



**FCC PART 15C
TEST REPORT
No. 2012WLN0432**

for

ZTE Corporation

WCDMA/GSM (GPRS) Dual-Mode Digital Mobile Phone

Type: ZTE V791

With

FCC ID: Q78-V791

Hardware Version: WMAK

Software Version: CLA-UNI-QB25S-P175A40V1.0.0

Issued Date: 2012-11-15



DAR accreditation (DIN EN ISO/IEC 17025): No. D-PL-12123-01-01

FCC 2.948 Listed: No.733176

IC O.A.T.S listed: No.6629B

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 TMC Beijing.

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CONTENTS

CONTENTS	2
1. TEST LABORATORY	7
1.1. TESTING LOCATION	7
1.2. TESTING ENVIRONMENT.....	7
1.3. PROJECT DATA	7
1.4. SIGNATURE	7
2. CLIENT INFORMATION.....	8
2.1. APPLICANT INFORMATION	8
2.2. MANUFACTURER INFORMATION.....	8
3. EQUIPMENT UNDER TEST(EUT) AND ANCILLARY EQUIPMENT(AE)	9
3.1. ABOUT EUT	9
3.2. INTERNAL IDENTIFICATION OF EUT USED DURING THE TEST	9
3.3. INTERNAL IDENTIFICATION OF AE USED DURING THE TEST	9
3.4. GENERAL DESCRIPTION.....	9
4. REFERENCE DOCUMENTS	10
4.1. DOCUMENTS SUPPLIED BY APPLICANT	10
4.2. REFERENCE DOCUMENTS FOR TESTING	10
5. LABORATORY ENVIRONMENT.....	11
6. SUMMARY OF TEST RESULTS	12
6.1. SUMMARY OF TEST RESULTS	12
6.2. STATEMENTS.....	12
7. TEST EQUIPMENTS UTILIZED	13
ANNEX A: MEASUREMENT RESULTS.....	14
A.1. MEASUREMENT METHOD	14
A.2. MAXIMUM OUTPUT POWER.....	15
A.2.1. MAXIMUM PEAK OUTPUT POWER-CONDUCTED	15
A.2.2. MAXIMUM AVERAGE OUTPUT POWER-CONDUCTED.....	17
A.3. PEAK POWER SPECTRAL DENSITY	18
FIG. 1 POWER SPECTRAL DENSITY (802.11B, CH 1)	19
FIG. 2 POWER SPECTRAL DENSITY (802.11B, CH 6)	19
FIG. 3 POWER SPECTRAL DENSITY (802.11B, CH 11)	20
FIG. 4 POWER SPECTRAL DENSITY (802.11G, CH 1)	20
FIG. 5 POWER SPECTRAL DENSITY (802.11G, CH 6)	21
FIG. 6 POWER SPECTRAL DENSITY (802.11G, CH 11).....	21
FIG. 7 POWER SPECTRAL DENSITY (802.11N-20MHZ, CH 1)	22
FIG. 8 POWER SPECTRAL DENSITY (802.11N-20MHZ, CH 6)	22
FIG. 9 POWER SPECTRAL DENSITY (802.11N-20MHZ, CH 11)	23

FIG. 10	POWER SPECTRAL DENSITY (802.11N-40MHZ, CH 3)	23
FIG. 11	POWER SPECTRAL DENSITY (802.11N-40MHZ, CH 6)	24
FIG. 12	POWER SPECTRAL DENSITY (802.11N-40MHZ, CH 9)	24
A.4. OCCUPIED 6DB BANDWIDTH		25
FIG. 13	OCCUPIED 6DB BANDWIDTH (802.11B, CH 1).....	26
FIG. 14	OCCUPIED 6DB BANDWIDTH (802.11B, CH 6).....	26
FIG. 15	OCCUPIED 6DB BANDWIDTH (802.11B, CH 11).....	27
FIG. 16	OCCUPIED 6DB BANDWIDTH (802.11G, CH 1).....	27
FIG. 17	OCCUPIED 6DB BANDWIDTH (802.11G, CH 6).....	28
FIG. 18	OCCUPIED 6DB BANDWIDTH (802.11G, CH 11).....	28
FIG. 19	OCCUPIED 6DB BANDWIDTH (802.11N-20MHZ, CH 1).....	29
FIG. 20	OCCUPIED 6DB BANDWIDTH (802.11N-20MHZ, CH 6).....	29
FIG. 21	OCCUPIED 6DB BANDWIDTH (802.11N-20MHZ, CH 11).....	30
FIG. 22	OCCUPIED 6DB BANDWIDTH (802.11N-40MHZ, CH 3).....	30
FIG. 23	OCCUPIED 6DB BANDWIDTH (802.11N-40MHZ, CH 6).....	31
FIG. 24	OCCUPIED 6DB BANDWIDTH (802.11N-40MHZ, CH 9).....	31
A.5. BAND EDGES COMPLIANCE		32
FIG. 25	BAND EDGES (802.11B, CH 1)	33
FIG. 26	BAND EDGES (802.11B, CH 11)	33
FIG. 27	BAND EDGES (802.11G, CH 1).....	34
FIG. 28	BAND EDGES (802.11G, CH 11).....	34
FIG. 29	BAND EDGES (802.11N-20MHZ, CH 1)	35
FIG. 30	BAND EDGES (802.11N-20MHZ, CH 11)	35
FIG. 31	BAND EDGES (802.11N-40MHZ, CH 3)	36
FIG. 32	BAND EDGES (802.11N-40MHZ, CH 9)	36
A.6. TRANSMITTER SPURIOUS EMISSION		37
A.6.1 TRANSMITTER SPURIOUS EMISSION - CONDUCTED		37
FIG. 33	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, CENTER FREQUENCY)	40
FIG. 34	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 30 MHZ-1 GHz).....	41
FIG. 35	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 1 GHz-2.5 GHz)	41
FIG. 36	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 2.5 GHz-7.5 GHz)	42
FIG. 37	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 7.5 GHz-10 GHz)	42
FIG. 38	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 10 GHz-15 GHz)	43
FIG. 39	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 15 GHz-20 GHz)	43
FIG. 40	CONDUCTED SPURIOUS EMISSION (802.11B, CH1, 20 GHz-26 GHz)	44
FIG. 41	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, CENTER FREQUENCY)	44
FIG. 42	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 30 MHZ-1 GHz).....	45
FIG. 43	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 1 GHz-2.5 GHz)	45
FIG. 44	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 2.5 GHz-7.5 GHz)	46
FIG. 45	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 7.5 GHz-10 GHz)	46
FIG. 46	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 10 GHz-15 GHz)	47
FIG. 47	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 15 GHz-20 GHz)	47
FIG. 48	CONDUCTED SPURIOUS EMISSION (802.11B, CH6, 20 GHz-26 GHz)	48
FIG. 49	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, CENTER FREQUENCY)	48

FIG. 50	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 30 MHz-1 GHz).....	49
FIG. 51	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 1 GHz-2.5 GHz)	49
FIG. 52	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 2.5 GHz-7.5 GHz)	50
FIG. 53	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 7.5 GHz-10 GHz)	50
FIG. 54	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 10 GHz-15 GHz)	51
FIG. 55	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 15 GHz-20 GHz)	51
FIG. 56	CONDUCTED SPURIOUS EMISSION (802.11B, CH11, 20 GHz-26 GHz)	52
FIG. 57	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, CENTER FREQUENCY).....	52
FIG. 58	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 30 MHz-1 GHz)	53
FIG. 59	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 1 GHz-2.5 GHz)	53
FIG. 60	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 2.5 GHz-7.5 GHz)	54
FIG. 61	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 7.5 GHz-10 GHz)	54
FIG. 62	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 10 GHz-15 GHz)	55
FIG. 63	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 15 GHz-20 GHz)	55
FIG. 64	CONDUCTED SPURIOUS EMISSION (802.11G, CH1, 20 GHz-26 GHz)	56
FIG. 65	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, CENTER FREQUENCY).....	56
FIG. 66	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 30 MHz-1 GHz)	57
FIG. 67	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 1 GHz-2.5 GHz)	57
FIG. 68	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 2.5 GHz-7.5 GHz)	58
FIG. 69	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 7.5 GHz-10 GHz)	58
FIG. 70	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 10 GHz-15 GHz)	59
FIG. 71	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 15 GHz-20 GHz)	59
FIG. 72	CONDUCTED SPURIOUS EMISSION (802.11G, CH6, 20 GHz-26 GHz)	60
FIG. 73	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, CENTER FREQUENCY).....	60
FIG. 74	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 30 MHz-1 GHz).....	61
FIG. 75	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 1 GHz-2.5 GHz)	61
FIG. 76	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 2.5 GHz-7.5 GHz)	62
FIG. 77	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 7.5 GHz-10 GHz)	62
FIG. 78	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 10 GHz-15 GHz)	63
FIG. 79	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 15 GHz-20 GHz)	63
FIG. 80	CONDUCTED SPURIOUS EMISSION (802.11G, CH11, 20 GHz-26 GHz)	64
FIG. 81	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, CENTER FREQUENCY)	64
FIG. 82	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 30 MHz-1 GHz).....	65
FIG. 83	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 1 GHz-2.5 GHz).....	65
FIG. 84	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 2.5 GHz-7.5 GHz).....	66
FIG. 85	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 7.5 GHz-10 GHz).....	66
FIG. 86	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 10 GHz-15 GHz).....	67
FIG. 87	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 15 GHz-20 GHz).....	67
FIG. 88	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH1, 20 GHz-26 GHz).....	68
FIG. 89	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, CENTER FREQUENCY)	68
FIG. 90	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 30 MHz-1 GHz).....	69
FIG. 91	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 1 GHz-2.5 GHz).....	69
FIG. 92	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 2.5 GHz-7.5 GHz).....	70
FIG. 93	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 7.5 GHz-10 GHz).....	70

FIG. 94	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 10 GHz-15 GHz).....	71
FIG. 95	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 15 GHz-20 GHz).....	71
FIG. 96	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH6, 20 GHz-26 GHz).....	72
FIG. 97	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, CENTER FREQUENCY)	72
FIG. 98	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 30 MHz-1 GHz).....	73
FIG. 99	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 1 GHz-2.5 GHz).....	73
FIG. 100	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 2.5 GHz-7.5 GHz).....	74
FIG. 101	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 7.5 GHz-10 GHz).....	74
FIG. 102	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 10 GHz-15 GHz).....	75
FIG. 103	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 15 GHz-20 GHz).....	75
FIG. 104	CONDUCTED SPURIOUS EMISSION (802.11N-HT20, CH11, 20 GHz-26 GHz).....	76
FIG. 105	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, CENTER FREQUENCY).....	76
FIG. 106	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 30 MHz-1 GHz)	77
FIG. 107	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 1 GHz-2.5 GHz).....	77
FIG. 108	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 2.5 GHz-7.5 GHz).....	78
FIG. 109	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 7.5 GHz-10 GHz).....	78
FIG. 110	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 10 GHz-15 GHz).....	79
FIG. 111	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 15 GHz-20 GHz).....	79
FIG. 112	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH3, 20 GHz-26 GHz).....	80
FIG. 113	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, CENTER FREQUENCY).....	80
FIG. 114	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 30 MHz-1 GHz)	81
FIG. 115	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 1 GHz-2.5 GHz).....	81
FIG. 116	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 2.5 GHz-7.5 GHz).....	82
FIG. 117	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 7.5 GHz-10 GHz).....	82
FIG. 118	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 10 GHz-15 GHz).....	83
FIG. 119	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 15 GHz-20 GHz).....	83
FIG. 120	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH6, 20 GHz-26 GHz).....	84
FIG. 121	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, CENTER FREQUENCY).....	84
FIG. 122	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 30 MHz-1 GHz)	85
FIG. 123	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 1 GHz-2.5 GHz).....	85
FIG. 124	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 2.5 GHz-7.5 GHz).....	86
FIG. 125	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 7.5 GHz-10 GHz).....	86
FIG. 126	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 10 GHz-15 GHz).....	87
FIG. 127	CONDUCTED SPURIOUS EMISSION (802.11N- HT40, CH9, 15 GHz-20 GHz).....	87
FIG. 128	CONDUCTED SPURIOUS EMISSION (802.11N-HT40, CH9, 20 GHz-26 GHz).....	88
A.6.2 TRANSMITTER SPURIOUS EMISSION - RADIATED.....		89
FIG. 129	RADIATED SPURIOUS EMISSION (POWER): 802.11B, CH1, 2.38 GHz - 245GHz.....	96
FIG. 130	RADIATED SPURIOUS EMISSION (802.11B, CH1, 30 MHz-1 GHz)	96
FIG. 131	RADIATED SPURIOUS EMISSION (802.11B, CH1, 1 GHz-3 GHz).....	97
FIG. 132	RADIATED SPURIOUS EMISSION (802.11B, CH1, 3 GHz-18 GHz).....	97
FIG. 133	RADIATED SPURIOUS EMISSION (802.11B, CH6, 30 MHz-1 GHz)	98
FIG. 134	RADIATED SPURIOUS EMISSION (802.11B, CH6, 1 GHz-3 GHz).....	98
FIG. 135	RADIATED SPURIOUS EMISSION (802.11B, CH6, 3 GHz-18 GHz).....	99
FIG. 136	RADIATED SPURIOUS EMISSION (POWER): 802.11B, CH11, 2.45 GHz - 2.50GHz.....	99

FIG. 137	RADIATED SPURIOUS EMISSION (802.11B, CH11, 30 MHz-1 GHz)	100
FIG. 138	RADIATED SPURIOUS EMISSION (802.11B, CH11, 1 GHz-3 GHz).....	100
FIG. 139	RADIATED SPURIOUS EMISSION (802.11B, CH11, 3 GHz-18 GHz).....	101
FIG. 140	RADIATED SPURIOUS EMISSION (POWER): 802.11G, CH1, 2.38 GHz - 2.45GHz.....	101
FIG. 141	RADIATED SPURIOUS EMISSION (802.11G, CH1, 30 MHz-1 GHz).....	102
FIG. 142	RADIATED SPURIOUS EMISSION (802.11G, CH1, 1 GHz-3 GHz).....	102
FIG. 143	RADIATED SPURIOUS EMISSION (802.11G, CH1, 3 GHz-18 GHz).....	103
FIG. 144	RADIATED SPURIOUS EMISSION (802.11G, CH6, 30 MHz-1 GHz).....	103
FIG. 145	RADIATED SPURIOUS EMISSION (802.11G, CH6, 1 GHz-3 GHz).....	104
FIG. 146	RADIATED SPURIOUS EMISSION (802.11G, CH6, 3 GHz-18 GHz).....	104
FIG. 147	RADIATED SPURIOUS EMISSION (POWER): 802.11G, CH11, 2.45 GHz - 2.50GHz.....	105
FIG. 148	RADIATED SPURIOUS EMISSION (802.11G, CH11, 30 MHz-1 GHz).....	105
FIG. 149	RADIATED SPURIOUS EMISSION (802.11G, CH11, 1 GHz-3 GHz).....	106
FIG. 150	RADIATED SPURIOUS EMISSION (802.11G, CH11, 3 GHz-18 GHz).....	106
FIG. 151	RADIATED SPURIOUS EMISSION (POWER): 802.11N-20MHz, CH1, 2.38 GHz - 2.45GHz ...	107
FIG. 152	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH1, 30 MHz-1 GHz)	107
FIG. 153	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH1, 1 GHz-3 GHz)	108
FIG. 154	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH1, 3 GHz-18 GHz)	108
FIG. 155	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH6, 30 MHz-1 GHz)	109
FIG. 156	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH6, 1 GHz-3 GHz)	109
FIG. 157	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH6, 3 GHz-18 GHz).....	110
FIG. 158	RADIATED SPURIOUS EMISSION (POWER): 802.11N-20MHz, CH11, 2.45 GHz - 2.50GHz ..	110
FIG. 159	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH11, 30 MHz-1 GHz)	111
FIG. 160	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH11, 1 GHz-3 GHz).....	111
FIG. 161	RADIATED SPURIOUS EMISSION (802.11N-20MHz, CH11, 3 GHz-18 GHz).....	112
FIG. 162	RADIATED SPURIOUS EMISSION (POWER): 802.11N-40MHz, CH3, 2.38 GHz - 2.45GHz	112
FIG. 163	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH3, 30 MHz-1 GHz)	113
FIG. 164	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH3, 1 GHz-3 GHz)	113
FIG. 165	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH3, 3 GHz-18 GHz).....	114
FIG. 166	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH6, 30 MHz-1 GHz)	114
FIG. 167	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH6, 1 GHz-3 GHz).....	115
FIG. 168	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH6, 3 GHz-18 GHz).....	115
FIG. 169	RADIATED SPURIOUS EMISSION (POWER): 802.11N-40MHz, CH9, 2.45 GHz - 2.50GHz	116
FIG. 170	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH9, 30 MHz-1 GHz)	116
FIG. 171	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH9, 1 GHz-3 GHz)	117
FIG. 172	RADIATED SPURIOUS EMISSION (802.11N-40MHz, CH9, 3 GHz-18 GHz).....	117
FIG. 173	RADIATED SPURIOUS EMISSION (ALL CHANNELS): 18GHz – 26.5GHz	118
A.7	AC POWERLINE CONDUCTED EMISSION	119
FIG. 174	AC POWERLINE CONDUCTED EMISSION-802.11B	120

1. TEST LABORATORY

1.1. Testing Location

Company Name: TMC Beijing, Telecommunication Metrology Center of MIIT
Address: No. 52, Huayuan Bei Road, Haidian District, Beijing, P. R. China
Postal Code: 100191
Telephone: 00861062304633
Fax: 00861062304793

1.2. Testing Environment

Normal Temperature: 15-30°C
Extreme Temperature: -10/+55°C
Relative Humidity: 30-60%
Air Pressure 990hPa-1040hPa

Note: The climatic requirements above are general exclude the special requirements for dedicated test environments listed in section 5 and some specific test cases in other parts of this report.

1.3. Project data

Testing Start Date: 2012-07-27
Testing End Date: 2012-08-14

1.4. Signature



Xu Zhongfei
(Prepared this test report)



Gao Hong
(Reviewed this test report)



Xiao Li
Deputy Director of the laboratory
(Approved this test report)

2. CLIENT INFORMATION

2.1. Applicant Information

Company Name: ZTE CORPORATION
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2.2. Manufacturer Information

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Fax: +86-21-50801070

3. EQUIPMENT UNDER TEST(EUT) AND ANCILLARY EQUIPMENT(AE)

3.1. About EUT

Description	WCDMA/GSM (GPRS) Dual-Mode Digital Mobile Phone
Type	ZTE V791
FCC ID	Q78-V791
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	21.26dBm(OFDM)
Power Supply	3.7V DC by Battery

Note: Photographs of EUT are shown in ANNEX C of this test report.

3.2. Internal Identification of EUT used during the test

EUT ID*	IMEI	HW Version	SW Version
EUT1	867525010007837	WMAK	CLA-UNI-QB25S-P175A40V1.0.0
EUT2	867525010001335	WMAK	CLA-UNI-QB25S-P175A40V1.0.0

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

3.3. Internal Identification of AE used during the test

AE ID*	Description	Type	SN
AE1	Battery	Li3712T42P3h654246h	/
AE2	Traveller Charger	STC-A22O50I700USBA-Z	/

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

3.4. General Description

Equipment Under Test (EUT) is a model of WCDMA/GSM (GPRS) Dual-Mode Digital Mobile Phone with integrated antenna. It consists of normal options: Battery and Charger.

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

Samples undergoing test were selected by the Client.

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.

FCC Part15	FCC CFR 47, Part 15, Subpart C: 15.205 Restricted bands of operation; 15.209 Radiated emission limits, general requirements; 15.247 Operation within the bands 902-928MHz, 2400-2483.5 MHz, and 5725-5850 MHz.	Oct, 2009 Edition
ANSI C63.4	Methods of Measurement of Radio-Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the Range of 9 kHz to 40 GHz	2009
KDB558074 D01	Guidance for Performing Compliance Measurements on Digital Transmission Systems (DTS) Operating Under §15.247	January 18, 2012

5. LABORATORY ENVIRONMENT

Shielding Room1 (6.0 meters×3.0 meters×2.7 meters) did not exceed following limits along the conducted RF performance testing:

Temperature	Min. = 15 °C, Max. = 30 °C
Relative humidity	Min. = 30 %, Max. = 60 %
Shielding effectiveness	> 110 dB
Ground system resistance	< 0.5 Ω
Uniformity of field strength	Between 0 and 6 dB, from 80MHz to 3000 MHz

Control room did not exceed following limits along the EMC testing:

Temperature	Min. = 15 °C, Max. = 35 °C
Relative humidity	Min. = 30 %, Max. = 60 %
Shielding effectiveness	> 110 dB
Electrical insulation	> 10 kΩ
Ground system resistance	< 0.5 Ω

Semi-anechoic chamber (23 meters×17meters×10meters) did not exceed following limits along the EMC testing::

Temperature	Min. = 15 °C, Max. = 30 °C
Relative humidity	Min. = 30 %, Max. = 60 %
Shielding effectiveness	> 110 dB
Electrical insulation	> 10 kΩ
Ground system resistance	< 0.5 Ω
Normalised site attenuation (NSA)	< ±3.2 dB, 10 m distance, from 30 to 1000 MHz
Uniformity of field strength	Between 0 and 6 dB, from 80MHz to 3000 MHz

Shielding Room2 (7.30 meters×4.00 meters×3.80 meters) did not exceed following limits along the EMC testing:

Temperature	Min. = 15 °C, Max. = 30 °C
Relative humidity	Min. = 35 %, Max. = 60 %
Shielding effectiveness	> 110 dB
Electrical insulation	> 10 kΩ
Ground system resistance	< 0.5 Ω
Uniformity of field strength	Between 0 and 6 dB, from 80MHz to 3000 MHz

6. SUMMARY OF TEST RESULTS

6.1. Summary of Test Results

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

Please refer to **ANNEX A** for detail.

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Terms used in Verdict column

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

6.2. Statements

TMC has evaluated the test cases requested by the client/manufacturer as listed in section 6.1 of this report for the EUT specified in section 3 according to the standards or reference documents listed in section 4.1.

This report only deals with the WLAN function among the features described in section 3.

This model is a variant product which market name is ZTE V791; all the test result has been derived from test report of ZTE V791 besides Radiated Transmitter Spurious Emission and AC Powerline Conducted Emission.

Test Conditions

T nom	Normal Temperature
T min	Low Temperature
T max	High Temperature
V nom	Normal Voltage
V min	Low Voltage
V max	High Voltage
H nom	Norm Humidity
A nom	Norm Air Pressure

For this report, all the test cases listed above are tested under Normal Temperature and Normal Voltage which is using a new battery, and also under norm humidity, the specific conditions as following:

Temperature	T nom	26°C
Voltage	V nom	3.7V(By battery)

Humidity	H nom	44%
Air Pressure	A nom	1010hPa

7. TEST EQUIPMENTS UTILIZED

Conducted test system

No.	Equipment	Model	Serial Number	Manufacturer	Calibration Due date
1	Vector Signal Analyzer	FSQ40	200089	Rohde & Schwarz	2013-07-19
2	Spectrum Analyzer	MS2687B	6200819812	Anritsu	2013-09-22
3	Test Receiver	ESS	847151/015	Rohde & Schwarz	2013-10-30
4	LISN	ESH2-Z5	829991/012	Rohde & Schwarz	2013-08-12

Radiated emission test system

No.	Equipment	Model	Serial Number	Manufacturer	Calibration Due date
1	Test Receiver	ESI40	831564/002	Rohde & Schwarz	2013-08-11
2	BiLog Antenna	3142B	9908-1403	EMCO	2013-03-15
3	Dual-Ridge Waveguide Horn Antenna	3115	9906-5827	EMCO	2012-12-25
4	Dual-Ridge Waveguide Horn Antenna	3116	2661	EMCO	2013-06-30

Anechoic chamber

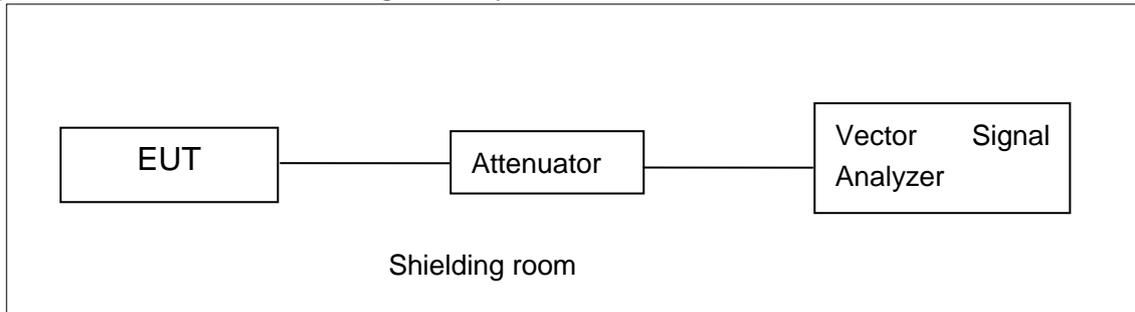
Anechoic chamber by Frankonia German.

ANNEX A: MEASUREMENT RESULTS

A.1. Measurement Method

A.1.1. Conducted Measurements

- 1). Connect the EUT to the test system correctly.
- 2). Set the EUT to the required work mode.
- 3). Set the EUT to the required channel.
- 4). Set the spectrum analyzer to start measurement.
- 5). Record the values. Vector Signal Analyzer

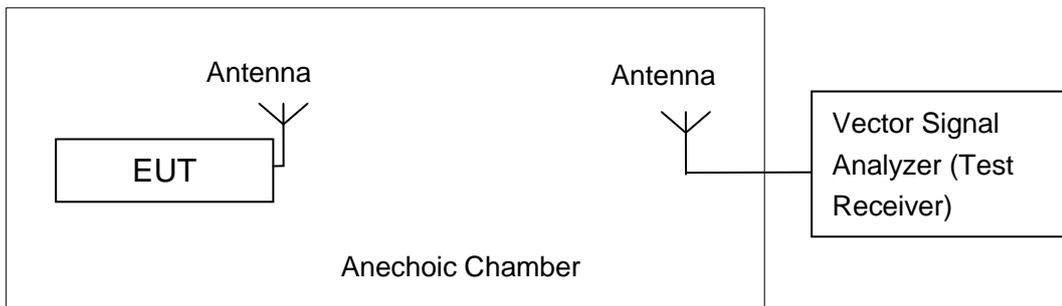


A.1.2. Radiated Emission Measurements

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;



The measurement is made according to ANSI C63.4 and KDB558074 D01.

A.2. Maximum Output Power

Measurement Limit and Method:

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

The measurement is made according to ANSI C63.4 and KDB558074 D01, and EUT is operating in continuous transmitting mode

Measurement Uncertainty:

Measurement Uncertainty	0.75dB
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A.2.1. Maximum Peak Output Power-conducted

Measurement Results:

802.11b/g mode

Mode	Data Rate (Mbps)	Test Result (dBm)		
		2412MHz (Ch1)	2437MHz (Ch6)	2462 MHz (Ch11)
802.11b	1	16.63	/	/
	2	17.38	/	/
	5.5	18.72	/	/
	11	20.32	20.23	20.38
802.11g	6	20.56	/	/
	9	20.55	/	/
	12	20.27	/	/
	18	20.41	/	/
	24	20.87	/	/
	36	20.90	/	/
	48	21.04	/	/
	54	21.09	21.02	21.05

The data rate 11Mbps and 54Mbps are selected as worse condition, and the following cases are performed with this condition.

802.11n-HT20 mode

Mode	Data Rate (Index)	Test Result (dBm)		
		2412MHz (Ch1)	2437MHz (Ch6)	2462 MHz (Ch11)
802.11n (20MHz)	MCS0	20.54	/	/
	MCS1	20.26	/	/
	MCS2	20.37	/	/
	MCS3	20.85	/	/
	MCS4	20.96	/	/
	MCS5	21.07	20.94	21.26
	MCS6	21.01	/	/

	MCS7	20.97	/	/
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The data rate MCS5 is selected as worse condition, and the following cases are performed with this condition.

802.11n-HT40 mode

Mode	Data Rate (Index)	Test Result (dBm)		
		2422MHz (Ch3)	2437MHz (Ch6)	2452 MHz (Ch9)
802.11n (40MHz)	MCS0	18.83	/	/
	MCS1	19.15	/	/
	MCS2	18.83	/	/
	MCS3	19.22	/	/
	MCS4	19.31	/	/
	MCS5	19.35	19.24	19.69
	MCS6	19.30	/	/
	MCS7	19.31	/	/

The data rate MCS5 is selected as worse condition, and the following cases are performed with this condition.

A.2.2. Maximum Average Output Power-conducted

802.11b/g mode

Mode	Test Result (dBm)		
	2412MHz (Ch1)	2437MHz (Ch6)	2462 MHz (Ch11)
802.11b	13.83	13.94	13.85
802.11g	11.74	12.01	11.79

802.11n-HT20 mode

Mode	Test Result (dBm)		
	2412MHz (Ch1)	2437MHz (Ch6)	2462 MHz (Ch11)
802.11n (20MHz)	11.95	11.85	11.81

802.11n-HT40 mode

Mode	Test Result (dBm)		
	2422MHz (Ch3)	2437MHz (Ch6)	2452 MHz (Ch9)
802.11n (40MHz)	10.01	10.38	10.24

Conclusion: PASS

A.3. Peak Power Spectral Density

Measurement Limit:

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

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Measurement Uncertainty:

Measurement Uncertainty	0.75dB
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Measurement Results:

802.11b/g mode

Mode	Channel	Power Spectral Density (dBm/3 kHz)		Conclusion
802.11b	1	Fig.1	-9.76	P
	6	Fig.2	-9.97	P
	11	Fig.3	-9.69	P
802.11g	1	Fig.4	-14.94	P
	6	Fig.5	-14.87	P
	11	Fig.6	-14.60	P

802.11n-HT20 mode

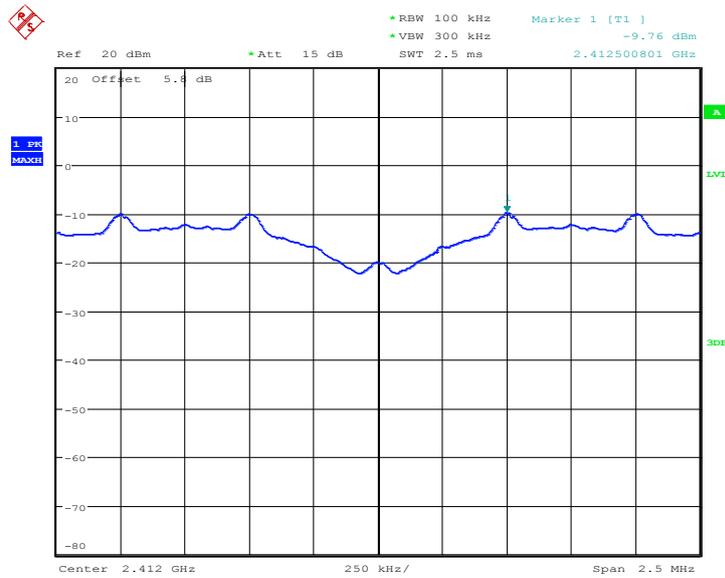
Mode	Channel	Power Spectral Density (dBm/3 kHz)		Conclusion
802.11n (20MHz)	1	Fig.7	-15.34	P
	6	Fig.8	-14.91	P
	11	Fig.9	-15.23	P

802.11n-HT40 mode

Mode	Channel	Power Spectral Density (dBm/3 kHz)		Conclusion
802.11n (40MHz)	3	Fig.10	-21.48	P
	6	Fig.11	-21.87	P
	9	Fig.12	-21.42	P

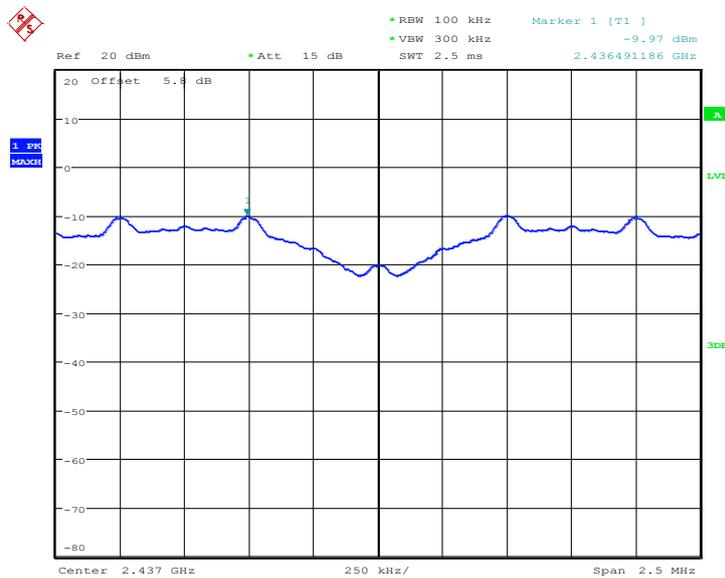
Conclusion: PASS

Test graphs as below:



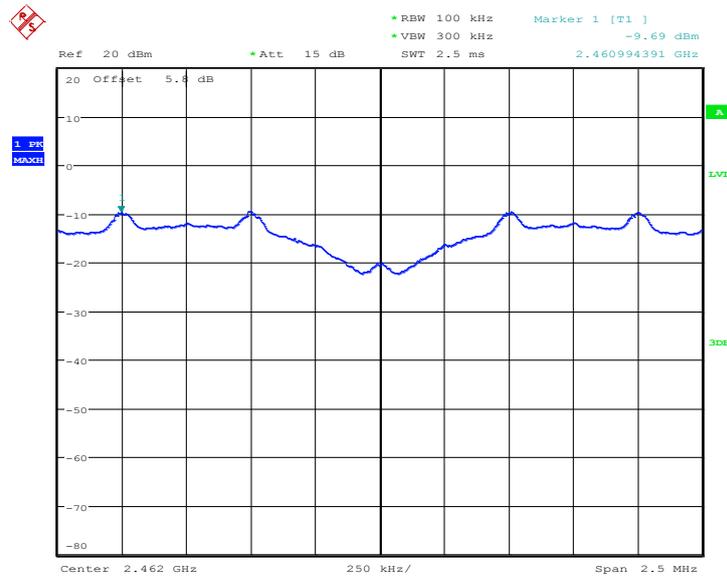
Date: 9.AUG.2012 15:31:48

Fig. 1 Power Spectral Density (802.11b, Ch 1)



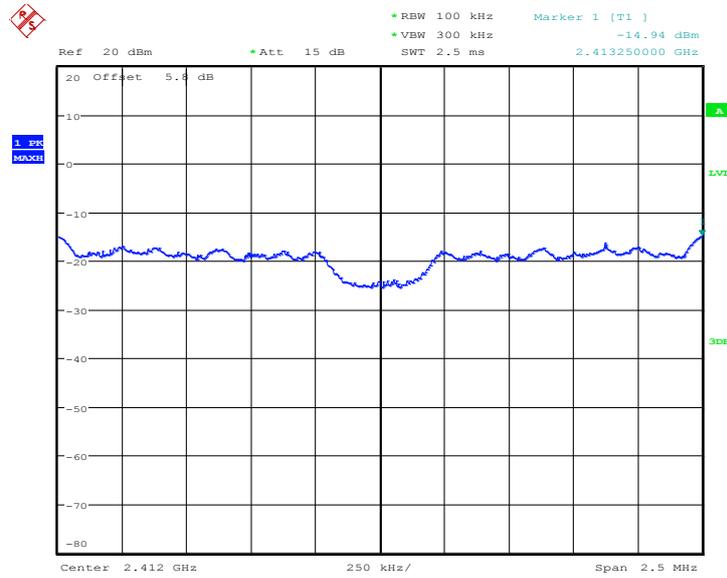
Date: 9.AUG.2012 15:32:33

Fig. 2 Power Spectral Density (802.11b, Ch 6)



