

Partial FCC Test Report

(PART 24)

Report No.: RFBHDI-WTW-P21120081-8

FCC ID: 2ATM8EG25G

Test Model: EG25-G MINIPCIE

Received Date: Dec. 24, 2021

Test Date: Jan. 19 ~ Mar. 29, 2022

Issued Date: Apr. 22, 2022

Applicant: Hawkeye Tech Co., Ltd.

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**FCC Registration /
Designation Number:** 788550 / TW0003



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Release Control Record

Issue No.	Description	Date Issued
RFBHDI-WTW-P21120081-8	Original Release	Apr. 22, 2022

1 Certificate of Conformity

Product: LTE Module
Brand: Hawkeye Tech Co., Ltd.
Test Model: EG25-G MINIPCIE
Sample Status: Engineering Sample
Applicant: Hawkeye Tech Co., Ltd.
Test Date: Jan. 19 ~ Mar. 29, 2022
Standards: FCC Part 24, Subpart E

The above equipment has been tested by **Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's RF characteristics under the conditions specified in this report.

Prepared by : *Lena Wang* , Date: Apr. 22, 2022
Lena Wang / Specialist

Approved by : *Jeremy Lin* , Date: Apr. 22, 2022
Jeremy Lin / Project Engineer

2 Summary of Test Results

Applied Standard: FCC Part 24 & Part 2			
FCC Clause	Test Item	Result	Remarks
2.1046 24.232	Equivalent Isotropic Radiated Power	Pass	Meet the requirement of limit.
2.1047	Modulation Characteristics	N/A	Refer to Note
2.1046 24.232(d)	Peak to Average Ratio	N/A	Refer to Note
2.1055 24.235	Frequency Stability	N/A	Refer to Note
2.1049	Occupied Bandwidth	N/A	Refer to Note
24.238	Band Edge Measurements	N/A	Refer to Note
2.1051 24.238	Conducted Spurious Emissions	N/A	Refer to Note
2.1053 24.238	Radiated Spurious Emissions	Pass	Meet the requirement of limit. Minimum passing margin is -28.35 dB at 107.60 MHz.

Note:

1. This report is a partial report. Therefore, only test item of Equivalent Isotropic Radiated Power and Radiated Spurious Emissions tests were performed for this report. Other testing data please refer to SGS report no.: HR/2019/1001601 for module (Brand: Quectel, Model: EG25-G MINIPCIE)
2. Determining compliance based on the results of the compliance measurement, not taking into account measurement instrumentation uncertainty.

2.1 Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the EUT as specified in CISPR 16-4-2:

Measurement	Frequency	Expanded Uncertainty (k=2) (±)
Radiated Emissions up to 1 GHz	9 kHz ~ 30 MHz	3.0400 dB
	30 MHz ~ 200 MHz	2.0153 dB
	200 MHz ~ 1000 MHz	2.0224 dB
Radiated Emissions above 1 GHz	1 GHz ~ 18 GHz	1.0121 dB
	18 GHz ~ 40 GHz	1.1508 dB

2.2 Test Site and Instruments

Description & Manufacturer	Model No.	Serial No.	Date of Calibration	Due Date of Calibration
Spectrum Analyzer Agilent	N9010A	MY52220207	Jan. 06, 2022	Jan. 05, 2023
Test Receiver Agilent	N9038A	MY51210203	Sep. 22, 2021	Sep. 21, 2022
Spectrum Analyzer ROHDE & SCHWARZ	FSU43	101261	Apr. 12, 2021	Apr. 11, 2022
HORN Antenna SCHWARZBECK	BBHA 9170	9170-480	Nov. 14, 2021	Nov. 13, 2022
HORN Antenna SCHWARZBECK	BBHA 9120D	9120D-969	Nov. 14, 2021	Nov. 13, 2022
BILOG Antenna SCHWARZBECK	VULB 9168	9168-472	Oct. 28, 2021	Oct. 27, 2022
Fixed Attenuator WOKEN	MDCS18N-10	MDCS18N-10-01	Apr. 13, 2021	Apr. 12, 2022
MXG Vector signal generator Agilent	N5182B	MY53050430	Nov. 25, 2021	Nov. 24, 2022
Preamplifier EMCI	EMC 012645	980115	Oct. 05, 2021	Oct. 04, 2022
Preamplifier EMCI	EMC 330H	980112	Oct. 05, 2021	Oct. 04, 2022
RF Coaxial Cable EMCI	EMC104-SM-SM-8000	171005	Oct. 05, 2021	Oct. 04, 2022
RF Coaxial Cable HUBER+SUHNNER	SUCOFLEX 104	EMC104-SM-SM-1000(140807)	Oct. 05, 2021	Oct. 04, 2022
RF Coaxial Cable WOKEN	8D-FB	Cable-Ch10-01	Oct. 05, 2021	Oct. 04, 2022
Boresight Antenna Fixture	FBA-01	FBA-SIP01	NA	NA
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
Radio Communication Analyzer Anritsu	MT8820C	6201010284	Dec. 24, 2021	Dec. 23, 2022

- 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 General Information

3.1 General Description of EUT

Product	LTE Module		
Brand	Hawkeye Tech Co., Ltd.		
Test Model	EG25-G MINIPCIE		
Status of EUT	Engineering Sample		
Power Supply Rating	48Vdc (Adapter and PoE)		
Modulation Type	GSM/GPRS	GMSK	
	EDGE	GMSK, 8PSK	
	WCDMA	QPSK	
	LTE	QPSK, 16QAM	
Frequency Range	GSM/GPRS/EDGE	1850.2 ~ 1909.8 MHz	
	WCDMA	1852.4 ~ 1907.6 MHz	
	LTE Band 2 (Channel Bandwidth: 1.4 MHz)	1850.7 ~ 1909.3 MHz	
	LTE Band 2 (Channel Bandwidth: 3 MHz)	1851.5 ~ 1908.5 MHz	
	LTE Band 2 (Channel Bandwidth: 5 MHz)	1852.5 ~ 1907.5 MHz	
	LTE Band 2 (Channel Bandwidth: 10 MHz)	1855.0 ~ 1905.0 MHz	
	LTE Band 2 (Channel Bandwidth: 15 MHz)	1857.5 ~ 1902.5 MHz	
	LTE Band 2 (Channel Bandwidth: 20 MHz)	1860.0 ~ 1900.0 MHz	
	LTE Band 25 (Channel Bandwidth: 1.4 MHz)	1850.7 ~ 1914.3 MHz	
	LTE Band 25 (Channel Bandwidth: 3 MHz)	1851.5 ~ 1913.5 MHz	
	LTE Band 25 (Channel Bandwidth: 5 MHz)	1852.5 ~ 1912.5 MHz	
	LTE Band 25 (Channel Bandwidth: 10 MHz)	1855.0 ~ 1910.0 MHz	
	LTE Band 25 (Channel Bandwidth: 15 MHz)	1857.5 ~ 1907.5 MHz	
	LTE Band 25 (Channel Bandwidth: 20 MHz)	1860.0 ~ 1905.0 MHz	
Max. EIRP Power	GSM/GPRS	1056.818 mW (30.24dBm)	
	WCDMA	330.370 mW (25.19dBm)	
		QPSK	16QAM
	LTE Band 2 (Channel Bandwidth: 1.4 MHz)	260.016 mW (24.15dBm)	214.289 mW (23.31dBm)
	LTE Band 2 (Channel Bandwidth: 3 MHz)	259.418 mW (24.14dBm)	199.526 mW (23.00dBm)
	LTE Band 2 (Channel Bandwidth: 5 MHz)	261.818 mW (24.18dBm)	209.411 mW (23.21dBm)
	LTE Band 2 (Channel Bandwidth: 10 MHz)	276.694 mW (24.42dBm)	212.324 mW (23.27dBm)
	LTE Band 2 (Channel Bandwidth: 15 MHz)	268.534 mW (24.29dBm)	213.304 mW (23.29dBm)
	LTE Band 2 (Channel Bandwidth: 20 MHz)	269.153 mW (24.30dBm)	214.289 mW (23.31dBm)
	LTE Band 25 (Channel Bandwidth: 1.4 MHz)	262.422 mW (24.19dBm)	200.909 mW (23.03dBm)

