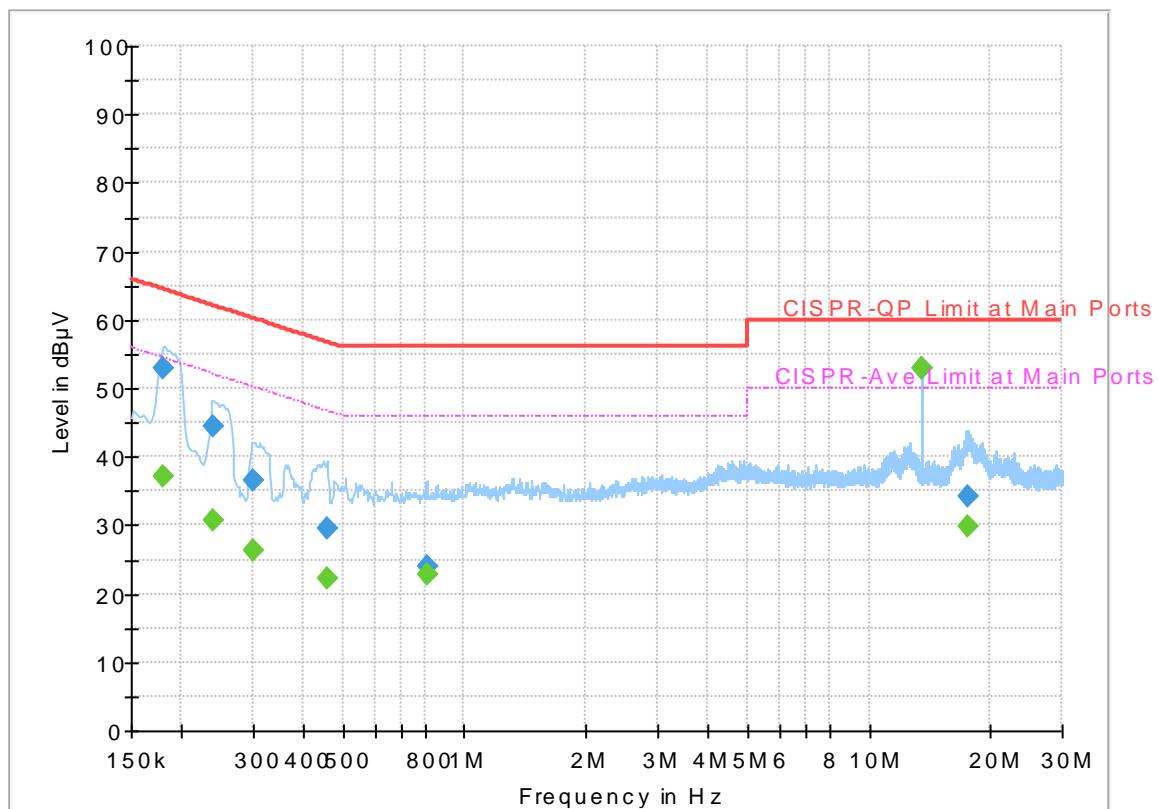
Appendix B. AC Conducted Emission Test Results

Test Engineer :	Shateef Yu and Arthur Hsieh	Temperature :	21~25°C
		Relative Humidity :	51~55%

EUT Information

Report NO : 821203-02
 Test Mode : Mode 1
 Test Voltage : 120Vac/60Hz
 Phase : Line
 Original Mode: testing with NFC work

Full Spectrum



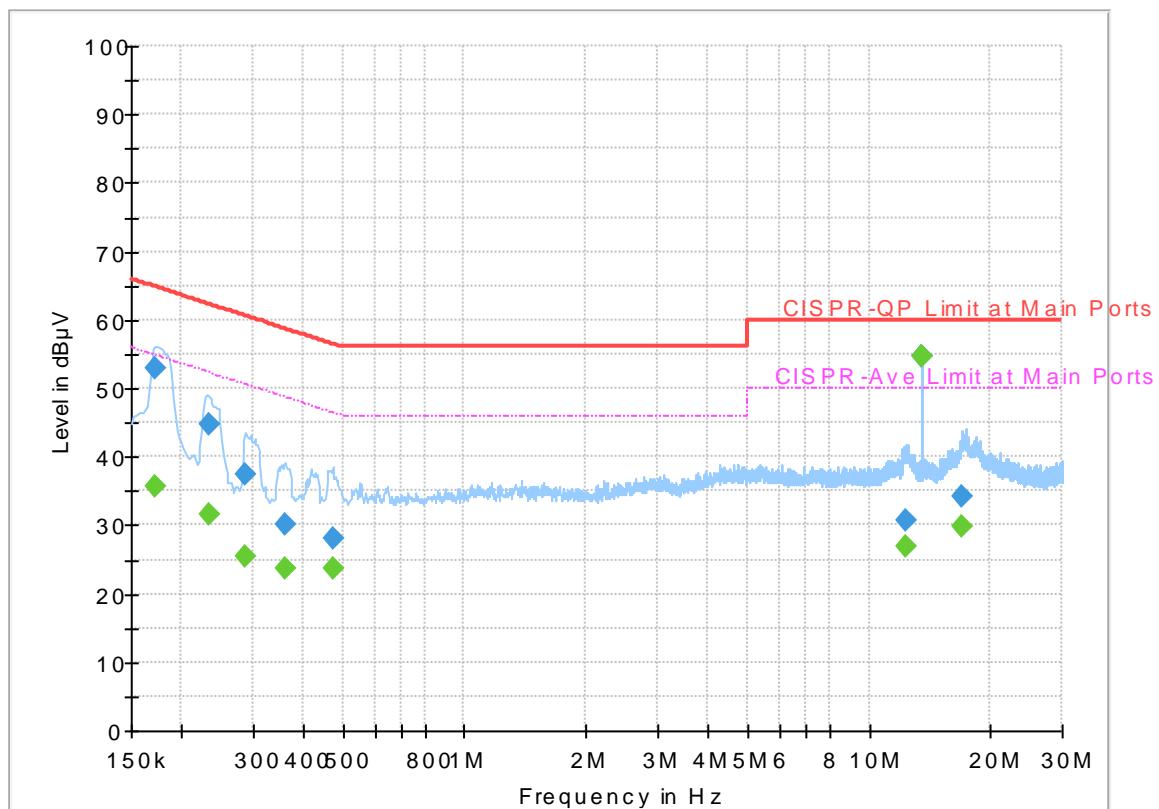
Final Result

Frequency (MHz)	QuasiPeak (dBμV)	CAverage (dBμV)	Limit (dBμV)	Margin (dB)	Line	Filter	Corr. (dB)
0.179250	---	37.27	54.52	17.25	L1	OFF	19.5
0.179250	53.02	---	64.52	11.50	L1	OFF	19.5
0.240000	---	30.67	52.10	21.43	L1	OFF	19.5
0.240000	44.34	---	62.10	17.76	L1	OFF	19.5
0.300750	---	26.17	50.22	24.05	L1	OFF	19.5
0.300750	36.62	---	60.22	23.60	L1	OFF	19.5
0.456000	---	22.26	46.77	24.51	L1	OFF	19.5
0.456000	29.60	---	56.77	27.17	L1	OFF	19.5
0.807000	---	22.69	46.00	23.31	L1	OFF	19.5
0.807000	24.04	---	56.00	31.96	L1	OFF	19.5
13.560000	---	53.01	50.00	-3.01	L1	OFF	19.7
13.560000	52.88	---	60.00	7.12	L1	OFF	19.7
17.580750	---	29.81	50.00	20.19	L1	OFF	19.8
17.580750	34.28	---	60.00	25.72	L1	OFF	19.8

EUT Information

Report NO : 821203-02
 Test Mode : Mode 1
 Test Voltage : 120Vac/60Hz
 Phase : Neutral
 Original Mode: testing with NFC work

Full Spectrum



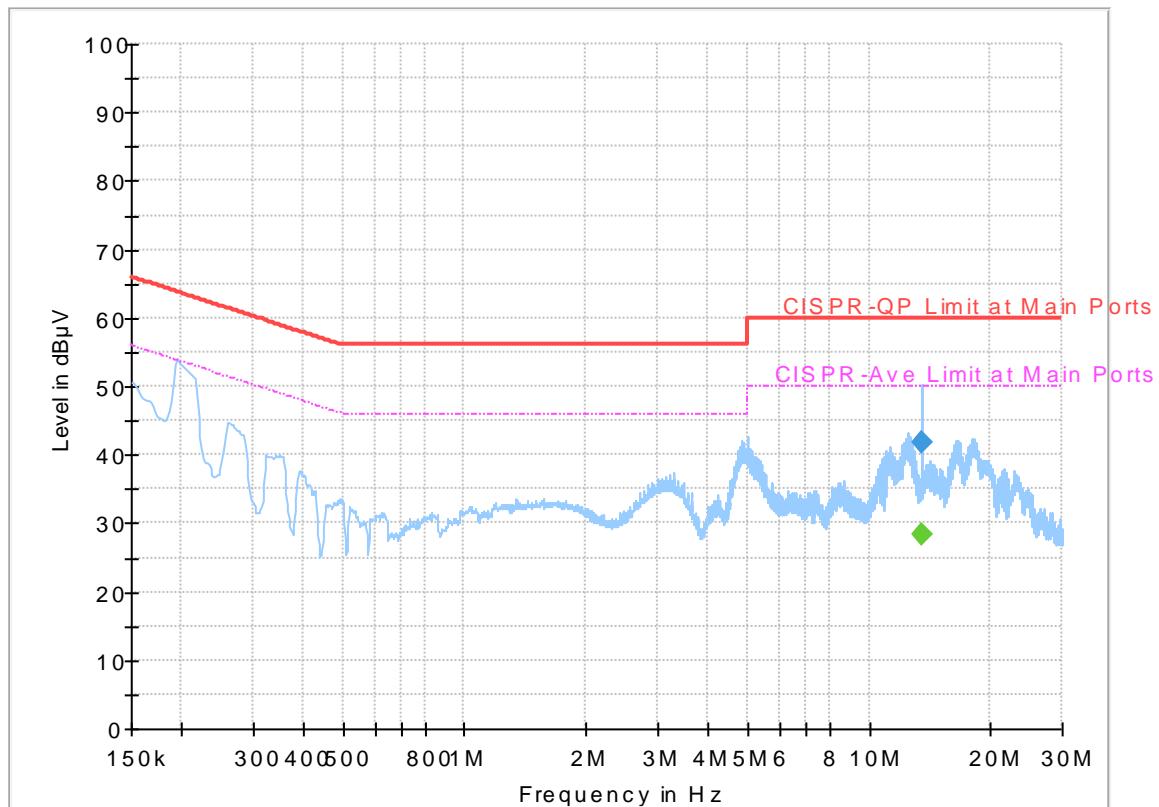
Final Result

Frequency (MHz)	QuasiPeak (dB μ V)	CAverage (dB μ V)	Limit (dB μ V)	Margin (dB)	Line	Filter	Corr. (dB)
0.172500	---	35.81	54.84	19.03	N	OFF	19.5
0.172500	52.82	---	64.84	12.02	N	OFF	19.5
0.233250	---	31.53	52.33	20.80	N	OFF	19.5
0.233250	44.76	---	62.33	17.57	N	OFF	19.5
0.287250	---	25.41	50.60	25.19	N	OFF	19.5
0.287250	37.39	---	60.60	23.21	N	OFF	19.5
0.359250	---	23.72	48.75	25.03	N	OFF	19.5
0.359250	30.02	---	58.75	28.73	N	OFF	19.5
0.471750	---	23.66	46.48	22.82	N	OFF	19.5
0.471750	28.17	---	56.48	28.31	N	OFF	19.5
12.306750	---	26.95	50.00	23.05	N	OFF	19.7
12.306750	30.72	---	60.00	29.28	N	OFF	19.7
13.560000	---	54.72	50.00	-4.72	N	OFF	19.8
13.560000	54.60	---	60.00	5.40	N	OFF	19.8
17.013750	---	29.90	50.00	20.10	N	OFF	19.8
17.013750	34.28	---	60.00	25.72	N	OFF	19.8

EUT Information

Report NO : 821203-02
Test Mode : Mode 1
Test Voltage : 120Vac/60Hz
Phase : Line
Terminal Mode: testing with NFC antenna terminated

Full Spectrum



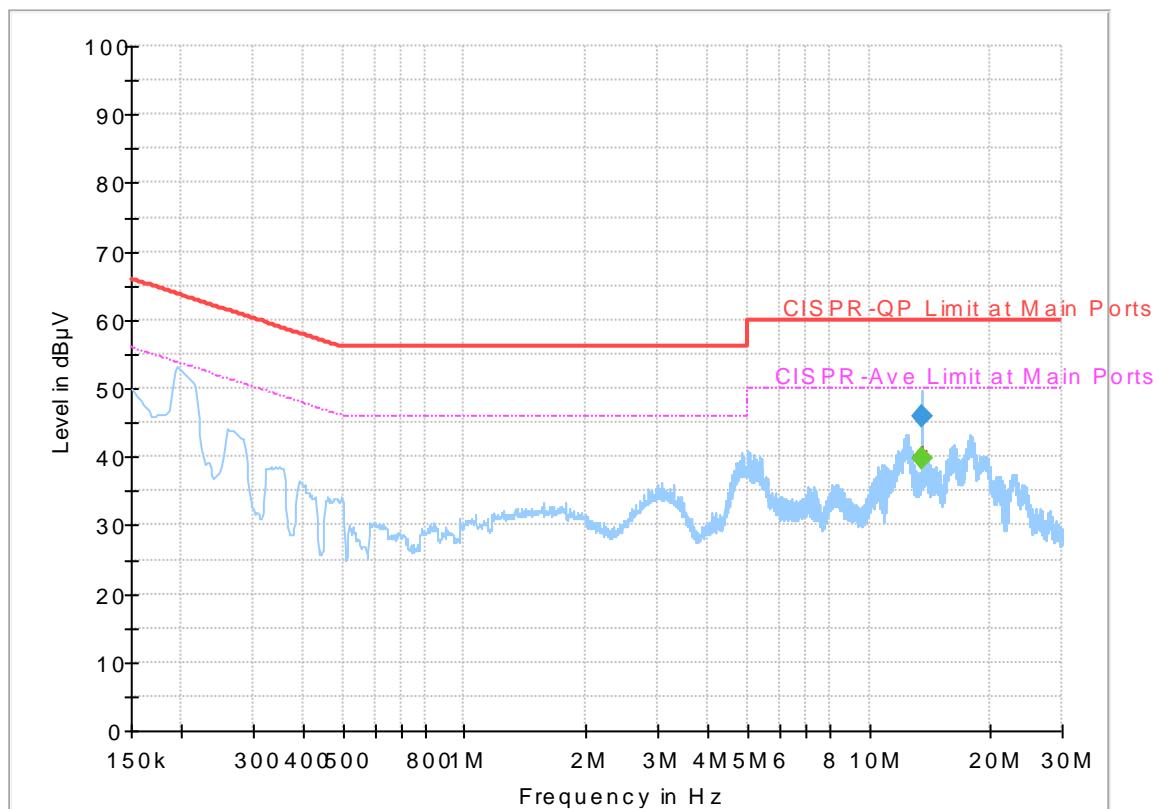
Final Result

Frequency (MHz)	QuasiPeak (dB μ V)	CAverage (dB μ V)	Limit (dB μ V)	Margin (dB)	Line	Filter	Corr. (dB)
13.560000	---	28.29	50.00	21.71	L1	OFF	19.7
13.560000	41.86	---	60.00	18.14	L1	OFF	19.7

EUT Information

Report NO : 821203-02
Test Mode : Mode 1
Test Voltage : 120Vac/60Hz
Phase : Neutral
Terminal Mode: testing with NFC antenna terminated

Full Spectrum



Final Result

Frequency (MHz)	QuasiPeak (dB μ V)	CAverage (dB μ V)	Limit (dB μ V)	Margin (dB)	Line	Filter	Corr. (dB)
13.560000	---	37.50	50.00	12.50	N	OFF	19.8
13.560000	46.00	---	60.00	14.00	N	OFF	19.8



Appendix C. Radiated Spurious Emission

Test Engineer :	Jesse Wang, Stan Hsieh, and Lance Chuang	Temperature :	24~26°C
		Relative Humidity :	50~54%

<Sample 1>

2.4GHz 2400~2483.5MHz

WIFI 802.11b (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol.
802.11b CH 01 2412MHz		2330.475	54.39	-19.61	74	40.31	31.79	17.31	35.02	312	116	P	H
		2386.755	44.32	-9.68	54	29.98	31.95	17.43	35.04	312	116	A	H
	*	2412	98.6	-	-	84.23	31.99	17.43	35.05	312	116	P	H
	*	2412	95.59	-	-	81.22	31.99	17.43	35.05	312	116	A	H
													H
													H
		2390	54.22	-19.78	74	39.89	31.95	17.43	35.05	100	24	P	V
		2386.755	44.23	-9.77	54	29.89	31.95	17.43	35.04	100	24	A	V
	*	2412	95.29	-	-	80.92	31.99	17.43	35.05	100	24	P	V
	*	2412	92.14	-	-	77.77	31.99	17.43	35.05	100	24	A	V
802.11b CH 06 2437MHz													V
		2355.36	54.1	-19.9	74	39.89	31.87	17.37	35.03	304	116	P	H
		2385.32	43.81	-10.19	54	29.51	31.91	17.43	35.04	304	116	A	H
	*	2437	97.14	-	-	82.63	32.08	17.49	35.06	304	116	P	H
	*	2437	94.09	-	-	79.58	32.08	17.49	35.06	304	116	A	H
		2493.49	53.97	-20.03	74	39.3	32.2	17.55	35.08	304	116	P	H
		2485.72	44.2	-9.8	54	29.56	32.16	17.55	35.07	304	116	A	H
		2377.06	54.02	-19.98	74	39.78	31.91	17.37	35.04	100	26	P	V
		2389.52	43.82	-10.18	54	29.48	31.95	17.43	35.04	100	26	A	V
	*	2437	94.35	-	-	79.84	32.08	17.49	35.06	100	26	P	V
	*	2437	91.22	-	-	76.71	32.08	17.49	35.06	100	26	A	V
		2490.9	54.35	-19.65	74	39.67	32.2	17.55	35.07	100	26	P	V
		2492.79	44.09	-9.91	54	29.42	32.2	17.55	35.08	100	26	A	V



