

FCC TEST REPORT

(PART 27)

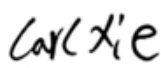
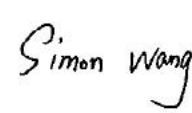
Applicant:	KYOCERA Corporation
Address:	Yokohama Office 2-1-1 Kagahara, Tsuzuki-ku Yokohama-shi, Kanagawa, Japan

Manufacturer or Supplier:	KYOCERA Corporation
Address:	Yokohama Office 2-1-1 Kagahara, Tsuzuki-ku Yokohama-shi, Kanagawa, Japan
Product:	Mobile Phone
Brand Name:	KYOCERA
Model Name:	EB1236
FCC ID	JOYEB1236
Date of tests	May. 13, 2026 - Jul. 02, 2026

The tests have been carried out according to the requirements of the following standard:

☒ FCC Part 27	☒ ANSI/TIA/EIA-603-E
☒ ANSI/TIA/EIA-603-D	☒ ANSI C63.26-2015
☒ FCC Part 2	

CONCLUSION: The submitted sample was found to COMPLY with the test requirement

Prepared by Carl Xie Engineer / Mobile Department	Approved by Simon Wang Manager / Mobile Department
	
Date: Jul. 02, 2026	Date: Jul. 02, 2026

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. Measurement uncertainty is only provided upon request for accredited tests. Statements of conformity are based on simple acceptance criteria without taking measurement uncertainty into account, unless otherwise requested in writing. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence or if you require measurement uncertainty; 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.

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RELEASE CONTROL RECORD

ISSUE NO.	REASON FOR CHANGE	DATE ISSUED
RF260626B003	Original release	Jul. 02, 2026

1. SUMMARY OF TEST RESULTS

The EUT has been tested according to the following specifications:

APPLIED STANDARD: FCC PART 27 & PART 2			
STANDARD SECTION	TEST TYPE AND LIMIT	RESULT	TEST LAB*
§2.1046	Conducted Output Power	Compliance	A
§27.50(c)(10) §27.50(b)(10)	Effective Radiated Power (Band 12)	Compliance	A
§27.50(d)(4) §27.50(h)(2)	Equivalent Isotropically Radiated Power (WCMDA Band 4)	Compliance	A
§2.1055 §27.54	Frequency Stability	Compliance	A
§2.1049	Occupied Bandwidth	Compliance	A
§2.1051 §27.53(c)(2) §27.53(g) §27.53(h) §27.53(m)(4)	Conducted Band Edge Measurements (WCMDA Band 4) (Band 12)	Compliance	A
§2.1051 §27.53(g) §27.53(c)(2) §27.53(f) §27.53(h) §27.53(m)(4)	Conducted Spurious Emissions (WCMDA Band 4)(Band 12)	Compliance	A
§2.1053 §27.53(c)(2) §27.53(f) §27.53(g) §27.53(h) §27.53(m)(4)	Radiated Spurious Emissions (WCMDA Band 4)(Band 12)	Compliance	A
§27.50	Peak to average ratio*	Compliance	A

* Refer to KDB 971168 D01 Power Meas License Digital Systems v03r01.



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***Test Lab Information Reference**

Lab A:

BOOMWAVE TEST (SHENZHEN) CO., LTD.

Lab Address:

Room B38, Warehouse A5(Chiwan No.1), No.3 Chiwan 4th Road, Chiwan Community, Zhaoshang Street,
Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Accredited Test Lab Cert 7607.01

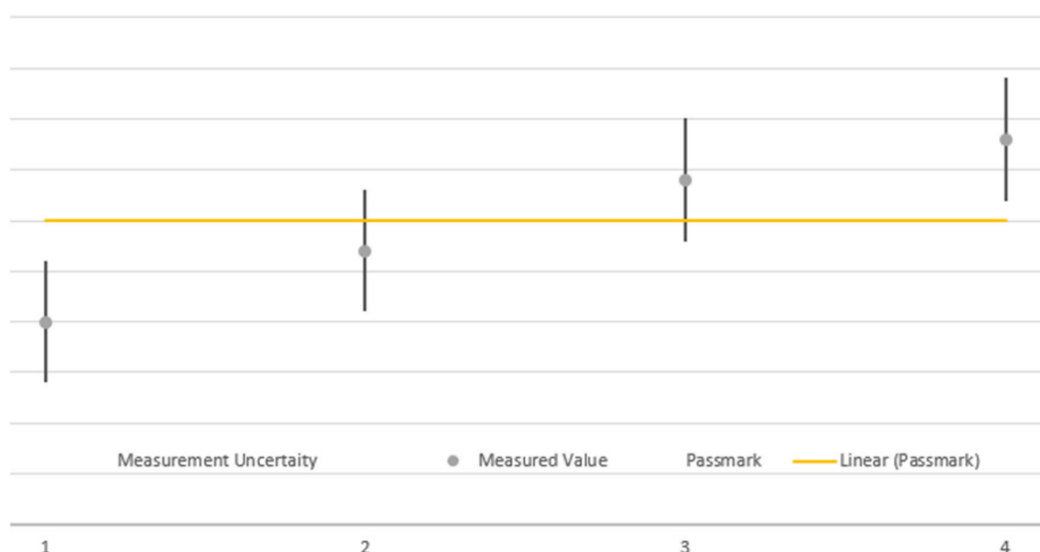
The FCC Site Registration No. is 646781; The Designation No. is CN1429.

1.1 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	UNCERTAINTY
Frequency Stability	±76.97Hz
Radiated emissions (9KHz~30MHz)	±2.68dB
Radiated emissions & Radiated Power (30MHz~1GHz)	±4.98dB
Radiated emissions & Radiated Power (1GHz ~6GHz)	±4.70dB
Radiated emissions (6GHz ~18GHz)	±4.60dB
Radiated emissions (18GHz ~40GHz)	±4.12dB
Conducted emissions	±4.01dB
Occupied Channel Bandwidth	±43.58KHz
Conducted Output power	±2.06dB
Band Edge Measurements	±4.70dB

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



The verdicts in this test report are given according the above diagram:

Case	Measured Value	Uncertainty Range	Verdict
1	below pass mark	below pass mark	Passed
2	below pass mark	within pass mark	Passed
3	above pass mark	within pass mark	Failed
4	above pass mark	above pass mark	Failed

That means, the laboratory applies, as decision rule (see ISO/IEC 17025:2017), the so-called shared risk principle.

1.2 TEST SITE AND INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
3m Semi-anechoic Chamber	ETS-LINDGREN	9m*6m*6m	Euroshieldpn-CT0001143-1216	2025/7/3	2027/7/2
BiConiLog Antenna	ETS-LINDGREN	3143B	161965	2025/7/17	2027/7/16
Horn Antenna	SCHWARZBECK	BBHA9120D	3297	2025/9/27	2027/9/26
Horn Antenna	STEATITE	QWH-SL-18-40-K-SG QMS-00361	15433	2025/7/19	2027/7/18
Preamplifier	Tonscend	TPA184045	AP24L8060388	2025/7/3	2027/7/2
MXE EMI Receiver	keysight	N9038B	MY50018017	2025/7/1	2027/6/30
MXG Vector Signal Generator	Keysight	N5183B	MY59100137	2025/6/30	2027/6/29
Preamplifier	Tonscend	TPA001330	806JSAPO40804251015	2025/6/30	2027/6/29
Preamplifier	Tonscend	TPA011845	AP24L8060392	2025/6/30	2027/6/29
Attenuator 6DB	SHX	TS2-6-6-A	230927166	2025/6/30	2027/6/29
Attenuator 6DB	SHX	TS2-6-6-A	230927165	2025/6/30	2027/6/29
Active Receive Loop Antenna	SCHWARZBECK	FMZB 1519 B	00173	2025/6/30	2027/6/29
Temp. & Humi. Recorder	Kejian	HTC-01	157246	2025/7/2	2027/7/1
HIGH pass FILTER_1-18	EWT	EWT-57-0222	EWT-57-0222	2025/6/30	2027/6/29
HIGH pass FILTER_7-18	EWT	EWT-57-0223	EWT-57-0223	2025/6/30	2027/6/29
HIGH pass FILTER_3-18	EWT	EWT-57-0221	EWT-57-0221	2025/6/30	2027/6/29
DC~1GHz Lowpass Filter	EWT	EWT-56-0649	EWT-56-0649	2025/7/3	2027/7/2
Cable 1	N/A	N/A	N/A	2025/9/28	2027/9/27
Cable 2	N/A	N/A	N/A	2025/9/28	2027/9/27
Cable 3	N/A	N/A	N/A	2025/9/28	2027/9/27
Wireless communication integrated tester	Rohde&Schwarz	CMW500	182016	2025/6/30	2027/6/29
EXA Signal Analyzer	KEYSIGHT	N9010B	MY62170156	2025/6/30	2027/6/29
RF Control Unit	Tonscend	JS0806-1	21K8060504	2025/6/16	2027/6/15
DC Power Supply	AGILENT	HMP2020	100598	2025/7/1	2027/6/30
10dB attenuator	JFW INDUSTRIES INC	50HF-010-SMA	50HF-010-SMA-1	2025/6/30	2027/6/29
10dB attenuator	JFW INDUSTRIES INC	50HF-010-SMA	50HF-010-SMA-2	2025/6/30	2027/6/29
hygrothermograph	Anymetrers	----	TH101B	2025/7/22	2027/7/21
Temperature Box	zhongkemeiqi	MA22040172	MQ-DTH50F-2	2025/7/1	2027/6/30
power divider	WOKEN	71688	204-003180-01	2025/6/30	2027/6/29



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NOTE:

1. The calibration interval of the above test instruments is 24 months and the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.
2. The test was performed in 3m Semi-anechoic Chamber and RF Oven Room.
3. The horn antenna is used only for the measurement of emission frequency above 1GHz if tested.
4. The FCC Site Registration No. is 646781; The Designation No. is CN1429.

2. GENERAL INFORMATION

2.1 GENERAL DESCRIPTION OF EUT

PRODUCT	Mobile Phone	
BRAND NAME	KYOCERA	
MODEL NAME	EB1236	
NOMINAL VOLTAGE	3.89Vdc	
MODULATION TECHNOLOGY	WCDMA IV	QPSK,16QAM
	LTE	QPSK,16QAM, 64QAM
FREQUENCY RANGE	WCDMA IV	1712.4MHz ~ 1752.6MHz
	LTE Band 12 Channel Bandwidth: 1.4MHz	699.7MHz ~ 715.3MHz
	LTE Band 12 Channel Bandwidth: 3MHz	700.5MHz ~ 714.5MHz
	LTE Band 12 Channel Bandwidth: 5MHz	701.5MHz ~ 713.5MHz
	LTE Band 12 Channel Bandwidth: 10MHz	704MHz ~ 711MHz
MAX. EIRP/ERP POWER	WCDMA IV	187.93mW
	LTE Band 12 Channel Bandwidth: 1.4MHz	75.68mW
	LTE Band 12 Channel Bandwidth: 3MHz	76.91mW
	LTE Band 12 Channel Bandwidth: 5MHz	76.56mW
	LTE Band 12 Channel Bandwidth: 10MHz	77.62mW
EMISSION DESIGNATOR	WCDMA IV	4M15F9W
	LTE Band 12 Channel Bandwidth: 1.4MHz	QPSK: 1M10G7D
		16QAM: 1M10W7D
		64QAM: 1M11W7D
	LTE Band 12 Channel Bandwidth: 3MHz	QPSK: 2M71G7D
		16QAM: 2M71W7D
		64QAM: 2M71W7D
	LTE Band 12 Channel Bandwidth: 5MHz	QPSK: 4M52G7D
		16QAM: 4M53W7D
		64QAM: 4M53W7D

	LTE Band 12 Channel Bandwidth: 10MHz	QPSK: 9M04G7D
		16QAM: 9M04W7D
		64QAM: 9M02W7D
ANTENNA GAIN	☒ Provided by client	
	WCDMA IV	-1dBi
	LTE BAND12	-2.6dBi
ANTENNA TYPE	Monopole	
HW VERSION	DMT2	
SW VERSION	V0.252EX.0052.a	
I/O PORTS	Refer to user's manual	
CABLE SUPPLIED	N/A	
EXTREME TEMPERATURE	-20°C-60°C	
EXTREME VOLTAGE	3.501V – 4.279V	

NOTE:

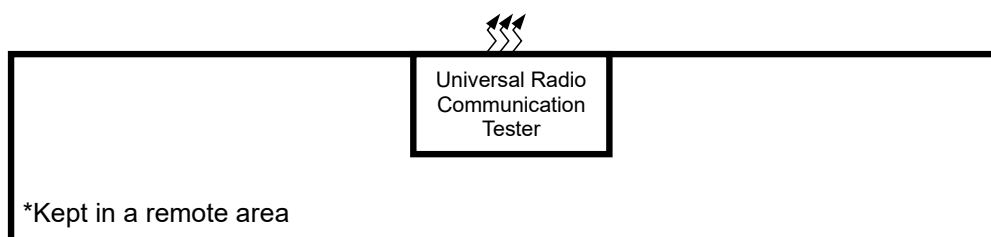
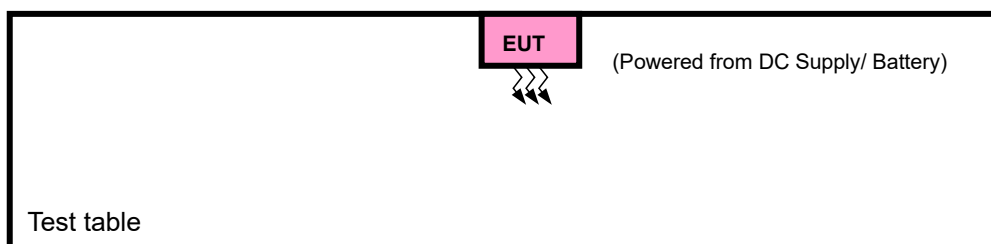
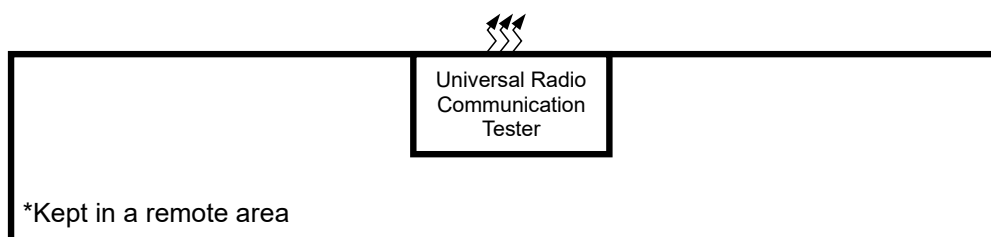
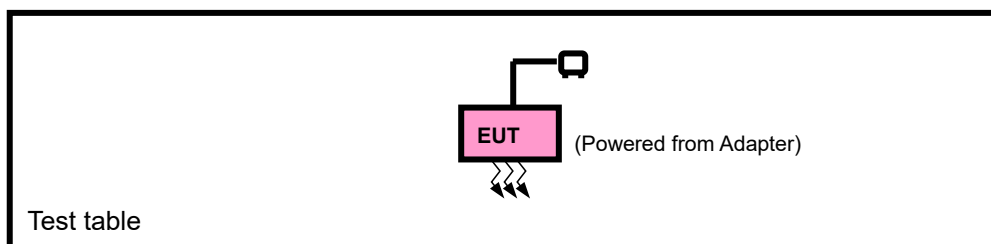
- For a more detailed features description, please refer to the manufacturer's specifications or the user's manual.
- The EUT incorporates a SISO function. Physically, the EUT provides one completed transmitter and two receivers.

