

TEST REPORT



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Manufacturer or Supplier	SHENZHEN TENDA TECHNOLOGY CO.,LTD.
Address	6-8 Floor, Tower E3, No. 1001, Zhongshanyuan Road, Nanshan District, Shenzhen, China. 518052
Product	300Mbps Ultimate Coverage Wi-Fi Router
Brand Name	Tenda
Model	FH456
Additional Model & Model Difference	N/A
Date of tests	May 15, 2017 ~ Jun. 16, 2017

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

☒ **FCC Part 15, Subpart C, Section 15.247**

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

Tested by Andy Zhu Project Engineer / EMC Department	Approved by Chris Chen Manager / EMC Department
	 Date: Jul. 04, 2017

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RELEASE CONTROL RECORD

ISSUE NO.	REASON FOR CHANGE	DATE ISSUED
RF170512N051	Original release	Jul. 04, 2017

1 SUMMARY OF TEST RESULTS

The EUT has been tested according to the following specifications:

APPLIED STANDARD: FCC PART 15, SUBPART C (SECTION 15.247)			
STANDARD SECTION	TEST TYPE AND LIMIT	RESULT	REMARK
15.207	AC Power Conducted Emission	PASS	Meet the requirement of limit.
15.247(d) 15.209	Radiated Emissions	PASS	Meet the requirement of limit.
15.247(d)	Band Edge Measurement	PASS	Meet the requirement of limit.
15.247(a)(2)	6dB bandwidth	PASS	Meet the requirement of limit.
15.247(b)	Conducted Output power	PASS	Meet the requirement of limit.
15.247(e)	Power Spectral Density	PASS	Meet the requirement of limit.
15.203	Antenna Requirement	PASS	No antenna connector is used

2 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	UNCERTAINTY
Conducted emissions	9kHz~30MHz	2.70dB
Radiated emissions	9KHz ~ 30MHz	2.90dB
	30MHz ~ 1GMHz	3.83dB
	1GHz ~ 18GHz	4.93dB
	18GHz ~ 40GHz	4.80dB

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



3 GENERAL INFORMATION

3.1 GENERAL DESCRIPTION OF EUT

PRODUCT	300Mbps Ultimate Coverage Wi-Fi Router
MODEL NO.	FH456
FCC ID	V7TFH456-16
NOMINAL VOLTAGE	DC 9V 600mA from adapter input AC 100-240V 50/60Hz 0.3A
MODULATION TYPE	CCK, DQPSK, DBPSK for DSSS 64QAM, 16QAM, QPSK, BPSK for OFDM
MODULATION TECHNOLOGY	DSSS, OFDM
OPERATING FREQUENCY	2412-2462MHz for 11b/g/n(HT20) 2422-2452MHz for 11n(HT40)
PEAK POWER	27.70dBm(Maximum)
ANTENNA TYPE	Dipole Antenna, with 5dBi gain
I/O PORTS	Refer to user's manual
CABLE SUPPLIED	N/A

NOTE:

1. The EUT provides completed transmitters and receivers:

MODULATION MODE	FUNCTION
802.11b	1TX/1RX
802.11g	1TX/1RX
802.11n (HT20)	2TX/2RX
802.11n (HT40)	2TX/2RX

2. For a more detailed features description, please refer to the manufacturer's specifications or the user's manual.
3. For the test results, the EUT had been tested with all conditions. But only the worst case was shown in test report.
4. Please refer to the EUT photo document (Reference No.: 170512N051) for detailed product photo.
5. The EUT can be powered by adapter as list as attach:

ADAPTER	
BRAND:	N/A
MODEL:	BN049-A05009U
INPUT:	AC 100-240V 50/60HZ 0.3A
OUTPUT:	DC 9V 600MA
DC LINE:	Unshielded, Non-detachable, 1.2m.

3.2 DESCRIPTION OF TEST MODES

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

CHANNEL	FREQUENCY	CHANNEL	FREQUENCY
1	2412 MHz	7	2442 MHz
2	2417 MHz	8	2447 MHz
3	2422 MHz	9	2452 MHz
4	2427 MHz	10	2457 MHz
5	2432 MHz	11	2462 MHz
6	2437 MHz		

7 channels are provided for 802.11n (HT40):

CHANNEL	FREQUENCY	CHANNEL	FREQUENCY
3	2422MHz	7	2442MHz
4	2427MHz	8	2447MHz
5	2432MHz	9	2452MHz
6	2437MHz		

3.2.1 CONFIGURATION OF SYSTEM UNDER TEST

Please see section 5 photographs of the test configuration for reference.

3.2.2 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, XYZ axis and antenna ports.

The worst case was found when positioned on X axis for radiated emission. Following test modes were selected for the final test, and the final worst case is marked in boldface and recorded in the report:

EUT CONFIGURE MODE	APPLICABLE TO				MODE
	RE<1G	RE≥1G	PLC	APCM	
-	√	√	√	√	Powered by Adapter with WIFI function

Where **RE<1G**: Radiated Emission below 1GHz

RE≥1G: Radiated Emission above 1GHz

PLC: Power Line Conducted Emission

APCM: Antenna Port Conducted Measurement

POWER LINE CONDUCTED EMISSION TEST:

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

EUT CONFIGURE MODE	TESTED CONDITION
-	WIFI (2.4G) Link

RADIATED EMISSION TEST (BELOW 1GHz):

- ☒ 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 (if EUT with antenna diversity architecture).
- ☒ Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)
-	802.11b	1 to 11	1	OFDM	DBPSK	1.0

**RADIATED EMISSION TEST (ABOVE 1GHz):**

☒ 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 (if EUT with antenna diversity architecture).

☒ Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)
-	802.11b	1 to 11	1, 6, 11	CCK	DBPSK	1.0
-	802.11g	1 to 11	1, 6, 11	OFDM	BPSK	6.0
-	802.11n HT20	1 to 11	1, 6, 11	OFDM	BPSK	6.5
-	802.11n HT40	3 to 9	3, 9	OFDM	BPSK	13.5

BANDEDGE MEASUREMENT:

☒ Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).

☒ Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)
-	802.11b	1 to 11	1, 11	CCK	DBPSK	1.0
-	802.11g	1 to 11	1, 11	OFDM	BPSK	6.0
-	802.11n HT20	1 to 11	1, 11	OFDM	BPSK	6.5
-	802.11n HT40	3 to 9	3, 9	OFDM	BPSK	13.5



ANTENNA PORT CONDUCTED MEASUREMENT:

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

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)
-	802.11b	1 to 11	1, 6, 11	CCK	DBPSK	1.0
-	802.11g	1 to 11	1, 6, 11	OFDM	BPSK	6.0
-	802.11n HT20	1 to 11	1, 6, 11	OFDM	BPSK	6.5
-	802.11n HT40	3 to 9	3, 6, 9	OFDM	BPSK	13.5

TEST CONDITION:

APPLICABLE TO	ENVIRONMENTAL CONDITIONS	TEST VOLTAGE	TESTED BY
RE<1G	23deg. C, 53%RH	DC 9V from Adapter	Eric Fang
RE≥1G	23deg. C, 53%RH	DC 9V from Adapter	Eric Fang
PLC	20deg. C, 56%RH	DC 9V from Adapter	Sen He
APCM	20deg. C, 55%RH	DC 9V from Adapter	Yang

3.3 DUTY CYCLE OF TEST SIGNAL

Duty cycle of test signal is 100 %



3.4 GENERAL DESCRIPTION OF APPLIED STANDARDS

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

FCC Part 15, Subpart C, Section 15.247

KDB 558074 D01 DTS Meas Guidance v03r05

ANSI C63.10-2013

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

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

3.5 DESCRIPTION OF SUPPORT UNITS

The EUT has been tested as a dependent 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.



4 TEST TYPES AND RESULTS

4.1 CONDUCTED EMISSION MEASUREMENT

4.1.1 LIMITS OF CONDUCTED EMISSION MEASUREMENT

FREQUENCY OF EMISSION (MHz)	CONDUCTED LIMIT (dB μ V)	
	Quasi-peak	Average
0.15 ~ 0.5	66 to 56	56 to 46
0.5 ~ 5	56	46
5 ~ 30	60	50

- NOTE:** 1. The lower limit shall apply at the transition frequencies.
2. The limit decreases in line with the logarithm of the frequency in the range of 0.15 to 0.50MHz.
3. All emanations from a class A/B digital device or system, including any network of conductors and apparatus connected thereto, shall not exceed the level of field strengths specified above.

4.1.2 TEST INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
EMI Test Receiver	Rohde&Schwarz	ESR7	101494	Apr. 05,17	Apr. 04,18
Artificial Mains Network	Rohde&Schwarz	ENV216	101173	Mar. 06,17	Mar. 05,18
Artificial Mains Network	Rohde&Schwarz	ESH3-Z5	100317	Apr. 05,17	Apr. 04,18
Voltage probe	SCHWARZBECK	TK 9421	TK 9421-176	Jan. 04,17	Jan. 03,18
Test software	ADT	ADT_Cond_V7.3.7	N/A	N/A	N/A

NOTE:

1. The test was performed in shielded room 553.
2. The calibration interval of the above test instruments is 12 months. And the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.

4.1.3 TEST PROCEDURES

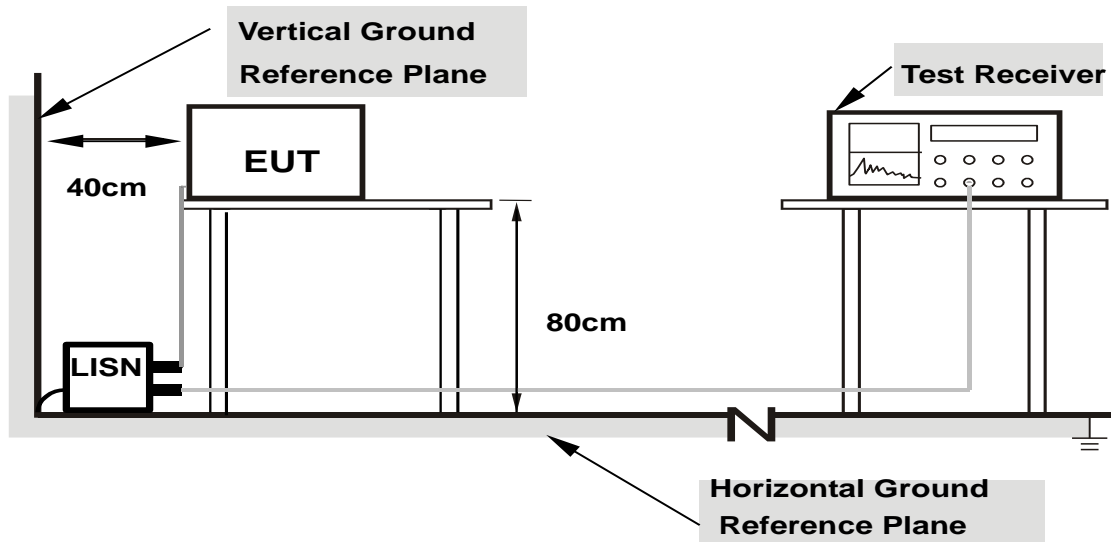
- a. The EUT was placed 0.4 meters from the conducting wall of the shielded room with EUT being connected to the power mains through a line impedance stabilization network (LISN). Other support units were connected to the power mains through another LISN. The two LISNs provide 50 ohm/ 50uH of coupling impedance for the measuring instrument.
- b. Both lines of the power mains connected to the EUT were checked for maximum conducted interference.
- c. The frequency range from 150kHz to 30MHz was searched. Emission levels under (Limit - 20dB) were not recorded.

NOTE: All modes of operation were investigated and the worst-case emissions are reported.

4.1.4 DEVIATION FROM TEST STANDARD

No deviation.

4.1.5 TEST SETUP



Note: 1.Support units were connected to second LISN.

**2.Both of LISNs (AMN) are 80 cm from EUT and at least 80
from other units and other metal planes**

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

4.1.6 EUT OPERATING CONDITIONS

- a. Turned on the power and connected of all equipment.
- b. EUT was operated according to the type used was description in manufacturer's specifications or the User's Manual.



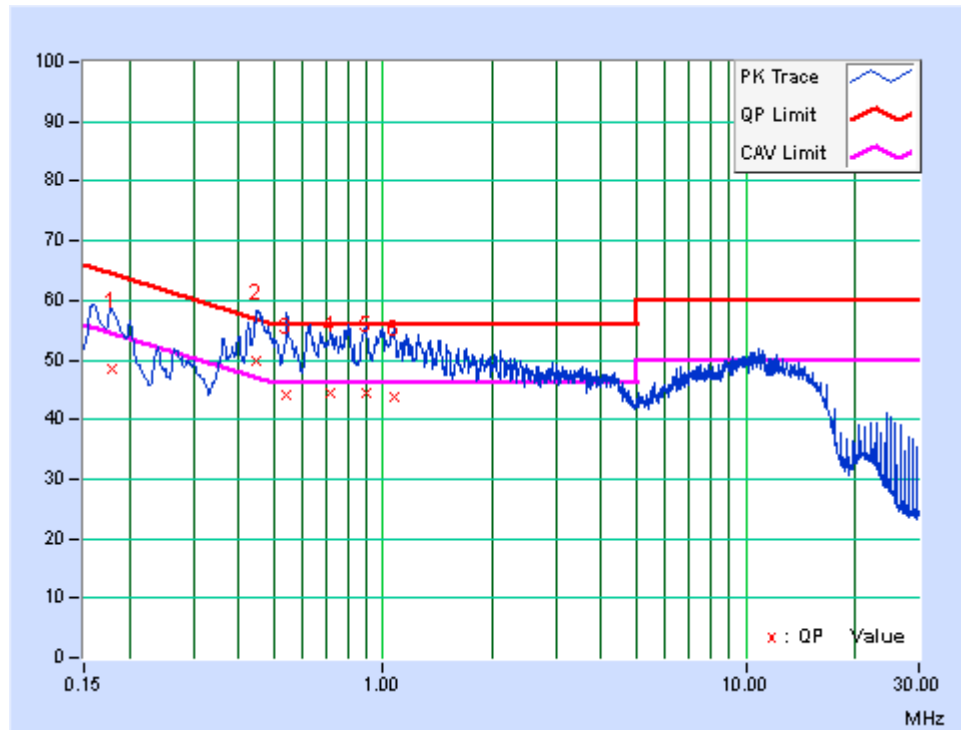
4.1.7 TEST RESULTS

CONDUCTED WORST-CASE DATA: WIFI

PHASE	Line	6dB BANDWIDTH	9kHz
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No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.17925	10.22	38.32	24.98	48.54	35.20	64.52	54.52	-15.98	-19.32
2	0.44947	10.23	39.63	26.39	49.86	36.62	56.88	46.88	-7.03	-10.27
3	0.54375	10.22	33.85	21.59	44.07	31.81	56.00	46.00	-11.93	-14.19
4	0.71723	10.22	34.18	21.06	44.40	31.28	56.00	46.00	-11.60	-14.72
5	0.89532	10.23	34.13	22.04	44.36	32.27	56.00	46.00	-11.64	-13.73
6	1.07424	10.23	33.66	22.57	43.89	32.80	56.00	46.00	-12.11	-13.20

- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.

