

FCC PART 15C TESTREPORT

No.I17Z40039-SRD01

for

TCL Communication Ltd.

HSUPA/HSDPA/UMTS Tri Band/GSM Quad Band/LTE 7 Band mobile

phone

4044M

with

FCC ID:2ACCJN014

Hardware Version: 03

Software Version: D57

Issued Date: 2017-01-19



Note:

The test results in this test report relate only to the devices specified in this report. This report shall not be reproduced except in full without the written approval of CTTL.

Test Laboratory:

CTTL, Telecommunication Technology Labs, Academy of Telecommunication Research, MIIT No.52, HuayuanNorth Road, Haidian District, Beijing, P. R. China 100191.

Tel:+86(0)10-62304633-2512,Fax:+86(0)10-62304633-2504

Email: cttl_terminals@catr.cn, website: www.chinattl.com



REPORT HISTORY

Report Number	Revision	Description	Issue Date	
I17Z40039-SRD01	Rev.0	1st edition	2017-01-19	



CONTENTS

1.	TEST LABORATORY	5
1.1.	TESTING LOCATION	5
1.2.	TESTING ENVIRONMENT	5
1.3.	PROJECT DATA	5
1.4.	SIGNATURE	5
2.	CLIENT INFORMATION	6
2.1.	APPLICANT INFORMATION	6
2.2.	MANUFACTURER INFORMATION	6
3.	EQUIPMENT UNDER TEST (EUT) AND ANCILLARY EQUIPMENT (AE)	7
3.1.	ABOUT EUT	7
3.2.	INTERNAL IDENTIFICATION OF EUT	7
3.3.	INTERNAL IDENTIFICATION OF AE	7
3.4.	GENERAL DESCRIPTION	8
3.5.	INTERPRETATION OF THE TEST ENVIRONMENT	8
4.	REFERENCE DOCUMENTS	8
4.1.	DOCUMENTS SUPPLIED BY APPLICANT	8
4.2.	REFERENCE DOCUMENTS FOR TESTING	8
5.	TEST RESULTS	9
5.1.	SUMMARY OF TEST RESULTS	9
5.2.	STATEMENTS	9
5.3.	TEST CONDITIONS	9
6.	TEST FACILITIES UTILIZED	. 10
7.	MEASUREMENT UNCERTAINTY	11
7.1.	MAXIMUM OUTPUT POWER	11
7.2.	PEAK POWER SPECTRAL DENSITY	11
7.3.	DTS 6-DB SIGNAL BANDWIDTH	11
7.4.	BAND EDGES COMPLIANCE	11
7.5.	TRANSMITTER SPURIOUS EMISSION	11
7.6.	AC POWER-LINE CONDUCTED EMISSION	11
ANI	NEX A: DETAILED TEST RESULTS	. 12

No.I17Z40039-SRD01 Page4of97



A.1. MEASUREMENT METHOD	
A.2. MAXIMUM OUTPUT POWER	13
A.2.1. PEAK OUTPUT POWER-CONDUCTED	13
A.2.2. AVERAGE OUTPUT POWER-CONDUCTED	14
A.3. PEAK POWER SPECTRAL DENSITY	15
A.4. DTS 6-DB SIGNAL BANDWIDTH	21
A.5. BAND EDGES COMPLIANCE	27
A.6. TRANSMITTER SPURIOUS EMISSION	31
A.6.1 Transmitter Spurious Emission – Conducted	
A.6.2 Transmitter Spurious Emission - Radiated	71
A.7. AC POWER-LINE CONDUCTED EMISSION	94



1. Test Laboratory

1.1. TestingLocation

Conducted testing Location: CTTL(huayuan North Road)

Address: No. 52, Huayuan North Road, Haidian District, Beijing,

P. R. China100191

Radiated testing Location: CTTL(BDA)

Address: No. 18 Jia Kangding Street, BDA District, Beijing, P. R.

China 100191

1.2. <u>TestingEnvironment</u>

Normal Temperature: $15-35^{\circ}$ C Extreme Temperature: $-10/+55^{\circ}$ C

Relative Humidity: 20-75%

1.3. Project data

Testing Start Date: 2017-01-12
Testing End Date: 2017-01-19

1.4. Signature

Jiang Xue

(Prepared this test report)

20 Yo

Zheng Wei

(Reviewed this test report)

Lv Songdong

(Approved this test report)



2. ClientInformation

2.1. Applicant Information

Company Name: TCL Communication Ltd.

5F, C building, No. 232, Liang Jing Road ZhangJiang High-Tech Park, Address:

Pudong Area Shanghai, P.R. China. 201203

City: Shanghai Postal Code: 201203 Country: China

Telephone: 0086-21-31363544 Fax: 0086-21-61460602

2.2. Manufacturer Information

Company Name: TCL Communication Ltd.

Address: 5F, C building, No. 232, Liang Jing Road ZhangJiang High-Tech Park,

Pudong Area Shanghai, P.R. China. 201203

City: Shanghai Postal Code: 201203 Country: China

Telephone: 0086-21-31363544 Fax: 0086-21-61460602



3. Equipment UnderTest (EUT) and Ancillary Equipment (AE)

3.1. About EUT

Description HSUPA/HSDPA/UMTS Tri Band/GSM Quad Band/LTE 7

Band mobile phone

Model name 4044M

FCC ID 2ACCJN014

IC ID

With WLAN Function Yes

Frequency Range ISM 2400MHz~2483.5MHz

Type of Modulation DSSS/CCK/OFDM

Number of Channels 11

Antenna Integral Antenna
MAX Conducted Power 25.0dBm(OFDM)
Power Supply 3.7V DC by Battery

3.2. Internal Identification of EUT

EUT ID*	SN or IMEI	HW Version	SW Version
EUT1	/	03	D57
EUT1	/	03	D57

^{*}EUT ID: is used to identify the test sample in the lab internally.

3.3. Internal Identification of AE

AE ID*	Description	SN
AE1	Battery	
AE2	Charger	/

AE1

Model TLi013C1
Manufacturer BYD
Capacitance 1350 mAh
Nominal voltage 3.7 V

AE2

Model WUS550mA5V00-02

Manufacturer BYD Length of cable /

^{*}AE ID: is used to identify the test sample in the lab internally.



3.4. General Description

The Equipment under Test (EUT) is a model of HSUPA/HSDPA/UMTS Tri Band/GSM Quad Band/LTE 7 Band mobile phonewith integrated antenna and inbuilt battery.

It has Bluetooth (EDR)function.

It consists of normal options: travel charger, USB cable and Phone.

Manual and specifications of the EUT were provided to fulfil the test.

Samples undergoing test were selected by the client.

3.5. Interpretation of the Test Environment

For the test methods, the test environment uncertainty figures correspond to an expansion factor k=2.