MODULATION MODE	TX FUNCTION
WCDMA	1TX/2RX
LTE	1TX/2RX

- For the test results, the EUT had been tested with all conditions. But only the worst case was shown in the test report.
- According to the Statement of differences provided by the applicant, the procurement of memory from multiple suppliers. EB1236 source MCP(ROM and RAM) from two different vendors each and use them interchangeably. MCP is procured from Micron and Samsung.
MCP(ROM and RAM)
Micron: MT30AZZZCD94TKXL-023 W.237
Samsung: KM9YC001XM-B627

2.2 CONFIGURATION OF SYSTEM UNDER TEST

FOR RADIATION EMISSION TEST



2.3 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.

NO.	PRODUCT	BRAND	MODEL NO.	SERIAL NO.	FCC ID
1	Laptop	Lenovo	ThinkPad E14	HRSW00024	N/A
2	Adapter	Juniper	MK-P301EXC	N/A	N/A
3	Earphone	Xiaomi	N/A	N/A	N/A

NO.	SIGNAL CABLE DESCRIPTION OF THE ABOVE SUPPORT UNITS
1	USB Line: Shielded, Detachable 1m;

2.4 TEST ITEM AND TEST CONFIGURATION

Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates, XYZ axis and antenna ports. The worst case was found when positioned on Y-plane for EIRP and X-axis for radiated emission. Following channel(s) was (were) selected for the final test as listed below:

EUT CONFIGURE MODE	DESCRIPTION
A	EUT + Adapter with WCDMA or LTE link
B	EUT + DC Supply with WCDMA or LTE link

WCDMA MODE				
EUT CONFIGURE MODE	TEST ITEM	AVAILABLE CHANNEL	TESTED CHANNEL	MODE
A	EIRP	1312 to 1513	1312, 1413, 1513	WCDMA
B	FREQUENCY STABILITY	1312 to 1513	1312, 1413, 1513	WCDMA
A	OCCUPIED BANDWIDTH	1312 to 1513	1312, 1413, 1513	WCDMA
A	BAND EDGE	1312 to 1513	1312, 1513	WCDMA
A	PEAK TO AVERAGE RATIO	1312 to 1513	1312, 1413, 1513	WCDMA
A	CONDUCTED EMISSION	1312 to 1513	1312, 1413, 1513	WCDMA
A	RADIATED EMISSION	1312 to 1513	1312, 1413, 1513	WCDMA

LTE BAND 12 MODE						
EUT CONFIGURE MODE	TEST ITEM	AVAILABLE CHANNEL	TESTED CHANNEL	CHANNEL BANDWIDTH	MODULATION	MODE
A	ERP	23017 to 23173	23017, 23095, 23173	1.4MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset
		23025 to 23165	23025, 23095, 23165	3MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset
		23035 to 23155	23035, 23095, 23155	5MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset
		23060 to 23130	23060, 23095, 23130	10MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset
B	FREQUENCY STABILITY	23060 to 23130	23060, 23095, 23130	10MHz	QPSK	50 RB / 0 RB offset
A	OCCUPIED BANDWIDTH	23017 to 23173	23017, 23095, 23173	1.4MHz	QPSK, 16QAM, 64QAM	6 RB / 0 RB offset
		23025 to 23165	23025, 23095, 23165	3MHz	QPSK, 16QAM, 64QAM	15 RB / 0 RB offset
		23035 to 23155	23035, 23095, 23155	5MHz	QPSK, 16QAM, 64QAM	25 RB / 0 RB offset
		23060 to 23130	23060, 23095, 23130	10MHz	QPSK, 16QAM, 64QAM	50 RB / 0 RB offset
A	PEAK TO AVERAGE RATIO	23017 to 23173	23017, 23095, 23173	1.4MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 50 RB / 0 RB offset
		23025 to 23165	23025, 23095, 23165	3MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 50 RB / 0 RB offset

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		23035 to 23155	23035, 23095 ,23155	5MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 50 RB / 0 RB offset
		23060 to 23130	23060, 23095 ,23130	10MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 50 RB / 0 RB offset
A	BAND EDGE	23017 to 23173	23017	1.4MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 6 RB / 0 RB offset
			23173	1.4MHz	QPSK, 16QAM, 64QAM	1 RB / 5 RB offset 6 RB / 0 RB offset
		23025 to 23165	23025	3MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 15 RB / 0 RB offset
			23165	3MHz	QPSK, 16QAM, 64QAM	1 RB / 14 RB offset 15 RB / 0 RB offset
		23035 to 23155	23035	5MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 25 RB / 0 RB offset
			23155	5MHz	QPSK, 16QAM, 64QAM	1 RB / 24 RB offset 25 RB / 0 RB offset
		23060 to 23130	23060	10MHz	QPSK, 16QAM, 64QAM	1 RB / 0 RB offset 50 RB / 0 RB offset
			23130	10MHz	QPSK, 16QAM, 64QAM	1 RB / 49 RB offset 50 RB / 0 RB offset
A	CONDCUDETED EMISSION	23017 to 23173	23017, 23095, 23173	1.4MHz	QPSK	1 RB / 0 RB offset
		23025 to 23165	23025, 23095 ,23165	3MHz	QPSK	1 RB / 0 RB offset
		23035 to 23155	23035, 23095 ,23155	5MHz	QPSK	1 RB / 0 RB offset
		23060 to 23130	23060, 23095 ,23130	10MHz	QPSK	1 RB / 0 RB offset
A	RADIATED EMISSION	23060 to 23130	23060,23095,23130	10MHz	QPSK	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.

TEST CONDITION			
TEST ITEM	ENVIRONMENTAL CONDITIONS	INPUT POWER	TESTED BY
ERP	23deg. C, 70%RH	DC 3.89V By Battery	Carl Xie
FREQUENCY STABILITY	23deg. C, 70%RH	DC 3.89V By Battery	Alan Yu
OCCUPIED BANDWIDTH	23deg. C, 70%RH	DC 3.89V By Battery	Alan Yu
BAND EDGE	23deg. C, 70%RH	DC 3.89V By Battery	Alan Yu
CONDCUDETED EMISSION	23deg. C, 70%RH	DC 3.89V By Battery	Alan Yu
RADIATED EMISSION	23deg. C, 70%RH	DC 3.89V By Battery	Carl Xie
PEAK TO AVERAGE RATIO	23deg. C, 70%RH	DC 3.89V By Battery	Alan Yu

2.5 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 47 CFR Part 2

FCC 47 CFR Part 27

KDB 971168 D01 Power Meas License Digital Systems v03r01

ANSI/TIA/EIA-603-D

ANSI/TIA/EIA-603-E

ANSI C63.26-2015

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

3. TEST TYPES AND RESULTS

3.1 OUTPUT POWER MEASUREMENT

3.1.1 LIMITS OF OUTPUT POWER MEASUREMENT

The radiated peak output power shall be according to the specific rule Part 27.50(h)(2) that “User stations are limited to 2 watts” and 27.50(i) specific that “Peak transmit power must be measure over any interval of continuous transmission using instrumentation calibration in terms of rms-equivalent voltage.”

Fixed, mobile, and portable (hand-held) stations operating in the 1710-1755 MHz band and mobile and portable stations operating in the 1695-1710 MHz and 1755-1780 MHz bands are limited to 1-watt EIRP.

According to the specific rule Part 27.50(c)(10) Portable stations (hand-held devices) in the 600 MHz uplink band and the 698–746 MHz band, and fixed and mobile stations in the 600 MHz uplink band are limited to 3 watts ERP.

Part 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.

3.1.2 TEST PROCEDURES

EIRP MEASUREMENT:

Per KDB 971168 D01 Power Meas License Digital Systems v03r01 or subclause 5.2.5.5 of ANSI C63.26-2015, the relevant equation for determining the ERP or EIRP from the conducted RF output power measured using the guidance provided above is:

$$\text{ERP or EIRP} = P_{\text{Meas}} + G_T - L_C$$

Where:

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

(expressed in the same units as P_{Meas} , typically dBW or dBm);

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

G_T = gain of the transmitting antenna, in dBd (ERP) or dBi (EIRP);

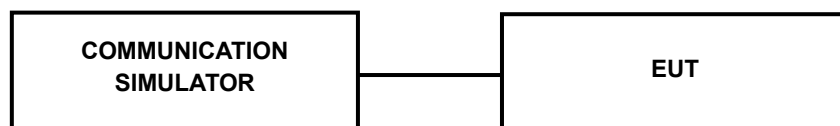
L_C = signal attenuation in the connecting cable between the transmitter and antenna, in dB.

CONDUCTED POWER MEASUREMENT:

- The EUT was set up for the maximum power with 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.

3.1.3 TEST SETUP

CONDUCTED POWER MEASUREMENT:



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

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3.1.4 TEST RESULTS

CONDUCTED OUTPUT POWER (dBm)

Band	WCDMA IV		
TX Channel	1312	1413	1513
Rx Channel	1537	1638	1738
Frequency (MHz)	1712.4	1732.6	1752.6
RMC 12.2K	23.74	23.54	23.45
HSDPA Subtest-1	22.96	22.82	22.74
HSDPA Subtest-2	22.45	22.29	22.23
HSDPA Subtest-3	22.47	22.34	22.27
HSDPA Subtest-4	22.75	22.73	22.76
HSUPA Subtest-1	22.77	22.50	22.49
HSUPA Subtest-2	20.92	20.74	20.62
HSUPA Subtest-3	21.77	21.64	21.50
HSUPA Subtest-4	20.45	20.30	20.30
HSUPA Subtest-5	21.80	21.58	21.56

LTE Band 12						
BW [MHz]	Modulation	RB Size	RB Offset	Low	Mid	High
		Channel		23060	23095	23130
		Frequency (MHz)		704	707.5	711
10	QPSK	1	0	23.38	23.57	23.48
		1	24	23.65	23.58	23.64
		1	49	23.51	23.53	23.55
		25	0	22.41	22.53	22.56
		25	12	22.68	22.65	22.66
		25	25	22.47	22.58	22.62
		50	0	22.73	22.60	22.48
	16QAM	1	0	22.54	22.66	22.80
		1	24	22.71	22.73	22.76
		1	49	22.59	22.69	22.78
		25	0	21.54	21.56	21.57
		25	12	21.58	21.64	21.71
		25	25	21.51	21.59	21.72
		50	0	21.53	21.62	21.61
	64QAM	1	0	21.67	21.74	21.84
		1	24	21.86	21.78	21.83
		1	49	21.76	21.76	21.82
		25	0	20.47	20.54	20.60
		25	12	20.57	20.63	20.76
		25	25	20.52	20.65	20.63
		50	0	20.65	20.59	20.57
BW [MHz]	Modulation	Channel		23035	23095	23155
		Frequency (MHz)		701.5	707.5	713.5
5	QPSK	1	0	23.27	23.56	23.35
		1	12	23.59	23.50	23.58
		1	24	23.49	23.45	23.49
		12	0	22.37	22.45	22.50
		12	6	22.51	22.57	22.53
		12	13	22.43	22.55	22.58
		25	0	22.60	22.52	22.46
	16QAM	1	0	22.45	22.61	22.72
		1	12	22.70	22.59	22.68
		1	24	22.57	22.66	22.76
		12	0	21.46	21.42	21.55
		12	6	21.56	21.59	21.67
		12	13	21.45	21.54	21.69
		25	0	21.50	21.57	21.57
	64QAM	1	0	21.65	21.68	21.75
		1	12	21.78	21.76	21.76

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		1	24	21.64	21.63	21.68
		12	0	20.43	20.47	20.50
		12	6	20.54	20.53	20.71
		12	13	20.47	20.56	20.52
		25	0	20.62	20.51	20.51
BW [MHz]	Modulation	Channel		23025	23095	23165
		Frequency (MHz)		700.5	707.5	714.5
3	QPSK	1	0	23.34	23.52	23.34
		1	7	23.61	23.51	23.56
		1	14	23.46	23.44	23.48
		8	0	22.28	22.47	22.48
		8	3	22.47	22.61	22.54
		8	7	22.39	22.54	22.53
		15	0	22.68	22.47	22.36
	16QAM	1	0	22.39	22.57	22.67
		1	7	22.68	22.71	22.74
		1	14	22.49	22.55	22.72
		8	0	21.51	21.50	21.50
		8	3	21.56	21.53	21.56
		8	7	21.44	21.47	21.65
		15	0	21.44	21.50	21.60
	64QAM	1	0	21.66	21.69	21.70
		1	7	21.76	21.68	21.71
		1	14	21.71	21.75	21.79
		8	0	20.34	20.39	20.49
		8	3	20.54	20.50	20.61
		8	7	20.41	20.50	20.60
		15	0	20.57	20.55	20.49
BW [MHz]	Modulation	Channel		23017	23095	23173
		Frequency (MHz)		699.7	707.5	715.3
1.4	QPSK	1	0	23.36	23.47	23.39
		1	2	23.54	23.50	23.50
		1	5	23.44	23.41	23.44
		3	0	23.21	23.29	23.26
		3	1	23.33	23.34	23.42
		3	3	23.16	23.39	23.42
		6	0	22.64	22.58	22.47
	16QAM	1	0	22.48	22.51	22.75
		1	2	22.66	22.71	22.72
		1	5	22.46	22.64	22.64
		3	0	22.31	22.30	22.24
		3	1	22.27	22.37	22.41
		3	3	22.22	22.29	22.49