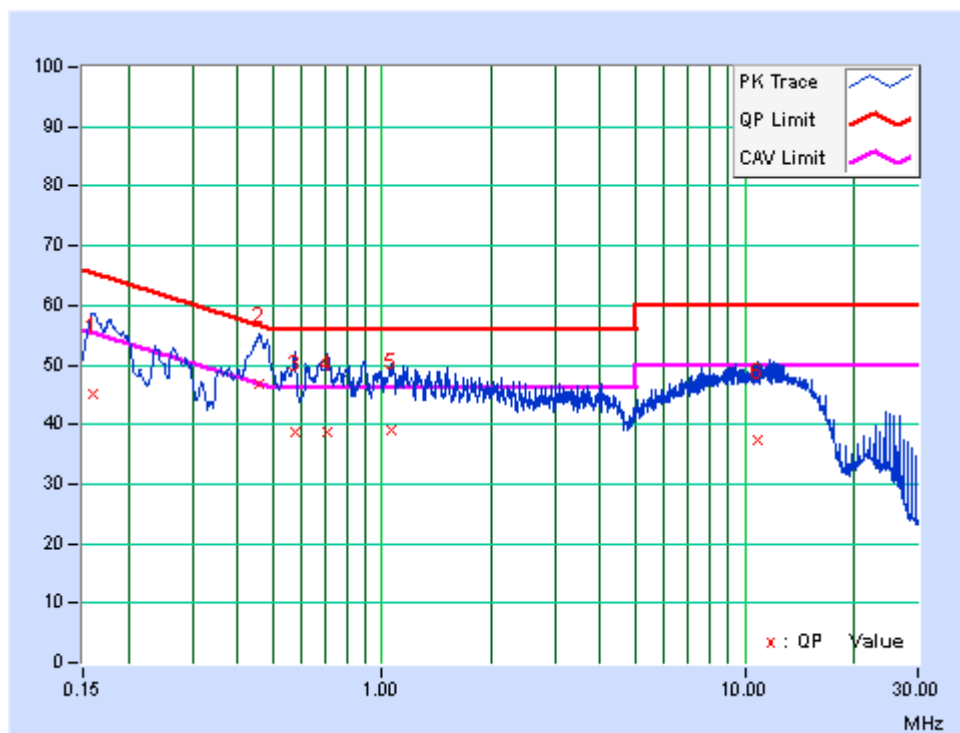




PHASE	Neutral	6dB BANDWIDTH	9kHz
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No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.15924	10.01	35.05	16.54	45.06	26.55	65.50	55.50	-20.44	-28.95
2	0.46050	10.03	36.81	25.41	46.84	35.44	56.68	46.68	-9.85	-11.25
3	0.57608	10.02	28.56	22.54	38.58	32.56	56.00	46.00	-17.42	-13.44
4	0.70970	10.02	28.70	21.19	38.72	31.21	56.00	46.00	-17.28	-14.79
5	1.06125	10.02	29.15	21.50	39.17	31.52	56.00	46.00	-16.83	-14.48
6	10.89150	10.12	27.28	15.21	37.40	25.33	60.00	50.00	-22.60	-24.67

- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



4.2 RADIATED EMISSION MEASUREMENT

4.2.1 LIMITS OF RADIATED EMISSION MEASUREMENT

Radiated emissions which fall in the restricted bands, as defined in Section 15.205(a), must also comply with the radiated emission limits specified in Section 15.209(a).

FREQUENCIES (MHz)	FIELD STRENGTH (microvolts/meter)	MEASUREMENT DISTANCE (meters)
0.009 ~ 0.490	2400/F(kHz)	300
0.490 ~ 1.705	24000/F(kHz)	30
1.705 ~ 30.0	30	30
30 ~ 88	100	3
88 ~ 216	150	3
216 ~ 960	200	3
Above 960	500	3

NOTE:

1. The lower limit shall apply at the transition frequencies.
2. Emission level (dBuV/m) = 20 log Emission level (uV/m).
3. As shown in 15.35(b), for frequencies above 1000MHz, the field strength limits are based on average detector, however, the peak field strength of any emission shall not exceed the maximum permitted average limits, specified above by more than 20dB under any condition of modulation.



4.2.2 TEST INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
EMI Test Receiver	Rohde&Schwarz	ESU40	100449	Mar. 11,17	Mar. 10,18
Signal and Spectrum Analyzer	Rohde&Schwarz	FSV7	102331	Nov. 04,16	Nov. 03,17
Bilog Antenna	Teseq	CBL 6111D	30643	Jul. 14, 16	Jul. 13, 17
Loop antenna (9kHz~30MHz)	Daze	ZN30900A	0708	Dec. 22,16	Dec. 21,17
Horn Antenna (1GHz -18GHz)	ETS -Lindgren	3117	00062558	May 18,17	May 17,18
Horn Antenna (15GHz-40GHz)	SCHWARZBECK	BBHA 9170	BBHA9170147	Jan. 21,17	Jan. 20,18
GPS Generator+ Antenna	TOJOIN	GNSS-5000A	E1-010119	Aug. 08, 16	Aug. 07, 17
3m Semi-anechoic Chamber	ETS-LINDGREN	9m*6m*6m	NSEMC003	Mar. 06,17	Mar. 05,18
Test Software	ADT	ADT_Radiated_V7.6.15.9.2	N/A	N/A	N/A
Horn Antenna	SCHWARZBECK	BBHA 9170	BBHA9170242	Mar. 15,17	Mar. 14,18
Amplifier (9kHz-1GHz)	SONOMA	310D	186955	Mar. 04,17	Mar. 03, 18
Broadband Preamplifier (1GHz~18GHz)	SCHWARZBECK	BBV9718	305	Mar. 06,17	Mar. 05,18
Pre-Amplifier (18GHz-40GHz)	EMCI	EMC 184045	980102	Nov. 04,16	Nov. 03,17
Test Software	ADT	ADT_Radiated_V7.6.15.9.2	N/A	N/A	N/A
BLUETOOTH TESTER	Rohde&Schwarz	CBT32	100811	Aug. 08,16	Aug. 07,17

NOTE:

1. The test was performed in 966 Chamber.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.
3. The horn antenna is used only for the measurement of emission frequency above 1GHz if tested.
4. The FCC Site Registration No. is 502831.

4.2.3 TEST PROCEDURES

- a. The EUT was placed on the top of a rotating table 1.5 meters (above 1GHz) and 0.8 meters (below 1GHz) above the ground at a 3 meters semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
- b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c. The antenna is a broadband antenna, and its height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.
- f. During the test, each emission was maximized by: having the EUT continuously working, investigated all operating modes, rotated about all 3 axis (X, Y & Z) and considered typical configuration to obtain worst position, manipulating interconnecting cables, For battery operated equipment, the equipment tests shall be perform using fresh batteries. The turntable was rotated to maximize the emission level.

NOTE:

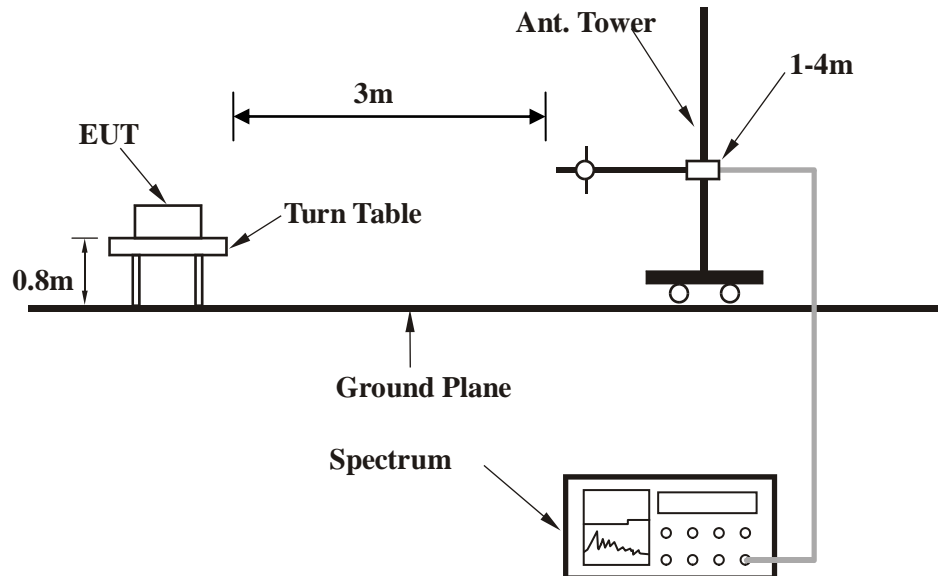
1. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 120kHz for Quasi-peak detection at frequency below 1GHz.
2. The resolution bandwidth of test receiver/spectrum analyzer is 1MHz and video bandwidth is 3MHz for Peak detection at frequency above 1GHz.
3. The resolution bandwidth of test receiver/spectrum analyzer is 1MHz and the video bandwidth is $\geq 1/T$ (Duty cycle < 98%) or 10Hz (Duty cycle > 98%) for Average detection (AV) at frequency above 1GHz.
4. All modes of operation were investigated and the worst-case emissions are reported.
5. The testing of the EUT was performed on all 3 orthogonal axes, the worst-case test configuration was reported on the file test setup photo.

4.2.4 DEVIATION FROM TEST STANDARD

No deviation.

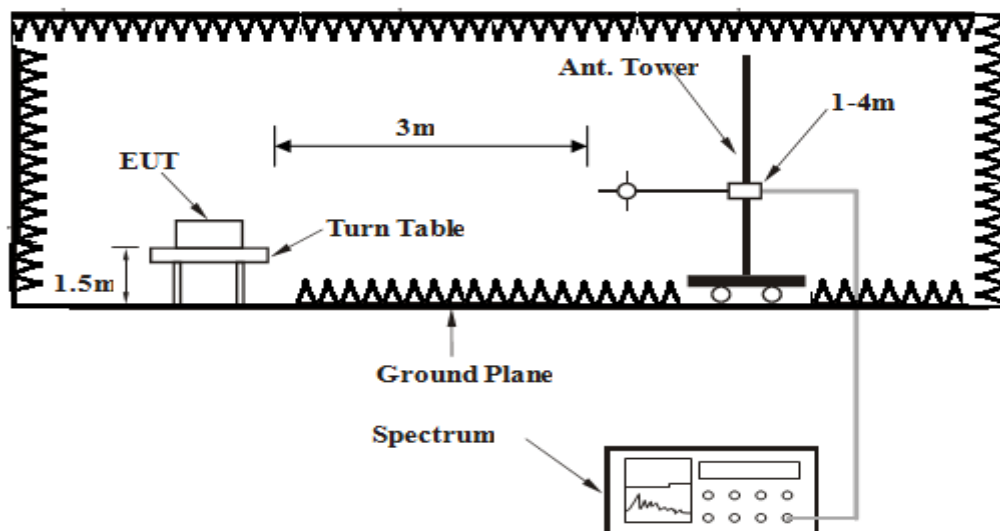
4.2.5 TEST SETUP

Below 1GHz test setup



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

Above 1GHz test setup



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

4.2.6 EUT OPERATING CONDITIONS

- Placed the EUT on a testing table.
- Set the transmitter part of EUT under transmission condition continuously at specific channel frequency.
- The necessary accessories enable the EUT in full functions.

4.2.7 TEST RESULTS

BELOW 1GHz WORST-CASE DATA:

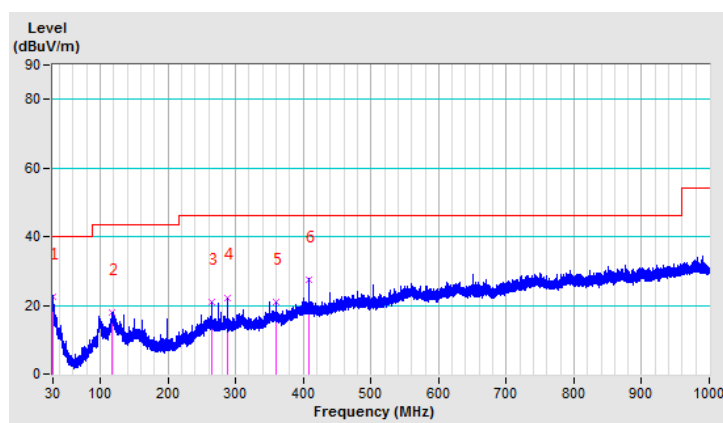
802.11b

CHANNEL	TX Channel 1	DETECTOR FUNCTION	Quasi-Peak (QP)
FREQUENCY RANGE	30MHz ~ 1GHz		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	30.30	22.41 QP	40.00	-17.59	2.00 H	45	33.82	-11.41
2	117.24	17.95 QP	43.50	-25.55	2.10 H	120	34.81	-16.86
3	263.98	20.82 QP	46.00	-25.18	2.00 H	300	33.73	-12.91
4	287.99	22.30 QP	46.00	-23.70	2.30 H	290	36.02	-13.72
5	359.95	20.80 QP	46.00	-25.20	2.00 H	90	31.04	-10.24
6	407.97	27.50 QP	46.00	-18.50	2.00 H	170	35.82	-8.32

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. The emission levels of other frequencies were less than 20dB margin against the limit.