Measurement Uncertainty

Parameter	Uncertainty
temperature	0.48°C
humidity	2 %
DC voltages	0.003V

4. Reference Documents

4.1. Documents supplied by applicant

EUT feature information is supplied by the applicant or manufacturer, which is the basis of testing.

4.2. Reference Documents for testing

The following documents listed in this section are referred for testing.

Reference	Title	Version
	FCC CFR 47, Part 15, Subpart C:	
	15.205 Restricted bands of operation;	
FCC Part15	15.209 Radiated emission limits, general requirements;	2015
	15.247 Operation within the bands 902-928MHz,	
	2400-2483.5 MHz, and 5725-5850 MHz.	
ANSI C63.10	American National Standard ofProcedures for Compliance Testing ofUnlicensed Wireless Devices	2013
	3	



5. Test Results

5.1. Summary of Test Results

SUMMARY OF MEASUREMENT RESULTS	Sub-clause of Part15C	Sub-clause of IC	Verdict
Maximum Peak Output Power	15.247 (b)	1	Р
Peak Power Spectral Density	15.247 (e)	1	Р
Occupied 6dB Bandwidth	15.247 (a)	1	Р
Band Edges Compliance	15.247 (d)	1	Р
Transmitter Spurious Emission - Conducted	15.247 (d)	1	Р
Transmitter Spurious Emission - Radiated	15.247, 15.205, 15.209	1	Р
AC Powerline Conducted Emission	15.107, 15.207	1	Р

Please refer to ANNEX A for detail.

Terms used in Verdict column

Р	Pass, The EUT complies with the essential requirements in the standard.					
NP	Not Perform, The test was not performed by CTTL					
NA	Not Applicable, The test was not applicable					
F	Fail, The EUT does not comply with the essential requirements in the					
	standard					
F	Fail, The EUT does not comply with the essential requirements in the					
	standard					

5.2. Statements

The test cases as listed in section 5.1 of this report for the EUT specified in section 3 was performed by CTTL and according to the standards or reference documents listed in section 4.2 The EUT met all requirements of the standards or reference documents, and only the WLAN function was tested in this report.

This model is a variant product which market name is 4044O; all the test results have been derived from test report of 4044O.

5.3. Test Conditions

T nom	Normal Temperature	
T min	Low Temperature	
T max	High Temperature	
V nom	Normal Voltage	

For this report, if the test cases listed above are tested under normal temperature and normal voltage, and also under norm humidity, the specific condition is shown as follows:

Temperature	ture T nom 26°C	
Voltage	V nom	3.7 V(By battery)
Humidity	H nom	44%



6. Test Facilities Utilized

Conducted test system

No.	Equipment	Model	Serial	Manufacturer	Calibration	Calibration
NO.	Equipment	Wiodei	Number	Wallulacturei	date	Due date
4	Vector Signal	FSQ40	200089	Rohde &	2016-06-07	2017 06 06
'	Analyzer	F3Q40	200069	Schwarz	2010-00-07	2017-06-06
2	Test Receiver	ESCI	100344	Rohde &	2016-03-02	2017-03-01
	rest Receiver	E801	100344	Schwarz	2016-03-02	2017-03-01
2	LISN	ESH3Z2	257004052	Rohde &	2016 10 06	2017-10-05
3	LIOIN	ESH3ZZ	357881052	Schwarz	2016-10-06	2017-10-05
4	Shielding Room	S81	/	ETS-Lindgren	/	/

Radiated emission test system

	radiated chilosion test system					
No.	Equipment	Model	Serial Number	Manufacturer	Calibration date	Calibratio n Due date
1	Test Receiver	ESU26	100235	Rohde & Schwarz	2016-07-06	2017-07-05
2	Loop antenna	HFH2-Z2	829324/007	Rohde & Schwarz	2014-12-17	2017-12-16
3	BiLog Antenna	VULB9163	301	Schwarzbeck	2014-12-17	2017-12-16
4	Dual-Ridge Waveguide Horn Antenna	3115	6914	EMCO	2014-12-16	2017-12-15
5	Dual-Ridge Waveguide Horn Antenna	3116	2661	ETS-Lindgren	2014-06-18	2017-06-17
6	Vector Signal Analyzer	FSV40	101047	Rohde & Schwarz	2016-06-29	2017-06-28
7	Semi-anechoic chamber	/	CT000332-1 074	Frankonia German	/	/



7. Measurement Uncertainty

7.1. Maximum Output Power

Measurement Uncertainty: 0.339dB,k=1.96

7.2. Peak Power Spectral Density

Measurement Uncertainty: 0.705dBm/MHz,k=1.96

7.3. DTS 6-dB Signal Bandwidth

Measurement Uncertainty: 60.80Hz,k=1.96

7.4. Band Edges Compliance

Measurement Uncertainty: 0.62dBm,k=1.96

7.5. <u>Transmitter Spurious Emission</u>

Conducted (k=1.96)

FrequencyRange	Uncertainty(dBm)		
30MHz ≤ f ≤ 2GHz	1.22		
2GHz ≤ f ≤3.6GHz	1.22		
3.6GHz ≤ f ≤8GHz	1.22		
8GHz ≤ f ≤12.75GHz	1.51		
12.75GHz ≤ f ≤26GHz	1.51		
26GHz ≤ f ≤40GHz	1.59		

Radiated(k=2)

FrequencyRange	Uncertainty(dBm)
30MHz ≤ f ≤ 1GHz	4.86
1GHz ≤ f ≤18GHz	5.26
18GHz ≤ f ≤40GHz	5.28

7.6. AC Power-line Conducted Emission

Measurement Uncertainty: 3.38dBm,k=2



ANNEX A: Detailed Test Results

A.1. Measurement Method

A.1.1. Conducted Measurements

Connect the EUT to the test system as Fig.A.1.1.1 shows.

Set the EUT to the required work mode.

Set the EUT to the required channel.

Set the Vector Signal Analyzerand start measurement.

