SUPPLEMENTAL "UP LINK CARRIER AGGREGATION" TEST REPORT

OF

Applicant:	Compal Electronics, Inc No.581 & 581-1, Ruiguang Rd., Neihu District, Taipei, (114) Taiwan
Product Name:	5G M.2 Module
Brand Name:	Compal
Model No.:	RXM-G1
Model Difference:	N/A
Report Number:	E2/2019/A0032-01
FCC ID	GKRRXMG1
FCC Rule Part:	27C
Issue Date:	Feb. 26, 2021
Date of Test:	Aug. 06, 2020 ~ Jan. 17, 2021
Date of EUT Received:	Aug. 06, 2020

We hereby certify that:

The above equipment was tested by SGS Taiwan Ltd. Central RF Lab The test data, data evaluation, test procedures, and equipment configurations shown in this report were made in accordance with the procedures given in ANSI C63.26-2015 and the energy emitted by the sample EUT tested as described in this report is in compliance with conducted and radiated emission limits.

The test results of this report relate only to the tested sample identified in this report.

Approved By: Jim Chang

Jim Chang / Manager

Testing Laboratory
3702

Revision History				
Report Number	**Revision**	**Description**	**Issue Date**	**Remark**
E2/2019/A0032	Rev.00	Original.	Jul. 03, 2020	Revised By: Karen Huang
E2/2019/A0032-01	Rev.01	Add Inter Band CA Configuration: 13A+66A	Feb. 26, 2021	Revised By: Elle Chang

Note:

1、Measurement results of 13A+66A in the original test report E2/2020/80013 are fully leveraged in this test report.

2、Disclaimer
Antenna information is provided by the applicant, test results of this report are applicable to the sample EUT received.

Contents

1 GENERAL PRODUCT INFORMATION 4
2 SYSTEM TEST CONFIGURATION 7
3 SUMMARY OF TEST RESULTS 9
4 DESCRIPTION OF TEST MODES 10
5 MEASUREMENT UNCERTAINTY 12
6 MAXMUM OUTPUT POWER 13
7 FIELD STRENGTH OF SPURIOUS RADIATION MEASUREMENT 16

1 GENERAL PRODUCT INFORMATION

1.1 Product Description

General:

Product Name:	5G M.2 Module
Brand Name:	Compal
Model No.:	RXM-G1
Model Difference:	N/A
Hardware Version:	DVT-1
Software Version:	RXMG1.00.00.036
Power Supply:	DC 3.3V
IMEI:	359047100009060

1.2 Operation Frequency Range

LTE Band 13	
BW (MHz)	Operation Frequency (MHz)
5	779.5 - 784.5
10	782.0
LTE Band 66	
BW (MHz)	Operation Frequency (MHz)
1.4	1710.7 - 1779.3
3	1711.5 - 1778.5
5	1712.5 - 1777.5
10	1715.0 - 1775.0
15	1717.5 - 1772.5
20	1720.0 - 1770.0

1.3 Antenna Designation

Vendor	Type	Model Name	Modulation	Frequency (MHz)	Peak Antenna Gain (dBi)
Pulse	PIFA	ANT0	LTE Band 13	777 ~ 787	3
			LTE Band 66	1710 ~ 1780	4.5

1.4 Type of Emission & Max ERP/EIRP Power Measurement Result:

1.4.1 Inter-Band

Please refer to section 6.6.1 of this report.

1.5 Test Methodology of Applied Standards

FCC 47 CFR Part 27C.

ANSI C63.26-2015

KDB971168 D01 Power Meas license Digital System v03r01

1.6 Test Facility

SGS Taiwan Ltd. Central RF Lab (TAF code 3702)
No.2, Keji 1st Rd., Guishan District, Taoyuan City, Taiwan 333

FCC Designation number: TW0028

1.7 Special Accessories

No special accessories were used during testing.

1.8 Equipment Modifications

There was no modifications incorporated into the EUT.

1.9 Radiated Emission Test Sites for Measurements from 9 kHz to 30 MHz

Radiated emission below 30MHz is measured in a 9m*9m*6m semi-anechoic chamber, the measurements correspond to those obtained at an open-field test site.
There is a comparison data of both open-field test site and semi-Anechoic chamber, and the result came out very similar.

2 SYSTEM TEST CONFIGURATION

2.1 EUT Configuration

The EUT configuration for testing is installed on RF field strength measurement to meet the Commissions requirement and operating in a manner which intends to maximize its emission characteristics in a continuous normal application.

2.2 EUT Exercise

The EUT (Transmitter) was operated in the continuous transmission mode employed with the simulator of the Base Station that fixates at test default channels to fix the Tx frequency which was for the purpose of the measurements.

2.3 Test Procedure

2.3.1 Conducted Measurement at Antenna Port

The EUT is placed on a table which is 0.8 m above ground plane. A low loss of RF cable was used to connect the antenna port of EUT to measurement equipment.

2.3.2 Radiated Emissions (ERP/EIRP)

The EUT is placed on a turn table, for emission measurements below 1 GHz is 0.8 m above ground plane, for emission measurements above 1 GHz, the table height shall be 1.5 m. The turn table shall rotate 360 degrees to determine the position of maximum emission level. EUT is set 3m away from the receiving antenna which varied from 1m to 4m to find out the highest emission. And also, each emission was to be maximized by changing the polarization of receiving antenna both Horizontal and Vertical. In order to find out the max. emission, the relative positions of this hand-held transmitter (EUT) was rotated through three orthogonal axes and measurement procedures for electric field radiated emissions above 1 GHz the EUT measurement is to be made “while keeping the antenna in the ‘cone of radiation’ from that area and pointed at the area both in azimuth and elevation, with polarization oriented for maximum response.” is still within the 3dB illumination BW of the measurement antenna according to the requirements in Section 8 and 13.