	LTE Band 25 (Channel Bandwidth: 3 MHz)	274.157 mW (24.38dBm)	198.609 mW (22.98dBm)
	LTE Band 25 (Channel Bandwidth: 5 MHz)	279.254 mW (24.46dBm)	201.372 mW (23.04dBm)
	LTE Band 25 (Channel Bandwidth: 10 MHz)	283.139 mW (24.52dBm)	205.589 mW (23.13dBm)
	LTE Band 25 (Channel Bandwidth: 15 MHz)	287.078 mW (24.58dBm)	206.063 mW (23.14dBm)
	LTE Band 25 (Channel Bandwidth: 20 MHz)	283.139 mW (24.52dBm)	208.930 mW (23.20dBm)
Antenna Type	Dipole Antenna with 1.7 dBi gain		
Accessory Device	N/A		
Data Cable Supplied	N/A		

Note:

1. The EUT was installed in a specific End-product.

Product	Brand	Model	FCC ID
veeaHub		VHH09-4GL	2ARXKVHE09-4GL

2. The End-product contains following accessory devices.

Product	Brand	Model	Description
Adapter	EDAC Power Electronics Co., Ltd.	EA1062SGR-480	I/P: 100-240 Vac, 50/60 Hz, 2.5A O/P: 48 Vdc, 1.35 A 1.2m DC cable with 1 core

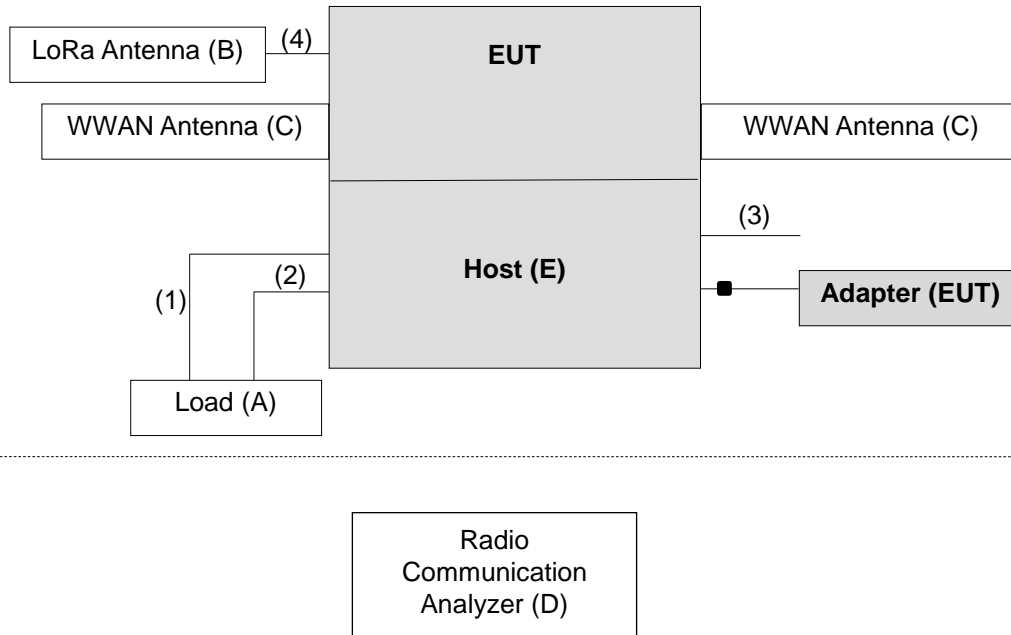
3. The End-product use following devices (Support unit).

Product	Brand	Model	Description
PoE	N/A	APOE02-WM	O/P: 48 Vdc

4. The above Antenna information is declared by manufacturer and for more detailed features description, please refer to the manufacturer's specifications, the laboratory shall not be held responsible.
5. The above EUT information is declared by manufacturer and for more detailed features description, please refers to the manufacturer's specifications or user's manual.


3.2 Configuration of System under Test

<Radiated Emission Test> & <E.R.P. Test>



3.2.1 Description of Support Units

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

ID	Product	Brand	Model No.	Serial No.	FCC ID	Remarks
A.	Load	NA	NA	NA	NA	-
B.	LoRa Antenna	PCTEL	MFB9155NF	NA	NA	Provided by manufacturer
C.	WWAN Antenna	2J	2J2124W -C315N	NA	NA	Provided by manufacturer
D.	Radio Communication Analyzer	Anritsu	MT8820C	6201010284	NA	-
E.	veeaHub		VHE09XXXXX (X=A-Z, 0-9, blank or "-")	NA	2ARXKVHE09-4GL	Provided by manufacturer

Note: All power cords of the above support units are non-shielded (1.8m).

ID	Cable Descriptions	Qty.	Length (m)	Shielding (Yes/No)	Cores (Qty.)	Remarks
1.	LAN cable	1	0.4	N	0	RJ45, Cat5e
2.	LAN cable	1	0.4	N	0	RJ45, Cat5e
3.	RS232 cable	1	0.4	Y	0	-
4.	Coaxial cable	1	1.5	Y	0	-

3.3 Test Mode Applicability and Tested Channel Detail

Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates, antenna degree 90° and 180°, and antenna ports.