Record the values. Vector Signal Analyzer

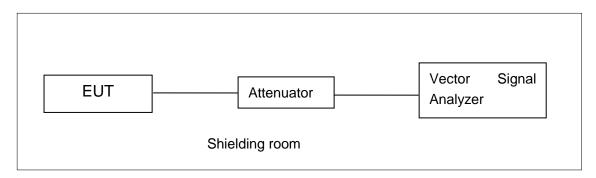


Fig.A.1.1.1: Test Setup Diagram for Conducted Measurements

A.1.2. Radiated Emission Measurements

In the case of radiated emission, the used settings are as follows, Sweep frequency from 30 MHz to 1GHz, RBW = 100 kHz, VBW = 300 kHz; Sweep frequency from 1 GHz to 26GHz, RBW = 1MHz, VBW = 10Hz;

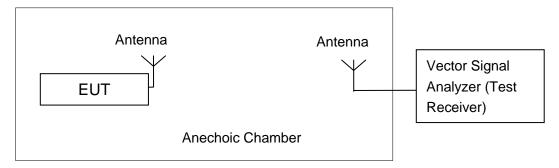


Fig.A.1.2.1: Test Setup Diagram for Radiated Measurements



A.2. Maximum Output Power

Method of Measurement: See ANSI C63.10-2013-clause 11.9.1.2

- a) Set the RBW = 1 MHz.
- b) Set the VBW = 3 MHz.
- c) Set the span \geq [1.5 \times DTS bandwidth].
- d) Detector = peak.
- e) Sweep time = auto couple.
- f) Trace mode = max hold.
- g) Allow trace to fully stabilize.

h)Use the instrument's band/channel power measurement function with the band limits set equal to the DTS bandwidth edges (for some instruments, this may require a manual override to select the peak detector).

Measurement Limit:

Standard	Limit (dBm)
FCC CRF Part 15.247(b)	< 30

EUT ID: EUT2

A.2.1. Peak Output Power-conducted

Measurement Results:

802.11b/a mode

	Data Rate	Test Result (dBm)			
Mode		2412MHz	2437MHz	2462 MHz	
	(Mbps)	(Ch1)	(Ch6)	(Ch11)	
	1	21.67	/	/	
000 116	2	21.90	/	/	
802.11b	5.5	23.43	/	/	
	11	24.84	24.79	25.00	
	6	22.10	/	/	
	9	22.16	/	/	
	12	21.89	/	/	
000 11 ~	18	22.03	/	/	
802.11g	24	22.52	/	/	
	36	22.56	/	/	
	48	22.81	22.70	23.29	
•	54	22.79	/	/	

The data rate 11Mbps and 48Mbps are selected as worse condition, and the following cases are performed with this condition.



802.11n-HT20 mode

	Data Rate	Test Result (dBm)			
Mode	(Index)	2412MHz	2437MHz	2462 MHz	
		(Ch1)	(Ch6)	(Ch11)	
	MCS0	20.30	/	/	
	MCS1	20.00	/	/	
	MCS2	20.10	/	/	
802.11n	MCS3	20.53	/	/	
(20MHz)	MCS4	20.62	/	/	
	MCS5	20.70	/	/	
	MCS6	20.75	20.60	21.40	
	MCS7	20.72	/	/	

The data rate MCS6is selected as worse condition, and the following cases are performed with this condition.

Conclusion: Pass

A.2.2. Average Output Power-conducted

Method of Measurement: See ANSI C63.10-2013-clause 11.9.2.2.2

The procedure for this method is as follows:

- a) Set span = 80MHz.
- b) Set RBW = 1MHz.
- c) Set VBW = 3MHz
- d) Number of points in sweep = 625
- e) Sweep time = auto.
- f) Detector = RMS.
- g) The trigger shall be set to "free run."
- h) Trace average 100 traces in power averaging (rms) mode.
- i) Compute power by integrating the spectrum across the OBW of the signal using theinstrument's band power measurement function, with band limits set equal to the OBW band edges.

802.11b/a mode

Mada	Test Result (dBm)			
Mode	2412MHz(Ch1)	2437MHz(Ch6)	2462 MHz(Ch11)	
802.11b	18.03	17.77	17.94	
802.11g	13.01	12.93	13.70	

802.11n-HT20 mode

Mode	Test Result (dBm)			
Mode	2412MHz(Ch1)	2437MHz(Ch6)	2462 MHz(Ch11)	
802.11n(20MHz)	11.12	10.80	11.83	

Conclusion: Pass



A.3. Peak Power Spectral Density

Method of Measurement: See ANSI C63.10-2013-clause 11.10.2

- a) Set analyzer center frequency to DTS channel center frequency.
- b) Set the span to 1.5 times the DTS bandwidth.
- c) Set the RBW to RBW = 3 kHz.
- d) Set the VBW = 10 kHz.
- e) Detector = peak.
- f) Sweep time = auto couple.
- g) Trace mode = max hold.
- h) Allow trace to fully stabilize.
- i) Use the peak marker function to determine the maximum amplitude level within the RBW.

Measurement Limit:

Standard	Limit
FCC CRF Part 15.247(e)	< 8 dBm/3 kHz

Measurement Results:

802.11b/g mode

Mode	Channel	Power Spectral Density (dBm/3 kHz)		Conclusion
	1	Fig.A.3.1	-5.06	Р
802.11b	6	Fig.A.3.2	-4.57	Р
	11	Fig.A.3.3	-4.50	Р
	1	Fig.A.3.4	-12.15	Р
802.11g	6	Fig.A.3.5	-12.23	Р
	11	Fig.A.3.6	-11.23	Р

802.11n-HT20 mode

Mode	Channel	•	ctral Density /3 kHz)	Conclusion	
802.11n (HT20)	1	Fig.A.3.7	-13.91	Р	
	6	Fig.A.3.8	-14.88	Р	
	11	Fig.A.3.9	-13.25	Р	

Conclusion: Pass

Test graphs as below:



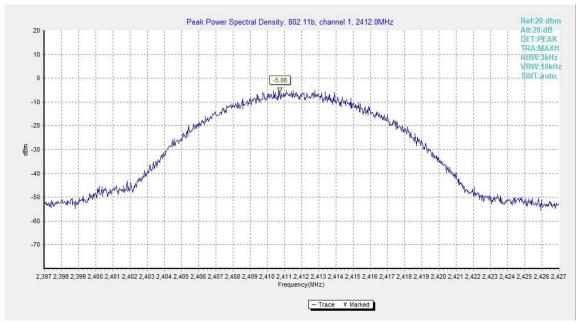


Fig.A.3.1 Power Spectral Density(802.11b,Ch1)

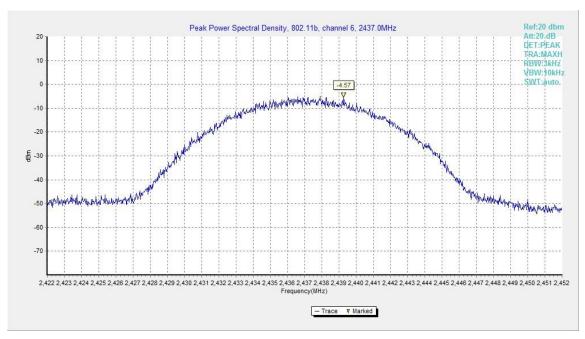


Fig.A.3.2 Power Spectral Density (802.11b, Ch 6)



