

Variant FCC Test Report

Report No.: RF150401C19E-1

FCC ID: ZQAT30

Test Model: A0013

Received Date: Jul. 01, 2016

Test Date: Jul. 12, 2016 ~ Aug. 15, 2016

Issued Date: Aug. 18, 2016

Applicant: Nest Labs Inc

Address: 3400 Hillview Ave. Palo Alto California, United States 94304

Issued By: Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch

Lab Address: No. 47-2, 14th Ling, Chia Pau Vil., Lin Kou Dist., New Taipei City, Taiwan (R.O.C)

Test Location: No. 19, Hwa Ya 2nd Rd, Wen Hwa Tsuen, Kwei Shan Hsiang, Taoyuan Hsien 333, Taiwan, R.O.C.



This report is for your exclusive use. Any copying or replication of this report to or for any other person or entity, or use of our name or trademark, is permitted only with our prior written permission. This report sets forth our findings solely with respect to the test samples identified herein. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. Our report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence, provided, however, that such notice shall be in writing and shall specifically address the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute your unqualified acceptance of the completeness of this report, the tests conducted and the correctness of the report contents. Unless specific mention, the uncertainty of measurement has been explicitly taken into account to declare the compliance or non-compliance to the specification.

Table of Contents

Release Control Record	3
1 Certificate of Conformity	4
2 Summary of Test Results.....	5
2.1 Measurement Uncertainty.....	5
2.2 Modification Record	5
3 General Information	6
3.1 General Description of EUT	6
3.2 Description of Test Modes.....	7
3.2.1 Test Mode Applicability and Tested Channel Detail.....	7
3.3 Description of Support Units	8
3.3.1 Configuration of System under Test	8
3.4 General Description of Applied Standards.....	8
4 Test Types and Results	9
4.1 Radiated Emission and Bandedge Measurement	9
4.1.1 Limits of Radiated Emission and Bandedge Measurement	9
4.1.2 Test Instruments	10
4.1.3 Test Procedures.....	11
4.1.4 Deviation from Test Standard	11
4.1.5 Test Set Up	12
4.1.6 EUT Operating Conditions.....	12
4.1.7 Test Results	13
5 Pictures of Test Arrangements.....	21
Appendix – Information on the Testing Laboratories	22

Release Control Record

Issue No.	Description	Date Issued
RF150401C19E-1	Original Release	Aug. 18, 2016

1 Certificate of Conformity

Product: Nest Learning Thermostat

Test Model: A0013

Sample Status: Production Unit

Applicant: Nest Labs Inc

Test Date: Jul. 12, 2016 ~ Aug. 15, 2016

Standards: 47 CFR FCC Part 15, Subpart C (Section 15.247)
ANSI C63.10:2013

This report is issued as a supplementary report to BV ADT report no.: RF150401C19-1 R1. This report shall be used by combining with its original report.

Prepared by : Evonne Liu , **Date:** Aug. 18, 2016
Evonne Liu / Specialist

Approved by : Stanley Wu , **Date:** Aug. 18, 2016
Stanley Wu / Assistant Manager

2 Summary of Test Results

47 CFR FCC Part 15, Subpart C (Section 15.247)			
FCC Clause	Test Item	Result	Remarks
15.207	AC Power Conducted Emission	NA	Refer to Note
15.205 / 15.209 / 15.247(d)	Radiated Emissions and Band Edge Measurement	Pass	Meet the requirement of limit. Minimum passing margin is -3.59 dB at 2386 MHz.
15.247(d)	Antenna Port Emission	NA	Refer to Note
15.247(a)(2)	6 dB Bandwidth	NA	Refer to Note
15.247(b)	Conducted power	NA	Refer to Note
15.247(e)	Power Spectral Density	NA	Refer to Note
15.203	Antenna Requirement	NA	Refer to Note

Note: Only Radiated Emissions test was performed for this addendum. Refer to original report for other test data.

2.1 Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the EUT:

The listed uncertainties are the worst case uncertainty for the entire range of measurement. Please note that the uncertainty values are provided for informational purposes only and are not used in determining the PASS/FAIL results.

Measurement	Frequency	Expanded Uncertainty (k=2) (±)
Radiated Emissions up to 1 GHz	30 MHz ~ 200 MHz	2.93 dB
	200 MHz ~ 1000 MHz	2.95 dB
Radiated Emissions above 1 GHz	1 GHz ~ 18 GHz	2.26 dB
	18 GHz ~ 40 GHz	1.94 dB

2.2 Modification Record

There were no modifications required for compliance.

3 General Information

3.1 General Description of EUT

Product	Nest Learning Thermostat
Test Model	A0013
Status of EUT	Production Unit
Power Supply Rating	5.0Vac (Adapter)
Modulation Type	CCK, DQPSK, DBPSK for DSSS 64QAM, 16QAM, QPSK, BPSK for OFDM
Modulation Technology	DSSS, OFDM
Transfer Rate	802.11b: 11.0 / 5.5 / 2.0 / 1.0 Mbps 802.11g: 54.0 / 48.0 / 36.0 / 24.0 / 18.0 / 12.0 / 9.0 / 6.0 Mbps 802.11n: up to MCS7
Operating Frequency	2412 ~ 2462 MHz
Number of Channel	11 for 802.11b, 802.11g, 802.11n (HT20)
Antenna Type	Loop antenna with 1.1 dBi gain
Antenna Connector	N/A
Accessory Device	Refer to Note as below
Data Cable Supplied	Refer to Note as below

Note:

1. This report is issued as a supplementary report to BV ADT report no. RF150401C19-1 R1. The difference compared with original report is adding material of outer casing. Therefore, only Radiated Emissions was verified and recorded in this report.
2. The EUT contains following accessory devices.