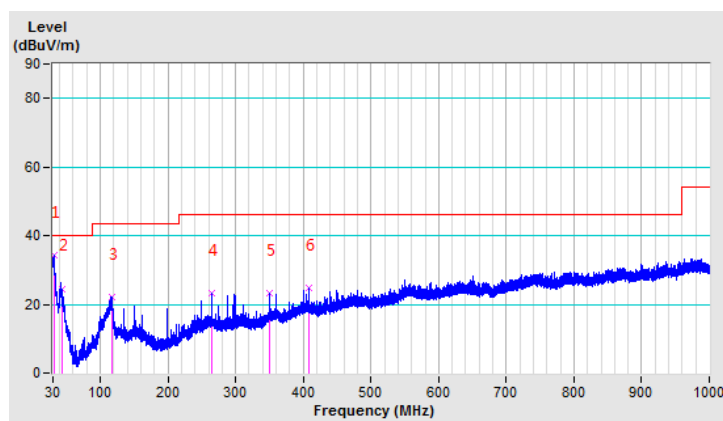


CHANNEL	TX Channel 1	DETECTOR FUNCTION	Quasi-Peak (QP)
FREQUENCY RANGE	30MHz ~ 1GHz		

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	31.24	34.30 QP	40.00	-5.70	1.00 V	89	46.16	-11.86
2	42.85	24.59 QP	40.00	-15.41	1.20 V	278	42.59	-18.00
3	116.45	21.93 QP	43.50	-21.57	1.00 V	310	38.89	-16.96
4	263.98	23.24 QP	46.00	-22.76	1.50 V	50	36.15	-12.91
5	349.98	23.40 QP	46.00	-22.60	1.00 V	260	34.21	-10.81
6	408.00	24.79 QP	46.00	-21.21	1.00 V	170	33.11	-8.32

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. The emission levels of other frequencies were less than 20dB margin against the limit.





ABOVE 1GHz DATA

802.11b

CHANNEL	TX Channel 1	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	48.65 PK	74.00	-25.35	1.00 H	325	45.85	2.80
2	2390.00	35.62 AV	54.00	-18.38	1.00 H	325	32.82	2.80
3	*2412.00	95.32 PK			1.20 H	100	92.46	2.86
4	*2412.00	91.90 AV			1.20 H	100	89.04	2.86
5	4824.00	55.29 PK	74.00	-18.71	1.00 H	322	49.63	5.66
6	4824.00	50.37 AV	54.00	-3.63	1.00 H	322	44.71	5.66
7	#7236.00	60.68 PK	74.00	-13.32	1.00 H	214	47.59	13.09
8	#7236.00	47.26 AV	54.00	-6.74	1.00 H	214	34.17	13.09
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	59.59 PK	74.00	-14.41	1.00 V	21	56.79	2.80
2	2390.00	47.22 AV	54.00	-6.78	1.00 V	21	44.42	2.80
3	*2412.00	109.83 PK			1.00 V	21	106.97	2.86
4	*2412.00	105.53 AV			1.00 V	21	102.67	2.86
5	4824.00	56.28 PK	74.00	-17.72	2.93 V	51	50.62	5.66
6	4824.00	51.23 AV	54.00	-2.77	2.93 V	51	45.57	5.66
7	#7236.00	59.65 PK	74.00	-14.35	1.00 V	0	46.56	13.09
8	#7236.00	46.73 AV	54.00	-7.27	1.00 V	0	33.64	13.09

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. " # ": The radiated frequency is out of the restricted band.



CHANNEL	TX Channel 6	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2437.00	97.62 PK			1.58 H	53	94.69	2.93
2	*2437.00	93.32 AV			1.58 H	53	90.39	2.93
3	4874.00	55.27 PK	74.00	-18.73	3.80 H	328	49.52	5.75
4	4874.00	49.90 AV	54.00	-4.10	3.80 H	328	44.15	5.75
5	7311.00	60.63 PK	74.00	-13.37	1.00 H	35	47.10	13.53
6	7311.00	48.33 AV	54.00	-5.67	1.00 H	35	34.80	13.53
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2437.00	110.60 PK			1.81 V	221	107.67	2.93
2	*2437.00	106.10 AV			1.81 V	221	103.17	2.93
3	4874.00	55.69 PK	74.00	-18.31	1.00 V	16	49.94	5.75
4	4874.00	51.98 AV	54.00	-2.02	1.00 V	16	46.23	5.75
5	7311.00	60.25 PK	74.00	-13.75	1.00 V	214	46.72	13.53
6	7311.00	47.98 AV	54.00	-6.02	1.00 V	214	34.45	13.53

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



CHANNEL	TX Channel 11	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	96.15 PK			1.00 H	51	93.15	3.00
2	*2462.00	92.25 AV			1.00 H	51	89.25	3.00
3	2483.50	47.99 PK	74.00	-26.01	1.00 H	51	44.92	3.07
4	2483.50	38.69 AV	54.00	-15.31	1.00 H	51	35.62	3.07
5	4924.00	51.59 PK	74.00	-22.41	1.00 H	354	45.76	5.83
6	4924.00	44.95 AV	54.00	-9.05	1.00 H	354	39.12	5.83
7	7386.00	60.72 PK	74.00	-13.28	1.00 H	214	46.74	13.98
8	7386.00	48.68 AV	54.00	-5.32	1.00 H	214	34.70	13.98
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	110.23 PK			1.00 V	59	107.23	3.00
2	*2462.00	105.52 AV			1.00 V	59	102.52	3.00
3	2483.50	57.47 PK	74.00	-16.53	1.00 V	221	54.40	3.07
4	2483.50	50.75 AV	54.00	-3.25	1.00 V	221	47.68	3.07
5	4924.00	56.66 PK	74.00	-17.34	1.00 V	236	50.83	5.83
6	4924.00	51.59 AV	54.00	-2.41	1.00 V	236	45.76	5.83
7	7386.00	60.69 PK	74.00	-13.31	1.00 V	214	46.71	13.98
8	7386.00	48.26 AV	54.00	-5.74	1.00 V	214	34.28	13.98

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



802.11g

CHANNEL	TX Channel 1	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	50.84 PK	74.00	-23.16	1.00 H	24	48.04	2.80
2	2390.00	34.48 AV	54.00	-19.52	1.00 H	24	31.68	2.80
3	*2412.00	93.61 PK			1.00 H	25	90.75	2.86
4	*2412.00	84.14 AV			1.00 H	25	81.28	2.86
5	4824.00	53.69 PK	74.00	-20.31	2.10 H	36	48.03	5.66
6	4824.00	41.59 AV	54.00	-12.41	2.10 H	36	35.93	5.66
7	7326.00	60.58 PK	74.00	-13.42	1.00 H	325	46.96	13.62
8	7326.00	47.88 AV	54.00	-6.12	1.00 H	325	34.26	13.62
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	70.59 PK	74.00	-3.41	1.50 V	218	67.79	2.80
2	2390.00	51.88 AV	54.00	-2.12	1.50 V	218	49.08	2.80
3	*2412.00	107.26 PK			2.00 V	213	104.40	2.86
4	*2412.00	97.79 AV			2.00 V	213	94.93	2.86
5	4824.00	56.26 PK	74.00	-17.74	1.00 V	3	50.60	5.66
6	4824.00	42.26 AV	54.00	-11.74	1.00 V	3	36.60	5.66
7	#7236.00	60.25 PK	74.00	-13.75	1.00 V	325	47.16	13.09
8	#7236.00	47.88 AV	54.00	-6.12	1.00 V	325	34.79	13.09

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. " # ": The radiated frequency is out of the restricted band.



CHANNEL	TX Channel 6	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	47.59 PK	74.00	-26.41	1.00 H	52	44.79	2.80
2	2390.00	35.62 AV	54.00	-18.38	1.00 H	52	32.82	2.80
3	*2437.00	96.59 PK			1.00 H	52	93.66	2.93
4	*2437.00	86.75 AV			1.00 H	52	83.82	2.93
5	2483.50	47.88 PK	74.00	-26.12	1.00 H	52	44.81	3.07
6	2483.50	36.49 AV	54.00	-17.51	1.00 H	52	33.42	3.07
7	4874.00	54.69 PK	74.00	-19.31	1.00 H	35	48.94	5.75
8	4874.00	41.95 AV	54.00	-12.05	1.00 H	35	36.20	5.75
9	7311.00	60.25 PK	74.00	-13.75	2.10 H	36	46.72	13.53
10	7311.00	47.89 AV	54.00	-6.11	2.10 H	36	34.36	13.53
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	64.66 PK	74.00	-9.34	1.00 V	356	61.86	2.80
2	2390.00	48.12 AV	54.00	-5.88	1.00 V	356	45.32	2.80
3	*2437.00	110.27 PK			1.00 V	36	107.34	2.93
4	*2437.00	100.57 AV			1.00 V	36	97.64	2.93
5	2483.50	56.19 PK	74.00	-17.81	1.00 V	355	53.12	3.07
6	2483.50	49.84 AV	54.00	-4.16	1.00 V	355	46.77	3.07
7	4874.00	66.89 PK	74.00	-7.11	1.00 V	318	61.14	5.75
8	4874.00	47.40 AV	54.00	-6.60	1.00 V	318	41.65	5.75
9	7311.00	65.44 PK	74.00	-8.56	1.00 V	32	51.91	13.53
10	7311.00	48.51 AV	54.00	-5.49	1.00 V	32	34.98	13.53

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



CHANNEL	TX Channel 11	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	93.66 PK			1.00 H	53	90.66	3.00
2	*2462.00	84.27 AV			1.00 H	53	81.27	3.00
3	2483.50	48.01 PK	74.00	-25.99	1.00 H	53	44.94	3.07
4	2483.50	37.52 AV	54.00	-16.48	1.00 H	53	34.45	3.07
5	4924.00	53.66 PK	74.00	-20.34	2.15 H	360	47.83	5.83
6	4924.00	41.89 AV	54.00	-12.11	2.15 H	360	36.06	5.83
7	7386.00	61.25 PK	74.00	-12.75	1.00 H	358	47.27	13.98
8	7386.00	48.26 AV	54.00	-5.74	1.00 H	358	34.28	13.98
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	107.94 PK			1.90 V	59	104.94	3.00
2	*2462.00	98.01 AV			1.90 V	59	95.01	3.00
3	2483.50	68.95 PK	74.00	-5.05	1.00 V	58	65.88	3.07
4	2483.50	51.03 AV	54.00	-2.97	1.00 V	58	47.96	3.07
5	4924.00	56.98 PK	74.00	-17.02	1.00 V	245	51.15	5.83
6	4924.00	41.49 AV	54.00	-12.51	1.00 V	245	35.66	5.83
7	7386.00	60.59 PK	74.00	-13.41	1.00 V	35	46.61	13.98
8	7386.00	48.59 AV	54.00	-5.41	1.00 V	35	34.61	13.98

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



802.11n 20MHz

CHANNEL	TX Channel 1	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	48.55 PK	74.00	-25.45	2.00 H	267	45.75	2.80
2	2390.00	37.12 AV	54.00	-16.88	2.00 H	267	34.32	2.80
3	*2412.00	94.26 PK			1.00 H	70	91.40	2.86
4	*2412.00	85.66 AV			1.00 H	70	82.80	2.86
5	4824.00	55.89 PK	74.00	-18.11	1.00 H	158	50.23	5.66
6	4824.00	38.54 AV	54.00	-15.46	1.00 H	158	32.88	5.66
7	#7236.00	58.87 PK	74.00	-15.13	1.00 H	177	45.78	13.09
8	#7236.00	45.28 AV	54.00	-8.72	1.00 H	177	32.19	13.09
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	68.23 PK	74.00	-5.77	1.00 V	142	65.43	2.80
2	2390.00	51.85 AV	54.00	-2.15	1.00 V	142	49.05	2.80
3	*2412.00	105.33 PK			2.00 V	47	102.47	2.86
4	*2412.00	95.48 AV			2.00 V	47	92.62	2.86
5	4824.00	51.30 PK	74.00	-22.70	1.00 V	158	45.64	5.66
6	4824.00	37.66 AV	54.00	-16.34	1.00 V	158	32.00	5.66
7	#7236.00	58.90 PK	74.00	-15.10	1.00 V	169	45.81	13.09
8	#7236.00	44.26 AV	54.00	-9.74	1.00 V	169	31.17	13.09

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. " # ": The radiated frequency is out of the restricted band.