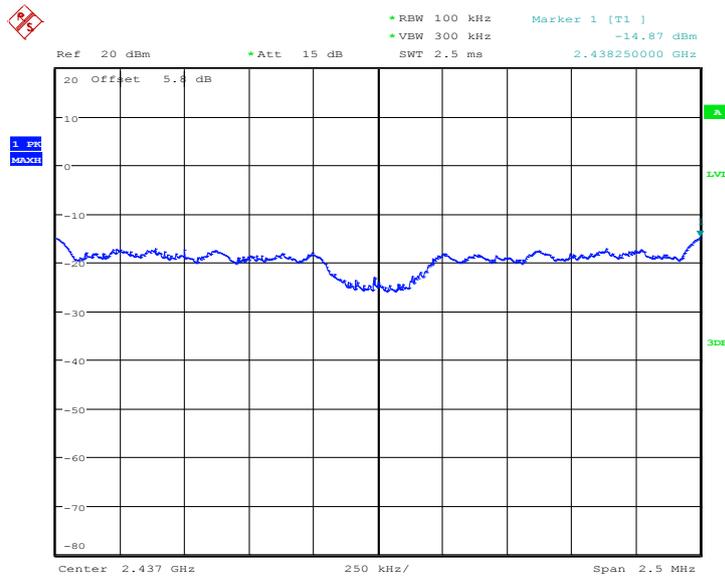
Date: 9.AUG.2012 15:33:13

Fig. 3 Power Spectral Density (802.11b, Ch 11)



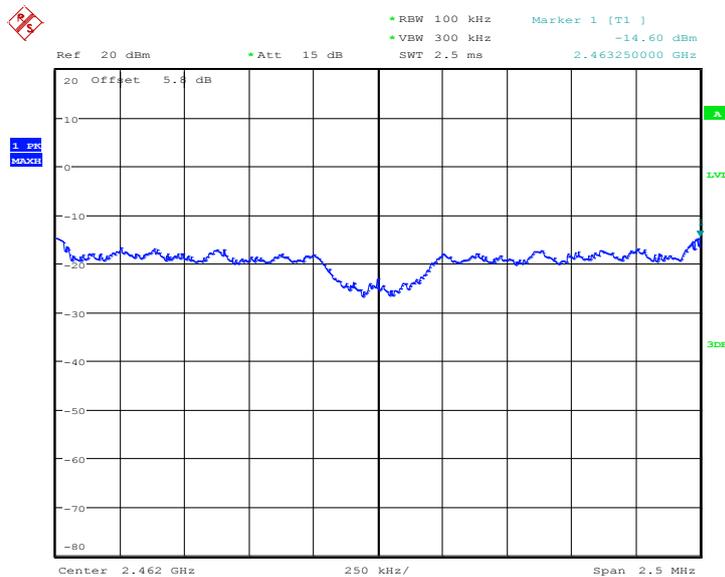
Date: 9.AUG.2012 15:34:15

Fig. 4 Power Spectral Density (802.11g, Ch 1)



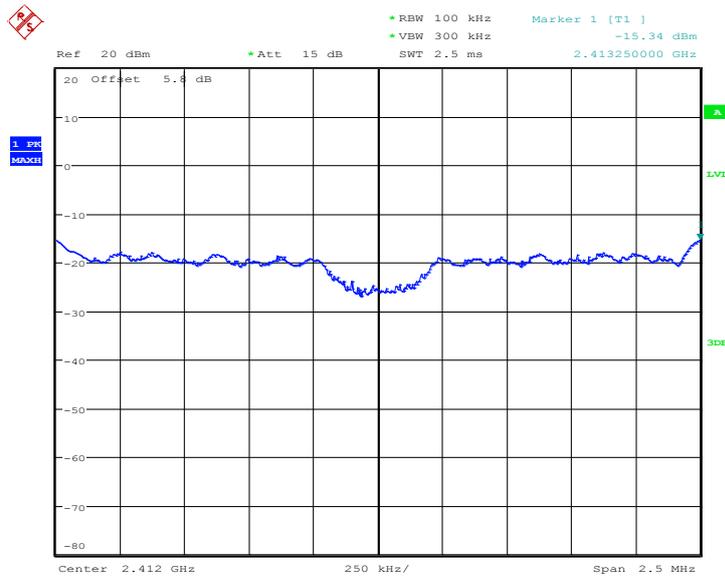
Date: 9.AUG.2012 15:34:56

Fig. 5 Power Spectral Density (802.11g, Ch 6)



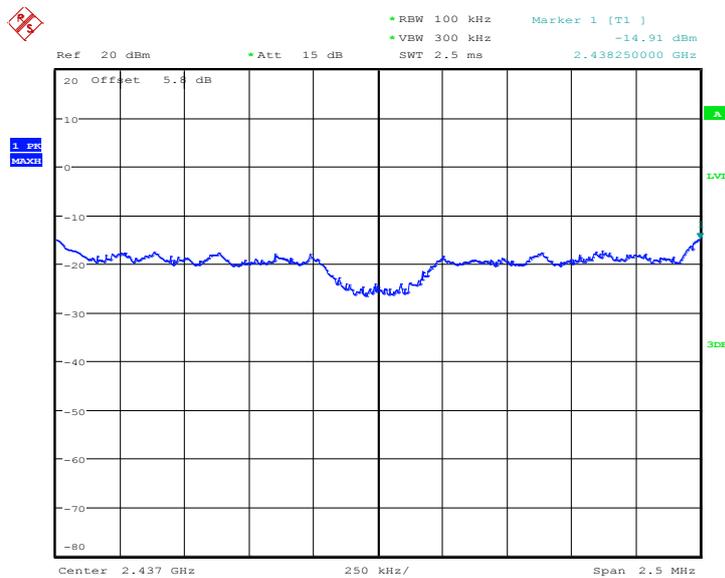
Date: 9.AUG.2012 15:35:25

Fig. 6 Power Spectral Density (802.11g, Ch 11)



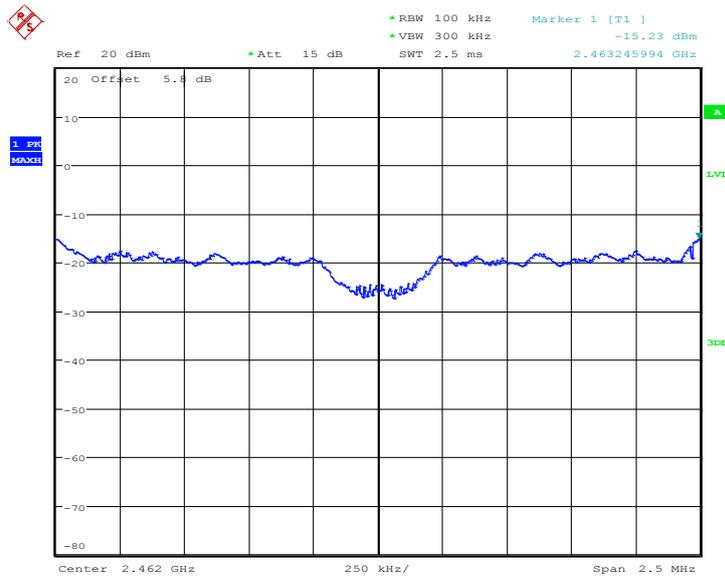
Date: 9.AUG.2012 15:36:17

Fig. 7 Power Spectral Density (802.11n-20MHz, Ch 1)



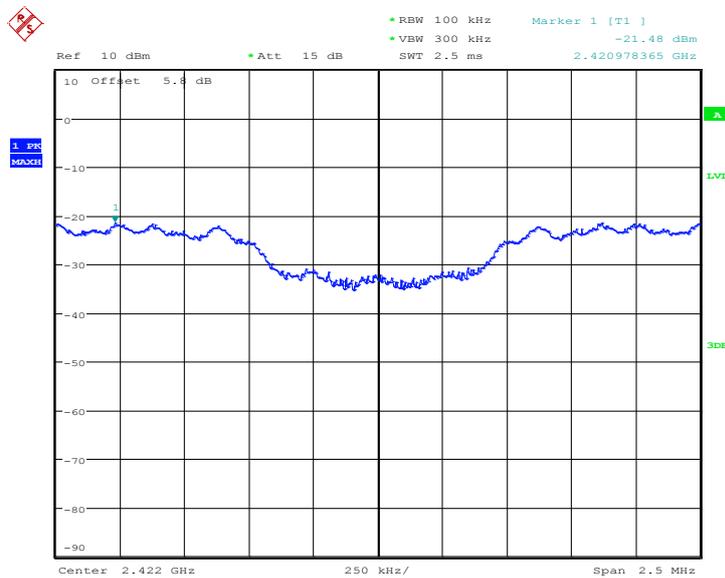
Date: 9.AUG.2012 15:37:31

Fig. 8 Power Spectral Density (802.11n-20MHz, Ch 6)



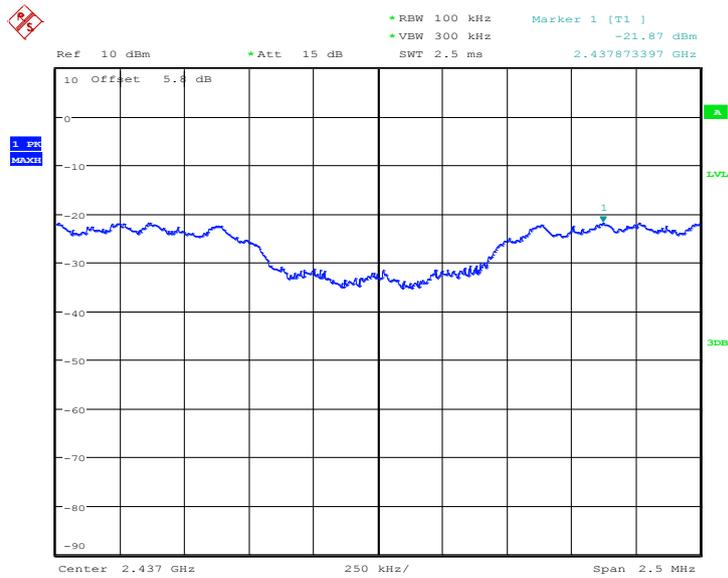
Date: 9.AUG.2012 15:38:29

Fig. 9 Power Spectral Density (802.11n-20MHz, Ch 11)



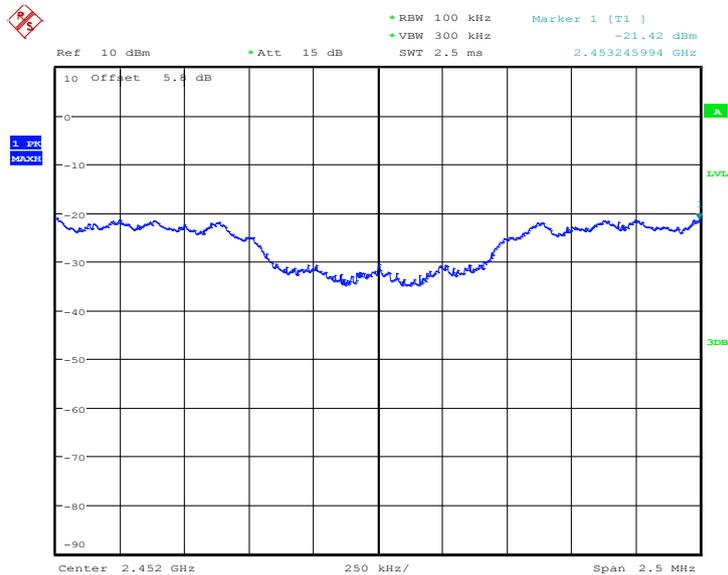
Date: 9.AUG.2012 15:39:23

Fig. 10 Power Spectral Density (802.11n-40MHz, Ch 3)



Date: 9.AUG.2012 15:39:57

Fig. 11 Power Spectral Density (802.11n-40MHz, Ch 6)



Date: 9.AUG.2012 15:40:37

Fig. 12 Power Spectral Density (802.11n-40MHz, Ch 9)

A.4. Occupied 6dB Bandwidth

Measurement Limit:

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

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Measurement Uncertainty:

Measurement Uncertainty	60.80Hz
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Measurement Result:

802.11b/g mode

Mode	Channel	Occupied 6dB Bandwidth (kHz)		conclusion
802.11b	1	Fig.13	9103	P
	6	Fig.14	9103	P
	11	Fig.15	9038	P
802.11g	1	Fig.16	16538	P
	6	Fig.17	16538	P
	11	Fig.18	16538	P

802.11n-HT20 mode

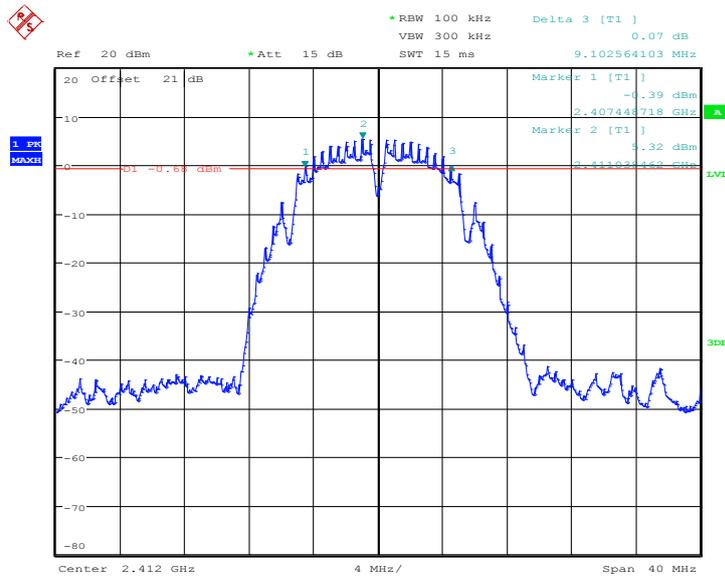
Mode	Channel	Occupied 6dB Bandwidth (kHz)		conclusion
802.11n (20MHz)	1	Fig.19	17756	P
	6	Fig.20	17756	P
	11	Fig.21	17692	P

802.11n-HT40 mode

Mode	Channel	Occupied 6dB Bandwidth (kHz)		conclusion
802.11n (40MHz)	3	Fig.22	35673	P
	6	Fig.23	35673	P
	9	Fig.24	35673	P

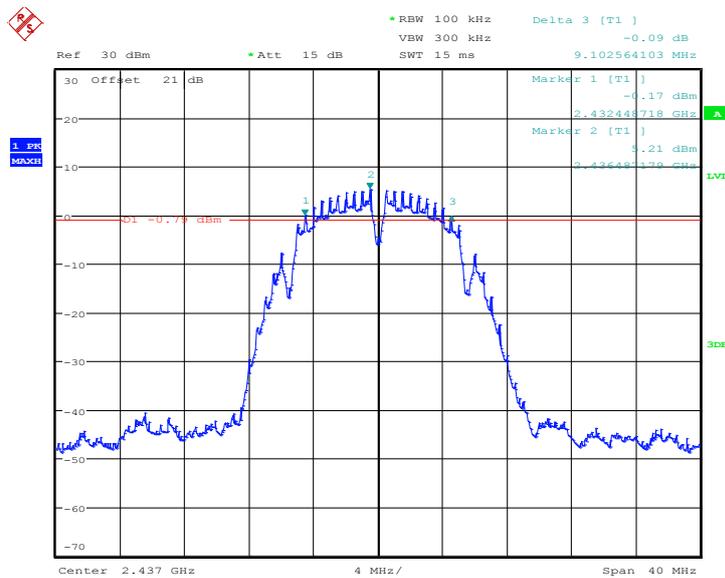
Conclusion: PASS

Test graphs as below:



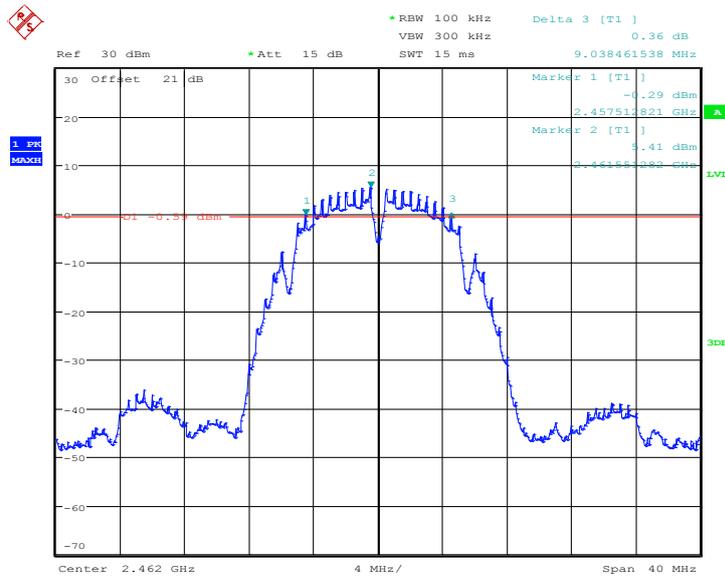
Date: 9.AUG.2012 13:48:41

Fig. 13 Occupied 6dB Bandwidth (802.11b, Ch 1)



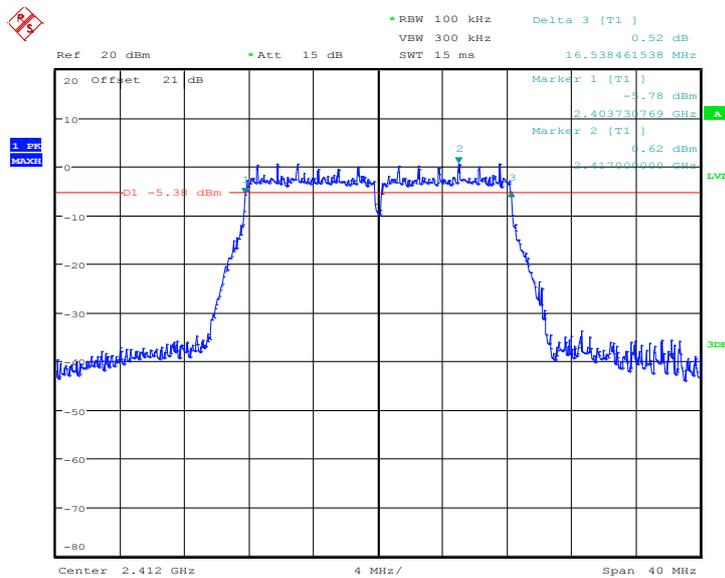
Date: 9.AUG.2012 13:50:34

Fig. 14 Occupied 6dB Bandwidth (802.11b, Ch 6)



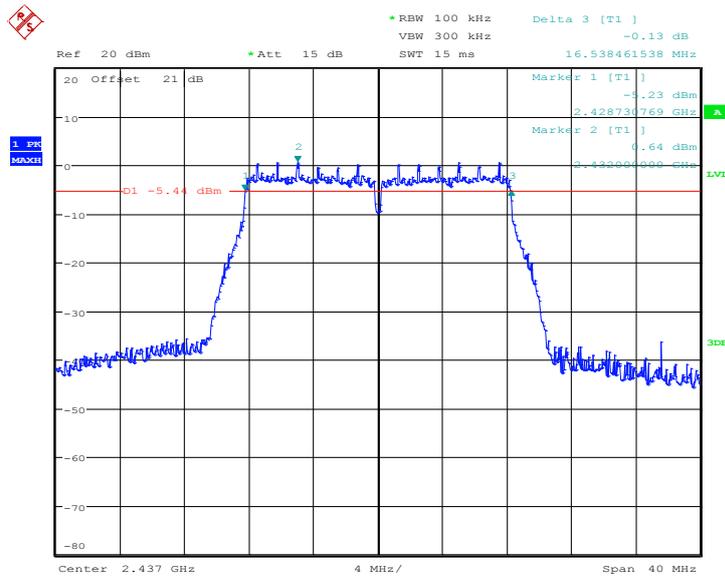
Date: 9.AUG.2012 13:52:14

Fig. 15 Occupied 6dB Bandwidth (802.11b, Ch 11)



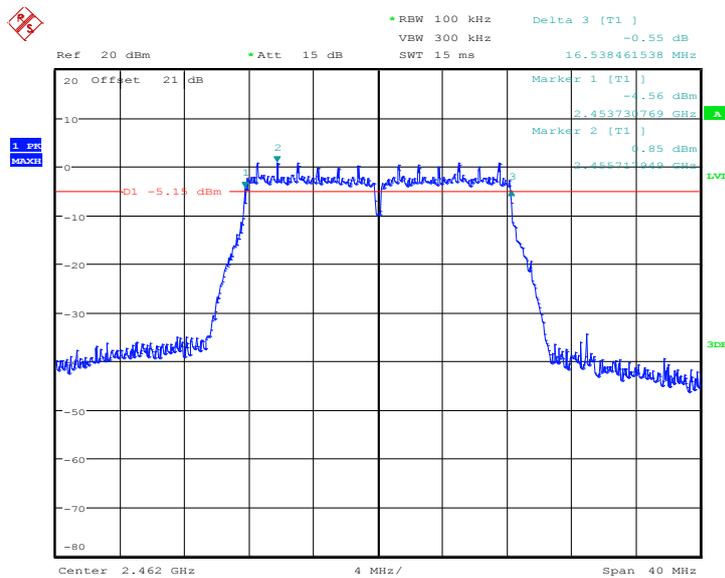
Date: 9.AUG.2012 13:54:13

Fig. 16 Occupied 6dB Bandwidth (802.11g, Ch 1)



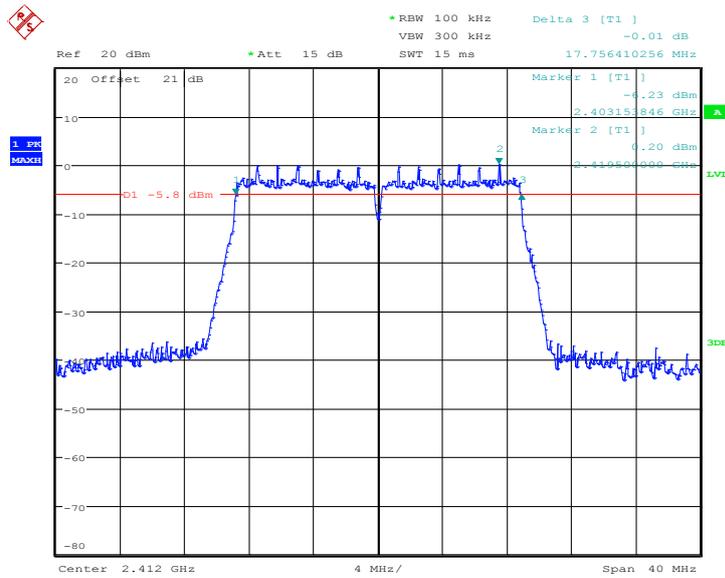
Date: 9.AUG.2012 13:55:49

Fig. 17 Occupied 6dB Bandwidth (802.11g, Ch 6)



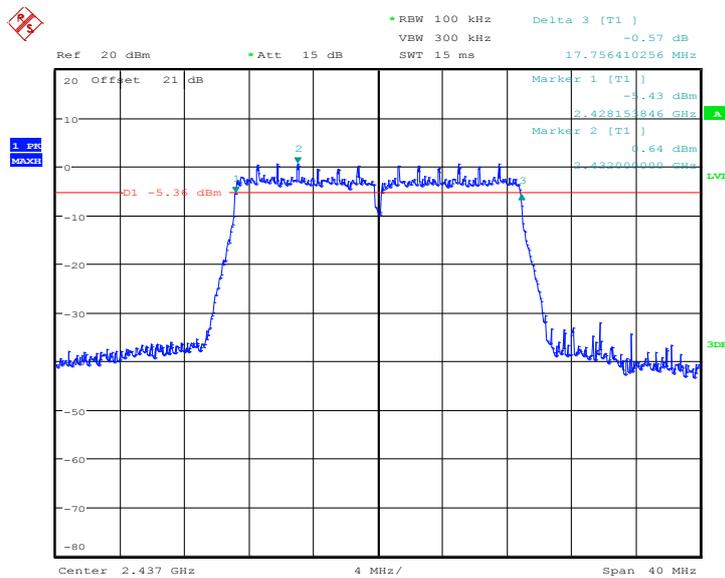
Date: 9.AUG.2012 13:57:25

Fig. 18 Occupied 6dB Bandwidth (802.11g, Ch 11)



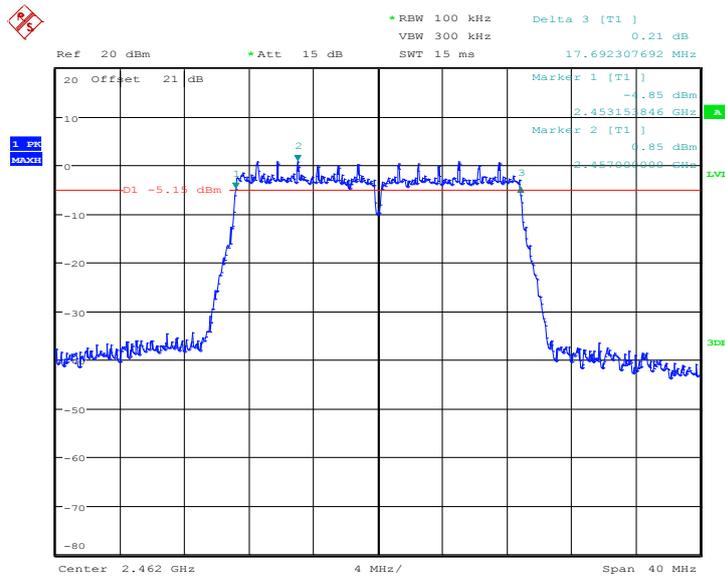
Date: 9.AUG.2012 13:59:35

Fig. 19 Occupied 6dB Bandwidth (802.11n-20MHz, Ch 1)



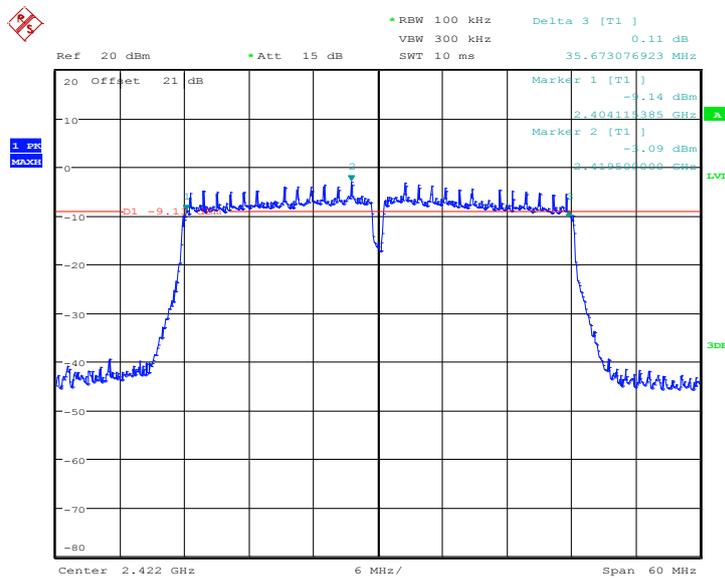
Date: 9.AUG.2012 14:02:11

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



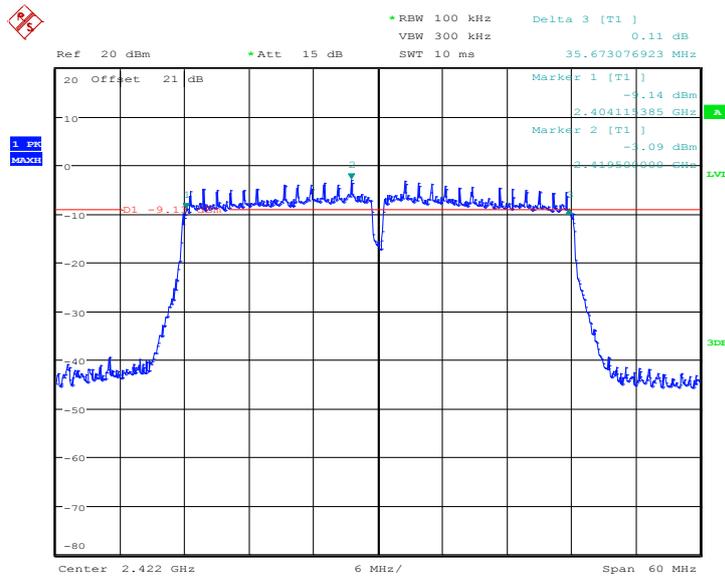
Date: 9.AUG.2012 14:03:50

Fig. 21 Occupied 6dB Bandwidth (802.11n-20MHz, Ch 11)



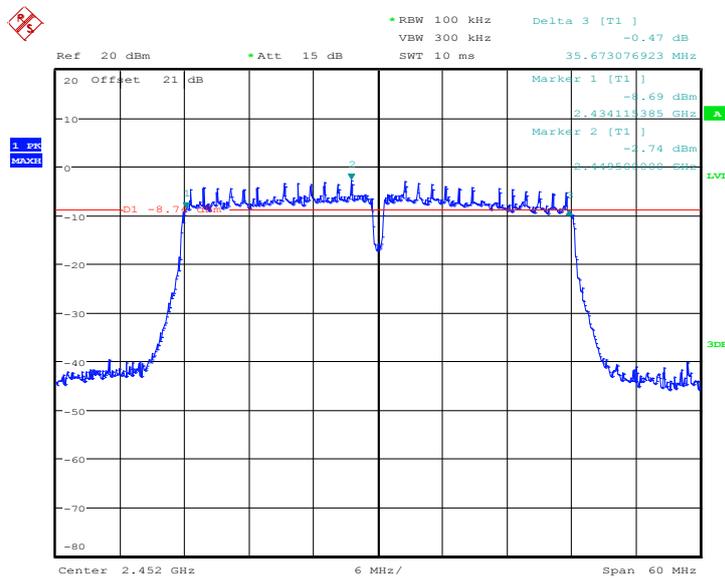
Date: 9.AUG.2012 14:06:09

Fig. 22 Occupied 6dB Bandwidth (802.11n-40MHz, Ch 3)



Date: 9.AUG.2012 14:06:09

Fig. 23 Occupied 6dB Bandwidth (802.11n-40MHz, Ch 6)



Date: 9.AUG.2012 14:10:04

Fig. 24 Occupied 6dB Bandwidth (802.11n-40MHz, Ch 9)

A.5. Band Edges Compliance

Measurement Limit:

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

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Measurement Uncertainty:

Measurement Uncertainty	0.75dB
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Measurement Result:

802.11b/g mode

Mode	Channel	Test Results	Conclusion
802.11b	1	Fig.25	P
	11	Fig.26	P
802.11g	1	Fig.27	P
	11	Fig.28	P

802.11n-HT20 mode

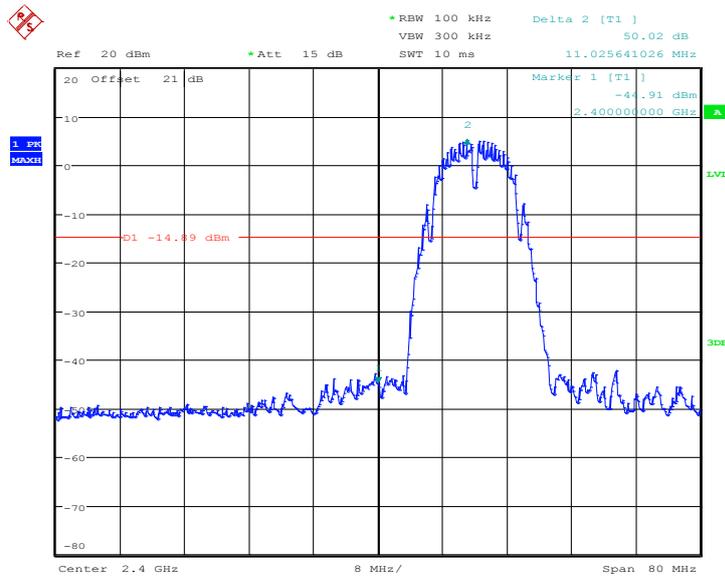
Mode	Channel	Test Results	Conclusion
802.11n (20MHz)	1	Fig.29	P
	11	Fig.30	P

802.11n-HT40 mode

Mode	Channel	Test Results	Conclusion
802.11n (40MHz)	3	Fig.31	P
	9	Fig.32	P

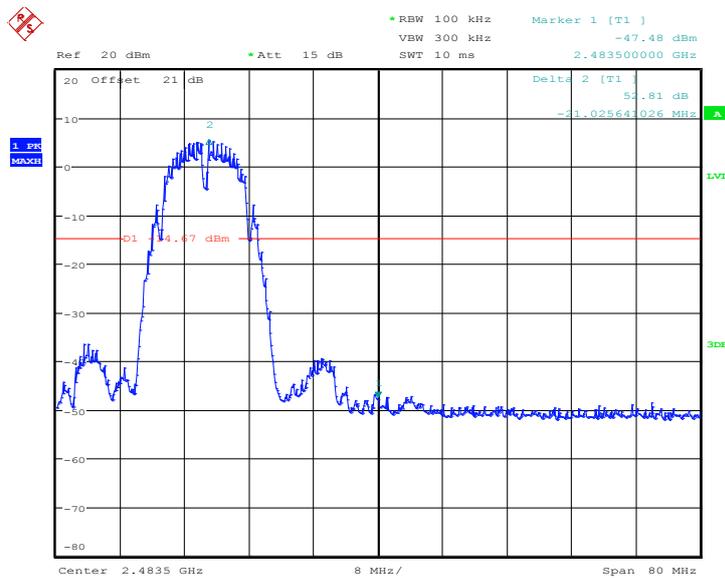
Conclusion: PASS

Test graphs as below:



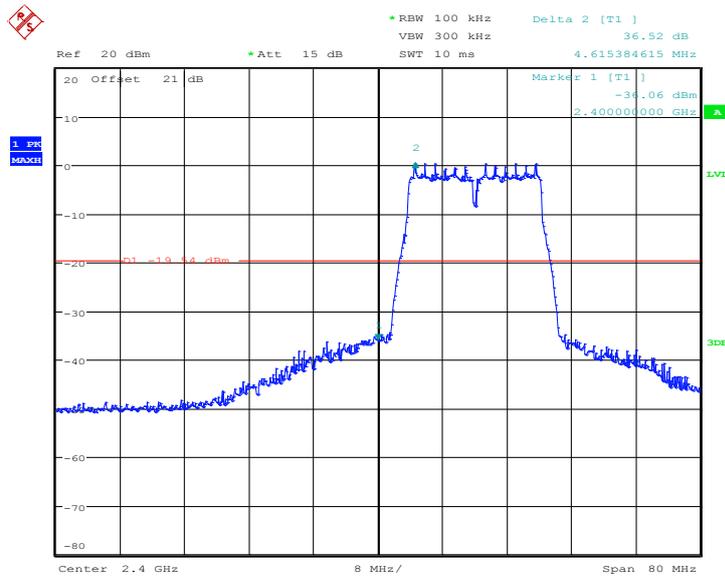
Date: 9.AUG.2012 14:13:10

Fig. 25 Band Edges (802.11b, Ch 1)