Product	Brand	Model	Description
Adapter	Nest	A0017	I/P: 100-240Vac, 50/60Hz, 0.35A O/P: 5Vdc, 2.5A
USB Cable	Nest	NA	2.0m shielded cable w/o core
Stand	Nest	Stand	--

3. The device has 3 configurations as below.
 - Main sample (A): Material of outer casing for DLC
 - 2nd sample (B): Material of outer casing for Copper
 - 3rd sample (C): Material of outer casing for Ceramic
4. The above EUT information is declared by manufacturer and for more detailed features description, please refer to the manufacturer's specifications or user's manual.

3.2 Description of Test Modes

11 channels are provided for 802.11b, 802.11g and 802.11n (HT20):

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

3.2.1 Test Mode Applicability and Tested Channel Detail

EUT Configure Mode	Applicable To		Description
	RE \geq 1G	RE $<$ 1G	
A	√	-	Sample A: DLC
B	√	-	Sample B: Copper
C	√	√	Sample C: Ceramic

Where **RE \geq 1G**: Radiated Emission above 1 GHz **RE $<$ 1G**: Radiated Emission below 1 GHz

- NOTE:** 1. The EUT had been pre-tested on the positioned of each 3 axis. The worst case was found when positioned on **Z-plane**.
 2. "-" means no effect.

Radiated Emission Test (Above 1 GHz):

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
 Following channel(s) was (were) selected for the final test as listed below.

EUT Configure Mode	Mode	Available Channel	Tested Channel	Modulation Technology	Modulation Type	Data Rate (Mbps)
A, B, C	802.11b	1 to 11	1	DSSS	DBPSK	1.0

Radiated Emission Test (Below 1 GHz):

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
 Following channel(s) was (were) selected for the final test as listed below.

EUT Configure Mode	Mode	Available Channel	Tested Channel	Modulation Technology	Modulation Type	Data Rate (Mbps)
C	802.11b	1 to 11	1	DSSS	DBPSK	1.0

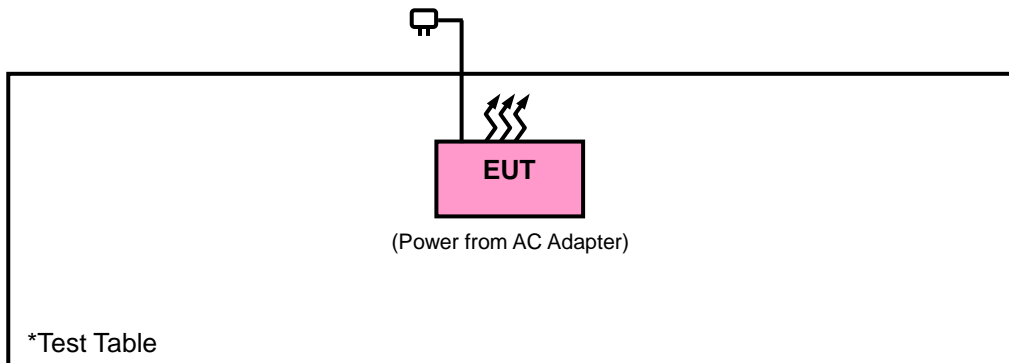
Test Condition:

Applicable To	Environmental Conditions	Input Power	Tested by
RE \geq 1G	25 deg. C, 65 % RH	120 Vac, 60 Hz	Gavin Wu
RE $<$ 1G	25 deg. C, 65 % RH	120 Vac, 60 Hz	Gavin Wu

3.3 Description of Support Units

The EUT has been tested as an independent unit together with other necessary accessories or support units.

3.3.1 Configuration of System under Test



3.4 General Description of Applied Standards

The EUT is a RF Product. According to the specifications of the manufacturer, it must comply with the requirements of the following standards:

FCC Part 15, Subpart C (15.247)

558074 D01 DTS Meas Guidance v03r05

ANSI C63.10-2013

All test items have been performed and recorded as per the above standards.

NOTE: The EUT has been verified to comply with the requirements of FCC Part 15, Subpart B, Class B (DoC).
The test report has been issued separately.

4 Test Types and Results

4.1 Radiated Emission and Bandedge Measurement

4.1.1 Limits of Radiated Emission and Bandedge Measurement

Radiated emissions which fall in the restricted bands must comply with the radiated emission limits specified as below table. Other emissions shall be at least 20 dB below the highest level of the desired power:

Frequencies (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

NOTE:

1. The lower limit shall apply at the transition frequencies.
2. Emission level (dBuV/m) = 20 log Emission level (uV/m).
3. For frequencies above 1000 MHz, the field strength limits are based on average detector, however, the peak field strength of any emission shall not exceed the maximum permitted average limits, specified above by more than 20 dB under any condition of modulation.