CHANNEL	TX Channel 6	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	53.77 PK	74.00	-20.23	2.00 H	157	50.97	2.80
2	2390.00	40.88 AV	54.00	-13.12	2.00 H	157	38.08	2.80
3	*2437.00	103.95 PK			1.00 H	70	101.02	2.93
4	*2437.00	94.20 AV			1.00 H	70	91.27	2.93
5	2483.50	53.51 PK	74.00	-20.49	1.00 H	158	50.44	3.07
6	2483.50	43.10 AV	54.00	-10.90	1.00 H	158	40.03	3.07
7	4874.00	64.53 PK	74.00	-9.47	1.00 H	145	58.78	5.75
8	4874.00	46.22 AV	54.00	-7.78	1.00 H	145	40.47	5.75
9	7311.00	62.95 PK	74.00	-11.05	2.00 H	172	49.42	13.53
10	7311.00	50.14 AV	54.00	-3.86	2.00 H	172	36.61	13.53
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	67.65 PK	74.00	-6.35	1.00 V	61	64.85	2.80
2	2390.00	48.46 AV	54.00	-5.54	1.00 V	61	45.66	2.80
3	*2437.00	114.25 PK			1.00 V	177	111.32	2.93
4	*2437.00	103.79 AV			1.00 V	177	100.86	2.93
5	2483.50	71.10 PK	74.00	-2.90	2.00 V	157	68.03	3.07
6	2483.50	51.80 AV	54.00	-2.20	2.00 V	157	48.73	3.07
7	4874.00	67.78 PK	74.00	-6.22	1.00 V	220	62.03	5.75
8	4874.00	48.59 AV	54.00	-5.41	1.00 V	220	42.84	5.75
9	7311.00	63.31 PK	74.00	-10.69	1.00 V	143	49.78	13.53
10	7311.00	49.58 AV	54.00	-4.42	1.00 V	143	36.05	13.53

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



CHANNEL	TX Channel 11	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	95.81 PK			2.00 H	70	92.81	3.00
2	*2462.00	86.84 AV			2.00 H	70	83.84	3.00
3	2483.50	51.34 PK	74.00	-22.66	1.00 H	200	48.27	3.07
4	2483.50	41.63 AV	54.00	-12.37	1.00 H	200	38.56	3.07
5	4924.00	52.51 PK	74.00	-21.49	1.00 H	178	46.68	5.83
6	4924.00	38.29 AV	54.00	-15.71	1.00 H	178	32.46	5.83
7	7386.00	58.44 PK	74.00	-15.56	1.00 H	200	44.46	13.98
8	7386.00	45.15 AV	54.00	-8.85	1.00 H	200	31.17	13.98
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2462.00	106.87 PK			1.00 V	158	103.87	3.00
2	*2462.00	96.42 AV			1.00 V	158	93.42	3.00
3	2483.50	70.34 PK	74.00	-3.66	1.50 V	144	67.27	3.07
4	2483.50	51.94 AV	54.00	-2.06	1.50 V	144	48.87	3.07
5	4924.00	55.03 PK	74.00	-18.97	1.00 V	158	49.20	5.83
6	4924.00	38.01 AV	54.00	-15.99	1.00 V	158	32.18	5.83
7	7386.00	59.09 PK	74.00	-14.91	1.00 V	158	45.11	13.98
8	7386.00	45.10 AV	54.00	-8.90	1.00 V	158	31.12	13.98

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



802.11n 40MHz

CHANNEL	TX Channel 3	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	49.53 PK	74.00	-24.47	1.00 H	177	46.73	2.80
2	2390.00	36.43 AV	54.00	-17.57	1.00 H	177	33.63	2.80
3	*2422.00	95.91 PK			1.00 H	187	93.02	2.89
4	*2422.00	85.74 AV			1.00 H	187	82.85	2.89
5	4844.00	53.19 PK	74.00	-20.81	1.00 H	177	47.50	5.69
6	4844.00	41.28 AV	54.00	-12.72	1.00 H	177	35.59	5.69
7	7266.00	59.11 PK	74.00	-14.89	1.00 H	89	45.84	13.27
8	7266.00	45.41 AV	54.00	-8.59	1.00 H	89	32.14	13.27
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	70.17 PK	74.00	-3.83	1.50 V	49	67.37	2.80
2	2390.00	51.36 AV	54.00	-2.64	1.50 V	49	48.56	2.80
3	*2422.00	104.93 PK			2.00 V	52	102.04	2.89
4	*2422.00	95.31 AV			2.00 V	52	92.42	2.89
5	4844.00	54.53 PK	74.00	-19.47	1.00 V	157	48.84	5.69
6	4844.00	39.56 AV	54.00	-14.44	1.00 V	157	33.87	5.69
7	7266.00	58.89 PK	74.00	-15.11	1.00 V	112	45.62	13.27
8	7266.00	45.45 AV	54.00	-8.55	1.00 V	112	32.18	13.27

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



CHANNEL	TX Channel 6	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	49.55 PK	74.00	-24.45	1.50 H	170	46.75	2.80
2	2390.00	37.46 AV	54.00	-16.54	1.50 H	170	34.66	2.80
3	*2437.00	94.79 PK			2.00 H	137	91.86	2.93
4	*2437.00	84.52 AV			2.00 H	137	81.59	2.93
5	2483.50	49.00 PK	74.00	-25.00	1.00 H	217	45.93	3.07
6	2483.50	39.88 AV	54.00	-14.12	1.00 H	217	36.81	3.07
7	4874.00	53.96 PK	74.00	-20.04	1.00 H	148	48.21	5.75
8	4874.00	38.66 AV	54.00	-15.34	1.00 H	148	32.91	5.75
9	7311.00	57.59 PK	74.00	-16.41	1.00 H	200	44.06	13.53
10	7311.00	44.60 AV	54.00	-9.40	1.00 H	200	31.07	13.53
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	2390.00	68.38 PK	74.00	-5.62	1.00 V	158	65.58	2.80
2	2390.00	49.78 AV	54.00	-4.22	1.00 V	158	46.98	2.80
3	*2437.00	104.92 PK			1.00 V	157	101.99	2.93
4	*2437.00	94.72 AV			1.00 V	157	91.79	2.93
5	2483.50	68.96 PK	74.00	-5.04	1.00 V	39	65.89	3.07
6	2483.50	51.06 AV	54.00	-2.94	1.00 V	39	47.99	3.07
7	4874.00	51.20 PK	74.00	-22.80	1.00 V	158	45.45	5.75
8	4874.00	38.20 AV	54.00	-15.80	1.00 V	158	32.45	5.75
9	7311.00	58.88 PK	74.00	-15.12	1.00 V	217	45.35	13.53
10	7311.00	44.71 AV	54.00	-9.29	1.00 V	217	31.18	13.53

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



CHANNEL	TX Channel 9	DETECTOR FUNCTION	Peak (PK)
FREQUENCY RANGE	1GHz ~ 25GHz		Average (AV)

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2452.00	90.55 PK			1.50 H	158	87.58	2.97
2	*2452.00	83.75 AV			1.50 H	158	80.78	2.97
3	2483.50	51.38 PK	74.00	-22.62	1.50 H	134	48.31	3.07
4	2483.50	42.29 AV	54.00	-11.71	1.50 H	134	39.22	3.07
5	4904.00	53.61 PK	74.00	-20.39	1.00 H	152	47.81	5.80
6	4904.00	39.52 AV	54.00	-14.48	1.00 H	152	33.72	5.80
7	7356.00	58.11 PK	74.00	-15.89	1.00 H	158	44.31	13.80
8	7356.00	45.57 AV	54.00	-8.43	1.00 H	158	31.77	13.80
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
NO.	FREQ. (MHz)	EMISSION LEVEL (dBuV/m)	LIMIT (dBuV/m)	MARGIN (dB)	ANTENNA HEIGHT (m)	TABLE ANGLE (Degree)	RAW VALUE (dBuV)	CORRECTION FACTOR (dB/m)
1	*2452.00	103.28 PK			1.50 V	131	100.31	2.97
2	*2452.00	93.35 AV			1.50 V	131	90.38	2.97
3	2483.50	67.63 PK	74.00	-6.37	1.50 V	140	64.56	3.07
4	2483.50	51.37 AV	54.00	-2.63	1.50 V	140	48.30	3.07
5	4904.00	51.86 PK	74.00	-22.14	1.00 V	153	46.06	5.80
6	4904.00	37.29 AV	54.00	-16.71	1.00 V	153	31.49	5.80
7	7356.00	58.91 PK	74.00	-15.09	1.00 V	178	45.11	13.80
8	7356.00	45.56 AV	54.00	-8.44	1.00 V	178	31.76	13.80

REMARKS:

1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.



4.3 6dB BANDWIDTH MEASUREMENT

4.3.1 LIMITS OF 6dB BANDWIDTH MEASUREMENT

The minimum of 6dB Bandwidth Measurement is 0.5 MHz.

4.3.2 TEST INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
Power Sensor	Keysight	U2021XA	MY55060016	May 19,17	May 18,18
Power Sensor	Keysight	U2021XA	MY55060018	May 19,17	May 18,18
Digital Multimeter	FLUKE	15B	A1220010DG	Oct. 13, 16	Oct.12, 17
Humid & Temp Programmable Tester	Haida	HD-2257	110807201	Sep.05,16	Sep. 04,17
Oscilloscope	Agilent	DSO9254A	MY51260160	Nov. 04,16	Nov. 03,17
Signal Analyzer	Rohde & Schwarz	FSV7	102331	Nov. 04,16	Nov. 03,17
Signal Generator	Agilent	N5183A	MY50140980	Nov. 04,16	Nov. 03,17
Agile Signal Generator	Agilent	8645A	Agilent	Aug.08, 16	Aug.07, 17
Spectrum Analyzer	Keysight	N9020A	MY55400499	Apr. 10,17	Apr. 09,18
MXG-B RF Vector Signal Generator	Keysight	N5182B	MY56200288	Dec.05, 16	Dec. 04, 17
BLUETOOTH TESTER	Rohde&Schwarz	CBT32	100811	Aug.08, 16	Aug.07, 17
Attenuator	MINI	BW-S10W2+	S130129FGE2	N/A	N/A

NOTE:

1. The test was performed in RF Oven room.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.

4.3.3 TEST PROCEDURE

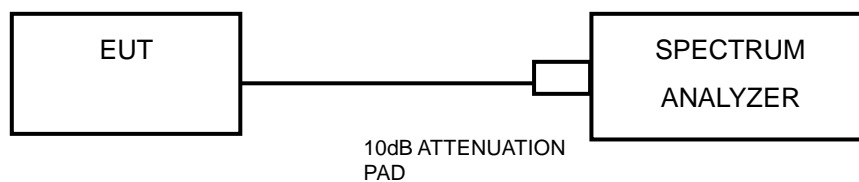
1. Set resolution bandwidth (RBW) = 100KHz
2. Set the video bandwidth (VBW) $\geq 3 \times$ RBW, Detector = Peak.
3. Trace mode = max hold.
4. Sweep = auto couple.
5. Measure the maximum width of the emission that is constrained by the frequencies associated with the two amplitude points (upper and lower) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

4.3.4 DEVIATION FROM TEST STANDARD

No deviation.



4.3.5 TEST SETUP



4.3.6 EUT OPERATING CONDITIONS

The software provided by client to enable the EUT under transmission condition continuously at lowest, middle and highest channel frequencies individually.



4.3.7 TEST RESULTS

802.11b

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
1	2412	10.10	0.5	PASS
6	2437	10.12	0.5	PASS
11	2462	10.11	0.5	PASS

802.11g

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
1	2412	16.65	0.5	PASS
6	2437	16.65	0.5	PASS
11	2462	16.65	0.5	PASS

802.11n 20MHz

CHANNEL	FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2412	17.87	17.85	0.5	PASS
6	2437	17.87	17.87	0.5	PASS
11	2462	17.87	17.86	0.5	PASS

802.11n 40MHz

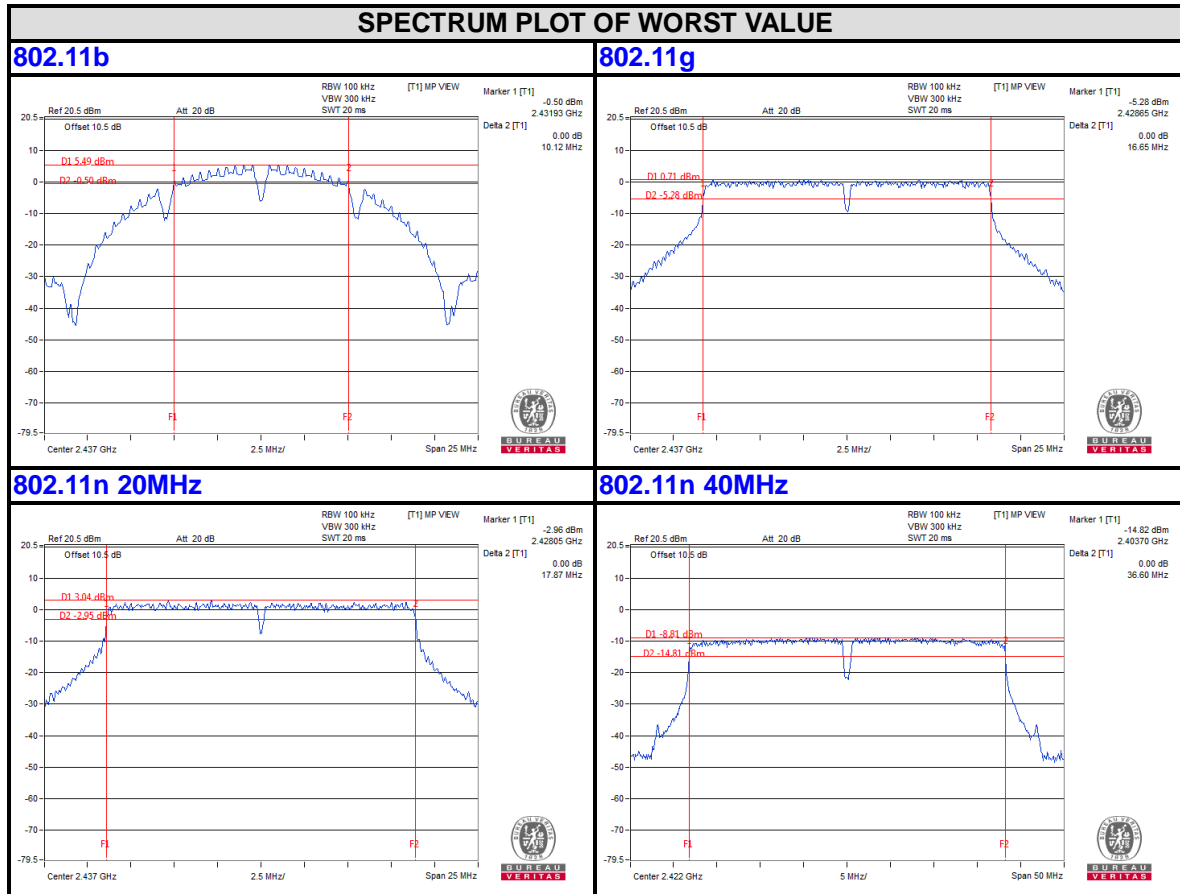
CHANNEL	FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
3	2422	36.60	36.57	0.5	PASS
6	2437	36.57	36.58	0.5	PASS
9	2452	36.58	36.58	0.5	PASS