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		6	0	21.50	21.53	21.52
	64QAM	1	0	21.59	21.61	21.82
		1	2	21.79	21.63	21.76
		1	5	21.66	21.61	21.70
		3	0	21.17	21.24	21.31
		3	1	21.30	21.34	21.52
		3	3	21.26	21.32	21.42
		6	0	20.63	20.47	20.51

EIRP

WCDMA IV_Ant0						
Channel	Frequency (MHz)	Conducted Power (dBm)	Gain (dB)	EIRP (dBm)	EIRP (mW)	Limit (W)
1312	1712.4	23.74	-1	22.74	187.93	2
1413	1732.6	23.54	-1	22.54	179.47	2
1513	1752.6	23.45	-1	22.45	175.79	2

LTE Band 12_Ant 0							
BW [MHz] Modulation	Channel	Frequency (MHz)	Conducted Power (dBm)	Gain (dB)	ERP (dBm)	ERP (mW)	Limit (W)
10M-QPSK	23060	704	23.65	-2.6	18.90	77.62	3
	23095	707.5	23.58	-2.6	18.83	76.38	3
	23130	711	23.64	-2.6	18.89	77.45	3
10M-16QAM	23060	704	22.71	-2.6	17.96	62.52	3
	23095	707.5	22.73	-2.6	17.98	62.81	3
	23130	711	22.80	-2.6	18.05	63.83	3
10M-64QAM	23060	704	21.86	-2.6	17.11	51.40	3
	23095	707.5	21.78	-2.6	17.03	50.47	3
	23130	711	21.84	-2.6	17.09	51.17	3
BW [MHz] Modulation	Channel	Frequency (MHz)	Conducted Power (dBm)	Gain (dB)	ERP (dBm)	ERP (mW)	Limit (W)
5M-QPSK	23035	701.5	23.59	-2.6	18.84	76.56	3
	23095	707.5	23.56	-2.6	18.81	76.03	3
	23155	713.5	23.58	-2.6	18.83	76.38	3
5M-16QAM	23035	701.5	22.70	-2.6	17.95	62.37	3
	23095	707.5	22.66	-2.6	17.91	61.80	3
	23155	713.5	22.76	-2.6	18.01	63.24	3
5M-64QAM	23035	701.5	21.78	-2.6	17.03	50.47	3
	23095	707.5	21.76	-2.6	17.01	50.23	3
	23155	713.5	21.76	-2.6	17.01	50.23	3
BW [MHz] Modulation	Channel	Frequency (MHz)	Conducted Power (dBm)	Gain (dB)	ERP (dBm)	ERP (mW)	Limit (W)
3M-QPSK	23025	700.5	23.61	-2.6	18.86	76.91	3
	23095	707.5	23.52	-2.6	18.77	75.34	3
	23165	714.5	23.56	-2.6	18.81	76.03	3

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3M-16QAM	23025	700.5	22.68	-2.6	17.93	62.09	3
	23095	707.5	22.71	-2.6	17.96	62.52	3
	23165	714.5	22.74	-2.6	17.99	62.95	3
3M-64QAM	23025	700.5	21.76	-2.6	17.01	50.23	3
	23095	707.5	21.75	-2.6	17.00	50.12	3
	23165	714.5	21.79	-2.6	17.04	50.58	3
BW [MHz] Modulation	Channel	Frequency (MHz)	Conducted Power (dBm)	Gain (dB)	ERP (dBm)	ERP (mW)	Limit (W)
1.4M-QPSK	23017	699.7	23.54	-2.6	18.79	75.68	3
	23095	707.5	23.50	-2.6	18.75	74.99	3
	23173	715.3	23.50	-2.6	18.75	74.99	3
1.4M- 16QAM	23017	699.7	22.66	-2.6	17.91	61.80	3
	23095	707.5	22.71	-2.6	17.96	62.52	3
	23173	715.3	22.75	-2.6	18.00	63.10	3
1.4M- 64QAM	23017	699.7	21.79	-2.6	17.04	50.58	3
	23095	707.5	21.63	-2.6	16.88	48.75	3
	23173	715.3	21.82	-2.6	17.07	50.93	3

REMARKS: ERP Output Power (dBm) = EIRP (dBm) -2.15(dB).

3.2 FREQUENCY STABILITY MEASUREMENT

3.2.1 LIMITS OF FREQUENCY STABILITY MEASUREMENT

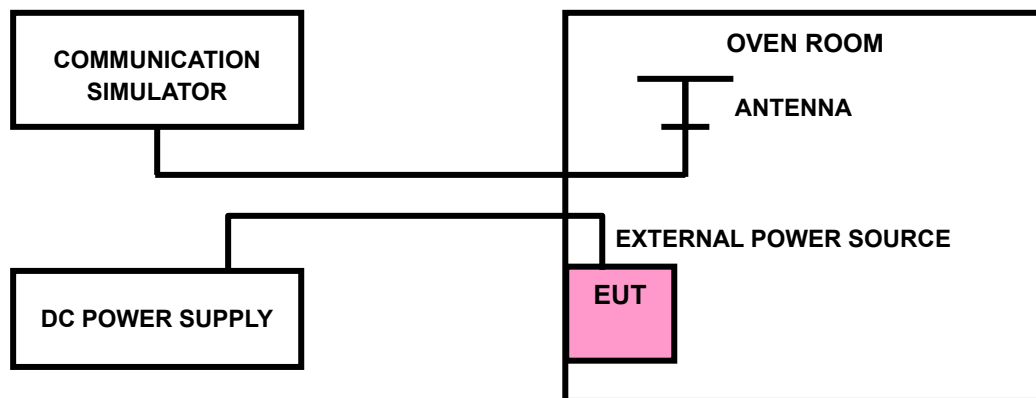
The frequency stability shall be sufficient to ensure that the fundamental emissions stay within the authorized bands of operation.

3.2.2 TEST PROCEDURE

- Device is placed at the oven room. The oven room could control the temperatures and humidity. Power warm up is at least 15 min and power applied should perform before recording frequency error.
- EUT is connected the external power supply to control the DC input power. The test voltage range is from minimum to maximum working voltage. Each step shall be record the frequency error rate.
- The temperature range step is 10 degrees in this test items. All temperature levels shall be hold the $\pm 0.5^{\circ}\text{C}$ during the measurement testing. The each temperature step shall be at least 0.5 hours, consider the EUT could be test under the stability condition.

NOTE: The frequency error was recorded frequency error from the communication simulator.

3.3.3 TEST SETUP





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3.2.3 TEST RESULTS

Please Refer to Appendix of this test report.

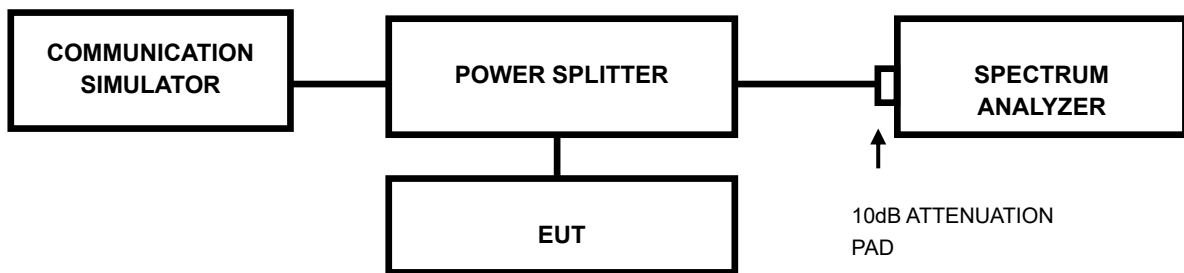
Note: VL = Low voltage(3.501V); VN/NV = Normal voltage(3.89V); VH = High voltage(4.279V); NT = Normal temperature (25°C)

3.3 OCCUPIED BANDWIDTH MEASUREMENT

3.3.1 LIMITS OF OCCUPIED BANDWIDTH MEASUREMENT

The width of a frequency band such that, below the lower and above the upper frequency limits, the mean powers emitted are each equal to a specified percentage 0.5 %of the total mean power of a given emission.

3.3.2 TEST SETUP



3.3.3 TEST PROCEDURES

- The conducted occupied bandwidth used the power splitter via EUT RF power connector between simulation base station and spectrum analyzer.
- Use OBW measurement function of Spectrum analyzer to measure 99 % occupied bandwidth.

3.3.4 TEST RESULTS

Please Refer to Appendix of this test report.

3.4 BAND EDGE MEASUREMENT

3.4.1 LIMITS OF BAND EDGE MEASUREMENT

According to FCC 27.53(g) specified that For operations in the 600 MHz band and the 698-746 MHz band, the power of any emission outside a 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, by at least $43 + 10 \log (P)$ dB. 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.

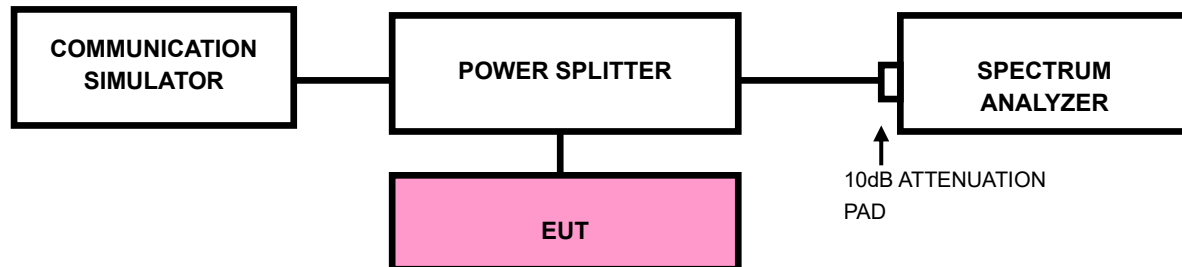
According to FCC 27.53(h) specified that For operations in the 1710-1755 MHz band, the power of any emission outside a licensee's frequency band(s) of operation shall be attenuated below the transmitter power (P) within the licensed band(s) of operation, measured in watts, by at least $43 + 10 \log (P)$ dB. 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.

According to FCC 27.53(m)(4) specified that For mobile digital stations, the attenuation factor shall be not less than $40 + 10 \log (P)$ dB on all frequencies between the channel edge and 5 megahertz from the channel edge, $43 + 10 \log (P)$ dB on all frequencies between 5 megahertz and X megahertz from the channel edge, and $55 + 10 \log (P)$ dB on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less that $43 + 10 \log (P)$ dB on all frequencies between 2490.5 MHz and 2496 MHz and $55 + 10 \log (P)$ dB at or below 2490.5 MHz. Mobile Satellite Service licensees operating on frequencies below 2495 MHz may also submit a documented interference complaint against BRS licensees operating on channel BRS Channel 1 on the same terms and conditions as adjacent channel BRS or EBS licensees. For mobile digital stations, in the 1-megahertz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least two percent may be employed.

47 CFR 27.53(c)(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;

47 CFR 27.53(f) : 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

3.4.2 TEST SETUP



3.4.3 TEST PROCEDURES

- a) All measurements were done at low and high operational frequency range
- b) Connect the transmitter to the spectrum analyzer via coaxial cable while ensuring proper impedance matching.
- c) Tune the analyzer to the nominal center frequency of the emission bandwidth

(EBW)
- d) .Set the resolution bandwidth (RBW) $\geq 1\%$ EBW in the 1MHz band immediately outside and adjacent to the band edge.
- e) Beyond the 1MHz band from the band edge, RBW=1MHz was used.
- f) Set the video bandwidth (VBW) to $\geq 3 \times$ RBW.
- g) Select the average power (RMS) display detector.
- h) Set the number of measurement points to ≥ 1001 .
- i) Use auto-coupled sweep time.
- j) Perform the measurement over an interval of time when the transmission is continuous and at its maximum power level.
- k) The RF fundamental frequency should be excluded against the limit line in the operating frequency band and use RBW is 10KHz or 100KHz.
- l) Record the max trace plot into the test report.

3.4.4 TEST RESULTS

Please Refer to Appendix of this test report.

3.5

3.5 CONDUCTED SPURIOUS EMISSIONS

3.5.1 LIMITS OF CONDUCTED SPURIOUS EMISSIONS MEASUREMENT

According to FCC 27.53(g) specified that For operations in the 600 MHz band and the 698-746 MHz band, the power of any emission outside a 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, by at least $43 + 10 \log (P)$ dB. 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.

According to FCC 27.53(h) specified that For operations in the 1710-1755 MHz band, the power of any emission outside a 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, by at least $43 + 10 \log (P)$ dB. 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.

According to FCC 27.53(m)(4) specified that For mobile digital stations, the attenuation factor shall be not less than $40 + 10 \log (P)$ dB on all frequencies between the channel edge and 5 megahertz from the channel edge, $43 + 10 \log (P)$ dB on all frequencies between 5 megahertz and X megahertz from the channel edge, and $55 + 10 \log (P)$ dB on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less than $43 + 10 \log (P)$ dB on all frequencies between 2490.5 MHz and 2496 MHz and $55 + 10 \log (P)$ dB at or below 2490.5 MHz. Mobile Satellite Service licensees operating on frequencies below 2495 MHz may also submit a documented interference complaint against BRS licensees operating on channel BRS Channel 1 on the same terms and conditions as adjacent channel BRS or EBS licensees. For mobile digital stations, in the 1-megahertz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least two percent may be employed.

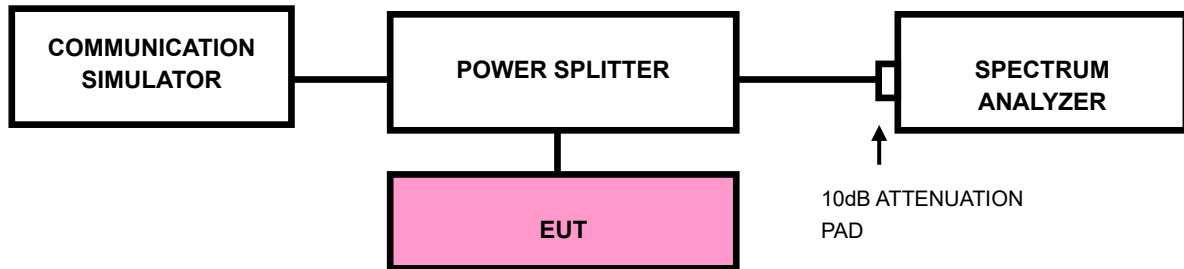
47 CFR 27.53(c)(2) : On any frequency outside the 776–788 MHz band, the power of any emission shall be attenuated outside the band below the transmitter power (P) by at least $43 + 10 \log (P)$ dB;

47 CFR 27.53(f) : 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.

3.5.2 TEST PROCEDURE

- a. The EUT makes a phone call to the communication simulator. All measurements were done at low, middle and high operational frequency range.
- b. Measuring frequency range is from 9kHz up to a frequency including its 10th harmonic. 10dB attenuation pad is connected with spectrum. RBW=1MHz and VBW=3MHz is used for conducted emission measurement.