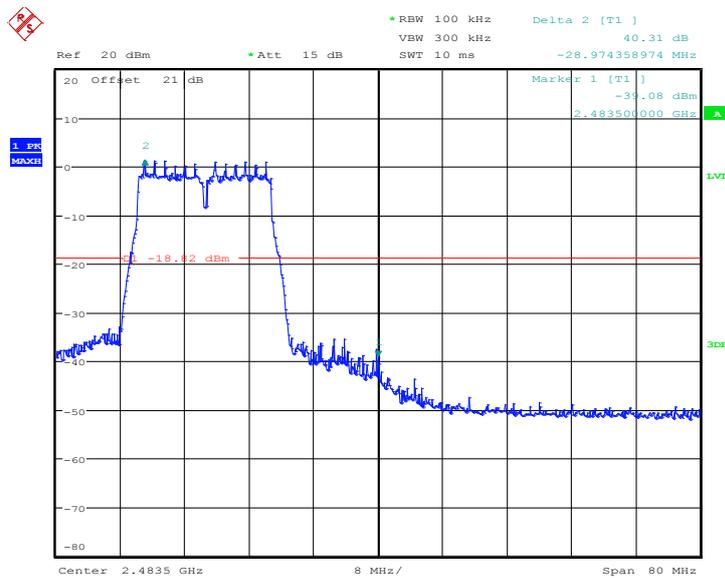
Date: 9.AUG.2012 14:15:02

Fig. 26 Band Edges (802.11b, Ch 11)



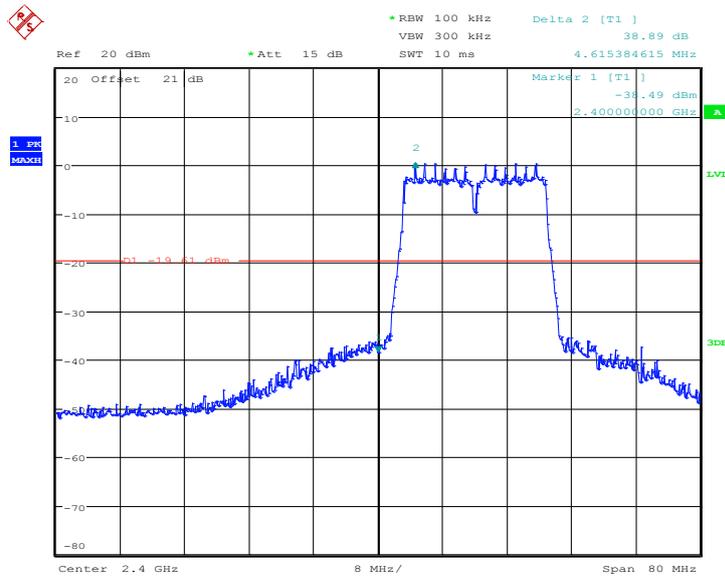
Date: 9.AUG.2012 14:26:07

Fig. 27 Band Edges (802.11g, Ch 1)



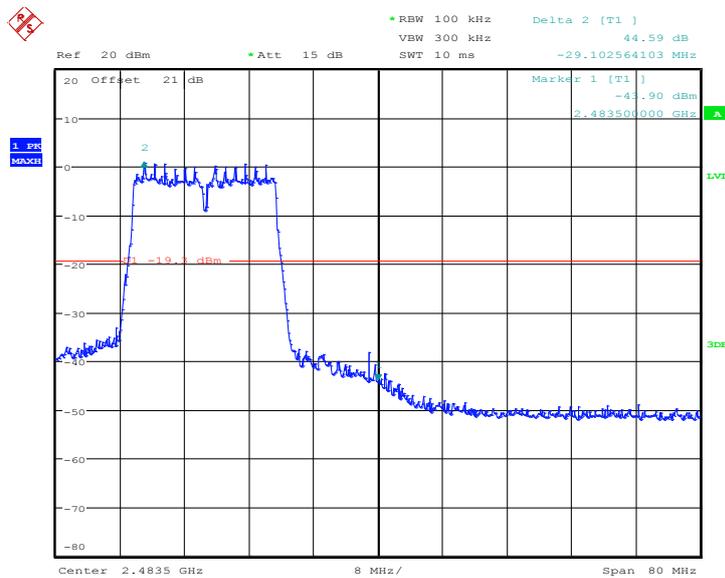
Date: 9.AUG.2012 14:27:42

Fig. 28 Band Edges (802.11g, Ch 11)



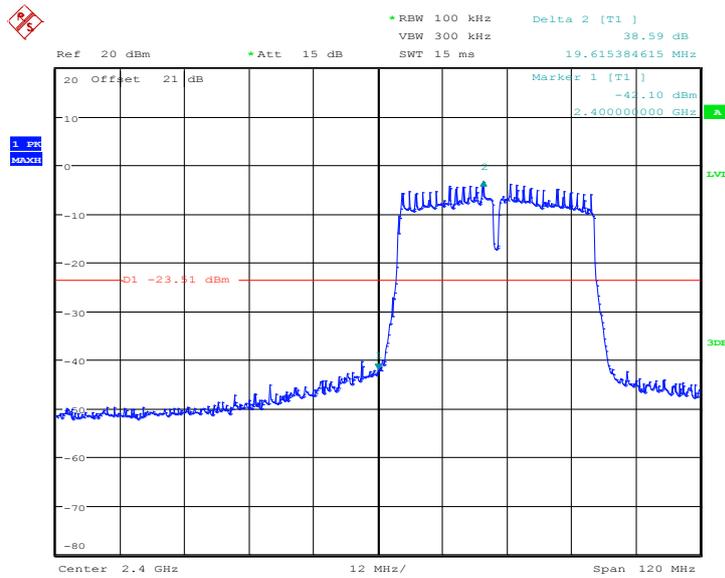
Date: 9.AUG.2012 14:29:25

Fig. 29 Band Edges (802.11n-20MHz, Ch 1)



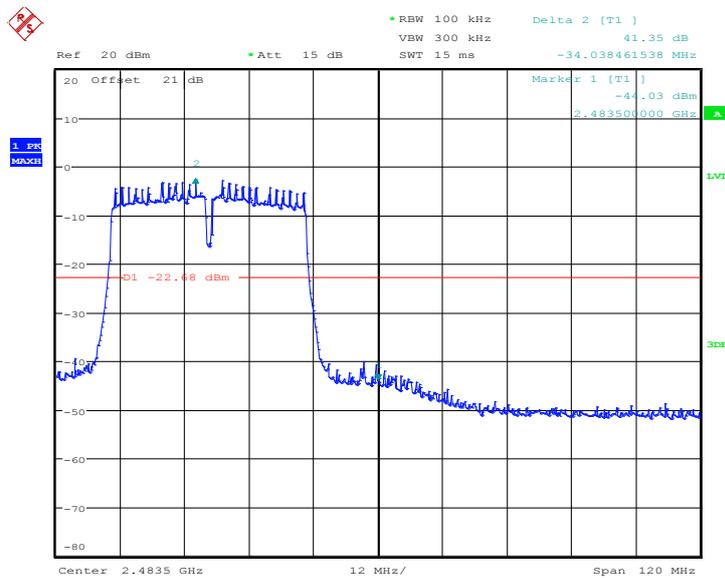
Date: 9.AUG.2012 14:30:36

Fig. 30 Band Edges (802.11n-20MHz, Ch 11)



Date: 9.AUG.2012 14:41:30

Fig. 31 Band Edges (802.11n-40MHz, Ch 3)



Date: 9.AUG.2012 14:39:41

Fig. 32 Band Edges (802.11n-40MHz, Ch 9)

A.6. Transmitter Spurious Emission

A.6.1 Transmitter Spurious Emission - Conducted

Measurement Limit:

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

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Measurement Uncertainty:

Frequency Range	Uncertainty
$30\text{MHz} \leq f \leq 2\text{GHz}$	0.63
$2\text{GHz} \leq f \leq 3.6\text{GHz}$	0.82
$3.6\text{GHz} \leq f \leq 8\text{GHz}$	1.55
$8\text{GHz} \leq f \leq 20\text{GHz}$	1.86
$20\text{GHz} \leq f \leq 22\text{GHz}$	1.90
$22\text{GHz} \leq f \leq 26\text{GHz}$	2.20

Measurement Results:

802.11b/g mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11b	1	2.412 GHz	Fig.33	P
		30 MHz ~ 1 GHz	Fig.34	P
		1 GHz ~ 2.5 GHz	Fig.35	P
		2.5 GHz ~ 7.5 GHz	Fig.36	P
		7.5 GHz ~ 10 GHz	Fig.37	P
		10 GHz ~ 15 GHz	Fig.38	P
		15 GHz ~ 20 GHz	Fig.39	P
		20 GHz ~ 26 GHz	Fig.40	P
	6	2.437 GHz	Fig.41	P
		30 MHz ~ 1 GHz	Fig.42	P
		1 GHz ~ 2.5 GHz	Fig.43	P
		2.5 GHz ~ 7.5 GHz	Fig.44	P
		7.5 GHz ~ 10 GHz	Fig.45	P
		10 GHz ~ 15 GHz	Fig.46	P
		15 GHz ~ 20 GHz	Fig.47	P
		20 GHz ~ 26 GHz	Fig.48	P
	11	2.462 GHz	Fig.49	P
		30 MHz ~ 1 GHz	Fig.50	P
		1 GHz ~ 2.5 GHz	Fig.51	P
		2.5 GHz ~ 7.5 GHz	Fig.52	P

		7.5 GHz ~ 10 GHz	Fig.53	P
		10 GHz ~ 15 GHz	Fig.54	P
		15 GHz ~ 20 GHz	Fig.55	P
		20 GHz ~ 26 GHz	Fig.56	P
802.11g	1	2.412 GHz	Fig.57	P
		30 MHz ~ 1 GHz	Fig.58	P
		1 GHz ~ 2.5 GHz	Fig.59	P
		2.5 GHz ~ 7.5 GHz	Fig.60	P
		7.5 GHz ~ 10 GHz	Fig.61	P
		10 GHz ~ 15 GHz	Fig.62	P
		15 GHz ~ 20 GHz	Fig.63	P
		20 GHz ~ 26 GHz	Fig.64	P
	6	2.437 GHz	Fig.65	P
		30 MHz ~ 1 GHz	Fig.66	P
		1 GHz ~ 2.5 GHz	Fig.67	P
		2.5 GHz ~ 7.5 GHz	Fig.68	P
		7.5 GHz ~ 10 GHz	Fig.69	P
		10 GHz ~ 15 GHz	Fig.70	P
		15 GHz ~ 20 GHz	Fig.71	P
		20 GHz ~ 26 GHz	Fig.72	P
	11	2.462 GHz	Fig.73	P
		30 MHz ~ 1 GHz	Fig.74	P
		1 GHz ~ 2.5 GHz	Fig.75	P
		2.5 GHz ~ 7.5 GHz	Fig.76	P
		7.5 GHz ~ 10 GHz	Fig.77	P
		10 GHz ~ 15 GHz	Fig.78	P
		15 GHz ~ 20 GHz	Fig.79	P
		20 GHz ~ 26 GHz	Fig.80	P

802.11n-HT20 mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11n (20MHz)	1	2.412 GHz	Fig.81	P
		30 MHz ~ 1 GHz	Fig.82	P
		1 GHz ~ 2.5 GHz	Fig.83	P
		2.5 GHz ~ 7.5 GHz	Fig.84	P
		7.5 GHz ~ 10 GHz	Fig.85	P
		10 GHz ~ 15 GHz	Fig.86	P
		15 GHz ~ 20 GHz	Fig.87	P
		20 GHz ~ 26 GHz	Fig.88	P
	6	2.437 GHz	Fig.89	P
		30 MHz ~ 1 GHz	Fig.90	P
		1 GHz ~ 2.5 GHz	Fig.91	P
		2.5 GHz ~ 7.5 GHz	Fig.92	P
		7.5 GHz ~ 10 GHz	Fig.93	P
		10 GHz ~ 15 GHz	Fig.94	P
		15 GHz ~ 20 GHz	Fig.95	P
		20 GHz ~ 26 GHz	Fig.96	P
	11	2.462 GHz	Fig.97	P
		30 MHz ~ 1 GHz	Fig.98	P
		1 GHz ~ 2.5 GHz	Fig.99	P
		2.5 GHz ~ 7.5 GHz	Fig.100	P
		7.5 GHz ~ 10 GHz	Fig.101	P
		10 GHz ~ 15 GHz	Fig.102	P
		15 GHz ~ 20 GHz	Fig.103	P
		20 GHz ~ 26 GHz	Fig.104	P

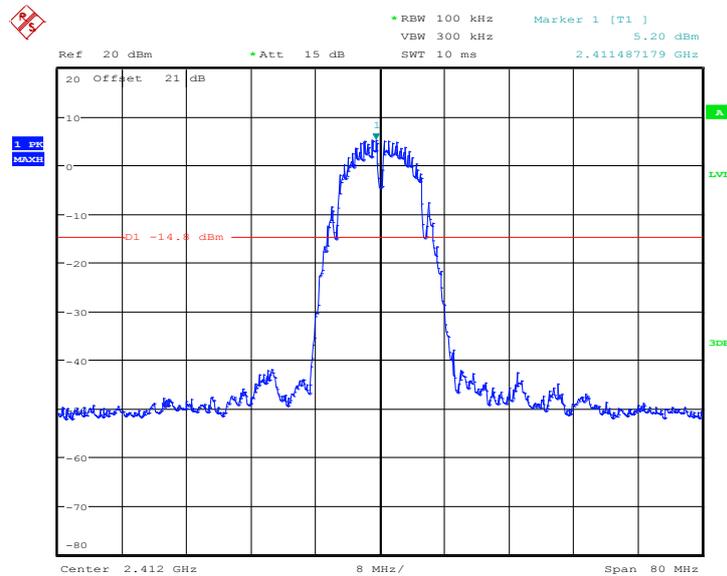
802.11n-HT40 mode

MODE	Channel	Frequency Range	Test Results	Conclusion
802.11n (40MHz)	3	2.422 GHz	Fig.105	P
		30 MHz ~ 1 GHz	Fig.106	P
		1 GHz ~ 2.5 GHz	Fig.107	P
		2.5 GHz ~ 7.5 GHz	Fig.108	P
		7.5 GHz ~ 10 GHz	Fig.109	P
		10 GHz ~ 15 GHz	Fig.110	P
		15 GHz ~ 20 GHz	Fig.111	P
		20 GHz ~ 26 GHz	Fig.112	P
	6	2.437 GHz	Fig.113	P
		30 MHz ~ 1 GHz	Fig.114	P
		1 GHz ~ 2.5 GHz	Fig.115	P
		2.5 GHz ~ 7.5 GHz	Fig.116	P
		7.5 GHz ~ 10 GHz	Fig.117	P
		10 GHz ~ 15 GHz	Fig.118	P

9	15 GHz ~ 20 GHz	Fig.119	P
	20 GHz ~ 26 GHz	Fig.120	P
	2.452 GHz	Fig.121	P
	30 MHz ~ 1 GHz	Fig.122	P
	1 GHz ~ 2.5 GHz	Fig.123	P
	2.5 GHz ~ 7.5 GHz	Fig.124	P
	7.5 GHz ~ 10 GHz	Fig.125	P
	10 GHz ~ 15 GHz	Fig.126	P
	15 GHz ~ 20 GHz	Fig.127	P
	20 GHz ~ 26 GHz	Fig.128	P

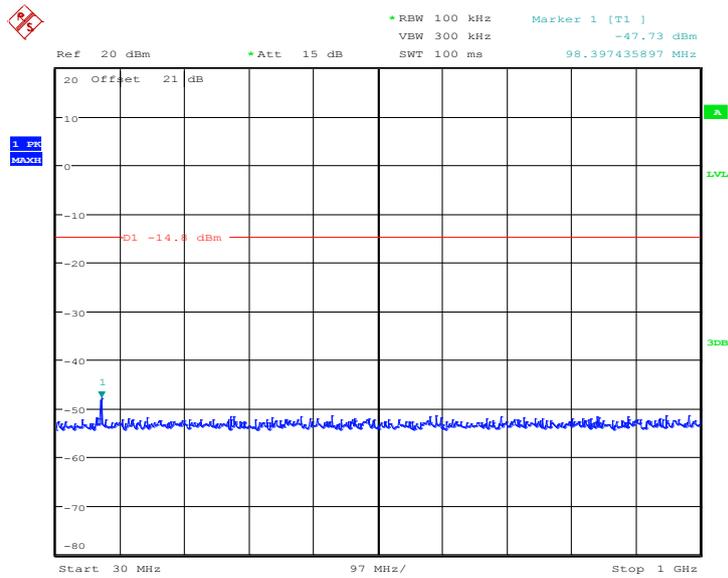
Conclusion: PASS

Test graphs as below:



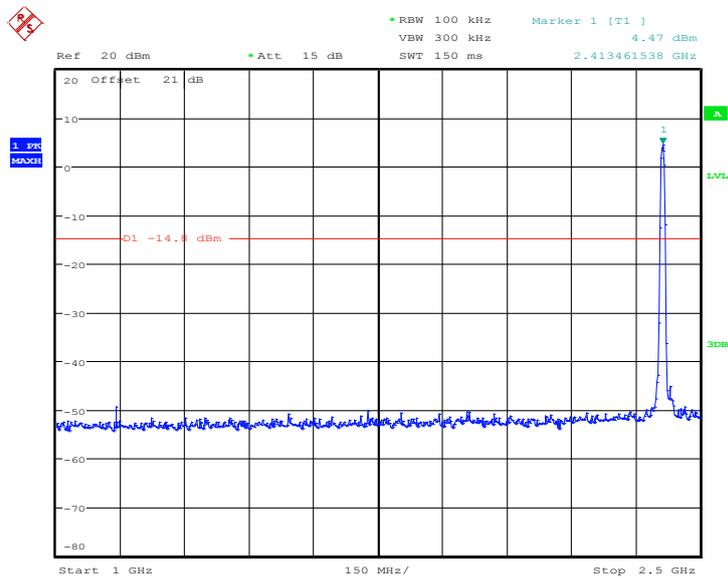
Date: 9.AUG.2012 14:44:35

Fig. 33 Conducted Spurious Emission (802.11b, Ch1, Center Frequency)



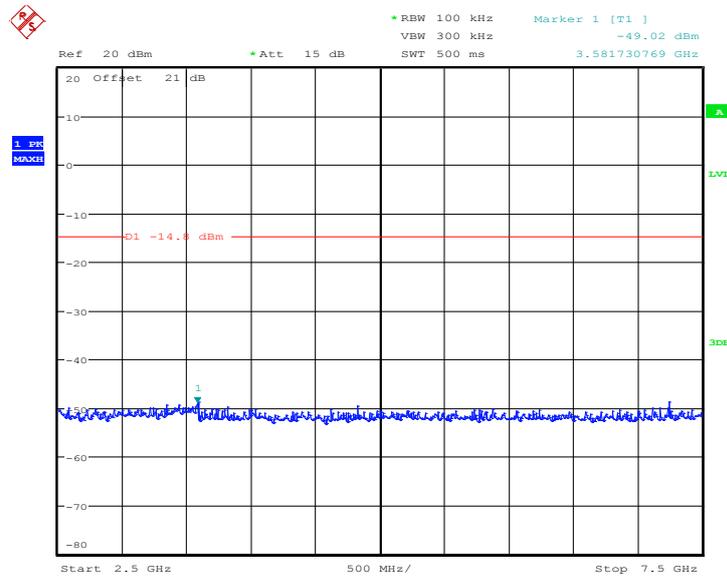
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Fig. 34 Conducted Spurious Emission (802.11b, Ch1, 30 MHz-1 GHz)



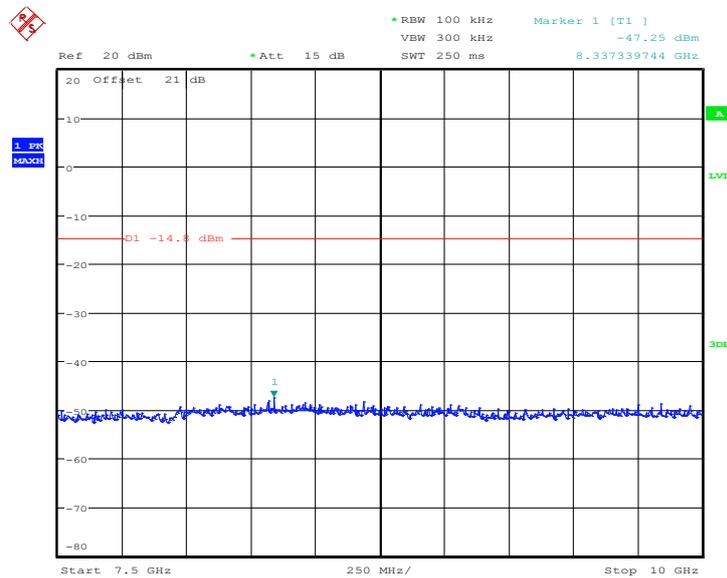
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Fig. 35 Conducted Spurious Emission (802.11b, Ch1, 1 GHz-2.5 GHz)



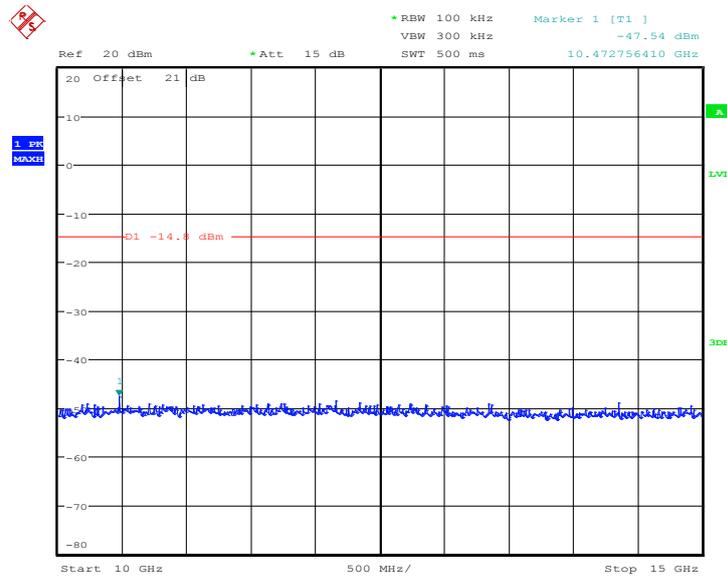
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Fig. 36 Conducted Spurious Emission (802.11b, Ch1, 2.5 GHz-7.5 GHz)



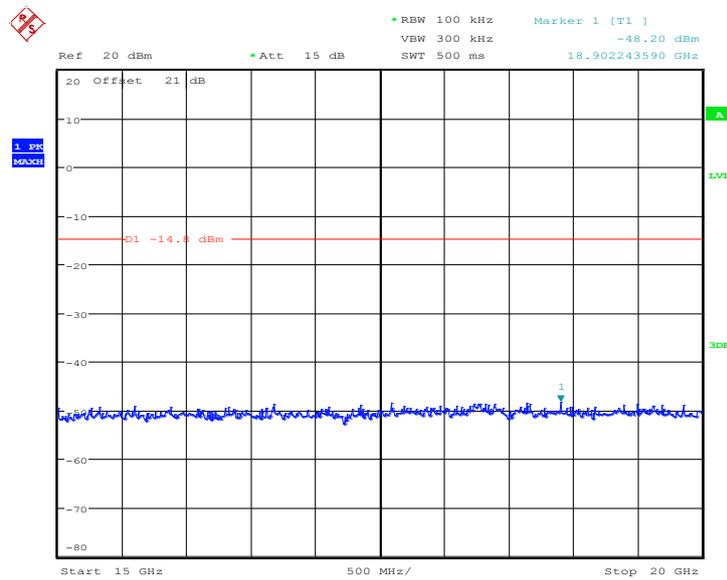
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Fig. 37 Conducted Spurious Emission (802.11b, Ch1, 7.5 GHz-10 GHz)



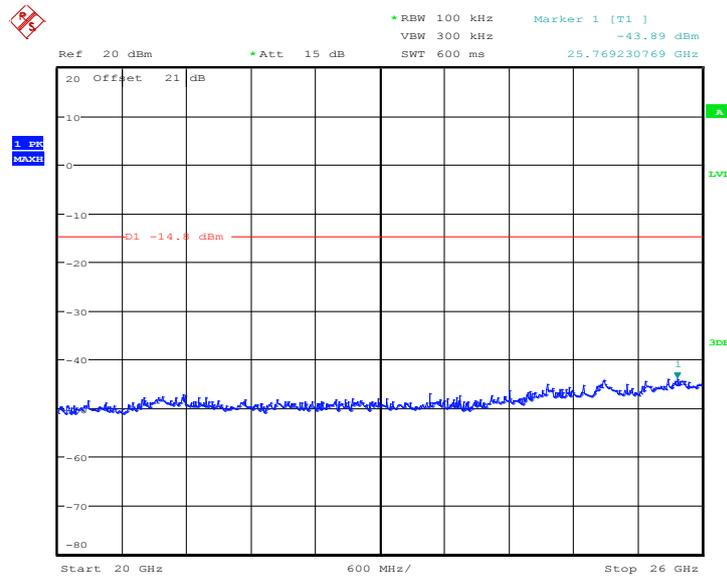
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Fig. 38 Conducted Spurious Emission (802.11b, Ch1, 10 GHz-15 GHz)



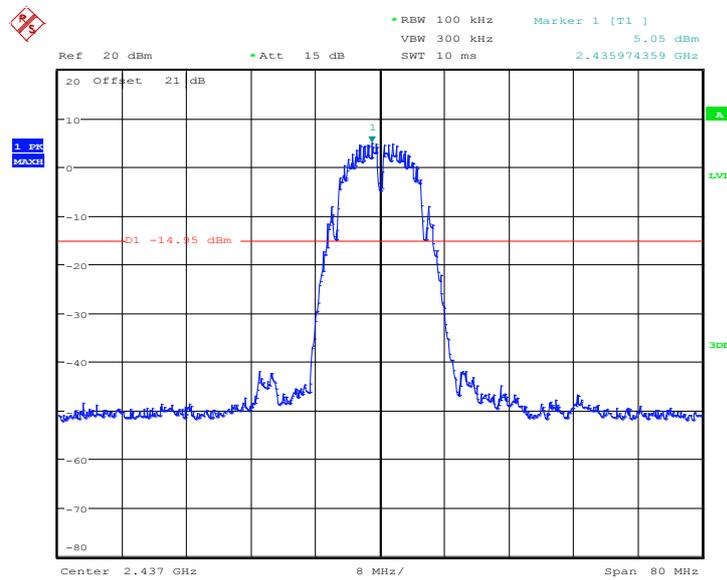
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Fig. 39 Conducted Spurious Emission (802.11b, Ch1, 15 GHz-20 GHz)



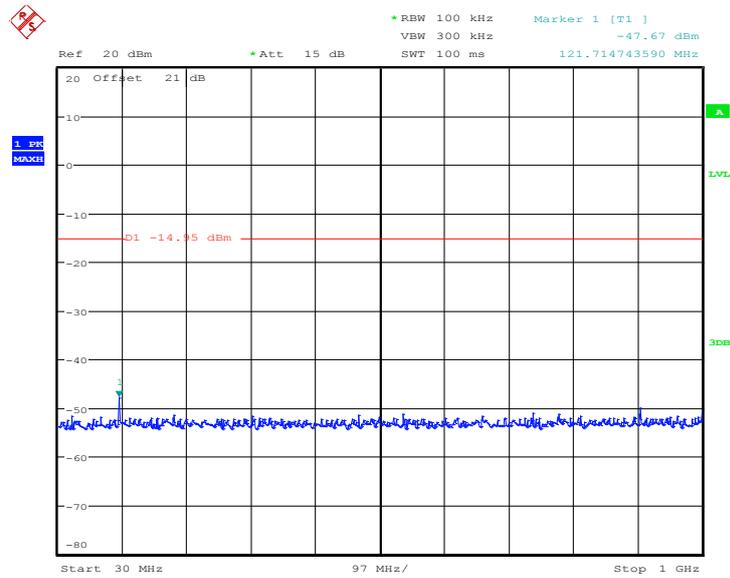
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Fig. 40 Conducted Spurious Emission (802.11b, Ch1, 20 GHz-26 GHz)



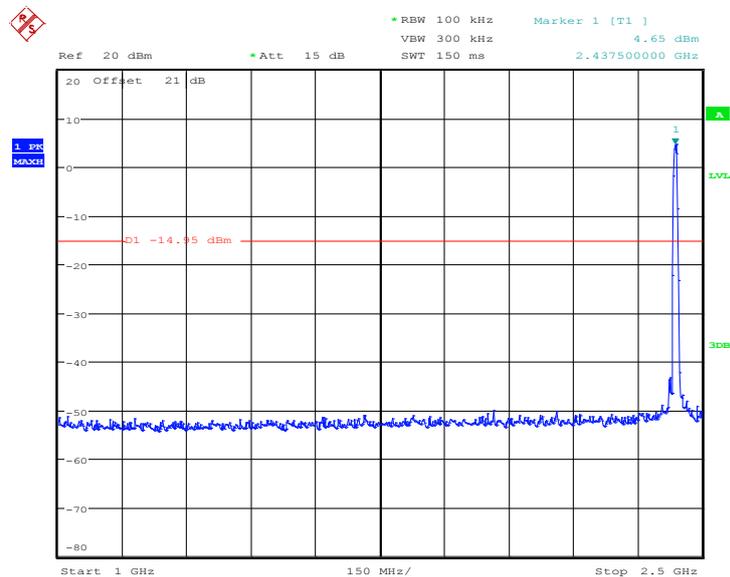
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Fig. 41 Conducted Spurious Emission (802.11b, Ch6, Center Frequency)



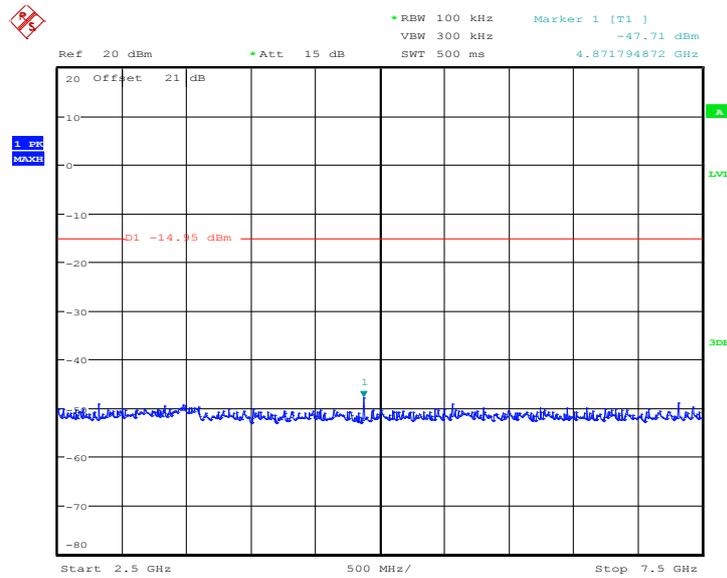
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Fig. 42 Conducted Spurious Emission (802.11b, Ch6, 30 MHz-1 GHz)



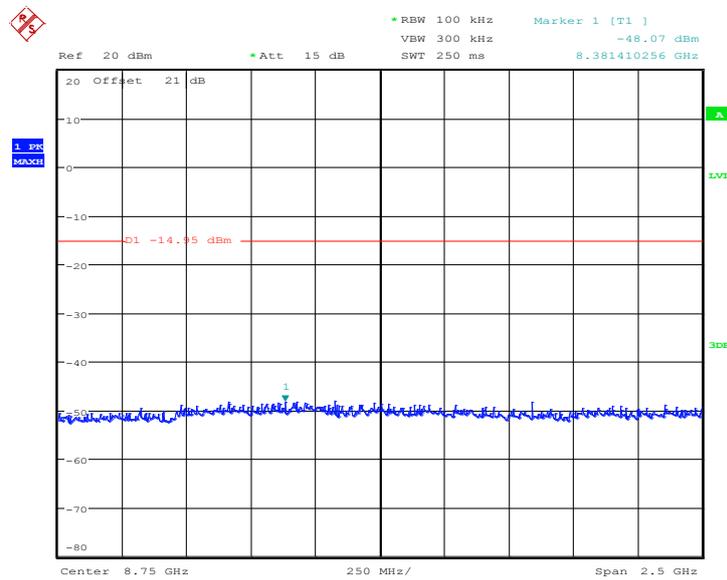
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Fig. 43 Conducted Spurious Emission (802.11b, Ch6, 1 GHz-2.5 GHz)



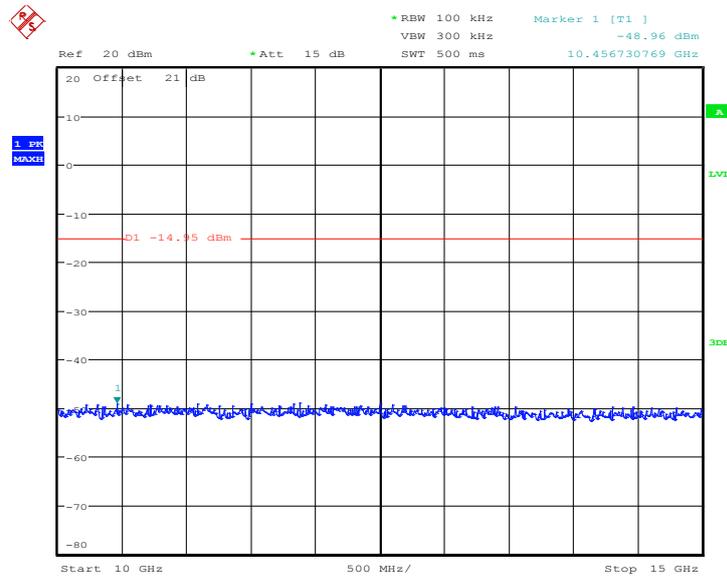
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Fig. 44 Conducted Spurious Emission (802.11b, Ch6, 2.5 GHz-7.5 GHz)



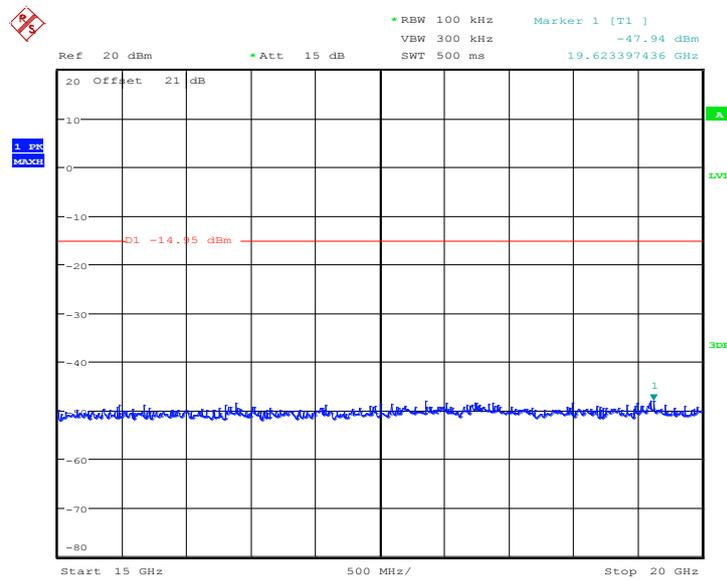
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Fig. 45 Conducted Spurious Emission (802.11b, Ch6, 7.5 GHz-10 GHz)