2.4 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 attenuation factor between EUT conducted port and spectrum analyzer. With the offset compensation, the spectrum analyzer reading level is exactly EUT RF output level.

Note:

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

Following shows an offset computation in physical test.

RF cable loss (dB)	Attenuation factor(dB)	offset(dB)
6	10	16

2.5 Configuration of Tested System

Fig. 2-1 Configuration of Tested System (Fixed Channel-Conducted)

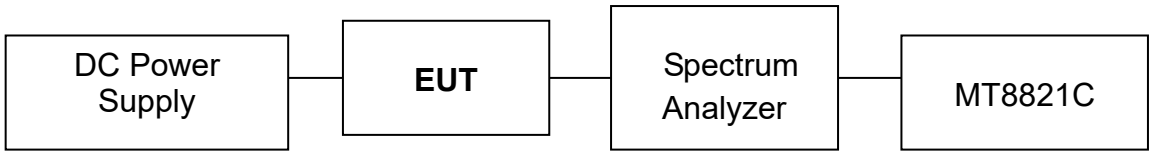
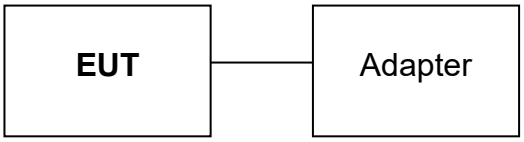


Fig. 2-2 Configuration of Tested System (Fixed Channel-Radiated)



Remote Side

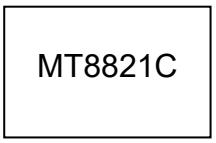


Table 2-1 Equipment Used in

Item	Equipment	Mfr/Brand	Model/ Type No.	Series No.	Data Cable	Power Cord
1.	Radio Communication Analyzer	Anritsu	MT8821C	6261786084	shielded	Un-shielded

3 SUMMARY OF TEST RESULTS

FCC Rules	Description Of Test	Result
§2.1046(a)	RF Power Output	Compliant
§27.50(d)(4) §27.50(b)(10)	ERP/ EIRP measurement	Compliant
§27.53(c)(2)(4) §27.53(f) §27.53(h)	Field Strength of Spurious Radiation	Compliant

4 DESCRIPTION OF TEST MODES

4.1 The Test Channel Details

This device is 5G M.2 Module that support with carrier aggregation (two carrier) uplink Inter-Band non-contiguous specification as below:

E-UTRA Inter-Band CA configuration / Bandwidth combination set									
Uplink CA configurations (NOTE 4)	E-UTRA Bands	1.4 MHz	3 MHz	5 MHz	10 MHz	15 MHz	20 MHz	Maximum aggregated bandwidth [MHz]	Bandwidth combination set
CA_13A-66A	13			Yes	Yes			30	0
	66			Yes	Yes	Yes	Yes		

Inter-Band Test Mode	PCC & SCC Bands
1	CA_PCC Ant0 Band 13_ SCC Ant 0 Band 66

4.2 The Worst-CaseTest Modes and Details

1. This EUT is UE LTE 4G 1Tx/2Rx device for single carrier with ANT0 that can support Intra-Band carrier aggregation (CA) uplink.
   For operation of uplink CA mode, the transmitter enabled by 2Tx/2Rx mode with ANT0.

2. The worst-case scenario for all measurements is based on the average conducted output power measurement investigation results. Output power measurements were measured on QPSK, 16QAM, 64QAM and 256QAM modulations. It was found that QPSK results the heighest, hence all testing was performed using QPSK modulations to represent the worst case.

3. Test of below items are evaluated as no noticible emissions and due to each single LTE Band standalone transmission gernerates higher emissions, the test results are only demonstrated for each single LTE band standalone transmission in test report E2/2019/A0029, which was filed in the original FCC authorization, as the worst case senarios.

   (a) Occupied Bandwidth.
   (b) Out of Band Emissions at Anetnna Terminals and Band Edge / Emission Mask.
   (c) Peak to Average Ratio
   (d) Frequency Stability

   Therefore, the above measurements are not demonstrated in this report.

4.2.1 Inter-Band

For uplink Inter-Band CA configurations, following configurations have been selected for the final test.

Inter-band Test Mode	Band	Test Item	Modulation	PCC			SCC		
				Band width	Channel	RB Mode	Band width	Channel	RB Mode
1	13A_66A	EIRP & Radiated Emission	QPSK	5 MHz	23205	1 RB / 0 RB	5 MHz	131997	1 RB / 0 RB
				5 MHz	23230	1 RB / 0 RB	5 MHz	132322	1 RB / 0 RB
				5 MHz	23255	1 RB / 0 RB	5 MHz	132647	1 RB / 0 RB

5 MEASUREMENT UNCERTAINTY

Test Items	Uncertainty
RF Power Output	+/- 1 dB
ERP/ EIRP measurement	Vertical Polarization = +/- 3dB Horizontal Polarization =+/- 3dB
Temperature	+/- 0.4 °C
Humidity	+/- 3.5 %
DC / AC Power Source	DC= +/- 1%, AC=+/- 1%

Radiated Spurious Emission Measurement Uncertainty				
Polarization: Vertical	+/-	2.64	dB	9kHz~30MHz: +-2.3dB
	+/-	4.93	dB	30MHz - 1000MHz: +/- 3.37dB
	+/-	4.81	dB	1GHz - 18GHz: +/- 4.04dB
	+/-	4.52	dB	18GHz - 40GHz: +/- 4.04dB
Polarization: Horizontal	+/-	2.64	dB	9kHz~30MHz: +-2.3dB
	+/-	4.45	dB	30MHz - 1000MHz: +/- 4.22dB
	+/-	4.81	dB	1GHz - 18GHz: +/- 4.08dB
	+/-	4.52	dB	18GHz - 40GHz: +/- 4.08dB

This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of k=2.