The worst case was found when positioned as the table below. Following channel(s) was (were) selected for the final test as listed below:

Band	Radiated Emission
GSM	X-axis
WCDMA	X-axis
LTE Band 25	X-axis

GSM

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Mode
-	EIRP	512 to 810	512, 661, 810	GSM, EDGE
-	Radiated Emission	512 to 810	512	GSM, EDGE

WCDMA

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Mode
-	EIRP	9262 to 9538	9262, 9400, 9538	WCDMA
-	Radiated Emission	9262 to 9538	9538	WCDMA

LTE Band 2

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	EIRP	18607 to 19193	18607, 18900, 19193	1.4 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		18615 to 19185	18615, 18900, 19185	3 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		18625 to 19175	18625, 18900, 19175	5 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		18650 to 19150	18650, 18900, 19150	10 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		18675 to 19125	18675, 18900, 19125	15 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		18700 to 19100	18700, 18900, 19100	20 MHz	QPSK, 16QAM	1 RB / 0 RB Offset

Note: This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation and RB configurations according to Module report worst maximum output power.

LTE Band 25

EUT Configure Mode	Test Item	Available Channel	Tested Channel	Channel Bandwidth	Modulation	Mode
-	EIRP	26047 to 26683	26047, 26365, 26683	1.4 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		26055 to 26675	26055, 26365, 26675	3 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		26065 to 26665	26065, 26365, 26665	5 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		26090 to 26640	26090, 26365, 26640	10 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		26115 to 26615	26115, 26365, 26615	15 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
		26140 to 26590	26140, 26365, 26590	20 MHz	QPSK, 16QAM	1 RB / 0 RB Offset
-	Radiated Emission	26115 to 26615	26615	15 MHz	QPSK	1 RB / 0 RB Offset

Note:

1. This device was tested under all bandwidths, RB configurations and modulations. The worst case was found in QPSK modulation and RB configurations according to Module report worst maximum output power.
2. For radiated emission, select the worst radiated emission channel for final testing.

Test Condition:

Test Item	Environmental Conditions	Input Power	Tested By
EIRP	25 deg. C, 65 % RH	120 Vac, 60 Hz	Vincent Chen
Radiated Emission	21 deg. C, 73 % RH	120 Vac, 60 Hz	Vincent Chen

3.4 EUT Operating Conditions

The EUT makes a call to the communication simulator. The communication simulator station system controlled a EUT to export maximum output power under transmission mode and specific channel frequency

3.5 General Description of Applied Standards and references

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

Test Standard:

FCC 47 CFR Part 2

FCC 47 CFR Part 24

ANSI 63.26-2015

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

References Test Guidance:

KDB 971168 D01 Power Meas License Digital Systems v03r01

ANSI/TIA/EIA-603-E 2016

NOTE: All test items have been performed as a reference to the above KDB test guidance.

4 Test Types and Results

4.1 Output Power Measurement

4.1.1 Limits of Output Power Measurement

Mobile / Portable station are limited to 2 watts e.i.r.p.

4.1.2 Test Procedures

Conducted Power Measurement:

The EUT was set up for the maximum power with GSM, WCDMA and LTE link data modulation and link up with simulator. Set the EUT to transmit under low, middle and high channel and record the power level shown on simulator.

Maximum EIRP / ERP

The relevant equation for determining the maximum ERP or EIRP from the measured RF output power is given in Equation as follows:

$$\text{EIRP} = P_{\text{Meas}} + G_T$$

$$\text{ERP} = P_{\text{Meas}} + G_T - 2.15$$

where

ERP or EIRP effective radiated power or equivalent isotropically radiated power, respectively

(expressed in the same units as P_{Meas} , e.g., dBm or dBW)

P_{Meas} measured transmitter output power or PSD, in dBm or dBW

G_T gain of the transmitting antenna, in dB (ERP) or dBi (EIRP)

4.1.3 Test Setup

Conducted Power Measurement:



4.1.4 Test Results

Conducted Output Power (dBm)

Band	GSM1900		
Channel	512	661	810
Frequency (MHz)	1850.2	1880.0	1909.8
GSM (GMSK, 1Tx-slot)	28.54	28.42	28.31
EDGE (8PSK, 1Tx-slot)	25.66	25.65	25.50

Band	WCDMA II		
Channel	9262	9400	9538
Frequency (MHz)	1852.4	1880.0	1907.6
RMC 12.2K	23.37	23.33	23.49
HSDPA Subtest-1	22.50	22.55	22.60
HSUPA Subtest-1	22.04	22.01	22.13

LTE Band 2						
BW	MCS Index	RB Size	RB Offset	Low	Mid	High
		Channel		18607	18900	19193
		Frequency (MHz)		1850.7	1880	1909.3
1.4M	QPSK	1	0	22.30	22.14	22.29
		1	2	22.42	22.36	22.45
		1	5	22.29	22.21	22.37
		3	0	22.17	22.06	22.15
		3	1	22.15	22.11	22.23
		3	3	22.20	22.25	22.37
		6	0	21.03	21.16	21.28
	16QAM	1	0	21.45	21.35	21.41
		1	2	21.59	21.47	21.61
		1	5	21.38	21.31	21.38
		3	0	21.22	21.11	21.28
		3	1	21.48	21.40	21.53
		3	3	21.22	21.24	21.31
		6	0	20.28	20.26	20.33
BW	MCS Index	Channel		18615	18900	19185
		Frequency (MHz)		1851.5	1880	1908.5
3M	QPSK	1	0	22.25	22.13	22.37
		1	7	22.34	22.25	22.44
		1	14	22.30	22.27	22.42
		8	0	21.17	21.23	21.50
		8	3	21.15	21.27	21.61
		8	7	21.06	21.13	21.37
		15	0	21.08	21.13	21.29
	16QAM	1	0	21.17	20.83	21.24
		1	7	21.27	20.95	21.30
		1	14	21.00	20.74	21.09
		8	0	19.96	19.79	20.18
		8	3	20.18	20.09	20.56
		8	7	20.10	20.03	20.50
		15	0	20.12	20.16	20.65

LTE Band 2						
BW	MCS Index	Channel		18625	18900	19175
		Frequency (MHz)		1852.5	1880	1907.5
5M	QPSK	1	0	22.26	22.22	22.26
		1	12	22.27	22.31	22.48
		1	24	22.20	22.27	22.35
		12	0	21.03	21.12	21.27
		12	6	21.11	21.17	21.39
		12	13	21.01	21.13	21.37
		25	0	20.91	21.07	21.25
	16QAM	1	0	21.21	20.93	21.17
		1	12	21.47	21.23	21.51
		1	24	21.11	20.84	21.16
		12	0	20.27	19.95	20.34
		12	6	20.37	20.05	20.35
		12	13	20.40	20.17	20.56
		25	0	20.43	20.21	20.58
BW	MCS Index	Channel		18650	18900	19150
		Frequency (MHz)		1855	1880	1905
10M	QPSK	1	0	22.34	22.29	22.48
		1	24	22.65	22.56	22.72
		1	49	22.45	22.34	22.44
		25	0	21.23	21.19	21.22
		25	12	21.27	21.27	21.21
		25	25	21.11	21.16	21.16
		50	0	21.09	21.18	21.19
	16QAM	1	0	21.32	21.21	21.54
		1	24	21.41	21.32	21.57
		1	49	21.39	20.99	21.16
		25	0	20.64	20.21	20.41
		25	12	20.60	20.26	20.55
		25	25	20.52	20.19	20.58
		50	0	20.61	20.25	20.56