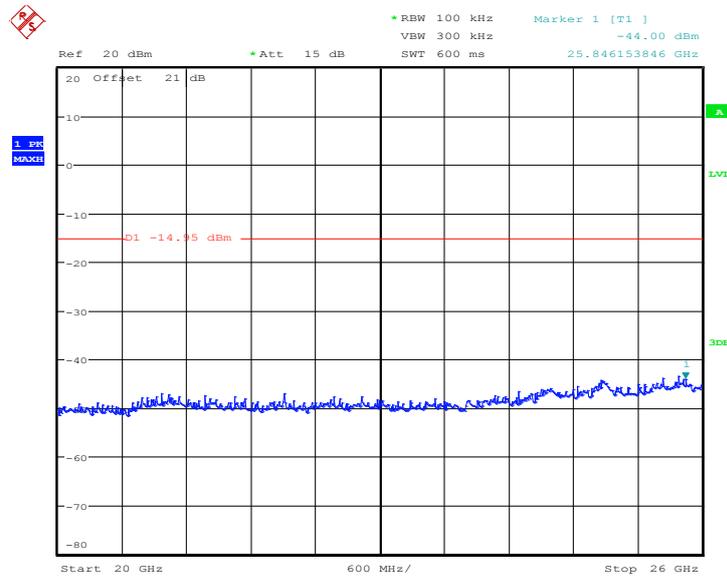
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Fig. 46 Conducted Spurious Emission (802.11b, Ch6, 10 GHz-15 GHz)



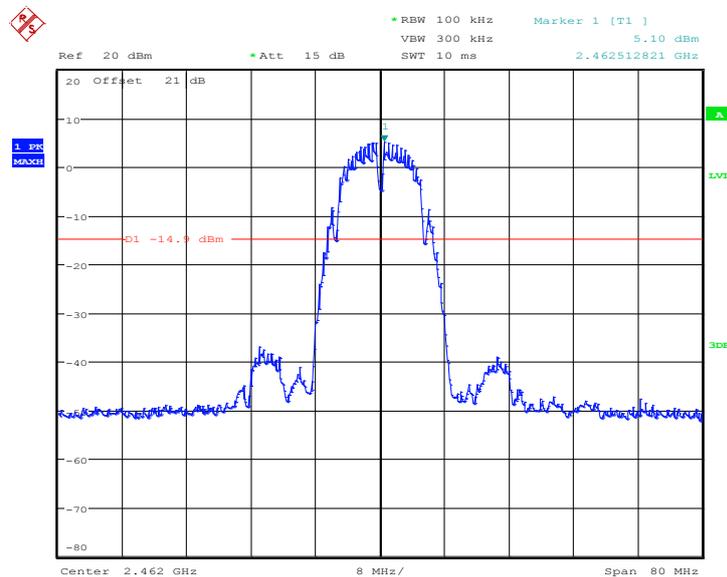
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Fig. 47 Conducted Spurious Emission (802.11b, Ch6, 15 GHz-20 GHz)



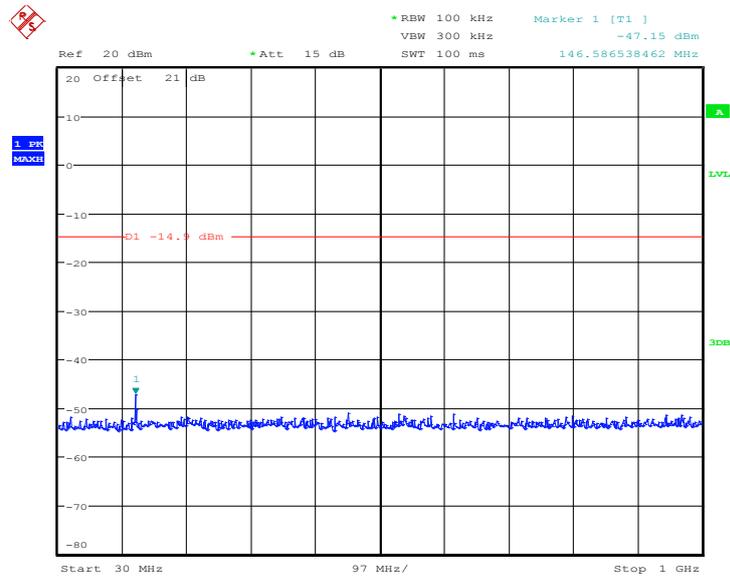
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Fig. 48 Conducted Spurious Emission (802.11b, Ch6, 20 GHz-26 GHz)



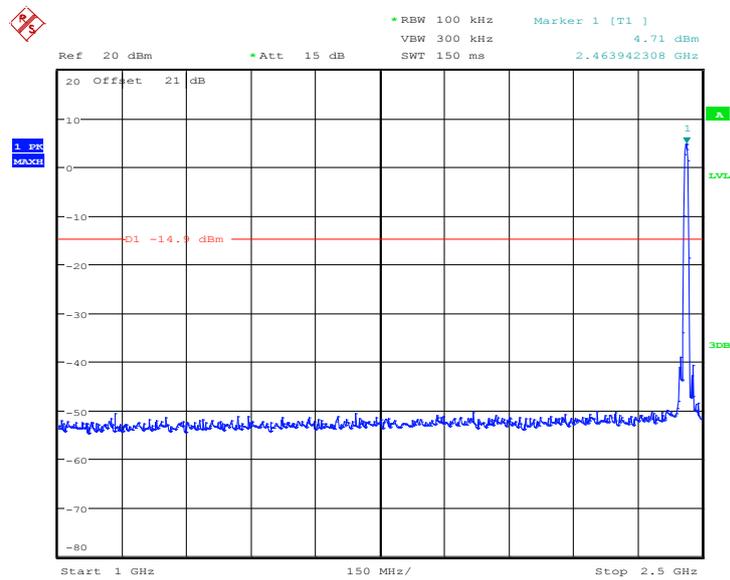
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Fig. 49 Conducted Spurious Emission (802.11b, Ch11, Center Frequency)



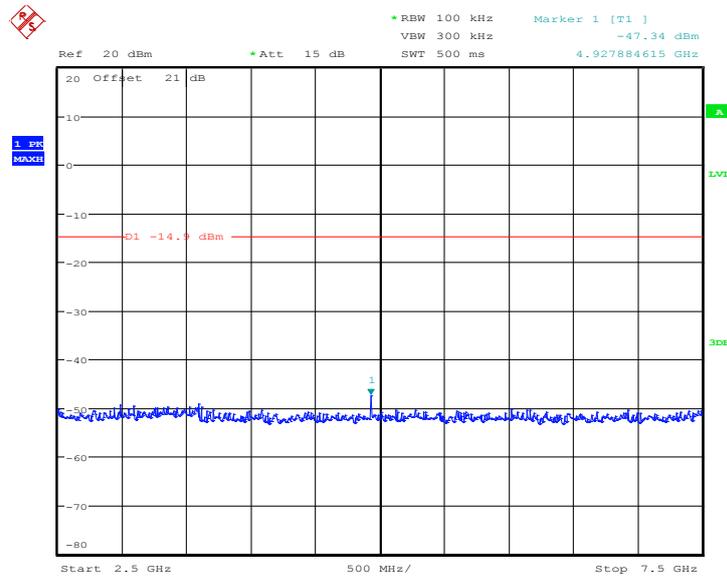
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Fig. 50 Conducted Spurious Emission (802.11b, Ch11, 30 MHz-1 GHz)



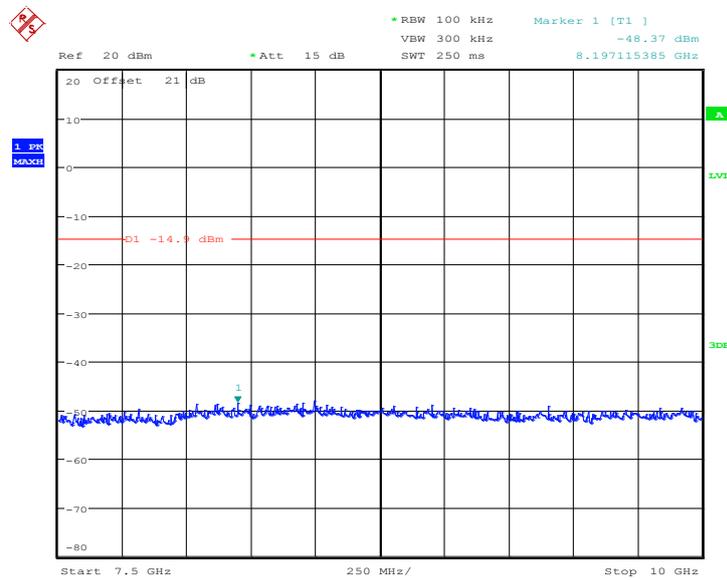
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Fig. 51 Conducted Spurious Emission (802.11b, Ch11, 1 GHz-2.5 GHz)



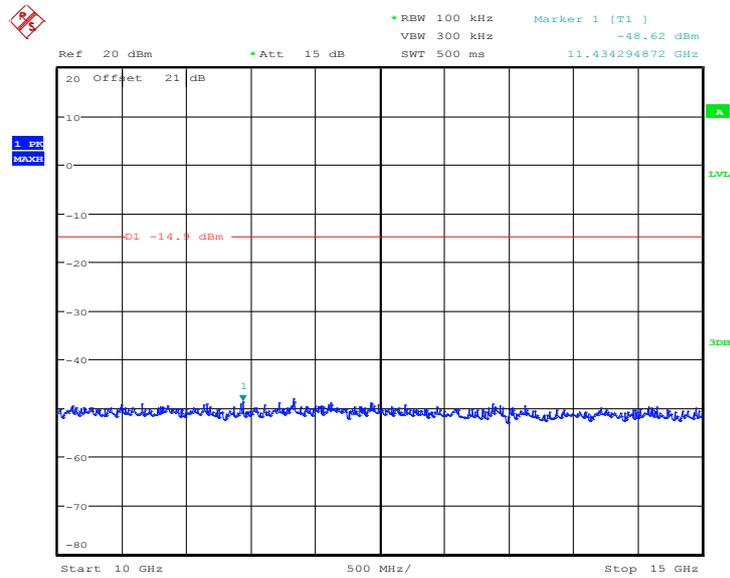
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Fig. 52 Conducted Spurious Emission (802.11b, Ch11, 2.5 GHz-7.5 GHz)



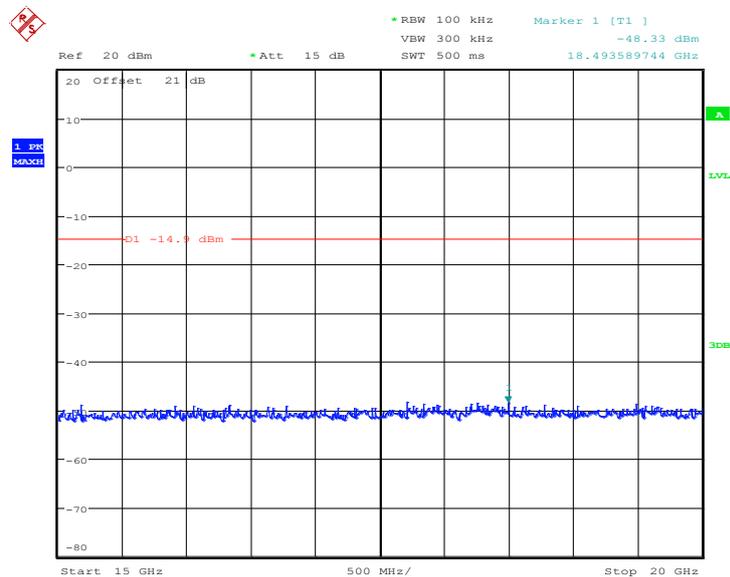
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Fig. 53 Conducted Spurious Emission (802.11b, Ch11, 7.5 GHz-10 GHz)



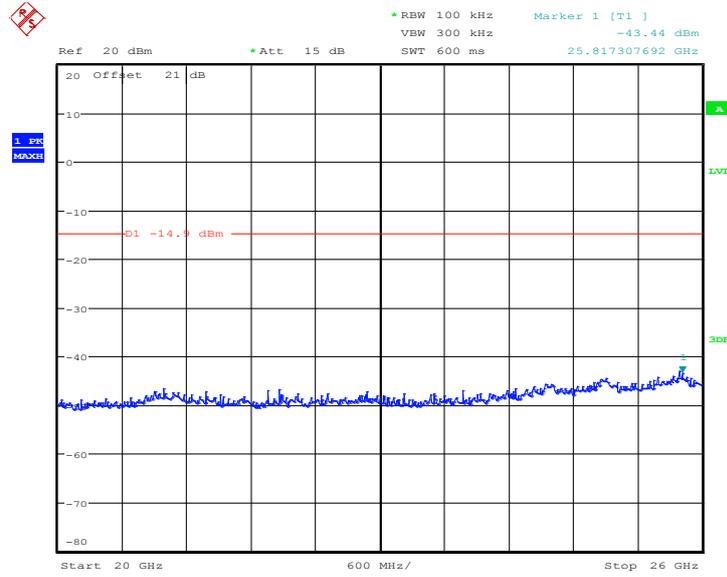
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Fig. 54 Conducted Spurious Emission (802.11b, Ch11, 10 GHz-15 GHz)



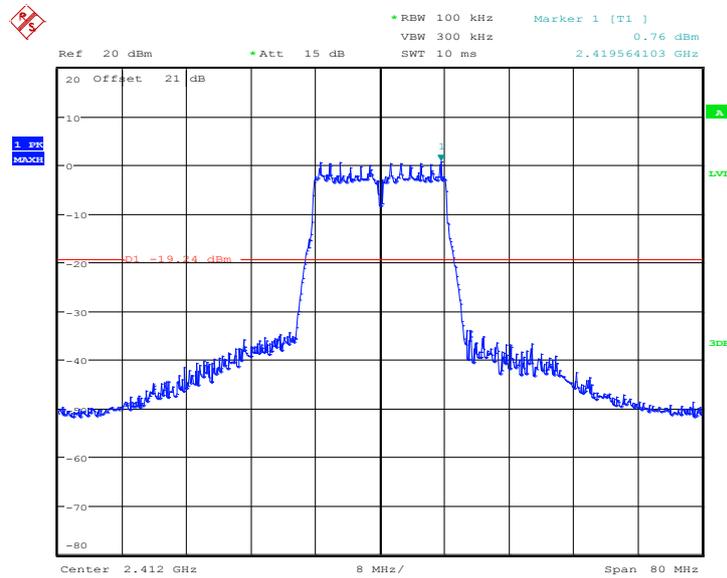
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Fig. 55 Conducted Spurious Emission (802.11b, Ch11, 15 GHz-20 GHz)



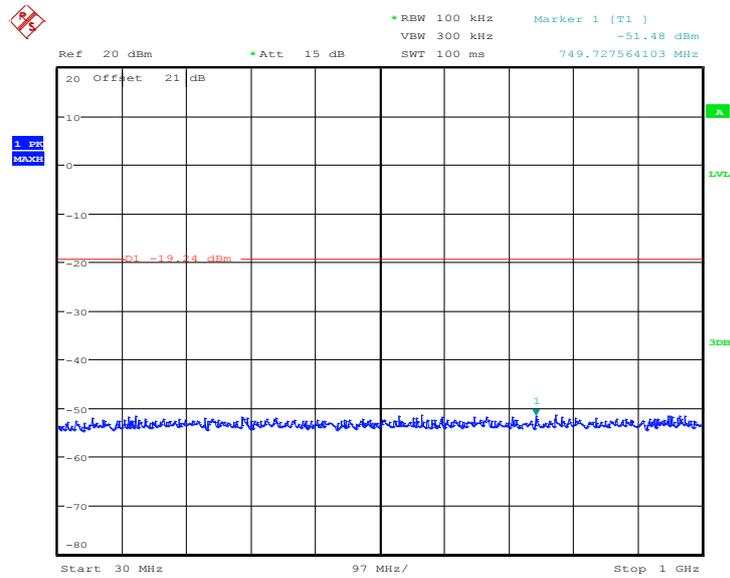
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Fig. 56 Conducted Spurious Emission (802.11b, Ch11, 20 GHz-26 GHz)



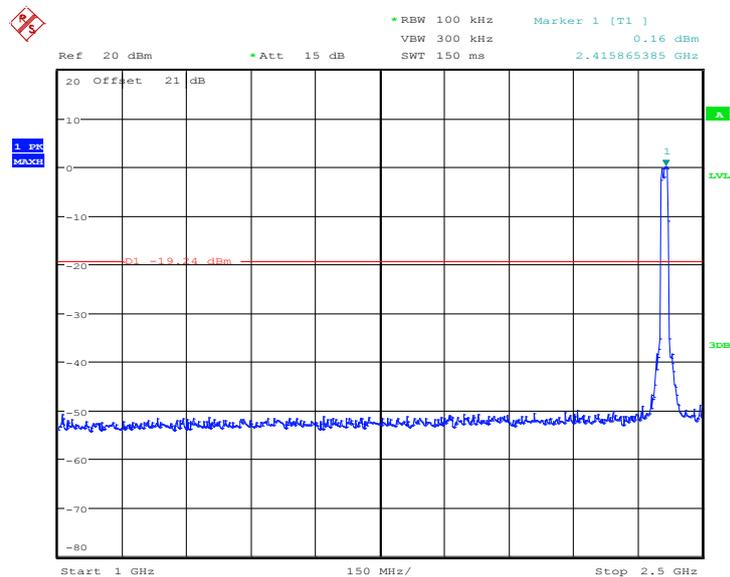
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Fig. 57 Conducted Spurious Emission (802.11g, Ch1, Center Frequency)



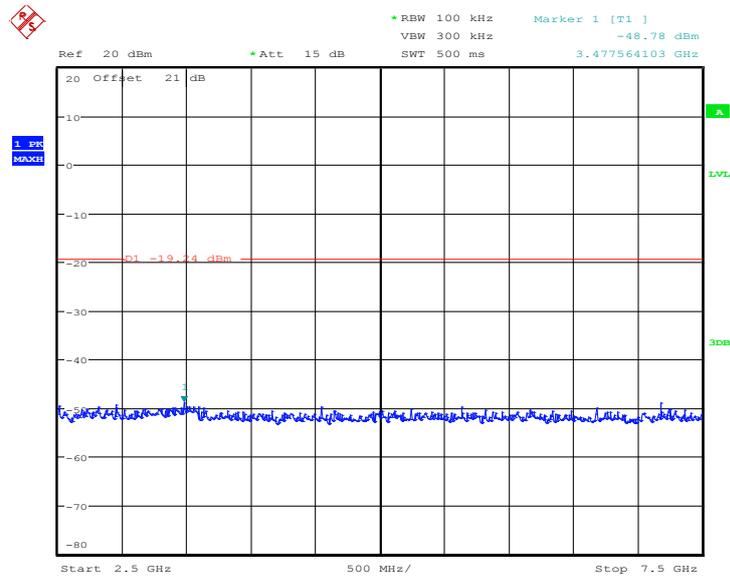
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Fig. 58 Conducted Spurious Emission (802.11g, Ch1, 30 MHz-1 GHz)



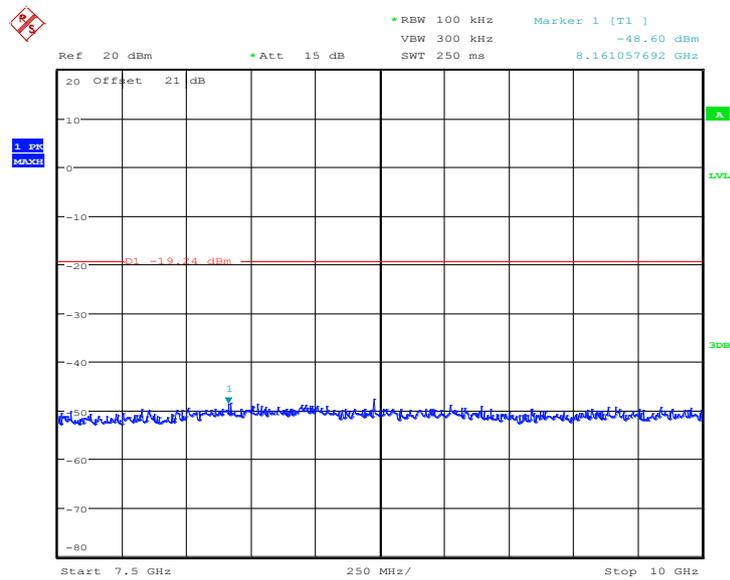
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Fig. 59 Conducted Spurious Emission (802.11g, Ch1, 1 GHz-2.5 GHz)



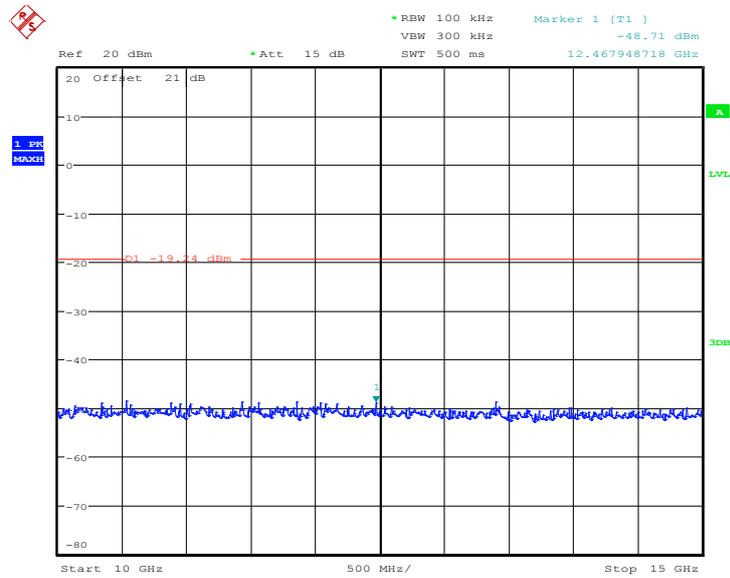
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Fig. 60 Conducted Spurious Emission (802.11g, Ch1, 2.5 GHz-7.5 GHz)



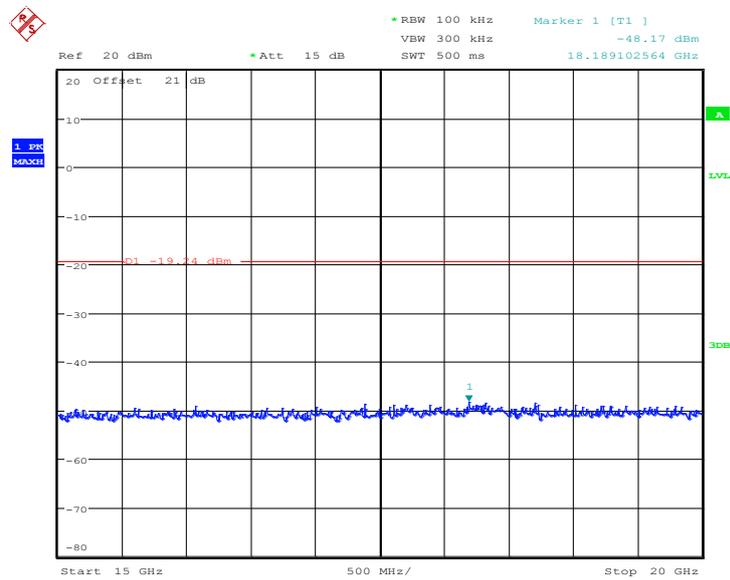
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Fig. 61 Conducted Spurious Emission (802.11g, Ch1, 7.5 GHz-10 GHz)



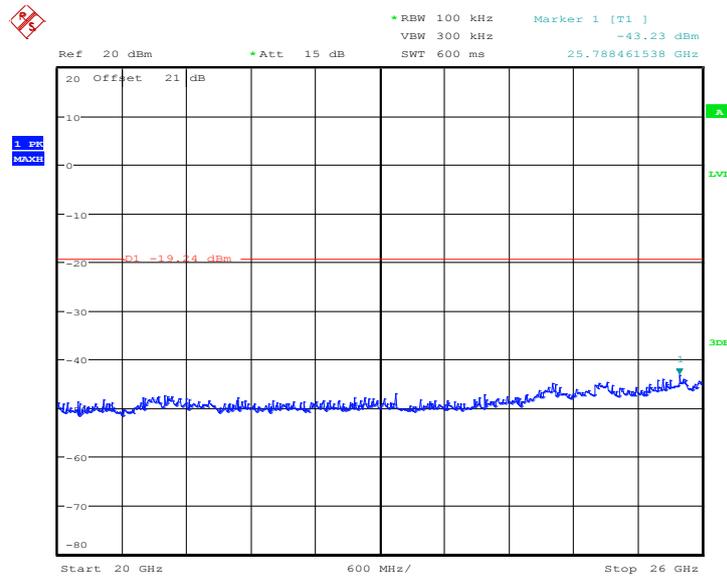
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Fig. 62 Conducted Spurious Emission (802.11g, Ch1, 10 GHz-15 GHz)



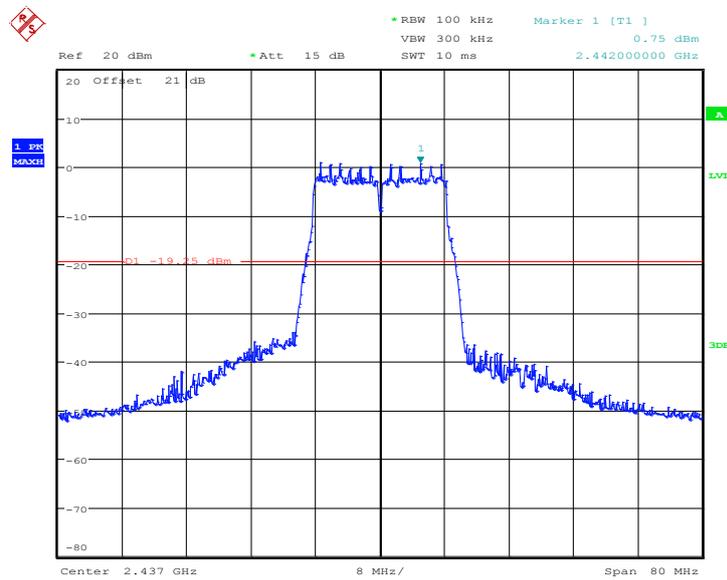
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Fig. 63 Conducted Spurious Emission (802.11g, Ch1, 15 GHz-20 GHz)



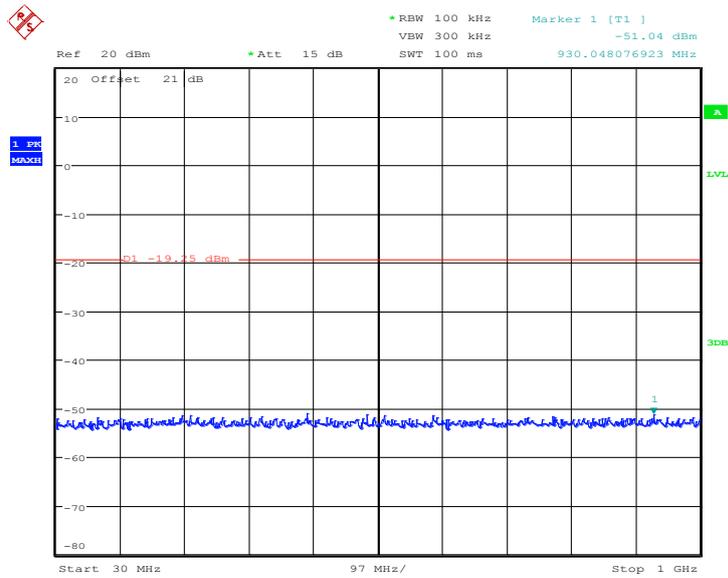
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Fig. 64 Conducted Spurious Emission (802.11g, Ch1, 20 GHz-26 GHz)



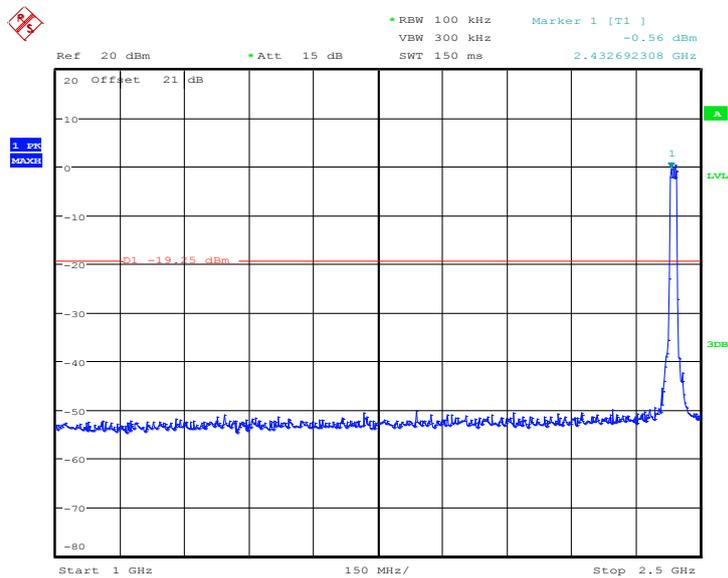
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Fig. 65 Conducted Spurious Emission (802.11g, Ch6, Center Frequency)



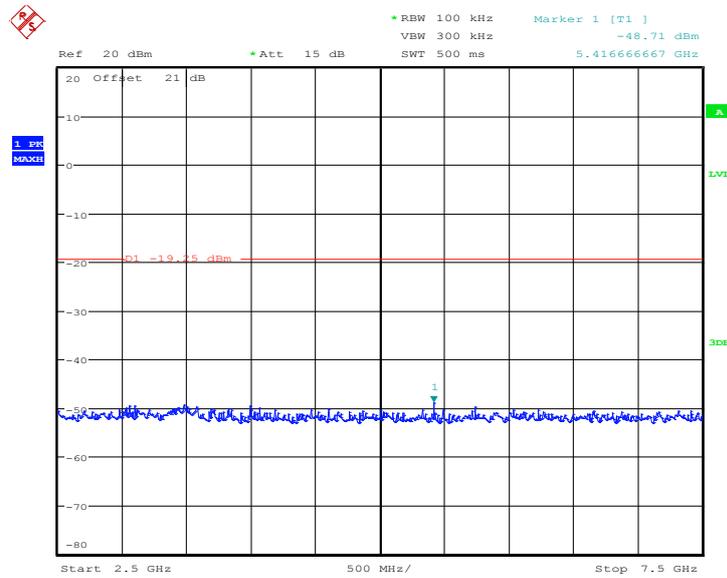
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Fig. 66 Conducted Spurious Emission (802.11g, Ch6, 30 MHz-1 GHz)



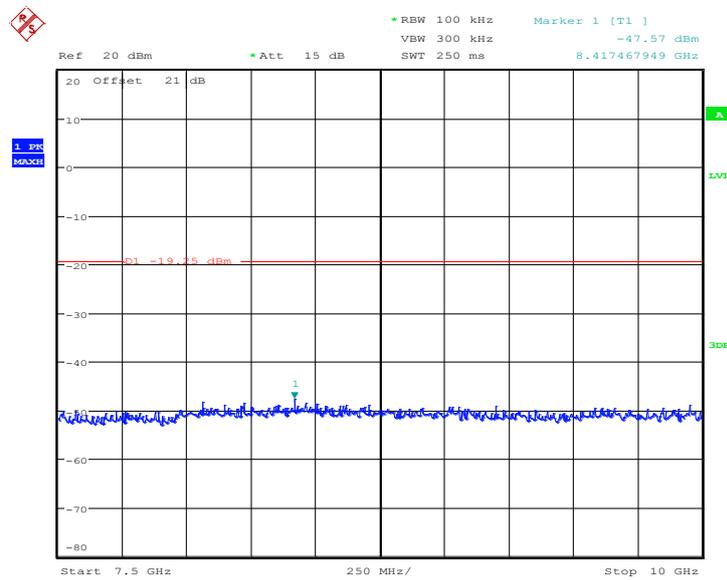
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Fig. 67 Conducted Spurious Emission (802.11g, Ch6, 1 GHz-2.5 GHz)



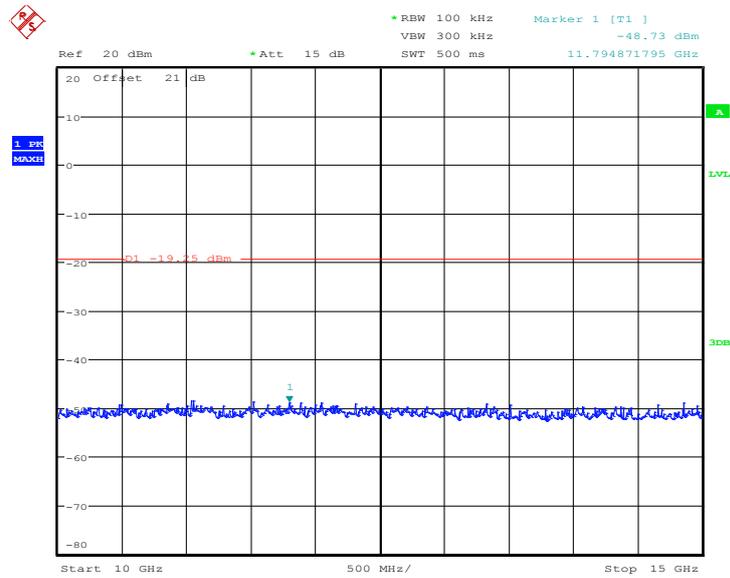
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Fig. 68 Conducted Spurious Emission (802.11g, Ch6, 2.5 GHz-7.5 GHz)



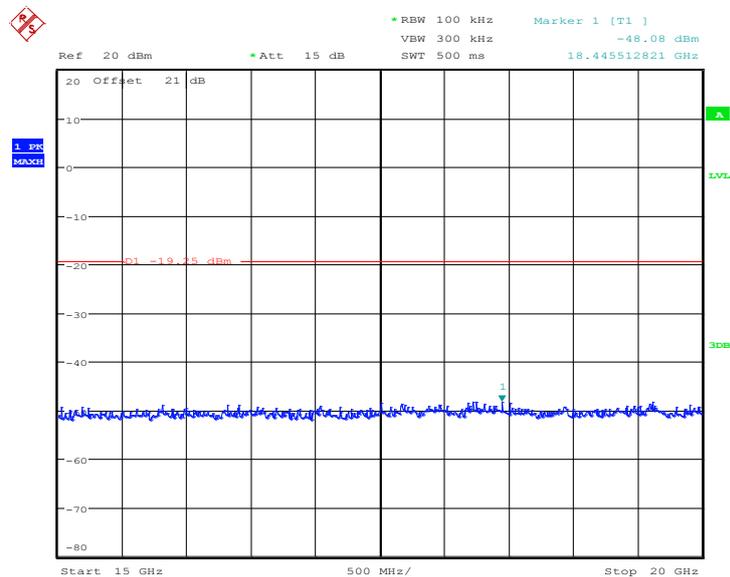
Date: 9.AUG.2012 15:00:22

Fig. 69 Conducted Spurious Emission (802.11g, Ch6, 7.5 GHz-10 GHz)



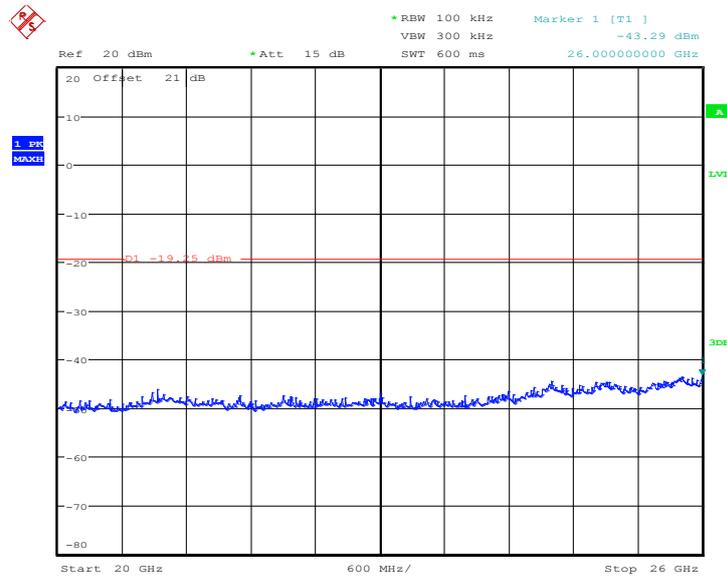
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Fig. 70 Conducted Spurious Emission (802.11g, Ch6, 10 GHz-15 GHz)