6 MAXMUM OUTPUT POWER

6.1 Standard Applicable

A base station simulator was used to establish communication with the EUT. Its parameters were set to transmit the maximum power on the EUT. The measured power in the radio frequency on the transmitter output terminals.

6.1.1 ERP/EIRP LIMIT

According to FCC §2.1046

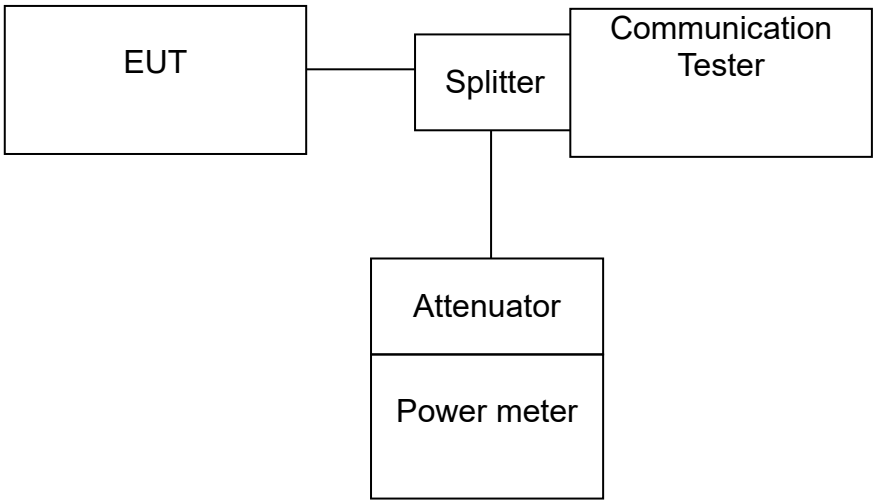
FCC 27.50 (b)

(10) Portable stations (hand-held devices) transmitting in the 746-757 MHz, 776-788 MHz, and 805-806 MHz bands are limited to 3 watts ERP.

FCC 27.50(d)

(4) Mobile, and portable (hand-held) stations operating in the 1710-1755 MHz, 1695-1710 MHz and 1755-1780 MHz bands are limited to 1W EIRP.

6.2 Test Set-up



Note: *Measurement setup for testing on Antenna connector*

6.3 Output Power Measurement Applicable Guideance

The transmitter output was connected to a calibrated attenuator, the other end of which was connected to a power meter. Transmitter output was read off the power meter in dBm. The power output at the transmitter antenna port was determined by adding the value of the attenuator to the power meter reading. TS 151 010-1 is reference to conduct the test measurement of output power.

The Procedure of KDB941225 (SAR Measurement Procedures for 3G devices, (WCD-MA/HSPA) was used for EUT and Base station setting. RMC 12.2kps is used for this testing, and KDB 971168 D01 Power Meas License Digital System as the supplemental test method-ology to adjust the proper setting obtaining the measurement results.

All LTE bands conducted average power is obtained from the simulator telecommunication test set.

6.4 Determining ERP and/or EIRP from conducted RF output power measurements

ERP/EIRP = PMeas + GT-LC

Where:

ERP/EIRP = effective or equivalent radiated power, respectively (expressed in the same units as PMeas, typically dBW or dBm);
PMeas = measured transmitter output power or PSD, in dBm or dBW;
GT = gain of the transmitting antenna, in dBd (ERP) or dBi (EIRP)
LC = signal attenuation in the connecting cable between the transmitter and antenna, in dB.2

For devices utilizing multiple antennas, KDB 662911 provides guidance for determining the effective array transmit antenna gain term to be used in the above equation.

6.5 Measurement Equipment Used

EQUIPMENT TYPE	MFR	MODEL NUM-BER	SERIAL NUMBER	LAST CAL.	CAL DUE.
Radio Communication Analyer	Anritsu	MT8821C	6261786084	01/18/2020	01/17/2021
Power Meter	Anritsu	ML2496A	1804002	04/06/2020	04/05/2021
Power Sensor	Anritsu	MA2411B	1726105	04/06/2020	04/05/2021
Power Sensor	Anritsu	MA2411B	1726106	04/06/2020	04/05/2021

6.6 LTE Measurement Results:

6.6.1 Inter-Band

	Antenna gain (dBi)	4.5																						
	BW combination set	First Band								Second Band							Power(dBm)				EIRP Limit	Margin (dBm)
		Band	Range	Modulation	Band width	Channel	Frequency	RB		Band	Range	Modulation	Band width	Channel	Frequency	RB	PCC	SCC	Total	EIRP		
13A-66A	1	13	Low	QPSK	5 MHz	23205	779.5	1	+	66	Low	QPSK	5 MHz	131997	1712.5	1	22.16	18.81	23.81	28.31	30	-1.69
			Mid	QPSK	5 MHz	23230	782	1			Mid	QPSK	5 MHz	132322	1745	1	22.46	18.81	**24.02**	28.52	30	-1.48
				QPSK	5 MHz	23230	782	1				QPSK	20 MHz	132322	1745	1	22.53	18.23	23.90	28.4	30	-1.60
				QPSK	10 MHz	23230	782	1				QPSK	5 MHz	132322	1745	1	22.32	18.87	23.94	28.44	30	-1.56
				QPSK	10 MHz	23230	782	1				QPSK	20 MHz	132322	1745	1	22.51	18.62	23.99	28.49	30	-1.51
			High	QPSK	5 MHz	23255	784.5	1			High	QPSK	5 MHz	132647	1777.5	1	22.32	19.07	24.00	28.5	30	-1.50

7 FIELD STRENGTH OF SPURIOUS RADIATION MEASUREMENT

7.1 Standard Applicable

According to FCC §2.1053,

FCC§27.53(h)

Out of band emissions.The power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least 43 + 10 log(P) dB.

