



# FCC Test Report

**APPLICANT** : Motorola Mobility LLC  
**EQUIPMENT** : Mobile Cellular Phone  
**BRAND NAME** : Motorola  
**MODEL NAME** : XT1929-8  
**FCC ID** : IHDT56XE3  
**STANDARD** : FCC 47 CFR FCC Part 15 Subpart B  
**CLASSIFICATION** : Declaration of Conformity

The product was received on Jan. 18, 2018 and testing was completed on Feb. 19, 2018. We, SPORTON INTERNATIONAL INC., would like to declare that the tested sample has been evaluated in accordance with the test procedures given in ANSI C63.4-2014 and has been in compliance with the applicable technical standards.

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

Reviewed by: Louis Wu / Manager

Approved by: Jones Tsai / Manager



## **SPORTON INTERNATIONAL INC.**

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FCC ID : IHDT56XE3

Page Number : 1 of 23

Report Issued Date : Mar. 16, 2018

Report Version : Rev. 01

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## REVISION HISTORY

REPORT NO.	VERSION	DESCRIPTION	ISSUED DATE
FC811821-07	Rev. 01	Initial issue of report	Mar. 16, 2018



## SUMMARY OF TEST RESULT

Report Section	FCC Rule	Description	Limit	Result	Remark
3.1	15.107	AC Conducted Emission	< 15.107 limits	PASS	Under limit 11.16 dB at 0.152 MHz
3.2	15.109	Radiated Emission	< 15.109 limits	PASS	Under limit 7.61 dB at 169.050 MHz



# 1. General Description

## 1.1. Applicant

Motorola Mobility LLC  
222 W,Merchandise Mart Plaza, Chicago IL 60654 USA

## 1.2. Manufacturer

Motorola Mobility LLC  
222 W,Merchandise Mart Plaza, Chicago IL 60654 USA

## 1.3. Product Feature of Equipment Under Test

Product Feature	
Equipment	Mobile Cellular Phone
Brand Name	Motorola
Model Name	XT1929-8
FCC ID	IHDT56XE3
Sample 1	EUT with Dual SIM
Sample 2	EUT with Single SIM
IMEI Code	Sample 1: IMEI 1 : 354105090022715 IMEI 2 : 354105090022723
	Sample 2: IMEI : 35410409003270
EUT supports Radios application	GSM/EGPRS/WCDMA/HSPA/LTE/GNSS/NFC WLAN 11b/g/n HT20 WLAN 11a/n HT20/HT40 WLAN 11ac VHT20/VHT40/VHT80 Bluetooth BR/EDR/LE
HW Version	DVT2
EUT Stage	Identical Prototype

Remark: The above EUT's information was declared by manufacturer. Please refer to the specifications or user's manual for more detailed description.



Accessory List	
AC Adapter 1	Brand Name : Motorola
	Model Name : SC-23 SPN5971A
	Manufacturer : Salom
AC Adapter 2	Brand Name : Motorola
	Model Name : SC-23 SPN5989A
	Manufacturer : Chenyang
AC Adapter 3	Brand Name : Motorola
	Model Name : SC-24 SPN5972A
	Manufacturer : Salom
AC Adapter 4	Brand Name : Motorola
	Model Name : SC-24 SPN5990A
	Manufacturer : Chenyang
Battery	Brand Name : Motorola
	Model Name : JS40
	Manufacturer : SUNWODA
Earphone	Brand Name : Motorola
	Model Name : SH38C16618
C2Audio Cable 1	Brand Name : Motorola
	Model Name : SC18C27844
	Manufacturer : Luxshare
C2Audio Cable 2	Brand Name : Motorola
	Model Name : SC18C27845
	Manufacturer : Cabletech
USB Cable 1	Brand Name : Cabletech
	Model Name : SKN6473A
USB Cable 2	Brand Name : FOXLINK
	Model Name : SKN6473A 17195-C 0403532
USB Cable 3	Brand Name : SAIBAO
	Model Name : SKN6473A 17214-C 1127044
USB Cable 4	Brand Name : Luxshare
	Model Name : SKN6473A 17227-C 1126538