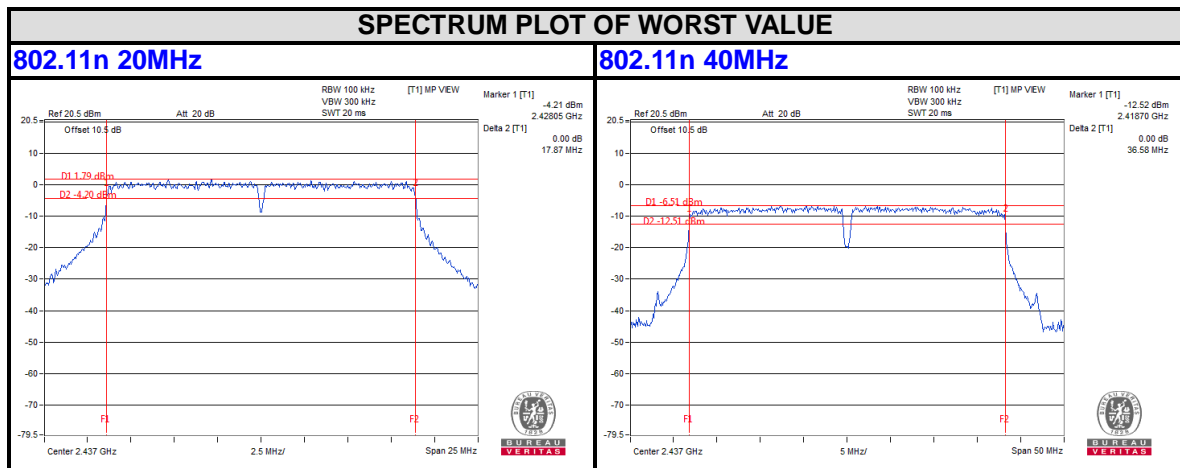
BUREAU
VERITAS

Test Report No.: RF170512N051

CHAIN 0



CHAIN 1

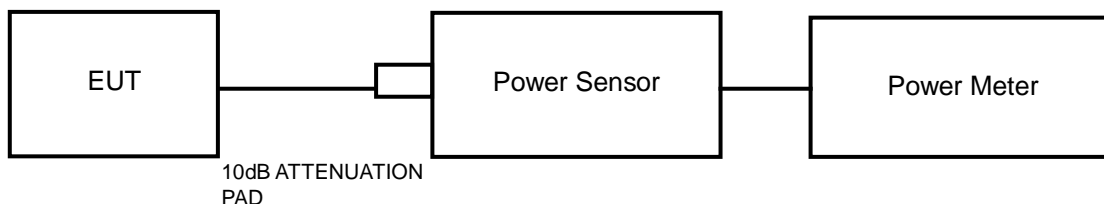


4.4 CONDUCTED OUTPUT POWER

4.4.1 LIMITS OF CONDUCTED OUTPUT POWER MEASUREMENT

For systems using digital modulation in the 2400–2483.5 MHz band: 1 Watt (30dBm).

4.4.2 TEST SETUP



4.4.3 TEST INSTRUMENTS

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
Power Sensor	Keysight	U2021XA	MY55060016	May 19,17	May 18,18
Power Sensor	Keysight	U2021XA	MY55060018	May 19,17	May 18,18
Digital Multimeter	FLUKE	15B	A1220010DG	Oct. 13, 16	Oct.12, 17
Humid & Temp Programmable Tester	Haida	HD-2257	110807201	Sep.05,16	Sep. 04,17
Oscilloscope	Agilent	DSO9254A	MY51260160	Nov. 04,16	Nov. 03,17
Signal Analyzer	Rohde & Schwarz	FSV7	102331	Nov. 04,16	Nov. 03,17
Signal Generator	Agilent	N5183A	MY50140980	Nov. 04,16	Nov. 03,17
Agile Signal Generator	Agilent	8645A	Agilent	Aug.08, 16	Aug.07, 17
Spectrum Analyzer	Keysight	N9020A	MY55400499	Apr. 10,17	Apr. 09,18
MXG-B RF Vector Signal Generator	Keysight	N5182B	MY56200288	Dec.05, 16	Dec. 04, 17
BLUETOOTH TESTER	Rohde&Schwarz	CBT32	100811	Aug.08, 16	Aug.07, 17
Attenuator	MINI	BW-S10W2+	S130129FGE2	N/A	N/A

NOTE:

1. The test was performed in RF Oven room.
2. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to CEPREI/CHINA, GRGT/CHINA and NIM/CHINA.



4.4.4 TEST PROCEDURES

A peak power sensor was used on the output port of the EUT. A peak power meter was used to read the response of the peak power sensor. Record the peak power level.

4.4.5 DEVIATION FROM TEST STANDARD

No deviation.

4.4.6 EUT OPERATING CONDITIONS

The software provided by client to enable the EUT under transmission condition continuously at lowest, middle and highest channel frequencies individually.



4.4.7 TEST RESULTS

MAXIMUM PEAK OUTPUT POWER

802.11b

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER (dBm)	PEAK POWER (mW)	PEAK POWER LIMIT (W)	PASS/FAIL
1	2412	18.14	65.163	1	PASS
6	2437	18.85	76.736	1	PASS
11	2462	18.59	72.277	1	PASS

802.11g

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER (dBm)	PEAK POWER (mW)	PEAK POWER LIMIT (W)	PASS/FAIL
1	2412	20.08	101.859	1	PASS
6	2437	23.01	199.986	1	PASS
11	2462	20.19	104.472	1	PASS

802.11n 20MHz

CHAN.	FREQ (MHz)	PEAK POWER (dBm)		PEAK POWER (mW)		TOTAL POWER (mW)	TOTAL POWER (dBm)	PEAK POWER LIMIT (W)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	17.65	17.08	58.210	51.050	109.260	20.38	1	PASS
6	2437	24.41	24.96	276.058	313.329	589.387	27.70	1	PASS
11	2462	19.03	18.47	79.983	70.307	150.290	21.77	1	PASS

802.11n 40MHz

CHAN.	FREQ (MHz)	PEAK POWER (dBm)		PEAK POWER (mW)		TOTAL POWER (mW)	TOTAL POWER (dBm)	PEAK POWER LIMIT (W)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
3	2422	16.55	16.02	45.186	39.994	85.180	19.30	1	PASS
6	2437	19.04	18.45	80.168	69.984	150.152	21.77	1	PASS
9	2452	17.32	16.77	53.951	47.534	101.485	20.06	1	PASS



4.4.7.2 AVERAGE OUTPUT POWER (FOR REFERENCE)

The average power sensor was used on the output port of the EUT. A power meter was used to read the response of the power sensor. Record the power level.

802.11b

CHANNEL	CHANNEL FREQUENCY (MHz)	AVERAGE POWER (dBm)	AVG. POWER (mW)	PEAK POWER LIMIT (W)	PASS / FAIL
1	2412	14.56	28.576	1	PASS
6	2437	15.19	33.037	1	PASS
11	2462	14.63	29.040	1	PASS

802.11g

CHANNEL	CHANNEL FREQUENCY (MHz)	AVERAGE POWER (dBm)	AVG. POWER (mW)	PEAK POWER LIMIT (W)	PASS / FAIL
1	2412	11.73	14.894	1	PASS
6	2437	14.62	28.973	1	PASS
11	2462	11.81	15.171	1	PASS



802.11n 20MHz

CHAN.	FREQ. (MHz)	AVG. POWER (dBm)		AVG. POWER (mW)		TOTAL POWER (mW)	TOTAL POWER (dBm)	PEAK POWER LIMIT (W)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	8.96	8.39	7.870	6.902	14.772	11.69	1	PASS
6	2437	16.46	16.01	44.259	39.902	84.161	19.25	1	PASS
11	2462	10.32	9.64	10.765	9.204	19.969	13.00	1	PASS

802.11n 40MHz

CHAN.	FREQ. (MHz)	AVG. POWER (dBm)		AVG. POWER (mW)		TOTAL POWER (mW)	TOTAL POWER (dBm)	PEAK POWER LIMIT (W)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
3	2422	8.21	7.69	6.622	5.875	12.497	10.97	1	PASS
6	2437	11.12	10.48	12.942	11.169	24.111	13.82	1	PASS
9	2452	9.37	8.86	8.650	7.691	16.341	12.13	1	PASS

4.5 POWER SPECTRAL DENSITY MEASUREMENT

4.5.1 LIMITS OF POWER SPECTRAL DENSITY MEASUREMENT

The Maximum of Power Spectral Density Measurement is 8dBm/3KHz.

4.5.2 TEST SETUP



4.5.3 TEST INSTRUMENTS

Refer to section 4.3.2 to get information of above instrument.

4.5.4 TEST PROCEDURE

- a) Set instrument center frequency to DTS channel center frequency.
- b) Set span to at least 1.5 times the OBW.
- c) Set RBW to: 3KHz
- d) Set VBW $\geq 3 \times$ RBW.
- e) Detector = peak
- f) Ensure that the number of measurement points in the sweep $\geq 2 \times$ span/RBW.
- g) Sweep time = auto couple.
- h) Use the peak marker function to determine the maximum amplitude level.

4.5.5 DEVIATION FROM TEST STANDARD

No deviation.



4.5.6 EUT OPERATING CONDITION

Same as item 4.3.6.

4.5.7 TEST RESULTS

802.11b

Channel	FREQ. (MHz)	PSD (dBm/3kHz)	Limit (dBm/3kHz)	PASS /FAIL
1	2412	-15.23	8.00	PASS
6	2437	-14.61	8.00	PASS
11	2462	-14.81	8.00	PASS

802.11g

Channel	FREQ. (MHz)	PSD (dBm/3kHz)	Limit (dBm/3kHz)	PASS /FAIL
1	2412	-16.35	8.00	PASS
6	2437	-13.62	8.00	PASS
11	2462	-16.30	8.00	PASS

802.11n 20MHz

TX chain	Channel	Freq. (MHz)	PSD (dBm/3KHz)	10 log (N=2) dB	TOTAL PSD (dBm/3KHz)	Limit (dBm/3KHz)	PASS /FAIL
0	1	2412	-18.59	3.01	-15.58	5.99	PASS
	6	2437	-11.21	3.01	-8.20	5.99	PASS
	11	2462	-17.18	3.01	-14.17	5.99	PASS
1	1	2412	-19.60	3.01	-16.59	5.99	PASS
	6	2437	-12.44	3.01	-9.43	5.99	PASS
	11	2462	-17.57	3.01	-14.56	5.99	PASS

Remark: Due ANT gain more than 6dBi $[5+10\log(N=2)=8.01>6]$, so limit 8dBm need to be changed to $[8+6-(5+10\log(N=2))]=5.99$.

802.11n 40MHz

TX chain	Channel	Freq. (MHz)	PSD (dBm/3KHz)	10 log (N=2) dB	TOTAL PSD (dBm/3KHz)	Limit (dBm/3KHz)	PASS /FAIL
0	1	2412	-20.80	3.01	-17.79	5.99	PASS
	6	2437	-19.14	3.01	-16.13	5.99	PASS
	11	2462	-19.47	3.01	-16.46	5.99	PASS
1	1	2412	-22.07	3.01	-19.06	5.99	PASS
	6	2437	-19.09	3.01	-16.08	5.99	PASS
	11	2462	-21.18	3.01	-18.17	5.99	PASS

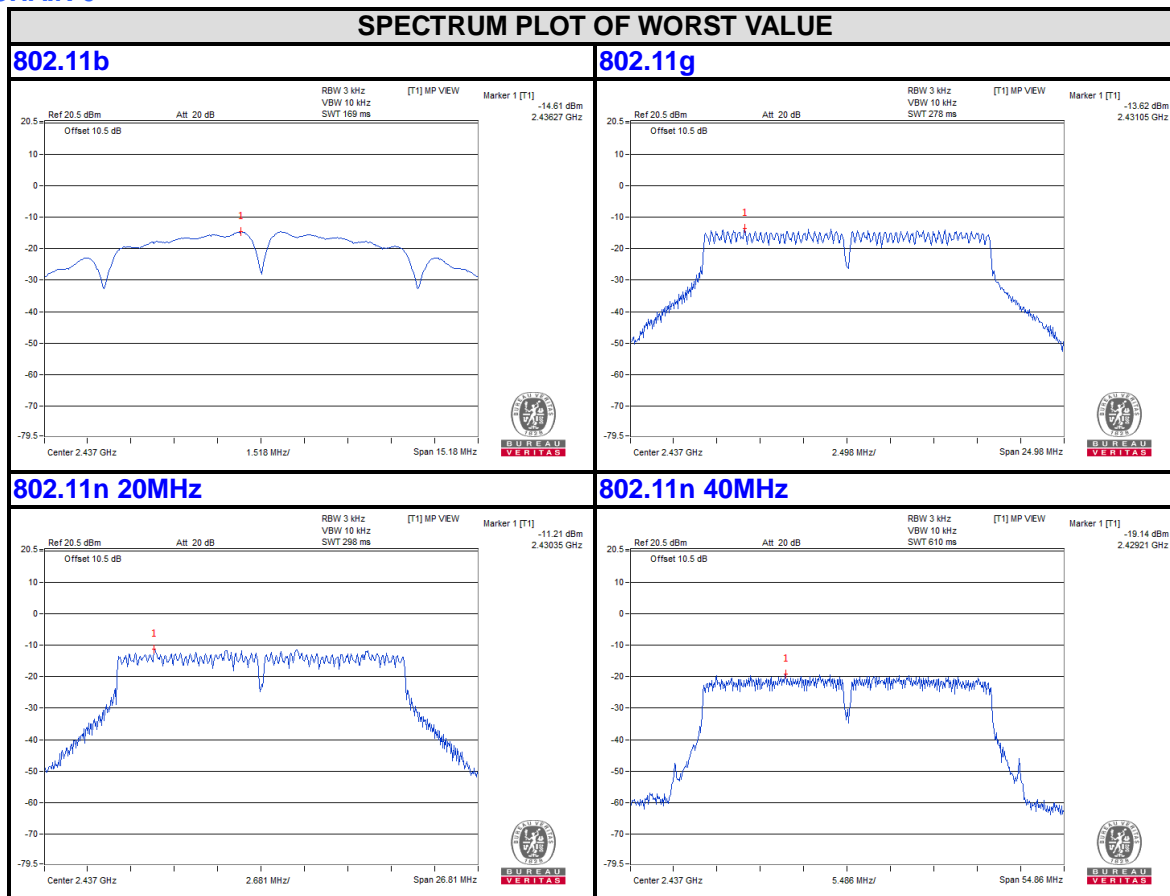
Remark: Due ANT gain more than 6dBi $[5+10\log(N=2)=8.01>6]$, so limit 8dBm need to be changed to $8+[6-(5+10\log(N=2))]=5.99$.