FCC §27.53(c) for LTE B13

For operations in the 746–758 MHz band and the 776–788 MHz band, the power of any emission outside the licensee's frequency band(s) of operation shall be attenuated below the transmitter power (P) within the licensed band(s) of operation, measured in watts, in accordance with the following:
(2) On any frequency outside the 776– 788 MHz band, the power of any emission shall be attenuated outside the band below the transmitter power (P) by at least 43 + 10 log (P) dB (-13dBm)

FCC §27.53 (f) for LTE B13

For operations in the 746-758 MHz, 775-788 MHz, and 805-806 MHz bands, emissions in the band 1559-1610 MHz shall be limited to −70 dBW/MHz equivalent isotropically radiated power (EIRP) for wideband signals, and −80 dBW EIRP for discrete emissions of less than 700 Hz bandwidth. For the purpose of equipment authorization, a transmitter shall be tested with an antenna that is representative of the type that will be used with the equipment in normal operation.

FCC §27.53(c) (5) for LTE B13

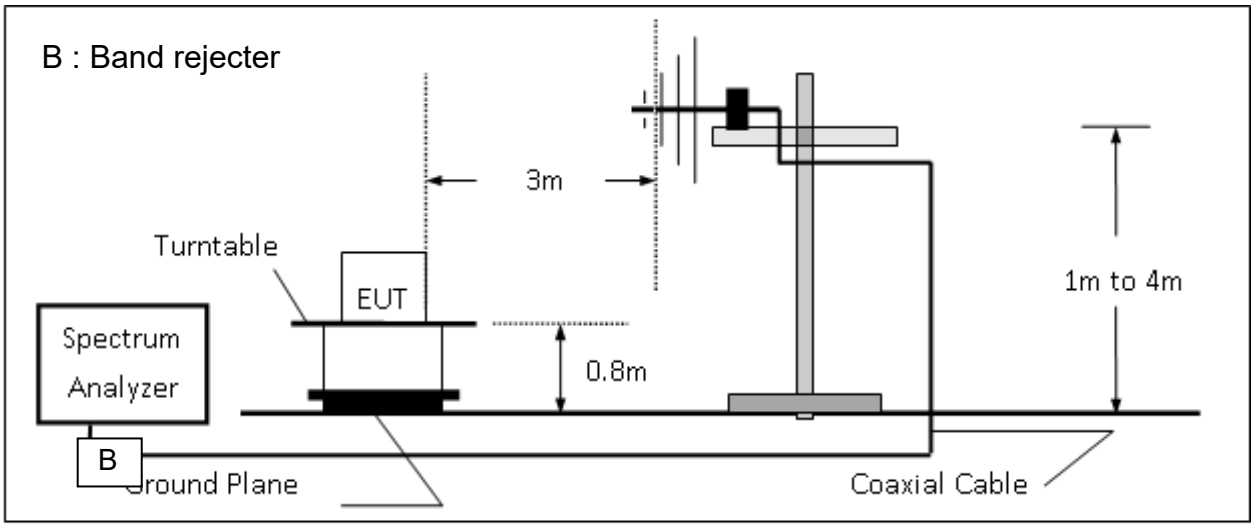
Compliance for operations in the 600 MHz, 698-746 MHz, 746-758 MHz and the 776-788 MHz band with this provision is based on the use of measurement instrumentation employing a resolution bandwidth of 100 kilohertz or greater. However, in the 100 kilohertz bands immediately outside and adjacent to a licensee's frequency block, a resolution bandwidth of at least 30 kHz may be employed.

FCC §27.53(h)(3) for LTE B66

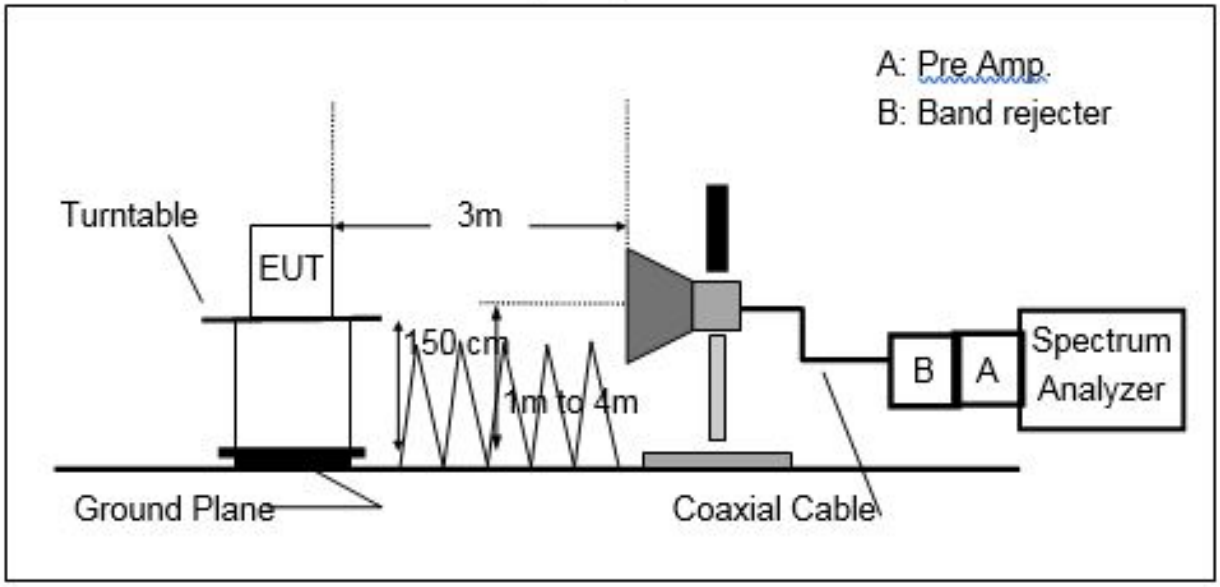
Compliance with this provision is based on the use of measurement instrumentation employing a resolution bandwidth of 1 megahertz or greater. However, in the 1 megahertz bands immediately outside and adjacent to the licensee's frequency block, a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter may be employed. The emission bandwidth is defined as the width of the signal between two points, one below the carrier center frequency and one above the carrier center frequency, outside of which all emissions are attenuated at least 26 dB below the transmitter power.