### 1.4. Product Specification of Equipment Under Test

Standards-related Product Specification	
<b>Tx Frequency</b>	GSM850: 824.2 MHz ~ 848.8 MHz GSM1900: 1850.2 MHz ~ 1909.8 MHz WCDMA Band V: 826.4 MHz ~ 846.6 MHz WCDMA Band IV: 1712.4 MHz ~ 1752.6 MHz WCDMA Band II: 1852.4 MHz ~ 1907.6 MHz LTE Band 4: 1710.7 MHz ~ 1754.3 MHz LTE Band 5: 824.7 MHz ~ 848.3 MHz LTE Band 7: 2502.5 MHz ~ 2567.5 MHz LTE Band 12: 699.7 MHz ~ 715.3 MHz LTE Band 17: 706.5 MHz ~ 713.5 MHz LTE Band 26: 824.7 MHz ~ 848.3 MHz LTE Band 38: 2572.5 MHz ~ 2617.5 MHz LTE Band 40: 2302.5 MHz ~ 2397.5 MHz LTE Band 41: 2498.5 MHz ~ 2687.5 MHz 802.11b/g/n: 2412 MHz ~ 2462 MHz 802.11a/n/ac: 5180 MHz ~ 5240 MHz; 5260 MHz ~ 5320 MHz; 5500 MHz ~ 5580 MHz and 5660 MHz ~ 5700 MHz; 5745 MHz ~ 5825 MHz Bluetooth: 2402 MHz ~ 2480 MHz NFC : 13.56 MHz
<b>Rx Frequency</b>	GSM850: 869.2 MHz ~ 893.8 MHz GSM1900: 1930.2 MHz ~ 1989.8 MHz WCDMA Band V: 871.4 MHz ~ 891.6 MHz WCDMA Band IV: 2112.4 MHz ~ 2152.6 MHz WCDMA Band II: 1932.4 MHz ~ 1987.6 MHz LTE Band 4: 2110.7 MHz ~ 2154.3 MHz LTE Band 5: 869.7 MHz ~ 893.3 MHz LTE Band 7: 2622.5 MHz ~ 2687.5 MHz LTE Band 12: 729.7 MHz ~ 745.3 MHz LTE Band 17: 736.5 MHz ~ 743.5 MHz LTE Band 26: 869.7 MHz ~ 893.3 MHz LTE Band 38: 2572.5 MHz ~ 2617.5 MHz LTE Band 40: 2302.5 MHz ~ 2397.5 MHz LTE Band 4 : 2498.5 MHz ~ 2687.5 MHz 802.11b/g/n: 2412 MHz ~ 2462 MHz 802.11a/n/ac: 5180 MHz ~ 5240 MHz; 5260 MHz ~ 5320 MHz; 5500 MHz ~ 5580 MHz and 5660 MHz ~ 5700 MHz; 5745 MHz ~ 5825 MHz Bluetooth: 2402 MHz ~ 2480 MHz GPS : 1.57542 GHz Glonass : 1602 MHz + n x 0.5625MHz (n=-7,-6,-5,...,0,...,6) NFC : 13.56 MHz



Standards-related Product Specification	
<b>Antenna Type</b>	WWAN: Fixed Internal Antenna LTE: Fixed Internal Antenna WLAN: Loop Antenna Bluetooth: Internal Antenna GPS/Glonass: Internal Loop Antenna NFC: Loop Antenna
<b>Type of Modulation</b>	GSM: GMSK GPRS: GMSK EDGE(MCS 0-4): GMSK / (MCS 5-9): 8PSK WCDMA: QPSK (Uplink) HSDPA: 64QAM (Downlink) HSUPA: QPSK (Uplink) LTE: QPSK / 16QAM / 64QAM 802.11b : DSSS (DBPSK / DQPSK / CCK) 802.11a/g/n/ac : OFDM (BPSK / QPSK / 16QAM / 64QAM / 256QAM) Bluetooth LE : GFSK Bluetooth (1Mbps) : GFSK Bluetooth (2Mbps) : $\pi/4$ -DQPSK Bluetooth (3Mbps) : 8-DPSK GPS/Glonass: BPSK NFC: ASK

### 1.5. Modification of EUT

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

### 1.6. Test Location

Sporton Lab is accredited to ISO 17025 by Taiwan Accreditation Foundation (TAF code : 1190) and the FCC designation No. TW1093 under the FCC 2.948(e) by Mutual Recognition Agreement (MRA) in FCC Test.