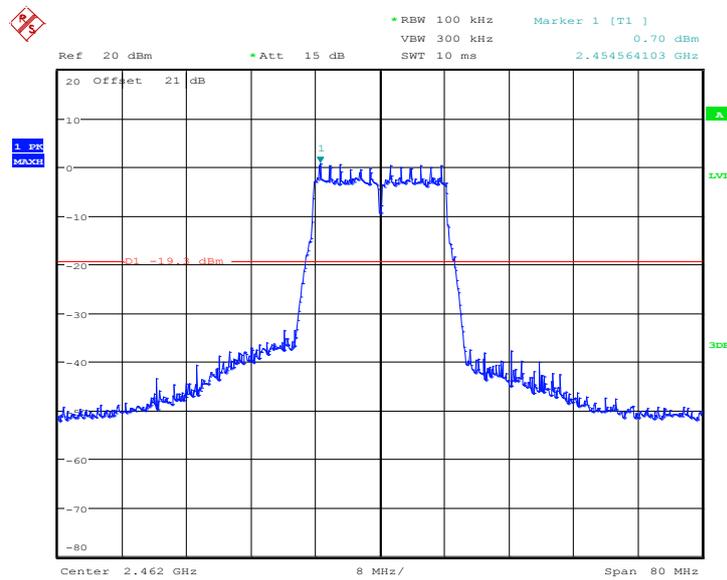
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Fig. 71 Conducted Spurious Emission (802.11g, Ch6, 15 GHz-20 GHz)



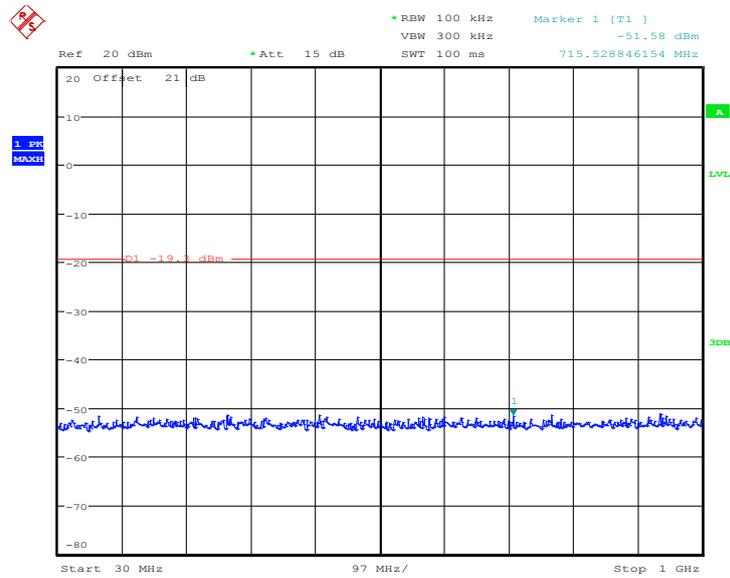
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Fig. 72 Conducted Spurious Emission (802.11g, Ch6, 20 GHz-26 GHz)



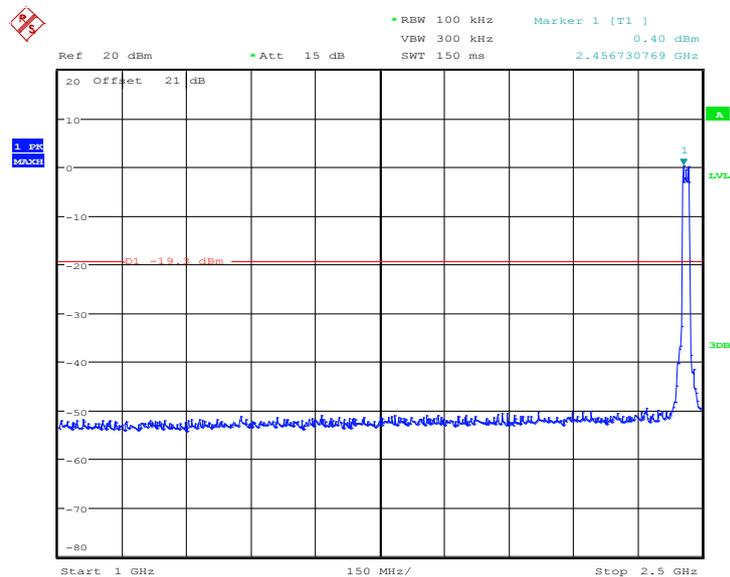
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Fig. 73 Conducted Spurious Emission (802.11g, Ch11, Center Frequency)



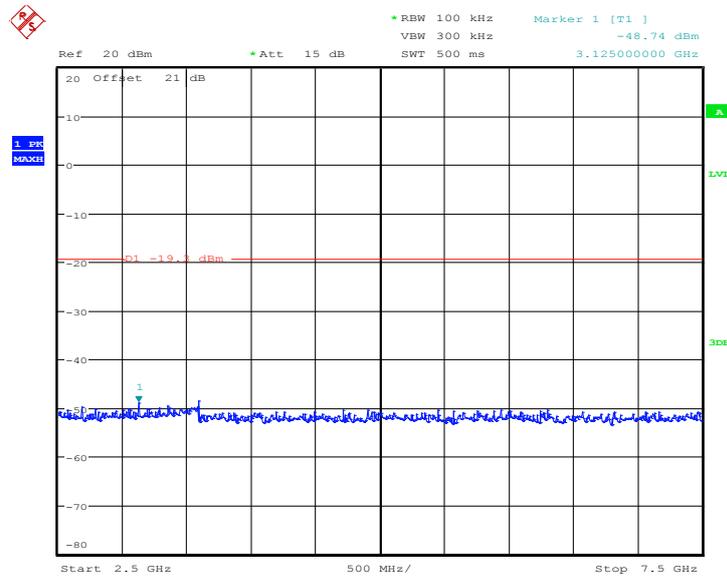
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Fig. 74 Conducted Spurious Emission (802.11g, Ch11, 30 MHz-1 GHz)



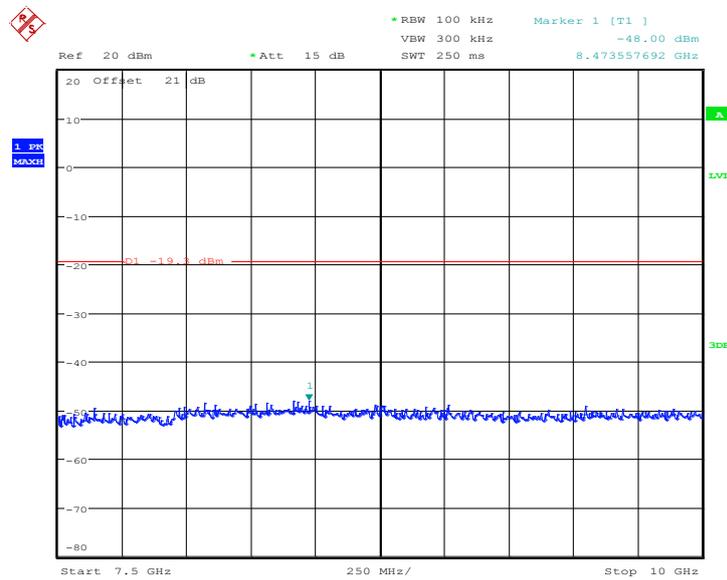
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Fig. 75 Conducted Spurious Emission (802.11g, Ch11, 1 GHz-2.5 GHz)



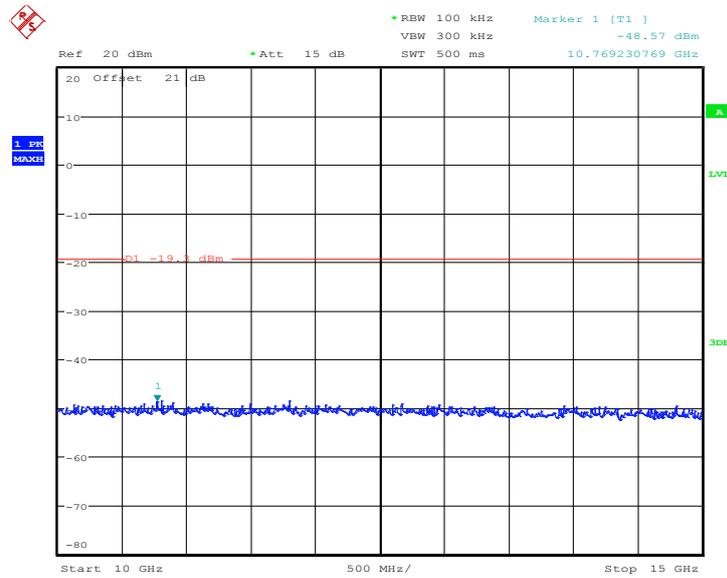
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Fig. 76 Conducted Spurious Emission (802.11g, Ch11, 2.5 GHz-7.5 GHz)



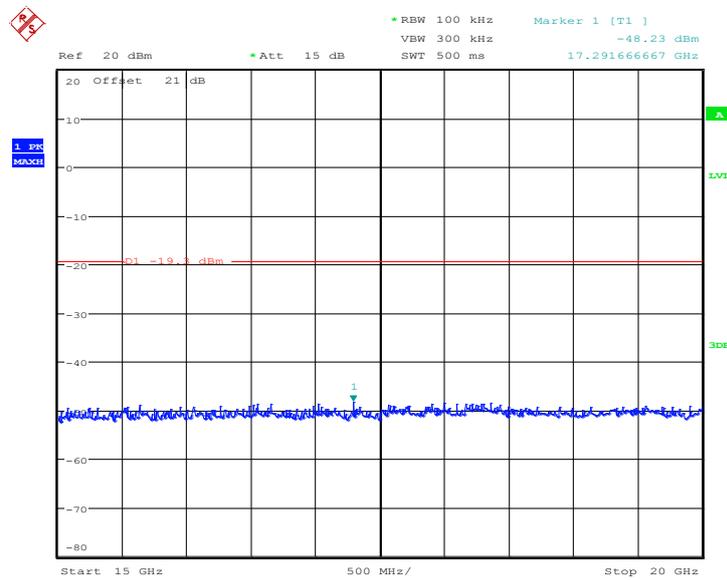
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Fig. 77 Conducted Spurious Emission (802.11g, Ch11, 7.5 GHz-10 GHz)



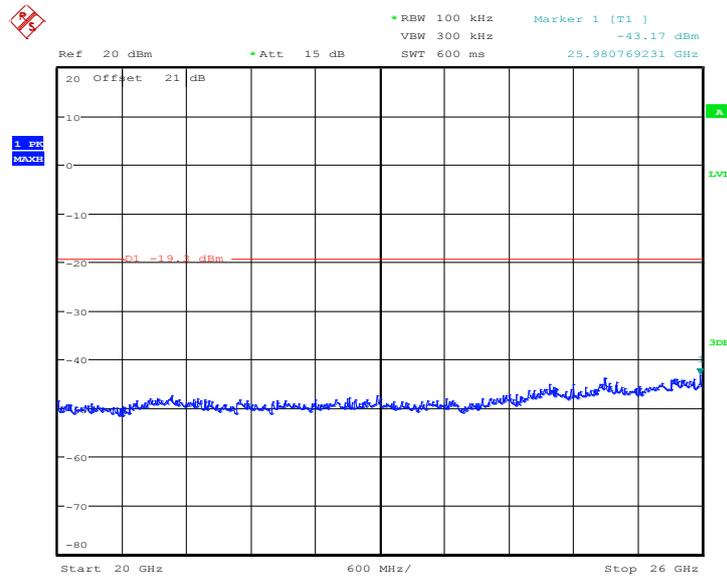
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Fig. 78 Conducted Spurious Emission (802.11g, Ch11, 10 GHz-15 GHz)



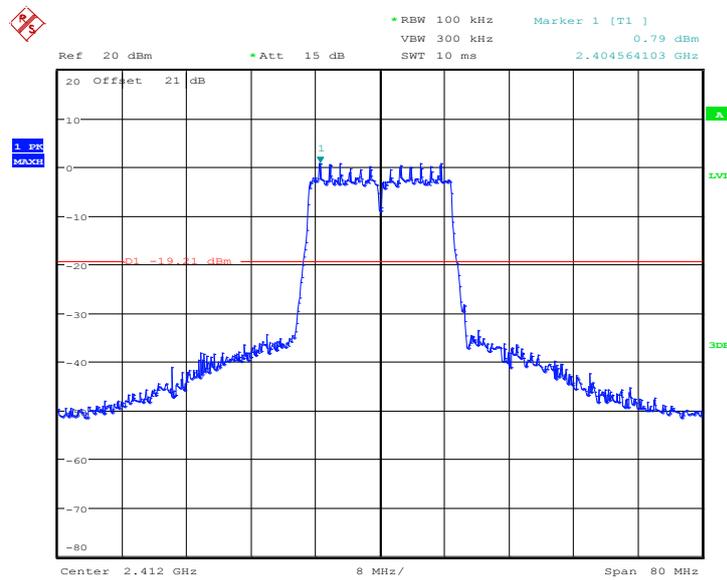
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Fig. 79 Conducted Spurious Emission (802.11g, Ch11, 15 GHz-20 GHz)



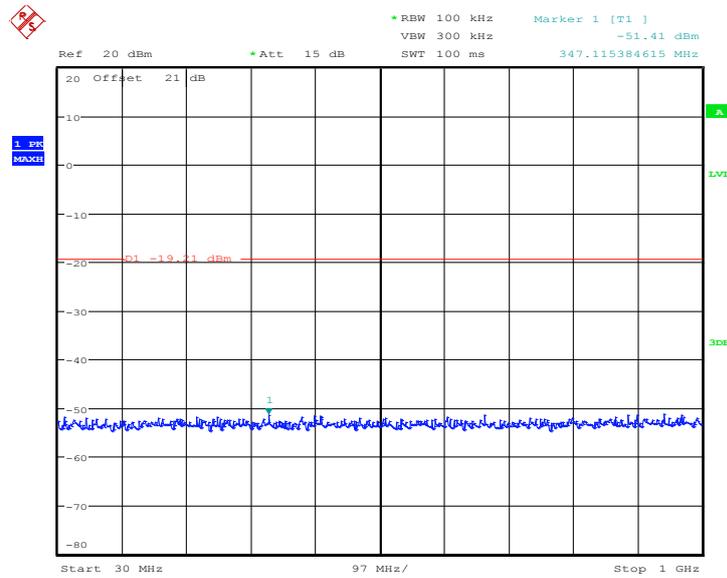
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Fig. 80 Conducted Spurious Emission (802.11g, Ch11, 20 GHz-26 GHz)



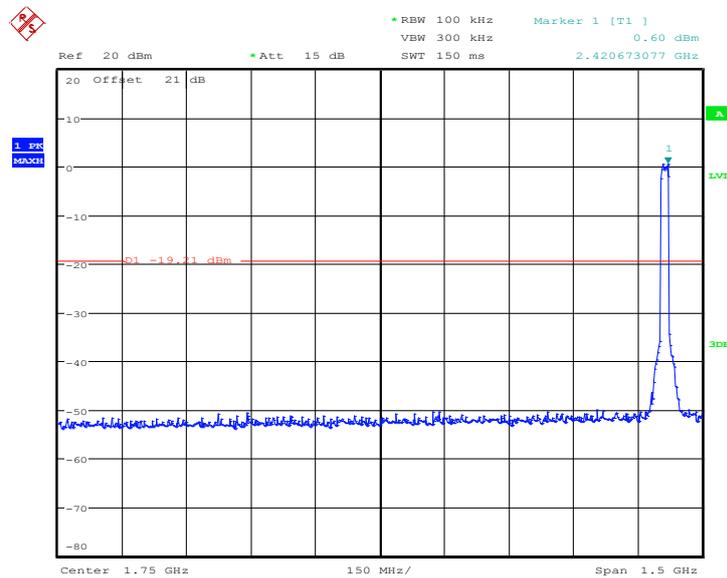
Date: 9.AUG.2012 15:06:21

Fig. 81 Conducted Spurious Emission (802.11n-HT20, Ch1, Center Frequency)



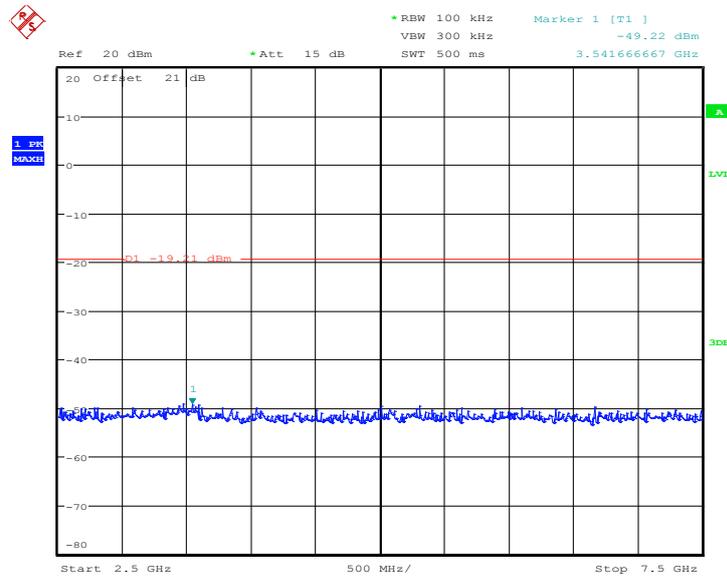
Date: 9.AUG.2012 15:06:40

Fig. 82 Conducted Spurious Emission (802.11n-HT20, Ch1, 30 MHz-1 GHz)



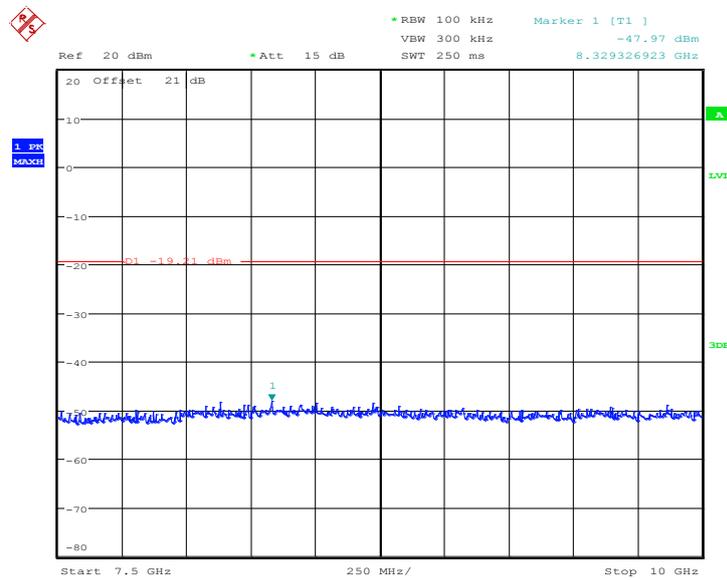
Date: 9.AUG.2012 15:07:14

Fig. 83 Conducted Spurious Emission (802.11n-HT20, Ch1, 1 GHz-2.5 GHz)



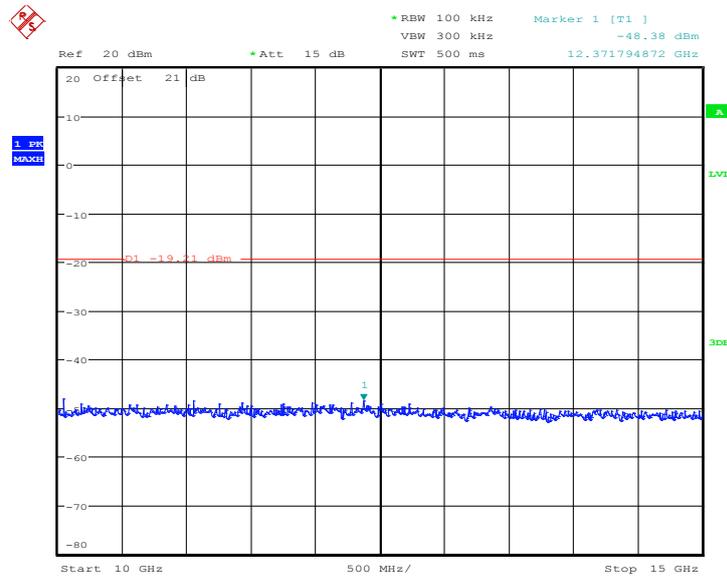
Date: 9.AUG.2012 15:07:40

Fig. 84 Conducted Spurious Emission (802.11n-HT20, Ch1, 2.5 GHz-7.5 GHz)



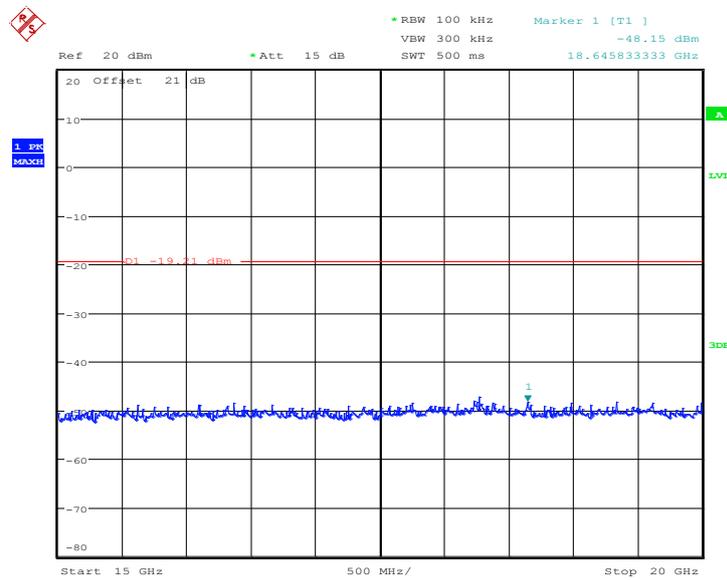
Date: 9.AUG.2012 15:08:01

Fig. 85 Conducted Spurious Emission (802.11n-HT20, Ch1, 7.5 GHz-10 GHz)



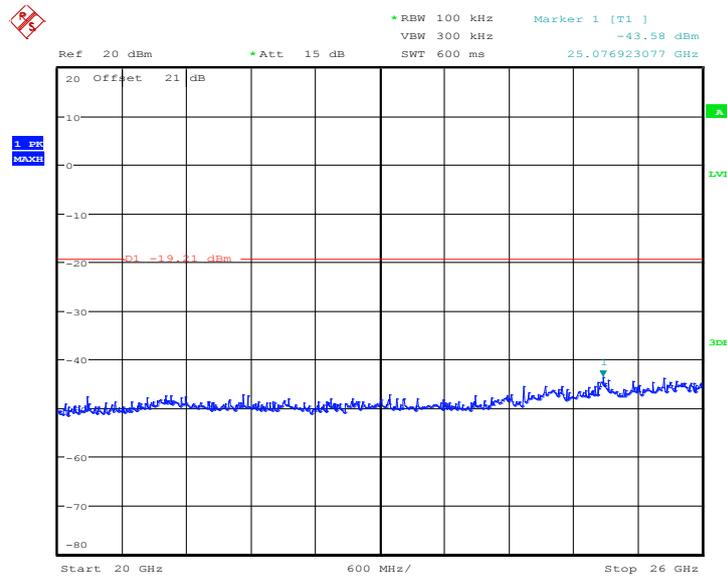
Date: 9.AUG.2012 15:08:20

Fig. 86 Conducted Spurious Emission (802.11n-HT20, Ch1, 10 GHz-15 GHz)



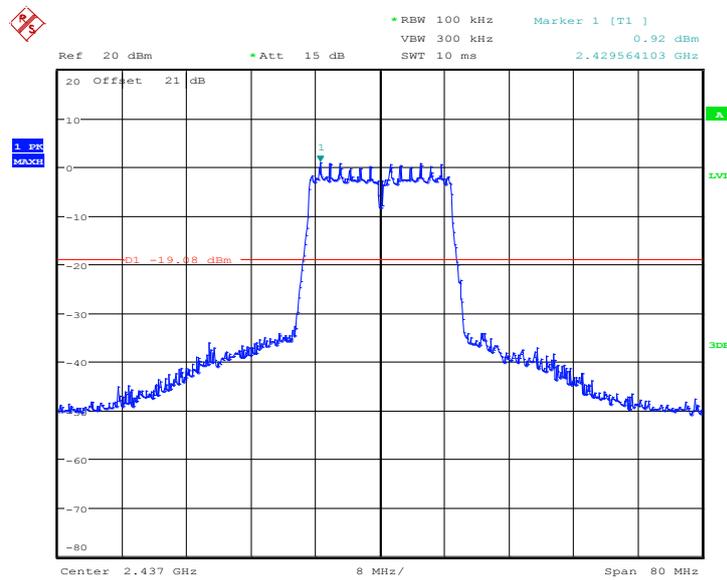
Date: 9.AUG.2012 15:08:41

Fig. 87 Conducted Spurious Emission (802.11n-HT20, Ch1, 15 GHz-20 GHz)



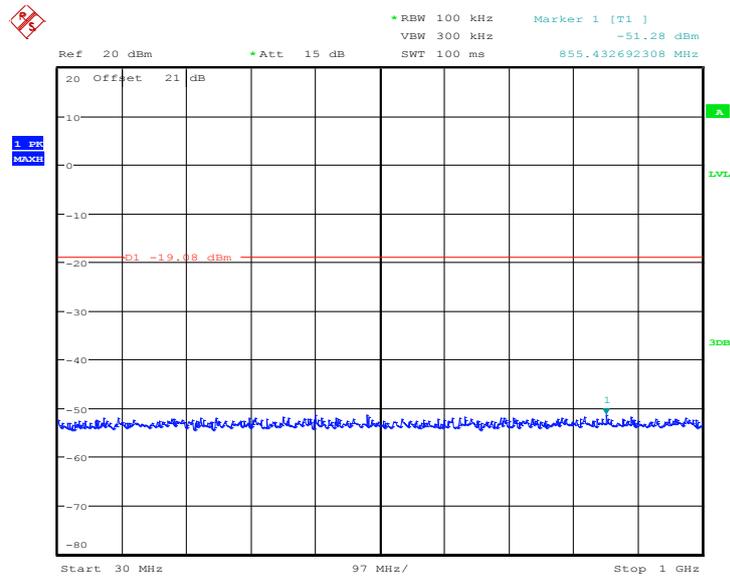
Date: 9.AUG.2012 15:09:00

Fig. 88 Conducted Spurious Emission (802.11n-HT20, Ch1, 20 GHz-26 GHz)



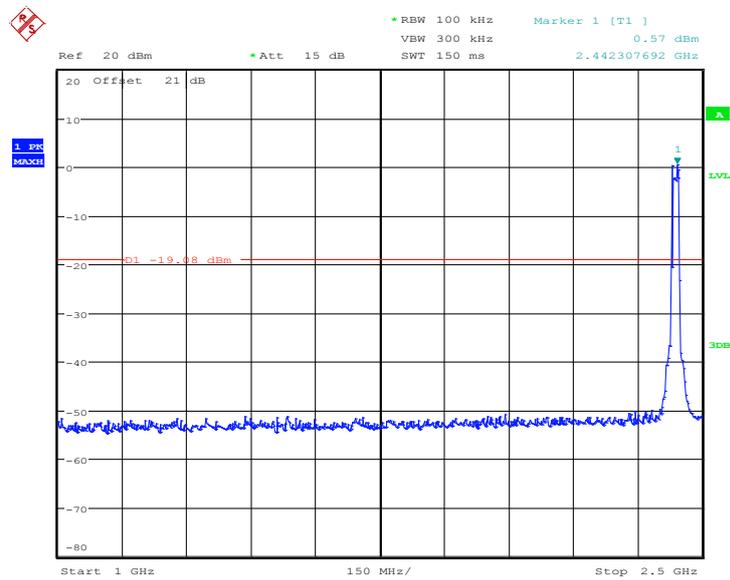
Date: 9.AUG.2012 15:11:24

Fig. 89 Conducted Spurious Emission (802.11n-HT20, Ch6, Center Frequency)



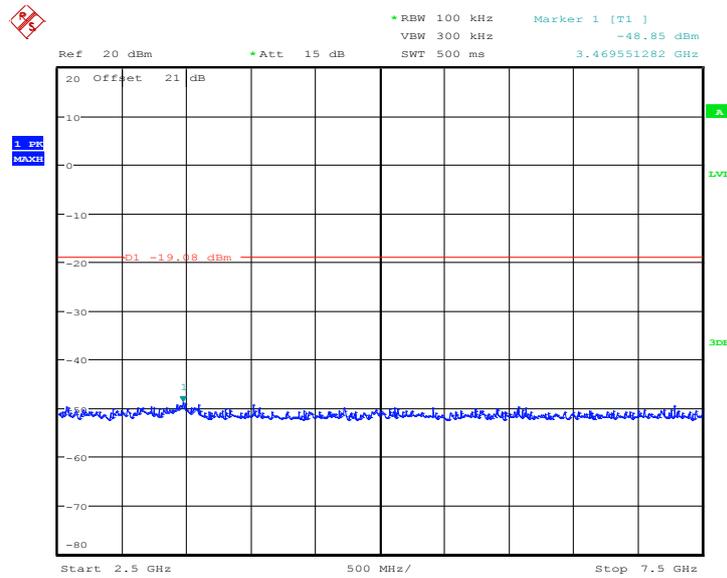
Date: 9.AUG.2012 15:11:50

Fig. 90 Conducted Spurious Emission (802.11n-HT20, Ch6, 30 MHz-1 GHz)



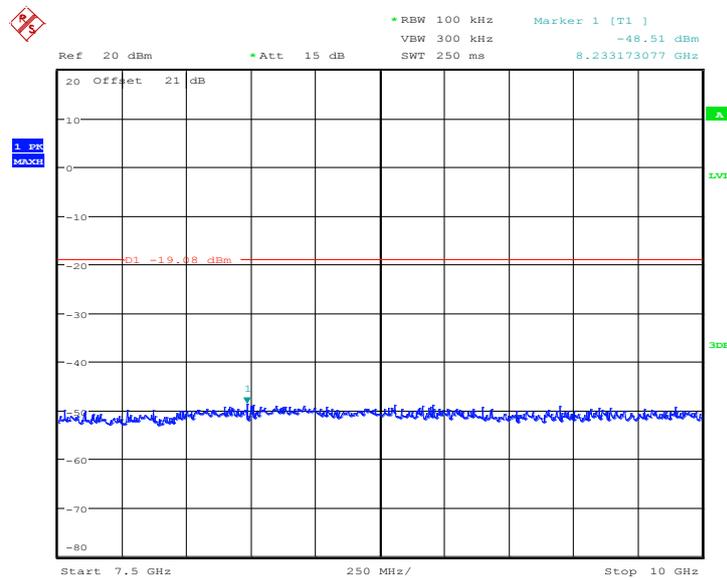
Date: 9.AUG.2012 15:12:06

Fig. 91 Conducted Spurious Emission (802.11n-HT20, Ch6, 1 GHz-2.5 GHz)



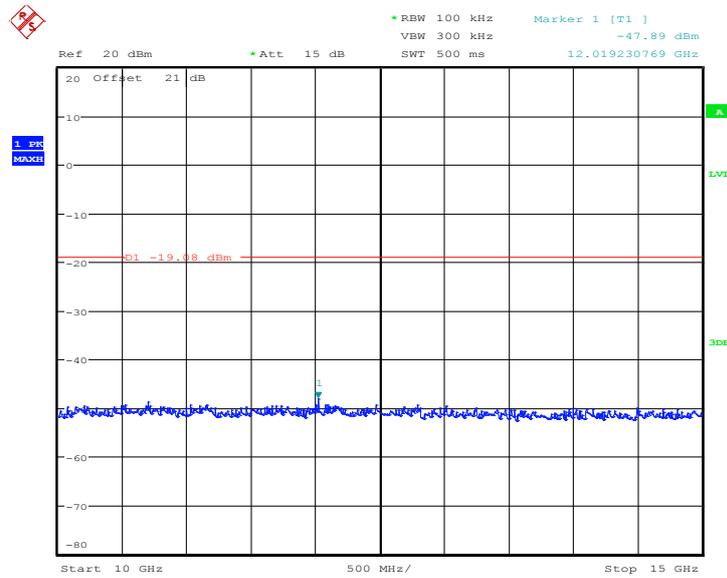
Date: 9.AUG.2012 15:12:41

Fig. 92 Conducted Spurious Emission (802.11n-HT20, Ch6, 2.5 GHz-7.5 GHz)



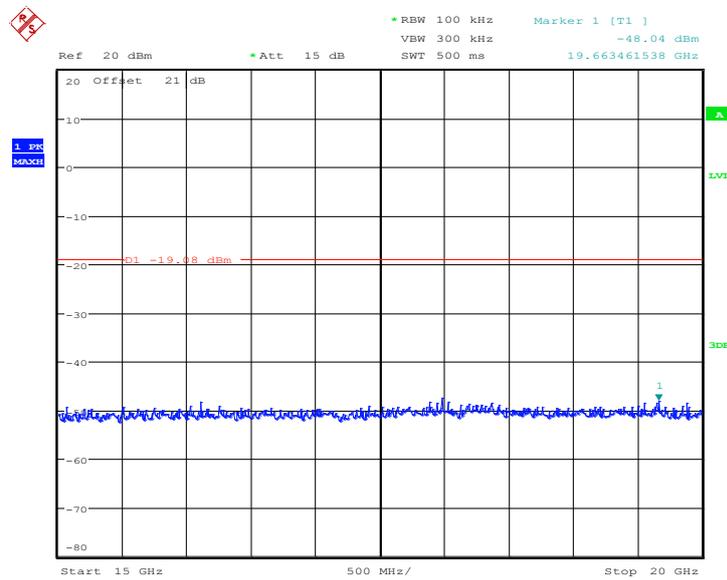
Date: 9.AUG.2012 15:12:59

Fig. 93 Conducted Spurious Emission (802.11n-HT20, Ch6, 7.5 GHz-10 GHz)



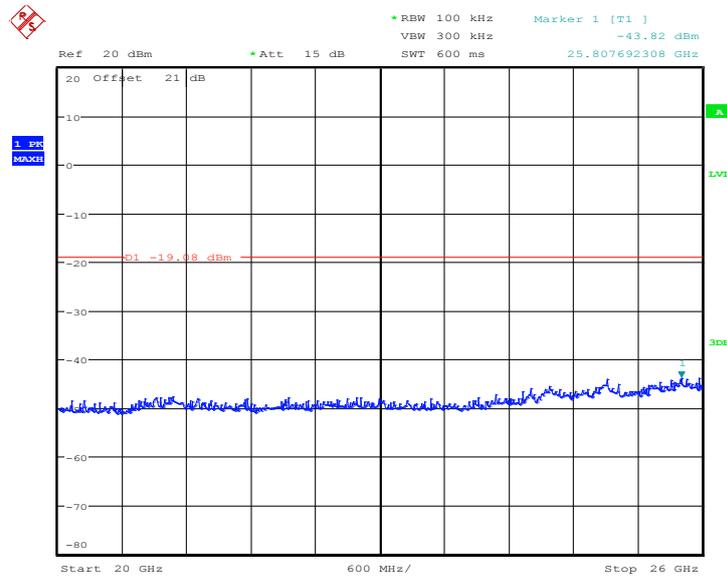
Date: 9.AUG.2012 15:13:18

Fig. 94 Conducted Spurious Emission (802.11n-HT20, Ch6, 10 GHz-15 GHz)