7.2 EUT Setup

Radiated Emission Test Set-Up, Frequency Below 1000MHz



Radiated Emission Test Set-UP Frequency Over 1 GHz



7.3 Measurement Procedure:

The EUT was placed on a non-conductive; the measurement antenna was placed at a distance of 3 meters from the EUT. During the tests, the antenna height and the EUT azimuth were varied in order to identify the maximum level of emissions from the EUT. This maximization process was repeated with the EUT positioned in each of its three orthogonal orientations.

The frequency range up to tenth harmonic was investigated for each of three fundamental frequencies (low, middle and high channels). Once spurious emission was identified, the power of the emission was determined using the substitution method.

The spurious emissions attenuation was calculated as the difference between radiated power at the fundamental frequency and the spurious emissions frequency.

ERP (dBm) = SG Level(dBm) + Antenna Gain(dBd) + Cable Loss(dB)

EIRP (dBm) = SG Level(dBm) + Antenna Gain(dBi) + Cable Loss(dB)

7.4 Measurement Equipment Used:

EQUIPMENT TYPE	MFR	MODEL NUMBER	SERIAL NUMBER	LAST CAL.	CAL DUE.
Broadband Antenna	TESEQ	CBL 6112D	35240	09/08/2020	09/09/2021
Horn Antenna	Schwarzbeck	BBHA9170	184	12/25/2019	12/24/2020
Horn Antenna	Schwarzbeck	BBHA9120D	1187	01/10/2020	01/09/2021
Loop Antenna	ETS.LINDGREN	6502	143303	04/28/2020	04/27/2021
EMI Test Receiver	R&S	ESU 40	100363	04/29/2020	04/28/2021
Radio Communica-tion Analyer	Anritsu	MT8821C	6261786084	01/18/2020	01/17/2021
Pre-Amplifier	EMC Instruments	EMC330	980096	11/20/2019	11/19/2020
Pre-Amplifier	EMC Instruments	EMC0011830	980199	11/20/2019	11/19/2020
Pre-Amplifier	EMC Instruments	EMC184045B	980135	11/20/2019	11/19/2020
Notch Filter	Woken	EWT-54-0037	RF54	11/20/2019	11/19/2020
Notch Filter	Woken	EWT-54-0038	RF55	11/20/2019	11/19/2020
Coaxial Cable	Huber Suhner	SUCOFLEX 104	MY17388/4	11/20/2019	11/19/2020
Coaxial Cable	Huber Suhner	RG 214/U	W22.03	11/20/2019	11/19/2020

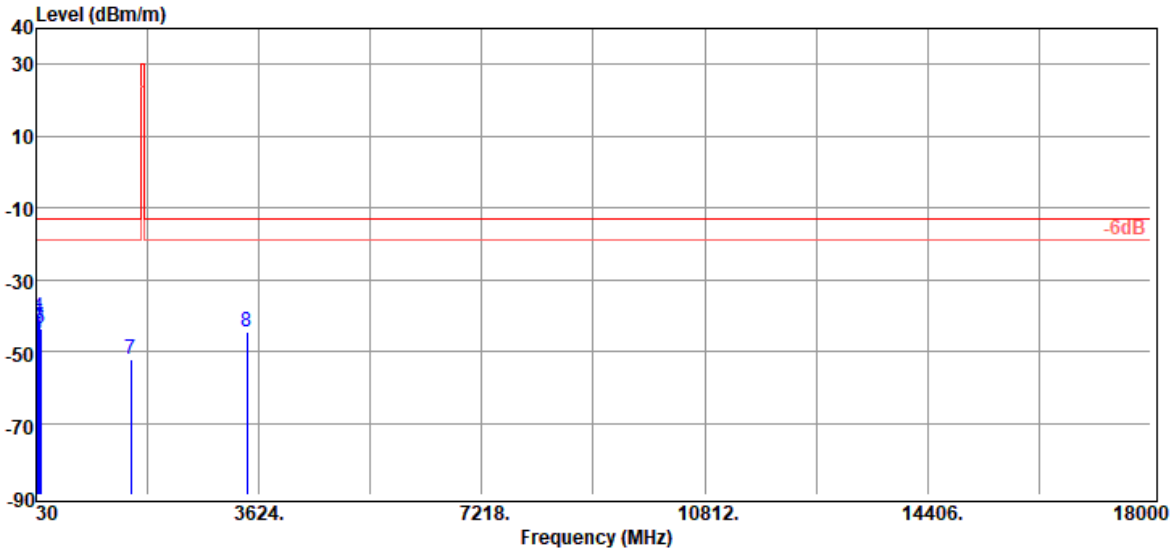
EQUIPMENT TYPE	MFR	MODEL NUMBER	SERIAL NUMBER	LAST CAL.	CAL DUE.
Pre-Amplifier	EMC Instruments	EMC330	980096	11/19/2020	11/18/2021
Pre-Amplifier	EMC Instruments	EMC0011830	980199	11/19/2020	11/18/2021
Pre-Amplifier	EMC Instruments	EMC184045B	980135	11/19/2020	11/18/2021
Notch Filter	Woken	EWT-54-0037	RF54	11/19/2020	11/18/2021
Notch Filter	Woken	EWT-54-0038	RF55	11/19/2020	11/18/2021
Coaxial Cable	Huber Suhner	SUCOFLEX 104	MY17388/4	11/19/2020	11/18/2021
Coaxial Cable	Huber Suhner	RG 214/U	W22.03	11/19/2020	11/18/2021
Coaxial Cable	Huber Suhner	SUCOFLEX 104	MY17413/4	11/19/2020	11/18/2021

Note: The measurement was taken place with the long duration of the time, and additional equipment list as shown above indicate those equipment of which has been subject to undertake the calibration in intermediate period of time of the measurement.