LTE Band 2						
BW	MCS Index	Channel		18675	18900	19125
		Frequency (MHz)		1857.5	1880	1902.5
15M	QPSK	1	0	22.39	22.21	22.33
		1	37	22.56	22.46	22.59
		1	74	22.24	22.13	22.31
		36	0	21.22	21.13	21.27
		36	19	21.36	21.22	21.29
		36	39	21.19	21.05	21.09
		75	0	21.25	21.11	21.08
	16QAM	1	0	21.46	21.32	21.29
		1	37	21.53	21.38	21.59
		1	74	21.23	21.10	21.08
		36	0	20.20	20.17	20.18
		36	19	20.35	20.37	20.45
		36	39	20.26	20.25	20.30
		75	0	20.25	20.22	20.28
BW	MCS Index	Channel		18700	18900	19100
		Frequency (MHz)		1860	1880	1900
20M	QPSK	1	0	22.33	22.31	22.35
		1	50	22.48	22.48	22.60
		1	99	22.27	22.31	22.37
		50	0	21.13	21.22	21.24
		50	25	21.19	21.30	21.34
		50	50	20.94	21.12	21.24
		100	0	21.04	21.19	21.21
	16QAM	1	0	21.47	21.48	21.33
		1	50	21.43	21.49	21.61
		1	99	21.21	21.34	21.23
		50	0	19.98	20.13	19.93
		50	25	20.08	20.24	19.99
		50	50	20.02	20.18	19.89
		100	0	19.96	20.13	19.88

LTE Band 25						
BW	MCS Index	RB Size	RB Offset	Low	Mid	High
		Channel		26047	26365	26683
		Frequency (MHz)		1850.7	1882.5	1914.3
1.4M	QPSK	1	0	22.17	22.14	22.47
		1	2	22.17	22.21	22.49
		1	5	21.95	22.07	22.43
		3	0	21.87	22.04	22.30
		3	1	21.83	22.07	22.25
		3	3	21.73	21.97	22.25
		6	0	20.79	21.04	21.30
	16QAM	1	0	21.14	21.03	21.23
		1	2	21.23	21.15	21.33
		1	5	20.97	21.01	21.31
		3	0	20.90	21.02	21.27
		3	1	20.86	20.95	21.19
		3	3	20.87	20.93	21.24
		6	0	20.09	20.10	20.32
BW	MCS Index	Channel		26055	26365	26675
		Frequency (MHz)		1851.5	1882.5	1913.5
3M	QPSK	1	0	22.36	22.09	22.34
		1	7	22.59	22.37	22.68
		1	14	22.43	22.18	22.39
		8	0	21.14	21.00	21.24
		8	3	21.20	21.10	21.31
		8	7	21.20	21.13	21.39
		15	0	21.12	21.05	21.27
	16QAM	1	0	21.16	21.17	21.22
		1	7	21.23	21.26	21.28
		1	14	21.12	21.14	21.04
		8	0	19.98	20.01	19.99
		8	3	19.96	20.06	19.99
		8	7	19.81	20.03	20.01
		15	0	19.53	19.86	19.82

LTE Band 25						
BW	MCS Index	Channel		26065	26365	26665
		Frequency (MHz)		1852.5	1882.5	1912.5
5M	QPSK	1	0	22.35	22.25	22.46
		1	12	22.57	22.47	22.76
		1	24	22.34	22.28	22.53
		12	0	21.32	21.31	21.66
		12	6	21.21	21.20	21.53
		12	13	21.39	21.33	21.59
		25	0	21.34	21.32	21.50
	16QAM	1	0	21.21	21.22	21.24
		1	12	21.31	21.33	21.34
		1	24	21.13	21.12	21.03
		12	0	19.87	19.92	19.93
		12	6	19.95	20.10	20.03
		12	13	20.06	20.33	20.32
		25	0	19.91	20.28	20.23
BW	MCS Index	Channel		26090	26365	26640
		Frequency (MHz)		1855	1882.5	1910
10M	QPSK	1	0	22.45	22.43	22.55
		1	24	22.67	22.74	22.82
		1	49	22.55	22.58	22.66
		25	0	21.21	21.32	21.33
		25	12	21.14	21.33	21.42
		25	25	21.16	21.37	21.42
		50	0	20.99	21.26	21.28
	16QAM	1	0	21.17	21.26	21.30
		1	24	21.24	21.36	21.43
		1	49	20.98	21.15	21.24
		25	0	20.15	20.28	20.44
		25	12	20.44	20.54	20.76
		25	25	20.12	20.26	20.55
		50	0	20.07	20.22	20.56

LTE Band 25						
BW	MCS Index	Channel		26115	26365	26615
		Frequency (MHz)		1857.5	1882.5	1907.5
15M	QPSK	1	0	22.43	22.42	22.54
		1	37	22.65	22.67	22.88
		1	74	22.28	22.41	22.57
		36	0	21.03	21.24	21.37
		36	19	21.04	21.29	21.51
		36	39	20.90	21.24	21.50
		75	0	20.88	21.31	21.67
	16QAM	1	0	21.31	21.20	21.29
		1	37	21.41	21.38	21.44
		1	74	21.37	21.34	21.42
		36	0	20.28	20.26	20.43
		36	19	20.34	20.31	20.49
		36	39	20.17	20.18	20.38
		75	0	20.26	20.35	20.47
BW	MCS Index	Channel		26140	26365	26590
		Frequency (MHz)		1860	1882.5	1905
20M	QPSK	1	0	22.28	22.44	22.43
		1	50	22.53	22.72	22.82
		1	99	21.97	22.24	22.31
		50	0	20.98	21.21	21.37
		50	25	20.94	21.27	21.36
		50	50	20.70	21.09	21.21
		100	0	20.75	21.13	21.18
	16QAM	1	0	21.27	21.24	21.23
		1	50	21.32	21.42	21.50
		1	99	21.04	21.07	20.88
		50	0	20.02	20.12	19.92
		50	25	19.95	20.05	19.85
		50	50	20.09	20.23	20.03
		100	0	19.99	20.16	19.94

EIRP Power (dBm)

Band	GSM1900		
Channel	512	661	810
Frequency (MHz)	1850.2	1880.0	1909.8
GSM (GMSK, 1Tx-slot)	30.24	30.12	30.01
EDGE (8PSK, 1Tx-slot)	27.36	27.35	27.20