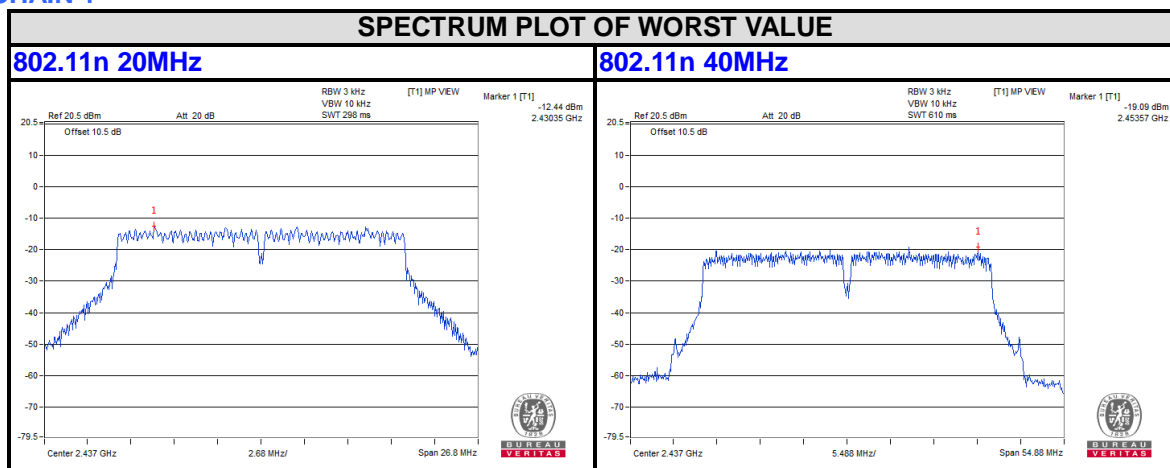
BUREAU
VERITAS

Test Report No.: RF170512N051

CHAIN 0



CHAIN 1

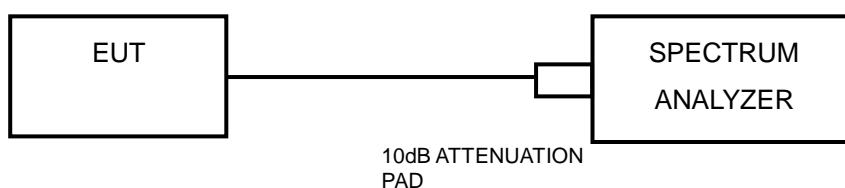


4.6 OUT OF BAND EMISSION MEASUREMENT

4.6.1 LIMITS OF OUT OF BAND EMISSION MEASUREMENT

Below -20dB of the highest emission level of operating band (in 100kHz Resolution Bandwidth).

4.6.2 TEST SETUP



4.6.3 TEST INSTRUMENTS

Refer to section 4.3.2 to get information of above instrument.

4.6.4 TEST PROCEDURE

Measurement Procedure - Reference Level

1. Set the RBW = 100 kHz.
2. Set the VBW \geq 300 kHz.
3. Detector = peak.
4. Sweep time = auto couple.
5. Trace mode = max hold.
6. Allow trace to fully stabilize.
7. Use the peak marker function to determine the maximum power level in any 100 kHz band segment within the fundamental EBW.



Measurement Procedure –Unwanted Emission Level

1. Set RBW = 100 kHz.
2. Set VBW \geq 300 kHz.
3. Set span to encompass the spectrum to be examined
4. Detector = peak.
5. Trace Mode = max hold.
6. Sweep = auto couple.

4.6.5 DEVIATION FROM TEST STANDARD

No deviation.

4.6.6 EUT OPERATING CONDITION

Same as item 4.3.6



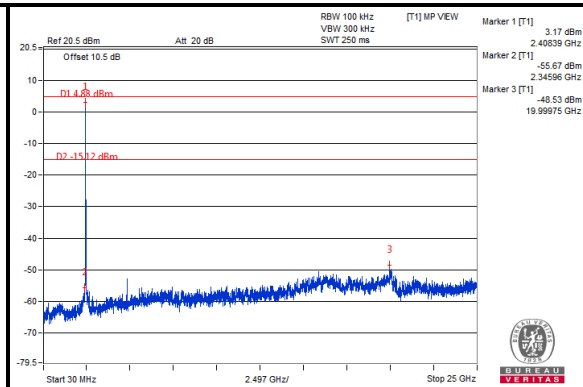
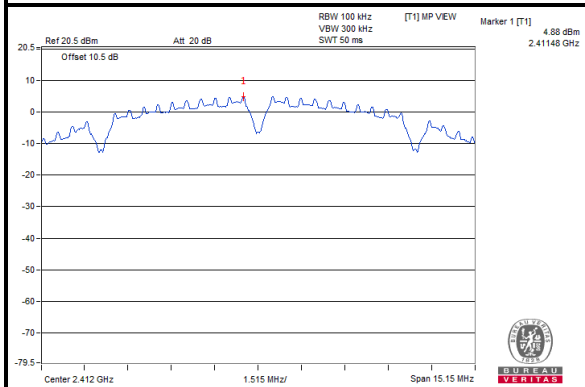
BUREAU
VERITAS

Test Report No.: RF170512N051

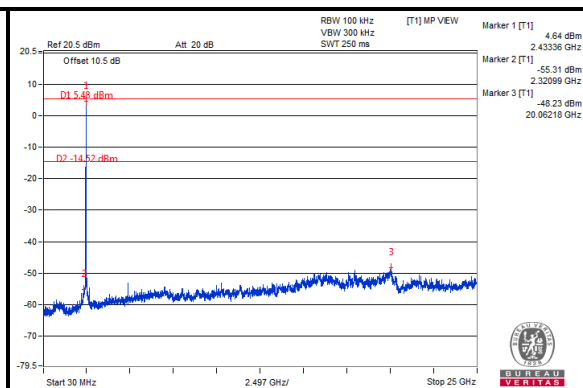
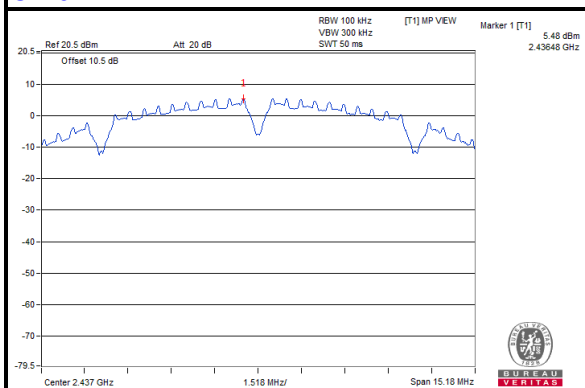
4.6.7 TEST RESULTS

802.11b

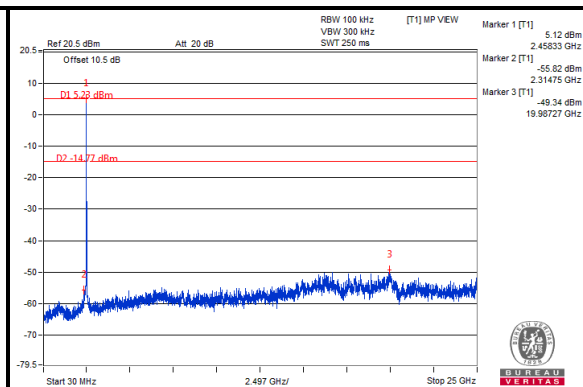
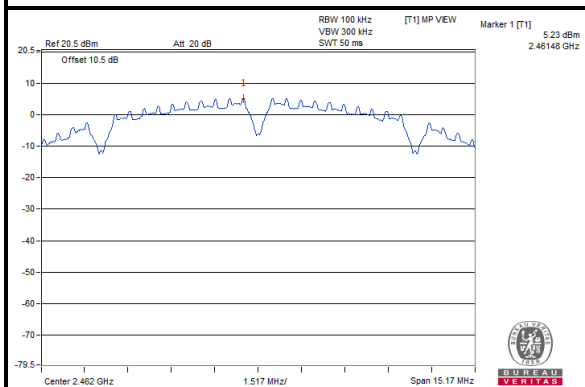
CH 1



CH 6



CH 11

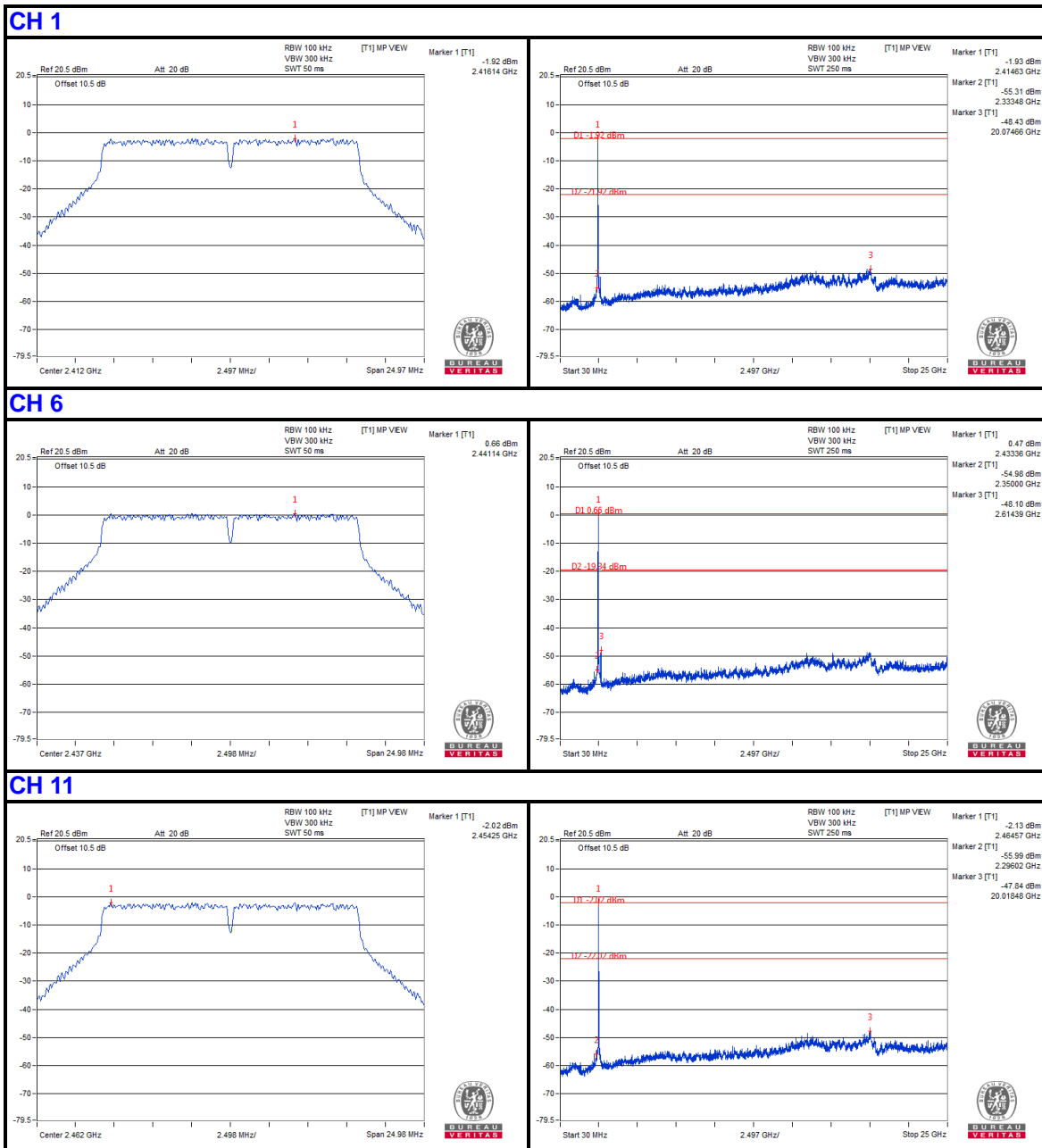




BUREAU
VERITAS

Test Report No.: RF170512N051

802.11g





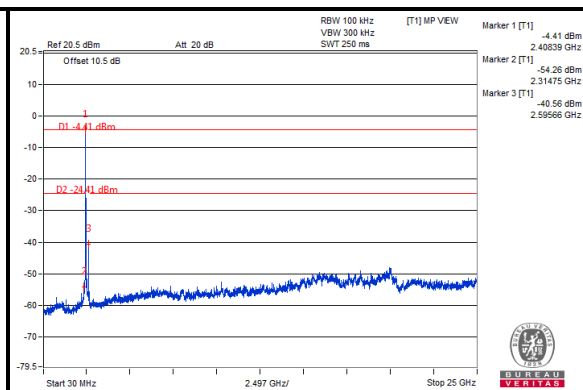
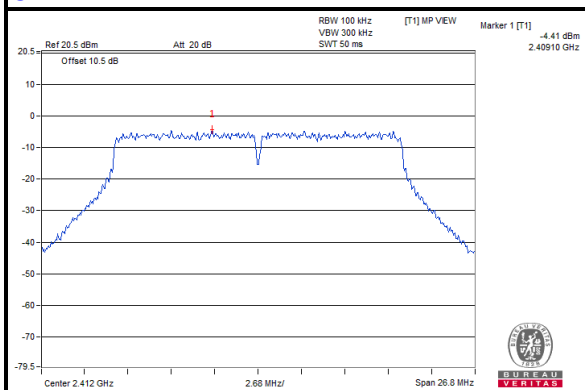
BUREAU
VERITAS