7.5 Measurement Result:

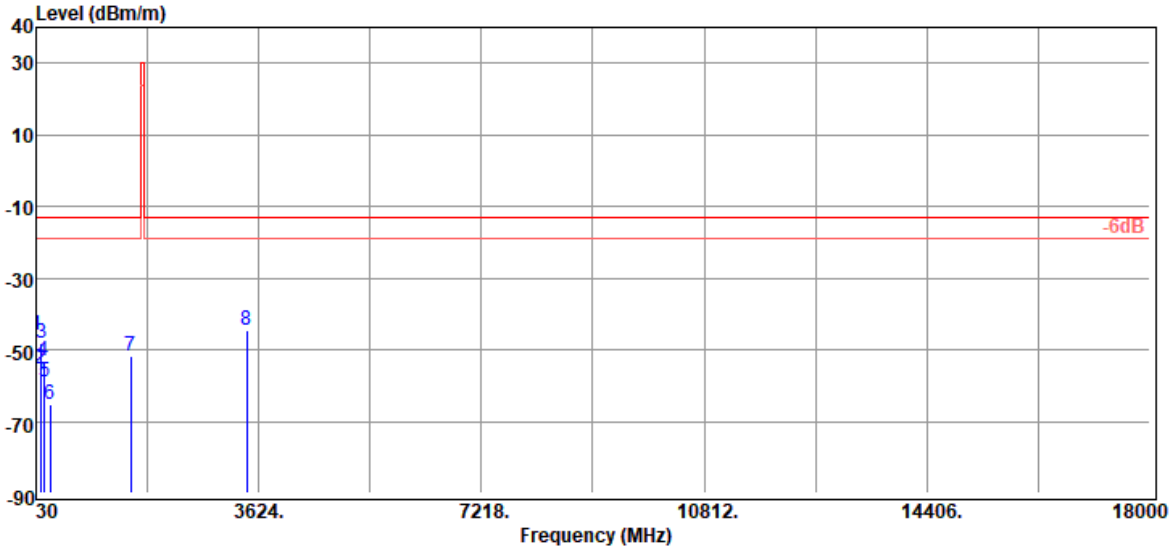
Radiated Spurious Emission Measurement Result: LTE Band 13 + LTE Band 66 Mode

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH LOW	Temp./Humi.	:23.3/62
EUT Pol	:E2 Plan	Antenna Pol.	:VERTICAL
Test Frequency	:779.5 MHz +1712.5 MHz	Engineer	:Ashton Chiu



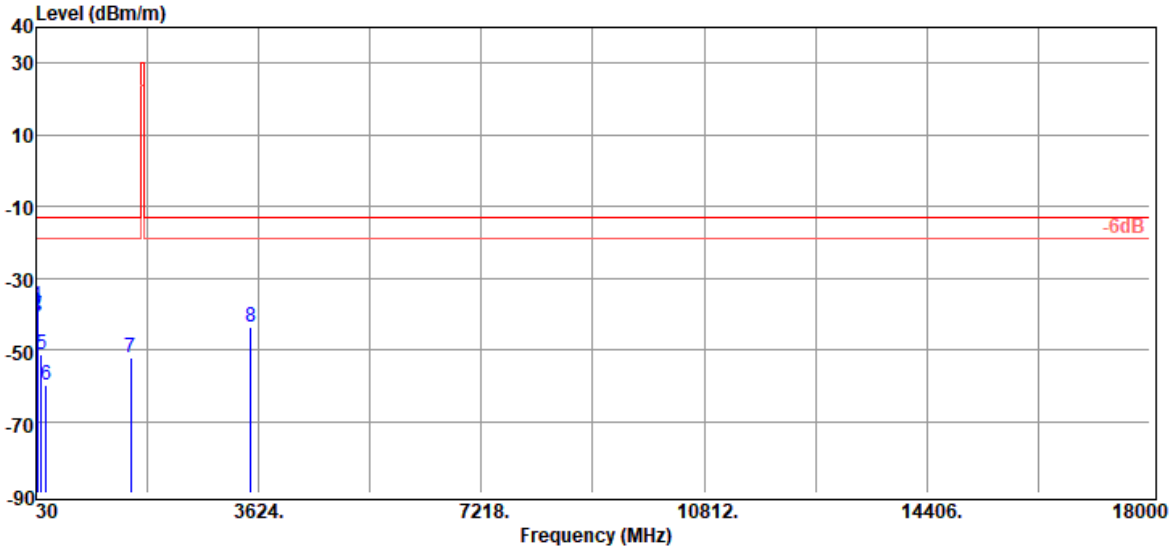
Freq.	EIRP/ERP	SG Output Level	Antenna Gain	Cable Loss	Limit	Margin
MHz	dBm	dBm	dBi/dBd	dB	dBm	dB
30.97	-47.17	-25.92	-20.62	-0.63	-13.00	-34.17
36.79	-47.31	-27.10	-19.43	-0.78	-13.00	-34.31
51.34	-43.53	-25.32	-17.33	-0.88	-13.00	-30.53
57.16	-40.53	-23.51	-16.06	-0.96	-13.00	-27.53
77.53	-42.33	-32.06	-9.15	-1.12	-13.00	-29.33
104.69	-43.56	-35.39	-6.78	-1.39	-13.00	-30.56
1559.00	-52.17	-53.86	8.69	-7.00	-13.00	-39.17
3425.00	-44.45	-45.81	12.65	-11.29	-13.00	-31.45

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH LOW	Temp./Humi.	:23.3/62
EUT Pol	:E2 Plan	Antenna Pol.	:HORIZONTAL
Test Frequency	:779.5 MHz +1712.5 MHz	Engineer	:Ashton Chiu