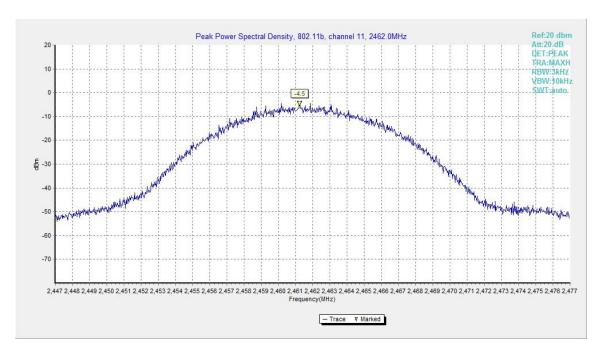


Fig.A.3.3 Power Spectral Density (802.11b, Ch 11)

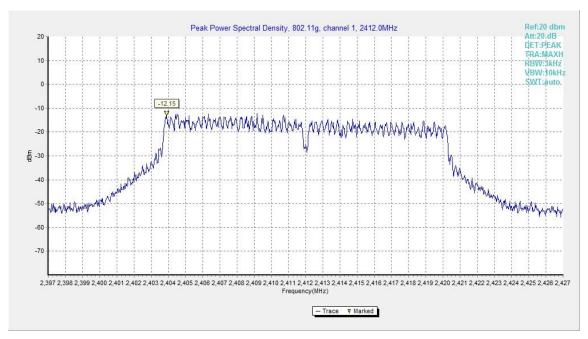


Fig.A.3.4 Power Spectral Density (802.11g, Ch 1)



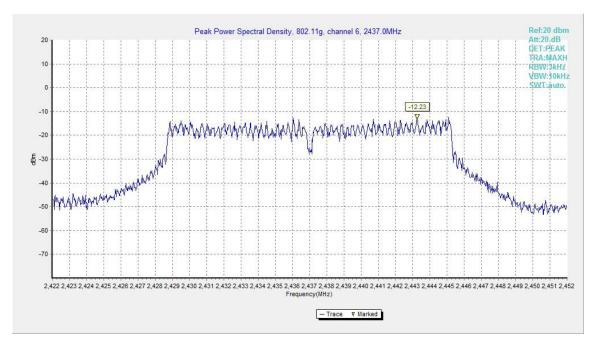


Fig.A.3.5 Power Spectral Density (802.11g, Ch 6)

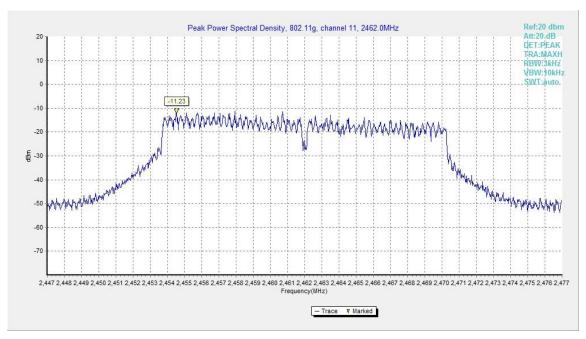


Fig.A.3.6 Power Spectral Density (802.11g, Ch 11)



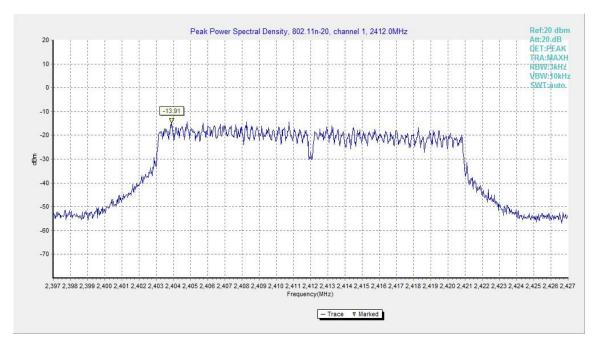


Fig.A.3.7 Power Spectral Density (802.11n-HT20, Ch 1)

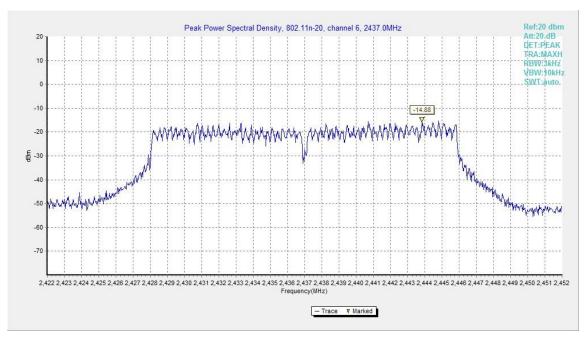


Fig.A.3.8 Power Spectral Density (802.11n-HT20, Ch 6)



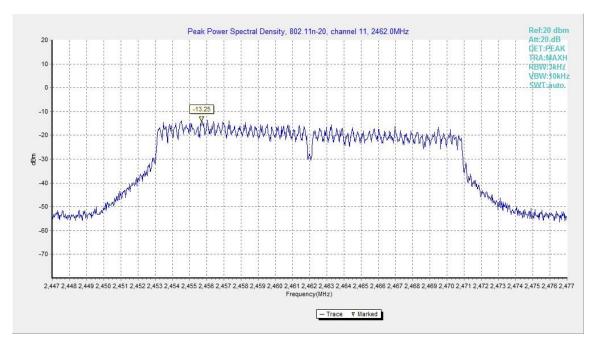


Fig.A.3.9 Power Spectral Density (802.11n-HT20, Ch 11)



A.4. DTS 6-dB Signal Bandwidth

Method of Measurement: See ANSI C63.10-2013 section 11.8.1.

- a) Set RBW = 100 kHz.
- b) Set the video bandwidth (VBW) =300 kHz.
- c) Detector = Peak.
- d) Trace mode = max hold.
- e) Sweep = auto couple.
- f) Allow the trace to stabilize.
- g) Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

Measurement Limit:

Standard	Limit (kHz)
FCC 47 CFR Part 15.247 (a)	≥ 500

EUT ID: EUT2

Measurement Result:

802.11b/g mode

Mode	Channel	Occupied 6dB Bandwidth (kHz)		conclusion
	1	Fig.A.4.1	7250.00	Р
802.11b	6	Fig.A.4.2	7750.00	Р
	11	Fig.A.4.3	7600.00	Р
802.11g	1	Fig.A.4.4	16050.00	Р
	6	Fig.A.4.5	16450.00	Р
	11	Fig.A.4.6	15800.00	Р

802.11n-HT20 mode

Mode	Channel	Occupied 6dB Bandwidth (kHz)		conclusion
802.11n (HT20)	1	Fig.A.4.7	16350.00	Р
	6	Fig.A.4.8	17650.00	Р
	11	Fig.A.4.9	16400.00	Р