802.11b CH 11 2462MHz	*	2462	96.73	-	-	82.12	32.12	17.55	35.06	303	116	P	H
	*	2462	93.72	-	-	79.11	32.12	17.55	35.06	303	116	A	H
		2495.08	54.6	-19.4	74	39.93	32.2	17.55	35.08	303	116	P	H
		2483.72	44.37	-9.63	54	29.73	32.16	17.55	35.07	303	116	A	H
													H
													H
	*	2462	94.16	-	-	79.55	32.12	17.55	35.06	120	24	P	V
	*	2462	91	-	-	76.39	32.12	17.55	35.06	120	24	A	V
		2498.36	54.96	-19.04	74	40.29	32.2	17.55	35.08	120	24	P	V
		2485.08	44.24	-9.76	54	29.6	32.16	17.55	35.07	120	24	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11b (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11b CH 01 2412MHz		4824	53.74	-20.26	74	67.77	34.23	11.12	59.38	106	42	P	H
		4824	51.1	-2.9	54	65.13	34.23	11.12	59.38	106	42	A	H
													H
													H
		4824	55.99	-18.01	74	70.02	34.23	11.12	59.38	270	0	P	V
		4824	53.95	-0.05	54	67.98	34.23	11.12	59.38	270	0	A	V
													V
													V
802.11b CH 06 2437MHz		4874	54.35	-19.65	74	68.26	34.22	11.16	59.29	129	37	P	H
		4874	51.88	-2.12	54	65.79	34.22	11.16	59.29	129	37	A	H
		7311	43.06	-30.94	74	51.79	35.71	13.61	58.05	100	0	P	H
													H
		4874	55.47	-18.53	74	69.38	34.22	11.16	59.29	314	0	P	V
		4874	53.29	-0.71	54	67.2	34.22	11.16	59.29	314	0	A	V
		7311	48.43	-25.57	74	57.16	35.71	13.61	58.05	100	0	P	V
													V
802.11b CH 11 2462MHz		4924	51.88	-22.12	74	65.66	34.21	11.22	59.21	116	39	P	H
		4924	49.73	-4.27	54	63.51	34.21	11.22	59.21	116	39	A	H
		7386	44.06	-29.94	74	52.83	35.66	13.69	58.12	100	0	P	H
													H
		4924	54.68	-19.32	74	68.46	34.21	11.22	59.21	264	0	P	V
		4924	52.7	-1.3	54	66.48	34.21	11.22	59.21	264	0	A	V
		7386	48.21	-25.79	74	56.98	35.66	13.69	58.12	100	0	P	V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11g (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11g CH 01 2412MHz		2388.435	65.88	-8.12	74	51.54	31.95	17.43	35.04	315	122	P	H
		2390	53.42	-0.58	54	39.09	31.95	17.43	35.05	315	122	A	H
	*	2412	105.27	-	-	90.9	31.99	17.43	35.05	315	122	P	H
	*	2412	97.12	-	-	82.75	31.99	17.43	35.05	315	122	A	H
													H
													H
		2388.33	66.49	-7.51	74	52.15	31.95	17.43	35.04	100	7	P	V
		2390	52.61	-1.39	54	38.28	31.95	17.43	35.05	100	7	A	V
	*	2412	102.06	-	-	87.69	31.99	17.43	35.05	100	7	P	V
	*	2412	94.12	-	-	79.75	31.99	17.43	35.05	100	7	A	V
													V
													V
802.11g CH 06 2437MHz		2389.94	54.41	-19.59	74	40.08	31.95	17.43	35.05	346	120	P	H
		2384.9	44.81	-9.19	54	30.51	31.91	17.43	35.04	346	120	A	H
	*	2437	107.64	-	-	93.13	32.08	17.49	35.06	346	120	P	H
	*	2437	99.93	-	-	85.42	32.08	17.49	35.06	346	120	A	H
		2483.83	54.83	-19.17	74	40.19	32.16	17.55	35.07	346	120	P	H
		2483.5	45.11	-8.89	54	30.47	32.16	17.55	35.07	346	120	A	H
		2325.82	54.81	-19.19	74	40.73	31.79	17.31	35.02	100	26	P	V
		2385.74	44.84	-9.16	54	30.5	31.95	17.43	35.04	100	26	A	V
	*	2437	104.97	-	-	90.46	32.08	17.49	35.06	100	26	P	V
	*	2437	97.45	-	-	82.94	32.08	17.49	35.06	100	26	A	V
		2497.55	54.67	-19.33	74	40	32.2	17.55	35.08	100	26	P	V
		2494.47	44.94	-9.06	54	30.27	32.2	17.55	35.08	100	26	A	V



802.11g CH 11 2462MHz	*	2462	105.43	-	-	90.82	32.12	17.55	35.06	340	128	P	H
	*	2462	97.85	-	-	83.24	32.12	17.55	35.06	340	128	A	H
		2484.88	65.39	-8.61	74	50.75	32.16	17.55	35.07	340	128	P	H
		2483.56	52.57	-1.43	54	37.93	32.16	17.55	35.07	340	128	A	H
													H
													H
	*	2462	102.29	-	-	87.68	32.12	17.55	35.06	105	13	P	V
	*	2462	94.44	-	-	79.83	32.12	17.55	35.06	105	13	A	V
		2483.92	64.1	-9.9	74	49.46	32.16	17.55	35.07	105	13	P	V
		2483.68	50.52	-3.48	54	35.88	32.16	17.55	35.07	105	13	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11g (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11g CH 01 2412MHz		4824	61.11	-12.89	74	75.14	34.23	11.12	59.38	242	77	P	H
		4824	50.83	-3.17	54	64.86	34.23	11.12	59.38	242	77	A	H
													H
													H
		4824	60.13	-13.87	74	74.16	34.23	11.12	59.38	288	4	P	V
		4824	50.15	-3.85	54	64.18	34.23	11.12	59.38	288	4	A	V
													V
													V
802.11g CH 06 2437MHz		4874	60.08	-13.92	74	73.99	34.22	11.16	59.29	127	36	P	H
		4874	50.7	-3.3	54	64.61	34.22	11.16	59.29	127	36	A	H
		7311	46.01	-27.99	74	54.74	35.71	13.61	58.05	100	0	P	H
													H
		4874	62.35	-11.65	74	76.26	34.22	11.16	59.29	283	4	P	V
		4874	52.8	-1.2	54	66.71	34.22	11.16	59.29	283	4	A	V
		7311	49.76	-24.24	74	58.49	35.71	13.61	58.05	100	0	P	V
													V
802.11g CH 11 2462MHz		4924	58.71	-15.29	74	72.49	34.21	11.22	59.21	118	39	P	H
		4924	50.03	-3.97	54	63.81	34.21	11.22	59.21	118	39	A	H
		7386	44.62	-29.38	74	53.39	35.66	13.69	58.12	100	0	P	H
													H
		4924	61.48	-12.52	74	75.26	34.21	11.22	59.21	265	1	P	V
		4924	51.37	-2.63	54	65.15	34.21	11.22	59.21	265	1	A	V
		7386	50.63	-23.37	74	59.4	35.66	13.69	58.12	100	0	P	V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT20 CH 01 2412MHz		2389.485	67.42	-6.58	74	53.08	31.95	17.43	35.04	314	122	P	H
		2390	52.43	-1.57	54	38.1	31.95	17.43	35.05	314	122	A	H
	*	2412	105.41	-	-	91.04	31.99	17.43	35.05	314	122	P	H
	*	2412	96.17	-	-	81.8	31.99	17.43	35.05	314	122	A	H
													H
													H
		2390	63.69	-10.31	74	49.36	31.95	17.43	35.05	100	7	P	V
		2390	50.55	-3.45	54	36.22	31.95	17.43	35.05	100	7	A	V
	*	2412	101.73	-	-	87.36	31.99	17.43	35.05	100	7	P	V
	*	2412	92.78	-	-	78.41	31.99	17.43	35.05	100	7	A	V
													V
													V
802.11n HT20 CH 06 2437MHz		2369.22	54.17	-19.83	74	39.93	31.91	17.37	35.04	345	118	P	H
		2385.74	44.53	-9.47	54	30.19	31.95	17.43	35.04	345	118	A	H
	*	2437	106.68	-	-	92.17	32.08	17.49	35.06	345	118	P	H
	*	2437	99.05	-	-	84.54	32.08	17.49	35.06	345	118	A	H
		2488.94	54.78	-19.22	74	40.1	32.2	17.55	35.07	345	118	P	H
		2487.12	44.76	-9.24	54	30.12	32.16	17.55	35.07	345	118	A	H
		2385.18	53.69	-20.31	74	39.39	31.91	17.43	35.04	100	28	P	V
		2387	44.52	-9.48	54	30.18	31.95	17.43	35.04	100	28	A	V
	*	2437	103.27	-	-	88.76	32.08	17.49	35.06	100	28	P	V
	*	2437	95.34	-	-	80.83	32.08	17.49	35.06	100	28	A	V
		2495.66	54.65	-19.35	74	39.98	32.2	17.55	35.08	100	28	P	V
		2485.79	44.77	-9.23	54	30.13	32.16	17.55	35.07	100	28	A	V



802.11n HT20 CH 11 2462MHz	*	2462	104.85	-	-	90.24	32.12	17.55	35.06	341	128	P	H
	*	2462	97.44	-	-	82.83	32.12	17.55	35.06	341	128	A	H
		2484.24	65.18	-8.82	74	50.54	32.16	17.55	35.07	341	128	P	H
		2483.56	52.79	-1.21	54	38.15	32.16	17.55	35.07	341	128	A	H
													H
													H
	*	2462	102.03	-	-	87.42	32.12	17.55	35.06	122	14	P	V
	*	2462	94.2	-	-	79.59	32.12	17.55	35.06	122	14	A	V
		2483.64	63.88	-10.12	74	49.24	32.16	17.55	35.07	122	14	P	V
		2483.56	51.03	-2.97	54	36.39	32.16	17.55	35.07	122	14	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT20 CH 01 2412MHz		4824	54.83	-19.17	74	68.86	34.23	11.12	59.38	100	182	P	H
		4824	43.81	-10.19	54	57.84	34.23	11.12	59.38	100	182	A	H
													H
													H
		4824	58.12	-15.88	74	72.15	34.23	11.12	59.38	398	186	P	V
		4824	48.03	-5.97	54	62.06	34.23	11.12	59.38	398	186	A	V
													V
802.11n HT20 CH 06 2437MHz		4874	55.93	-18.07	74	69.84	34.22	11.16	59.29	252	105	P	H
		4874	45.34	-8.66	54	59.25	34.22	11.16	59.29	252	105	A	H
		7311	42.66	-31.34	74	51.39	35.71	13.61	58.05	100	0	P	H
													H
		4874	59.92	-14.08	74	73.83	34.22	11.16	59.29	364	185	P	V
		4874	49.54	-4.46	54	63.45	34.22	11.16	59.29	364	185	A	V
		7311	45.97	-28.03	74	54.7	35.71	13.61	58.05	100	0	P	V
802.11n HT20 CH 11 2462MHz		4924	49.42	-24.58	74	63.2	34.21	11.22	59.21	100	0	P	H
		7386	45.68	-28.32	74	54.45	35.66	13.69	58.12	100	0	P	H
													H
													H
		4924	58.71	-15.29	74	72.49	34.21	11.22	59.21	377	189	P	V
		4924	48.37	-5.63	54	62.15	34.21	11.22	59.21	377	189	A	V
		7386	46.03	-27.97	74	54.8	35.66	13.69	58.12	100	0	P	V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT40 CH 03 2422MHz		2381.12	66.48	-7.52	74	52.18	31.91	17.43	35.04	349	118	P	H
		2389.94	52.53	-1.47	54	38.2	31.95	17.43	35.05	349	118	A	H
	*	2422	98.5	-	-	84.04	32.03	17.49	35.06	349	118	P	H
	*	2422	91.3	-	-	76.84	32.03	17.49	35.06	349	118	A	H
		2499.44	54.19	-19.81	74	39.52	32.2	17.55	35.08	349	118	P	H
		2500	45.36	-8.64	54	30.69	32.2	17.55	35.08	349	118	A	H
		2384.76	63.76	-10.24	74	49.46	31.91	17.43	35.04	118	27	P	V
		2387.56	50.37	-3.63	54	36.03	31.95	17.43	35.04	118	27	A	V
	*	2422	95.86	-	-	81.4	32.03	17.49	35.06	118	27	P	V
	*	2422	88.37	-	-	73.91	32.03	17.49	35.06	118	27	A	V
802.11n HT40 CH 06 2437MHz		2484.32	54.4	-19.6	74	39.76	32.16	17.55	35.07	118	27	P	V
		2489.22	45.39	-8.61	54	30.71	32.2	17.55	35.07	118	27	A	V
		2389.52	60.11	-13.89	74	45.77	31.95	17.43	35.04	345	122	P	H
		2389.8	48.47	-5.53	54	34.14	31.95	17.43	35.05	345	122	A	H
	*	2437	101.34	-	-	86.83	32.08	17.49	35.06	345	122	P	H
	*	2437	94.19	-	-	79.68	32.08	17.49	35.06	345	122	A	H
		2484.04	61.36	-12.64	74	46.72	32.16	17.55	35.07	345	122	P	H
		2483.97	49.63	-4.37	54	34.99	32.16	17.55	35.07	345	122	A	H
		2389.38	62.37	-11.63	74	48.03	31.95	17.43	35.04	100	26	P	V
		2389.8	50.11	-3.89	54	35.78	31.95	17.43	35.05	100	26	A	V
2437MHz	*	2437	98.84	-	-	84.33	32.08	17.49	35.06	100	26	P	V
	*	2437	91.65	-	-	77.14	32.08	17.49	35.06	100	26	A	V
		2483.55	59.14	-14.86	74	44.5	32.16	17.55	35.07	100	26	P	V
		2483.76	49.62	-4.38	54	34.98	32.16	17.55	35.07	100	26	A	V



	2381.54	53.97	-20.03	74	39.67	31.91	17.43	35.04	340	120	P	H
	2338.14	45.09	-8.91	54	30.97	31.83	17.31	35.02	340	120	A	H
*	2452	99.95	-	-	85.44	32.08	17.49	35.06	340	120	P	H
*	2452	92.21	-	-	77.7	32.08	17.49	35.06	340	120	A	H
802.11n	2484.46	65.9	-8.1	74	51.26	32.16	17.55	35.07	340	120	P	H
HT40	2483.5	52.92	-1.08	54	38.28	32.16	17.55	35.07	340	120	A	H
CH 09	2346.4	54.05	-19.95	74	39.88	31.83	17.37	35.03	100	25	P	V
2452MHz	2387.42	45.06	-8.94	54	30.72	31.95	17.43	35.04	100	25	A	V
*	2452	97.71	-	-	83.2	32.08	17.49	35.06	100	25	P	V
*	2452	90.01	-	-	75.5	32.08	17.49	35.06	100	25	A	V
	2486.84	63.85	-10.15	74	49.21	32.16	17.55	35.07	100	25	P	V
	2484.04	51.25	-2.75	54	36.61	32.16	17.55	35.07	100	25	A	V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.											



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT40 CH 03 2422MHz		4844	46.93	-27.07	74	60.93	34.23	11.12	59.35	100	0	P	H
		7266	42.29	-31.71	74	51	35.73	13.58	58.02	100	0	P	H
													H
													H
		4844	49.88	-24.12	74	63.88	34.23	11.12	59.35	100	0	P	V
		7266	42.75	-31.25	74	51.46	35.73	13.58	58.02	100	0	P	V
													V
													V
802.11n HT40 CH 06 2437MHz		4874	47.82	-26.18	74	61.73	34.22	11.16	59.29	100	0	P	H
		7311	42.96	-31.04	74	51.69	35.71	13.61	58.05	100	0	P	H
													H
													H
		4874	55.43	-18.57	74	69.34	34.22	11.16	59.29	389	183	P	V
		4874	46.45	-7.55	54	60.36	34.22	11.16	59.29	389	183	A	V
		7311	42.44	-31.56	74	51.17	35.71	13.61	58.05	100	0	P	V
													V
802.11n HT40 CH 09 2452MHz		4904	45.71	-28.29	74	59.51	34.22	11.22	59.24	100	0	P	H
		7356	42.15	-31.85	74	50.91	35.68	13.65	58.09	100	0	P	H
													H
													H
		4904	49.35	-24.65	74	63.15	34.22	11.22	59.24	100	0	P	V
		7356	42.67	-31.33	74	51.43	35.68	13.65	58.09	100	0	P	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



Emission below 1GHz

2.4GHz WIFI 802.11b (LF)

WIFI	Note	Frequency	Level	Over	Limit	Read	Antenna	Path	Preamp	Ant	Table	Peak	Pol.
Ant.				Limit	Line	Level	Factor	Loss	Factor	Pos	Pos	Avg.	
1		(MHz)	(dB μ V/m)	(dB)	(dB μ V/m)	(dB μ V)	(dB/m)	(dB)	(dB)	(cm)	(deg)	(P/A)	(H/V)
2.4GHz 802.11b LF		188.22	39.43	-4.07	43.5	53.82	14.77	2.3	31.46	-	-	P	H
		191.46	39.99	-3.51	43.5	54.39	14.77	2.29	31.46	100	0	P	H
		196.05	31.75	-11.75	43.5	46.07	14.85	2.28	31.45	-	-	P	H
		446.3	35.95	-10.05	46	40.65	22.92	3.44	31.06	-	-	P	H
		458.9	38.22	-7.78	46	42.72	23.12	3.42	31.04	-	-	P	H
		470.8	41.06	-4.94	46	45.18	23.34	3.56	31.02	-	-	P	H
													H
													H
													H
													H
													H
													H
													H
													H
													H
													H
Remark	1.	No other spurious found.											
	2.	All results are PASS against limit line.											