Test Report No.: RF170512N051

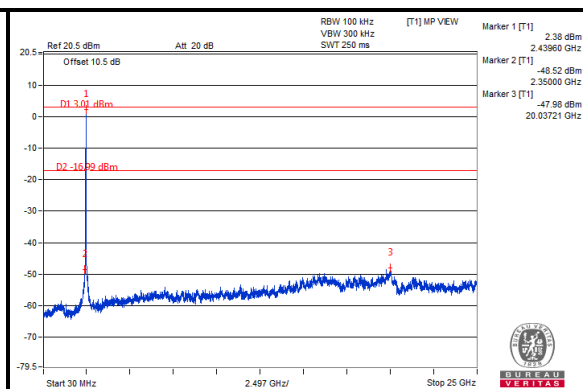
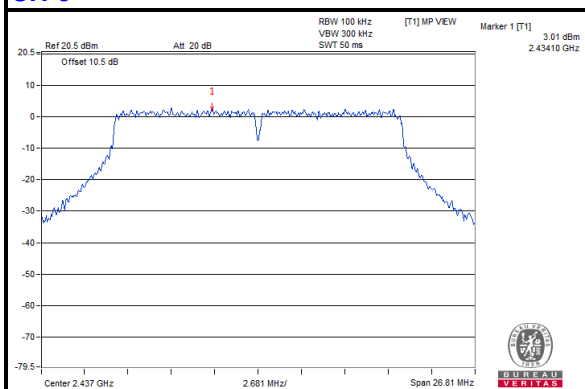
802.11n 20MHz

CHAIN 0

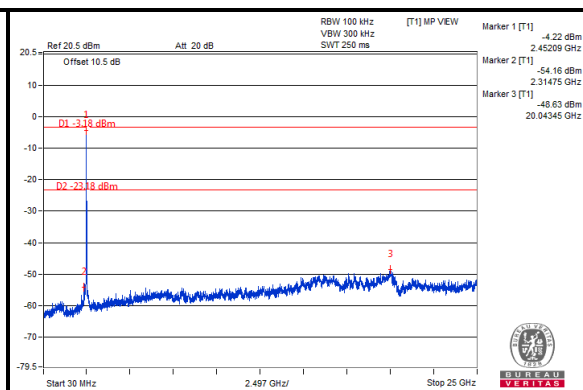
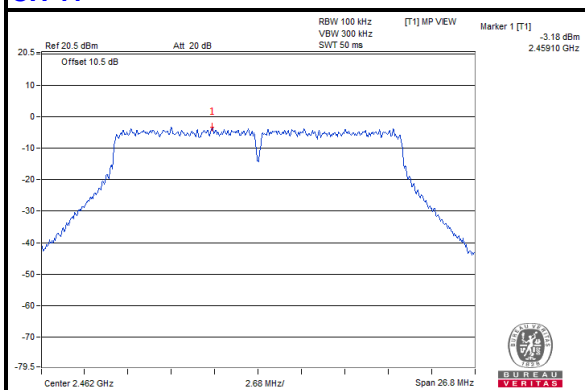
CH 1