4.1.2 Test Instruments

Description & Manufacturer	Model No.	Serial No.	Date of Calibration	Due Date of Calibration
Test Receiver Agilent	N9038A	MY51210203	Jan. 21, 2016	Jan. 20, 2017
Spectrum Analyzer Agilent	N9010A	MY52220314	Sep.03, 2015	Sep.02, 2016
BILOG Antenna SCHWARZBECK	VULB9168	9168-472	Jan. 07, 2016	Jan. 06, 2017
HORN Antenna SCHWARZBECK	BBHA 9120 D	9120D-969	Jan. 04, 2016	Jan. 03, 2017
HORN Antenna SCHWARZBECK	BBHA 9170	9170-480	Jan. 08, 2016	Jan. 07, 2017
Loop Antenna	LPA600	270	Aug. 20, 2015	Aug. 19, 2017
Agilent Communications Tester-Wireless	8960 Series 10	MY53201073	Jul. 03, 2015	Jul. 02, 2017
Preamplifier EMCI	EMC 012645	980115	Dec. 21, 2015	Dec. 20, 2016
Preamplifier EMCI	EMC 184045	980116	Dec. 21, 2015	Dec. 20, 2016
Preamplifier EMCI	EMC 330H	980112	Dec. 28, 2015	Dec. 27, 2016
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	309219/4 2950114	Oct. 12, 2015	Oct. 11, 2016
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	250130/4	Oct. 12, 2015	Oct. 11, 2016
RF Coaxial Cable Worken	8D-FB	Cable-Ch10-01	Oct. 12, 2015	Oct. 11, 2016
Software BV ADT	E3 6.120103	NA	NA	NA
Antenna Tower MF	MFA-440H	NA	NA	NA
Turn Table MF	MFT-201SS	NA	NA	NA
Antenna Tower & Turn Table Controller MF	MF-7802	NA	NA	NA

- Note: 1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.
2. The test was performed in HwaYa Chamber 10.
3. The horn antenna and preamplifier (model: EMC 184045) are used only for the measurement of emission frequency above 1 GHz if tested.
4. The FCC Site Registration No. is 690701.
5. The IC Site Registration No. is IC7450F-10.

4.1.3 Test Procedures

- a. The EUT was placed on the top of a rotating table 0.8 meters (for below 1 GHz) / 1.5 meters (for above 1 GHz) above the ground at 3 meter chamber room for test. The table was rotated 360 degrees to determine the position of the highest radiation.
- b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c. The height of antenna is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e. The test-receiver system was set to quasi-peak detect function and specified bandwidth with maximum hold mode when the test frequency is below 1 GHz.
- f. The test-receiver system was set to peak and average detected function and specified bandwidth with maximum hold mode when the test frequency is above 1 GHz. If the peak reading value also meets average limit, measurement with the average detector is unnecessary.

Note:

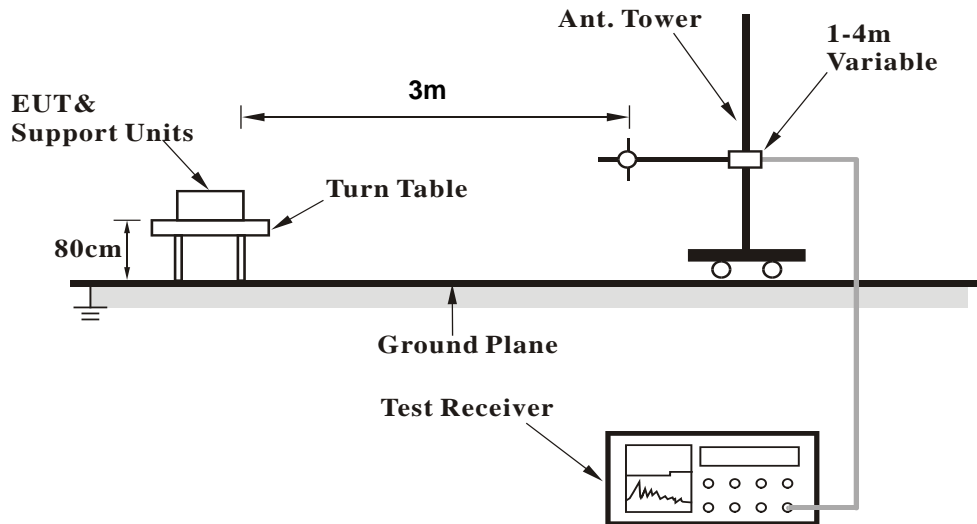
1. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 120 kHz for Quasi-peak detection (QP) at frequency below 1 GHz.
2. The resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 3 MHz for Peak detection (PK) at frequency above 1 GHz.
3. The resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1/T for RMS Average (Duty cycle < 98 %) for Peak detection at frequency above 1 GHz.
4. The resolution bandwidth of test receiver/spectrum analyzer is 1MHz and the video bandwidth is 10 Hz (Duty cycle \geq 98 %) for Average detection (AV) at frequency above 1 GHz.
5. All modes of operation were investigated and the worst-case emissions are reported.