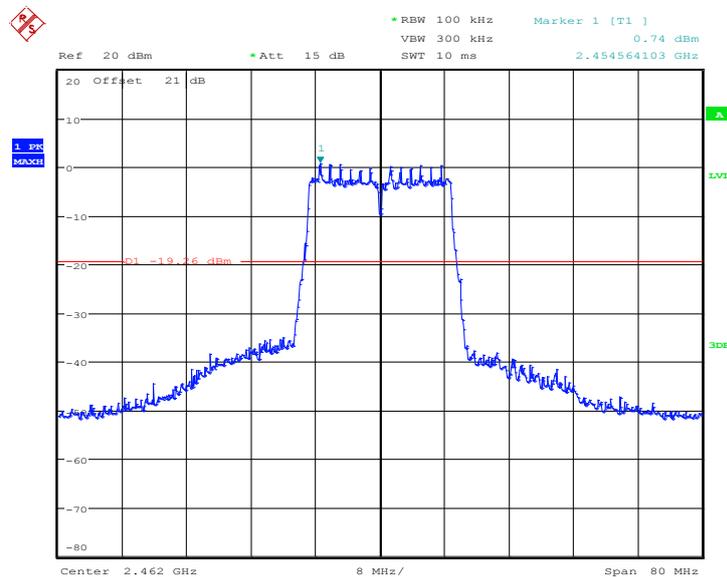
Date: 9.AUG.2012 15:13:38

Fig. 95 Conducted Spurious Emission (802.11n-HT20, Ch6, 15 GHz-20 GHz)



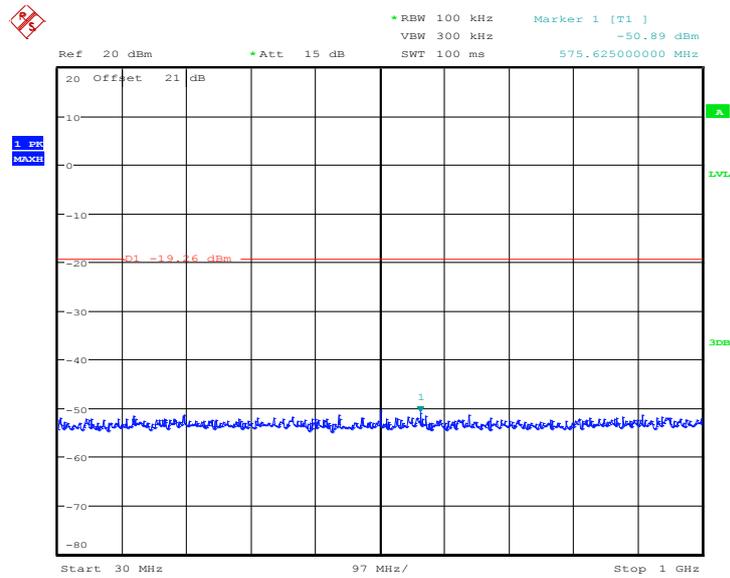
Date: 9.AUG.2012 15:13:59

Fig. 96 Conducted Spurious Emission (802.11n-HT20, Ch6, 20 GHz-26 GHz)



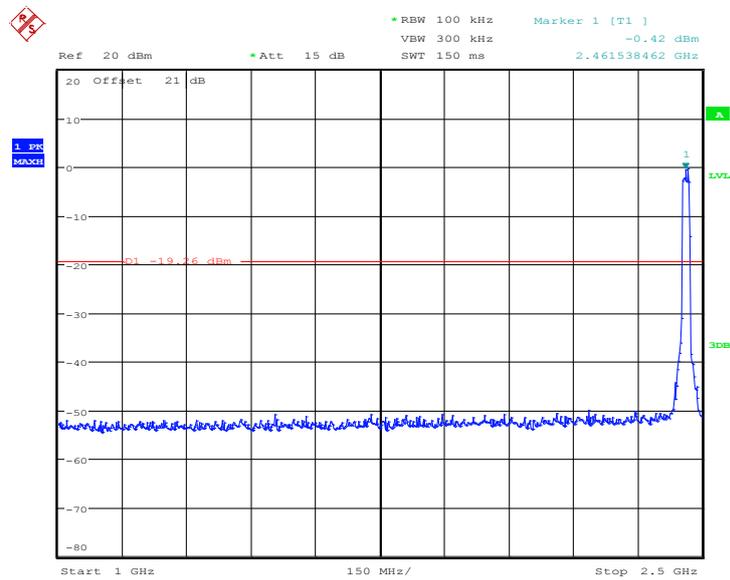
Date: 9.AUG.2012 15:14:54

Fig. 97 Conducted Spurious Emission (802.11n-HT20, Ch11, Center Frequency)



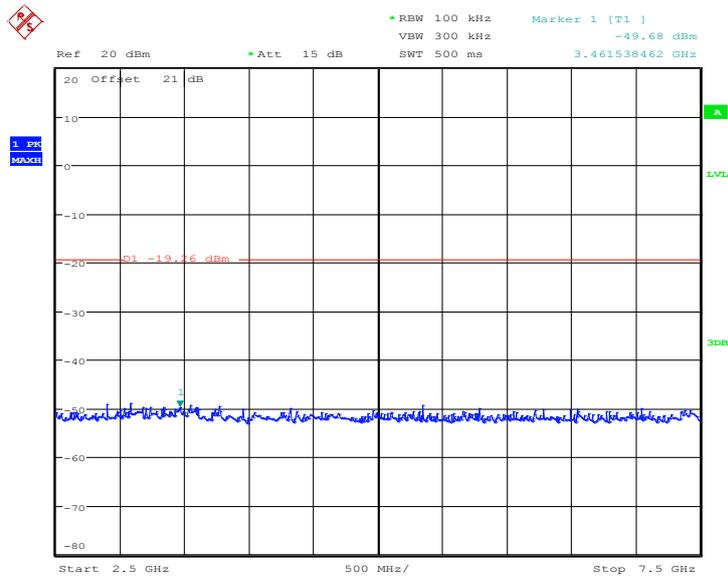
Date: 9.AUG.2012 15:15:11

Fig. 98 Conducted Spurious Emission (802.11n-HT20, Ch11, 30 MHz-1 GHz)



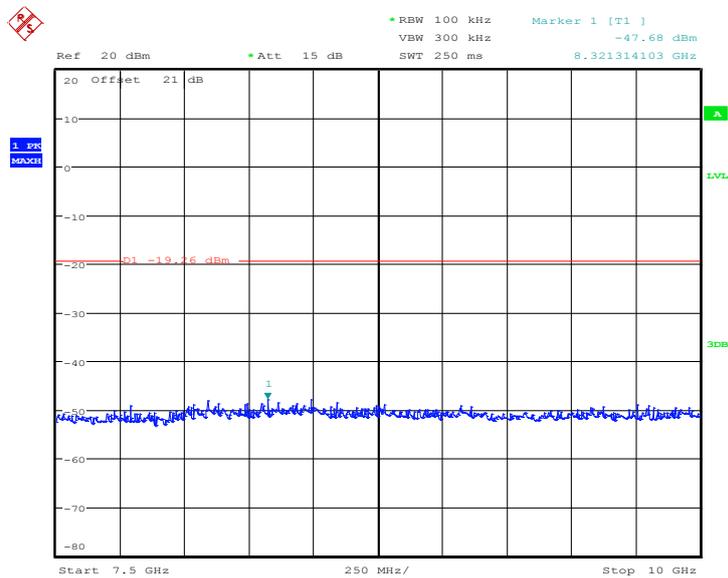
Date: 9.AUG.2012 15:15:27

Fig. 99 Conducted Spurious Emission (802.11n-HT20, Ch11, 1 GHz-2.5 GHz)



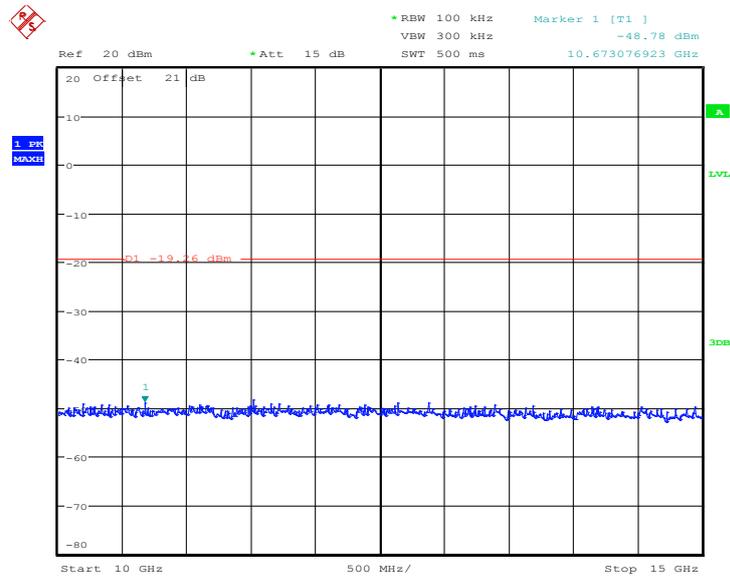
Date: 9.AUG.2012 15:15:47

Fig. 100 Conducted Spurious Emission (802.11n-HT20, Ch11, 2.5 GHz-7.5 GHz)



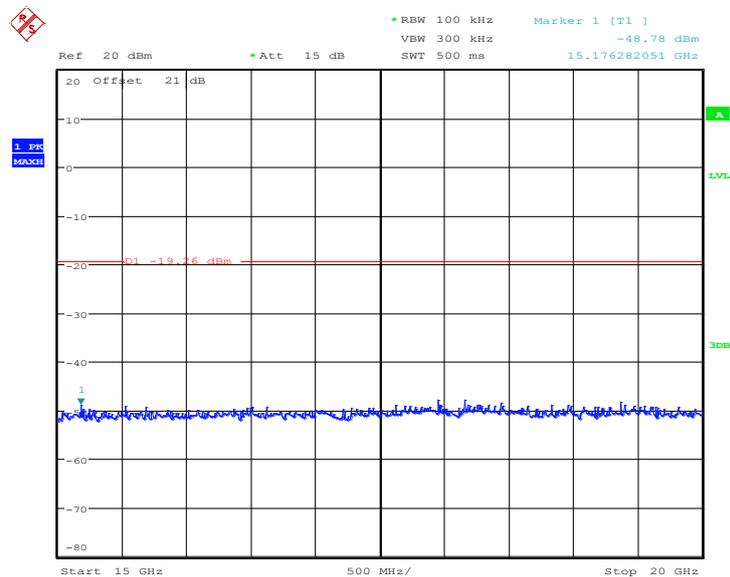
Date: 9.AUG.2012 15:16:13

Fig. 101 Conducted Spurious Emission (802.11n-HT20, Ch11, 7.5 GHz-10 GHz)



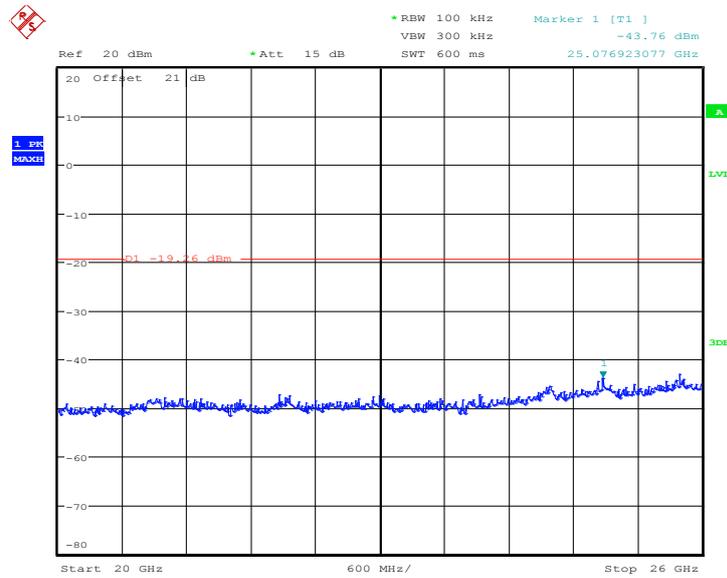
Date: 9.AUG.2012 15:16:36

Fig. 102 Conducted Spurious Emission (802.11n-HT20, Ch11, 10 GHz-15 GHz)



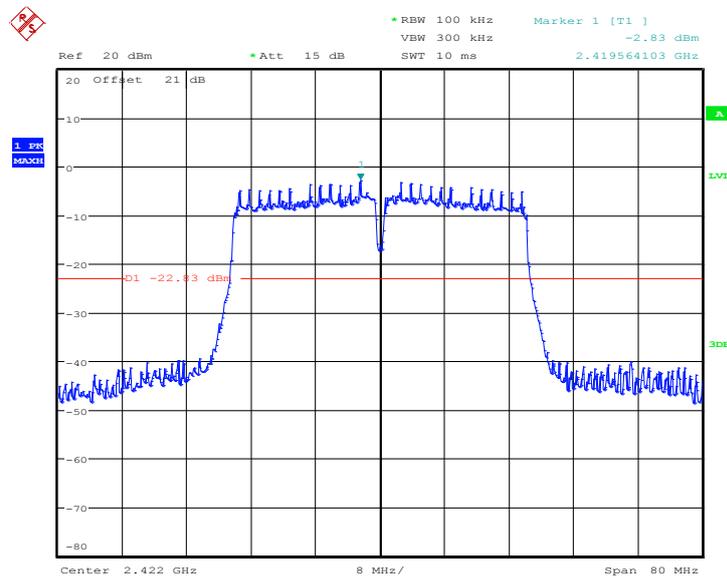
Date: 9.AUG.2012 15:16:55

Fig. 103 Conducted Spurious Emission (802.11n-HT20, Ch11, 15 GHz-20 GHz)



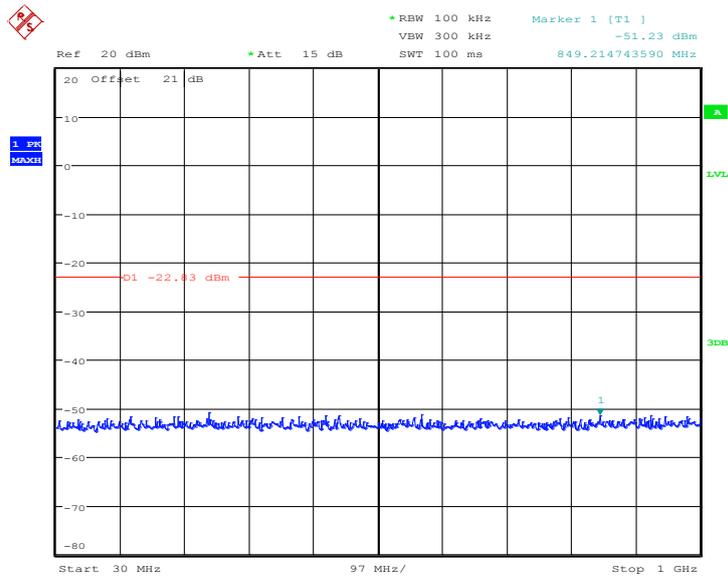
Date: 9.AUG.2012 15:17:13

Fig. 104 Conducted Spurious Emission (802.11n-HT20, Ch11, 20 GHz-26 GHz)



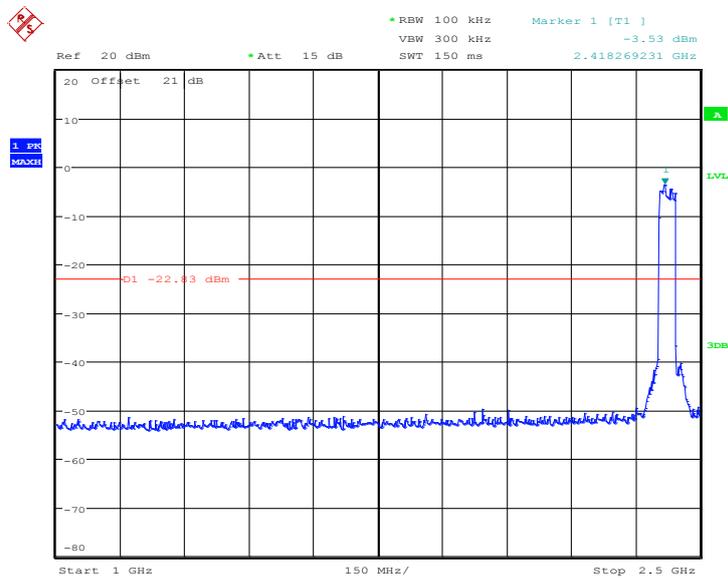
Date: 9.AUG.2012 15:18:11

Fig. 105 Conducted Spurious Emission (802.11n- HT40, Ch3, Center Frequency)



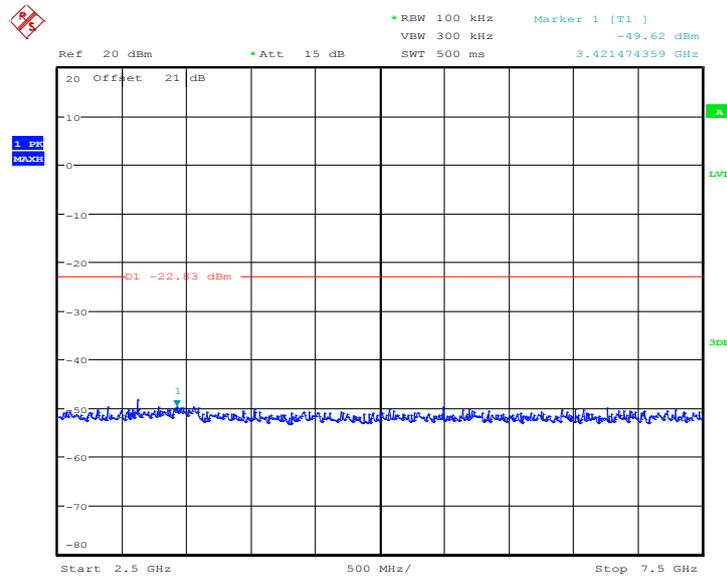
Date: 9.AUG.2012 15:18:29

Fig. 106 Conducted Spurious Emission (802.11n- HT40, Ch3, 30 MHz-1 GHz)



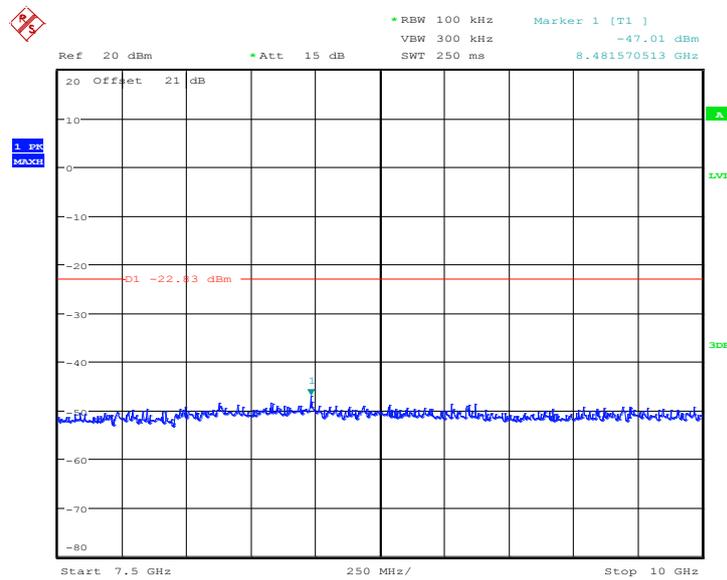
Date: 9.AUG.2012 15:18:50

Fig. 107 Conducted Spurious Emission (802.11n- HT40, Ch3, 1 GHz-2.5 GHz)



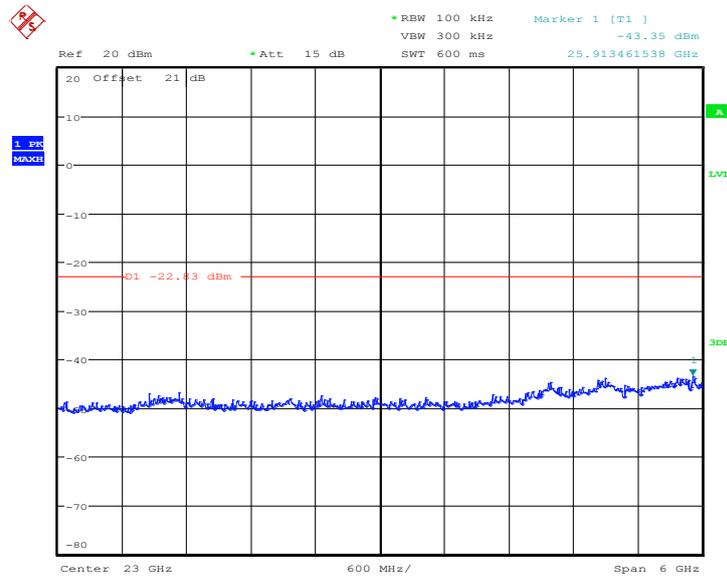
Date: 9.AUG.2012 15:19:17

Fig. 108 Conducted Spurious Emission (802.11n- HT40, Ch3, 2.5 GHz-7.5 GHz)



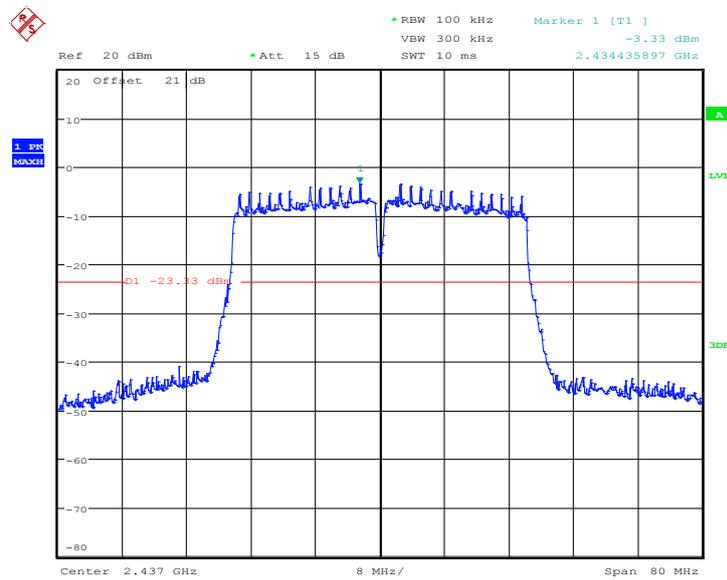
Date: 9.AUG.2012 15:19:35

Fig. 109 Conducted Spurious Emission (802.11n- HT40, Ch3, 7.5 GHz-10 GHz)



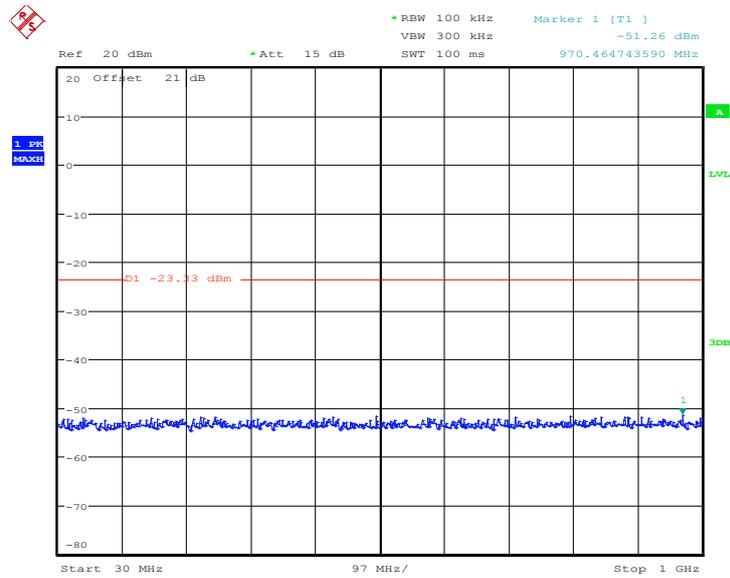
Date: 9.AUG.2012 15:21:03

Fig. 112 Conducted Spurious Emission (802.11n- HT40, Ch3, 20 GHz-26 GHz)



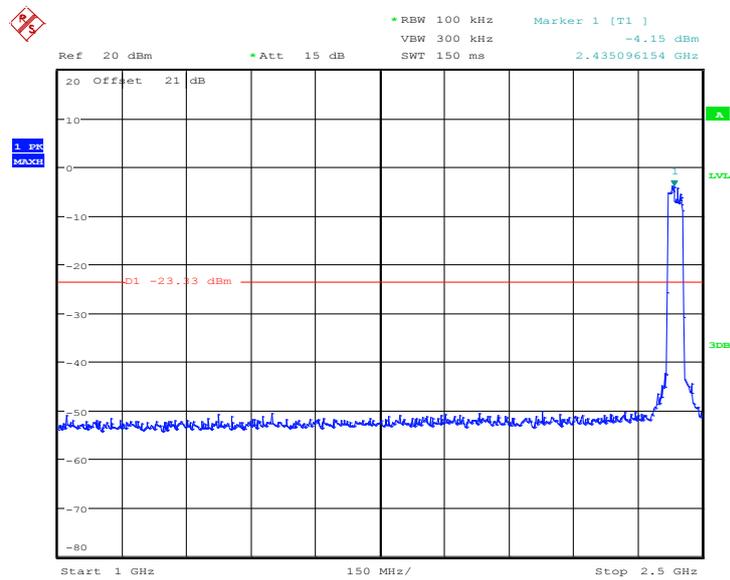
Date: 9.AUG.2012 15:21:53

Fig. 113 Conducted Spurious Emission (802.11n- HT40, Ch6, Center Frequency)



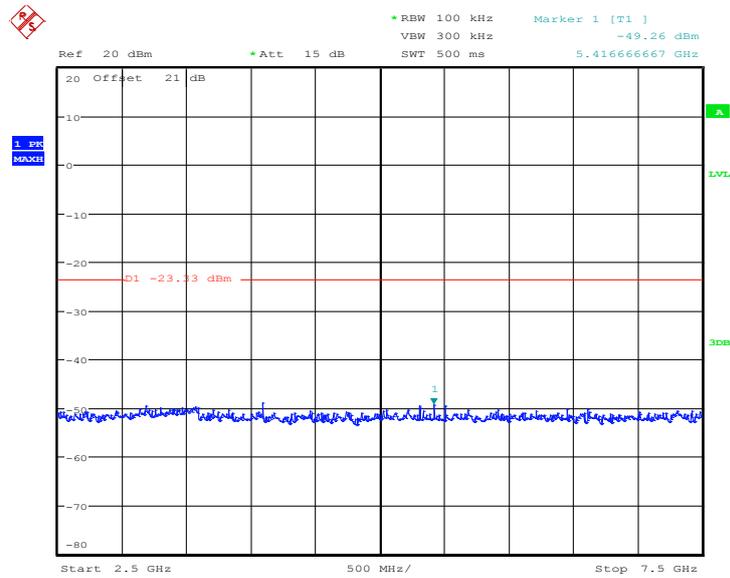
Date: 9.AUG.2012 15:22:11

Fig. 114 Conducted Spurious Emission (802.11n- HT40, Ch6, 30 MHz-1 GHz)



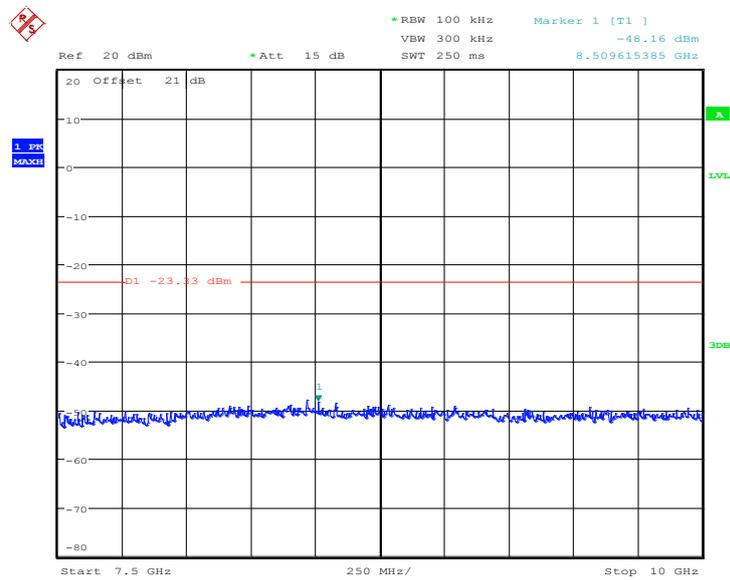
Date: 9.AUG.2012 15:22:32

Fig. 115 Conducted Spurious Emission (802.11n- HT40, Ch6, 1 GHz-2.5 GHz)



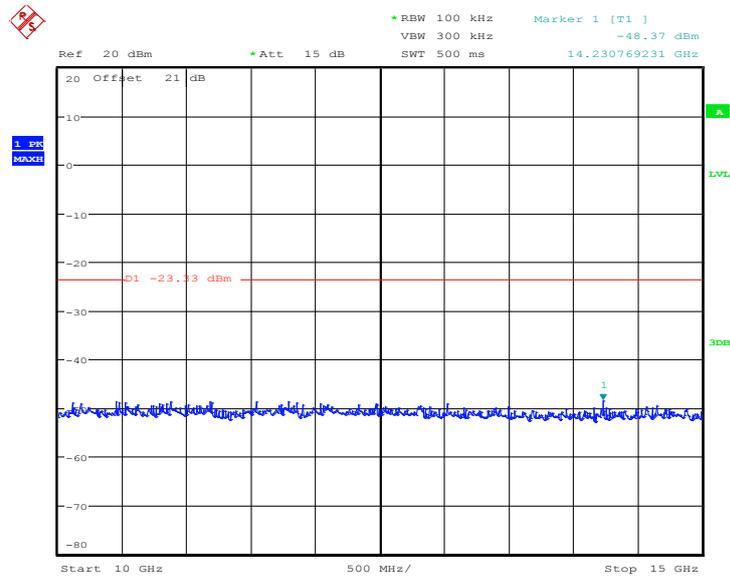
Date: 9.AUG.2012 15:22:53

Fig. 116 Conducted Spurious Emission (802.11n- HT40, Ch6, 2.5 GHz-7.5 GHz)



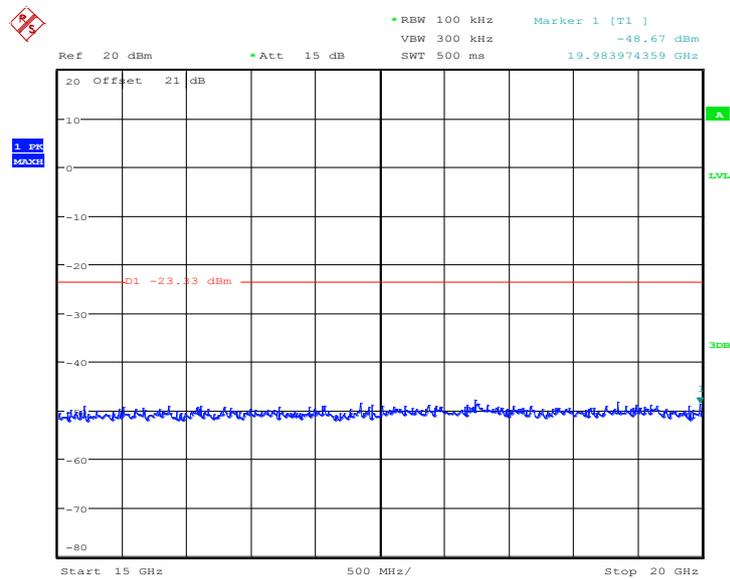
Date: 9.AUG.2012 15:23:10

Fig. 117 Conducted Spurious Emission (802.11n- HT40, Ch6, 7.5 GHz-10 GHz)



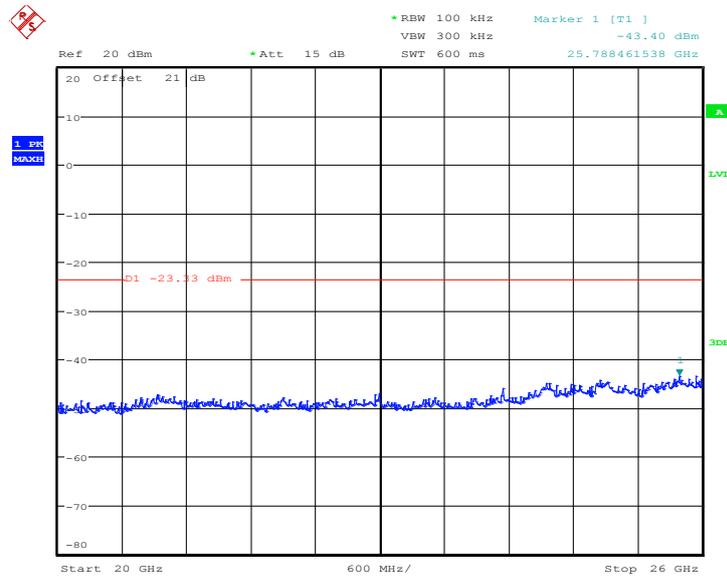
Date: 9.AUG.2012 15:23:29

Fig. 118 Conducted Spurious Emission (802.11n- HT40, Ch6, 10 GHz-15 GHz)



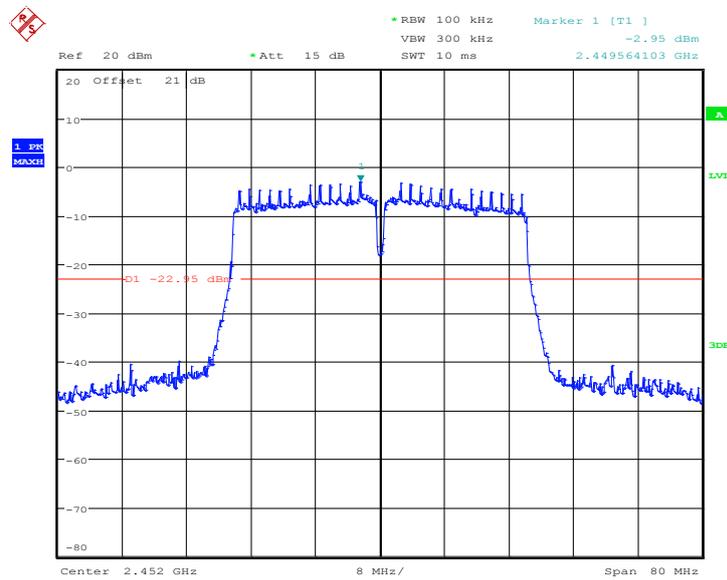
Date: 9.AUG.2012 15:23:59

Fig. 119 Conducted Spurious Emission (802.11n- HT40, Ch6, 15 GHz-20 GHz)



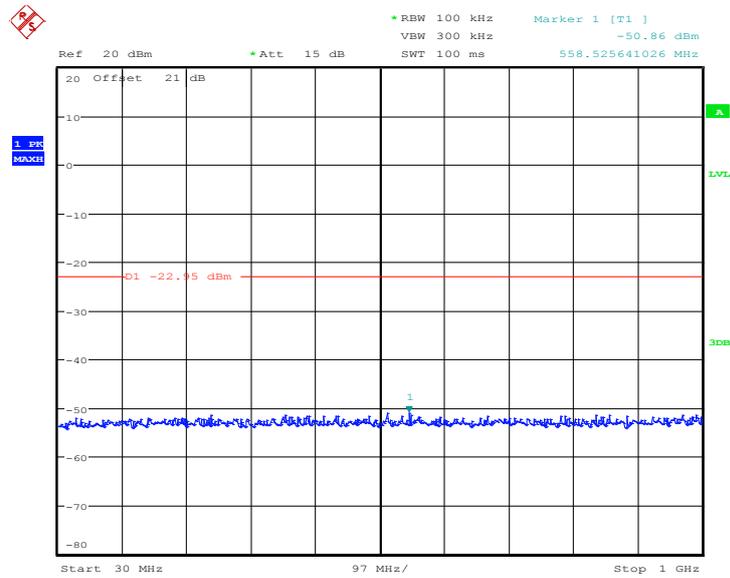
Date: 9.AUG.2012 15:24:31

Fig. 120 Conducted Spurious Emission (802.11n- HT40, Ch6, 20 GHz-26 GHz)