*EIRP = Conducted + antenna gain (1.7dBi)

Band	WCDMA II		
Channel	9262	9400	9538
Frequency (MHz)	1852.4	1880.0	1907.6
RMC 12.2K	25.07	25.03	25.19
HSDPA Subtest-1	24.20	24.25	24.30
HSUPA Subtest-1	23.74	23.71	23.83

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 2						
BW	MCS Index	RB Size	RB Offset	Low	Mid	High
		Channel		18607	18900	19193
		Frequency (MHz)		1850.7	1880	1909.3
1.4M	QPSK	1	0	24.00	23.84	23.99
		1	2	24.12	24.06	24.15
		1	5	23.99	23.91	24.07
		3	0	23.87	23.76	23.85
		3	1	23.85	23.81	23.93
		3	3	23.90	23.95	24.07
		6	0	22.73	22.86	22.98
	16QAM	1	0	23.15	23.05	23.11
		1	2	23.29	23.17	23.31
		1	5	23.08	23.01	23.08
		3	0	22.92	22.81	22.98
		3	1	23.18	23.10	23.23
		3	3	22.92	22.94	23.01
		6	0	21.98	21.96	22.03
BW	MCS Index	Channel		18615	18900	19185
		Frequency (MHz)		1851.5	1880	1908.5
3M	QPSK	1	0	23.95	23.83	24.07
		1	7	24.04	23.95	24.14
		1	14	24.00	23.97	24.12
		8	0	22.87	22.93	23.20
		8	3	22.85	22.97	23.31
		8	7	22.76	22.83	23.07
		15	0	22.78	22.83	22.99
	16QAM	1	0	22.87	22.53	22.94
		1	7	22.97	22.65	23.00
		1	14	22.70	22.44	22.79
		8	0	21.66	21.49	21.88
		8	3	21.88	21.79	22.26
		8	7	21.80	21.73	22.20
		15	0	21.82	21.86	22.35

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 2						
BW	MCS Index	Channel		18625	18900	19175
		Frequency (MHz)		1852.5	1880	1907.5
5M	QPSK	1	0	23.96	23.92	23.96
		1	12	23.97	24.01	24.18
		1	24	23.90	23.97	24.05
		12	0	22.73	22.82	22.97
		12	6	22.81	22.87	23.09
		12	13	22.71	22.83	23.07
		25	0	22.61	22.77	22.95
	16QAM	1	0	22.91	22.63	22.87
		1	12	23.17	22.93	23.21
		1	24	22.81	22.54	22.86
		12	0	21.97	21.65	22.04
		12	6	22.07	21.75	22.05
		12	13	22.10	21.87	22.26
		25	0	22.13	21.91	22.28
BW	MCS Index	Channel		18650	18900	19150
		Frequency (MHz)		1855	1880	1905
10M	QPSK	1	0	24.04	23.99	24.18
		1	24	24.35	24.26	24.42
		1	49	24.15	24.04	24.14
		25	0	22.93	22.89	22.92
		25	12	22.97	22.97	22.91
		25	25	22.81	22.86	22.86
		50	0	22.79	22.88	22.89
	16QAM	1	0	23.02	22.91	23.24
		1	24	23.11	23.02	23.27
		1	49	23.09	22.69	22.86
		25	0	22.34	21.91	22.11
		25	12	22.30	21.96	22.25
		25	25	22.22	21.89	22.28
		50	0	22.31	21.95	22.26

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 2						
BW	MCS Index	Channel		18675	18900	19125
		Frequency (MHz)		1857.5	1880	1902.5
15M	QPSK	1	0	24.09	23.91	24.03
		1	37	24.26	24.16	24.29
		1	74	23.94	23.83	24.01
		36	0	22.92	22.83	22.97
		36	19	23.06	22.92	22.99
		36	39	22.89	22.75	22.79
		75	0	22.95	22.81	22.78
	16QAM	1	0	23.16	23.02	22.99
		1	37	23.23	23.08	23.29
		1	74	22.93	22.80	22.78
		36	0	21.90	21.87	21.88
		36	19	22.05	22.07	22.15
		36	39	21.96	21.95	22.00
		75	0	21.95	21.92	21.98
BW	MCS Index	Channel		18700	18900	19100
		Frequency (MHz)		1860	1880	1900
20M	QPSK	1	0	24.03	24.01	24.05
		1	50	24.18	24.18	24.30
		1	99	23.97	24.01	24.07
		50	0	22.83	22.92	22.94
		50	25	22.89	23.00	23.04
		50	50	22.64	22.82	22.94
		100	0	22.74	22.89	22.91
	16QAM	1	0	23.17	23.18	23.03
		1	50	23.13	23.19	23.31
		1	99	22.91	23.04	22.93
		50	0	21.68	21.83	21.63
		50	25	21.78	21.94	21.69
		50	50	21.72	21.88	21.59
		100	0	21.66	21.83	21.58

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 25						
BW	MCS Index	RB Size	RB Offset	Low	Mid	High
		Channel		26047	26365	26683
		Frequency (MHz)		1850.7	1882.5	1914.3
1.4M	QPSK	1	0	23.87	23.84	24.17
		1	2	23.87	23.91	24.19
		1	5	23.65	23.77	24.13
		3	0	23.57	23.74	24.00
		3	1	23.53	23.77	23.95
		3	3	23.43	23.67	23.95
		6	0	22.49	22.74	23.00
	16QAM	1	0	22.84	22.73	22.93
		1	2	22.93	22.85	23.03
		1	5	22.67	22.71	23.01
		3	0	22.60	22.72	22.97
		3	1	22.56	22.65	22.89
		3	3	22.57	22.63	22.94
		6	0	21.79	21.80	22.02
BW	MCS Index	Channel		26055	26365	26675
		Frequency (MHz)		1851.5	1882.5	1913.5
3M	QPSK	1	0	24.06	23.79	24.04
		1	7	24.29	24.07	24.38
		1	14	24.13	23.88	24.09
		8	0	22.84	22.70	22.94
		8	3	22.90	22.80	23.01
		8	7	22.90	22.83	23.09
		15	0	22.82	22.75	22.97
	16QAM	1	0	22.86	22.87	22.92
		1	7	22.93	22.96	22.98
		1	14	22.82	22.84	22.74
		8	0	21.68	21.71	21.69
		8	3	21.66	21.76	21.69
		8	7	21.51	21.73	21.71
		15	0	21.23	21.56	21.52