4.1.4 Deviation from Test Standard

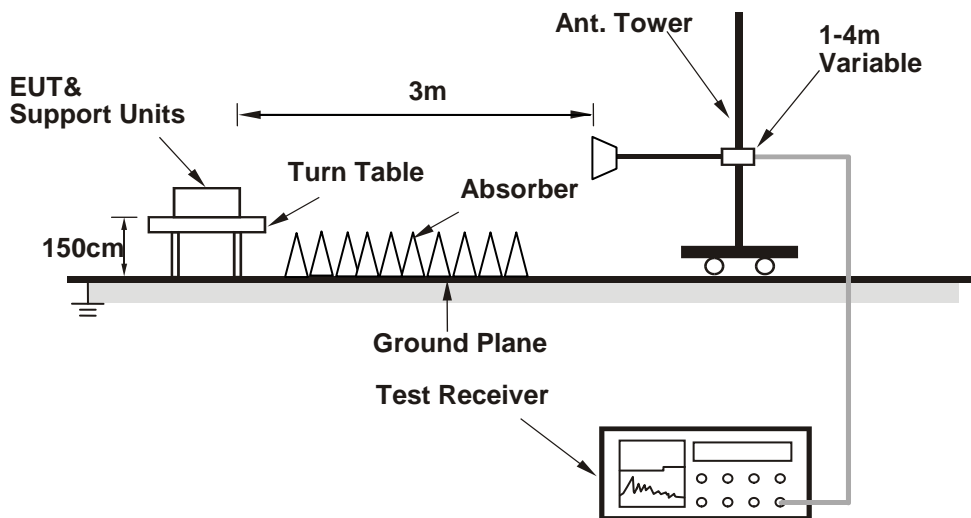
No deviation.

4.1.5 Test Set Up

<Frequency Range below 1 GHz>



<Frequency Range above 1 GHz>



For the actual test configuration, please refer to the attached file (Test Setup Photo).

4.1.6 EUT Operating Conditions

- a. Placed the EUT on a testing table.
- b. Use the software to control the EUT under transmission condition continuously at specific channel frequency.

4.1.7 Test Results

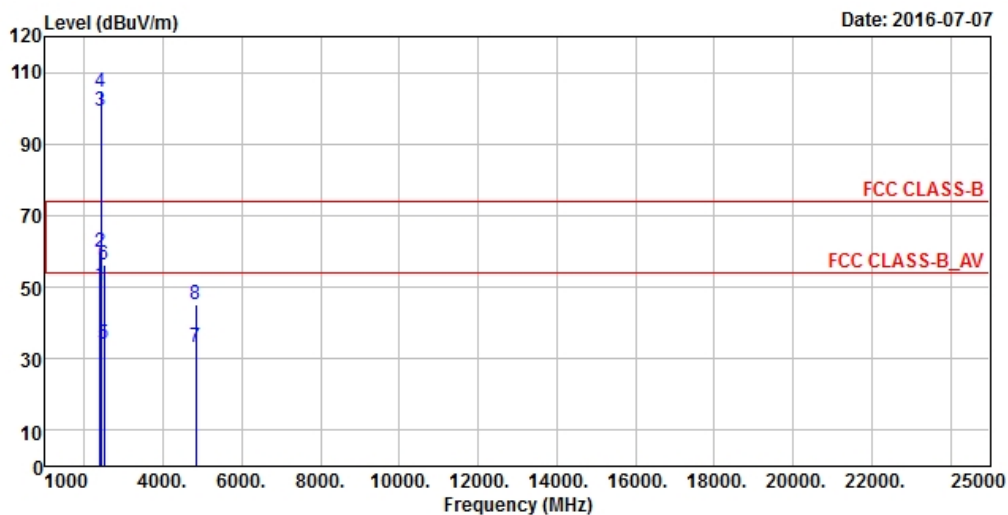
Above 1 GHz Data :