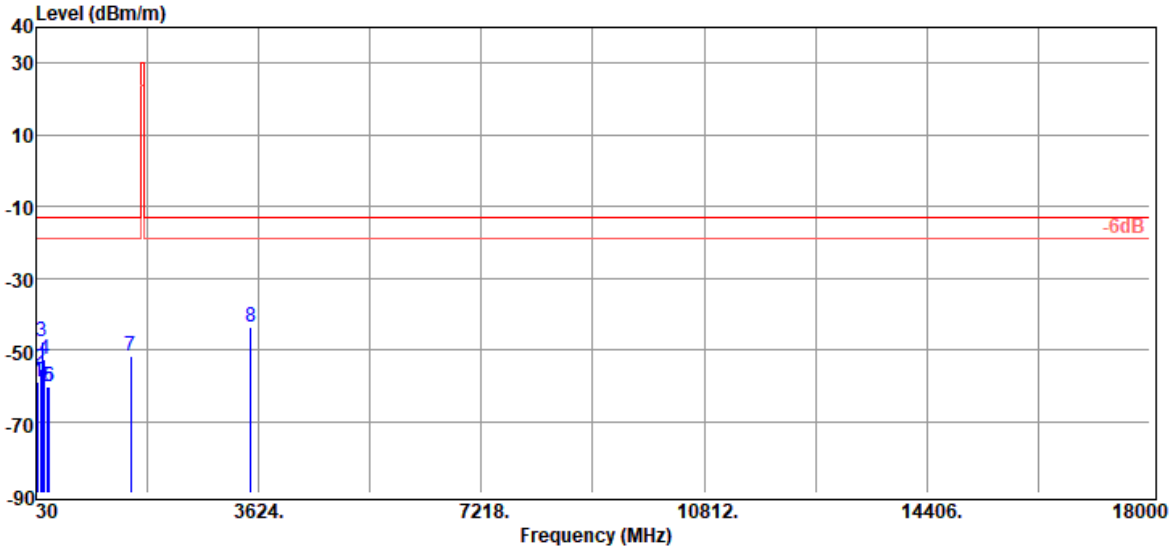
Freq. MHz	EIRP/ERP dBm	SG Output Level dBm	Antenna Gain dBi/dBd	Cable Loss dB	Limit dBm	Margin dB
34.85	-45.77	-25.27	-19.77	-0.73	-13.00	-32.77
105.66	-55.28	-47.05	-6.83	-1.40	-13.00	-42.28
120.21	-48.20	-39.69	-7.06	-1.45	-13.00	-35.20
157.07	-53.15	-44.45	-7.02	-1.68	-13.00	-40.15
167.74	-58.99	-50.81	-6.45	-1.73	-13.00	-45.99
255.04	-65.22	-61.46	-1.51	-2.25	-13.00	-52.22
1559.00	-51.82	-53.51	8.69	-7.00	-13.00	-38.82
3425.00	-44.62	-45.98	12.65	-11.29	-13.00	-31.62

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH MID	Temp./Humi.	:23.3/62
EUT Pol	:E2 Plan	Antenna Pol.	:VERTICAL
Test Frequency	:782 MHz +1745 MHz	Engineer	:Ashton Chiu



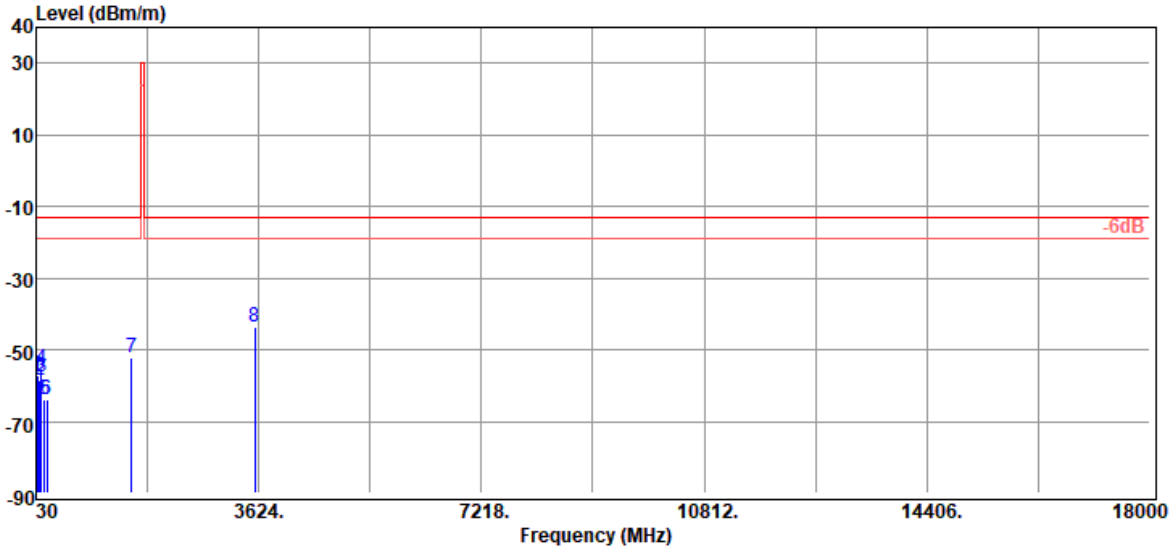
Freq. MHz	EIRP/ERP dBm	SG Output Level dBm	Antenna Gain dBi/dBd	Cable Loss dB	Limit dBm	Margin dB
30.00	-39.78	-18.27	-20.90	-0.61	-13.00	-26.78
34.85	-40.05	-19.55	-19.77	-0.73	-13.00	-27.05
43.58	-40.96	-21.39	-18.71	-0.86	-13.00	-27.96
49.40	-37.61	-19.02	-17.73	-0.86	-13.00	-24.61
119.24	-51.37	-42.88	-7.04	-1.45	-13.00	-38.37
196.84	-59.90	-55.53	-2.36	-2.01	-13.00	-46.90
1564.00	-52.10	-53.81	8.74	-7.03	-13.00	-39.10
3490.00	-43.46	-44.95	12.36	-10.87	-13.00	-30.46