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 25						
BW	MCS Index	Channel		26065	26365	26665
		Frequency (MHz)		1852.5	1882.5	1912.5
5M	QPSK	1	0	24.05	23.95	24.16
		1	12	24.27	24.17	24.46
		1	24	24.04	23.98	24.23
		12	0	23.02	23.01	23.36
		12	6	22.91	22.90	23.23
		12	13	23.09	23.03	23.29
		25	0	23.04	23.02	23.20
	16QAM	1	0	22.91	22.92	22.94
		1	12	23.01	23.03	23.04
		1	24	22.83	22.82	22.73
		12	0	21.57	21.62	21.63
		12	6	21.65	21.80	21.73
		12	13	21.76	22.03	22.02
		25	0	21.61	21.98	21.93
BW	MCS Index	Channel		26090	26365	26640
		Frequency (MHz)		1855	1882.5	1910
10M	QPSK	1	0	24.15	24.13	24.25
		1	24	24.37	24.44	24.52
		1	49	24.25	24.28	24.36
		25	0	22.91	23.02	23.03
		25	12	22.84	23.03	23.12
		25	25	22.86	23.07	23.12
		50	0	22.69	22.96	22.98
	16QAM	1	0	22.87	22.96	23.00
		1	24	22.94	23.06	23.13
		1	49	22.68	22.85	22.94
		25	0	21.85	21.98	22.14
		25	12	22.14	22.24	22.46
		25	25	21.82	21.96	22.25
		50	0	21.77	21.92	22.26

*EIRP = Conducted + antenna gain (1.7dBi)

LTE Band 25						
BW	MCS Index	Channel		26115	26365	26615
		Frequency (MHz)		1857.5	1882.5	1907.5
15M	QPSK	1	0	24.13	24.12	24.24
		1	37	24.35	24.37	24.58
		1	74	23.98	24.11	24.27
		36	0	22.73	22.94	23.07
		36	19	22.74	22.99	23.21
		36	39	22.60	22.94	23.20
		75	0	22.58	23.01	23.37
	16QAM	1	0	23.01	22.90	22.99
		1	37	23.11	23.08	23.14
		1	74	23.07	23.04	23.12
		36	0	21.98	21.96	22.13
		36	19	22.04	22.01	22.19
		36	39	21.87	21.88	22.08
		75	0	21.96	22.05	22.17
BW	MCS Index	Channel		26140	26365	26590
		Frequency (MHz)		1860	1882.5	1905
20M	QPSK	1	0	23.98	24.14	24.13
		1	50	24.23	24.42	24.52
		1	99	23.67	23.94	24.01
		50	0	22.68	22.91	23.07
		50	25	22.64	22.97	23.06
		50	50	22.40	22.79	22.91
		100	0	22.45	22.83	22.88
	16QAM	1	0	22.97	22.94	22.93
		1	50	23.02	23.12	23.20
		1	99	22.74	22.77	22.58
		50	0	21.72	21.82	21.62
		50	25	21.65	21.75	21.55
		50	50	21.79	21.93	21.73
		100	0	21.69	21.86	21.64

*EIRP = Conducted + antenna gain (1.7dBi)

4.2 Radiated Emission Measurement

4.2.1 Limits of Radiated Emission Measurement

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. The emission limit is equal to -13 dBm.

4.2.2 Test Procedure

- a. In the semi-anechoic chamber, EUT placed on the 0.8 m (below or equal 1 GHz) and/or 1.5 m (above 1 GHz) height of Turn Table, rotated the table around 360 degrees to search the maximum radiation power and receiver antenna shall be rotated vertical and horizontal polarization and moved height from 1 m to 4 m to find the maximum polar radiated power. The "Read Value" is the spectrum reading the maximum power value.
- b. Perform a field strength measurement and record the worse read value, is the field strength value via a spectrum reading obtained corrected for antenna factor, cable loss and pre-amplifier factor and then mathematically convert the measured field strength level to EIRP/ERP level.
- c. Following C63.26 section 5.5 and 5.2.7.
EIRP (dBm) = E (dB μ V/m) + 20log (D) - 104.8; where D is the measurement distance (in the far field region) in m.
ERP (dBm) = E (dB μ V/m) + 20log (D) - 104.8 - 2.15; where D is the measurement distance (in the far field region) in m.

NOTE:

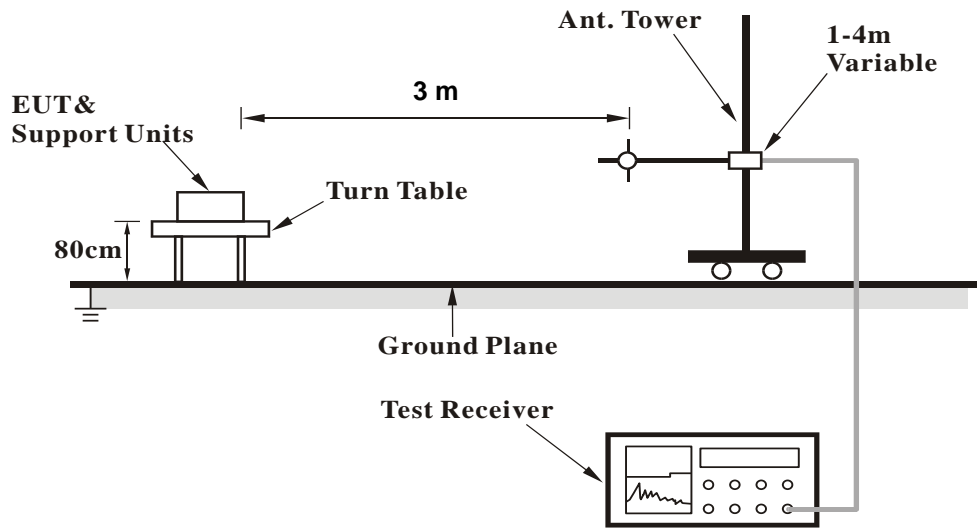
1. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 1 MHz/3 MHz.
2. 9 kHz ~ 30 MHz Data:
The amplitude of spurious emissions attenuated more than 20 dB below the permissible value is not required to be report.

4.2.3 Deviation from Test Standard

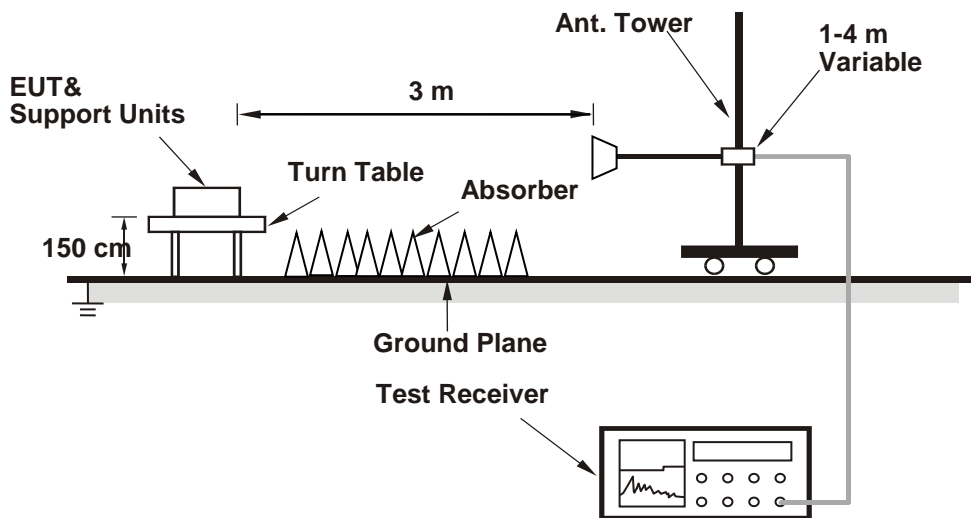
No deviation.