Conclusion: Pass

Test graphs as below:



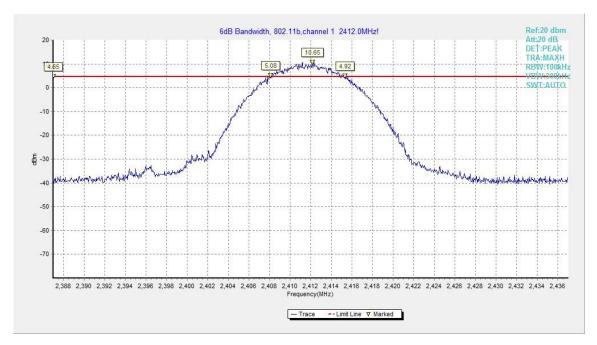


Fig.A.4.1 Occupied 6dB Bandwidth(802.11b,Ch 1)

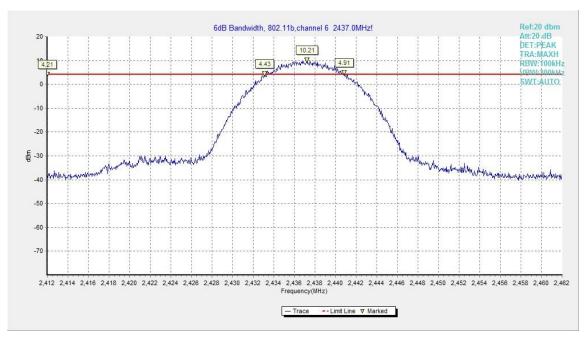


Fig.A.4.2 Occupied 6dB Bandwidth (802.11b, Ch 6)



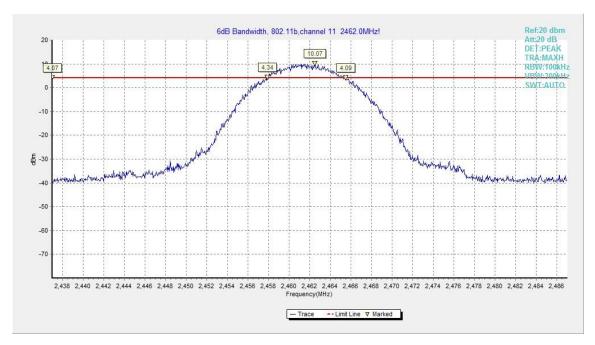


Fig.A.4.3 Occupied 6dB Bandwidth (802.11b, Ch 11)

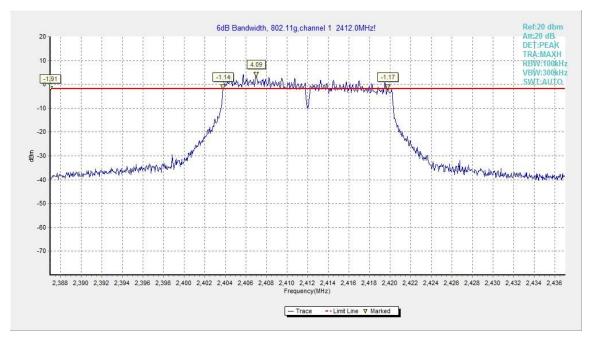


Fig.A.4.4 Occupied 6dB Bandwidth (802.11g, Ch 1)



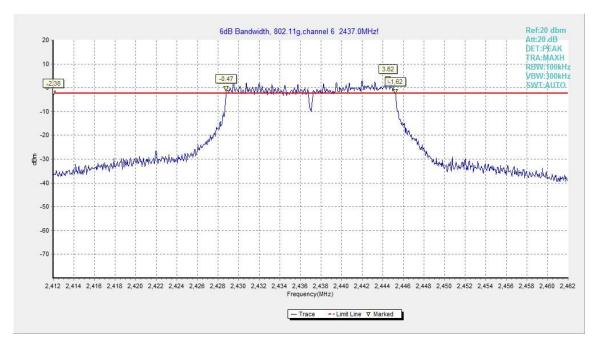


Fig.A.4.5 Occupied 6dB Bandwidth (802.11g, Ch 6)

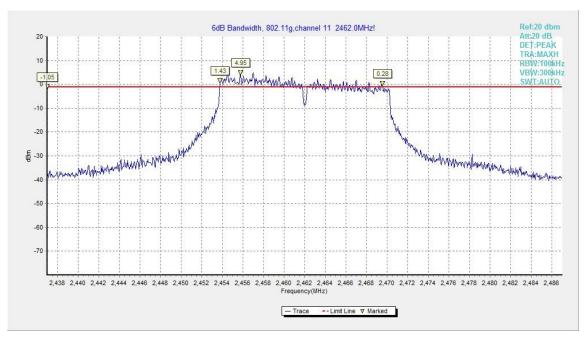


Fig.A.4.6 Occupied 6dB Bandwidth (802.11g, Ch 11)



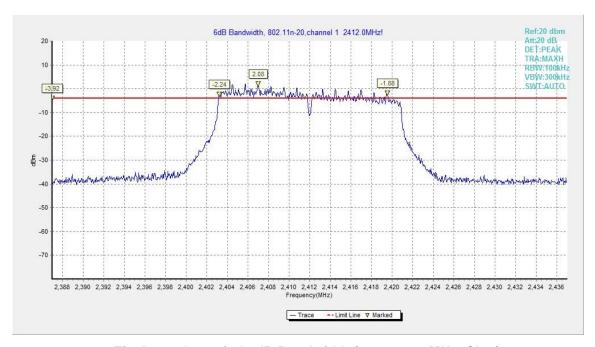


Fig.A.4.7 Occupied 6dB Bandwidth (802.11n-20MHz, Ch 1)

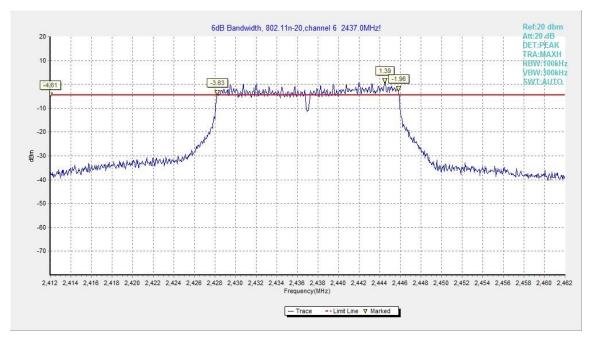


Fig.A.4.8 Occupied 6dB Bandwidth (802.11n-HT20, Ch 6)