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH MID	Temp./Humi.	:23.3/62
EUT Pol	:E2 Plan	Antenna Pol.	:HORIZONTAL
Test Frequency	:782 MHz +1745 MHz	Engineer	:Ashton Chiu



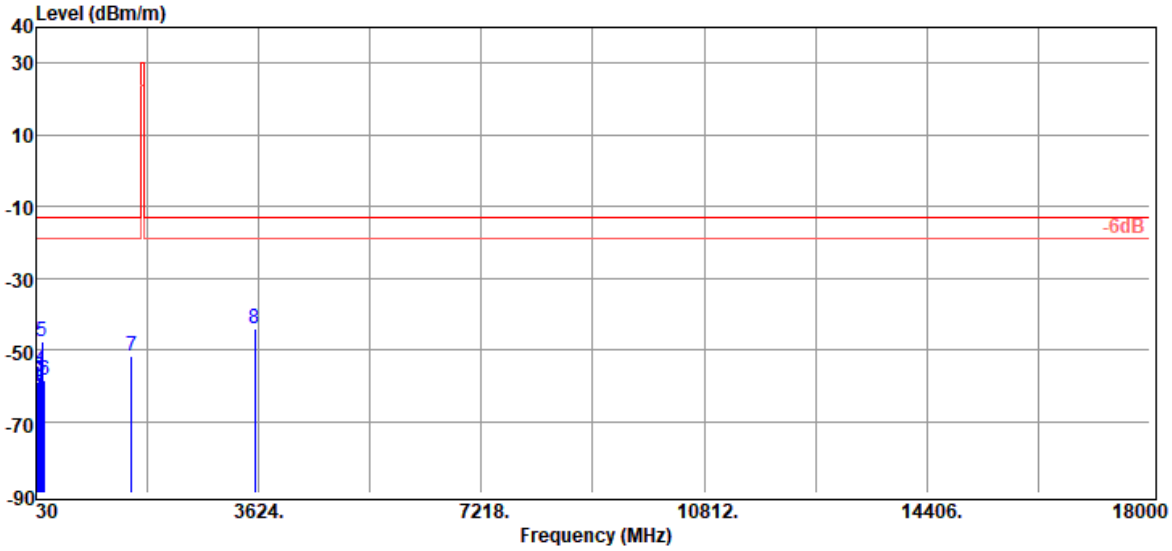
Freq. MHz	EIRP/ERP dBm	SG Output Level dBm	Antenna Gain dBi/dBd	Cable Loss dB	Limit dBm	Margin dB
56.19	-58.98	-41.78	-16.25	-0.95	-13.00	-45.98
105.66	-55.20	-46.97	-6.83	-1.40	-13.00	-42.20
121.18	-47.60	-39.06	-7.07	-1.47	-13.00	-34.60
170.65	-52.85	-45.08	-6.03	-1.74	-13.00	-39.85
222.06	-60.30	-56.86	-1.25	-2.19	-13.00	-47.30
249.22	-60.22	-56.38	-1.61	-2.23	-13.00	-47.22
1564.00	-51.91	-53.62	8.74	-7.03	-13.00	-38.91
3490.00	-43.85	-45.34	12.36	-10.87	-13.00	-30.85

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH HIGH	Temp./Humi.	:23.2/60
EUT Pol	:E2 Plan	Antenna Pol.	:VERTICAL
Test Frequency	:784.5 MHz +1777.5 MHz	Engineer	:Ashton Chiu



Freq. MHz	EIRP/ERP dBm	SG Output Level dBm	Antenna Gain dBi/dBd	Cable Loss dB	Limit dBm	Margin dB
51.34	-56.97	-38.76	-17.33	-0.88	-13.00	-43.97
94.99	-58.65	-51.72	-5.69	-1.24	-13.00	-45.65
109.54	-57.46	-49.02	-7.00	-1.44	-13.00	-44.46
117.30	-55.47	-46.93	-7.09	-1.45	-13.00	-42.47
169.68	-64.10	-56.18	-6.18	-1.74	-13.00	-51.10
206.54	-63.85	-59.96	-1.81	-2.08	-13.00	-50.85
1569.00	-52.02	-53.76	8.79	-7.05	-13.00	-39.02
3555.00	-43.76	-45.00	12.29	-11.05	-13.00	-30.76

Report Number	:E2/2020/80013	Test Site	:966 Chamber C
Operation Mode	:13A-66A	Test Date	:2020-11-24
Test Mode	:TX CH HIGH	Temp./Humi.	:23.2/60
EUT Pol	:E2 Plan	Antenna Pol.	:HORIZONTAL
Test Frequency	:784.5 MHz +1777.5 MHz	Engineer	:Ashton Chiu



Freq. MHz	EIRP/ERP dBm	SG Output Level dBm	Antenna Gain dBi/dBd	Cable Loss dB	Limit dBm	Margin dB
43.58	-60.22	-40.65	-18.71	-0.86	-13.00	-47.22
60.07	-58.75	-42.49	-15.26	-1.00	-13.00	-45.75
94.02	-57.43	-50.42	-5.78	-1.23	-13.00	-44.43
105.66	-55.76	-47.53	-6.83	-1.40	-13.00	-42.76
121.18	-47.71	-39.17	-7.07	-1.47	-13.00	-34.71
165.80	-58.71	-50.45	-6.55	-1.71	-13.00	-45.71
1569.00	-51.85	-53.59	8.79	-7.05	-13.00	-38.85
3555.00	-44.06	-45.30	12.29	-11.05	-13.00	-31.06

~ End of Report ~