<Sample 3>

2.4GHz 2400~2483.5MHz

WIFI 802.11b (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol.
802.11b CH 01 2412MHz		2386.02	55.25	-18.75	74	40.91	31.95	17.43	35.04	100	240	P	H
		2383.185	46.72	-7.28	54	32.42	31.91	17.43	35.04	100	240	A	H
	*	2412	105.73	-	-	91.36	31.99	17.43	35.05	100	240	P	H
	*	2412	102.65	-	-	88.28	31.99	17.43	35.05	100	240	A	H
													H
													H
		2383.08	54.43	-19.57	74	40.13	31.91	17.43	35.04	100	141	P	V
		2383.185	45.47	-8.53	54	31.17	31.91	17.43	35.04	100	141	A	V
	*	2412	104.34	-	-	89.97	31.99	17.43	35.05	100	141	P	V
	*	2412	101.24	-	-	86.87	31.99	17.43	35.05	100	141	A	V
802.11b CH 06 2437MHz		2388.82	55.01	-18.99	74	40.67	31.95	17.43	35.04	100	246	P	H
		2388.4	45.34	-8.66	54	31	31.95	17.43	35.04	100	246	A	H
	*	2437	106.98	-	-	92.47	32.08	17.49	35.06	100	246	P	H
	*	2437	103.82	-	-	89.31	32.08	17.49	35.06	100	246	A	H
		2485.79	54.76	-19.24	74	40.12	32.16	17.55	35.07	100	246	P	H
		2488.17	44.93	-9.07	54	30.25	32.2	17.55	35.07	100	246	A	H
		2344.3	54.24	-19.76	74	40.07	31.83	17.37	35.03	100	71	P	V
		2388.96	44.59	-9.41	54	30.25	31.95	17.43	35.04	100	71	A	V
	*	2437	105.9	-	-	91.39	32.08	17.49	35.06	100	71	P	V
	*	2437	102.79	-	-	88.28	32.08	17.49	35.06	100	71	A	V
		2496.71	54.32	-19.68	74	39.65	32.2	17.55	35.08	100	71	P	V
		2489.99	44.61	-9.39	54	29.93	32.2	17.55	35.07	100	71	A	V



802.11b CH 11 2462MHz	*	2462	105.55	-	-	90.94	32.12	17.55	35.06	100	250	P	H
	*	2462	102.55	-	-	87.94	32.12	17.55	35.06	100	250	A	H
		2488.92	55.63	-18.37	74	40.95	32.2	17.55	35.07	100	250	P	H
		2488.64	45.93	-8.07	54	31.25	32.2	17.55	35.07	100	250	A	H
													H
													H
	*	2462	103.36	-	-	88.75	32.12	17.55	35.06	100	136	P	V
	*	2462	100.27	-	-	85.66	32.12	17.55	35.06	100	136	A	V
		2486.44	55.23	-18.77	74	40.59	32.16	17.55	35.07	100	136	P	V
		2488.88	45.32	-8.68	54	30.64	32.2	17.55	35.07	100	136	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11b (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11b CH 01 2412MHz		4824	54.89	-19.11	74	68.92	34.23	11.12	59.38	101	239	P	H
		4824	52.43	-1.57	54	66.46	34.23	11.12	59.38	101	239	A	H
													H
													H
		4824	55.16	-18.84	74	69.19	34.23	11.12	59.38	100	346	P	V
		4824	53.51	-0.49	54	67.54	34.23	11.12	59.38	100	346	A	V
													V
													V
802.11b CH 06 2437MHz		4874	54.78	-19.22	74	68.69	34.22	11.16	59.29	100	231	P	H
		4874	52.36	-1.64	54	66.27	34.22	11.16	59.29	100	231	A	H
		7311	43.74	-30.26	74	52.47	35.71	13.61	58.05	100	0	P	H
													H
		4874	55.72	-18.28	74	69.63	34.22	11.16	59.29	115	104	P	V
		4874	53.76	-0.24	54	67.67	34.22	11.16	59.29	115	104	A	V
		7311	45.73	-28.27	74	54.46	35.71	13.61	58.05	100	0	P	V
													V
802.11b CH 11 2462MHz		4924	54.1	-19.9	74	67.88	34.21	11.22	59.21	100	221	P	H
		4924	50.52	-3.48	54	64.3	34.21	11.22	59.21	100	221	A	H
		7386	44.15	-29.85	74	52.92	35.66	13.69	58.12	100	0	P	H
													H
		4924	56.01	-17.99	74	69.79	34.21	11.22	59.21	100	97	P	V
		4924	53.96	-0.04	54	67.74	34.21	11.22	59.21	100	97	A	V
		7386	47.27	-26.73	74	56.04	35.66	13.69	58.12			P	V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11g (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11g CH 01 2412MHz		2389.275	67.59	-6.41	74	53.25	31.95	17.43	35.04	103	245	P	H
		2389.905	53.83	-0.17	54	39.5	31.95	17.43	35.05	103	245	A	H
	*	2412	107.47	-	-	93.1	31.99	17.43	35.05	103	245	P	H
	*	2412	99.82	-	-	85.45	31.99	17.43	35.05	103	245	A	H
													H
													H
		2389.8	61.01	-12.99	74	46.68	31.95	17.43	35.05	110	88	P	V
		2389.695	49.4	-4.6	54	35.06	31.95	17.43	35.04	110	88	A	V
	*	2412	104.62	-	-	90.25	31.99	17.43	35.05	110	88	P	V
	*	2412	96.58	-	-	82.21	31.99	17.43	35.05	110	88	A	V
													V
													V
802.11g CH 06 2437MHz		2386.44	57.35	-16.65	74	43.01	31.95	17.43	35.04	100	245	P	H
		2389.94	46.6	-7.4	54	32.27	31.95	17.43	35.05	100	245	A	H
	*	2437	109.74	-	-	95.23	32.08	17.49	35.06	100	245	P	H
	*	2437	101.86	-	-	87.35	32.08	17.49	35.06	100	245	A	H
		2486.77	55.79	-18.21	74	41.15	32.16	17.55	35.07	100	245	P	H
		2483.5	45.67	-8.33	54	31.03	32.16	17.55	35.07	100	245	A	H
		2389.24	56.78	-17.22	74	42.44	31.95	17.43	35.04	100	87	P	V
		2389.94	45.66	-8.34	54	31.33	31.95	17.43	35.05	100	87	A	V
	*	2437	109.04	-	-	94.53	32.08	17.49	35.06	100	87	P	V
	*	2437	101.2	-	-	86.69	32.08	17.49	35.06	100	87	A	V
		2492.02	55.5	-18.5	74	40.83	32.2	17.55	35.08	100	87	P	V
		2485.44	44.91	-9.09	54	30.27	32.16	17.55	35.07	100	87	A	V



802.11g CH 11 2462MHz	*	2462	106.57	-	-	91.96	32.12	17.55	35.06	100	246	P	H
	*	2462	99.63	-	-	85.02	32.12	17.55	35.06	100	246	A	H
		2485.96	66.5	-7.5	74	51.86	32.16	17.55	35.07	100	246	P	H
		2483.56	52.68	-1.32	54	38.04	32.16	17.55	35.07	100	246	A	H
													H
													H
	*	2462	106.24	-	-	91.63	32.12	17.55	35.06	137	144	P	V
	*	2462	98.37	-	-	83.76	32.12	17.55	35.06	137	144	A	V
		2483.56	67.73	-6.27	74	53.09	32.16	17.55	35.07	137	144	P	V
		2483.52	51.22	-2.78	54	36.58	32.16	17.55	35.07	137	144	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11g (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11g CH 01 2412MHz		4824	49.63	-24.37	74	63.66	34.23	11.12	59.38	100	0	P	H
													H
													H
													H
		4824	50.45	-23.55	74	64.48	34.23	11.12	59.38	400	223	P	V
		4824	41.22	-12.78	54	55.25	34.23	11.12	59.38	400	223	A	V
													V
													V
802.11g CH 06 2437MHz		4874	49.98	-24.02	74	63.89	34.22	11.16	59.29	100	0	P	H
		7311	43.06	-30.94	74	51.79	35.71	13.61	58.05	100	0	P	H
													H
		4874	53.55	-20.45	74	67.46	34.22	11.16	59.29	100	98	P	V
		4874	43.01	-10.99	54	56.92	34.22	11.16	59.29	100	98	A	V
		7311	45.86	-28.14	74	54.59	35.71	13.61	58.05	100	0	P	V
													V
802.11g CH 11 2462MHz		4924	53.09	-20.91	74	66.87	34.21	11.22	59.21	100	173	P	H
		4924	41.54	-12.46	54	55.32	34.21	11.22	59.21	100	173	A	H
		7386	43.72	-30.28	74	52.49	35.66	13.69	58.12	100	0	P	H
													H
		4924	54.43	-19.57	74	68.21	34.21	11.22	59.21	100	195	P	V
		4924	43.42	-10.58	54	57.2	34.21	11.22	59.21	100	195	A	V
		7386	44.3	-29.7	74	53.07	35.66	13.69	58.12	100	0	P	V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT20 CH 01 2412MHz		2389.905	67.56	-6.44	74	53.23	31.95	17.43	35.05	102	242	P	H
		2389.8	52.89	-1.11	54	38.56	31.95	17.43	35.05	102	242	A	H
	*	2412	106.51	-	-	92.14	31.99	17.43	35.05	102	242	P	H
	*	2412	98.83	-	-	84.46	31.99	17.43	35.05	102	242	A	H
													H
													H
		2389.38	65.33	-8.67	74	50.99	31.95	17.43	35.04	100	145	P	V
		2389.485	52.66	-1.34	54	38.32	31.95	17.43	35.04	100	145	A	V
	*	2412	105.23	-	-	90.86	31.99	17.43	35.05	100	145	P	V
	*	2412	97.51	-	-	83.14	31.99	17.43	35.05	100	145	A	V
													V
													V
802.11n HT20 CH 06 2437MHz		2377.2	56.54	-17.46	74	42.3	31.91	17.37	35.04	100	245	P	H
		2389.24	46.25	-7.75	54	31.91	31.95	17.43	35.04	100	245	A	H
	*	2437	108.71	-	-	94.2	32.08	17.49	35.06	100	245	P	H
	*	2437	101.03	-	-	86.52	32.08	17.49	35.06	100	245	A	H
		2493.21	54.82	-19.18	74	40.15	32.2	17.55	35.08	100	245	P	H
		2484.46	45.46	-8.54	54	30.82	32.16	17.55	35.07	100	245	A	H
		2386.72	55.26	-18.74	74	40.92	31.95	17.43	35.04	100	87	P	V
		2388.54	45.32	-8.68	54	30.98	31.95	17.43	35.04	100	87	A	V
	*	2437	107.59	-	-	93.08	32.08	17.49	35.06	100	87	P	V
	*	2437	100.32	-	-	85.81	32.08	17.49	35.06	100	87	A	V
		2495.38	54.41	-19.59	74	39.74	32.2	17.55	35.08	100	87	P	V
		2487.96	44.81	-9.19	54	30.13	32.2	17.55	35.07	100	87	A	V



802.11n HT20 CH 11 2462MHz	*	2462	106.93	-	-	92.32	32.12	17.55	35.06	100	248	P	H
	*	2462	99.22	-	-	84.61	32.12	17.55	35.06	100	248	A	H
		2484.48	65.37	-8.63	74	50.73	32.16	17.55	35.07	100	248	P	H
		2483.56	53.1	-0.9	54	38.46	32.16	17.55	35.07	100	248	A	H
													H
													H
	*	2462	105.78	-	-	91.17	32.12	17.55	35.06	133	144	P	V
	*	2462	98.21	-	-	83.6	32.12	17.55	35.06	133	144	A	V
		2484.4	66.34	-7.66	74	51.7	32.16	17.55	35.07	133	144	P	V
		2483.6	52.51	-1.49	54	37.87	32.16	17.55	35.07	133	144	A	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT20 CH 01 2412MHz		4824	49.14	-24.86	74	63.17	34.23	11.12	59.38	100	0	P	H
													H
													H
													H
		4824	47.8	-26.2	74	61.83	34.23	11.12	59.38	100	0	P	V
													V
													V
													V
802.11n HT20 CH 06 2437MHz		4874	49.56	-24.44	74	63.47	34.22	11.16	59.29	100	0	P	H
		7311	44.09	-29.91	74	52.82	35.71	13.61	58.05	100	0	P	H
													H
													H
		4874	53.63	-20.37	74	67.54	34.22	11.16	59.29	100	231	P	V
		4874	43.12	-10.88	54	57.03	34.22	11.16	59.29	100	231	A	V
		7311	45.44	-28.56	74	54.17	35.71	13.61	58.05	100	0	P	V
													V
802.11n HT20 CH 11 2462MHz		4924	53.49	-20.51	74	67.27	34.21	11.22	59.21	356	110	P	H
		4924	42.92	-11.08	54	56.7	34.21	11.22	59.21	356	110	A	H
		7386	43.45	-30.55	74	52.22	35.66	13.69	58.12	100	0	P	H
													H
		4924	49.26	-24.74	74	63.04	34.21	11.22	59.21	100	0	P	V
		7386	44.39	-29.61	74	53.16	35.66	13.69	58.12	100	0	P	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Band Edge @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT40 CH 03 2422MHz		2387.84	64.58	-9.42	74	50.24	31.95	17.43	35.04	123	243	P	H
		2389.1	52.91	-1.09	54	38.57	31.95	17.43	35.04	123	243	A	H
	*	2422	100.53	-	-	86.07	32.03	17.49	35.06	123	243	P	H
	*	2422	93.09	-	-	78.63	32.03	17.49	35.06	123	243	A	H
		2494.4	54.36	-19.64	74	39.69	32.2	17.55	35.08	123	243	P	H
		2491.04	45.78	-8.22	54	31.1	32.2	17.55	35.07	123	243	A	H
		2388.26	65.07	-8.93	74	50.73	31.95	17.43	35.04	100	80	P	V
		2389.8	51.25	-2.75	54	36.92	31.95	17.43	35.05	100	80	A	V
	*	2422	99.16	-	-	84.7	32.03	17.49	35.06	100	80	P	V
	*	2422	91.59	-	-	77.13	32.03	17.49	35.06	100	80	A	V
802.11n HT40 CH 06 2437MHz		2496.29	54.75	-19.25	74	40.08	32.2	17.55	35.08	100	80	P	V
		2487.61	45.84	-8.16	54	31.16	32.2	17.55	35.07	100	80	A	V
		2389.8	65.53	-8.47	74	51.2	31.95	17.43	35.05	102	249	P	H
		2389.1	53.19	-0.81	54	38.85	31.95	17.43	35.04	102	249	P	H
	*	2437	104.88	-	-	90.37	32.08	17.49	35.06	102	249	P	H
	*	2437	97.33	-	-	82.82	32.08	17.49	35.06	102	249	A	H
		2483.69	60.07	-13.93	74	45.43	32.16	17.55	35.07	102	249	P	H
		2483.55	49.31	-4.69	54	34.67	32.16	17.55	35.07	102	249	A	H
		2387	62.67	-11.33	74	48.33	31.95	17.43	35.04	101	81	P	V
		2389.94	50.98	-3.02	54	36.65	31.95	17.43	35.05	101	81	A	V
	*	2437	103.48	-	-	88.97	32.08	17.49	35.06	101	81	P	V
	*	2437	96.03	-	-	81.52	32.08	17.49	35.06	101	81	A	V
		2491.39	57.77	-16.23	74	43.09	32.2	17.55	35.07	101	81	P	V
		2483.9	48.15	-5.85	54	33.51	32.16	17.55	35.07	101	81	A	V



		2377.06	55.24	-18.76	74	41	31.91	17.37	35.04	105	249	P	H
		2388.4	45.58	-8.42	54	31.24	31.95	17.43	35.04	105	249	A	H
	*	2452	102.44	-	-	87.93	32.08	17.49	35.06	105	249	P	H
	*	2452	95.02	-	-	80.51	32.08	17.49	35.06	105	249	A	H
802.11n		2483.83	66.46	-7.54	74	51.82	32.16	17.55	35.07	105	249	P	H
HT40		2483.76	53.06	-0.94	54	38.42	32.16	17.55	35.07	105	249	P	H
CH 09		2367.12	54.93	-19.07	74	40.73	31.87	17.37	35.04	100	81	P	V
2452MHz		2384.06	45.3	-8.7	54	31	31.91	17.43	35.04	100	81	A	V
	*	2452	99.87	-	-	85.36	32.08	17.49	35.06	100	81	P	V
	*	2452	92.33	-	-	77.82	32.08	17.49	35.06	100	81	A	V
		2485.44	63.47	-10.53	74	48.83	32.16	17.55	35.07	100	81	P	V
		2483.52	51.45	-2.55	54	36.81	32.16	17.55	35.07	100	81	A	V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Harmonic @ 3m)

WIFI Ant. 1	Note	Frequency (MHz)	Level (dB μ V/m)	Over Limit (dB)	Limit Line (dB μ V/m)	Read Level (dB μ V)	Antenna Factor (dB/m)	Path Loss (dB)	Preamp Factor (dB)	Ant Pos (cm)	Table Pos (deg)	Peak Avg. (P/A)	Pol. (H/V)
802.11n HT40 CH 03 2422MHz		4844	45.38	-28.62	74	59.38	34.23	11.12	59.35	100	0	P	H
		7266	42.94	-31.06	74	51.65	35.73	13.58	58.02	100	0	P	H
													H
													H
		4844	44.73	-29.27	74	58.73	34.23	11.12	59.35	100	0	P	V
		7266	42.75	-31.25	74	51.46	35.73	13.58	58.02	100	0	P	V
													V
													V
802.11n HT40 CH 06 2437MHz		4874	45.88	-28.12	74	59.79	34.22	11.16	59.29	100	0	P	H
		7311	42.1	-31.9	74	50.83	35.71	13.61	58.05	100	0	P	H
													H
													H
		4874	47	-27	74	60.91	34.22	11.16	59.29	100	0	P	V
		7311	43.19	-30.81	74	51.92	35.71	13.61	58.05	100	0	P	V
													V
													V
802.11n HT40 CH 09 2452MHz		4904	44.23	-29.77	74	58.03	34.22	11.22	59.24	100	0	P	H
		7356	42.53	-31.47	74	51.29	35.68	13.65	58.09	100	0	P	H
													H
													H
		4904	46.12	-27.88	74	59.92	34.22	11.22	59.24	100	0	P	V
		7356	42.41	-31.59	74	51.17	35.68	13.65	58.09	100	0	P	V
													V
													V
Remark	1. No other spurious found. 2. All results are PASS against Peak and Average limit line.												



Emission below 1GHz

2.4GHz WIFI 802.11b (LF)

WIFI	Note	Frequency	Level	Over	Limit	Read	Antenna	Path	Preamp	Ant	Table	Peak	Pol.
Ant.				Limit	Line	Level	Factor	Loss	Factor	Pos	Pos	Avg.	
1		(MHz)	(dB μ V/m)	(dB)	(dB μ V/m)	(dB μ V)	(dB/m)	(dB)	(dB)	(cm)	(deg)	(P/A)	(H/V)
2.4GHz 802.11b LF		122.34	26.77	-16.73	43.5	38.84	17.53	1.94	31.54	-	-	P	H
		174.99	23.02	-20.48	43.5	37	15.26	2.24	31.48	-	-	P	H
		252.48	33.01	-12.99	46	43.26	18.61	2.51	31.37	-	-	P	H
		486.9	29.26	-16.74	46	33.06	23.64	3.56	31	-	-	P	H
		834.1	33.16	-12.84	46	30.77	28.3	4.66	30.57	-	-	P	H
		899.9	39.98	-6.02	46	36.93	28.72	4.85	30.52	100	0	P	H
													H
													H
													H
													H
													H
													H
													H
													H
													H
													H
Remark	1.	No other spurious found.											
	2.	All results are PASS against limit line.											

**Note symbol**

*	Fundamental Frequency which can be ignored. However, the level of any unwanted emissions shall not exceed the level of the fundamental frequency.
!	Test result is over limit line.
P/A	Peak or Average
H/V	Horizontal or Vertical



A calculation example for radiated spurious emission is shown as below:

WIFI	Note	Frequency	Level	Over	Limit	Read	Antenna	Path	Preamp	Ant	Table	Peak	Pol.
Ant.				Limit	Line	Level	Factor	Loss	Factor	Pos	Pos	Avg.	
1		(MHz)	(dB μ V/m)	(dB)	(dB μ V/m)	(dB μ V)	(dB/m)	(dB)	(dB)	(cm)	(deg)	(P/A)	(H/V)
802.11b		2390	55.45	-18.55	74	54.51	32.22	4.58	35.86	103	308	P	H
CH 01													
2412MHz		2390	43.54	-10.46	54	42.6	32.22	4.58	35.86	103	308	A	H

1. Path Loss(dB) = Cable loss(dB) + Filter loss(dB) + Attenuator loss(dB)

2. Level(dB μ V/m) =

Antenna Factor(dB/m) + Path Loss(dB) + Read Level(dB μ V) - Preamp Factor(dB)

3. Over Limit(dB) = Level(dB μ V/m) – Limit Line(dB μ V/m)

For Peak Limit @ 2390MHz:

1. Level(dB μ V/m)

= Antenna Factor(dB/m) + Path Loss(dB) + Read Level(dB μ V) - Preamp Factor(dB)

= 32.22(dB/m) + 4.58(dB) + 54.51(dB μ V) – 35.86 (dB)

= 55.45 (dB μ V/m)

2. Over Limit(dB)

= Level(dB μ V/m) – Limit Line(dB μ V/m)

= 55.45(dB μ V/m) – 74(dB μ V/m)

= -18.55(dB)

For Average Limit @ 2390MHz:

1. Level(dB μ V/m)

= Antenna Factor(dB/m) + Path Loss(dB) + Read Level(dB μ V) - Preamp Factor(dB)

= 32.22(dB/m) + 4.58(dB) + 42.6(dB μ V) – 35.86 (dB)

= 43.54 (dB μ V/m)

2. Over Limit(dB)

= Level(dB μ V/m) – Limit Line(dB μ V/m)

= 43.54(dB μ V/m) – 54(dB μ V/m)

= -10.46(dB)

Both peak and average measured complies with the limit line, so test result is “PASS”.