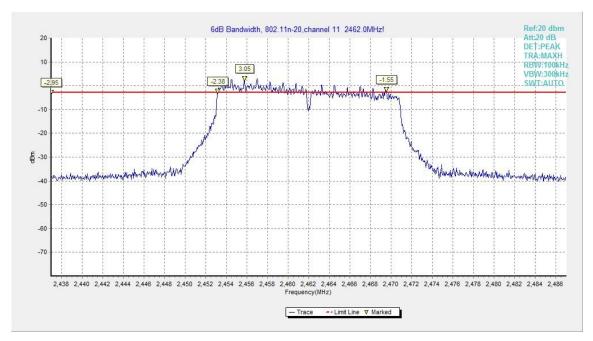


Fig.A.4.9 Occupied 6dB Bandwidth (802.11n-HT20, Ch 11)



A.5. Band Edges Compliance

Method of Measurement: See ANSI C63.10-2013-clause 6.10.4

Connect the spectrum analyzer to the EUT using an appropriate RF cable connected to the EUT output. Configure the spectrum analyzer settings as described below.

a) Set Span = 100MHzb) Sweep Time: coupledc) Set the RBW=100 kHzc) Set the VBW=300 kHz

d) Detector: Peake) Trace: Max hold

Measurement Limit:

Standard	Limit (dBc)	
FCC 47 CFR Part 15.247 (d)	> 20	

EUT ID: EUT2

Measurement Result:

802.11b/g mode

Mode	Channel	Test Results	Conclusion
900 11h	1	Fig.A.5.1	Р
802.11b	11	Fig.A.5.2	Р
802.11g	1	Fig.A.5.3	Р
	11	Fig.A.5.4	Р

802.11n-HT20 mode

Mode	Channel	Test Results	Conclusion
802.11n	1	Fig.A.5.5	Р
(HT20)	11	Fig.A.5.6	Р

Conclusion: Pass
Test graphs as below:



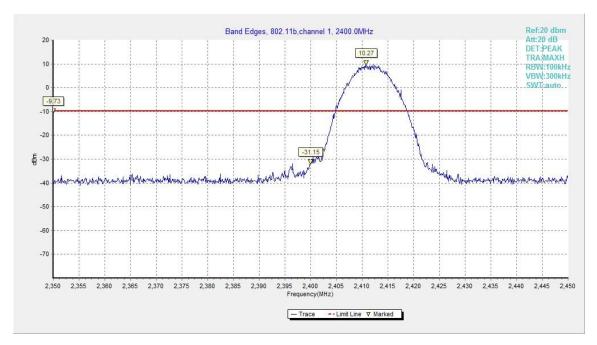


Fig.A.5.1 Band Edges (802.11b, Ch 1)



Fig.A.5.2 Band Edges (802.11b, Ch 11)



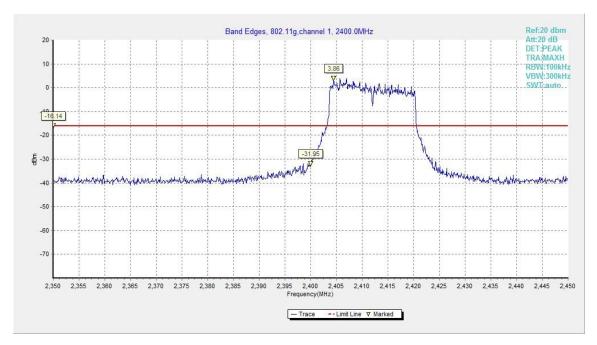


Fig.A.5.3 Band Edges (802.11g, Ch 1)

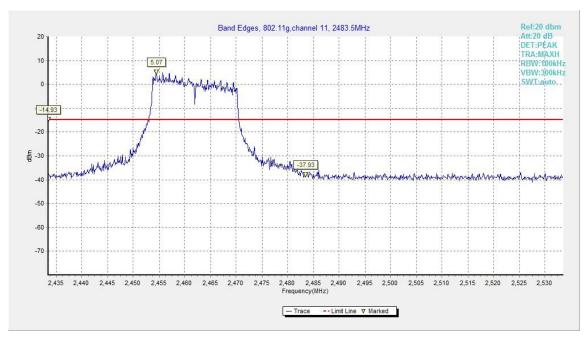


Fig.A.5.4 Band Edges (802.11g, Ch 11)



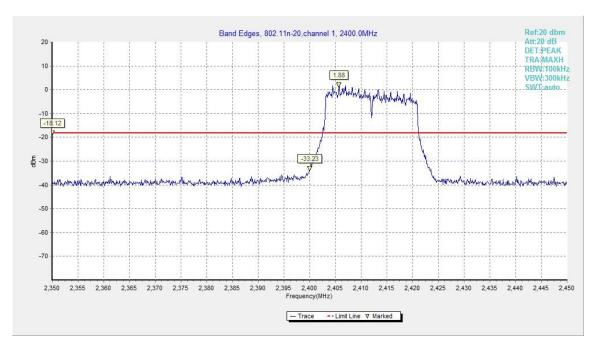


Fig.A.5.5 Band Edges (802.11n-HT20, Ch 1)

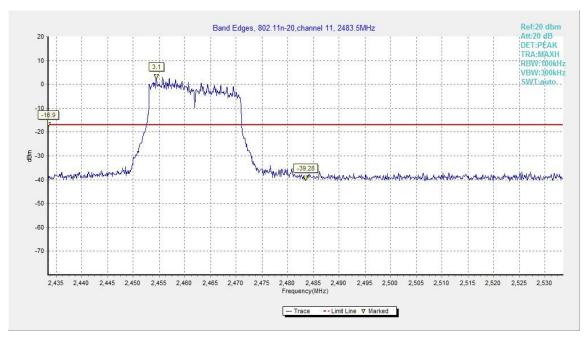


Fig.A.5.6 Band Edges (802.11n-HT20, Ch 11)



A.6. Transmitter Spurious Emission

A.6.1 Transmitter Spurious Emission – Conducted

Method of Measurement: See ANSI C63.10-2013-clause 11.11.2

Establish a reference level by using the following procedure:

- a) Set instrument center frequency to DTS channel center frequency
- b) Set the span to ≥ 1.5 times the DTS bandwidth
- c) Set the RBW=100 kHz
- d) Set the VBW= 300 kHz
- e) Detector = Peak
- f) Sweep time = auto couple
- g) Trace mode = max hold
- h) Allow trace to fully stabilize
- i) Use the peak marker function to determine the maximum PSD level

Note that the channel found to contain the maximum PSD level can be used to establish the reference level.

Establish an emission level by using the following procedure:

- a) Set the center frequency and span to encompass frequency range to be measured.
- b) Set the RBW = 100 kHz.
- c) Set the VBW = 300 kHz.
- d) Detector = peak.
- e) Sweep time = auto couple.
- f) Trace mode = max hold.
- g) Allow trace to fully stabilize.
- h) Use the peak marker function to determine the maximum amplitude level.