802.11b

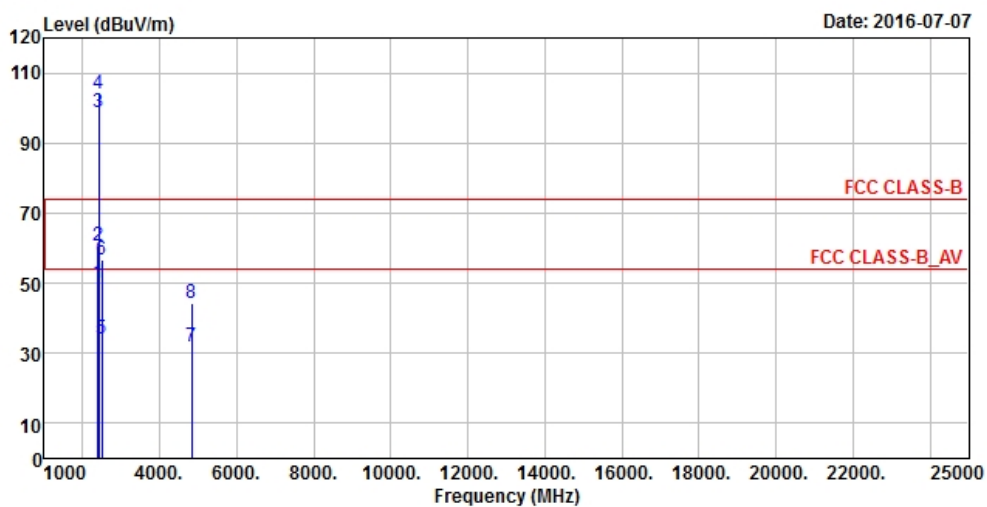
Mode A

EUT Test Condition		Measurement Detail	
Channel	Channel 1	Frequency Range	1 GHz ~ 25 GHz
Input Power	120 Vac, 60 Hz	Detector Function	Peak (PK) RBW : 1MHz , VBW : 3MHz Average (AV) RBW : 1MHz , VBW : 1KHz
Environmental Conditions	25 deg. C, 65 % RH	Tested By	Gavin Wu

Horizontal



Vertical



Antennal Polarity & Test Distance: Horizontal at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2386	50.41	56.92	54	-3.59	26.91	4.08	37.5	169	142	Average
2386	59.58	66.09	74	-14.42	26.91	4.08	37.5	169	142	Peak
2412	99.19	105.66			26.96	4.09	37.52	169	142	Average
2412	104.37	110.84			26.96	4.09	37.52	169	142	Peak
2498	34.26	40.15	54	-19.74	27.2	4.16	37.25	169	142	Average
2498	56.17	62.06	74	-17.83	27.2	4.16	37.25	169	142	Peak
4824	33.36	48.66	54	-20.64	30.99	6.79	53.08	144	359	Average
4824	44.99	60.29	74	-29.01	30.99	6.79	53.08	144	359	Peak

Antennal Polarity & Test Distance: Vertical at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2386	49.85	56.36	54	-4.15	26.91	4.08	37.5	150	33	Average
2386	60.53	67.04	74	-13.47	26.91	4.08	37.5	150	33	Peak
2412	98.71	105.18			26.96	4.09	37.52	150	33	Average
2412	103.88	110.35			26.96	4.09	37.52	150	33	Peak
2500	34.05	39.94	54	-19.95	27.2	4.16	37.25	150	33	Average
2500	56.51	62.4	74	-17.49	27.2	4.16	37.25	150	33	Peak
4824	32.04	47.34	54	-21.96	30.99	6.79	53.08	159	299	Average
4824	44.28	59.58	74	-29.72	30.99	6.79	53.08	159	299	Peak

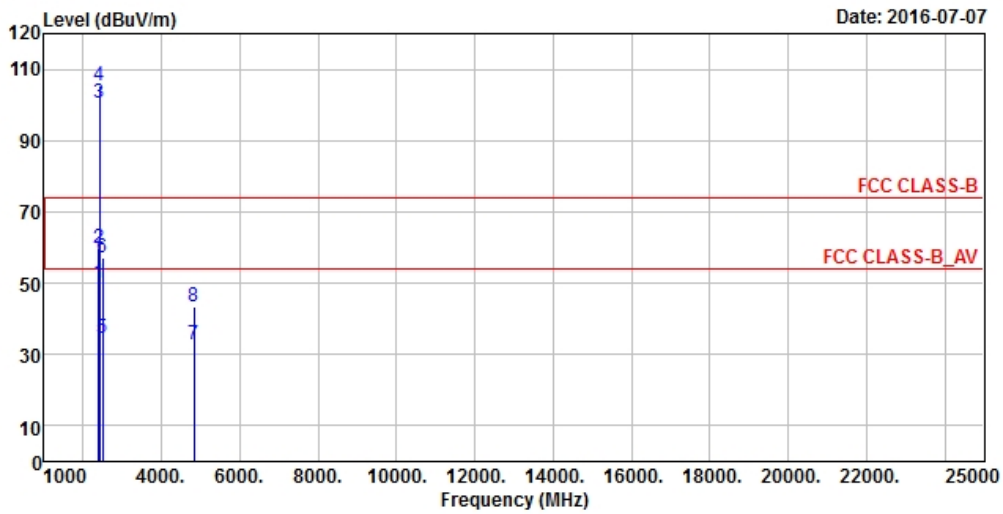
Remarks:

- Emission Level = Read Level + Antenna Factor + Cable Loss - Preamp Factor
Margin value = Emission level – Limit value
- 2412 MHz: Fundamental frequency.