<b>Test Site</b>	SPORTON INTERNATIONAL INC.	
<b>Test Site Location</b>	No. 52, Hwa Ya 1 <sup>st</sup> Rd., Hwa Ya Technology Park, Kwei-Shan District, Tao Yuan City, Taiwan, R.O.C. TEL: +886-3-327-3456 FAX: +886-3-328-4978	
<b>Test Site No.</b>	<b>Sporton Site No.</b>	
	CO05-HY	03CH06-HY





## 1.7. Applicable Standards

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

- ♦ FCC 47 CFR FCC Part 15 Subpart B
- ♦ ANSI C63.4-2014

### **Remark:**

1. All test items were verified and recorded according to the standards and without any deviation during the test.
2. For FCC 15 Subpart B - Unintentional Radiators, device supporting USB interface or similar peripherals (defined as the Section 15.3 (r) Peripheral device) acting as a peripheral for personal computers shall be authorized as “The Class B personal computers and peripherals” per the Section 15.101 (a) Equipment authorization of unintentional radiators.
3. For other Unintentional Radiators features of this EUT, test reports are be issued separately.  
Per the Note of the Section 15.101, when device supports features (USB, FM Radio, digital devices...etc) more than one category of authorization, type of authorization shall be appropriately chosen for FCC 15B compliance rule, and the Section 15.101 (b), only those receivers that operate (tune) within the frequency range of 30-960 MHz, CB receivers and radar detectors are subject to the authorizations shown in paragraph (a) of the Section 15.101. However, receivers indicated as being subject to Declaration of Conformity that are contained within a transceiver, the transmitter portion of which is subject to certification, shall be authorized under the verification procedure.



## 2. Test Configuration of Equipment Under Test

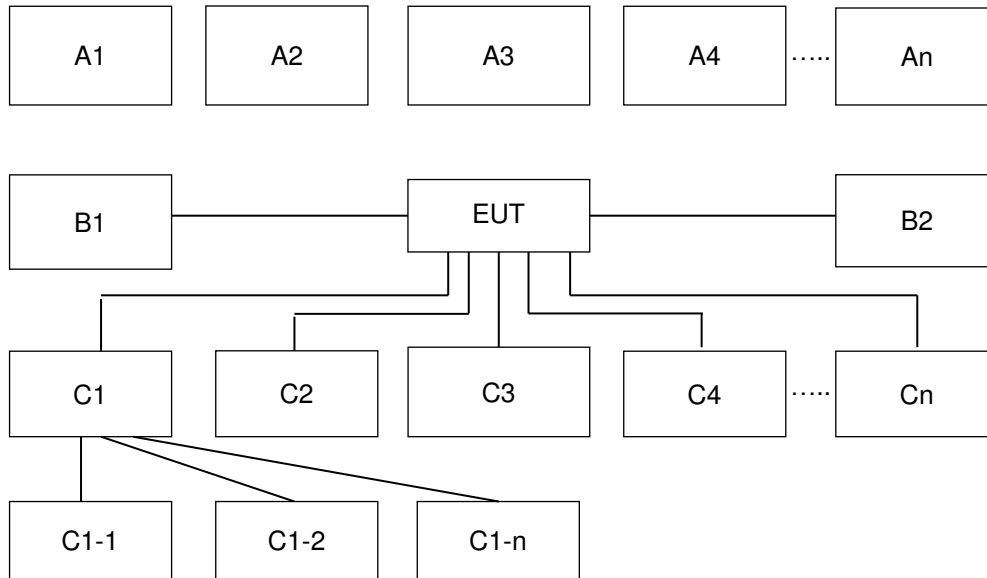
### 2.1. Test Mode

The EUT has been associated with peripherals pursuant to ANSI C63.4-2014 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 (30MHz to the 5th harmonic of the highest fundamental frequency or to 40 GHz, whichever is lower).

Test Items	Function Type
AC Conducted Emission	Mode 1 : GSM850 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 1 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 2 : WCDMA Band V Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 2 Type C (Data Link with Notebook) + SIM 2 for Sample 1
	Mode 3 : GSM1900 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 3 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 4 : WCDMA Band II Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 4 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 5 : WCDMA Band V Idle + Bluetooth Idle + WLAN Idle + Battery + USB3.0 Cable Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 6 : GSM850 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 1 Type C (Data Link with Notebook) + SIM 1 for Sample 2
Radiated Emissions	Mode 1 : GSM850 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 1 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 2 : WCDMA Band V Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 2 Type C (Data Link with Notebook) + SIM 2 for Sample 1
	Mode 3 : GSM1900 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 3 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 4 : WCDMA Band II Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 4 Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 5 : WCDMA Band V Idle + Bluetooth Idle + WLAN Idle + Battery + USB3.0 Cable Type C (Data Link with Notebook) + SIM 1 for Sample 1
	Mode 6 : GSM1900 Idle + Bluetooth Idle + WLAN Idle + Battery + USB Cable 3 Type C (Data Link with Notebook) + SIM 1 for Sample 2
<b>Remark:</b>	
<ol style="list-style-type: none"> <li>1. The worst case of AC is mode 1; only the test data of this mode was reported.</li> <li>2. The worst case of RE is mode 3; only the test data of this mode was reported.</li> <li>3. Data Link with Notebook means data application transferred mode between EUT and Notebook.</li> </ol>	