Ensure that the amplitude of all unwanted emissions outside of the authorized frequency band (excludingrestricted frequency bands) is attenuated by at least the minimum requirements specified in 11.11. Report the three highest emissions relative to the limit.

Measurement Limit:

Standard	Limit	
ECC 47 CEP Port 15 247 (d)	20dB below peak output power in 100 kHz	
FCC 47 CFR Part 15.247 (d)	bandwidth	

EUT ID: EUT2

Measurement Results:



802.11b mode

MODE	Channel	FrequencyRange	Test Results	Conclusion
		2.412 GHz	Fig.A.6.1.1	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.2	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.3	Р
	1	2.5 GHz ~ 7.5 GHz	Fig.A.6.1.4	Р
	ı	7.5 GHz ~ 10 GHz	Fig.A.6.1.5	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.6	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.7	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.8	Р
		2.437 GHz	Fig.A.6.1.9	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.10	Р
	6	1 GHz ~ 2.5 GHz	Fig.A.6.1.11	Р
802.11b		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.12	Р
002.110		7.5 GHz ~ 10 GHz	Fig.A.6.1.13	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.14	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.15	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.16	Р
		2.462 GHz	Fig.A.6.1.17	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.18	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.19	Р
	11	2.5 GHz ~ 7.5 GHz	Fig.A.6.1.20	Р
	11	7.5 GHz ~ 10 GHz	Fig.A.6.1.21	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.22	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.23	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.24	Р



802.11g mode

MODE	Channel	FrequencyRange	Test Results	Conclusion
		2.412 GHz	Fig.A.6.1.25	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.26	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.27	Р
	1	2.5 GHz ~ 7.5 GHz	Fig.A.6.1.28	Р
	l	7.5 GHz ~ 10 GHz	Fig.A.6.1.29	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.30	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.31	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.32	Р
		2.437 GHz	Fig.A.6.1.33	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.34	Р
	6	1 GHz ~ 2.5 GHz	Fig.A.6.1.35	Р
902.11a		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.36	Р
802.11g		7.5 GHz ~ 10 GHz	Fig.A.6.1.37	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.38	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.39	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.40	Р
		2.462 GHz	Fig.A.6.1.41	Р
	11	30 MHz ~ 1 GHz	Fig.A.6.1.42	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.43	Р
		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.44	Р
		7.5 GHz ~ 10 GHz	Fig.A.6.1.45	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.46	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.47	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.48	Р



802.11n-HT20 mode

MODE	Channel	FrequencyRange	Test Results	Conclusion
		2.412 GHz	Fig.A.6.1.49	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.50	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.51	Р
	1	2.5 GHz ~ 7.5 GHz	Fig.A.6.1.52	Р
	ı	7.5 GHz ~ 10 GHz	Fig.A.6.1.53	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.54	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.55	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.56	Р
		2.437 GHz	Fig.A.6.1.57	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.58	Р
	6	1 GHz ~ 2.5 GHz	Fig.A.6.1.59	Р
802.11n		2.5 GHz ~ 7.5 GHz	Fig.A.6.1.60	Р
(HT20)		7.5 GHz ~ 10 GHz	Fig.A.6.1.61	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.62	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.63	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.64	Р
		2.462 GHz	Fig.A.6.1.65	Р
		30 MHz ~ 1 GHz	Fig.A.6.1.66	Р
		1 GHz ~ 2.5 GHz	Fig.A.6.1.67	Р
	11	2.5 GHz ~ 7.5 GHz	Fig.A.6.1.68	Р
		7.5 GHz ~ 10 GHz	Fig.A.6.1.69	Р
		10 GHz ~ 15 GHz	Fig.A.6.1.70	Р
		15 GHz ~ 20 GHz	Fig.A.6.1.71	Р
		20 GHz ~ 26 GHz	Fig.A.6.1.72	Р

Conclusion: Pass
Test graphs as below:



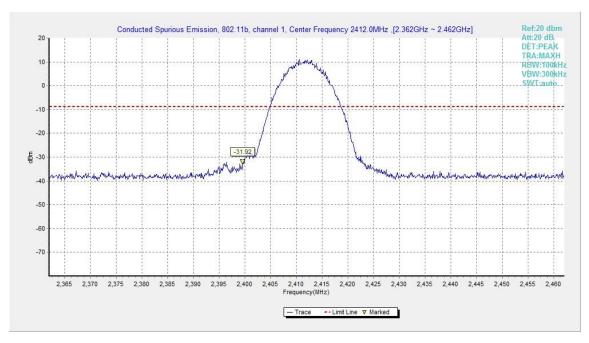


Fig.A.6.1.1 Transmitter Spurious Emission - Conducted (802.11b, Ch1, Center Frequency)

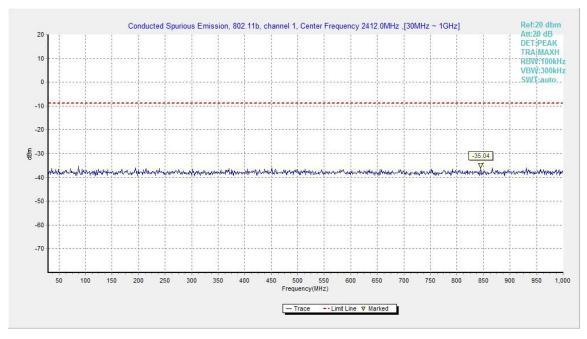


Fig.A.6.1.2 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 30 MHz-1 GHz)



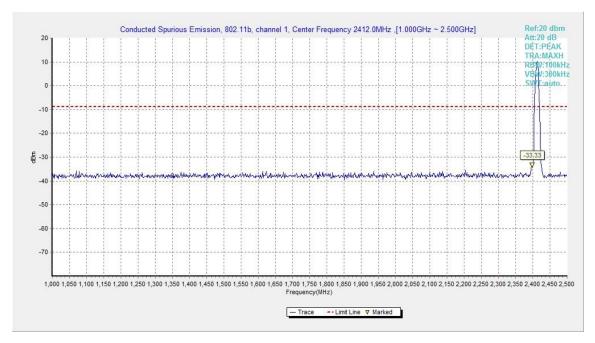


Fig.A.6.1.3 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 1 GHz-2.5 GHz)

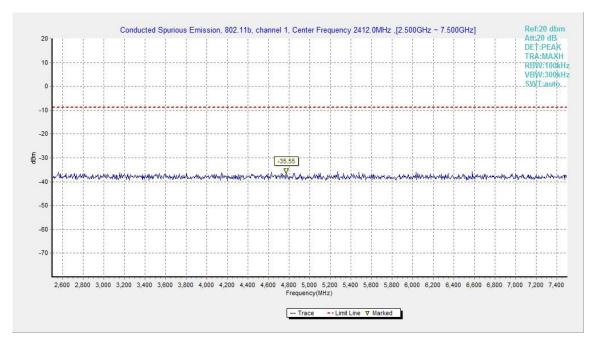


Fig.A.6.1.4 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 2.5 GHz-7.5 GHz)