CH 6



CH 11



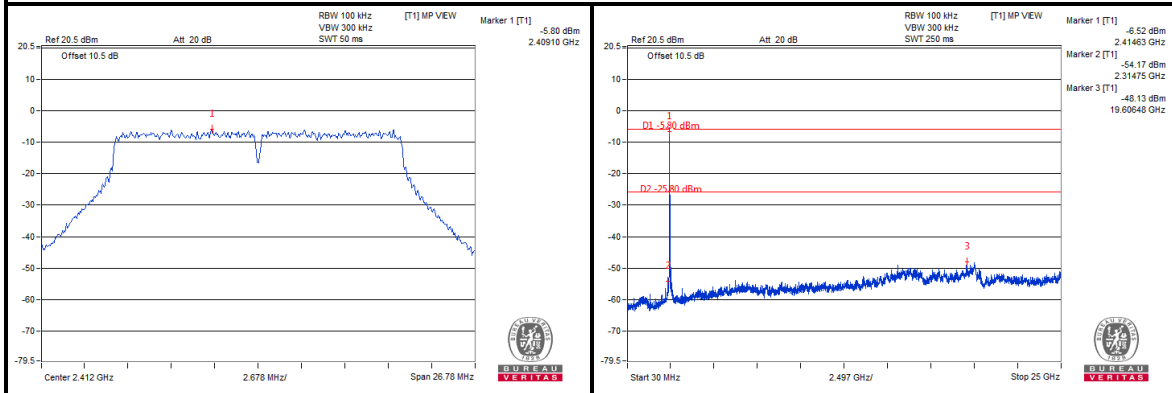


BUREAU
VERITAS

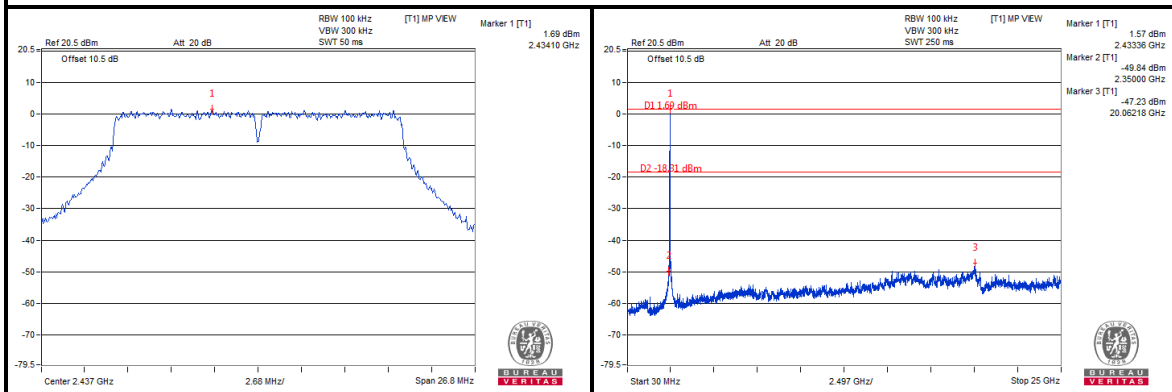
Test Report No.: RF170512N051

CHAIN 1

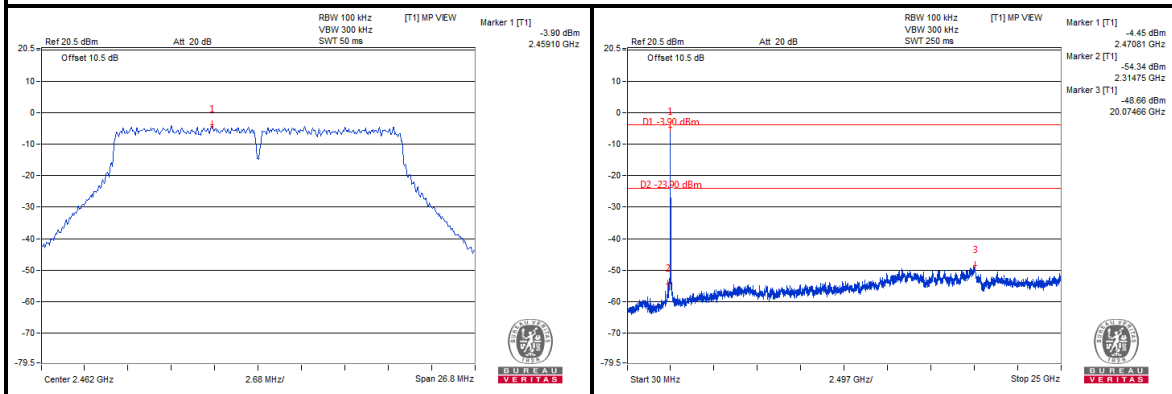
CH 1



CH 6



CH 11





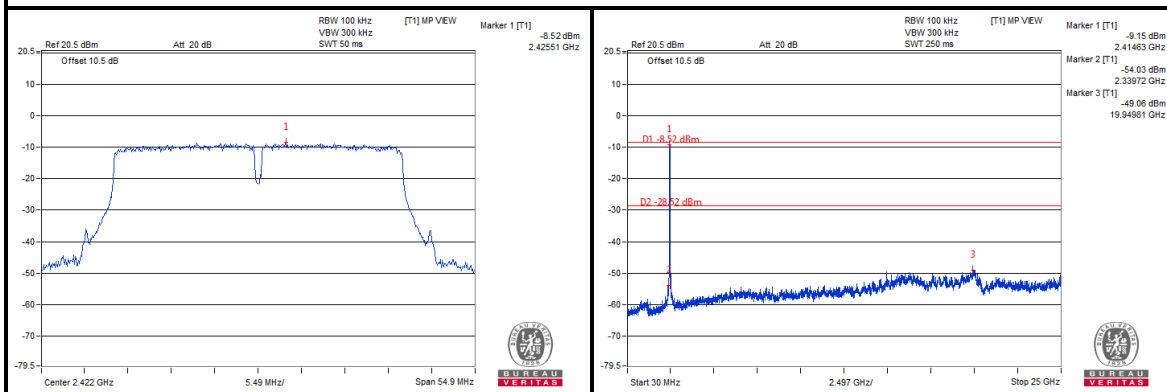
BUREAU
VERITAS

Test Report No.: RF170512N051

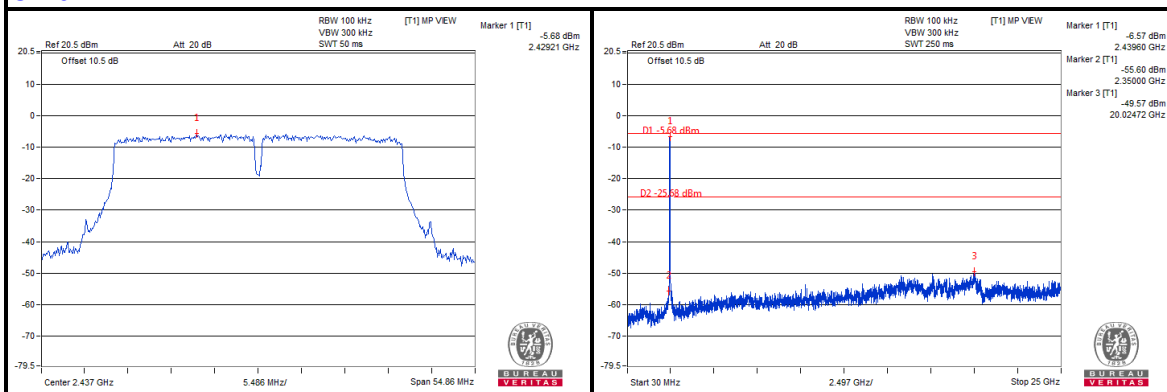
802.11n 40MHz

CHAIN 0

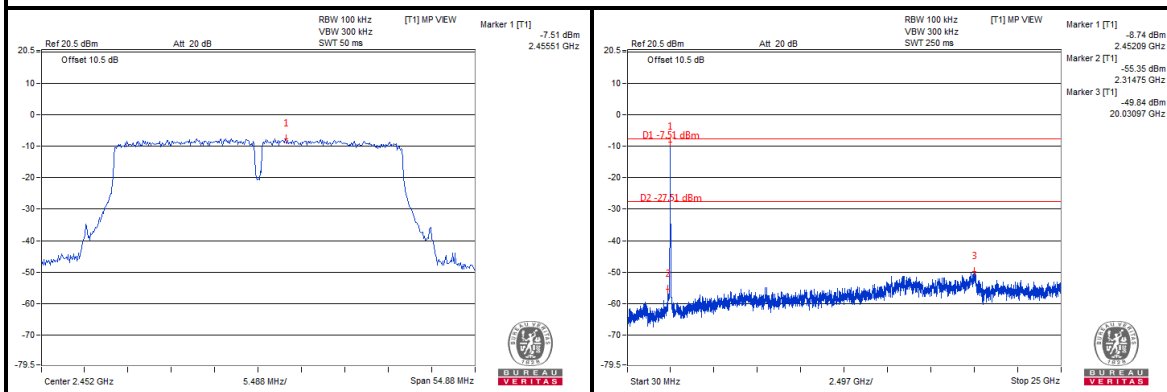
CH 3



CH 6



CH 9



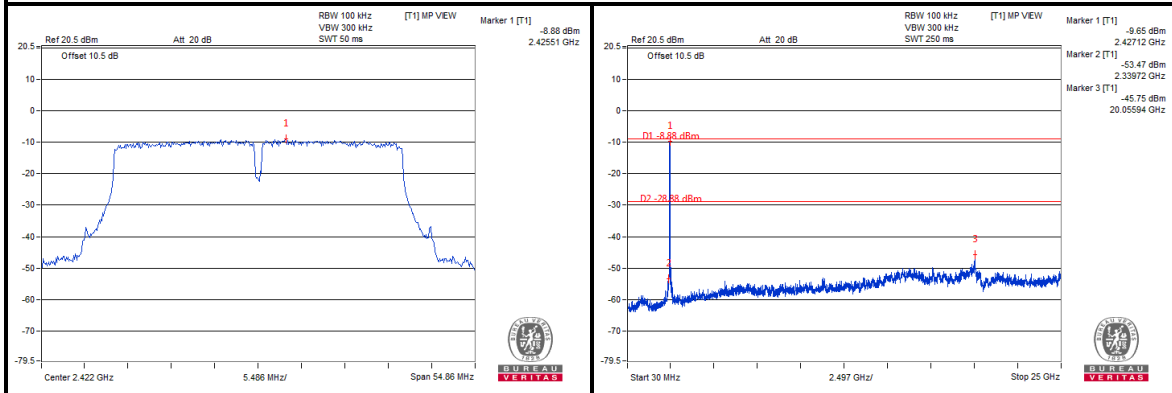


BUREAU
VERITAS

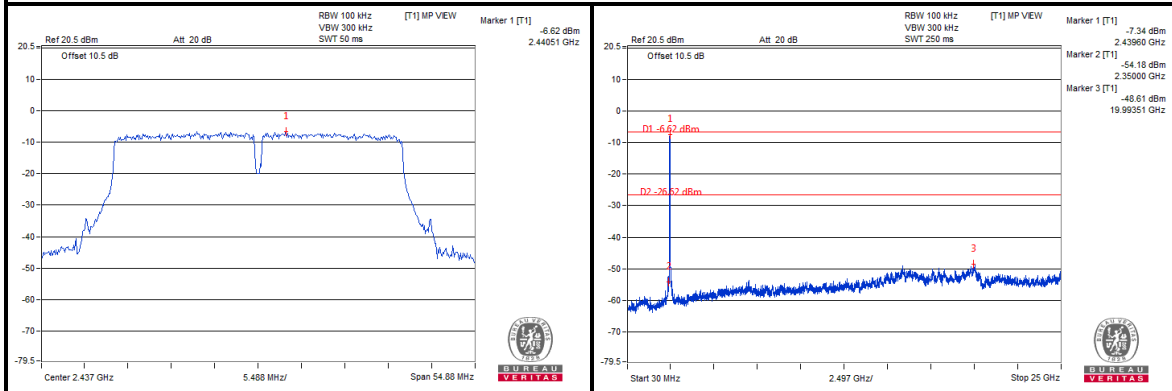
Test Report No.: RF170512N051

CHAIN 1

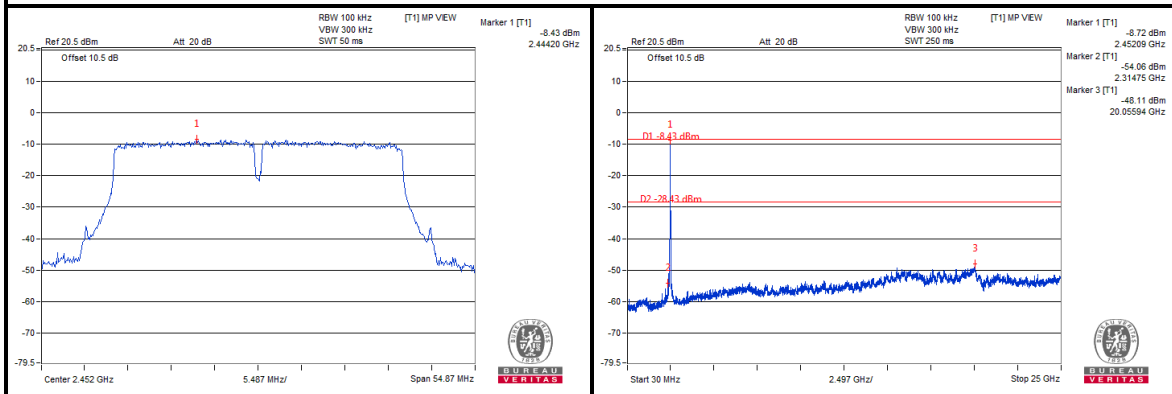
CH 3



CH 6



CH 9

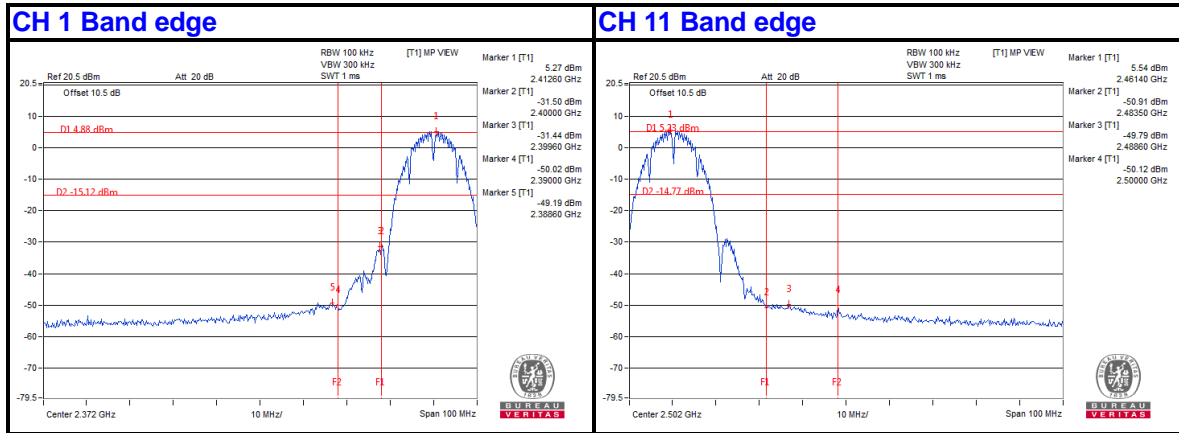




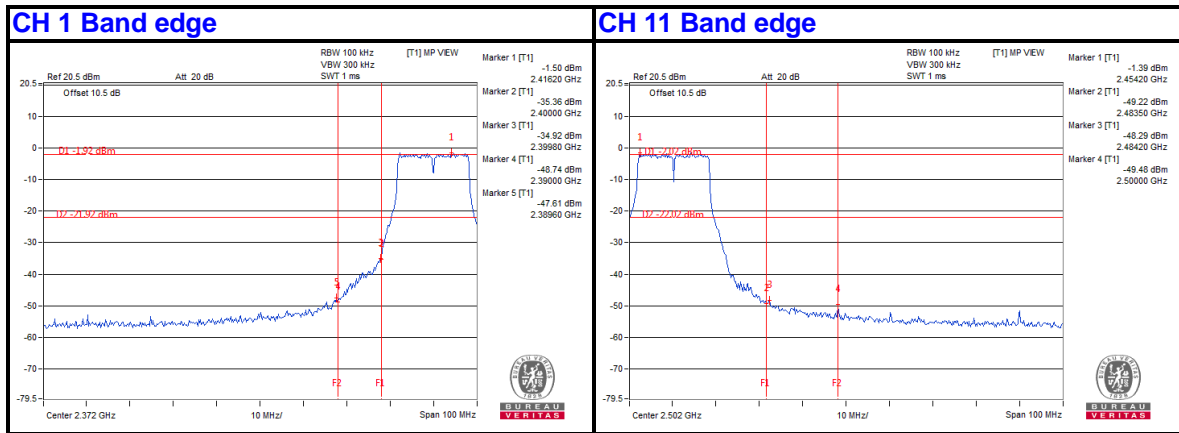
BUREAU
VERITAS

Test Report No.: RF170512N051

802.11b



802.11g





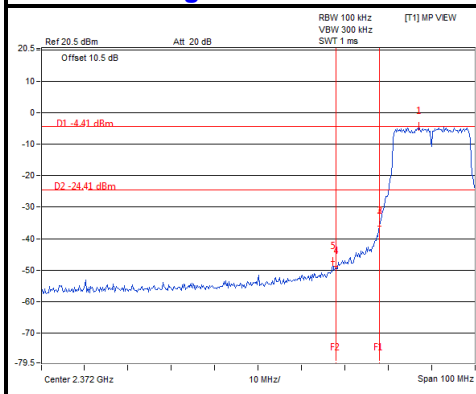
BUREAU
VERITAS

Test Report No.: RF170512N051

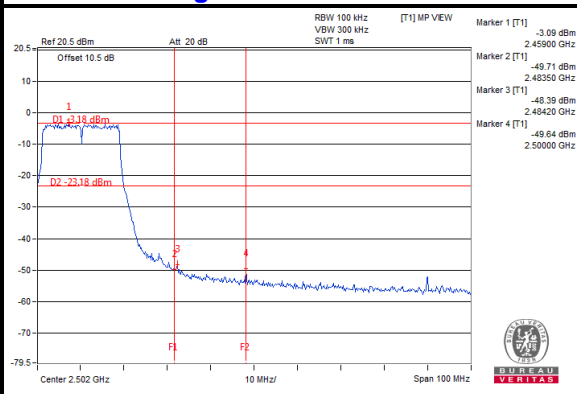
802.11n 20MHz

CHAIN 0

CH 1 Band edge

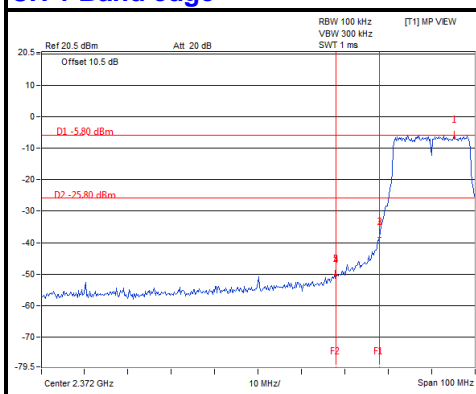


CH 11 Band edge

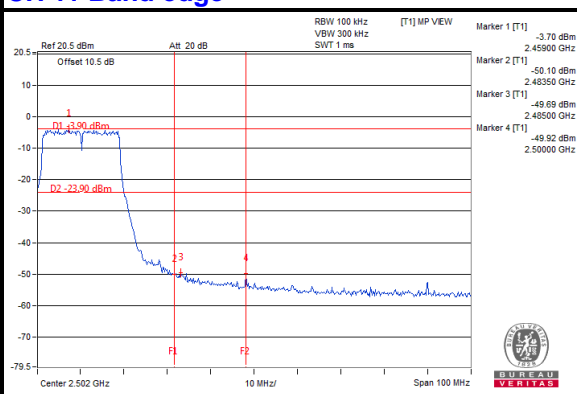


CHAIN 1

CH 1 Band edge



CH 11 Band edge





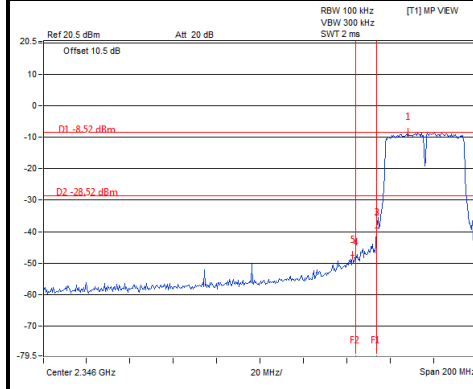
BUREAU
VERITAS

Test Report No.: RF170512N051

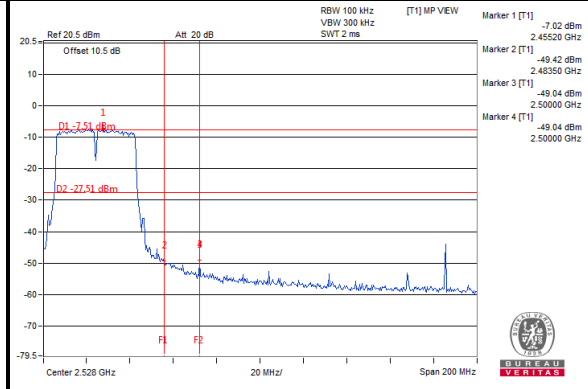
802.11n 40MHz

CHAIN 0

CH 3 Band edge

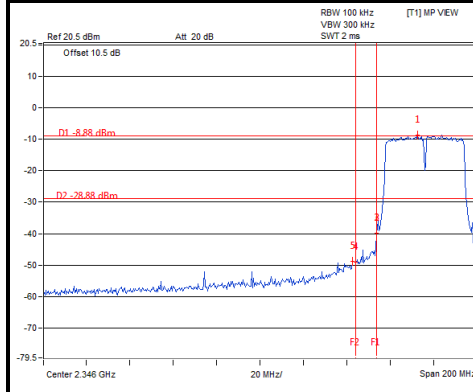


CH 9 Band edge

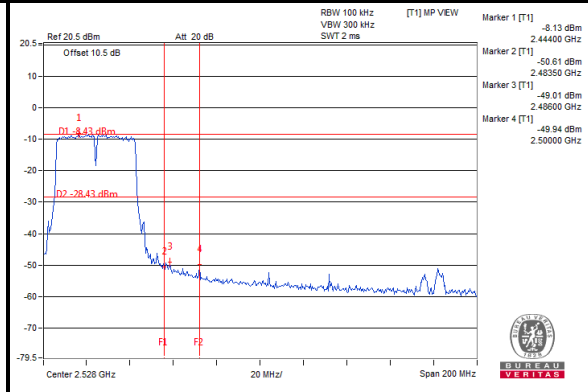


CHAIN 1

CH 3 Band edge



CH 9 Band edge





5 PHOTOGRAPHS OF THE TEST CONFIGURATION

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



6 APPENDIX A - 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.

---END---