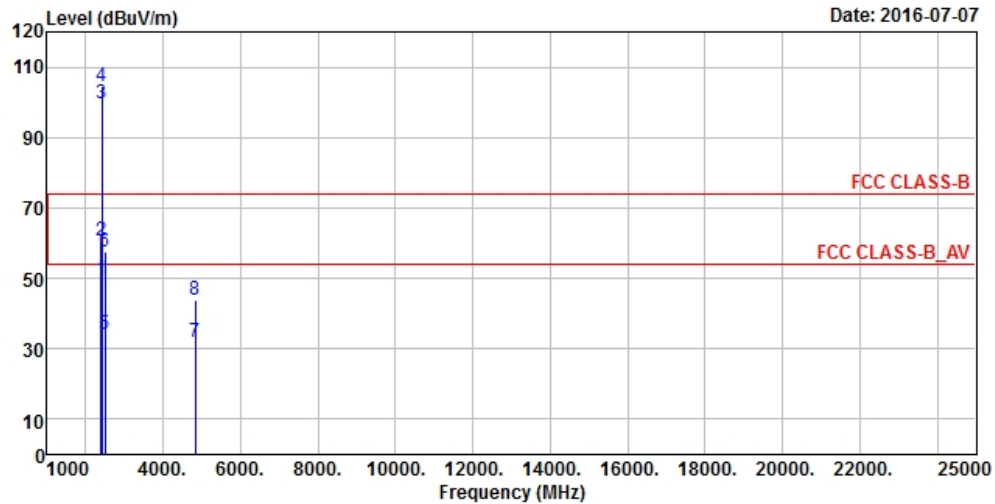
Mode B

EUT Test Condition		Measurement Detail	
Channel	Channel 1	Frequency Range	1 GHz ~ 25 GHz
Input Power	120 Vac, 60 Hz	Detector Function	Peak (PK) RBW : 1MHz , VBW : 3MHz Average (AV) RBW : 1MHz , VBW : 1KHz
Environmental Conditions	25 deg. C, 65 % RH	Tested By	Gavin Wu

Horizontal



Vertical



Antennal Polarity & Test Distance: Horizontal at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2388	50.24	56.75	54	-3.76	26.91	4.08	37.5	154	219	Average
2388	59.6	66.11	74	-14.4	26.91	4.08	37.5	154	219	Peak
2412	100.39	106.86			26.96	4.09	37.52	154	219	Average
2412	105.61	112.08			26.96	4.09	37.52	154	219	Peak
2496	34.38	40.27	54	-19.62	27.2	4.16	37.25	154	219	Average
2496	56.97	62.86	74	-17.03	27.2	4.16	37.25	154	219	Peak
4824	32.86	48.16	54	-21.14	30.99	6.79	53.08	137	19	Average
4824	43.6	58.9	74	-30.4	30.99	6.79	53.08	137	19	Peak

Antennal Polarity & Test Distance: Vertical at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2386	49.54	56.05	54	-4.46	26.91	4.08	37.5	100	319	Average
2386	60.64	67.15	74	-13.36	26.91	4.08	37.5	100	319	Peak
2412	99.49	105.96			26.96	4.09	37.52	100	319	Average
2412	104.69	111.16			26.96	4.09	37.52	100	319	Peak
2492	34.1	39.99	54	-19.9	27.2	4.16	37.25	100	319	Average
2492	57.69	63.58	74	-16.31	27.2	4.16	37.25	100	319	Peak
4824	32.03	47.33	54	-21.97	30.99	6.79	53.08	102	211	Average
4824	44.04	59.34	74	-29.96	30.99	6.79	53.08	102	211	Peak

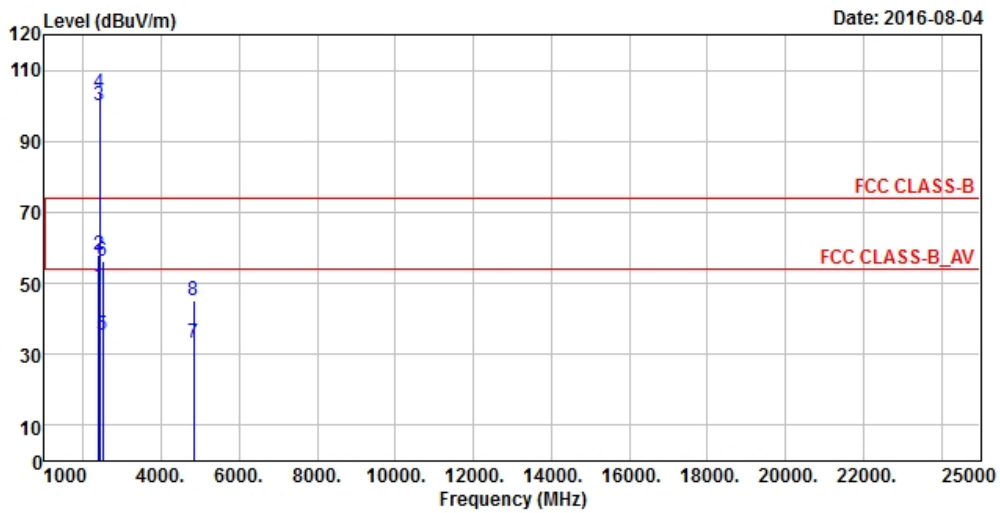
Remarks:

- Emission Level = Read Level + Antenna Factor + Cable Loss - Preamp Factor
Margin value = Emission level – Limit value
- 2412 MHz: Fundamental frequency.