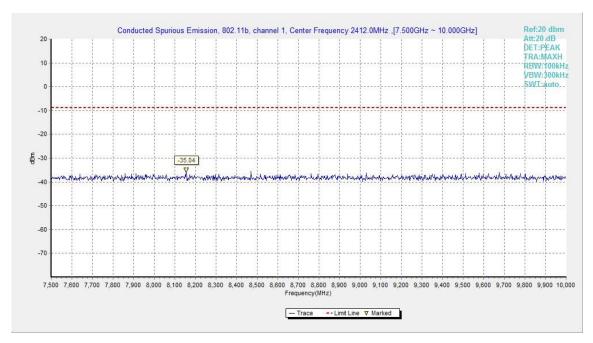


Fig.A.6.1.5 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 7.5 GHz-10 GHz)

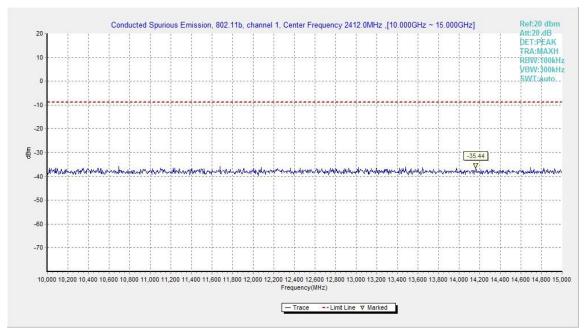


Fig.A.6.1.6 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 10 GHz-15 GHz)



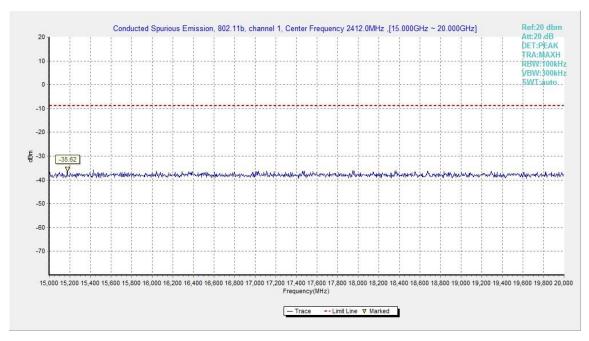


Fig.A.6.1.7 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 15 GHz-20 GHz)

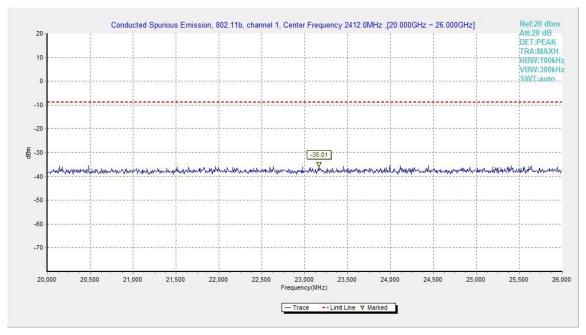


Fig.A.6.1.8 Transmitter Spurious Emission - Conducted (802.11b, Ch1, 20 GHz-26 GHz)



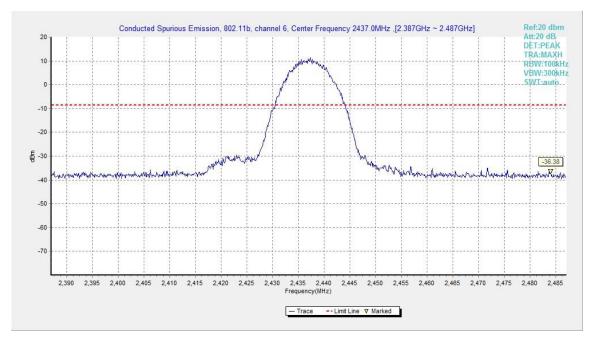


Fig.A.6.1.9 Transmitter Spurious Emission - Conducted (802.11b, Ch6, Center Frequency)

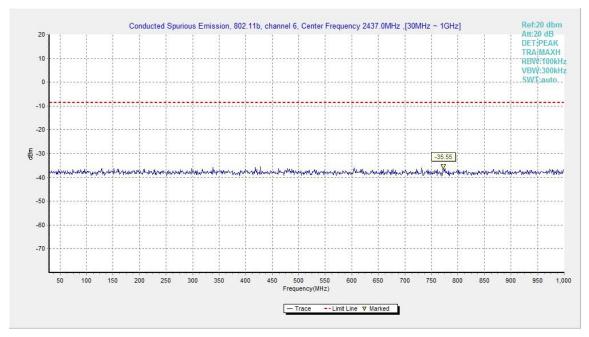


Fig.A.6.1.10 Transmitter Spurious Emission - Conducted (802.11b, Ch6, 30 MHz-1 GHz)



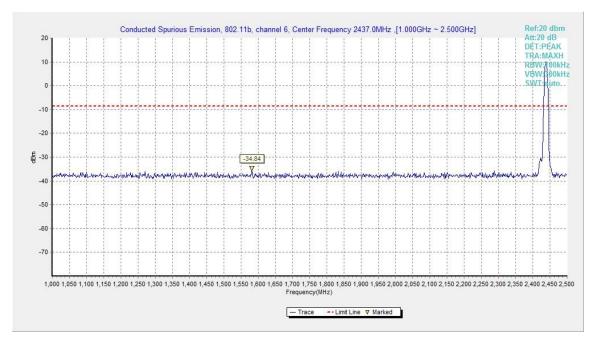


Fig.A.6.1.11 Transmitter Spurious Emission - Conducted (802.11b, Ch6, 1 GHz-2.5 GHz)

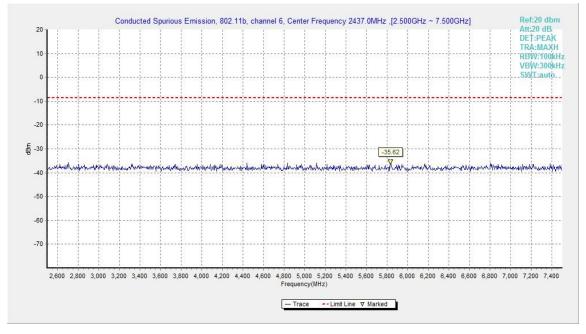


Fig.A.6.1.12 Transmitter Spurious Emission - Conducted (802.11b, Ch6, 2.5 GHz-7.5 GHz)