3.5.3 TEST SETUP



3.5.4 TEST RESULTS

NOTE : The 9K~30MHz amplitude of spurious emissions attenuated more than 20 dB below the permissible value is not required in the report.

Please Refer to Appendix of this test report.

3.6 RADIATED EMISSION MEASUREMENT

3.6.1 LIMITS OF RADIATED EMISSION MEASUREMENT

According to FCC 27.53(g) specified that For operations in the 600 MHz band and the 698-746 MHz band, the power of any emission outside a 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, by at least $43 + 10 \log (P)$ dB. 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.

According to FCC 27.53(h) specified that For operations in the 1710-1755 MHz band, the power of any emission outside a 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, by at least $43 + 10 \log (P)$ dB. 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.

According to FCC 27.53(m)(4) specified that For mobile digital stations, the attenuation factor shall be not less than $40 + 10 \log (P)$ dB on all frequencies between the channel edge and 5 megahertz from the channel edge, $43 + 10 \log (P)$ dB on all frequencies between 5 megahertz and X megahertz from the channel edge, and $55 + 10 \log (P)$ dB on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less than $43 + 10 \log (P)$ dB on all frequencies between 2490.5 MHz and 2496 MHz and $55 + 10 \log (P)$ dB at or below 2490.5 MHz. Mobile Satellite Service licensees operating on frequencies below 2495 MHz may also submit a documented interference complaint against BRS licensees operating on channel BRS Channel 1 on the same terms and conditions as adjacent channel BRS or EBS licensees. For mobile digital stations, in the 1-megahertz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least two percent may be employed.

47 CFR 27.53(c)(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;

47 CFR 27.53(f) : 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.

3.6.2 TEST PROCEDURES

- a. Substitution method is used for E.I.R.P measurement. In the semi-anechoic chamber, EUT placed on the 0.8m 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 1m to 4m to find the maximum polar radiated power. The "Read Value" is the spectrum reading the maximum power value.
- b. The substitution horn antenna is substituted for EUT at the same position and signals generator export the CW signal to the substitution antenna via a TX cable. Rotated the Turn Table and moved receiving antenna to find the maximum radiation power. Adjust output power level of S.G to get a Value of spectrum reading equal to "Read Value " of step a. Record the power level of S.G.
- c. EIRP = Output power level of S.G – TX cable loss + Antenna gain of substitution horn.
- d. E.R.P power can be calculated form E.I.R.P power by subtracting the gain of dipole, $E.R.P \text{ power} = E.I.P.R \text{ power} - 2.15\text{dBi}$.

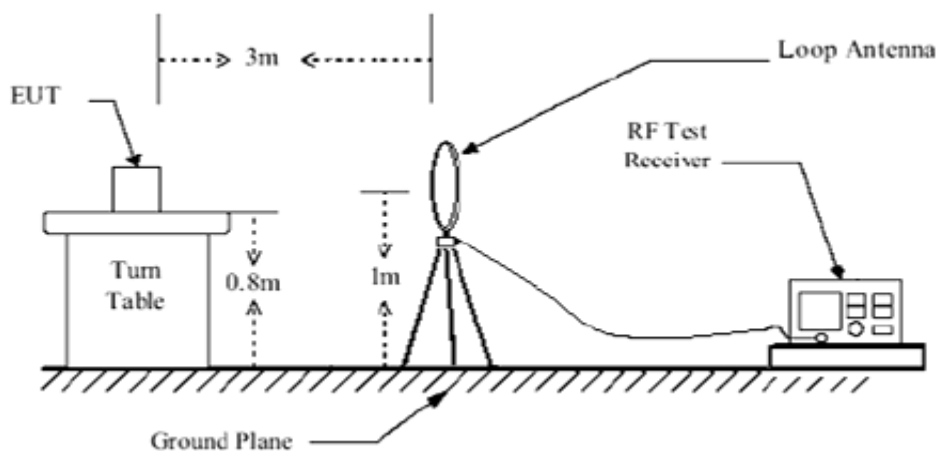
NOTE: The resolution bandwidth of spectrum analyzer is 1 MHz and the video bandwidth is 3 MHz.

3.6.3 DEVIATION FROM TEST STANDARD

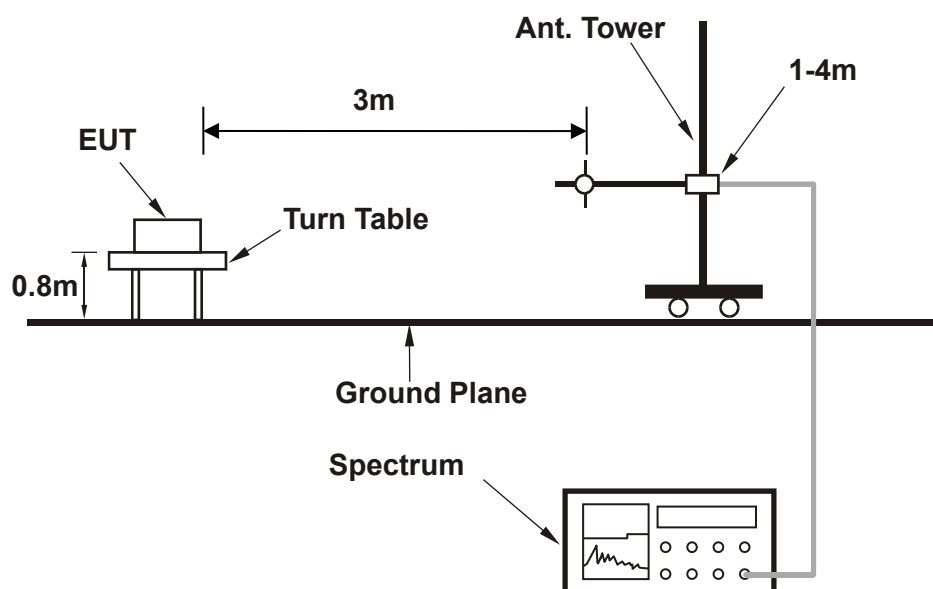
No deviation

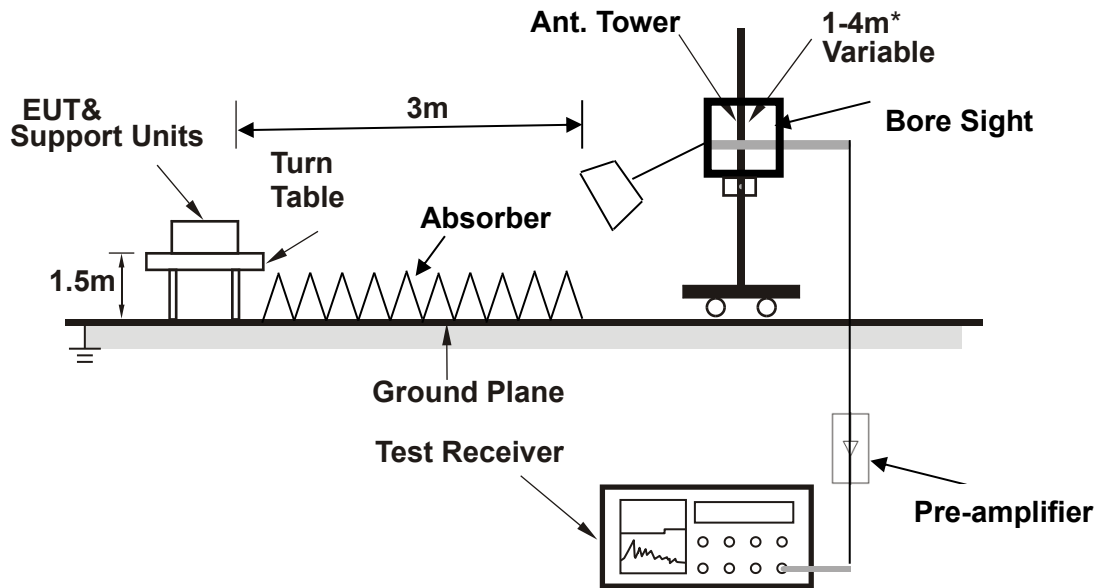
3.6.4 TEST SETUP

< Frequency Range below 30MHz >



< Frequency Range 30MHz~1GHz >





Note: Above 1G is a directional antenna depends on the EUT height and the antenna 3dB beamwidth both, refer to section 7.3 of CISPR 16-2-3.

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

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3.6.5 TEST RESULTS

NOTE : The 9K~30MHz amplitude of spurious emissions attenuated more than 20 dB below the permissible value is not required in the report.

BELOW 1GHz WORST-CASE DATA

LTE Band 12 CHANNEL BANDWIDTH: 10MHz / QPSK			
MODE	TX channel 23095	FREQUENCY RANGE	30MHz~1GHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		
ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M			

Data List									
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	30.5821	-63.25	-65.33	-2.08	-13.00	52.33	Horizon	PK	PASS
2	148.5577	-45.07	-61.89	-16.82	-13.00	48.89	Horizon	PK	PASS
3	231.2182	-63.23	-67.95	-4.72	-13.00	54.95	Horizon	PK	PASS
4	391.1062	-64.82	-67.81	-2.99	-13.00	54.81	Horizon	PK	PASS
5	595.041	-65.81	-66.96	-1.15	-13.00	53.96	Horizon	PK	PASS
6	931.3103	-67.37	-64.18	3.19	-13.00	51.18	Horizon	PK	PASS

FCC PART 27

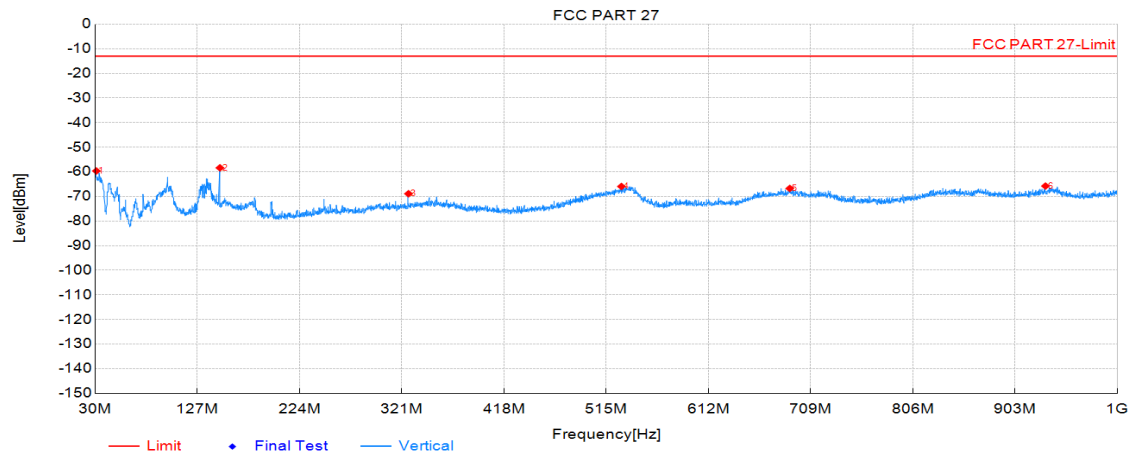
Legend: Limit (Red), Final Test (Blue), Horizontal (Green)

MODE	TX channel 23095	FREQUENCY RANGE	30MHz~1GHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

Data List

NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	31.3583	-50.43	-59.64	-9.21	-13.00	46.64	Vertical	PK	PASS
2	148.5577	-48.47	-58.37	-9.90	-13.00	45.37	Vertical	PK	PASS
3	327.4615	-60.67	-68.89	-8.22	-13.00	55.89	Vertical	PK	PASS
4	529.4559	-65.33	-65.94	-0.61	-13.00	52.94	Vertical	PK	PASS
5	689.1498	-66.59	-66.74	-0.15	-13.00	53.74	Vertical	PK	PASS
6	931.6983	-66.94	-65.78	1.16	-13.00	52.78	Vertical	PK	PASS



ABOVE 1GHz

Note: For higher frequency, the emission is too low to be detected.