Appendix D. Radiated Spurious Emission Plots

Test Engineer :	Jesse Wang, Stan Hsieh, and Lance Chuang	Temperature :	24~26°C
		Relative Humidity :	50~54%

Note symbol

-L	Low channel location
-R	High channel location

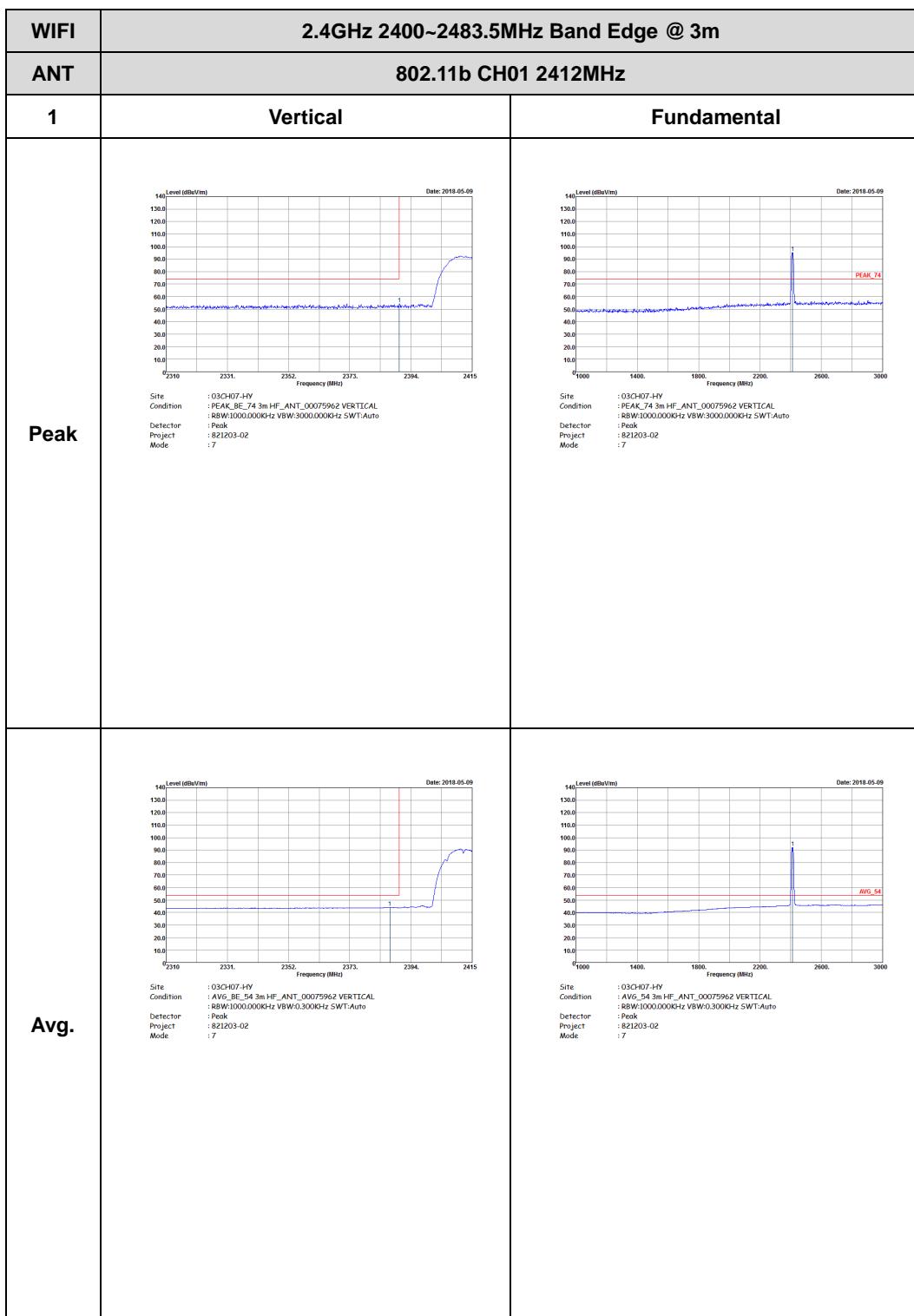


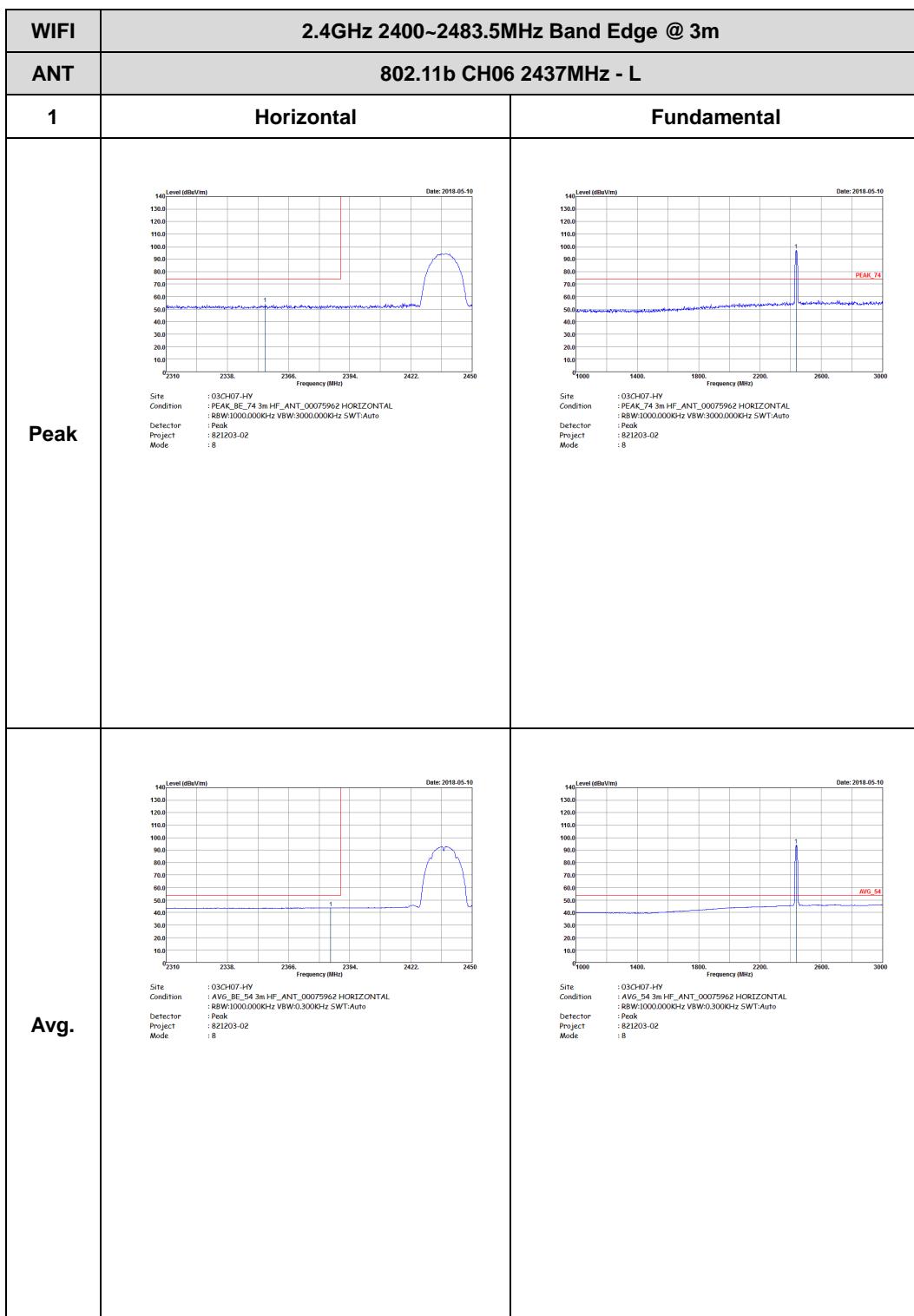
<Sample 1>

2.4GHz 2400~2483.5MHz

WIFI 802.11b (Band Edge @ 3m)

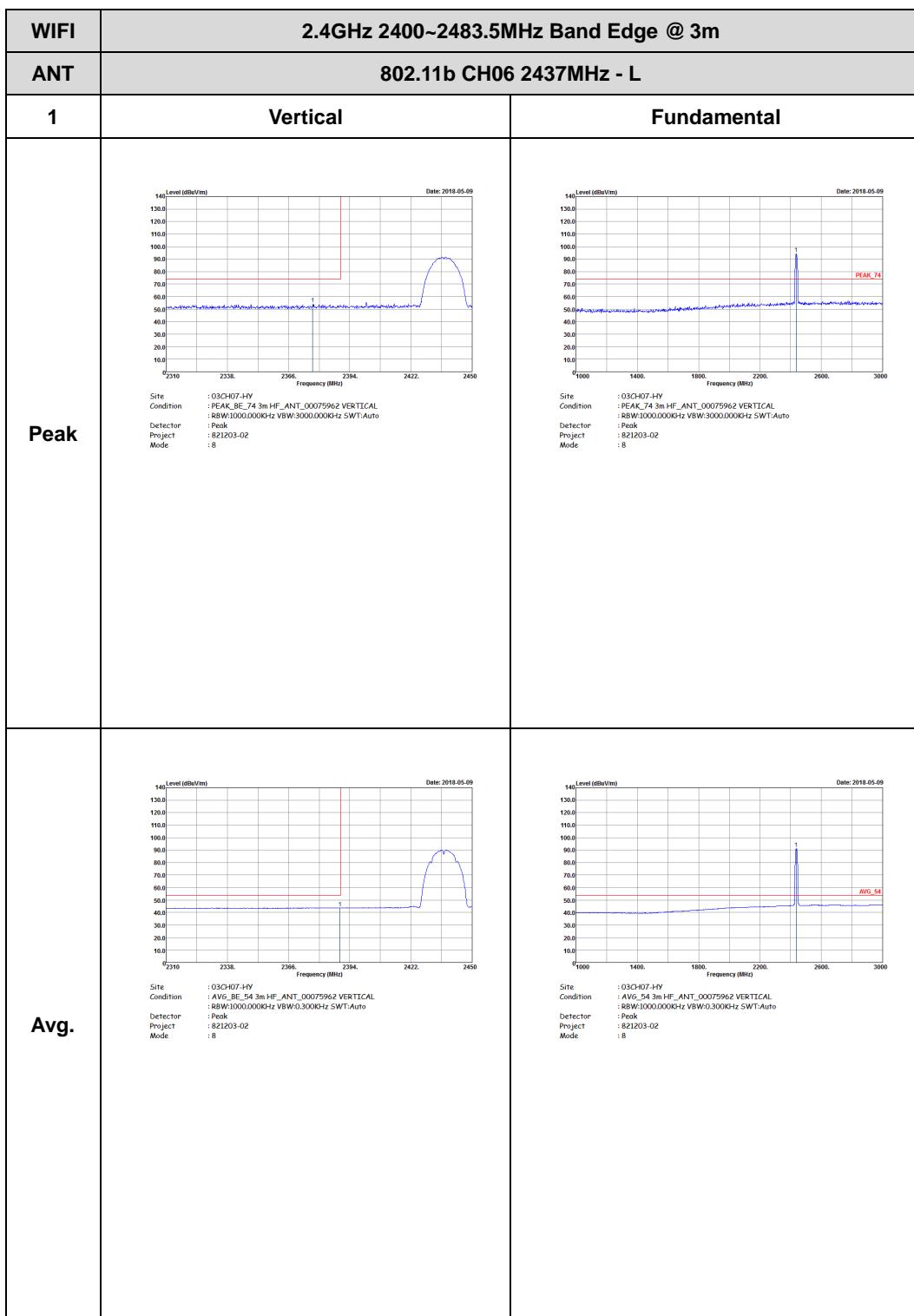
WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11b CH01 2412MHz	
1	Horizontal	Fundamental
Peak	 Site Condition : PEAK_BE_74 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000kHz VBW:3000.000Hz SWT:Auto Project : 821203-02 Mode : 7 Date: 2018-05-09	 Site Condition : PEAK_74 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000kHz VBW:3000.000Hz SWT:Auto Project : 821203-02 Mode : 7 Date: 2018-05-09
Avg.	 Site Condition : AVG_BE_54 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000kHz VBW:0.300kHz SWT:Auto Project : 821203-02 Mode : 7 Date: 2018-05-09	 Site Condition : AVG_54 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000kHz VBW:0.300kHz SWT:Auto Project : 821203-02 Mode : 7 Date: 2018-05-09







WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11b CH06 2437MHz - R	
1	Horizontal	Fundamental
Peak	<p>Level (dBmV/m)</p> <p>Date: 2018-05-10</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3000.000Hz SWT:Auto Project : Peak Mode : 8</p>	Left blank
Avg.	<p>Level (dBmV/m)</p> <p>Date: 2018-05-10</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:0.3000Hz SWT:Auto Project : Peak Mode : 8</p>	Left blank

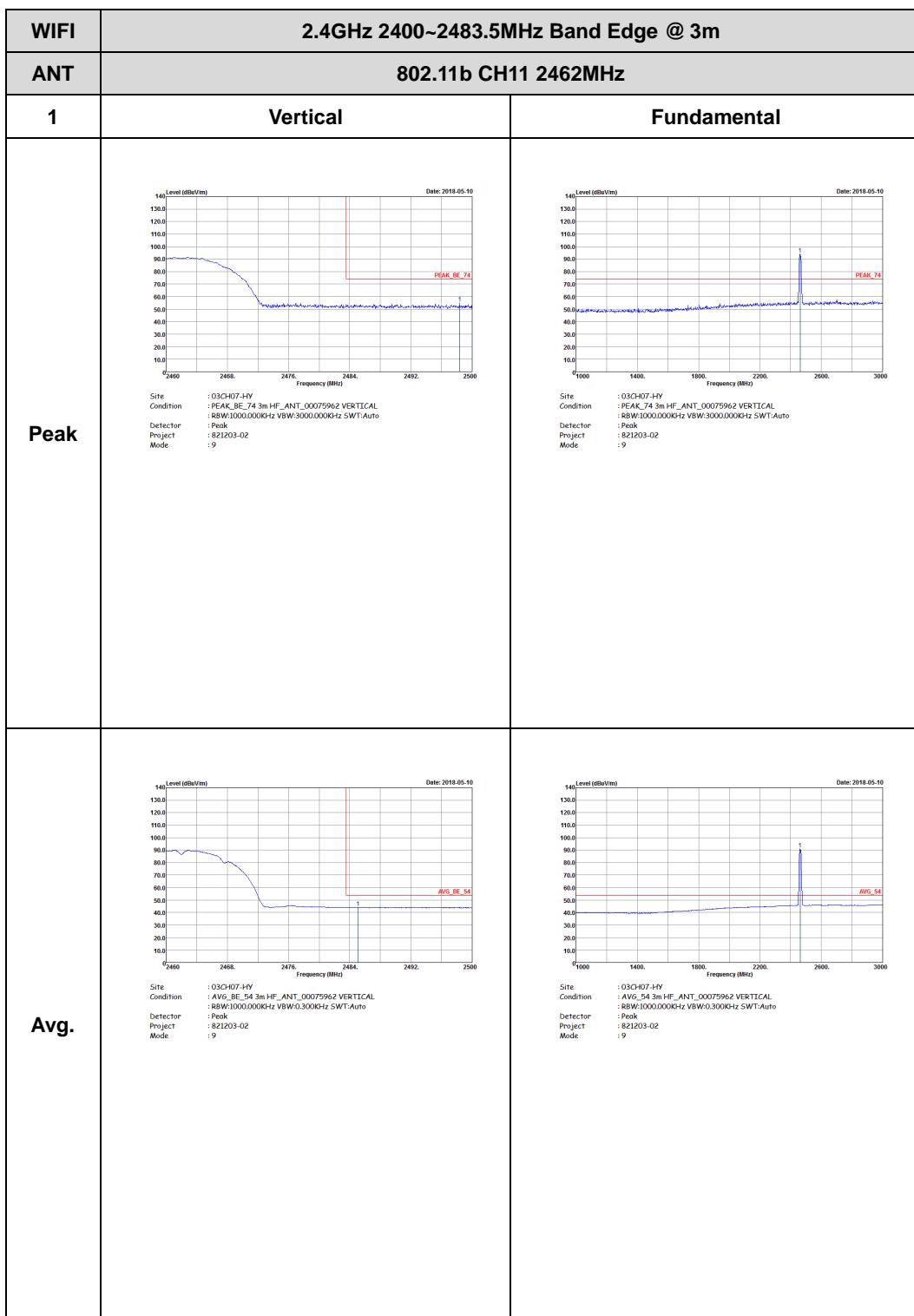




WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11b CH06 2437MHz - R	
1	Vertical	Fundamental
Peak	<p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3000.000Hz SWT:Auto Project : Peak Mode : 821203-02 : 8</p>	Left blank
Avg.	<p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:0.300KHz SWT:Auto Project : Peak Mode : 821203-02 : 8</p>	Left blank



WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11b CH11 2462MHz	
1	Horizontal	Fundamental
Peak	 Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000KHz VBW:3000.000Hz SWT:Auto Project : 821203-02 Mode : 9	 Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 9
Avg.	 Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 HORIZONTAL Detector : R8W:1000.000KHz VBW:0.300KHz SWT:Auto Project : 821203-02 Mode : 9	 Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 9