## 2.2.Connection Diagram of Test System



Test Setup									
No.	Wireless Station	Connection Type	Test Mode						
			1	2	3	4	5	6	-
A1	Bluetooth Earphone	Bluetooth	X	X	X	X	X	X	
A2	System Simulator	GSM/UMTS/CDMA/WCDMA/LTE	X	X	X	X	X	X	
A3	AP Router	WiFi	X	X	X	X	X	X	
No.	Setup Peripherals	Connection Type	1	2	3	4	5	6	-
C1	Notebook	USB Cable	X	X	X	X	X	X	
C1-1	iPod	USB Cable to C1	X	X	X	X	X	X	
C1-2	AP Router	RJ-45 Cable to C1	X	X	X	X	X	X	
C2	SD Card	SD I/O interface without Cable	X	X	X	X	X	X	



### 2.3. Support Unit used in test configuration and system

Item	Equipment	Trade Name	Model Name	FCC ID	Data Cable	Power Cord
1.	System Simulator	R&S	CMU 200	N/A	N/A	Unshielded, 1.8 m
2.	WLAN AP	ASUS	RT-AC66U	MSQ-RTAC66U	N/A	Unshielded, 1.8 m
3.	Bluetooth Earphone	Lenovo	LBH301	PY7DDA-2029	N/A	N/A
4.	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
5.	iPod	Apple	A1285	FCC DoC	Shielded, 1.0 m	N/A
6.	SD Card	SanDisk	MicroSD HC	FCC DoC	N/A	N/A
7.	USB3.0 Cable	Moshi	99MO084101	N/A	N/A	N/A

### 2.4. EUT Operation Test Setup

The EUT was in GSM or WCDMA idle mode during the testing. The EUT was synchronized to the BCCH, and is in continuous receiving mode by setting system simulator's paging reorganization.

At the same time, the EUT was attached to the Bluetooth earphone or WLAN AP, and the following programs installed in the EUT were programmed during the test.

1. Data application is transferred between Laptop and EUT via USB cable Type C.



### 3. Test Result

#### 3.1. Test of AC Conducted Emission Measurement

##### 3.1.1 Limits 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 (dBuV)	
	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.

##### 3.1.2 Measuring Instruments

The measuring equipment is listed in the section 4 of this test report.

##### 3.1.3 Test Procedure

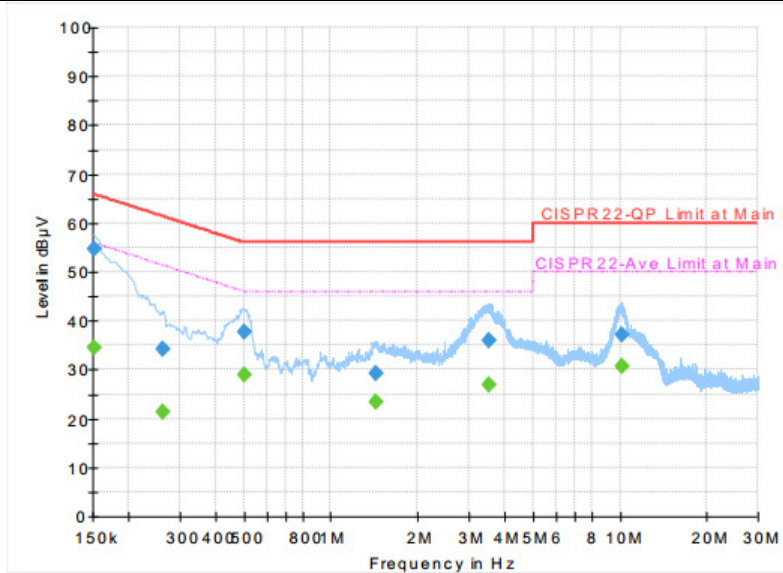
1. The EUT was placed 0.4 meter from the conducting wall of the shielding room was kept at least 80 centimeters from any other grounded conducting surface.
2. Connect EUT to the power mains through a line impedance stabilization network (LISN).
3. All the support units are connecting to the other LISN.
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. Then measurement is also conducted by Average Detector and Quasi-Peak Detector Function respectively.