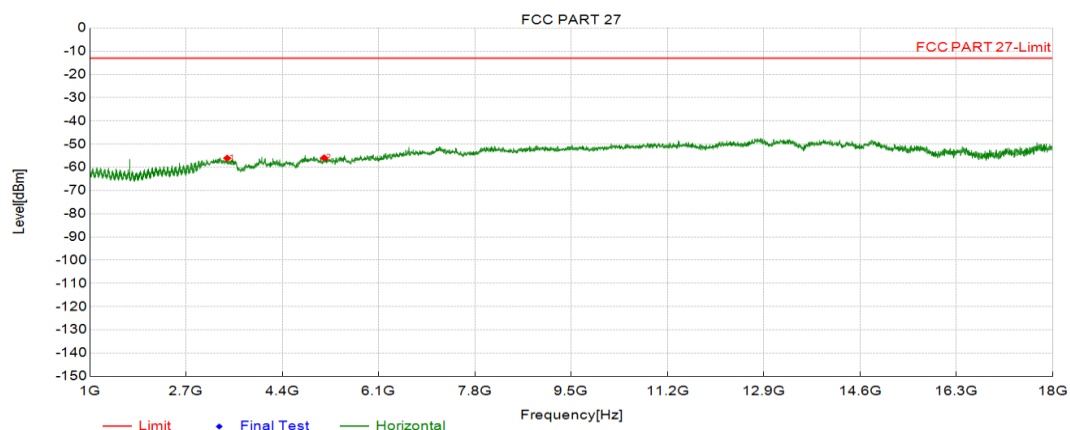
WCDMA Band IV

MODE	TX channel 1312	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

Data-List

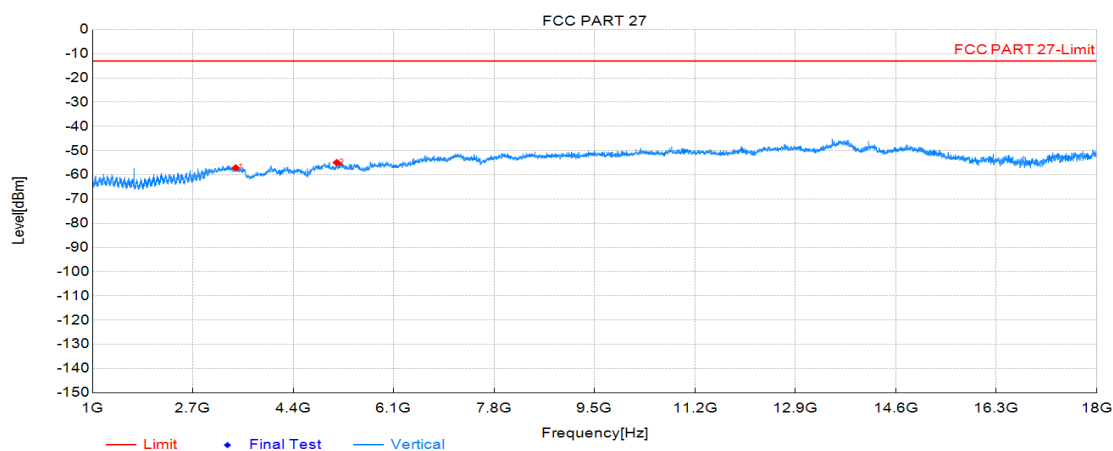
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3426.0852	-53.91	-56.06	-2.15	-13.00	43.06	Horizon	PK	PASS
2	5136.4273	-59.55	-55.94	3.61	-13.00	42.94	Horizon	PK	PASS



MODE	TX channel 1312	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M			

Data List

NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3426.0852	-54.90	-57.14	-2.24	-13.00	44.14	Vertical	PK	PASS
2	5136.4273	-58.90	-54.94	3.96	-13.00	41.94	Vertical	PK	PASS

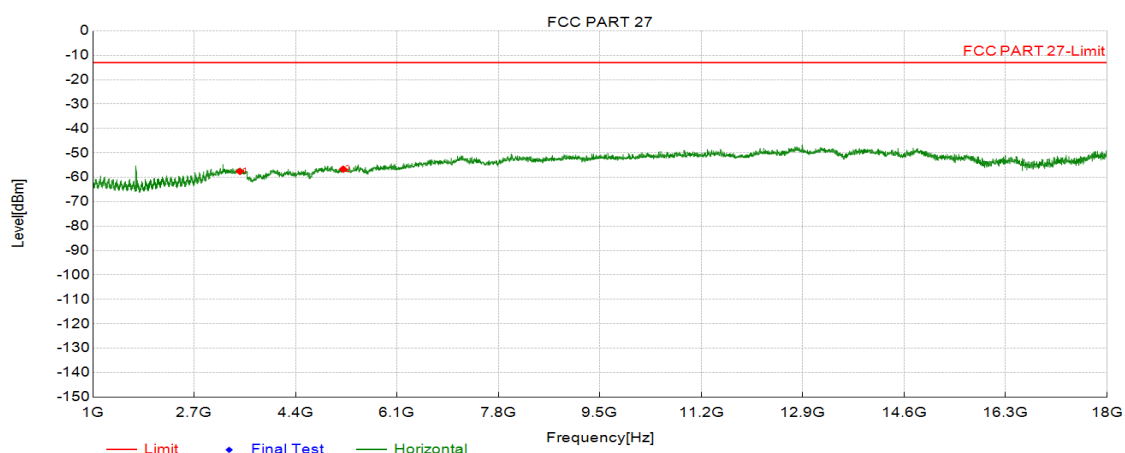


MODE	TX channel 1413	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

Data List

NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3465.093	-55.37	-57.54	-2.17	-13.00	44.54	Horizon	PK	PASS
2	5196.4393	-60.12	-56.65	3.47	-13.00	43.65	Horizon	PK	PASS

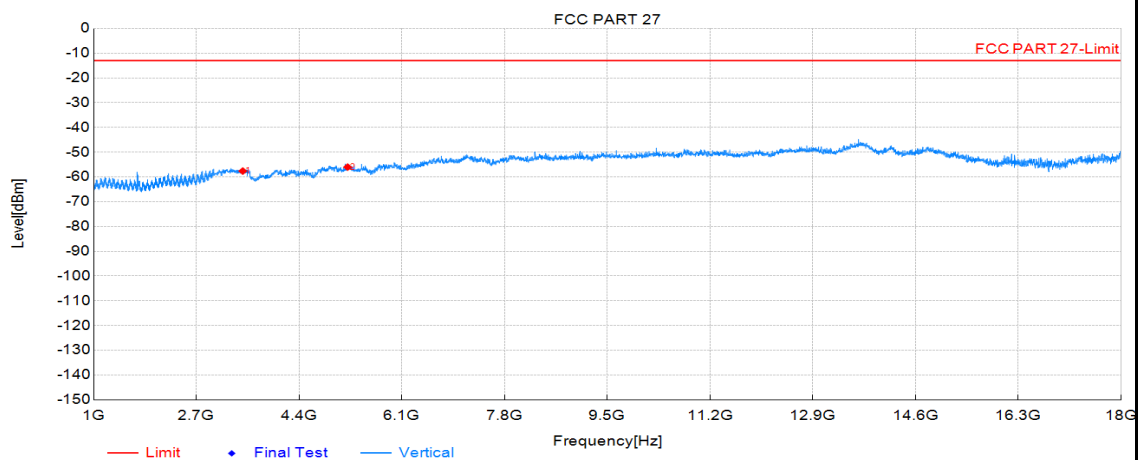


MODE	TX channel 1413	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

Data List

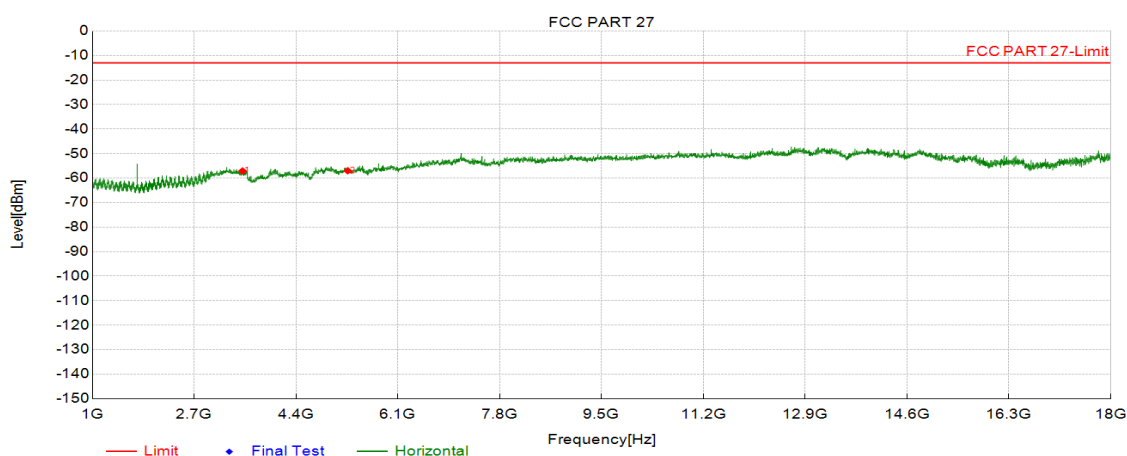
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3468.0936	-55.40	-57.62	-2.22	-13.00	44.62	Vertical	PK	PASS
2	5202.4405	-59.95	-56.00	3.95	-13.00	43.00	Vertical	PK	PASS



MODE	TX channel 1513	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		
ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M			

Data-List

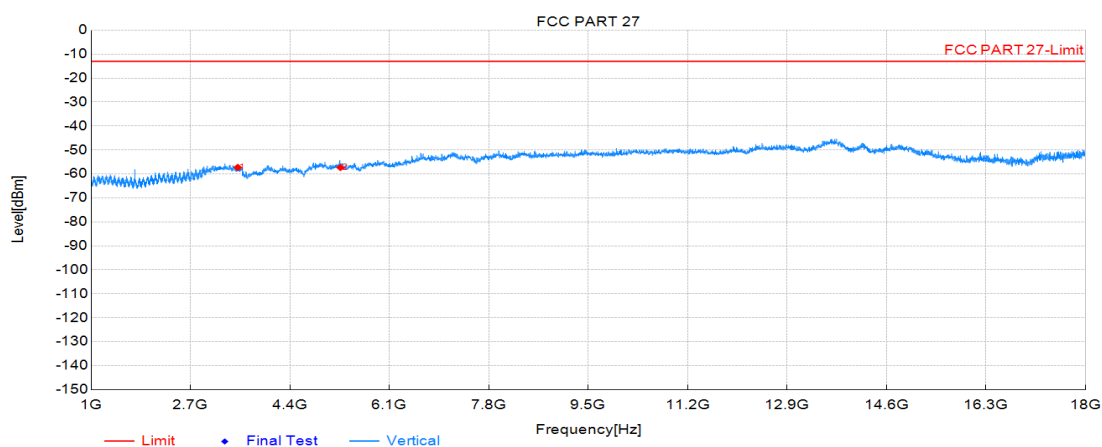
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3507.1014	-54.92	-57.11	-2.19	-13.00	44.11	Horizon	PK	PASS
2	5262.4525	-60.66	-57.00	3.66	-13.00	44.00	Horizon	PK	PASS