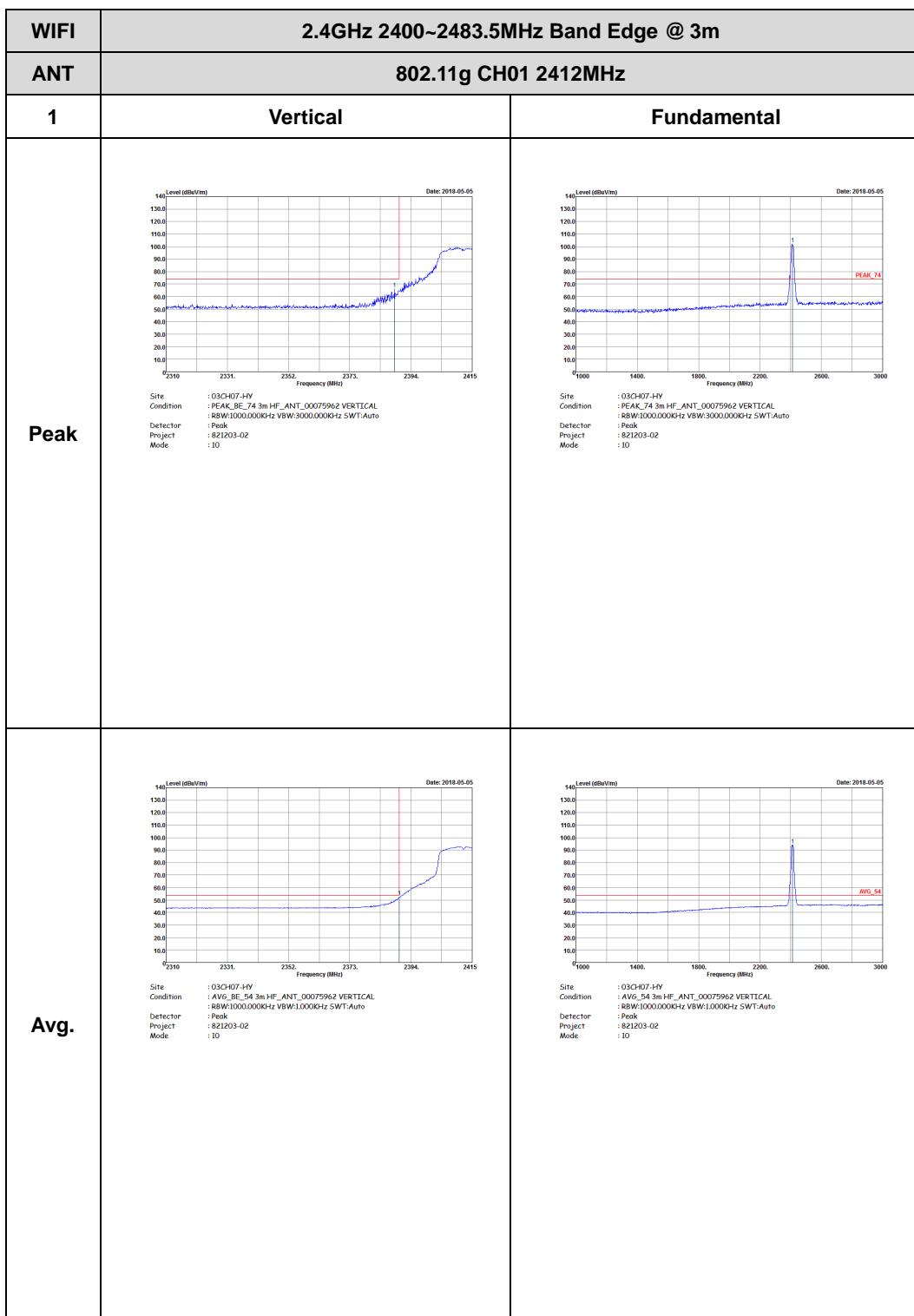


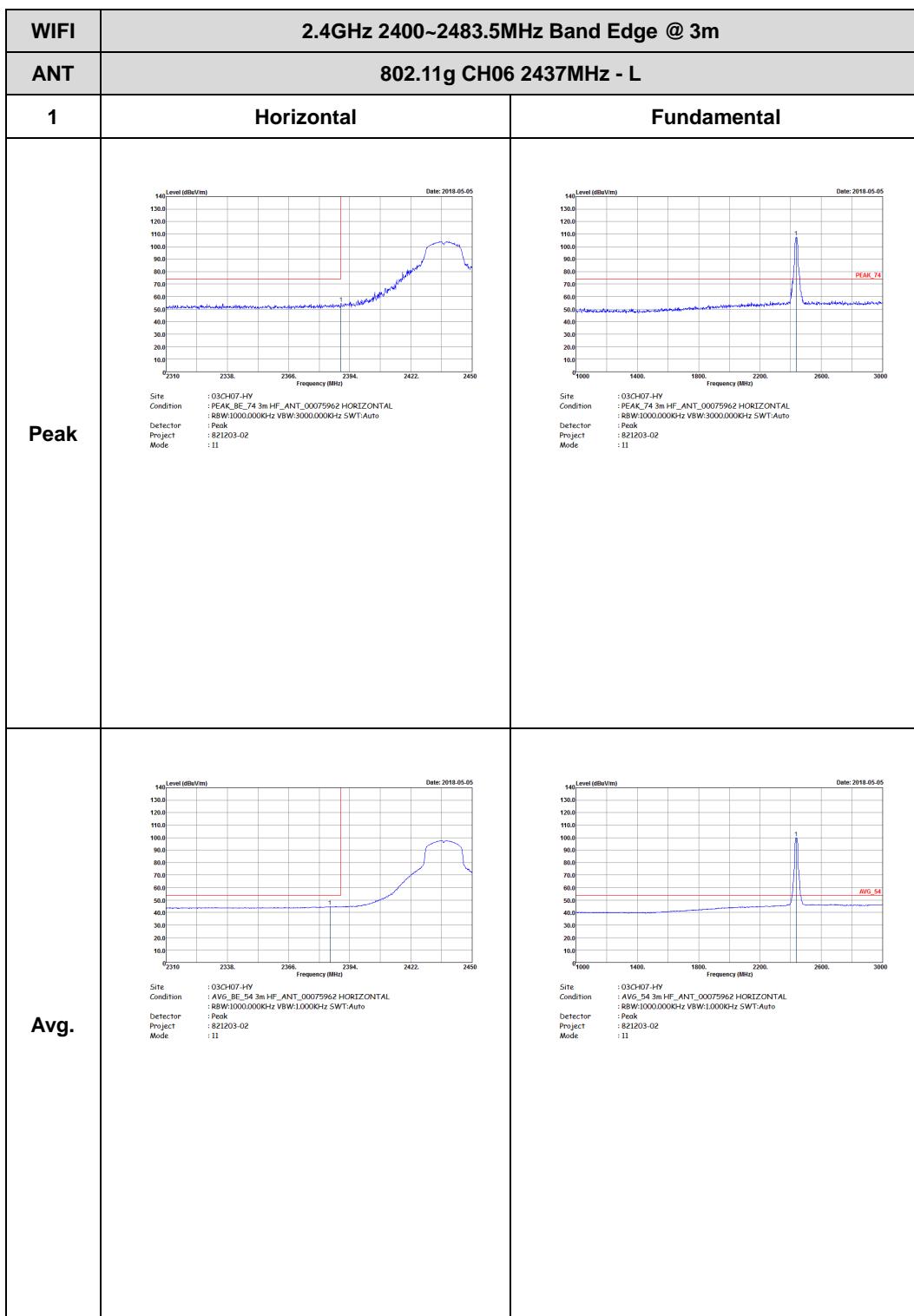


2.4GHz 2400~2483.5MHz

WIFI 802.11g (Band Edge @ 3m)

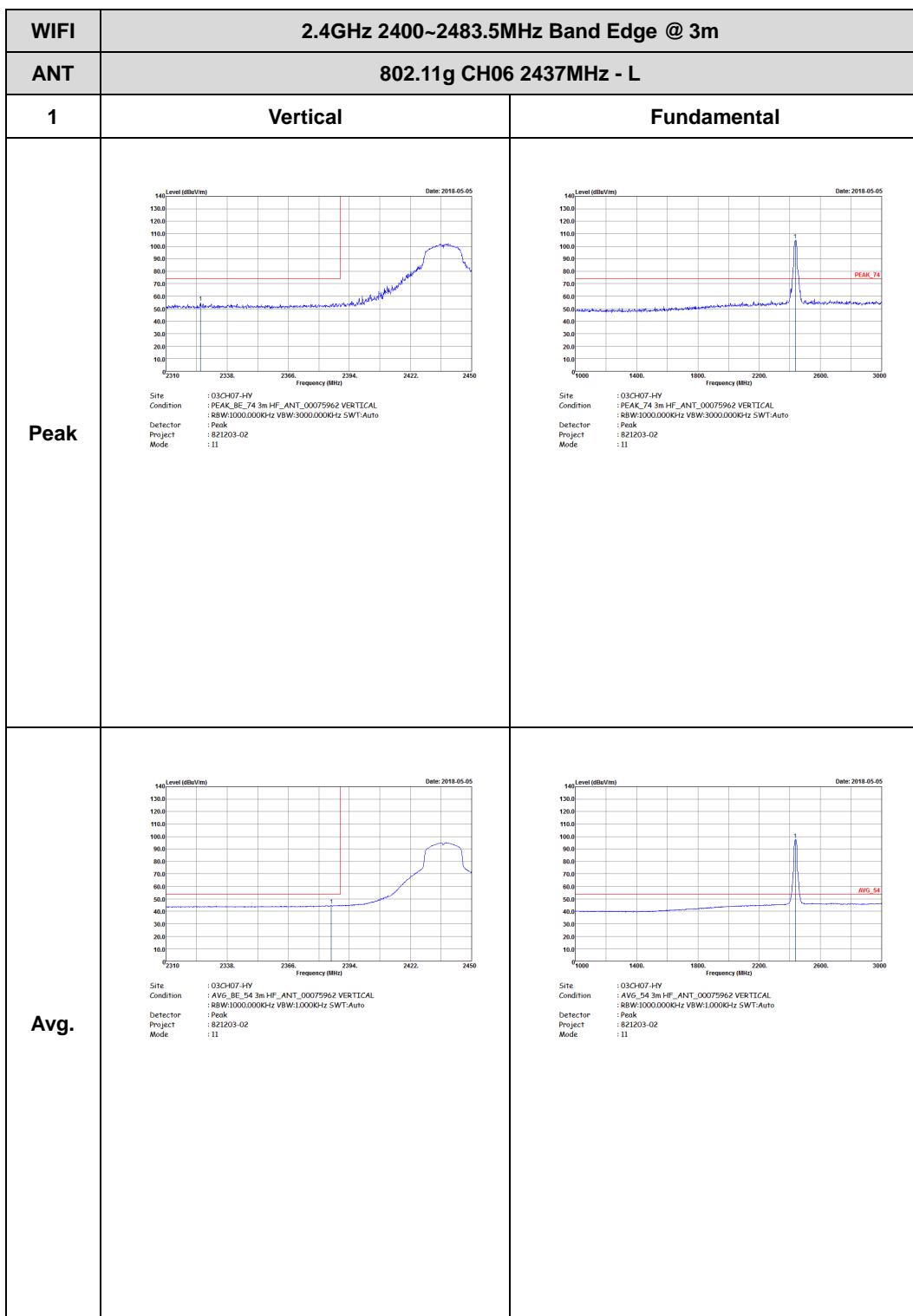
WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11g CH01 2412MHz	
1	Horizontal	Fundamental
Peak	 Site : 03CH07-HY Condition : PEAK_BE_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 10	 Site : 03CH07-HY Condition : PEAK_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 10
Avg.	 Site : 03CH07-HY Condition : AVG_BE_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 10	 Site : 03CH07-HY Condition : AVG_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 10





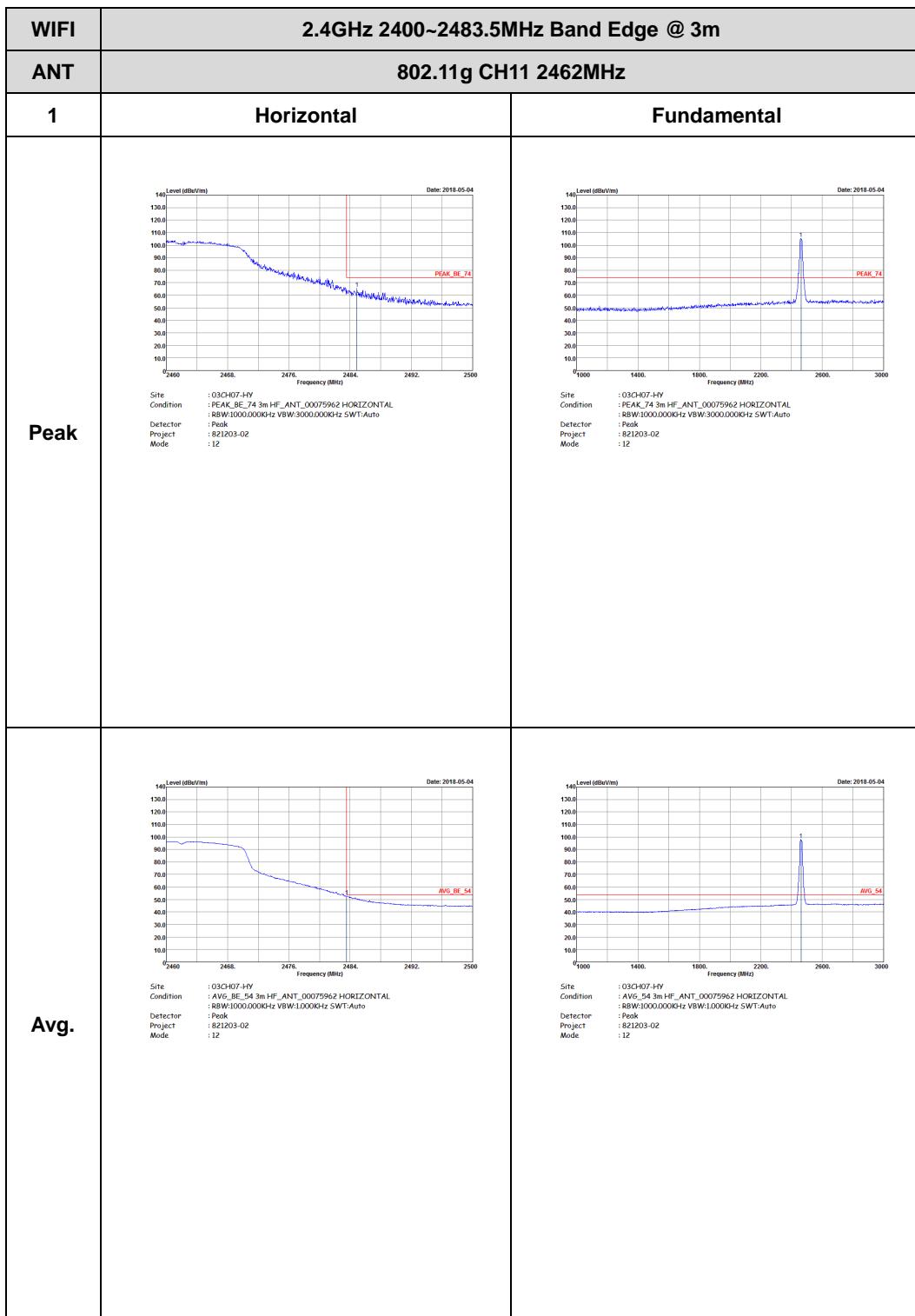


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11g CH06 2437MHz - R	
1	Horizontal	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF_, ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3000.000KHz SWT:Auto Project : Peak Mode : II</p>	Left blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF_, ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:1.000KHz SWT:Auto Project : Peak Mode : II</p>	Left blank





WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11g CH06 2437MHz - R	
1	Vertical	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 VERTICAL Detector : R8W1000.000KHz VBW:3000.000KHz SWT:Auto Project : Peak Mode : 821203-02 : II</p>	Left Blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector : R8W1000.000KHz VBW:1.000KHz SWT:Auto Project : Peak Mode : 821203-02 : II</p>	Left Blank





WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11g CH11 2462MHz	
1	Vertical	Fundamental
Peak	<p>Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3000.000KHz SWT:Auto Project : 821203-02 Mode : 12</p>	<p>Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3000.000KHz SWT:Auto Project : 821203-02 Mode : 12</p>
Avg.	<p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:1000KHz SWT:Auto Project : 821203-02 Mode : 12</p>	<p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:1000KHz SWT:Auto Project : 821203-02 Mode : 12</p>

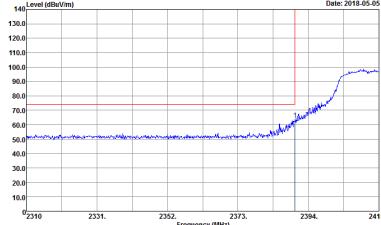
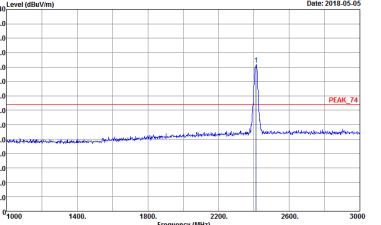
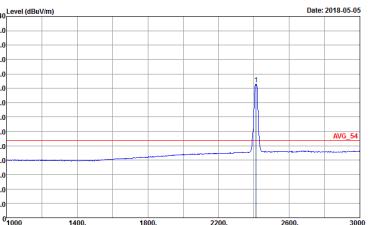


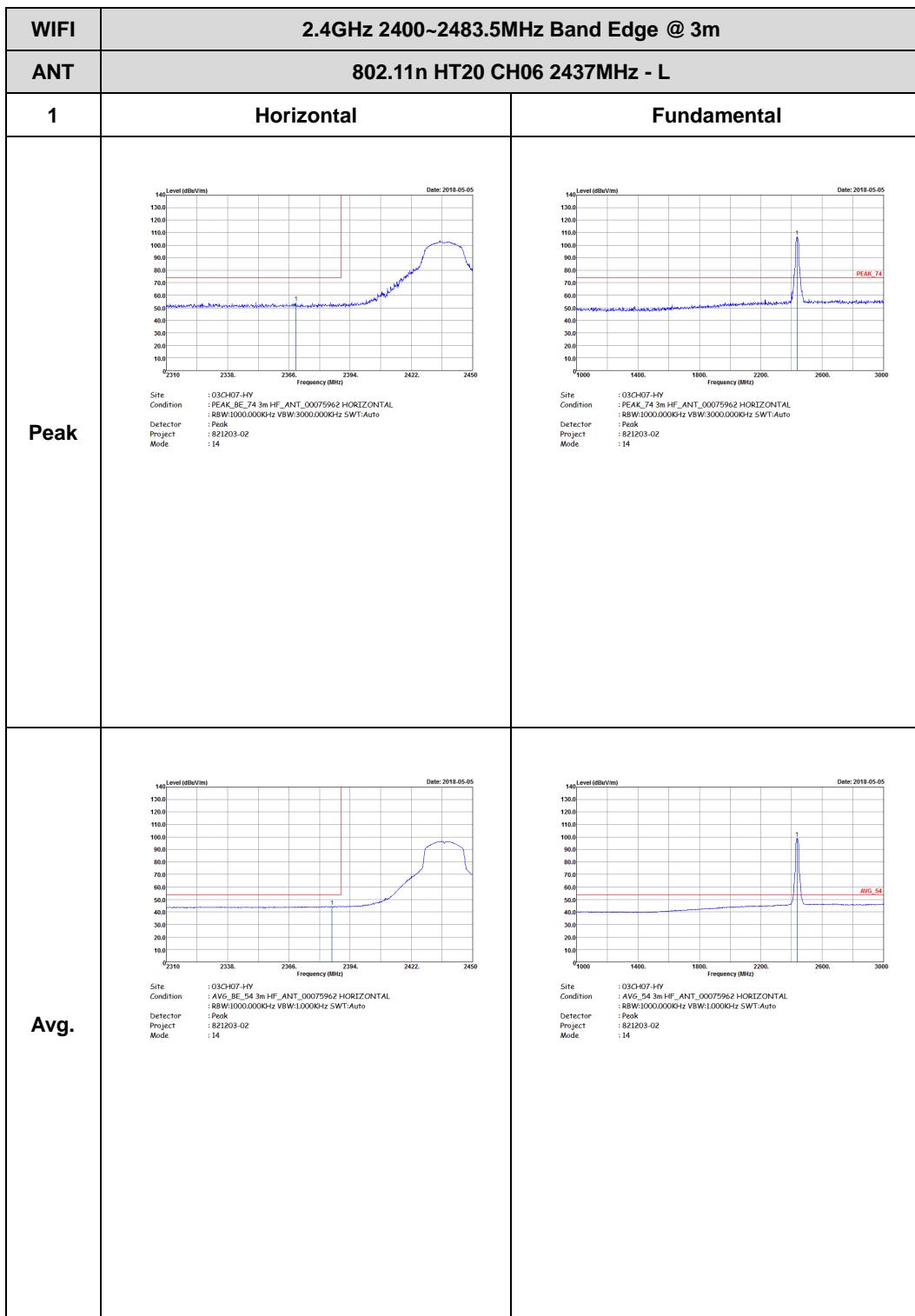
2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Band Edge @ 3m)