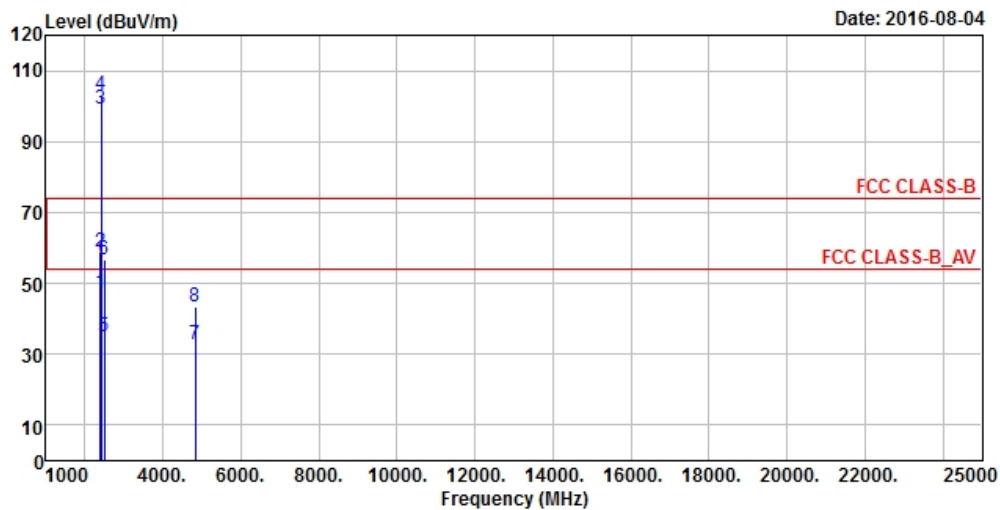
Mode C

EUT Test Condition		Measurement Detail	
Channel	Channel 1	Frequency Range	1 GHz ~ 25 GHz
Input Power	120 Vac, 60 Hz	Detector Function	Peak (PK) RBW : 1MHz , VBW : 3MHz Average (AV) RBW : 1MHz , VBW : 1KHz
Environmental Conditions	25 deg. C, 65 % RH	Tested By	Gavin Wu

Horizontal



Vertical



Antennal Polarity & Test Distance: Horizontal at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2386	49.23	55.74	54	-4.77	26.91	4.08	37.5	174	37	Average
2386	58.13	64.64	74	-15.87	26.91	4.08	37.5	174	37	Peak
2412	100.2	106.67			26.96	4.09	37.52	174	37	Average
2412	103.62	110.09			26.96	4.09	37.52	174	37	Peak
2498	35.29	41.18	54	-18.71	27.2	4.16	37.25	174	37	Average
2498	56.28	62.17	74	-17.72	27.2	4.16	37.25	174	37	Peak
4824	33.34	48.64	54	-20.66	30.99	6.79	53.08	110	115	Average
4824	45.39	60.69	74	-28.61	30.99	6.79	53.08	110	115	Peak

Antennal Polarity & Test Distance: Vertical at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
2388	47.31	53.82	54	-6.69	26.91	4.08	37.5	167	360	Average
2388	58.79	65.3	74	-15.21	26.91	4.08	37.5	167	360	Peak
2412	99.4	105.87			26.96	4.09	37.52	167	360	Average
2412	103.2	109.67			26.96	4.09	37.52	167	360	Peak
2488	35.04	41	54	-18.96	27.2	4.16	37.32	167	360	Average
2488	56.53	62.49	74	-17.47	27.2	4.16	37.32	167	360	Peak
4824	32.57	47.87	54	-21.43	30.99	6.79	53.08	100	176	Average
4824	43.54	58.84	74	-30.46	30.99	6.79	53.08	100	176	Peak

Remarks:

- Emission Level = Read Level + Antenna Factor + Cable Loss - Preamp Factor
Margin value = Emission level – Limit value
- 2412 MHz: Fundamental frequency.

9 kHz ~ 30 MHz DATA:

The amplitude of spurious emissions attenuated more than 20 dB below the permissible value is not required to be report.

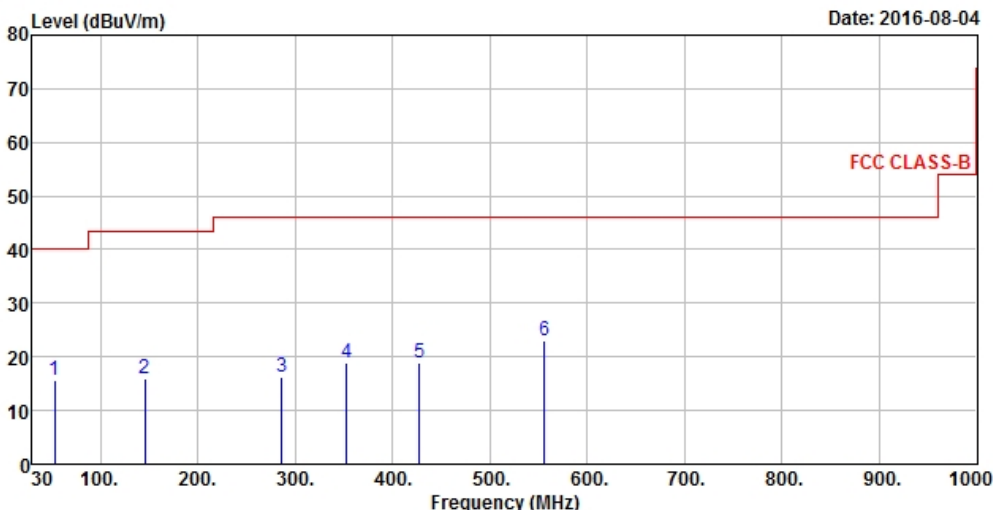
30 MHz ~ 1 GHz WORST-CASE DATA:

802.11b

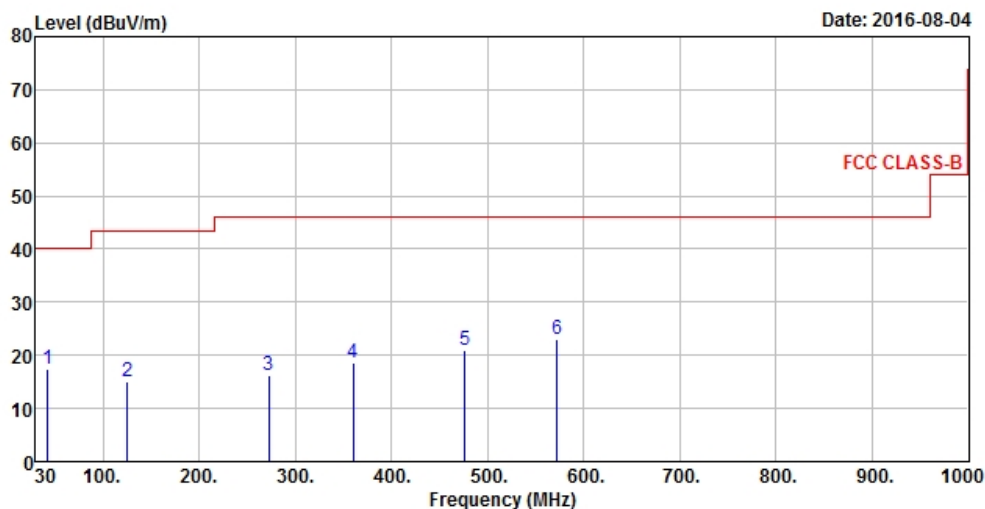
Mode C

EUT Test Condition		Measurement Detail	
Channel	Channel 1	Frequency Range	30 MHz ~ 1 GHz
Input Power	120 Vac, 60 Hz	Detector Function	Peak (PK) RBW : 120KHz , VBW : 360KHz Quasi-peak (QP)
Environmental Conditions	25 deg. C, 65 % RH	Tested By	Gavin Wu

Horizontal



Vertical



Antennal Polarity & Test Distance: Horizontal at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
53.28	15.71	33.65	40	-24.29	12.66	0.73	31.33	100	149	Peak
145.43	15.88	33.8	43.5	-27.62	12.54	1.16	31.62	121	212	Peak
286.08	16.24	33.84	46	-29.76	12.54	1.59	31.73	102	81	Peak
353.01	18.87	34.76	46	-27.13	14.22	1.77	31.88	129	271	Peak
427.7	18.9	33.08	46	-27.1	15.89	1.95	32.02	105	37	Peak
555.74	22.96	34.21	46	-23.04	18.59	2.18	32.02	111	22	Peak

Antennal Polarity & Test Distance: Vertical at 3 m

Frequency (MHz)	Emission Level (dBuV/m)	Read Level (dBuV)	Limit (dBuV/m)	Margin (dB)	Antenna Factor (dB/m)	Cable Loss (dB)	Preamp Factor (dB)	Antenna Height (cm)	Table Angle (Degree)	Remark
42.61	17.52	34.36	40	-22.48	13.58	0.66	31.08	114	119	Peak
125.06	15.18	34.58	43.5	-28.32	11.35	1.14	31.89	131	268	Peak
272.5	16.36	34.63	46	-29.64	12.14	1.56	31.97	133	227	Peak
359.8	18.54	34.34	46	-27.46	14.38	1.79	31.97	132	5	Peak
476.2	20.84	33.82	46	-25.16	16.85	2.04	31.87	116	258	Peak
572.23	23.13	34.04	46	-22.87	18.97	2.21	32.09	122	17	Peak

Remarks:

- Emission Level = Read Level + Antenna Factor + Cable Loss - Preamp Factor
Margin value = Emission level – Limit value

5 Pictures of Test Arrangements

Please refer to the attached file (Test Setup Photo).

Appendix – Information on the Testing Laboratories

We, Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch, were founded in 1988 to provide our best service in EMC, Radio, Telecom and Safety consultation. Our laboratories are accredited and approved according to ISO/IEC 17025.

If you have any comments, please feel free to contact us at the following:

Linko EMC/RF Lab

Tel: 886-2-26052180

Fax: 886-2-26051924

Hsin Chu EMC/RF/Telecom Lab

Tel: 886-3-6668565

Fax: 886-3-6668323

Hwa Ya EMC/RF/Safety Lab

Tel: 886-3-3183232

Fax: 886-3-3270892

Email: service.adt@tw.bureauveritas.com

Web Site: www.bureauveritas-adt.com

The address and road map of all our labs can be found in our web site also.

--- END ---