### 3.1.4 Test Setup



3.1.6 Test Result of AC Conducted Emission

Test Engineer :	Kai-Chun Chu	Temperature :	26~27°C
		Relative Humidity :	50~52%
Test Voltage :	120Vac / 60Hz	Phase :	Line

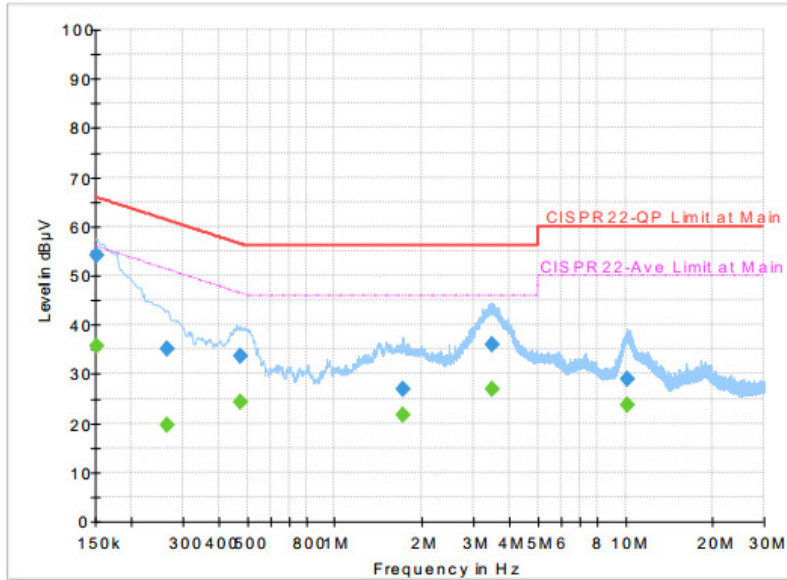


Final Result :

Frequency (MHz)	Quasi-Peak (dBµV)	Average (dBµV)	Limit (dBµV)	Margin (dB)	Line	Filter	Corr. (dB)
0.152250	---	34.63	55.88	21.25	L1	OFF	19.5
0.152250	54.72	---	65.88	11.16	L1	OFF	19.5
0.262500	---	21.24	51.35	30.11	L1	OFF	19.5
0.262500	34.08	---	61.35	27.27	L1	OFF	19.5
0.503250	---	28.90	46.00	17.10	L1	OFF	19.5
0.503250	37.86	---	56.00	18.14	L1	OFF	19.5
1.432500	---	23.48	46.00	22.52	L1	OFF	19.6
1.432500	29.30	---	56.00	26.70	L1	OFF	19.6
3.502500	---	26.95	46.00	19.05	L1	OFF	19.6
3.502500	35.94	---	56.00	20.06	L1	OFF	19.6
10.106250	---	30.82	50.00	19.18	L1	OFF	19.7
10.106250	37.13	---	60.00	22.87	L1	OFF	19.7



Test Engineer :	Kai-Chun Chu	Temperature :	26~27°C
		Relative Humidity :	50~52%
Test Voltage :	120Vac / 60Hz	Phase :	Neutral



Final Result :

Frequency (MHz)	Quasi-Peak (dBµV)	Average (dBµV)	Limit (dBµV)	Margin (dB)	Line	Filter	Corr. (dB)
0.152250	---	35.60	55.88	20.28	N	OFF	19.5
0.152250	54.15	---	65.88	11.73	N	OFF	19.5
0.264750	---	19.74	51.28	31.54	N	OFF	19.5
0.264750	35.08	---	61.28	26.20	N	OFF	19.5
0.471750	---	24.39	46.48	22.09	N	OFF	19.5
0.471750	33.54	---	56.48	22.94	N	OFF	19.5
1.720500	---	21.66	46.00	24.34	N	OFF	19.6
1.720500	26.84	---	56.00	29.16	N	OFF	19.6
3.493500	---	26.84	46.00	19.16	N	OFF	19.6
3.493500	36.00	---	56.00	20.00	N	OFF	19.6
10.128750	---	23.63	50.00	26.37	N	OFF	19.7
10.128750	29.07	---	60.00	30.93	N	OFF	19.7





### **3.2. Test of Radiated Emission Measurement**

#### **3.2.1. Limit of Radiated Emission**

The emissions from an unintentional radiator shall not exceed the field strength levels specified in the following table:

<b>Frequency (MHz)</b>	<b>Field Strength (microvolts/meter)</b>	<b>Measurement Distance (meters)</b>
30 – 88	100	3
88 – 216	150	3
216 - 960	200	3
Above 960	500	3

#### **3.2.2. Measuring Instruments**

The measuring equipment is listed in the section 4 of this test report.