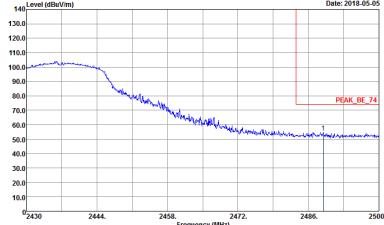
WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT20 CH01 2412MHz	
1	Horizontal	Fundamental
Peak	 Site : 03AK07-HY Condition : PEAK_BE_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 13	 Site : 03AK07-HY Condition : PEAK_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 13
Avg.	 Site : 03CH07-HY Condition : AVG_BE_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 13	 Site : 03CH07-HY Condition : AVG_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 13

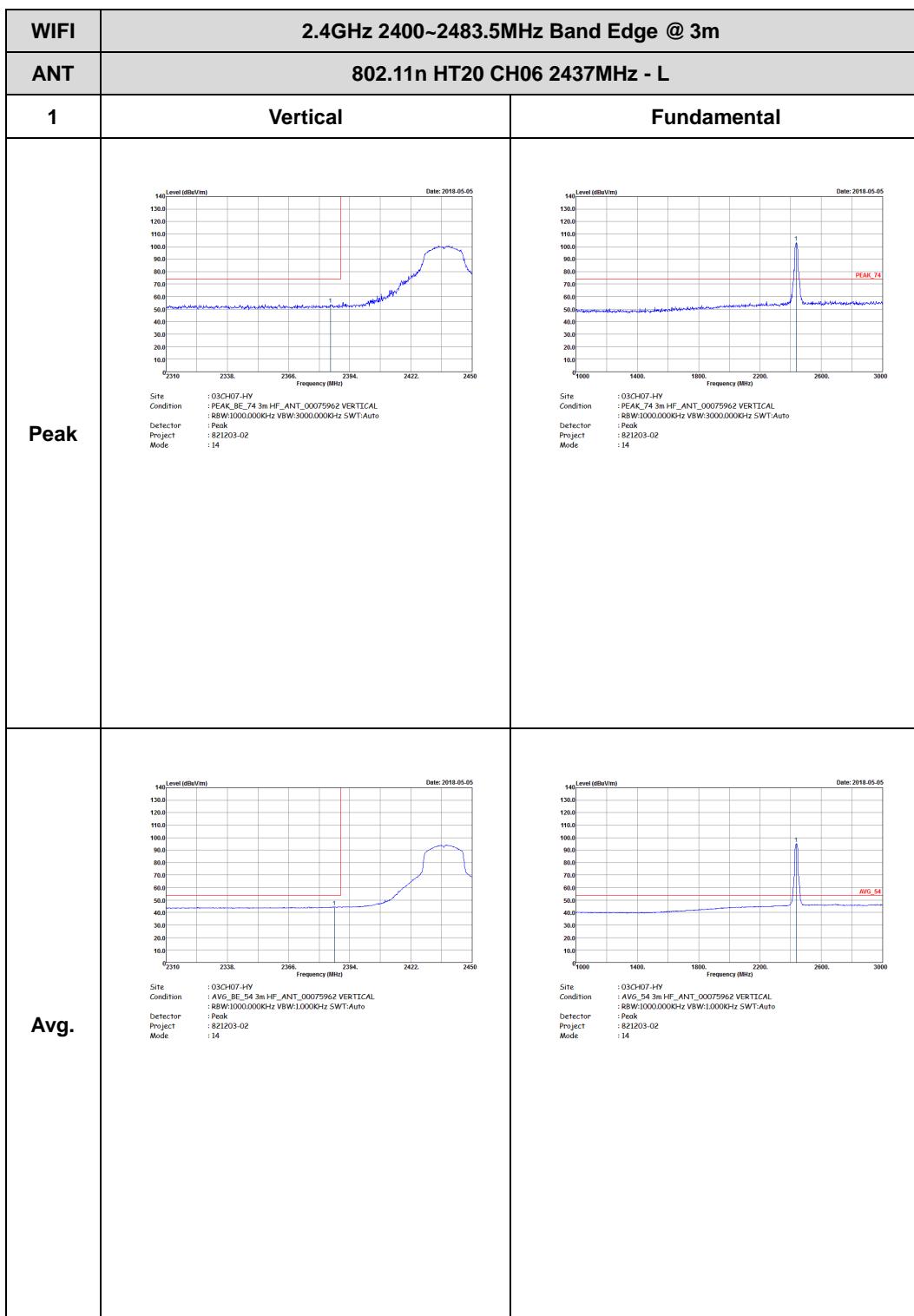


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT20 CH01 2412MHz	
1	Vertical	Fundamental
Peak	 Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3000.000KHz SWT:Auto Project : 821203-02 Mode : 13	 Site : 03CH07-HY Condition : PCAX_BE_74 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3000.000KHz SWT:Auto Project : 821203-02 Mode : 13
Avg.	 Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:1.000KHz SWT:Auto Project : 821203-02 Mode : 13	 Site : 03CH07-HY Condition : AVG_BE_54 3m HF_ANL_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:1.000KHz SWT:Auto Project : 821203-02 Mode : 13



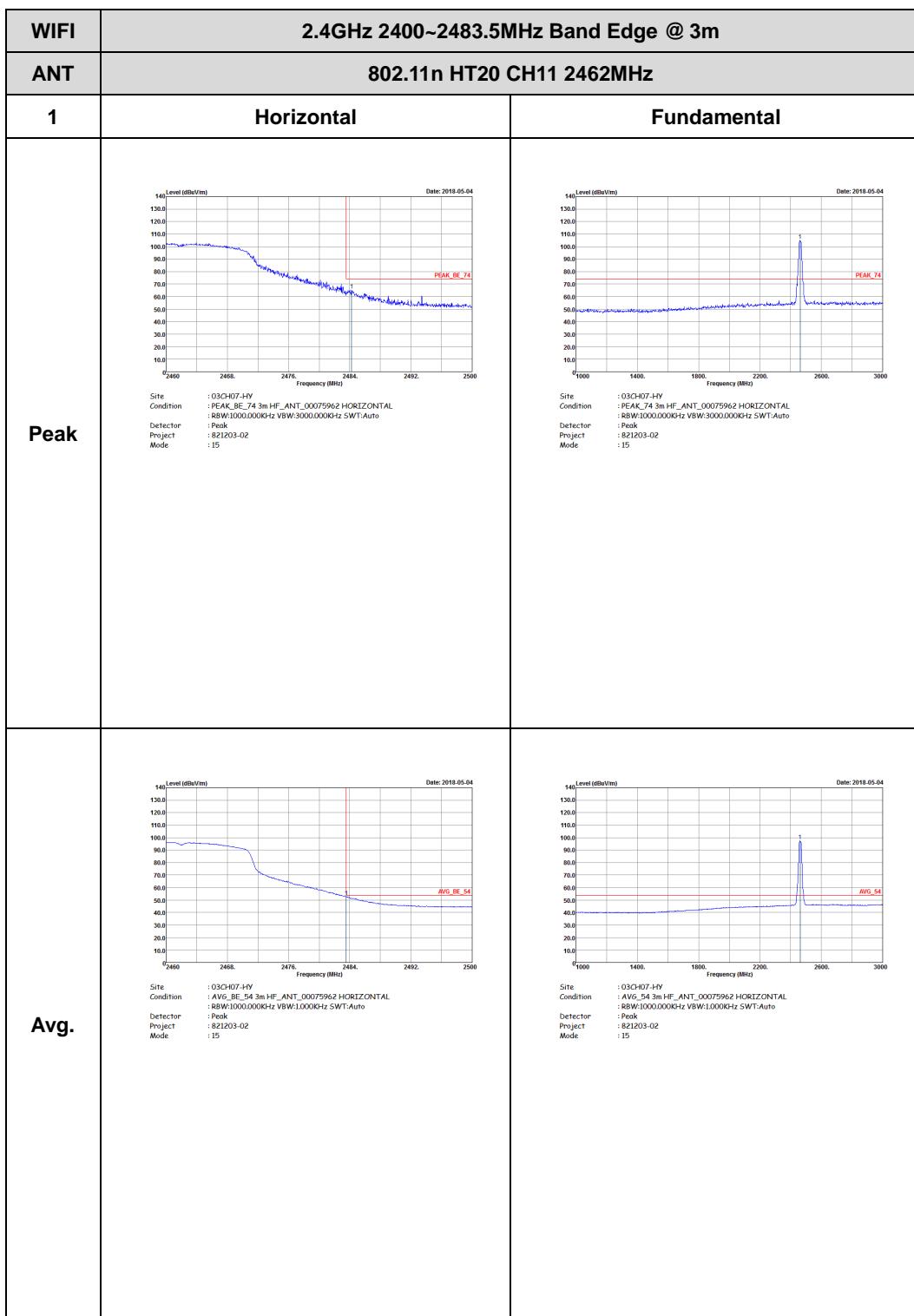


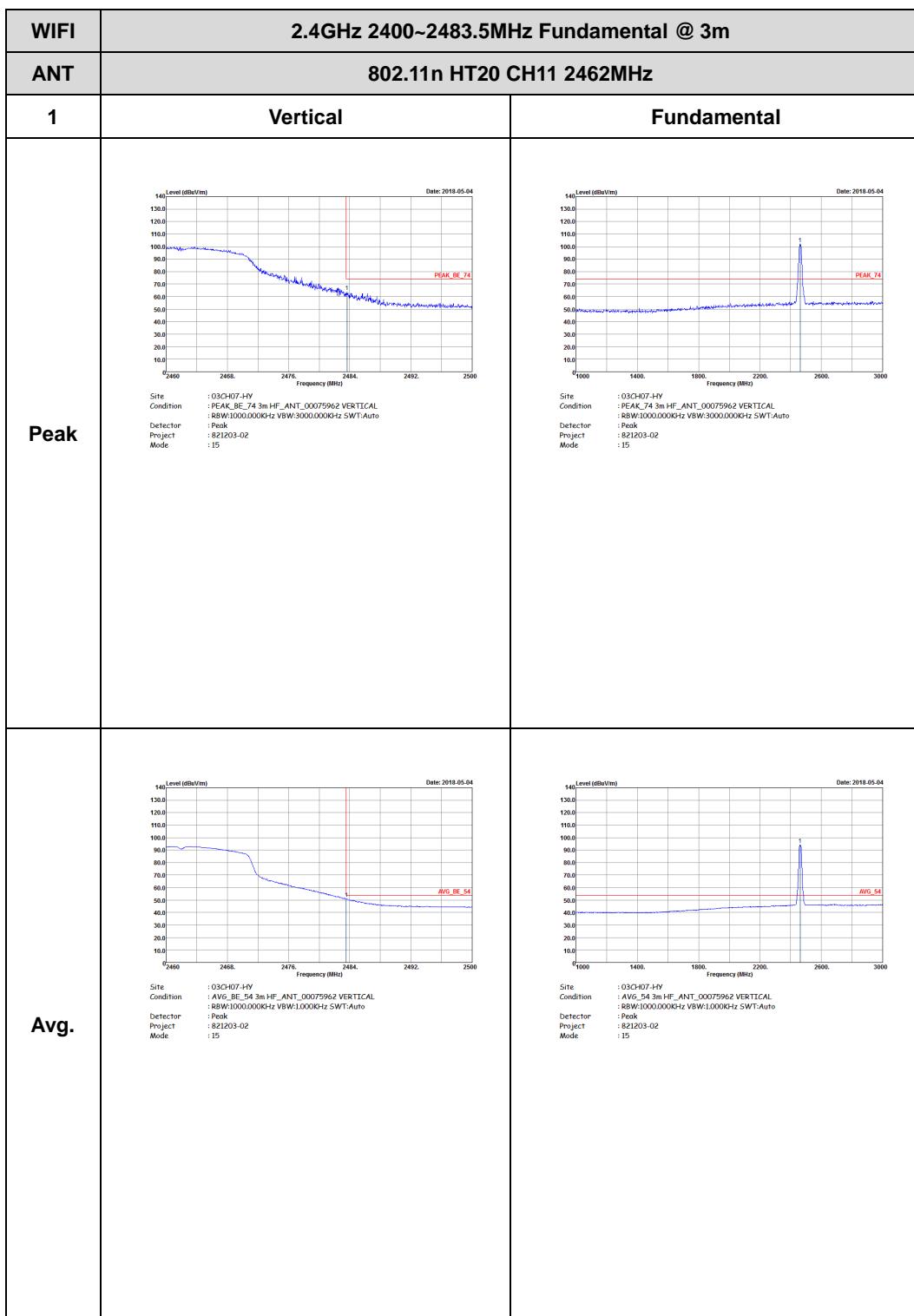
WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT20 CH06 2437MHz - R	
1	Horizontal	Fundamental
Peak	 <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3000.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 14</p>	Left blank
Avg.	 <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:1.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 14</p>	Left blank





WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT20 CH06 2437MHz - R	
1	Vertical	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PEAK_BE_74 3m HF,_ANT_00075962 VERTICAL Detector : R8W1000.000KHz VBW:3000.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 14</p>	Left Blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector : R8W1000.000KHz VBW:1.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 14</p>	Left Blank







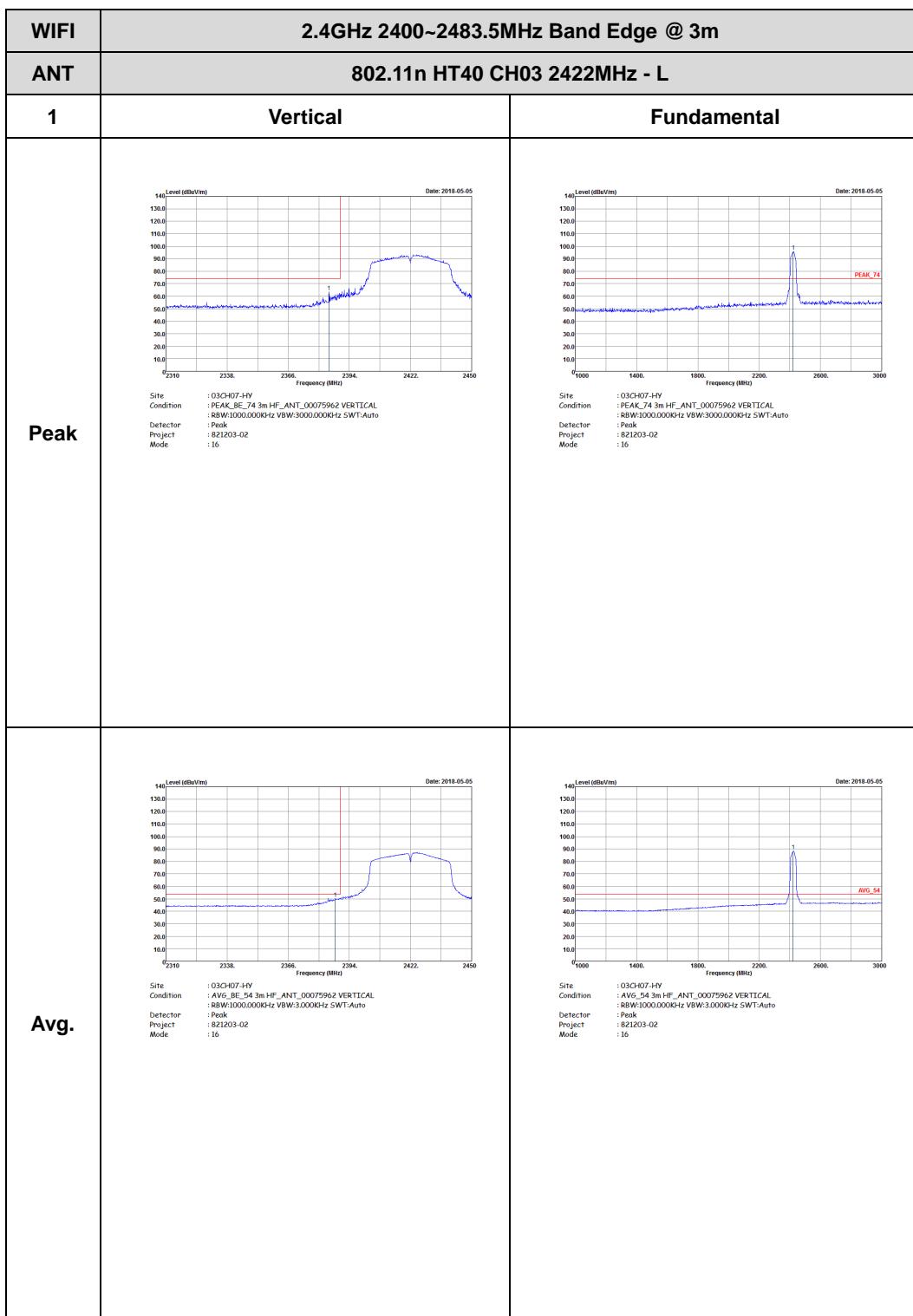
2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Band Edge @ 3m)

WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH03 2422MHz - L	
1	Horizontal	Fundamental
Peak	 Site : 03CH07-HY Condition : PEAK_BE_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 16	 Site : 03CH07-HY Condition : PEAK_74_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 16
Avg.	 Site : 03CH07-HY Condition : AVG_BE_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 16	 Site : 03CH07-HY Condition : AVG_54_3m_HF_ANT_00075962_HORIZONTAL Detector : Peak Project : 821203-02 Mode : 16

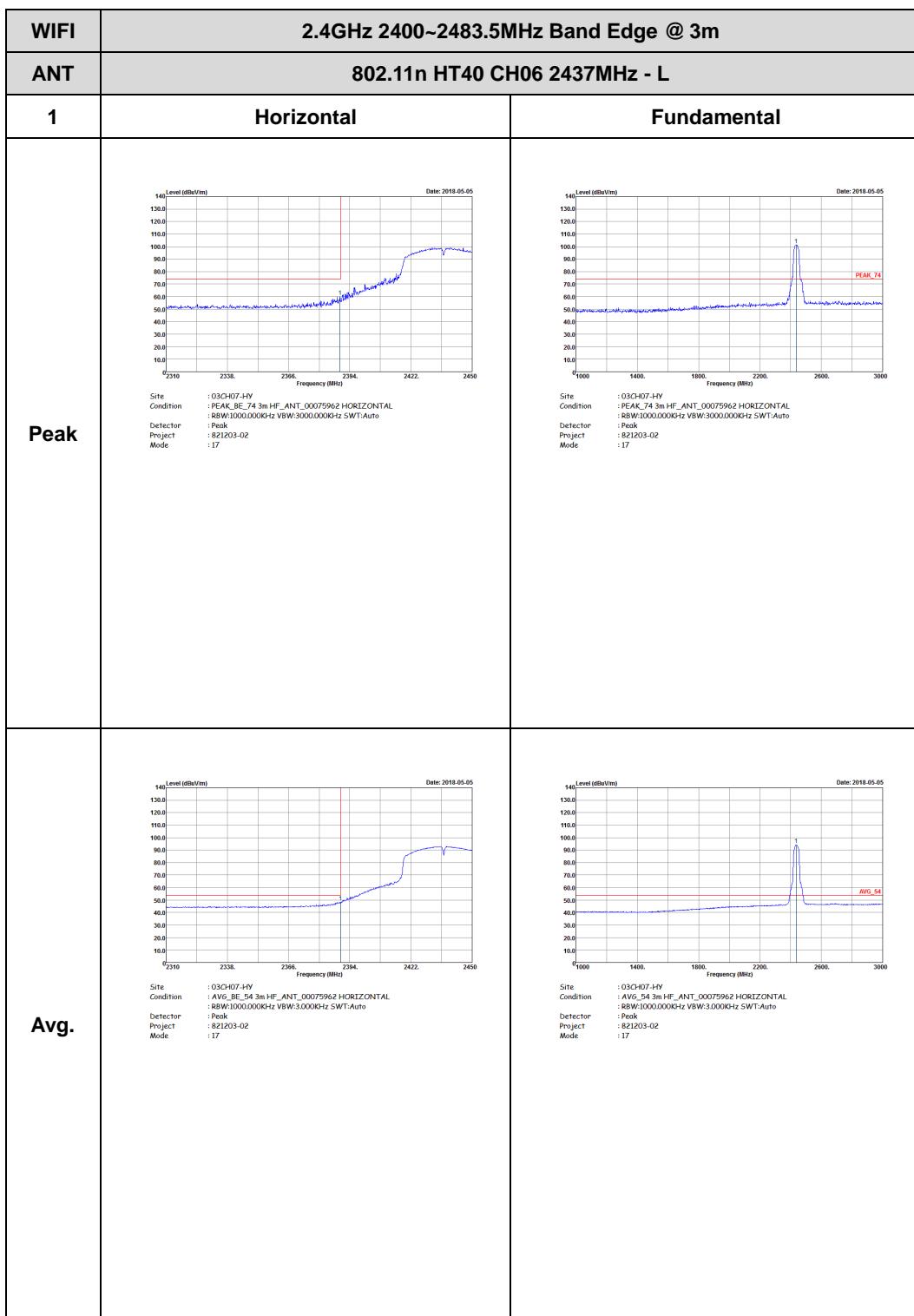


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH03 2422MHz - R	
1	Horizontal	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PC4K_BE_74 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3.000KHz SWT:Auto Project : 821203-02 Mode : 16</p>	Left Blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3.000KHz SWT:Auto Project : 821203-02 Mode : 16</p>	Left Blank