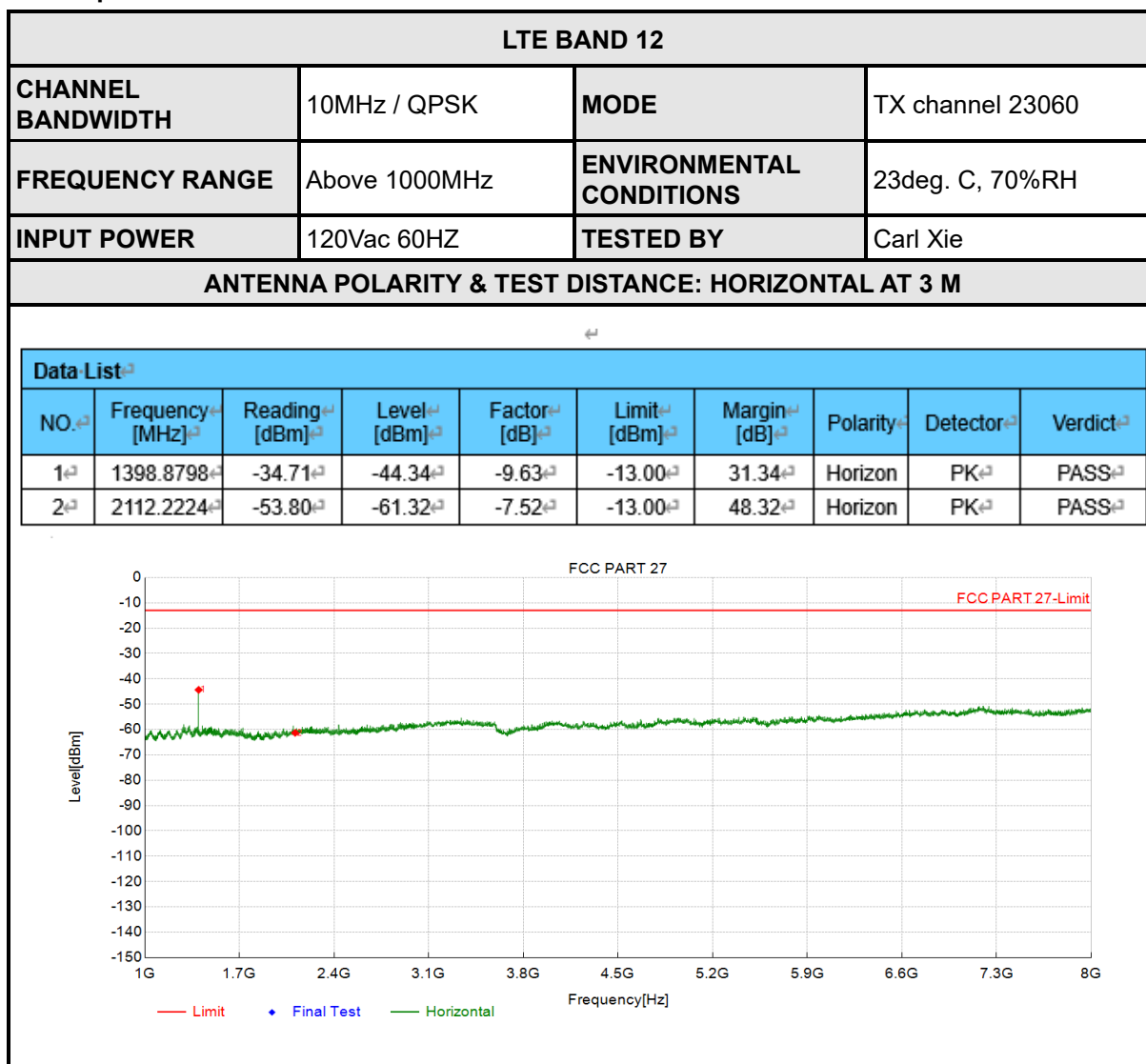


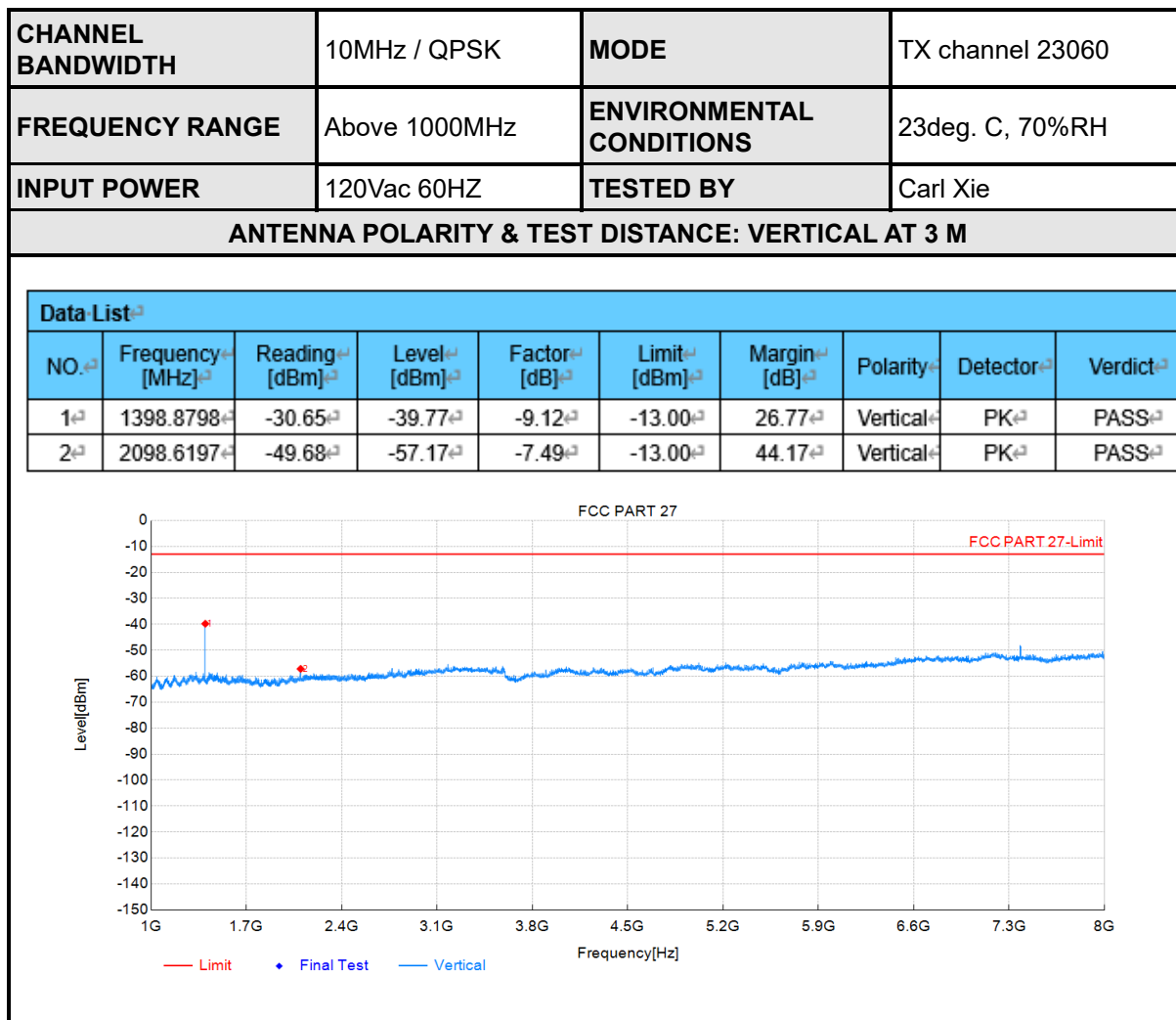
MODE	TX channel 1513	FREQUENCY RANGE	Above 1000MHz
ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH	INPUT POWER	120Vac 60HZ
TESTED BY	Carl Xie		
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M			

Data List

NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	3507.1014	-55.07	-57.28	-2.21	-13.00	44.28	Vertical	PK	PASS
2	5262.4525	-61.21	-57.29	3.92	-13.00	44.29	Vertical	PK	PASS





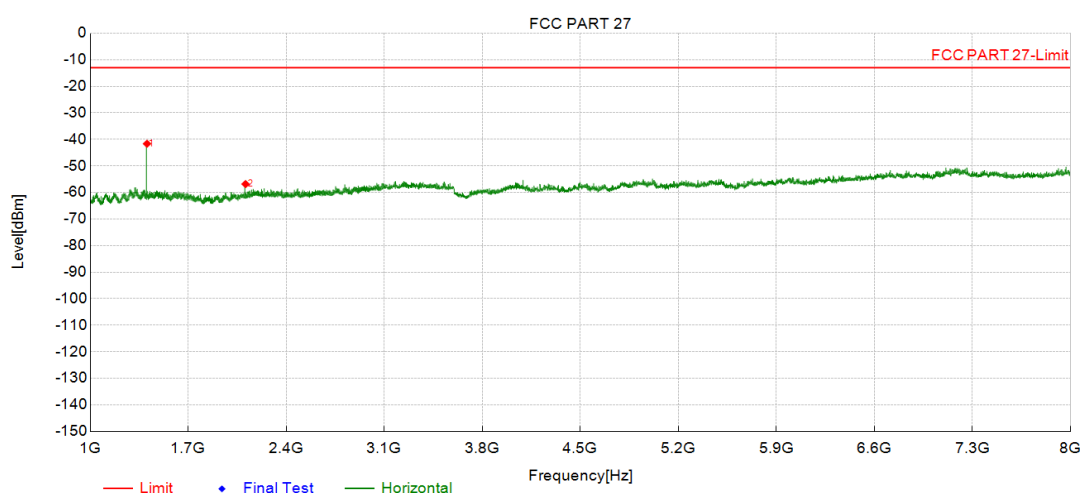


CHANNEL BANDWIDTH	10MHz / QPSK	MODE	TX channel 23095
FREQUENCY RANGE	Above 1000MHz	ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH
INPUT POWER	120Vac 60HZ	TESTED BY	Carl Xie

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

Data-List

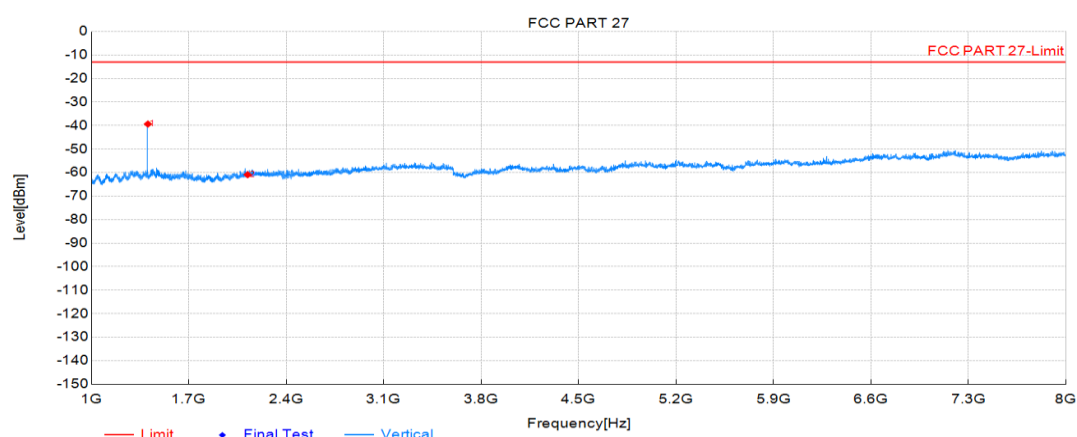
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	1406.0812	-32.01	-41.63	-9.62	-13.00	28.63	Horizon	PK	PASS
2	2109.4219	-49.28	-56.82	-7.54	-13.00	43.82	Horizon	PK	PASS



CHANNEL BANDWIDTH	10MHz / QPSK	MODE	TX channel 23095
FREQUENCY RANGE	Above 1000MHz	ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH
INPUT POWER	120Vac 60HZ	TESTED BY	Carl Xie

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

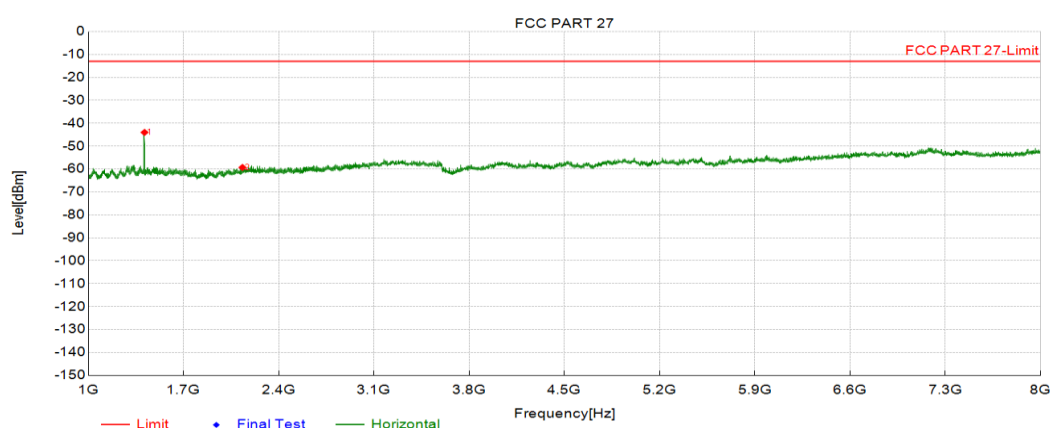
Data List									
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	1406.0812	-30.23	-39.36	-9.13	-13.00	26.36	Vertical	PK	PASS
2	2122.6245	-53.59	-60.89	-7.30	-13.00	47.89	Vertical	PK	PASS



CHANNEL BANDWIDTH	10MHz / QPSK	MODE	TX channel 23130
FREQUENCY RANGE	Above 1000MHz	ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH
INPUT POWER	120Vac 60HZ	TESTED BY	Carl Xie

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

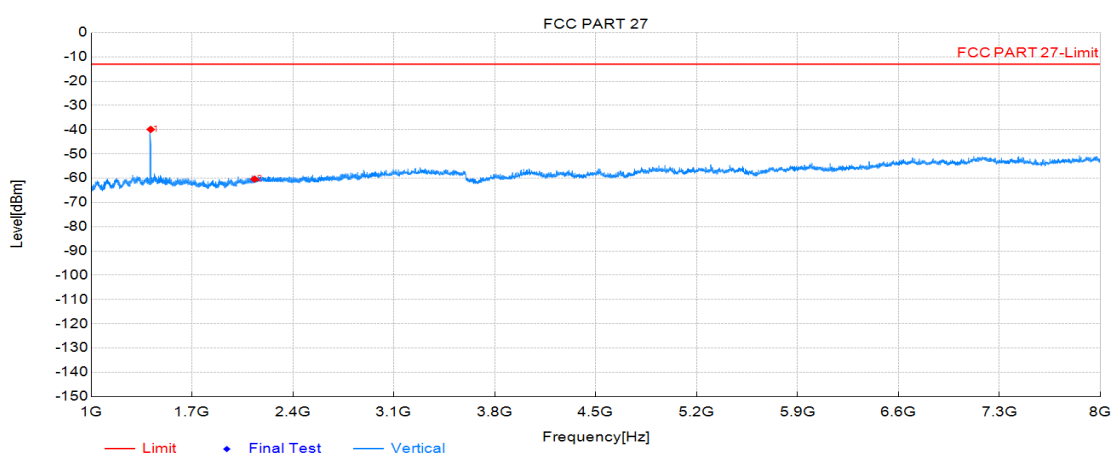
Data List									
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	1413.2827	-34.39	-44.00	-9.61	-13.00	31.00	Horizon	PK	PASS
2	2133.0266	-51.94	-59.28	-7.34	-13.00	46.28	Horizon	PK	PASS



CHANNEL BANDWIDTH	10MHz / QPSK	MODE	TX channel 23130
FREQUENCY RANGE	Above 1000MHz	ENVIRONMENTAL CONDITIONS	23deg. C, 70%RH
INPUT POWER	120Vac 60HZ	TESTED BY	Carl Xie

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

Data List									
NO.	Frequency [MHz]	Reading [dBm]	Level [dBm]	Factor [dB]	Limit [dBm]	Margin [dB]	Polarity	Detector	Verdict
1	1413.2827	-30.74	-39.88	-9.14	-13.00	26.88	Vertical	PK	PASS
2	2133.0266	-53.14	-60.35	-7.21	-13.00	47.35	Vertical	PK	PASS

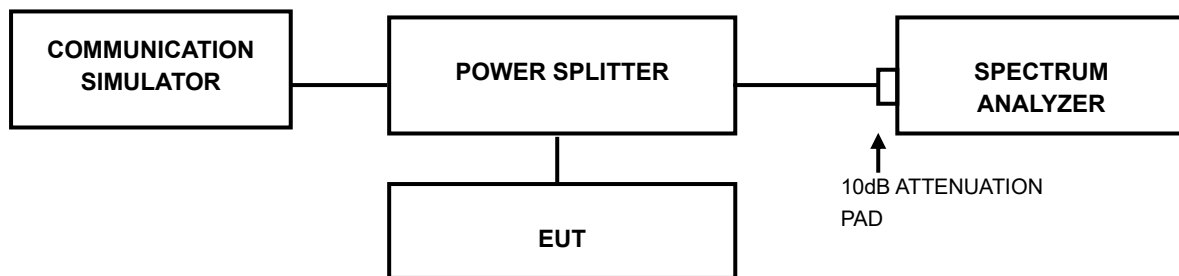


3.7 PEAK TO AVERAGE RATIO

3.7.1 LIMITS OF PEAK TO AVERAGE RATIO MEASUREMENT

In measuring transmissions in this band using an average power technique, the peak to-average ratio (PAR) of the transmission may not exceed 13 dB

3.7.2 TEST SETUP



3.7.3 TEST PROCEDURES

1. Set resolution/measurement bandwidth $\geq$ signal's occupied bandwidth;
2. Set the number of counts to a value that stabilizes the measured CCDF curve;
3. Record the maximum PAPR level associated with a probability of 0.1%.

3.7.4 TEST RESULTS

Please Refer to Appendix of this test report.



Test Report No.: RF260626B003

4 PHOTOGRAPHS OF THE TEST CONFIGURATION

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

5 INFORMATION ON THE TESTING LABORATORIES

We, BOOMWAVE TEST (SHENZHEN) CO., LTD., were founded in 2025 to provide our best service in EMC, Radio, Telecom and Safety consultation. Our laboratories are accredited and approved according to ISO/IEC 17025.

BOOMWAVE TEST (SHENZHEN) CO., LTD.

Lab Address:

Room B38, Warehouse A5(Chiwan No.1), No.3 Chiwan 4th Road, Chiwan Community, Zhaoshang Street, Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Accredited Test Lab Cert 7607.01

Shenzhen EMC/RF Lab:

Mobile: +86 15118052731

Email: shimin.wang@boomwavelab.com

6 MODIFICATIONS RECORDERS FOR ENGINEERING CHANGES TO THE EUT BY THE LAB

No any modifications are made to the EUT by the lab during the test.