### **3.2.3. Test Procedures**

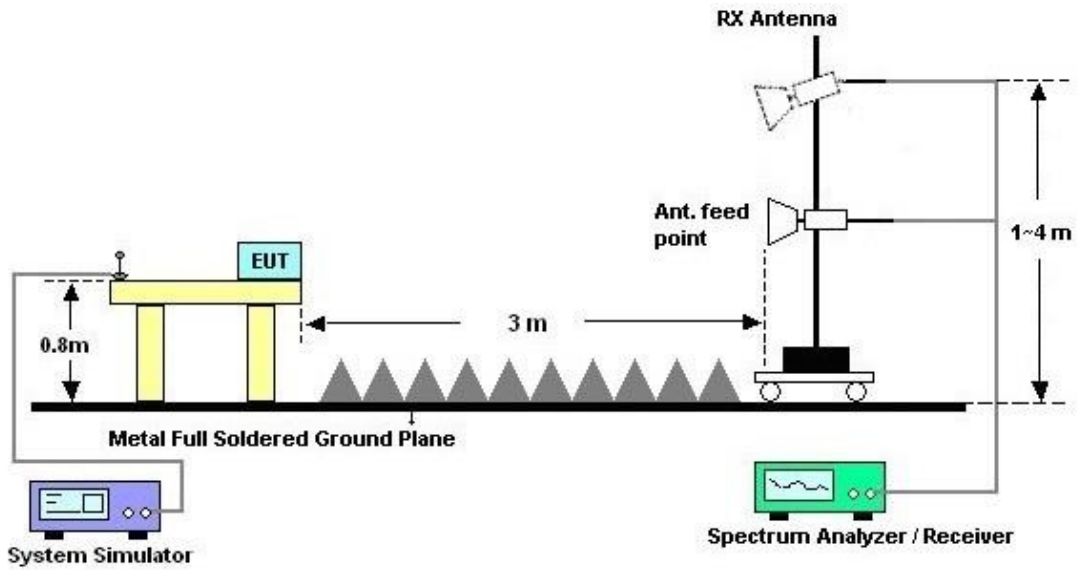
1. The EUT was placed on a turntable with 0.8 meter above ground.
2. The EUT was set 3 meters from the interference receiving antenna, which was mounted on the top of a variable height antenna tower.
3. The table was rotated 360 degrees to determine the position of the highest radiation.
4. The antenna is a Bi-Log antenna and its height is adjusted between one to four meters above ground to find the maximum value of the field strength for both horizontal polarization and vertical polarization of the antenna.
5. For each suspected emission, 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.
6. Set the test-receiver system to Peak Detect Function and specified bandwidth with Maximum Hold Mode (RBW=120kHz/VBW=300kHz for frequency below 1GHz; RBW=1MHz VBW=3MHz (Peak), RBW=1MHz/VBW=10Hz (Average) for frequency above 1GHz).
7. If the emission level of the EUT in peak mode was 3 dB lower than the limit specified, peak values of EUT will be reported. Otherwise, the emission will be repeated by using the quasi-peak method and reported.
8. Emission level (dB $\mu$ V/m) = 20 log Emission level ( $\mu$ V/m)
9. Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level

### 3.2.4. Test Setup of Radiated Emission

For radiated emissions from 30MHz to 1GHz



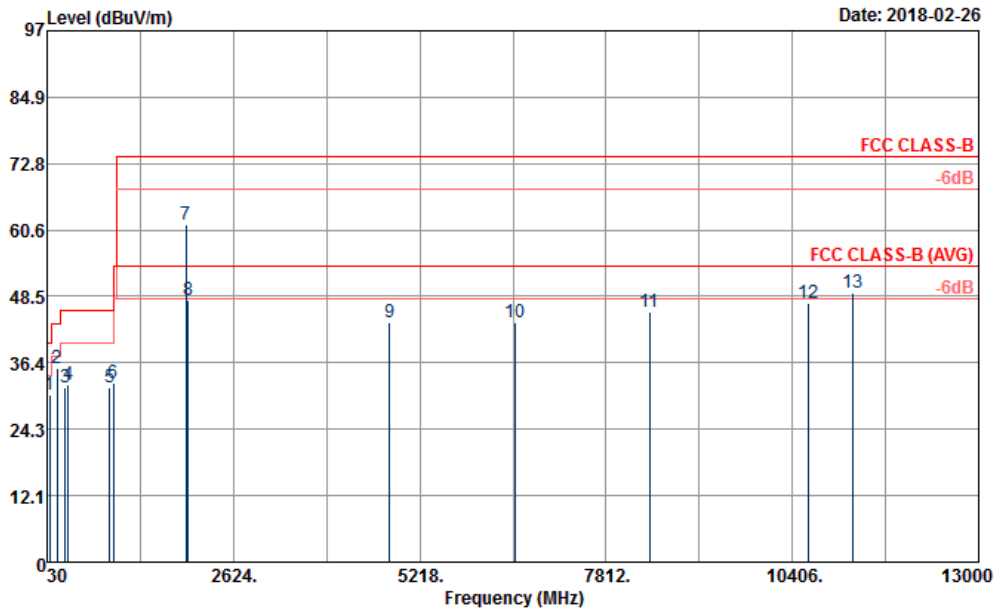
For radiated emissions above 1GHz





3.2.5. Test Result of Radiated Emission

Test Engineer :	Donny Tang	Temperature :	23~24°C
		Relative Humidity :	51~52%
Test Distance :	3m	Polarization :	Horizontal
Remark :	#7 is system simulator signal which can be ignored.		