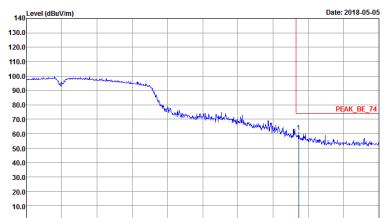


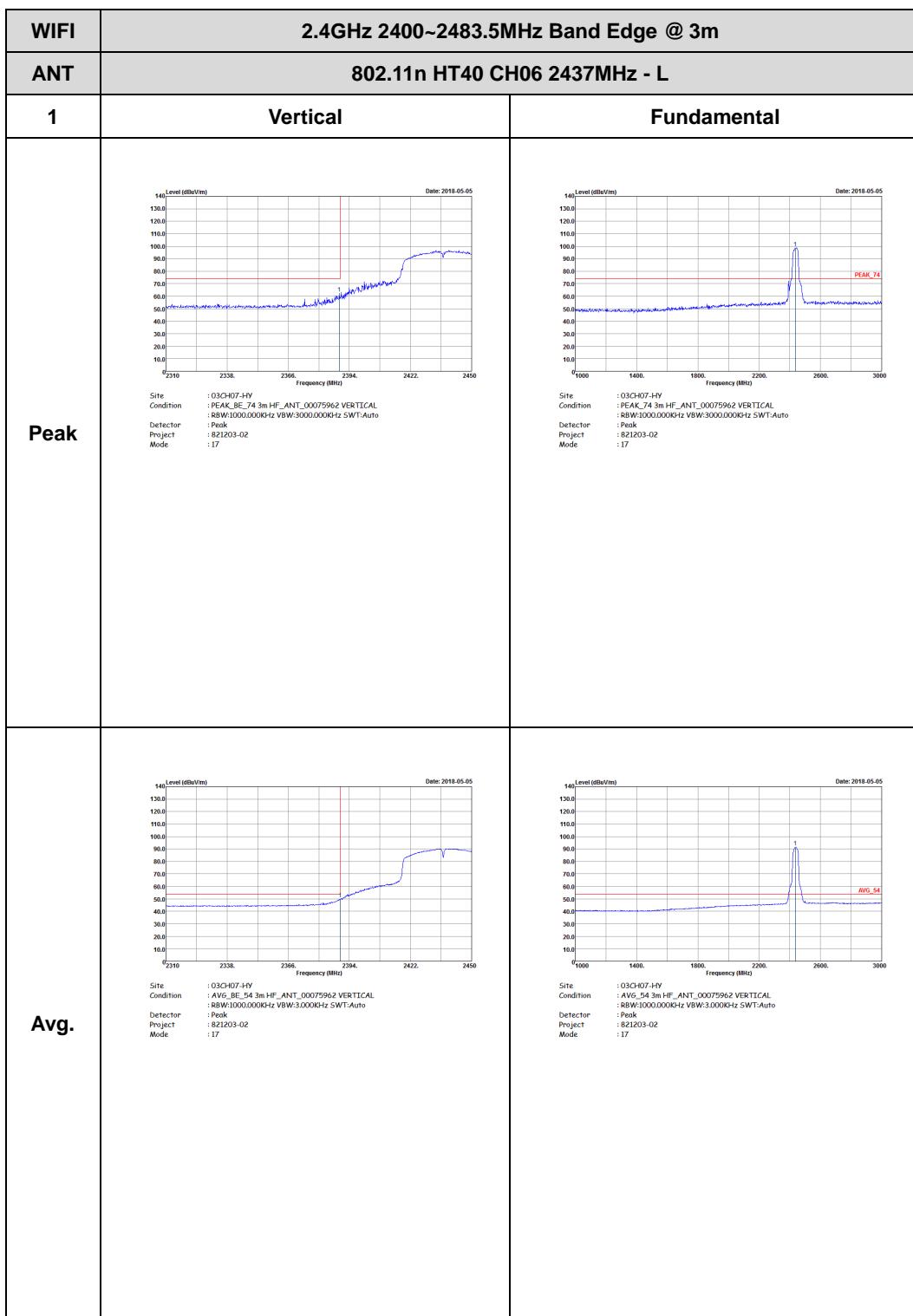


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH03 2422MHz - R	
1	Vertical	Fundamental
Peak	<p>Date: 2018-05-05 Site: 03CH07-HY Condition: PCAC_BE_74 3m HF,_ANT_00075962 VERTICAL Detector: R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project: 821203-02 Mode: 10</p>	Left blank
Avg.	<p>Date: 2018-05-05 Site: 03CH07-HY Condition: AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector: R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project: 821203-02 Mode: 10</p>	Left blank



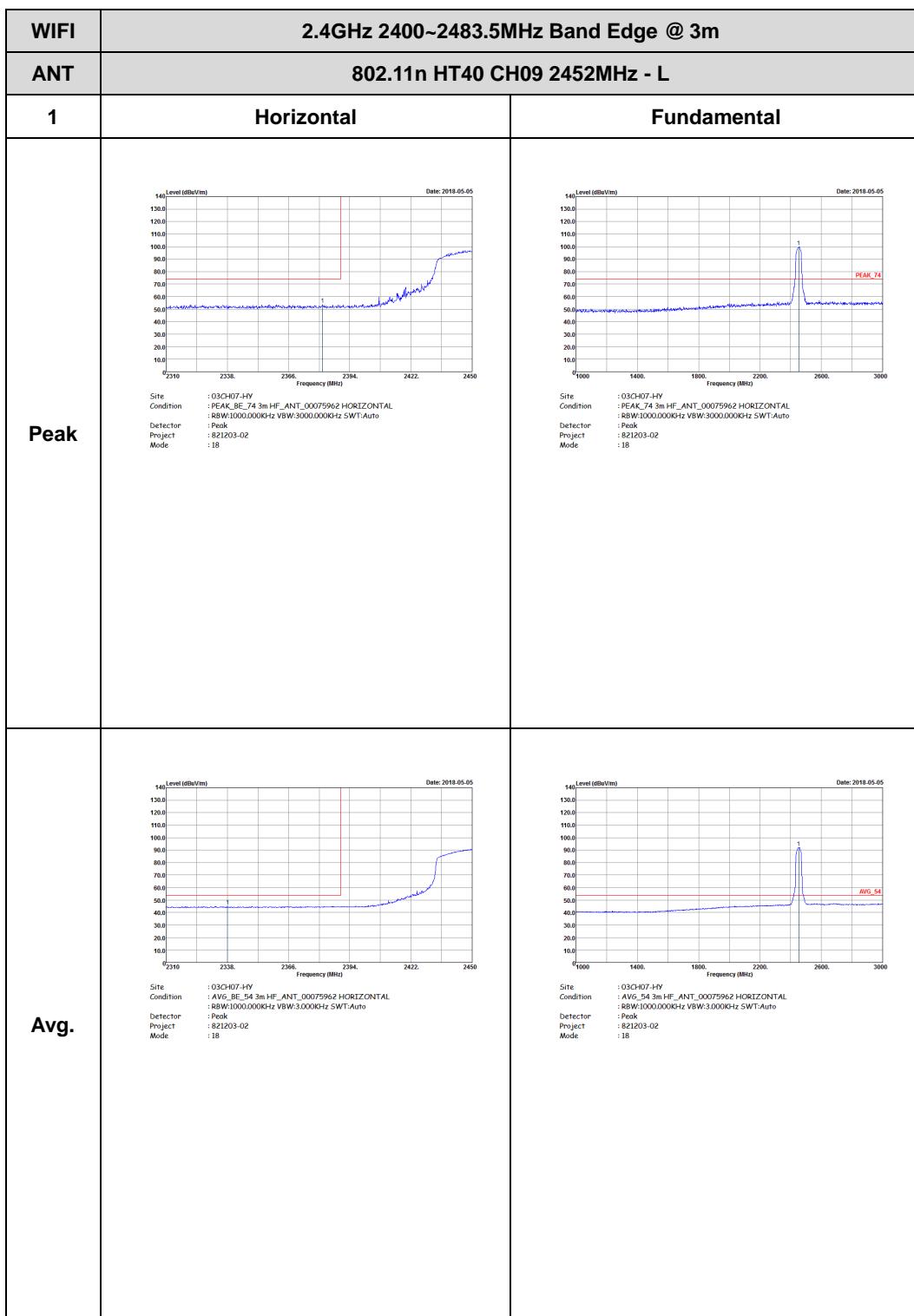


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH06 2437MHz - R	
1	Horizontal	Fundamental
Peak	 <p>Level (dBm/V/m) vs Frequency (MHz) from 2430 to 2500. The graph shows a sharp drop in signal level starting around 2450 MHz, reaching a minimum of approximately 60 dBm/V/m at 2437 MHz, which is labeled as the PEAK_BE_74. The plot includes a red vertical line at the peak frequency.</p> <p>Date: 2018-05-05</p> <p>Site: 03CH07-HY Condition: PCAK_BE_74 3m HF, ANT_00075962 HORIZONTAL Detector: R8W1000.000KHz VBW:3.000KHz SWT:Auto Project: 821203-02 Mode: 17</p>	Left blank
Avg.	 <p>Level (dBm/V/m) vs Frequency (MHz) from 2430 to 2500. The graph shows a smooth average line representing the band edge, which drops sharply from about 90 dBm/V/m at 2450 MHz to a minimum of approximately 45 dBm/V/m at 2437 MHz, labeled as the AVG_BE_54.</p> <p>Date: 2018-05-05</p> <p>Site: 03CH07-HY Condition: AVG_BE_54 3m HF, ANT_00075962 HORIZONTAL Detector: R8W1000.000KHz VBW:3.000KHz SWT:Auto Project: 821203-02 Mode: 17</p>	Left blank



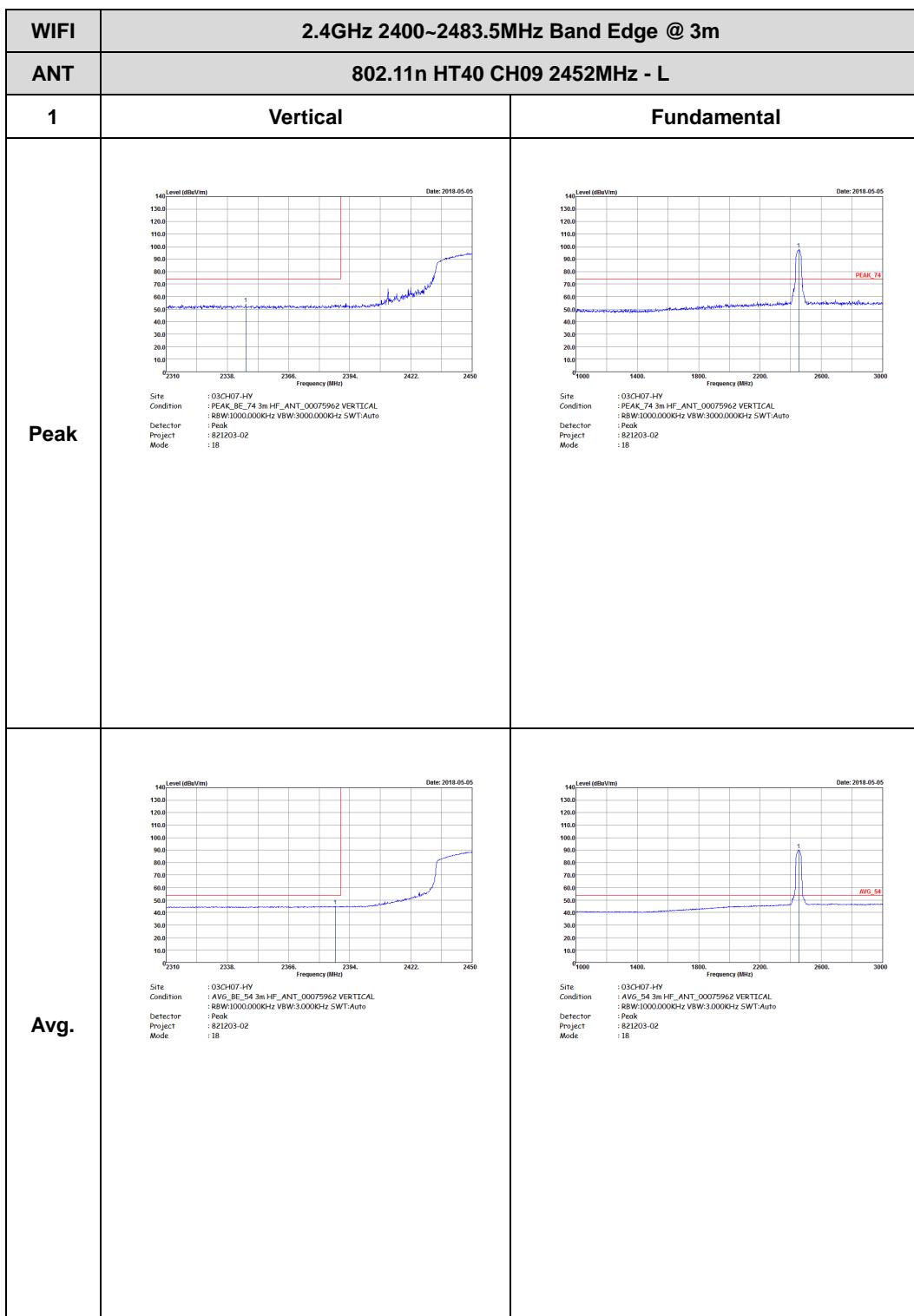


WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH06 2437MHz - R	
1	Horizontal	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project : Peak Mode : 17</p>	Left blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project : Peak Mode : 17</p>	Left blank





WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH09 2452MHz - R	
1	Horizontal	Fundamental
Peak	<p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 18</p>	Left blank
Avg.	<p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 HORIZONTAL Detector : R8W1000.000KHz VBW:3.000KHz SWT:Auto Project : Peak Mode : 821203-02 : 18</p>	Left blank





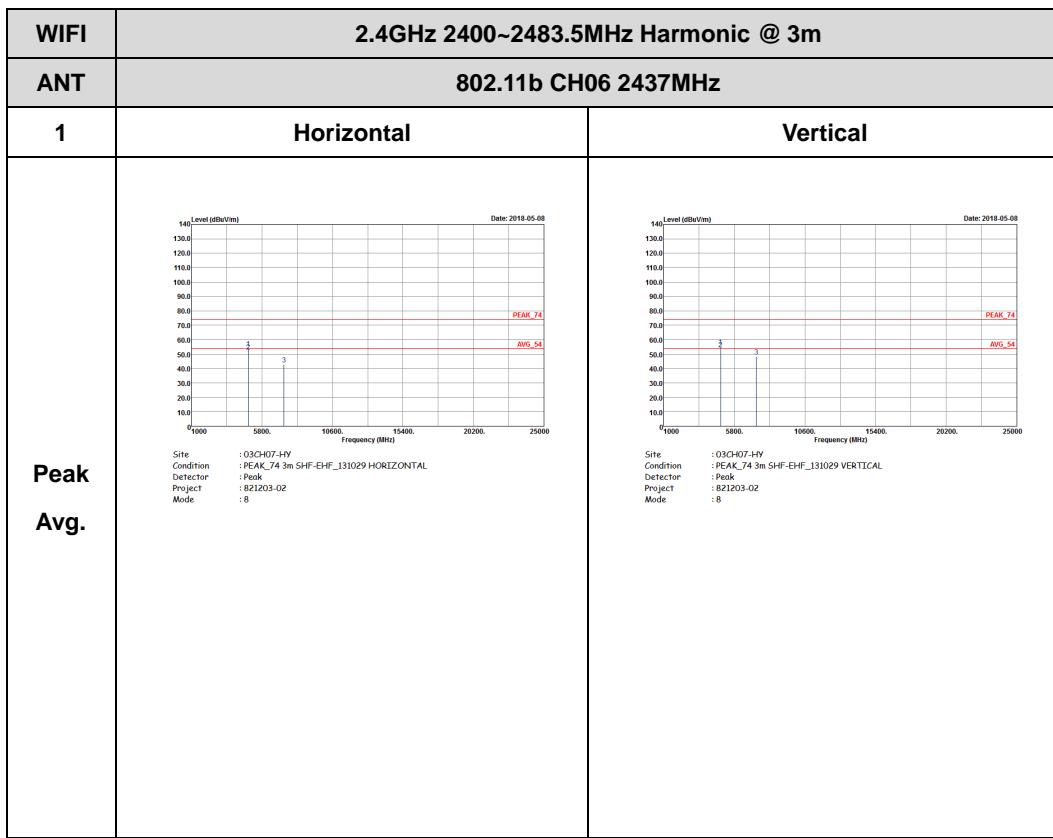
WIFI	2.4GHz 2400~2483.5MHz Band Edge @ 3m	
ANT	802.11n HT40 CH09 2452MHz - R	
1	Vertical	Fundamental
Peak	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : PCAC_BE_74 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project : 821203-02 Mode : 18</p>	Left blank
Avg.	<p>Level (dBm/V/m)</p> <p>Date: 2018-05-05</p> <p>Frequency (MHz)</p> <p>Site : 03CH07-HY Condition : AVG_BE_54 3m HF,_ANT_00075962 VERTICAL Detector : R8W:1000.000KHz VBW:3.000KHz SWT:Auto Project : 821203-02 Mode : 18</p>	Left blank

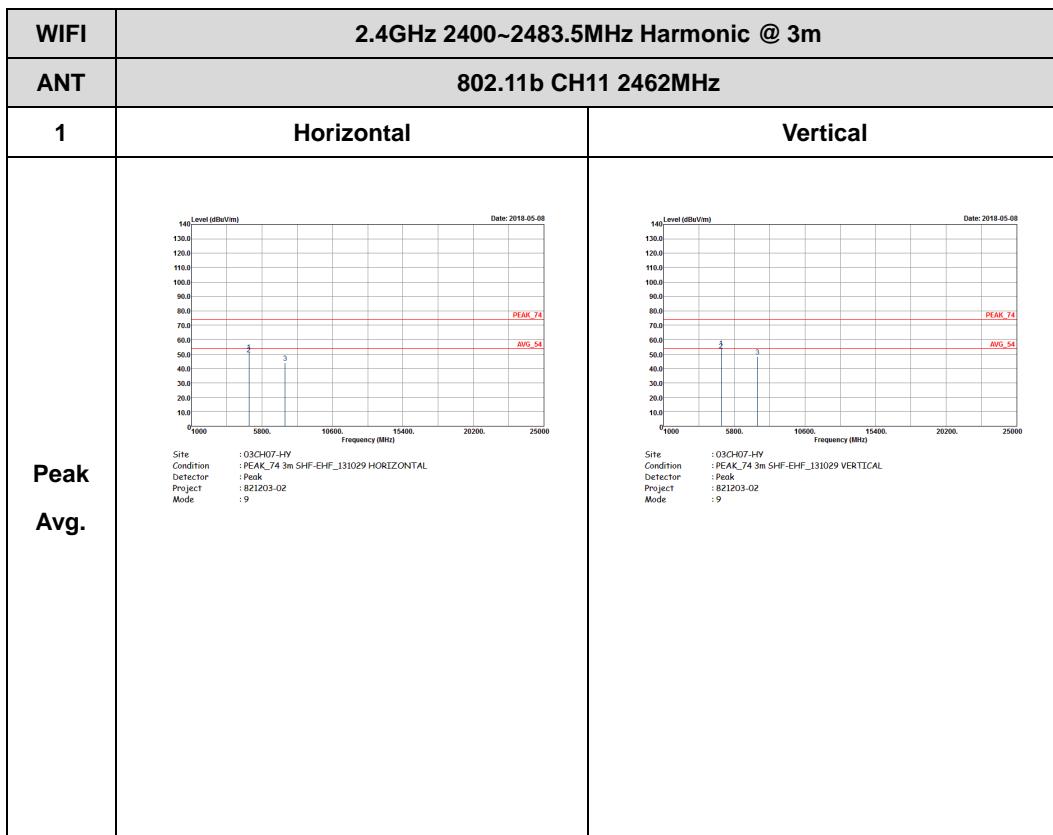


2.4GHz 2400~2483.5MHz

WIFI 802.11b (Harmonic @ 3m)

WIFI	2.4GHz 2400~2483.5MHz Harmonic @ 3m	
ANT	802.11b CH01 2412MHz	
1	Horizontal	Vertical
Peak	 Site : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 7	 Site : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 VERTICAL Detector : Peak Project : 821203-02 Mode : 7
Avg.		