4.2.4 Test Setup

<Radiated Emission below or equal 1 GHz>



<Radiated Emission above 1 GHz>



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

4.2.5 Test Results

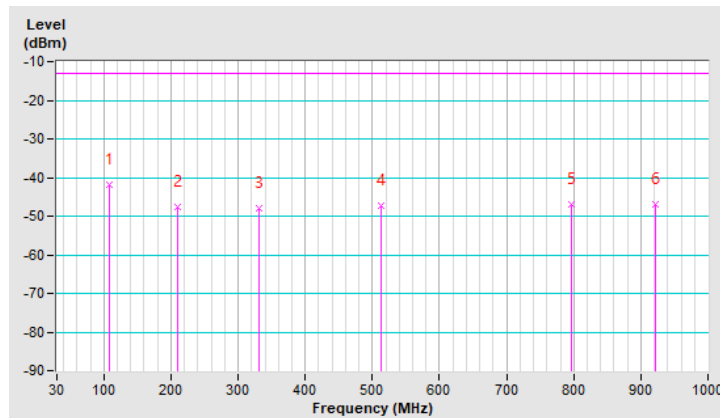
Below 1GHz

RF Mode	TX PCS 1900	Channel	CH 512 : 1850.2 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	108.57	-41.94	-13.00	-28.94	1.32 H	261	68.59	-110.53
2	209.45	-47.65	-13.00	-34.65	2.41 H	91	63.85	-111.50
3	331.67	-47.81	-13.00	-34.81	2.28 H	239	58.27	-106.08
4	513.06	-47.29	-13.00	-34.29	1.96 H	95	53.84	-101.13
5	797.27	-46.92	-13.00	-33.92	3.22 H	270	48.10	-95.02
6	922.40	-47.11	-13.00	-34.11	1.78 H	210	46.00	-93.11

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. Margin value = EIRP – Limit value
4. The other EIRP levels were very low against the limit.

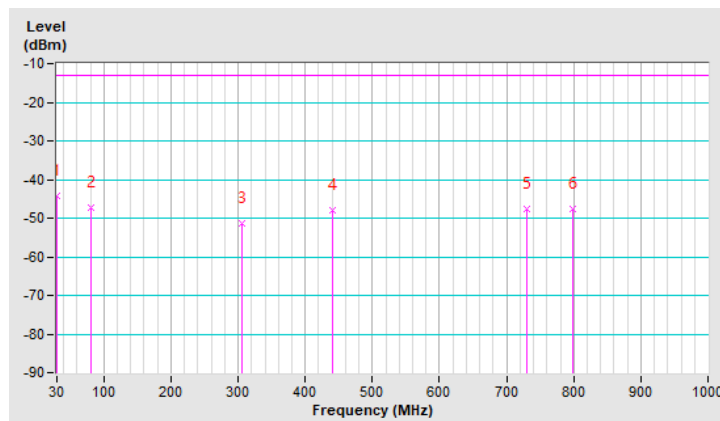


RF Mode	TX PCS 1900	Channel	CH 512 : 1850.2 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	30.97	-44.19	-13.00	-31.19	1.23 V	329	65.39	-109.58
2	81.41	-47.44	-13.00	-34.44	1.87 V	322	65.74	-113.18
3	305.48	-51.44	-13.00	-38.44	2.22 V	2	55.66	-107.10
4	440.31	-47.84	-13.00	-34.84	2.69 V	2	54.86	-102.70
5	730.34	-47.54	-13.00	-34.54	1.52 V	282	48.93	-96.47
6	799.21	-47.69	-13.00	-34.69	1.07 V	310	47.22	-94.91

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. $Margin\ value = EIRP - Limit\ value$
4. The other EIRP levels were very low against the limit.

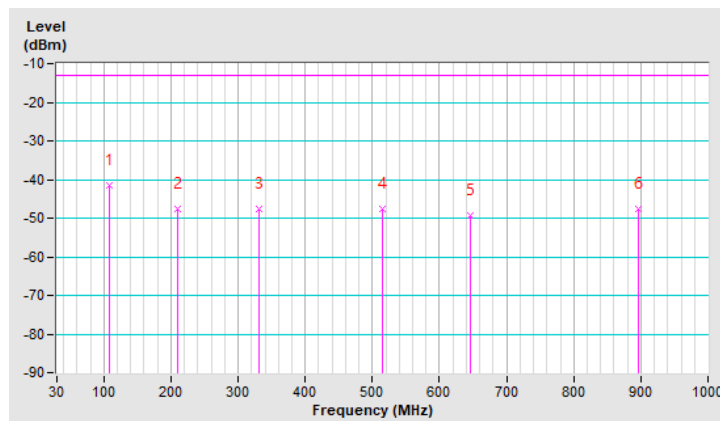


RF Mode	TX WCDMA Band II	Channel	CH 9538 : 1907.6 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	107.60	-41.44	-13.00	-28.44	1.78 H	242	69.21	-110.65
2	209.45	-47.56	-13.00	-34.56	1.63 H	85	63.94	-111.50
3	330.70	-47.55	-13.00	-34.55	2.24 H	239	58.57	-106.12
4	515.00	-47.73	-13.00	-34.73	2.08 H	108	53.38	-101.11
5	645.95	-49.29	-13.00	-36.29	1.11 H	274	48.49	-97.78
6	897.18	-47.66	-13.00	-34.66	1.42 H	79	46.07	-93.73

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. $Margin\ value = EIRP - Limit\ value$
4. The other EIRP levels were very low against the limit.