7 Appendix

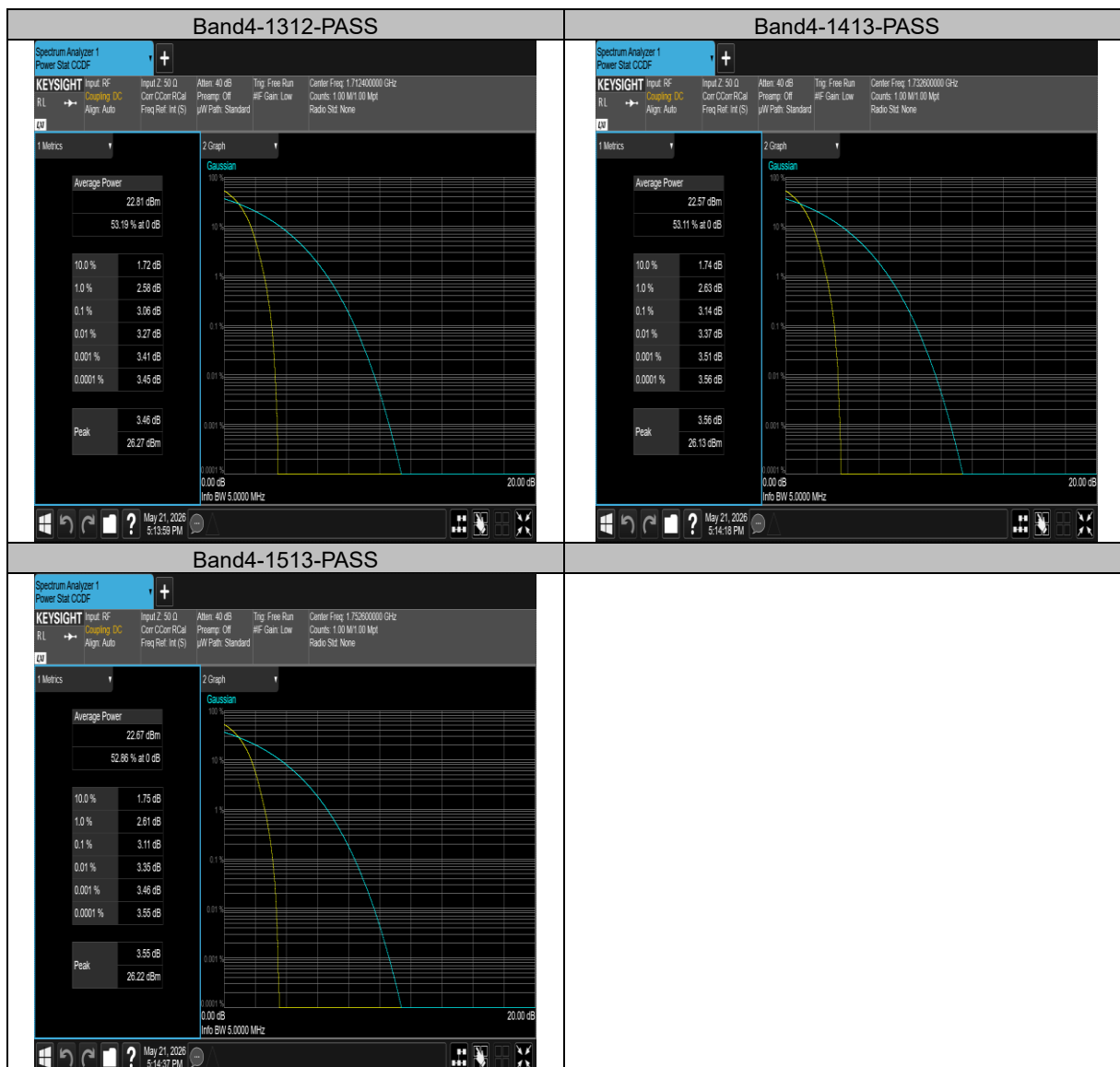
WCDMA BAND 4

PEAK-TO-AVERAGE RATIO

Test Result

Band	Channel	Peak-to-Average Ratio(dB)	Limit(dBm)	Verdict
Band4	1312	3.06	13	PASS
Band4	1413	3.14	13	PASS
Band4	1513	3.11	13	PASS

Test Graphs



26DB BANDWIDTH AND OCCUPIED BANDWIDTH

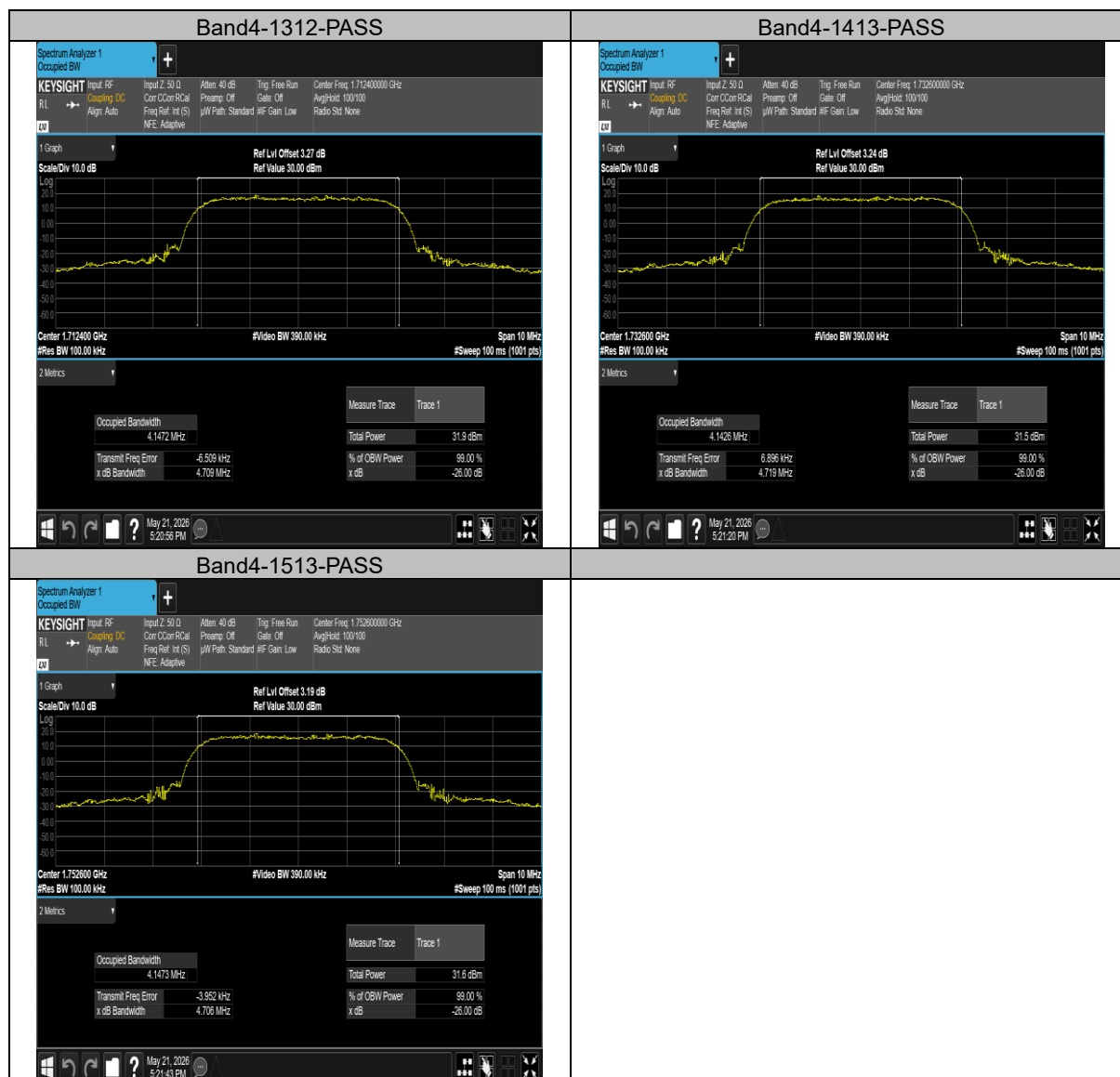
Test Result

Band	Channel	Occupied Bandwidth (MHz)	26dB Bandwidth (MHz)	Limit(kHz)	Verdict
Band4	1312	4.1472	4.709	---	PASS
Band4	1413	4.1426	4.719	---	PASS
Band4	1513	4.1473	4.706	---	PASS



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Test Graphs



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CO., LTD.

Room B38, Warehouse A5(Chiwan No.1), No.3 Chiwan
4th Road, Chiwan Community, Zhaoshang Street,
Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Mobile: +86 15118052731
Email:shimin.wang@boomwavelab.com



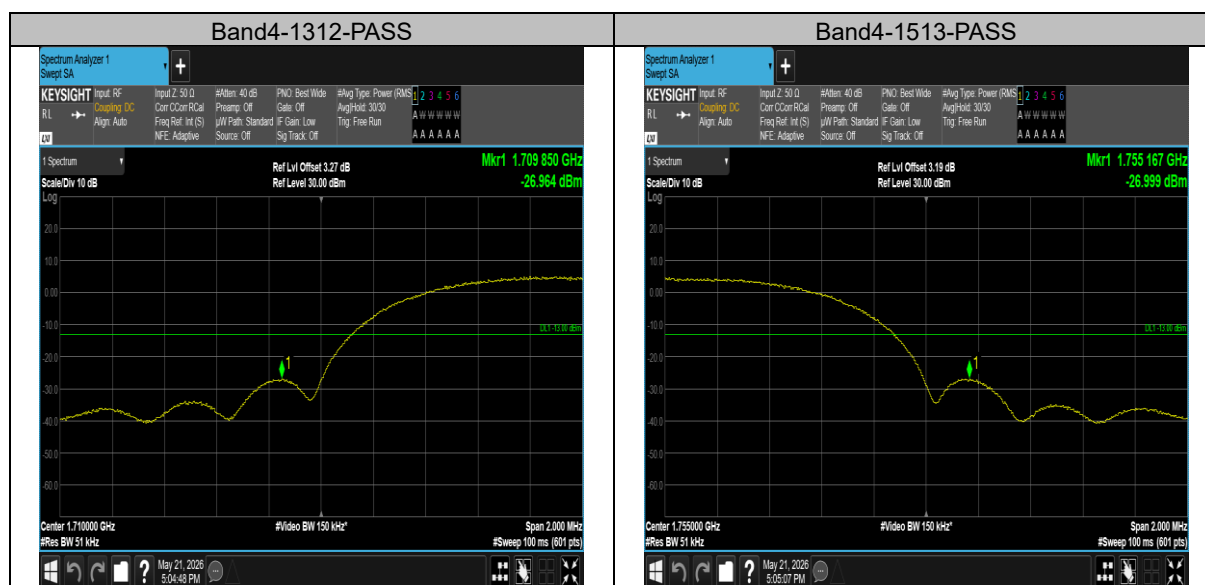
Test Report No.: RF260626B003

BAND EDGE

Test Result

Band	Channel	Frequency (MHz)	Result (dBm)	Limit(dBm)	Verdict
Band4	1312	1709.85	-26.96	-13	PASS
Band4	1513	1755.17	-27.00	-13	PASS

Test Graphs



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CO., LTD.

Room B38, Warehouse A5(Chiwan No.1), No.3 Chiwan
4th Road, Chiwan Community, Zhaoshang Street,
Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Mobile: +86 15118052731
Email:shimin.wang@boomwavelab.com



Test Report No.: RF260626B003

CONDUCTED SPURIOUS EMISSION

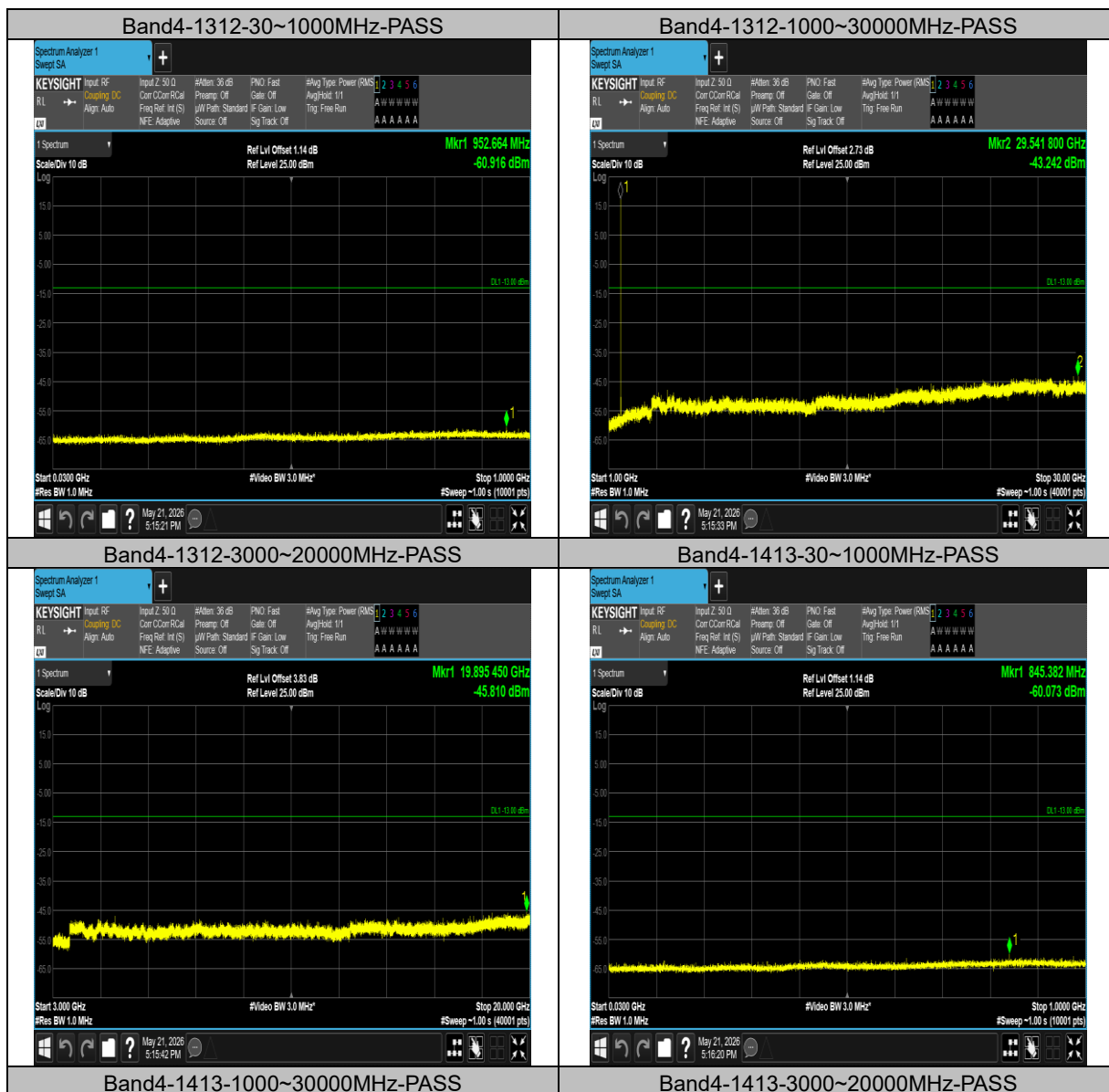
Test Result

Band	Channel	Frequency Range (Mhz)	Frequency (dBm)	Result (dBm)	Limit (dBm)	Verdict
Band4	1312	30~1000MHz	952.66	-60.92	-13	PASS
Band4	1312	1000~30000MHz	29541.8	-43.24	-13	PASS
Band4	1312	3000~20000MHz	19895.45	-45.81	-13	PASS
Band4	1413	30~1000MHz	845.38	-60.07	-13	PASS
Band4	1413	1000~30000MHz	27207.3	-42.77	-13	PASS
Band4	1413	3000~20000MHz	19988.95	-45.48	-13	PASS
Band4	1513	30~1000MHz	889.23	-61.13	-13	PASS
Band4	1513	1000~30000MHz	26353.98	-43.08	-13	PASS
Band4	1513	3000~20000MHz	19965.58	-45.8	-13	PASS