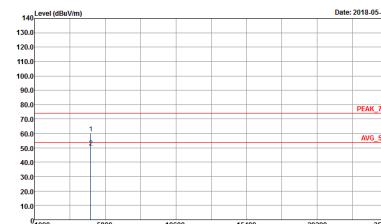


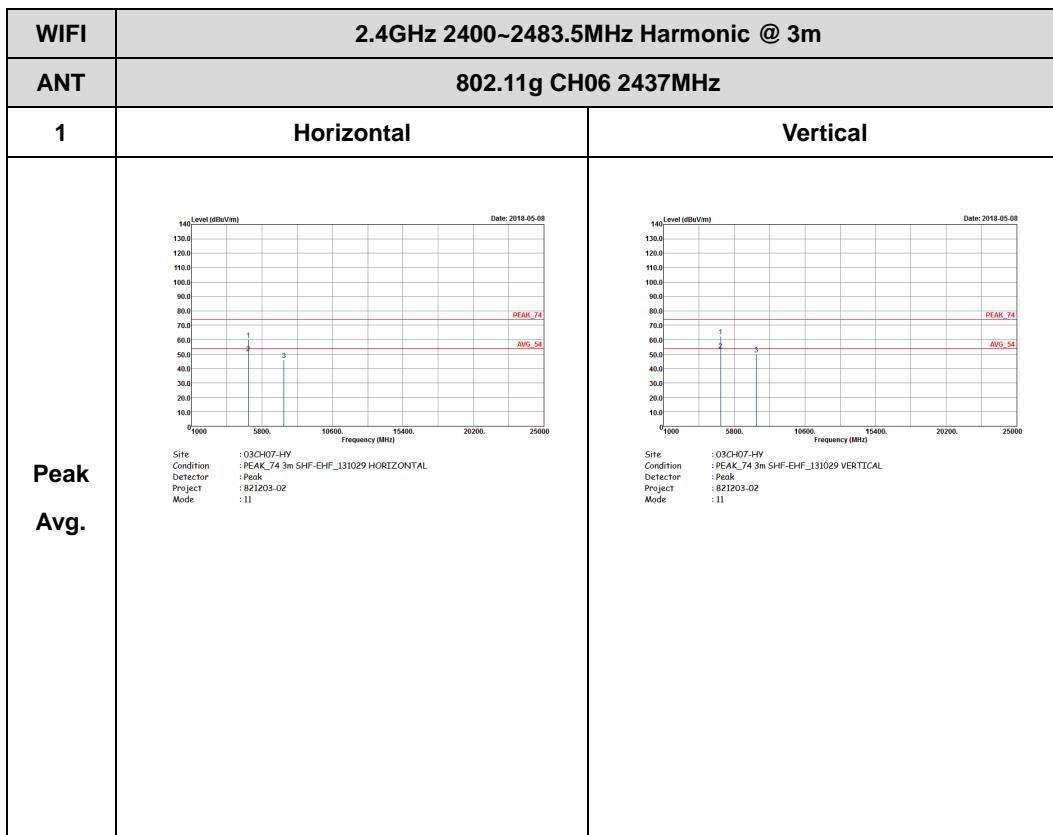


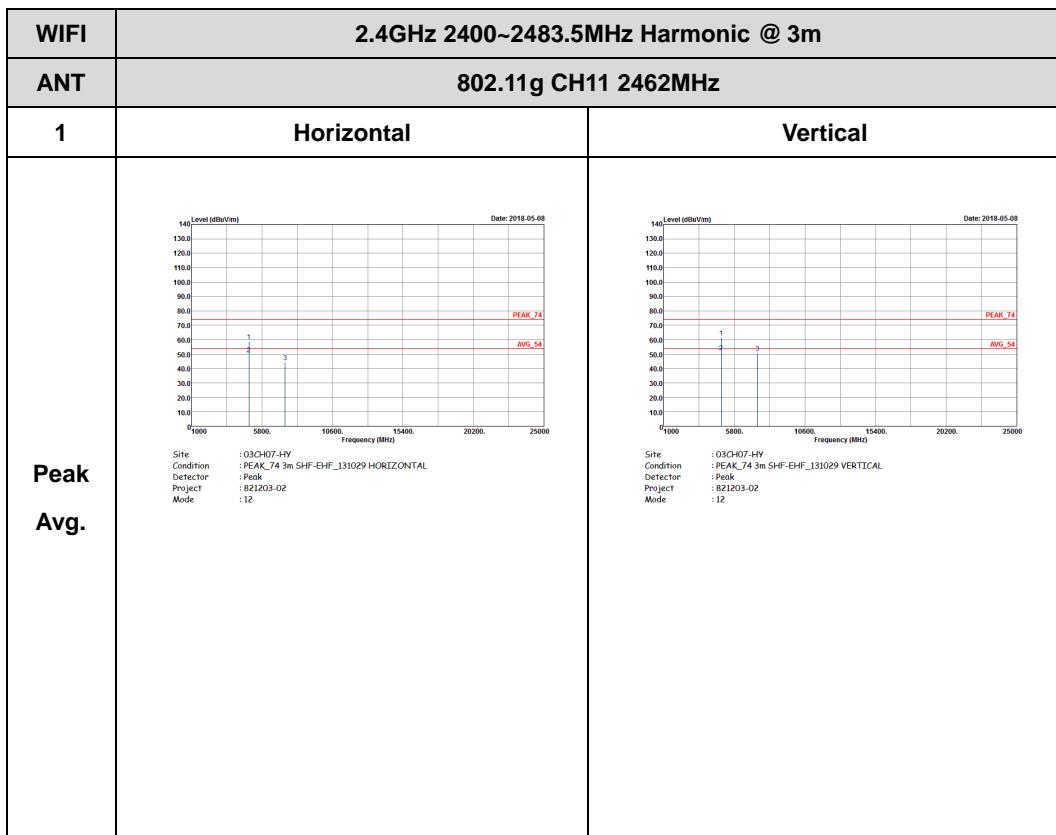


2.4GHz 2400~2483.5MHz

WIFI 802.11g (Harmonic @ 3m)

WIFI	2.4GHz 2400~2483.5MHz Harmonic @ 3m	
ANT	802.11g CH01 2412MHz	
1	Horizontal	Vertical
Peak	 <p>Site : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 10</p>	 <p>Site : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 VERTICAL Detector : Peak Project : 821203-02 Mode : 10</p>
Avg.		

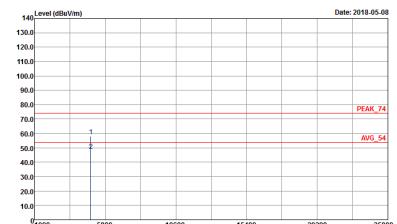


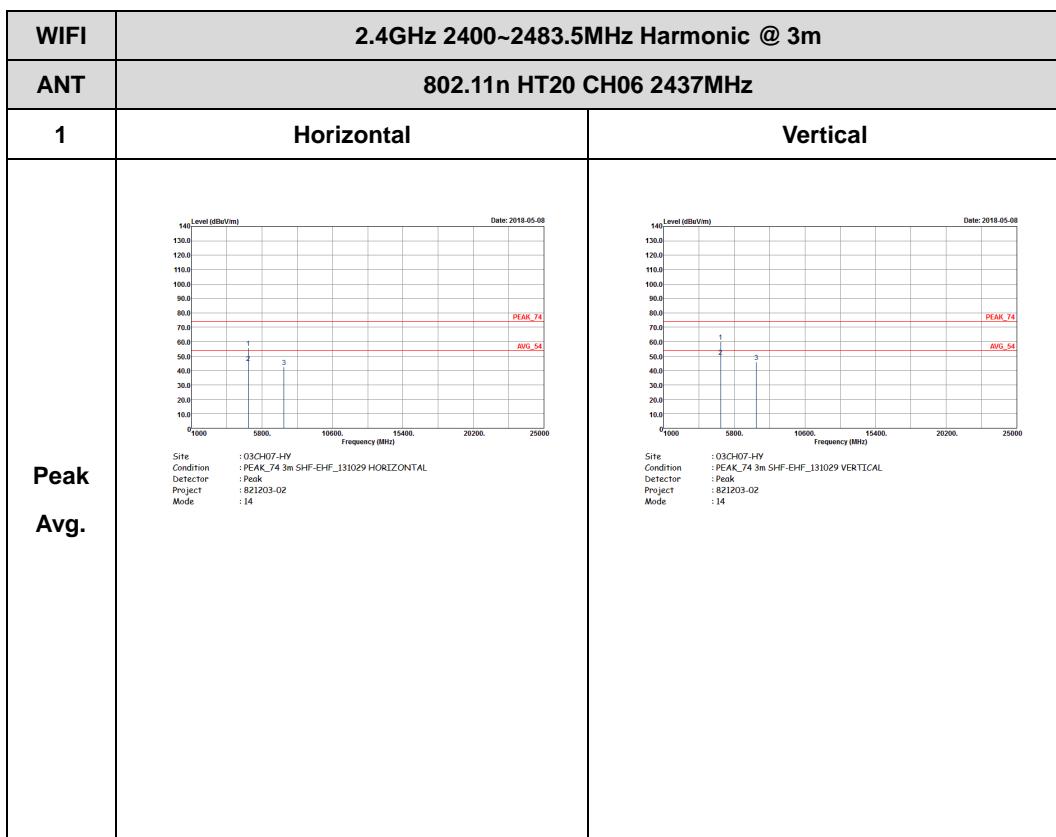




2.4GHz 2400~2483.5MHz

WIFI 802.11n HT20 (Harmonic @ 3m)

WIFI	2.4GHz 2400~2483.5MHz Harmonic @ 3m	
ANT	802.11n HT20 CH01 2412MHz	
1	Horizontal	Vertical
Peak Avg.	 <p>Site : 03C-K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 13</p>	 <p>Site : 03C-K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 VERTICAL Detector : Peak Project : 821203-02 Mode : 13</p>



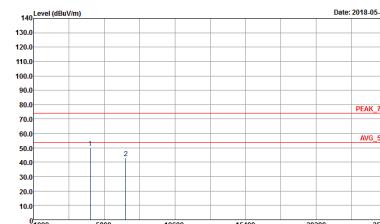


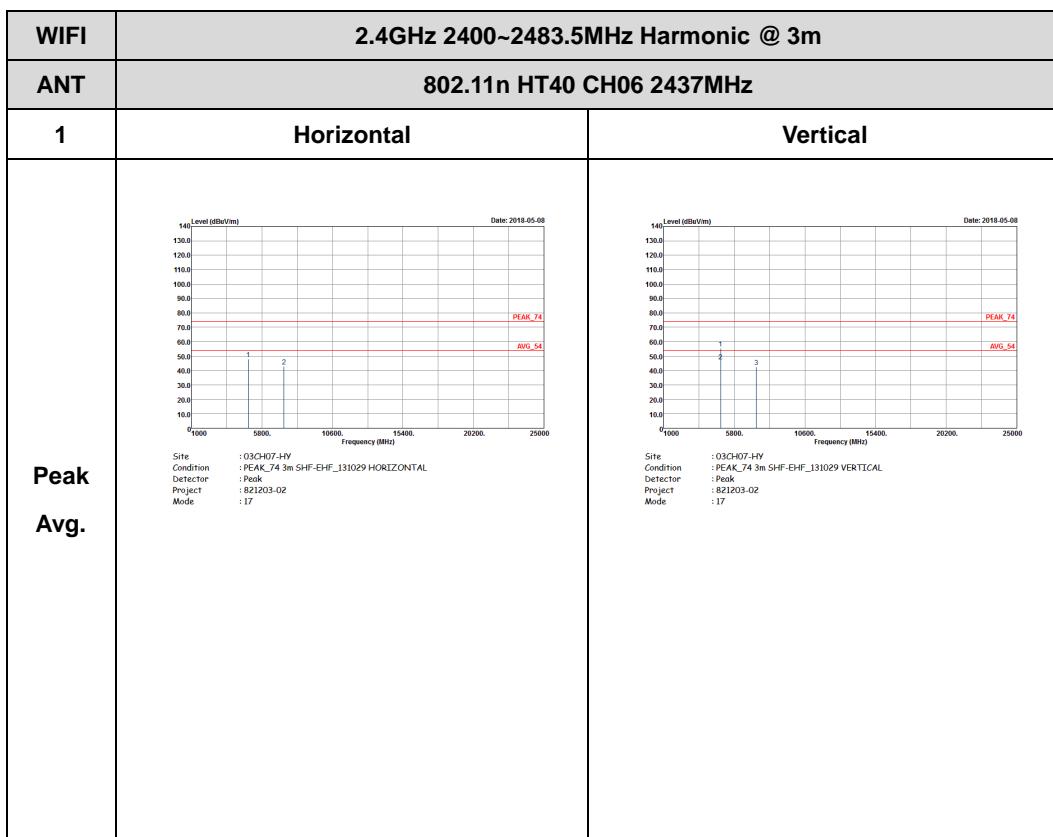
WIFI	2.4GHz 2400~2483.5MHz Harmonic @ 3m	
ANT	802.11n HT20 CH11 2462MHz	
1	Horizontal	Vertical
Peak Avg.	 Site : 03CH07-HY Condition : FCCX -74 3m SHF-EHF_131029 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 15	 Site : 03CH07-HY Condition : FCCX -74 3m SHF-EHF_131029 VERTICAL Detector : peak Project : 821203-02 Mode : 15

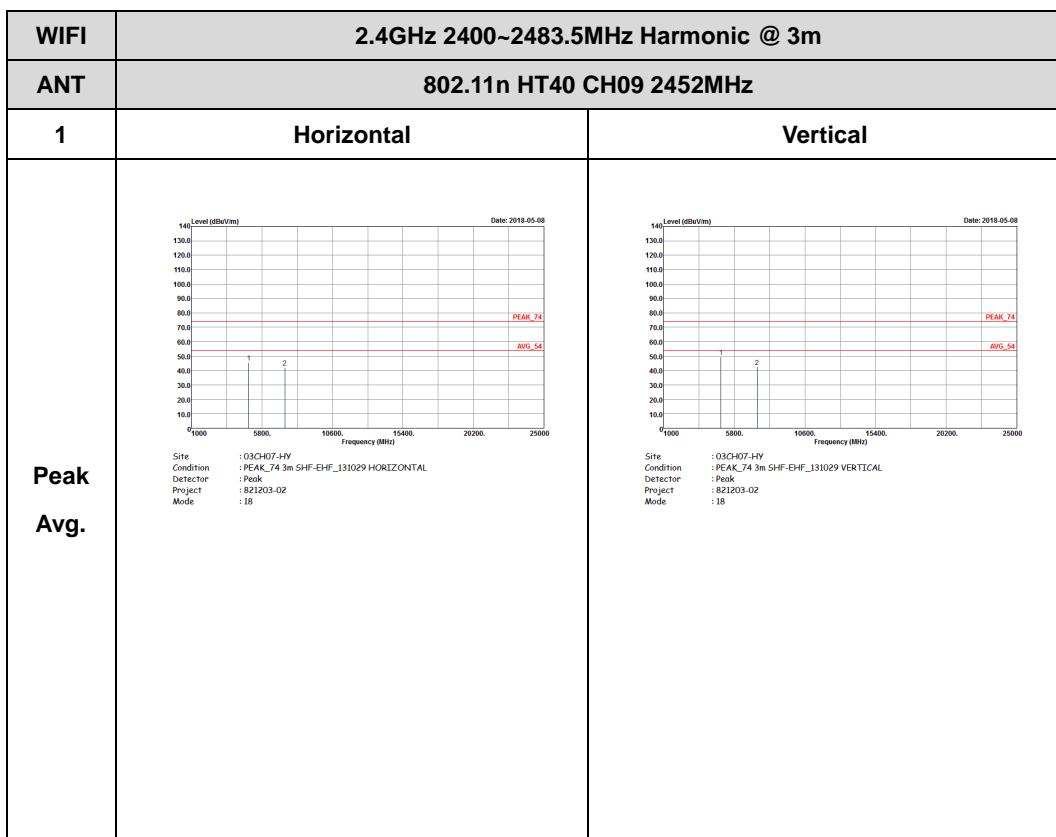


2.4GHz 2400~2483.5MHz

WIFI 802.11n HT40 (Harmonic @ 3m)

WIFI	2.4GHz 2400~2483.5MHz Harmonic @ 3m	
ANT	802.11n HT40 CH03 2422MHz	
1	Horizontal	Vertical
Peak	 <p>Cite : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 HORIZONTAL Detector : Peak Project : 821203-02 Mode : 16</p>	 <p>Cite : 03C_K07-H/P Condition : PEAK_74 3m SHF-EHF_I31029 VERTICAL Detector : Peak Project : 821203-02 Mode : 16</p>
Avg.		







Emission below 1GHz

2.4GHz WIFI 802.11b (LF)