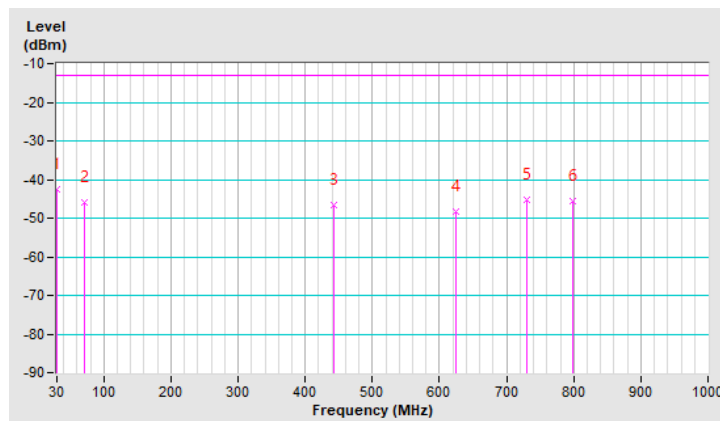


RF Mode	TX WCDMA Band II	Channel	CH 9538 : 1907.6 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	30.97	-42.67	-13.00	-29.67	1.32 V	283	66.91	-109.58
2	71.71	-46.07	-13.00	-33.07	2.42 V	119	64.48	-110.55
3	443.22	-46.65	-13.00	-33.65	1.78 V	18	56.05	-102.70
4	624.61	-48.15	-13.00	-35.15	3.68 V	281	49.97	-98.12
5	729.37	-45.16	-13.00	-32.16	1.02 V	278	51.36	-96.52
6	798.24	-45.59	-13.00	-32.59	1.33 V	321	49.38	-94.97

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. $Margin\ value = EIRP - Limit\ value$
4. The other EIRP levels were very low against the limit.

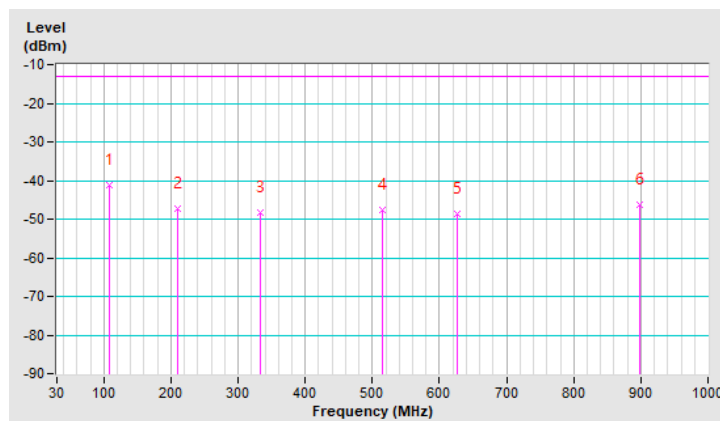


RF Mode	TX LTE Band XXV-15MHz	Channel	CH 26615 : 1907.5 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	107.60	-41.35	-13.00	-28.35	1.55 H	228	69.30	-110.65
2	209.45	-47.15	-13.00	-34.15	2.36 H	85	64.35	-111.50
3	333.61	-48.15	-13.00	-35.15	1.87 H	230	57.87	-106.02
4	515.97	-47.60	-13.00	-34.60	2.20 H	95	53.48	-101.08
5	625.58	-48.55	-13.00	-35.55	1.96 H	254	49.54	-98.09
6	899.12	-46.41	-13.00	-33.41	1.11 H	72	47.32	-93.73

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. $Margin\ value = EIRP - Limit\ value$
4. The other EIRP levels were very low against the limit.

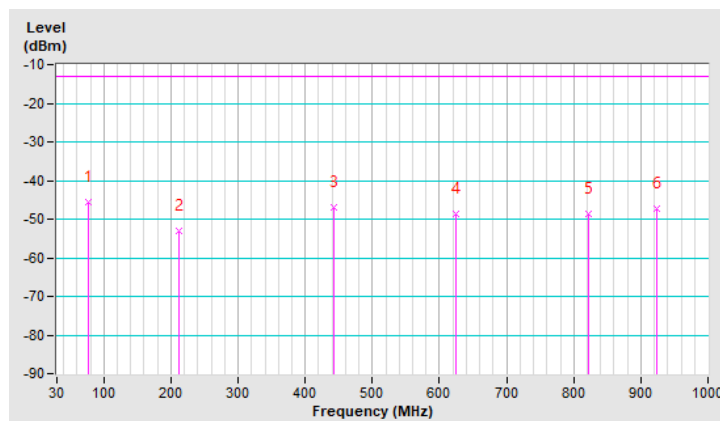


RF Mode	TX LTE Band XXV-15MHz	Channel	CH 26615 : 1907.5 MHz
Frequency Range	30MHz ~ 1GHz		

Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	76.56	-45.45	-13.00	-32.45	1.52 V	295	66.54	-111.99
2	211.39	-53.01	-13.00	-40.01	1.74 V	327	58.49	-111.50
3	443.22	-46.93	-13.00	-33.93	2.00 V	11	55.77	-102.70
4	624.61	-48.59	-13.00	-35.59	2.39 V	278	49.53	-98.12
5	822.49	-48.64	-13.00	-35.64	2.25 V	152	45.77	-94.41
6	923.37	-47.18	-13.00	-34.18	1.42 V	320	45.89	-93.07

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. $Margin\ value = EIRP - Limit\ value$
4. The other EIRP levels were very low against the limit.



Above 1GHz

RF Mode	TX PCS 1900	Channel	CH 512 : 1850.2 MHz
Frequency Range	1GMHz ~ 20GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3700.40	-50.07	-13.00	-37.07	2.00 H	181	65.69	-115.76
Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3700.40	-50.58	-13.00	-37.58	1.50 V	145	65.18	-115.76

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. Margin value = EIRP – Limit value
4. The other EIRP levels were very low against the limit.

RF Mode	TX WCDMA Band II	Channel	CH 9538 : 1907.6 MHz
Frequency Range	1GMHz ~ 20GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3715.20	-57.18	-13.00	-44.18	3.26 H	141	58.53	-115.71
Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3815.20	-56.53	-13.00	-43.53	2.14 V	223	58.88	-115.41

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. Margin value = EIRP – Limit value
4. The other EIRP levels were very low against the limit.

RF Mode	TX LTE Band XXV-15MHz	Channel	CH 26615 : 1907.5 MHz
Frequency Range	1GMHz ~ 20GHz		

Antenna Polarity & Test Distance : Horizontal at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3815.00	-57.97	-13.00	-44.97	1.68 H	265	57.44	-115.41
Antenna Polarity & Test Distance : Vertical at 3 m								
No	Frequency (MHz)	EIRP (dBm)	Limit (dBm)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	3815.00	-57.34	-13.00	-44.34	3.16 V	214	58.07	-115.41

Remarks:

1. $EIRP(dBm) = Raw\ Value(dBuV) + Correction\ Factor(dB/m)$
2. $Correction\ Factor(dB/m) = Antenna\ Factor(dB/m) + Cable\ Factor(dB) - Pre-Amplifier\ Factor(dB) + 20\log(D) - 104.8$
3. Margin value = EIRP – Limit value
4. The other EIRP levels were very low against the limit.

5 Pictures of Test Arrangements

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

Appendix – Information of 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 FCC recognized accredited test firms and accredited according to ISO/IEC 17025.

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Web Site: www.bureauveritas-adt.com

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

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