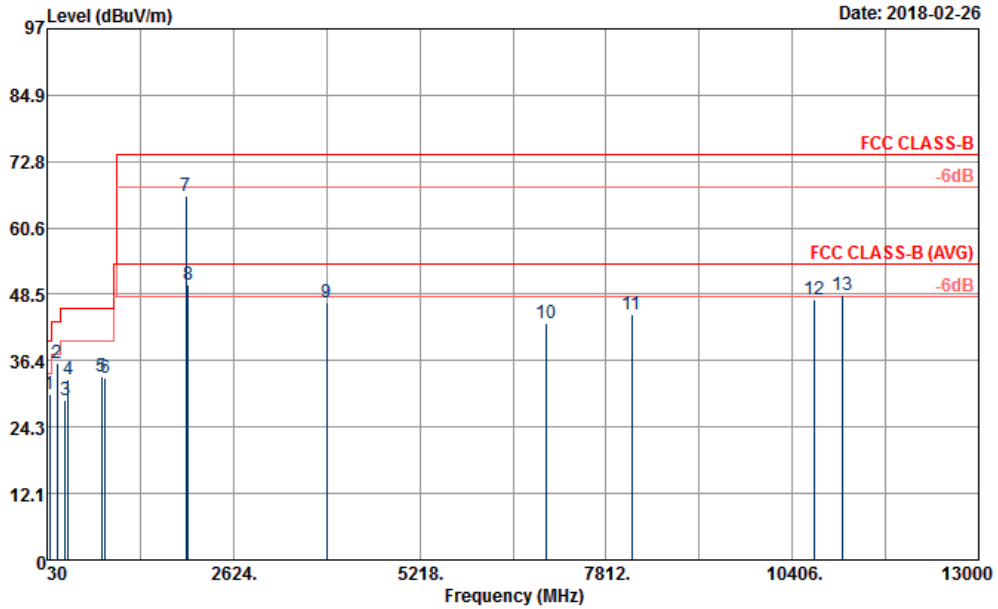


Site : 03CH06-HY  
 Condition : FCC CLASS-B 3m 9120D\_1156\_170915 HORIZONTAL  
 Project : 811821-07  
 Power : From System  
 Memo : Mode 3

	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	A/Pos	T/Pos	Remark	
	MHz	dBuV/m	Limit	Line	Level	Factor	Loss	Factor	cm	deg	
			dB	dBuV/m	dBuV	dB/m	dB	dB			
1	62.67	30.53	-9.47	40.00	49.48	11.67	1.21	31.83	---	---	Peak
2	171.75	35.30	-8.20	43.50	50.02	15.22	1.84	31.78	100	182	Peak
3	280.29	31.95	-14.05	46.00	42.76	18.64	2.30	31.75	---	---	Peak
4	319.60	32.41	-13.59	46.00	42.26	19.44	2.46	31.75	---	---	Peak
5	897.80	31.79	-14.21	46.00	30.47	28.98	3.90	31.56	---	---	Peak
6	957.30	32.69	-13.31	46.00	28.63	30.97	4.14	31.05	---	---	Peak
7	1960.00	61.65			90.61	25.71	6.32	60.99	---	---	Peak
8	1994.00	47.90	-26.10	74.00	76.77	25.72	6.41	61.00	---	---	Peak
9	4798.00	43.81	-30.19	74.00	61.67	31.06	10.66	59.58	---	---	Peak
10	6542.00	43.71	-30.29	74.00	56.46	34.27	12.36	59.38	---	---	Peak
11	8422.00	45.61	-28.39	74.00	52.49	36.60	14.40	57.88	---	---	Peak
12	10626.00	47.40	-26.60	74.00	49.35	39.67	16.27	57.89	---	---	Peak
13	11242.00	49.17	-24.83	74.00	48.96	39.76	17.20	56.75	100	183	Peak



Test Engineer :	Donny Tang	Temperature :	23~24°C
		Relative Humidity :	51~52%
Test Distance :	3m	Polarization :	Vertical
Remark :	#7 is system simulator signal which can be ignored.		