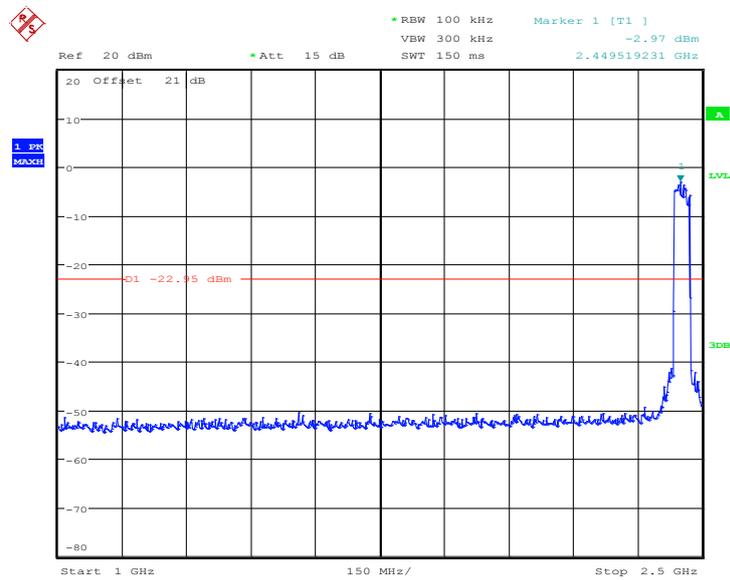
Date: 9.AUG.2012 15:25:13

Fig. 121 Conducted Spurious Emission (802.11n- HT40, Ch9, Center Frequency)



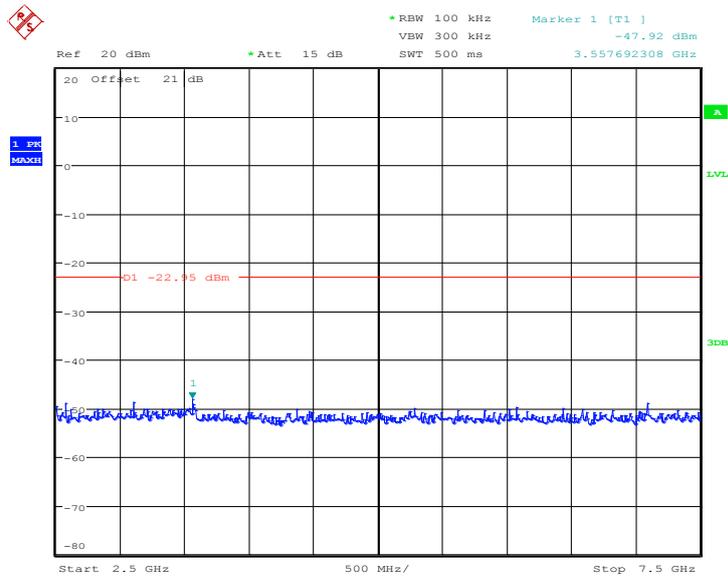
Date: 9.AUG.2012 15:25:44

Fig. 122 Conducted Spurious Emission (802.11n- HT40, Ch9, 30 MHz-1 GHz)



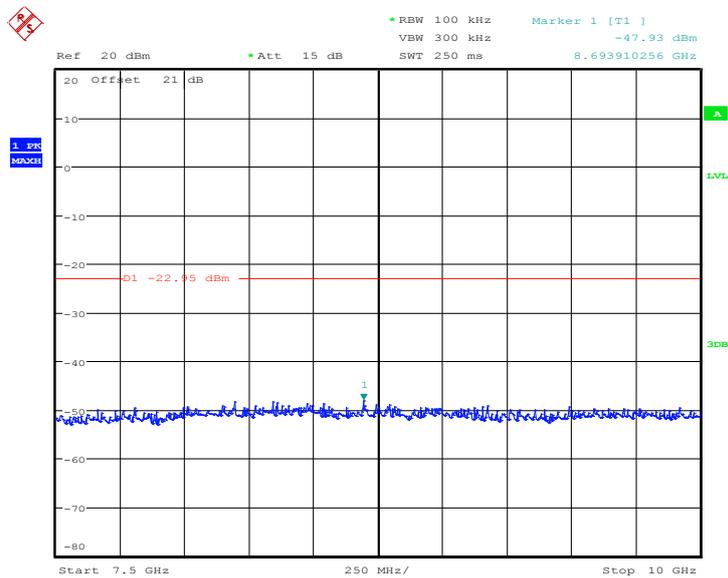
Date: 9.AUG.2012 15:26:05

Fig. 123 Conducted Spurious Emission (802.11n- HT40, Ch9, 1 GHz-2.5 GHz)



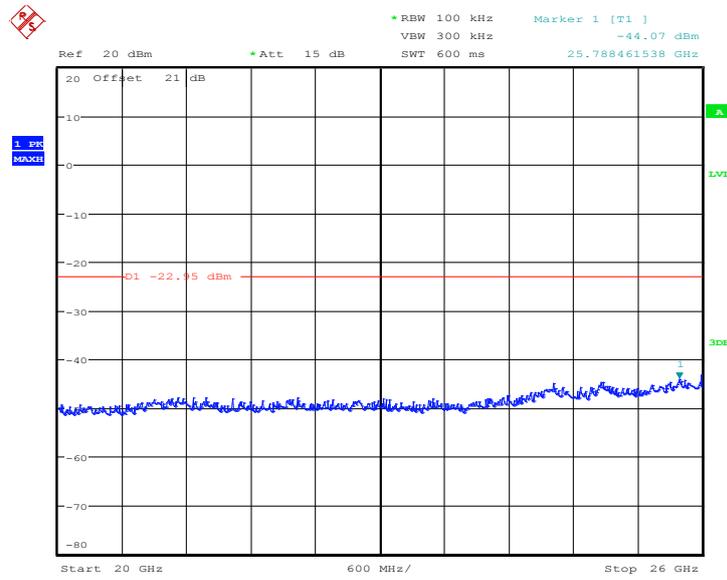
Date: 9.AUG.2012 15:26:23

Fig. 124 Conducted Spurious Emission (802.11n- HT40, Ch9, 2.5 GHz-7.5 GHz)



Date: 9.AUG.2012 15:26:42

Fig. 125 Conducted Spurious Emission (802.11n- HT40, Ch9, 7.5 GHz-10 GHz)



Date: 9.AUG.2012 15:27:35

Fig. 128 Conducted Spurious Emission (802.11n-HT40, Ch9, 20 GHz-26 GHz)

A.6.2 Transmitter Spurious Emission - Radiated

Measurement Limit:

Standard	Limit
FCC 47 CFR Part 15.247, 15.205, 15.209	20dB below peak output power

In addition, radiated emissions which fall in the restricted bands, as defined in § 15.205(a), must also comply with the radiated emission limits specified in § 15.209(a) (see § 15.205(c)).

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Limit in restricted band:

Frequency of emission (MHz)	Field strength(uV/m)	Field strength(dBuV/m)
30-88	100	40
88-216	150	43.5
216-960	200	46
Above 960	500	54

Test Condition

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

Frequency of emission (MHz)	RBW/VBW	Sweep Time(s)
30-1000	100KHz/300KHz	5
1000-4000	1MHz/1MHz	15
4000-18000	1MHz/1MHz	40
18000-26500	1MHz/1MHz	20

Measurement Results:

802.11b/g mode

Mode	Channel	Frequency Range	Test Results	Conclusion
802.11b	Power	2.38GHz ~2.45GHz	Fig.129	P
	1	30 MHz ~1 GHz	Fig.130	P
		1 GHz ~ 3 GHz	Fig.131	P
		3 GHz ~ 18 GHz	Fig.132	P
	6	30 MHz ~1 GHz	Fig.133	P
		1 GHz ~ 3 GHz	Fig.134	P
		3 GHz ~ 18 GHz	Fig.135	P
	Power	2.45GHz ~2.5GHz	Fig.136	P
	11	30 MHz ~1 GHz	Fig.137	P
		1 GHz ~ 3 GHz	Fig.138	P
		3 GHz ~ 18 GHz	Fig.139	P
	802.11g	Power	2.38GHz ~2.43GHz	Fig.140
1		30 MHz ~1 GHz	Fig.141	P
		1 GHz ~ 3 GHz	Fig.142	P
		3 GHz ~ 18 GHz	Fig.143	P
6		30 MHz ~1 GHz	Fig.144	P
		1 GHz ~ 3 GHz	Fig.145	P
		3 GHz ~ 18 GHz	Fig.146	P
Power		2.45GHz ~2.5GHz	Fig.147	P
11		30 MHz ~1 GHz	Fig.148	P
		1 GHz ~ 3 GHz	Fig.149	P
		3 GHz ~ 18 GHz	Fig.150	P

802.11n mode

Mode	Channel	Frequency Range	Test Results	Conclusion
802.11n (20MHz)	Power	2.38GHz ~2.45GHz	Fig.151	P
	1	30 MHz ~1 GHz	Fig.152	P
		1 GHz ~ 3 GHz	Fig.153	P
		3 GHz ~ 18 GHz	Fig.154	P
	6	30 MHz ~1 GHz	Fig.155	P
		1 GHz ~ 3 GHz	Fig.156	P
		3 GHz ~ 18 GHz	Fig.157	P
	Power	2.45GHz ~2.5GHz	Fig.158	P
	11	30 MHz ~1 GHz	Fig.159	P
		1 GHz ~ 3 GHz	Fig.160	P
		3 GHz ~ 18 GHz	Fig.161	P
	802.11n (40MHz)	Power	2.38GHz ~2.45GHz	Fig.162
3		30 MHz ~1 GHz	Fig.163	P
		1 GHz ~ 3 GHz	Fig.164	P

		3 GHz ~ 18 GHz	Fig.165	P
	6	30 MHz ~1 GHz	Fig.166	P
		1 GHz ~ 3 GHz	Fig.167	P
		3 GHz ~ 18 GHz	Fig.168	P
	Power	2.45GHz ~2.5GHz	Fig.169	P
	9	30 MHz ~1 GHz	Fig.170	P
		1 GHz ~ 3 GHz	Fig.171	P
		3 GHz ~ 18 GHz	Fig.172	P
/	All channels	18 GHz~ 26.5 GHz	Fig.173	P

Conclusion: PASS

Note:

A "reference path loss" is established and the A_{Rpl} is the attenuation of "reference path loss", and including the gain of receive antenna, the gain of the preamplifier, the cable loss.

P_{Mea} is the field strength recorded from the instrument.

The measurement results are obtained as described below:

$$\text{Result} = P_{Mea} + A_{Rpl} = P_{Mea} + \text{Cable Loss} + \text{Antenna Factor}$$

802.11b

Ch1

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2793.400	46.8	-26.3	33.3	39.838	HORIZONTAL
2782.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2768.000	46.7	-27.1	33.3	40.485	HORIZONTAL
2796.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2796.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2733.400	46.7	-27.6	33.3	40.954	HORIZONTAL

Ch6

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2794.800	46.6	-26.3	33.3	39.638	HORIZONTAL
2792.400	46.6	-26.3	33.3	39.638	HORIZONTAL
2743.600	46.6	-27.6	33.3	40.854	HORIZONTAL
2765.800	46.6	-27.1	33.3	40.385	HORIZONTAL
2779.000	46.6	-26.3	33.3	39.638	HORIZONTAL
2794.200	46.6	-26.3	33.3	39.638	HORIZONTAL

Ch11

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2785.000	46.8	-26.3	33.3	39.838	HORIZONTAL
2787.400	46.8	-26.3	33.3	39.838	HORIZONTAL
2753.000	46.7	-27.1	33.3	40.485	HORIZONTAL
2782.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2793.800	46.7	-26.3	33.3	39.738	HORIZONTAL
2784.000	46.7	-26.3	33.3	39.738	HORIZONTAL

802.11g

Ch1

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2747.200	46.7	-27.6	33.3	40.954	HORIZONTAL
2784.200	46.6	-26.3	33.3	39.638	HORIZONTAL
2786.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2789.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2745.000	46.6	-27.6	33.3	40.854	HORIZONTAL
2777.000	46.6	-26.3	33.3	39.638	HORIZONTAL

Ch6

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2789.000	46.7	-26.3	33.3	39.738	HORIZONTAL
2761.400	46.6	-27.1	33.3	40.385	HORIZONTAL
2791.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2798.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2781.400	46.6	-26.3	33.3	39.638	HORIZONTAL
2779.400	46.6	-26.3	33.3	39.638	HORIZONTAL

Ch11

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2769.800	46.7	-27.1	33.3	40.485	HORIZONTAL
2794.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2793.000	46.7	-26.3	33.3	39.738	HORIZONTAL
2787.000	46.7	-26.3	33.3	39.738	HORIZONTAL
2792.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2758.400	46.7	-27.1	33.3	40.485	HORIZONTAL

802.11n-HT20

Ch1

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2769.400	46.7	-27.1	33.3	40.485	HORIZONTAL
2770.400	46.7	-27.1	33.3	40.485	HORIZONTAL
2788.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2795.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2797.600	46.7	-26.3	33.3	39.738	HORIZONTAL
2782.000	46.6	-26.3	33.3	39.638	HORIZONTAL

Ch6

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2742.800	46.7	-27.6	33.3	40.954	HORIZONTAL
2794.200	46.7	-26.3	33.3	39.738	HORIZONTAL
2741.200	46.7	-27.6	33.3	40.954	HORIZONTAL
2785.200	46.6	-26.3	33.3	39.638	HORIZONTAL
2746.000	46.6	-27.6	33.3	40.854	HORIZONTAL
2783.200	46.6	-26.3	33.3	39.638	HORIZONTAL

Ch11

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2790.000	46.6	-26.3	33.3	39.638	HORIZONTAL
2806.000	46.6	-27.6	33.8	40.441	HORIZONTAL
2777.400	46.6	-26.3	33.3	39.638	HORIZONTAL
2788.200	46.6	-26.3	33.3	39.638	HORIZONTAL
2783.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2772.800	46.6	-27.1	33.3	40.385	HORIZONTAL

802.11n-HT40

Ch3

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2786.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2383.800	46.7	-30.2	30.8	46.079	HORIZONTAL
2791.000	46.7	-26.3	33.3	39.738	HORIZONTAL
2769.600	46.7	-27.1	33.3	40.485	HORIZONTAL
2776.600	46.6	-26.3	33.3	39.638	HORIZONTAL
2752.200	46.6	-27.1	33.3	40.385	HORIZONTAL

Ch6

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2790.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2800.000	46.7	-26.3	33.8	39.238	HORIZONTAL
2791.400	46.7	-26.3	33.3	39.738	HORIZONTAL
2786.200	46.7	-26.3	33.3	39.738	HORIZONTAL
2776.400	46.6	-26.3	33.3	39.638	HORIZONTAL
2772.400	46.6	-27.1	33.3	40.385	HORIZONTAL

Ch9

Frequency(MHz)	Result (dBuV/m)	Cable Loss	Antenna Factor	P _{Mea} (dBuV/m)	Polarization
2785.400	46.6	-26.3	33.3	39.638	HORIZONTAL
2786.800	46.6	-26.3	33.3	39.638	HORIZONTAL
2792.800	46.6	-26.3	33.3	39.638	HORIZONTAL
2778.200	46.6	-26.3	33.3	39.638	HORIZONTAL
2738.200	46.6	-27.6	33.3	40.854	HORIZONTAL
2409.200	46.6	-30.3	32.6	44.327	HORIZONTAL

Test graphs as below:

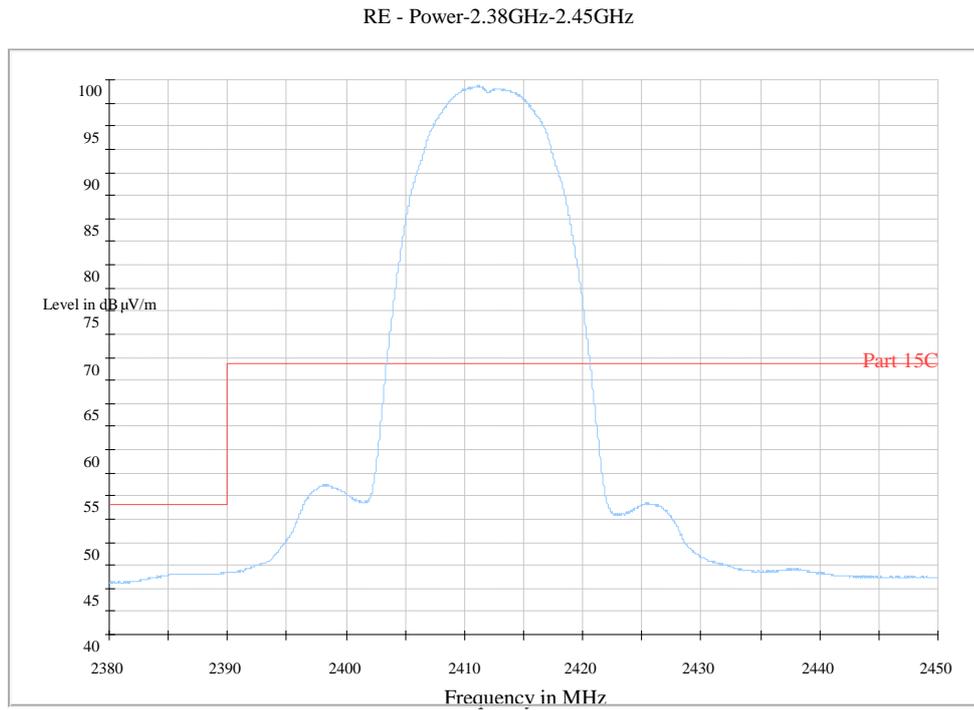


Fig. 129 Radiated Spurious Emission (Power): 802.11b, ch1, 2.38 GHz - 245GHz

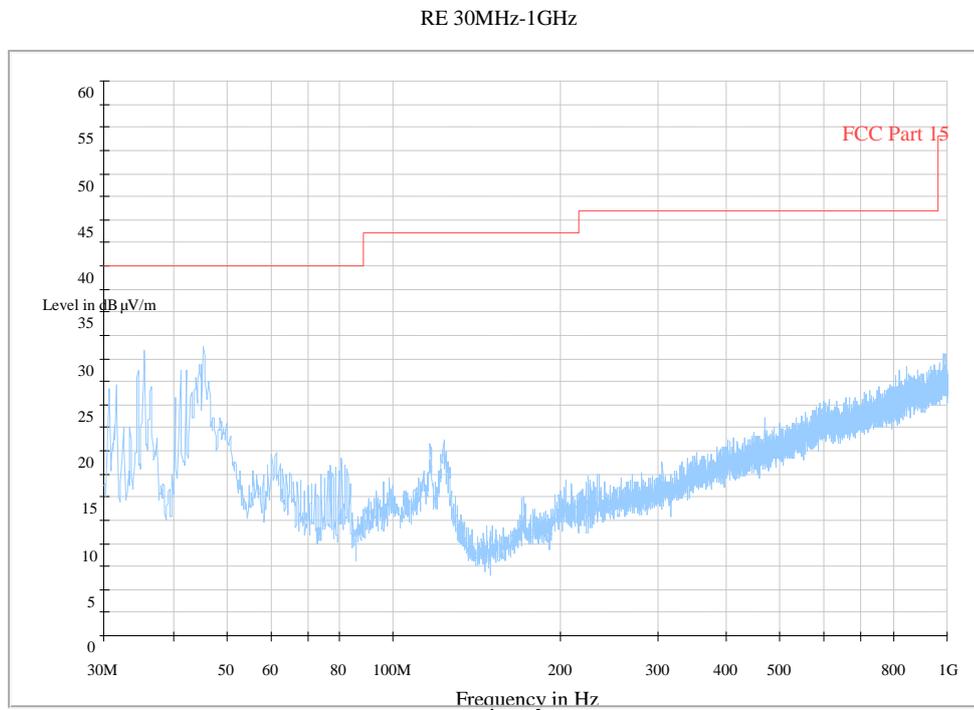


Fig. 130 Radiated Spurious Emission (802.11b, Ch1, 30 MHz-1 GHz)

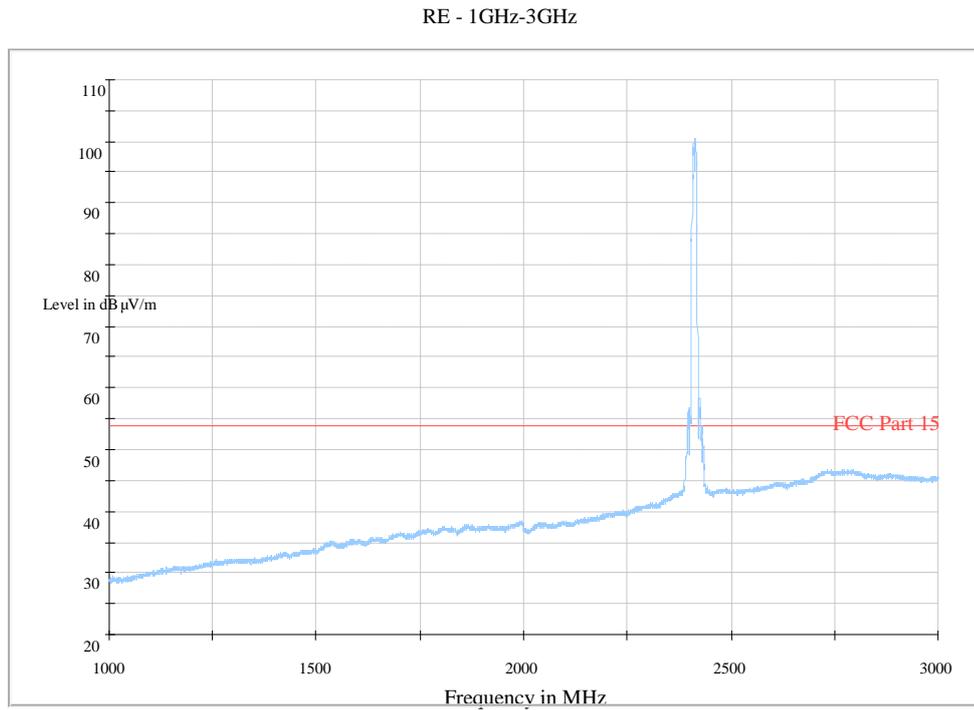


Fig. 131 Radiated Spurious Emission (802.11b, Ch1, 1 GHz-3 GHz)

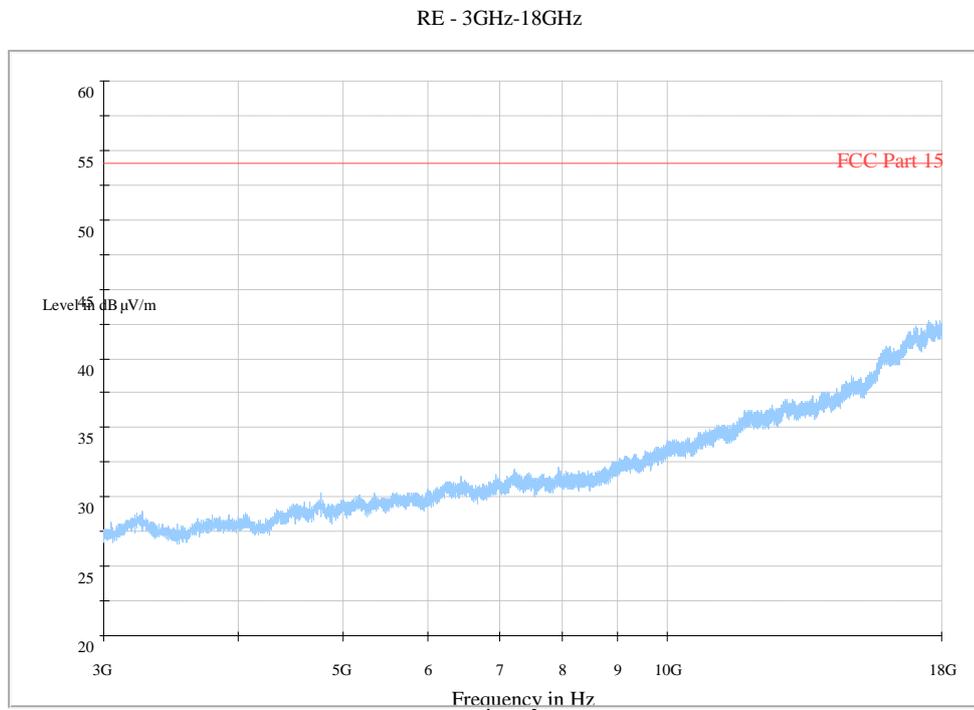


Fig. 132 Radiated Spurious Emission (802.11b, Ch1, 3 GHz-18 GHz)

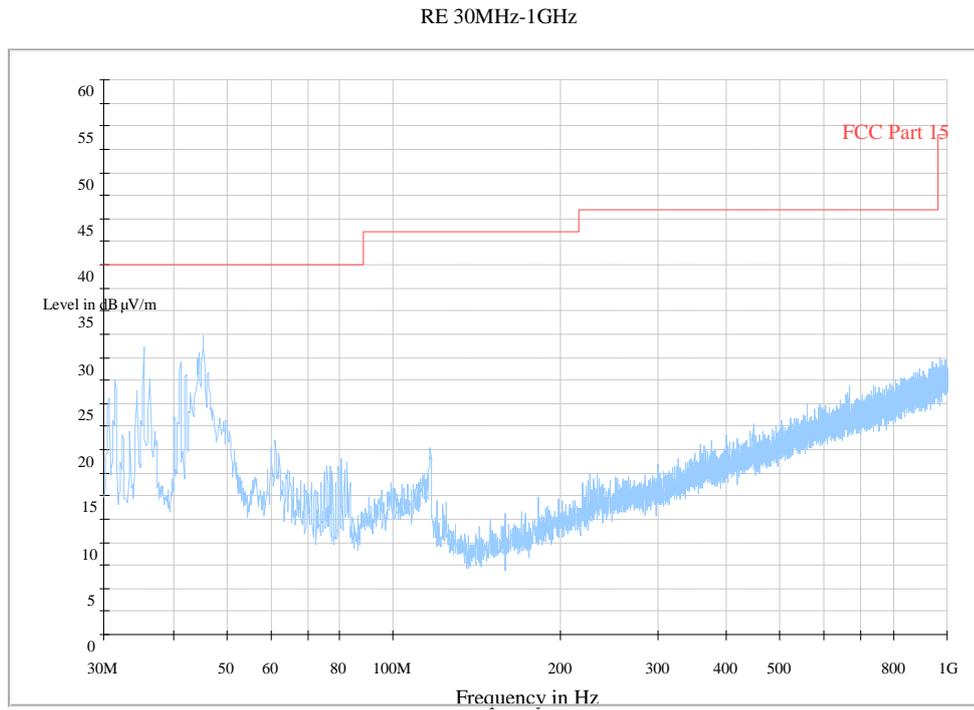


Fig. 133 Radiated Spurious Emission (802.11b, Ch6, 30 MHz-1 GHz)

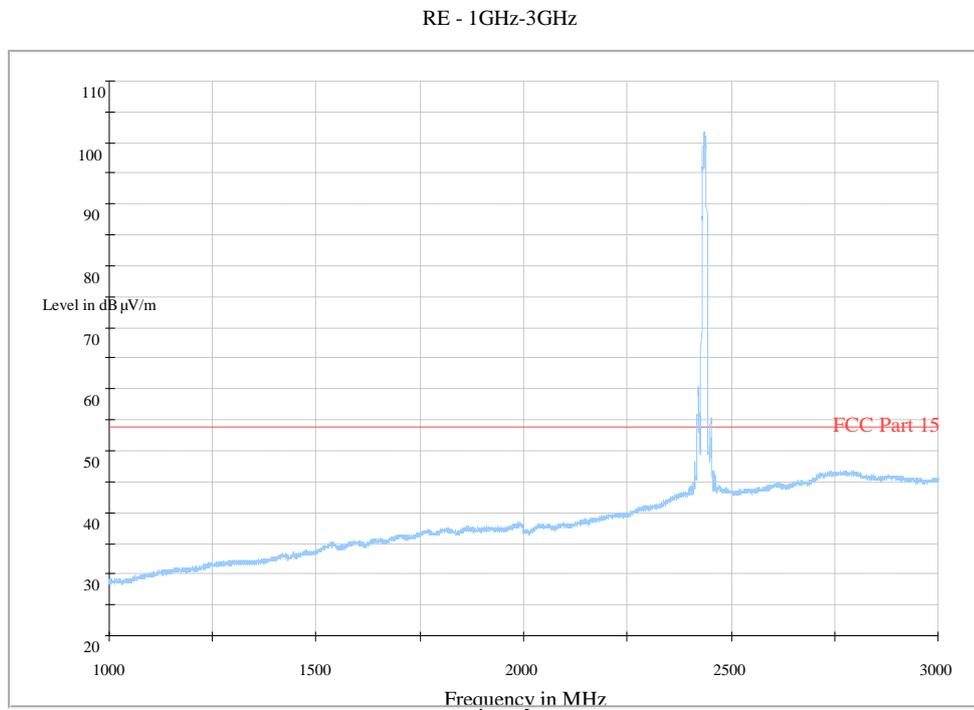


Fig. 134 Radiated Spurious Emission (802.11b, Ch6, 1 GHz-3 GHz)

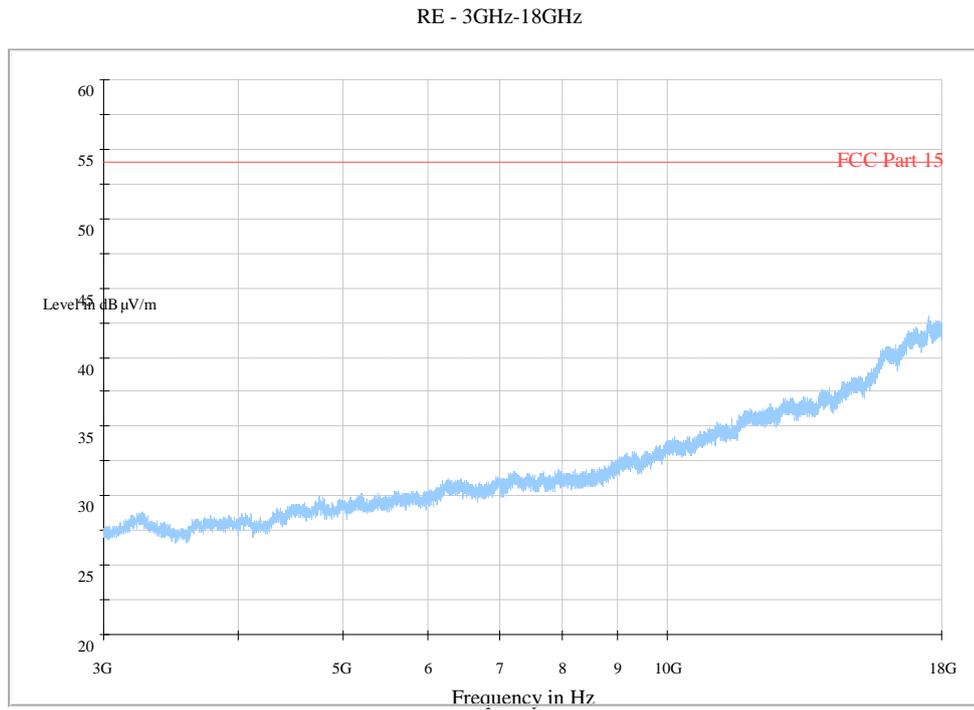


Fig. 135 Radiated Spurious Emission (802.11b, Ch6, 3 GHz-18 GHz)

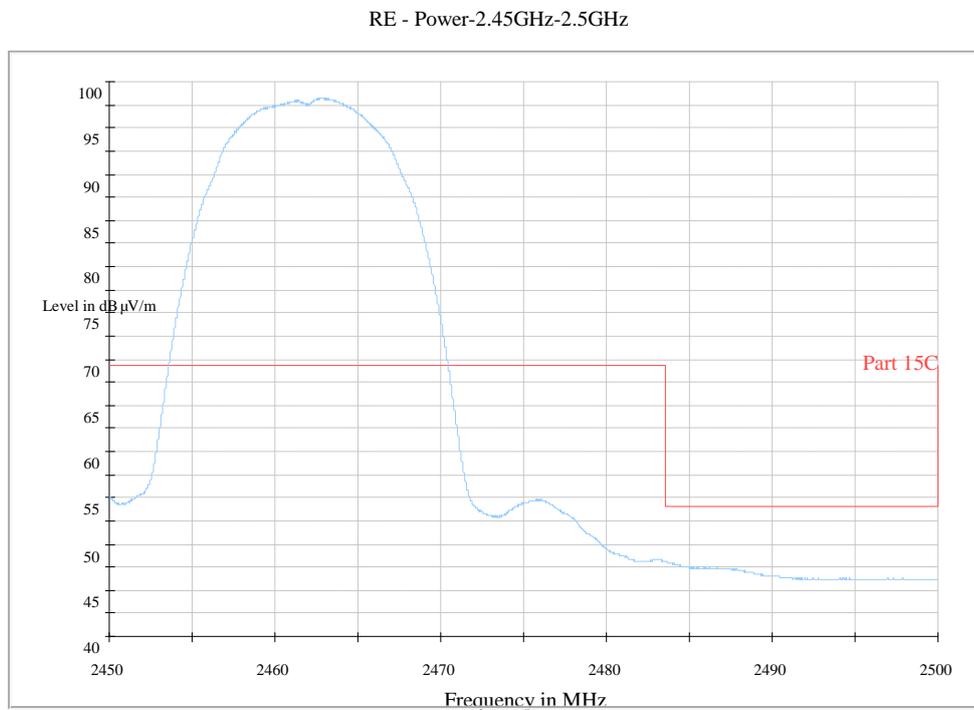


Fig. 136 Radiated Spurious Emission (Power): 802.11b, ch11, 2.45 GHz - 2.50GHz

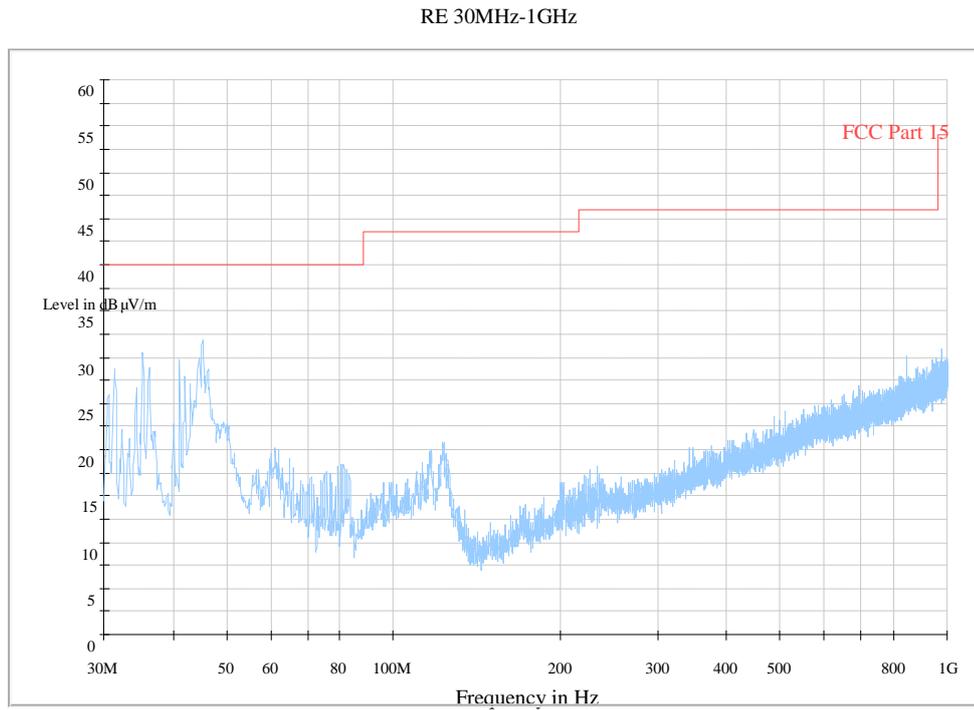


Fig. 137 Radiated Spurious Emission (802.11b, Ch11, 30 MHz-1 GHz)