Test Report No.: RF260626B003

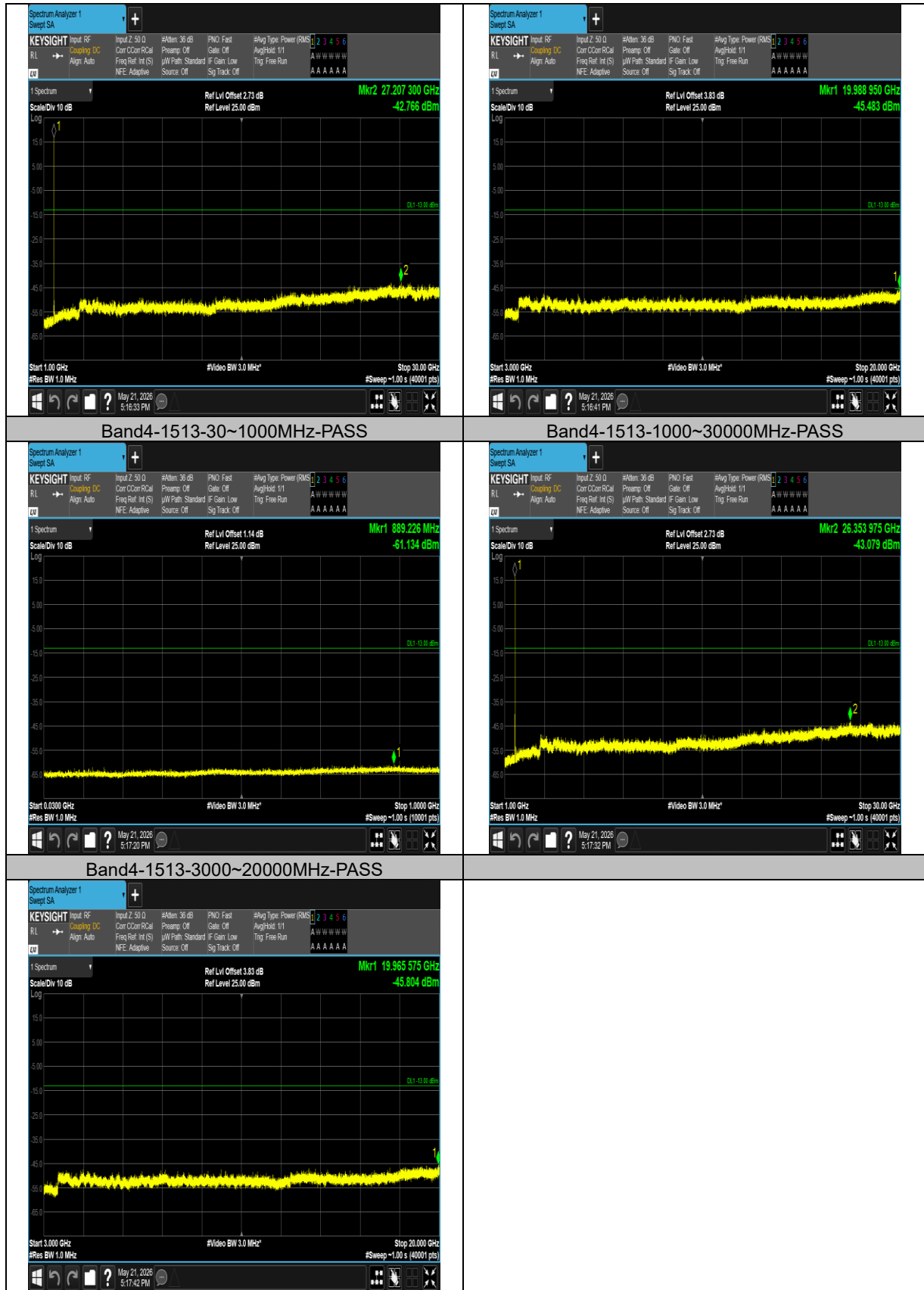
Test Graphs



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CO., LTD.

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4th Road, Chiwan Community, Zhaoshang Street,
Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Mobile: +86 15118052731
Email:shimin.wang@boomwavelab.com





Test Report No.: RF260626B003

FREQUENCY STABILITY

Test Result

Voltage							
Band	Channel	Voltage (Vdc)	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
Band4	1312	VN	NT	-3.48	-0.002031	±2.5	PASS
Band4	1312	VL	NT	-8.90	-0.005197	±2.5	PASS
Band4	1312	VH	NT	-3.74	-0.002184	±2.5	PASS
Band4	1513	VN	NT	-2.02	-0.001154	±2.5	PASS
Band4	1513	VL	NT	-8.91	-0.005084	±2.5	PASS
Band4	1513	VH	NT	3.77	0.002152	±2.5	PASS

Temperature							
Band	Channel	Voltage (Vdc)	Temperature (°C)	Deviation (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
Band4	1312	NV	-30	3.64	0.002124	±2.5	PASS
Band4	1312	NV	-20	-2.97	-0.001736	±2.5	PASS
Band4	1312	NV	-10	-2.76	-0.001614	±2.5	PASS
Band4	1312	NV	0	7.81	0.004559	±2.5	PASS
Band4	1312	NV	10	-8.39	-0.004900	±2.5	PASS
Band4	1312	NV	20	-8.30	-0.004844	±2.5	PASS
Band4	1312	NV	30	-8.41	-0.004911	±2.5	PASS
Band4	1312	NV	40	-8.79	-0.005136	±2.5	PASS
Band4	1312	NV	50	-8.37	-0.004888	±2.5	PASS
Band4	1513	NV	-30	8.23	0.004699	±2.5	PASS
Band4	1513	NV	-20	8.72	0.004975	±2.5	PASS
Band4	1513	NV	-10	-3.83	-0.002186	±2.5	PASS
Band4	1513	NV	0	-8.26	-0.004715	±2.5	PASS
Band4	1513	NV	10	-3.70	-0.002113	±2.5	PASS
Band4	1513	NV	20	7.40	0.004220	±2.5	PASS
Band4	1513	NV	30	-8.66	-0.004941	±2.5	PASS
Band4	1513	NV	40	-9.48	-0.005412	±2.5	PASS
Band4	1513	NV	50	-3.48	-0.001983	±2.5	PASS



Test Report No.: RF260626B003

LTE BAND 12

PEAK-TO-AVERAGE RATIO(CCDF)

Test Result

Band	Bandwidth	Modulation	Channel	RB Configuration	Result(dB)	Limit(dB)	Verdict
Band12	1.4MHz	QPSK	23017	1RB#0	3.72	13	PASS
Band12	1.4MHz	QPSK	23017	6RB#0	4.55	13	PASS
Band12	1.4MHz	QPSK	23095	1RB#0	4.50	13	PASS
Band12	1.4MHz	QPSK	23095	6RB#0	5.27	13	PASS
Band12	1.4MHz	QPSK	23173	1RB#0	4.25	13	PASS
Band12	1.4MHz	QPSK	23173	6RB#0	5.15	13	PASS
Band12	1.4MHz	64QAM	23017	1RB#0	5.46	13	PASS
Band12	1.4MHz	64QAM	23017	6RB#0	6.19	13	PASS
Band12	1.4MHz	64QAM	23095	1RB#0	6.37	13	PASS
Band12	1.4MHz	64QAM	23095	6RB#0	6.82	13	PASS
Band12	1.4MHz	64QAM	23173	1RB#0	6.06	13	PASS
Band12	1.4MHz	64QAM	23173	6RB#0	6.66	13	PASS
Band12	1.4MHz	16QAM	23017	1RB#0	4.60	13	PASS
Band12	1.4MHz	16QAM	23017	6RB#0	5.51	13	PASS
Band12	1.4MHz	16QAM	23095	1RB#0	5.39	13	PASS
Band12	1.4MHz	16QAM	23095	6RB#0	6.24	13	PASS
Band12	1.4MHz	16QAM	23173	1RB#0	5.16	13	PASS
Band12	1.4MHz	16QAM	23173	6RB#0	6.11	13	PASS
Band12	3MHz	QPSK	23025	1RB#0	3.71	13	PASS
Band12	3MHz	QPSK	23025	15RB#0	4.74	13	PASS
Band12	3MHz	QPSK	23095	1RB#0	4.48	13	PASS
Band12	3MHz	QPSK	23095	15RB#0	5.28	13	PASS
Band12	3MHz	QPSK	23165	1RB#0	3.98	13	PASS
Band12	3MHz	QPSK	23165	15RB#0	4.99	13	PASS
Band12	3MHz	64QAM	23025	1RB#0	5.52	13	PASS
Band12	3MHz	64QAM	23025	15RB#0	6.32	13	PASS
Band12	3MHz	64QAM	23095	1RB#0	6.37	13	PASS
Band12	3MHz	64QAM	23095	15RB#0	6.80	13	PASS
Band12	3MHz	64QAM	23165	1RB#0	5.78	13	PASS
Band12	3MHz	64QAM	23165	15RB#0	6.58	13	PASS
Band12	3MHz	16QAM	23025	1RB#0	4.63	13	PASS
Band12	3MHz	16QAM	23025	15RB#0	5.67	13	PASS
Band12	3MHz	16QAM	23095	1RB#0	5.42	13	PASS
Band12	3MHz	16QAM	23095	15RB#0	6.25	13	PASS
Band12	3MHz	16QAM	23165	1RB#0	4.90	13	PASS
Band12	3MHz	16QAM	23165	15RB#0	5.94	13	PASS
Band12	5MHz	QPSK	23035	1RB#0	3.17	13	PASS
Band12	5MHz	QPSK	23035	25RB#0	4.29	13	PASS
Band12	5MHz	QPSK	23095	1RB#0	3.53	13	PASS
Band12	5MHz	QPSK	23095	25RB#0	4.54	13	PASS
Band12	5MHz	QPSK	23155	1RB#0	3.27	13	PASS
Band12	5MHz	QPSK	23155	25RB#0	4.16	13	PASS
Band12	5MHz	64QAM	23035	1RB#0	5.50	13	PASS
Band12	5MHz	64QAM	23035	25RB#0	6.42	13	PASS
Band12	5MHz	64QAM	23095	1RB#0	6.27	13	PASS
Band12	5MHz	64QAM	23095	25RB#0	6.77	13	PASS

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CO., LTD.

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4th Road, Chiwan Community, Zhaoshang Street,
Nanshan District, Shenzhen, Guangdong, P.R. CHINA

Mobile: +86 15118052731
Email:shimin.wang@boomwavelab.com

Test Report No.: RF260626B003

Band12	5MHz	64QAM	23155	1RB#0	5.43	13	PASS
Band12	5MHz	64QAM	23155	25RB#0	6.45	13	PASS
Band12	5MHz	16QAM	23035	1RB#0	4.13	13	PASS
Band12	5MHz	16QAM	23035	25RB#0	5.24	13	PASS
Band12	5MHz	16QAM	23095	1RB#0	4.61	13	PASS
Band12	5MHz	16QAM	23095	25RB#0	5.51	13	PASS
Band12	5MHz	16QAM	23155	1RB#0	4.13	13	PASS
Band12	5MHz	16QAM	23155	25RB#0	5.27	13	PASS
Band12	10MHz	QPSK	23060	1RB#0	3.26	13	PASS
Band12	10MHz	QPSK	23060	50RB#0	4.66	13	PASS
Band12	10MHz	QPSK	23095	1RB#0	3.62	13	PASS
Band12	10MHz	QPSK	23095	50RB#0	4.57	13	PASS
Band12	10MHz	QPSK	23130	1RB#0	3.67	13	PASS
Band12	10MHz	QPSK	23130	50RB#0	4.15	13	PASS
Band12	10MHz	64QAM	23060	1RB#0	5.53	13	PASS
Band12	10MHz	64QAM	23060	50RB#0	6.76	13	PASS
Band12	10MHz	64QAM	23095	1RB#0	6.13	13	PASS
Band12	10MHz	64QAM	23095	50RB#0	6.71	13	PASS
Band12	10MHz	64QAM	23130	1RB#0	6.34	13	PASS
Band12	10MHz	64QAM	23130	50RB#0	6.49	13	PASS
Band12	10MHz	16QAM	23060	1RB#0	4.16	13	PASS
Band12	10MHz	16QAM	23060	50RB#0	5.57	13	PASS
Band12	10MHz	16QAM	23095	1RB#0	4.53	13	PASS
Band12	10MHz	16QAM	23095	50RB#0	5.50	13	PASS
Band12	10MHz	16QAM	23130	1RB#0	4.59	13	PASS
Band12	10MHz	16QAM	23130	50RB#0	5.20	13	PASS

Test Graphs