Site : 03CH06-HY  
 Condition : FCC CLASS-B 3m 9120D\_1156\_170915 VERTICAL  
 Project : 811821-07  
 Power : From System  
 Memo : Mode 3

	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	A/Pos	T/Pos	Remark	
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	cm	deg	
1	62.40	30.30	-9.70	40.00	49.30	11.62	1.21	31.83	---	---	Peak
2	169.05	35.89	-7.61	43.50	50.37	15.47	1.83	31.78	100	161	Peak
3	281.37	29.05	-16.95	46.00	39.84	18.66	2.30	31.75	---	---	Peak
4	321.00	33.05	-12.95	46.00	42.87	19.46	2.47	31.75	---	---	Peak
5	784.40	33.46	-12.54	46.00	33.75	28.03	3.68	32.00	---	---	Peak
6	836.90	33.34	-12.66	46.00	32.83	28.42	3.91	31.82	---	---	Peak
7	1960.00	66.50			95.46	25.71	6.32	60.99	---	---	Peak
8	1992.00	50.29	-23.71	74.00	79.16	25.72	6.41	61.00	100	171	Peak
9	3926.00	46.88	-27.12	74.00	69.15	29.80	9.42	61.49	---	---	Peak
10	6982.00	43.24	-30.76	74.00	54.12	35.45	12.88	59.21	---	---	Peak
11	8170.00	44.79	-29.21	74.00	52.24	36.59	14.09	58.13	---	---	Peak
12	10704.00	47.50	-26.50	74.00	49.07	39.77	16.38	57.72	---	---	Peak
13	11098.00	48.44	-25.56	74.00	48.39	39.97	16.98	56.90	---	---	Peak



### 4. List of Measuring Equipment

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Test Date	Due Date	Remark
AC Power Source	ChainTek	APC-1000W	N/A	N/A	N/A	Feb. 19, 2018	N/A	Conduction (CO05-HY)
EMI Test Receiver	Rohde & Schwarz	ESR3	102388	3.6GHz	Dec. 08, 2017	Feb. 19, 2018	Dec. 07, 2018	Conduction (CO05-HY)
LISN	Rohde & Schwarz	ENV216	100080	9kHz~30MHz	Nov. 30, 2017	Feb. 19, 2018	Nov. 29, 2018	Conduction (CO05-HY)
LISN	Rohde & Schwarz	ENV216	100081	9kHz~30MHz	Dec. 08, 2017	Feb. 19, 2018	Dec. 07, 2018	Conduction (CO05-HY)
Bilog Antenna	Schaffner	CBL6111C&N-6-06	2725&AT-N0601	30MHz~1GHz	Oct. 14, 2017	Feb. 16, 2018~ Feb. 17, 2018	Oct. 13, 2018	Radiation (03CH06-HY)
EMI Test Receiver	Rohde & Schwarz	ESU26	100472	20Hz~26.5GHz	Jan. 04, 2018	Feb. 16, 2018~ Feb. 17, 2018	Jan. 03, 2019	Radiation (03CH06-HY)
Horn Antenna	SCHWARZBECK	BBHA 9120 D	9120D-1156	1GHz~18GHz	Aug. 08, 2017	Feb. 16, 2018~ Feb. 17, 2018	Aug. 07, 2018	Radiation (03CH06-HY)
Preamplifier	SONOMA	310N	186713	9kHz~1GHz	Apr. 25, 2017	Feb. 16, 2018~ Feb. 17, 2018	Apr. 24, 2018	Radiation (03CH06-HY)
Preamplifier	MITEQ	AMF-7D-0010 1800-30-10P	1850117	1GHz ~ 18GHz	May 22, 2017	Feb. 16, 2018~ Feb. 17, 2018	May 21, 2018	Radiation (03CH06-HY)
Antenna Mast	MF	MF-7802	MF78020821 2	1m~4m	N/A	Feb. 16, 2018~ Feb. 17, 2018	N/A	Radiation (03CH06-HY)
Turn Table	INN-CO	DS2000	420/650/00	0-360 degree	N/A	Feb. 16, 2018~ Feb. 17, 2018	N/A	Radiation (03CH06-HY)



## 5. Uncertainty of Evaluation

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

Measuring Uncertainty for a Level of Confidence of 95% ( $U = 2Uc(y)$ )	2.70
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### Uncertainty of Radiated Emission Measurement (30 MHz ~ 1000 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ( $U = 2Uc(y)$ )	3.90
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### Uncertainty of Radiated Emission Measurement (1000 MHz ~ 18000 MHz)

Measuring Uncertainty for a Level of Confidence of 95% ( $U = 2Uc(y)$ )	4.70
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