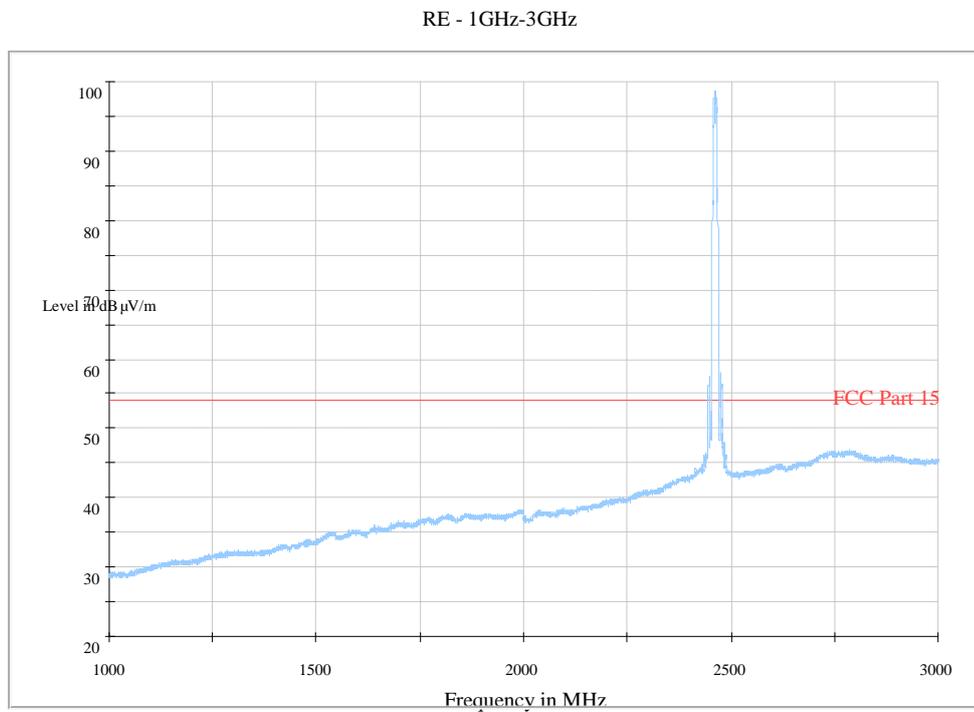


Fig. 138 Radiated Spurious Emission (802.11b, Ch11, 1 GHz-3 GHz)

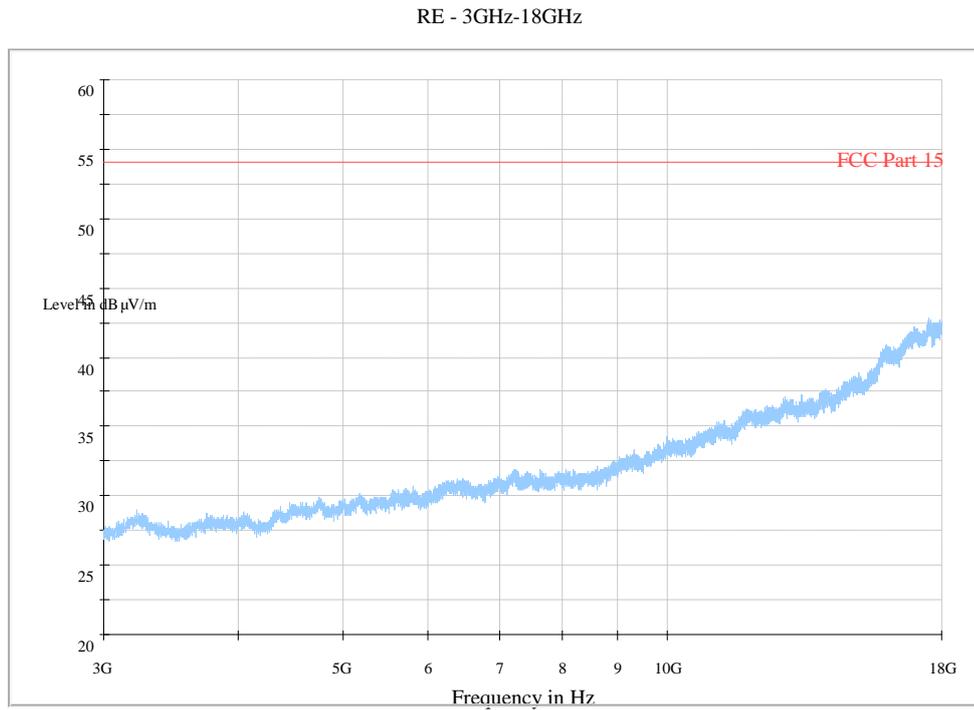


Fig. 139 Radiated Spurious Emission (802.11b, Ch11, 3 GHz-18 GHz)

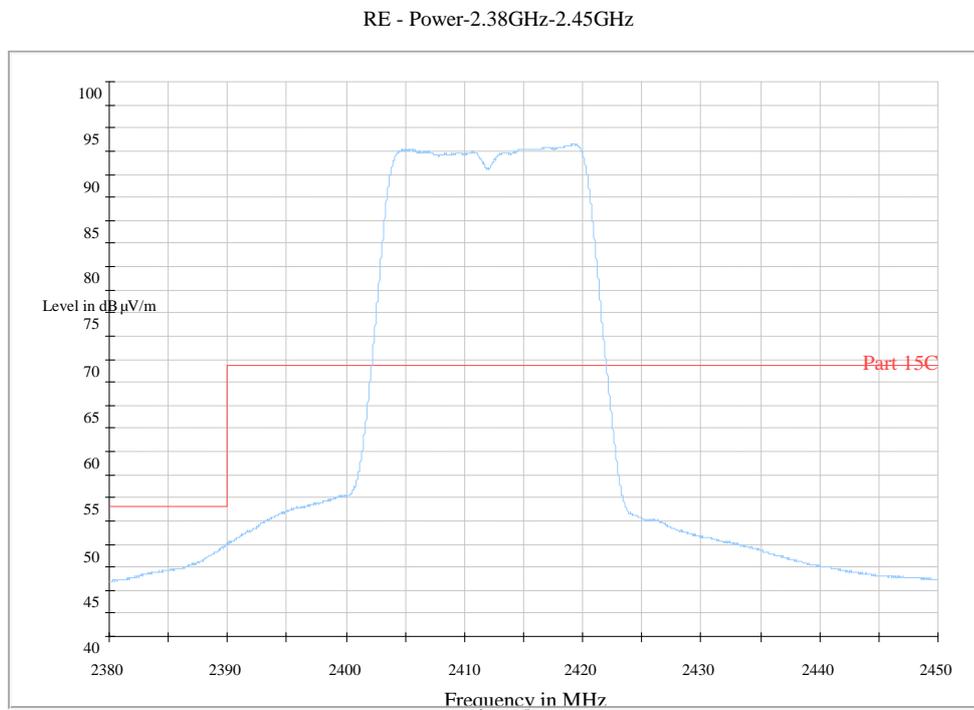


Fig. 140 Radiated Spurious Emission (Power): 802.11g, ch1, 2.38 GHz - 2.45GHz

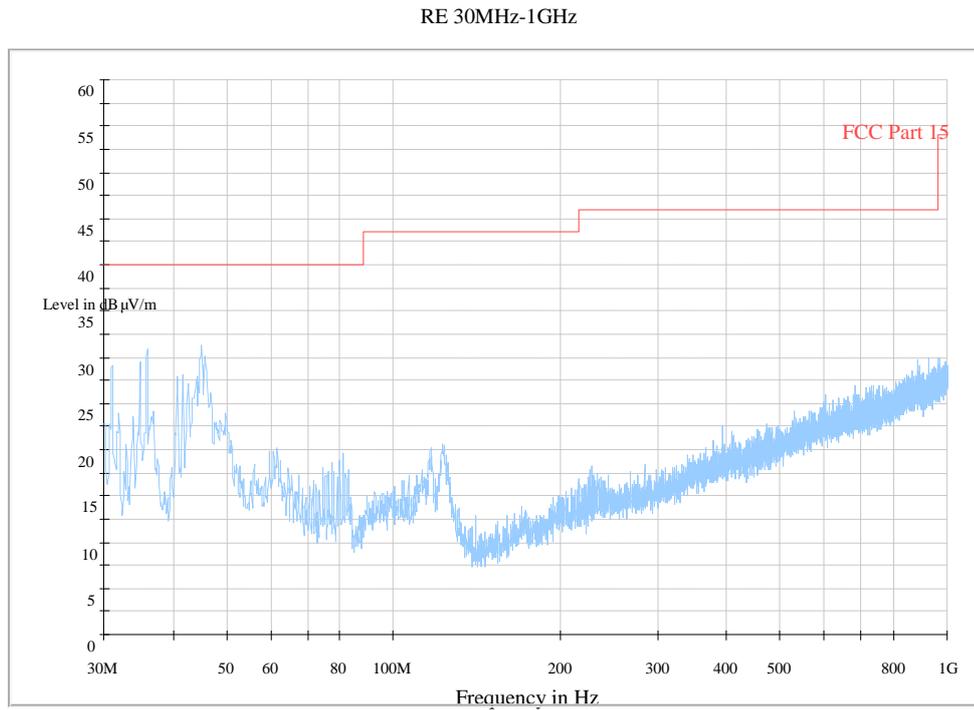


Fig. 141 Radiated Spurious Emission (802.11g, Ch1, 30 MHz-1 GHz)

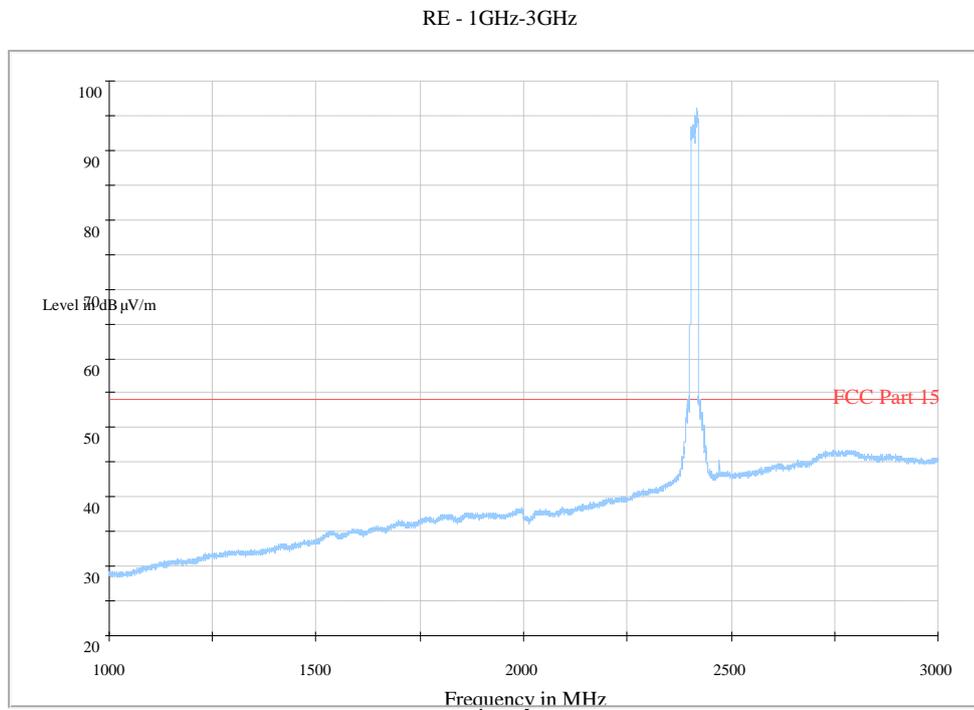


Fig. 142 Radiated Spurious Emission (802.11g, Ch1, 1 GHz-3 GHz)

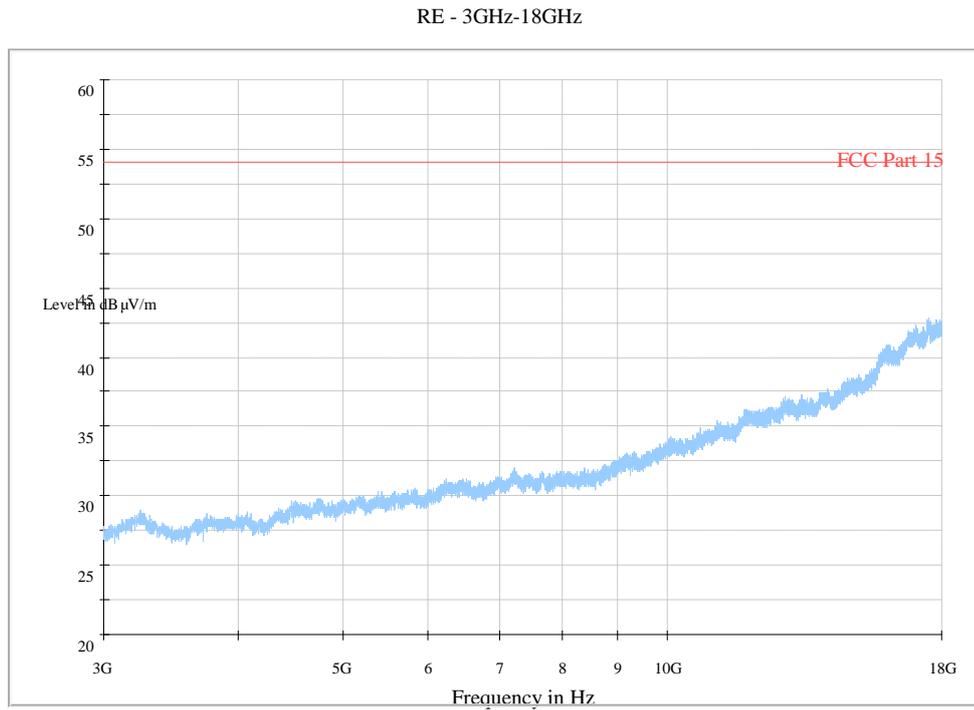


Fig. 143 Radiated Spurious Emission (802.11g, Ch1, 3 GHz-18 GHz)

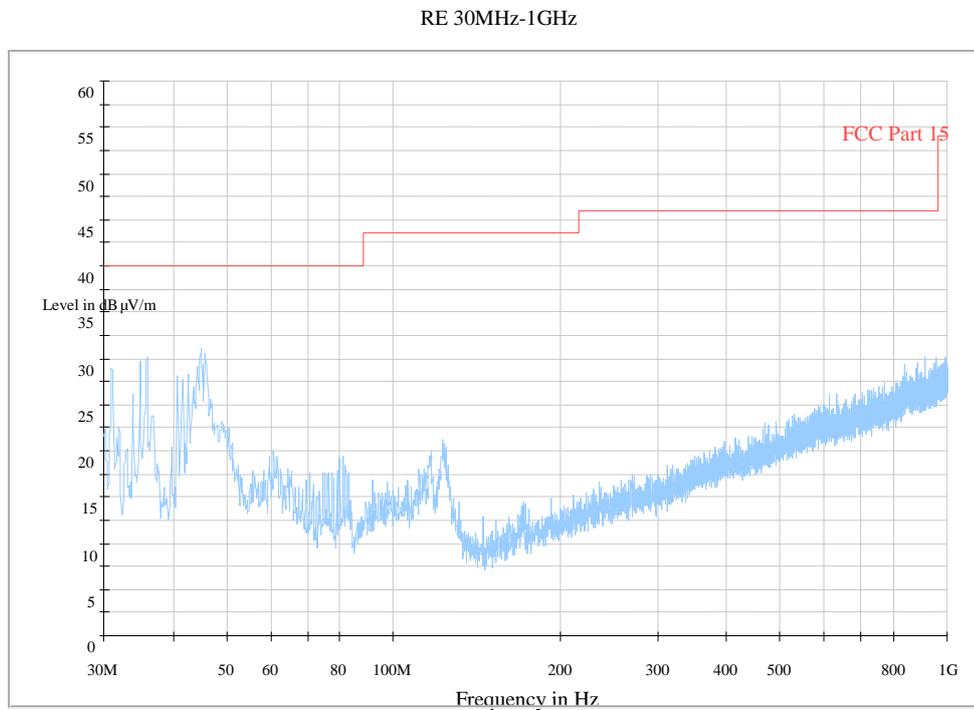


Fig. 144 Radiated Spurious Emission (802.11g, Ch6, 30 MHz-1 GHz)

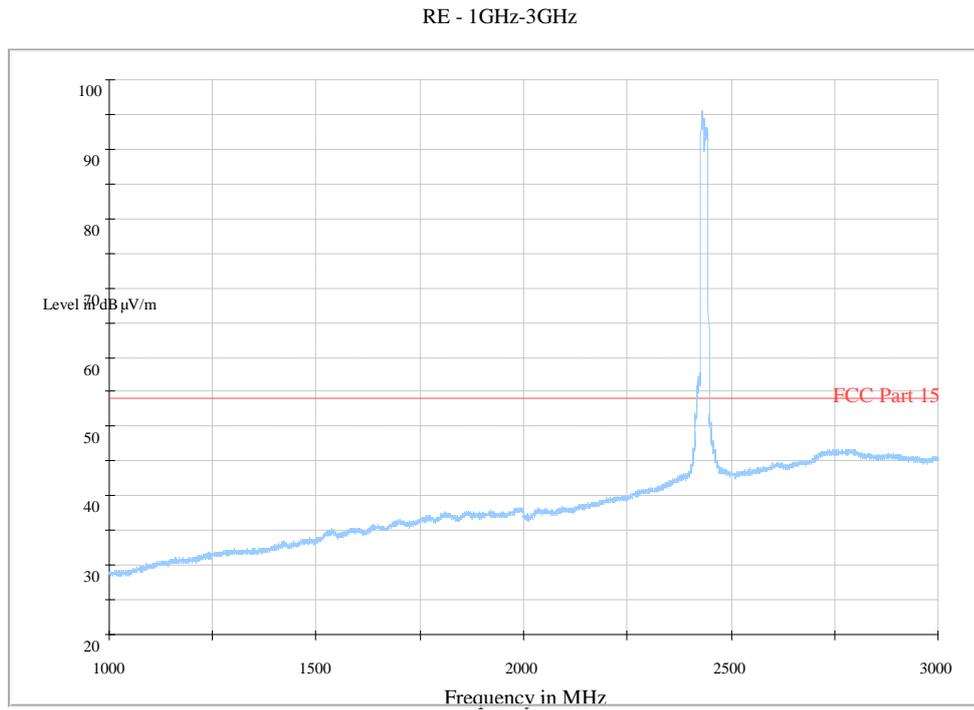


Fig. 145 Radiated Spurious Emission (802.11g, Ch6, 1 GHz-3 GHz)

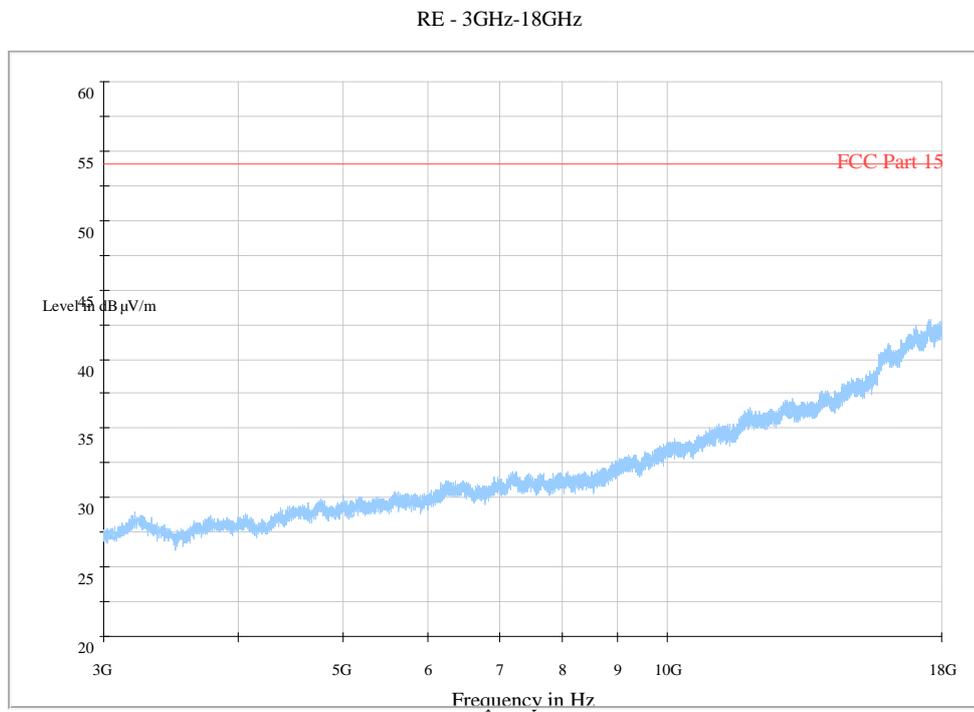


Fig. 146 Radiated Spurious Emission (802.11g, Ch6, 3 GHz-18 GHz)

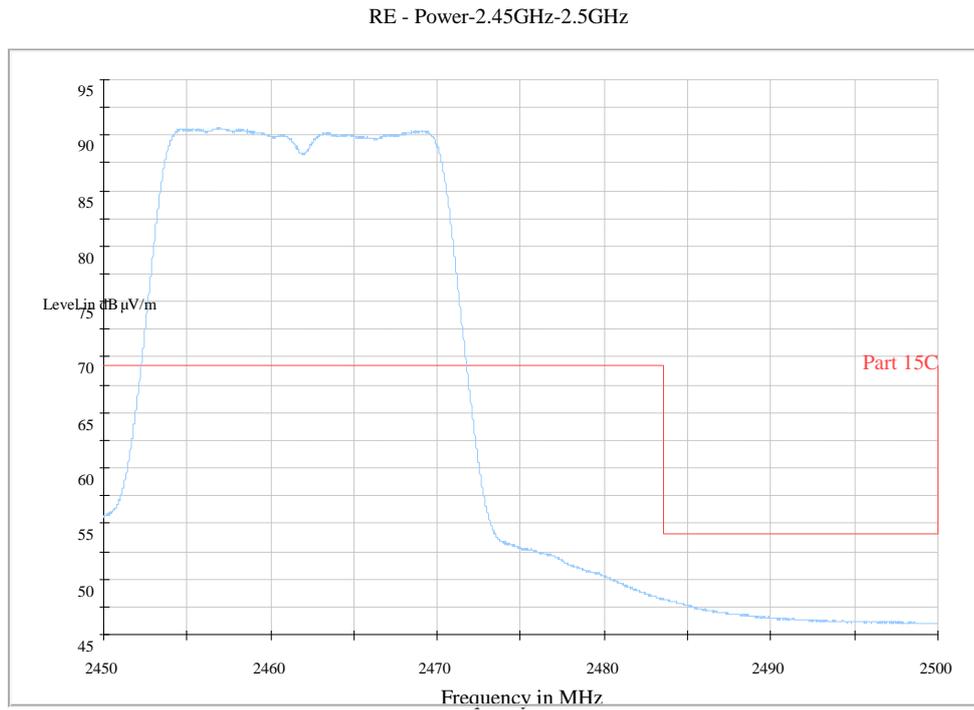


Fig. 147 Radiated Spurious Emission (Power): 802.11g, ch11, 2.45 GHz - 2.50GHz

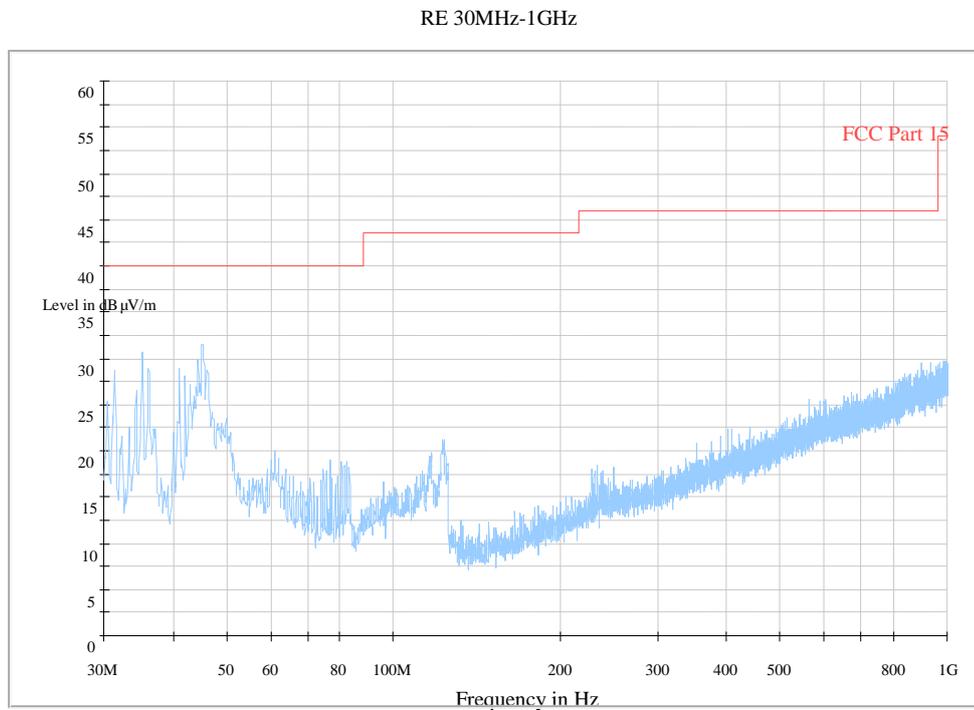


Fig. 148 Radiated Spurious Emission (802.11g, Ch11, 30 MHz-1 GHz)

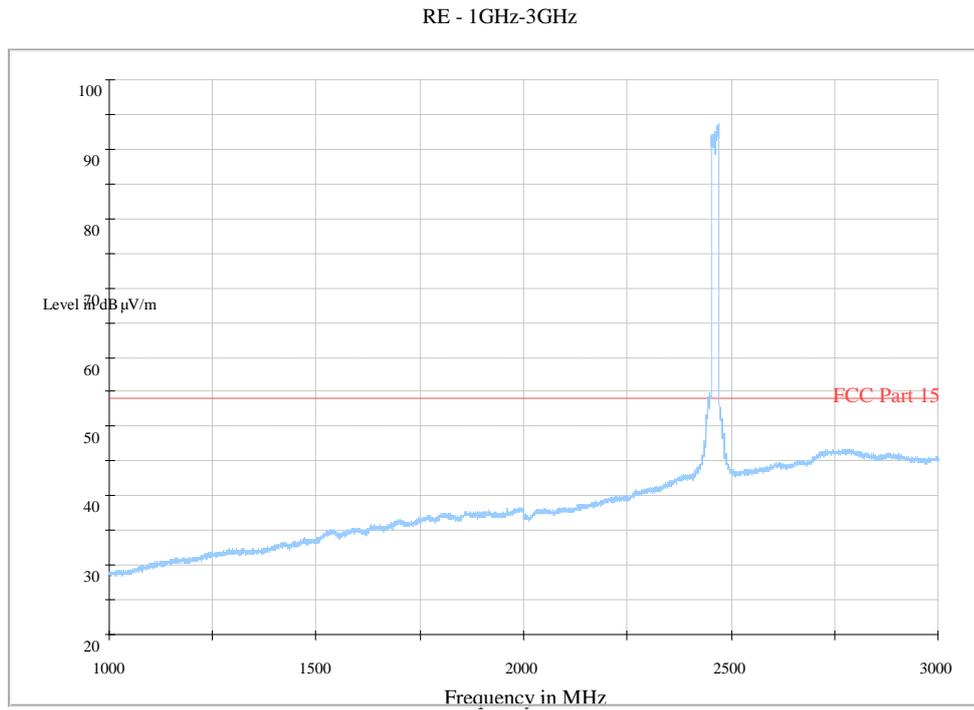


Fig. 149 Radiated Spurious Emission (802.11g, Ch11, 1 GHz-3 GHz)

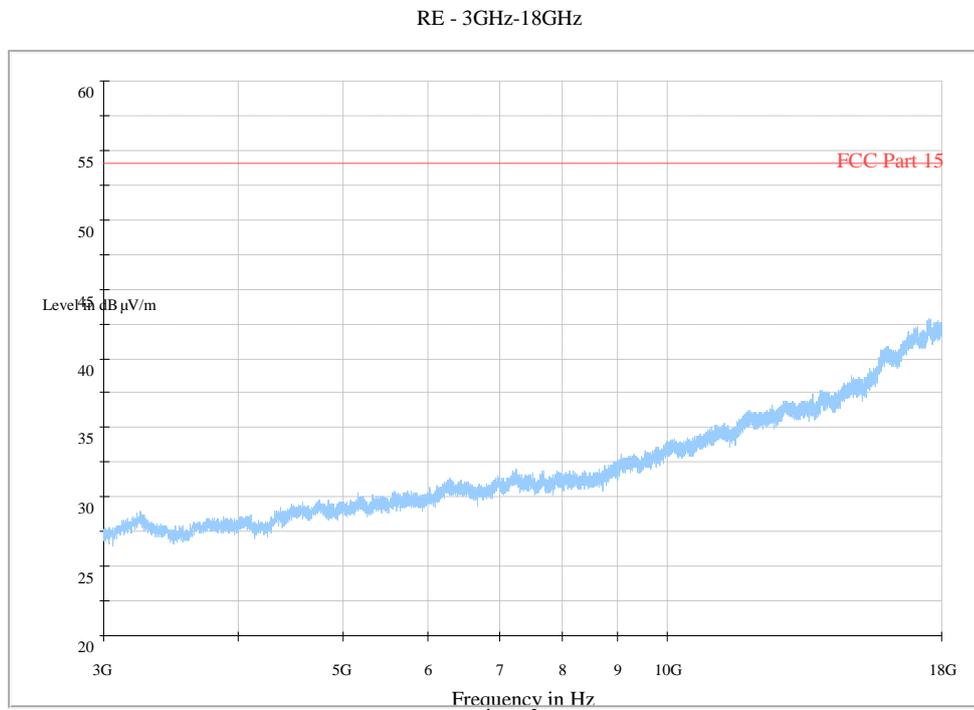


Fig. 150 Radiated Spurious Emission (802.11g, Ch11, 3 GHz-18 GHz)

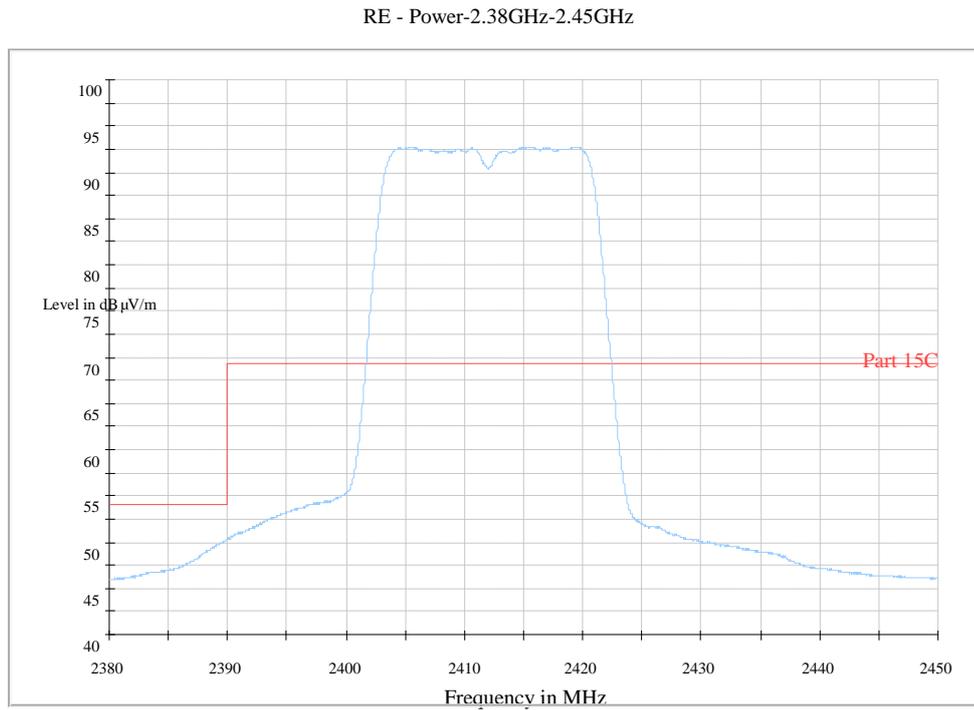


Fig. 151 Radiated Spurious Emission (Power): 802.11n-20MHz, ch1, 2.38 GHz - 2.45GHz

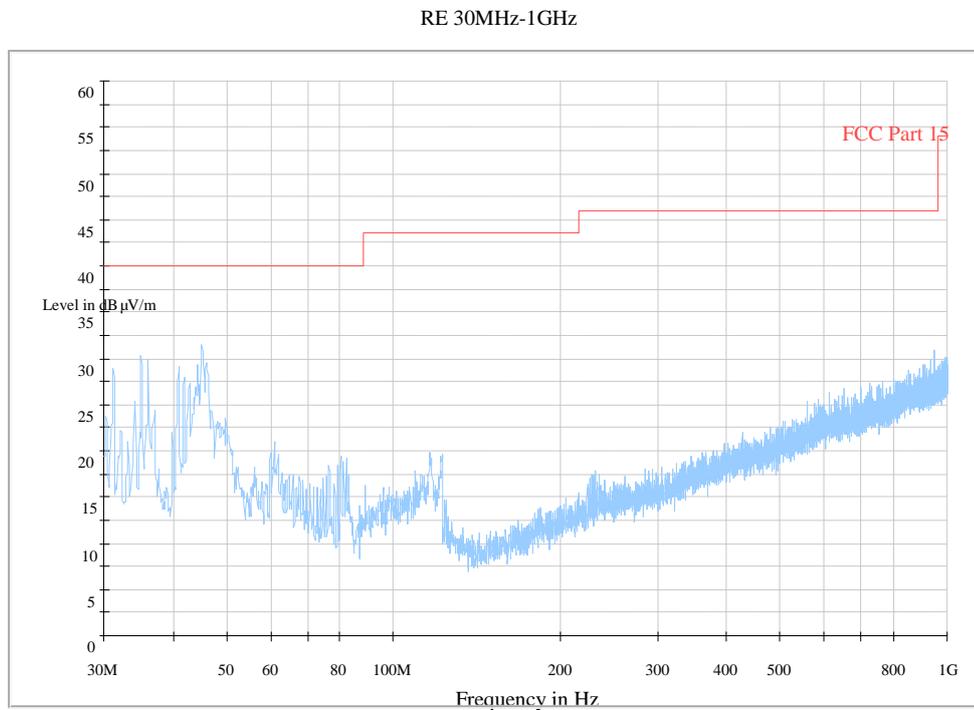


Fig. 152 Radiated Spurious Emission (802.11n-20MHz, Ch1, 30 MHz-1 GHz)

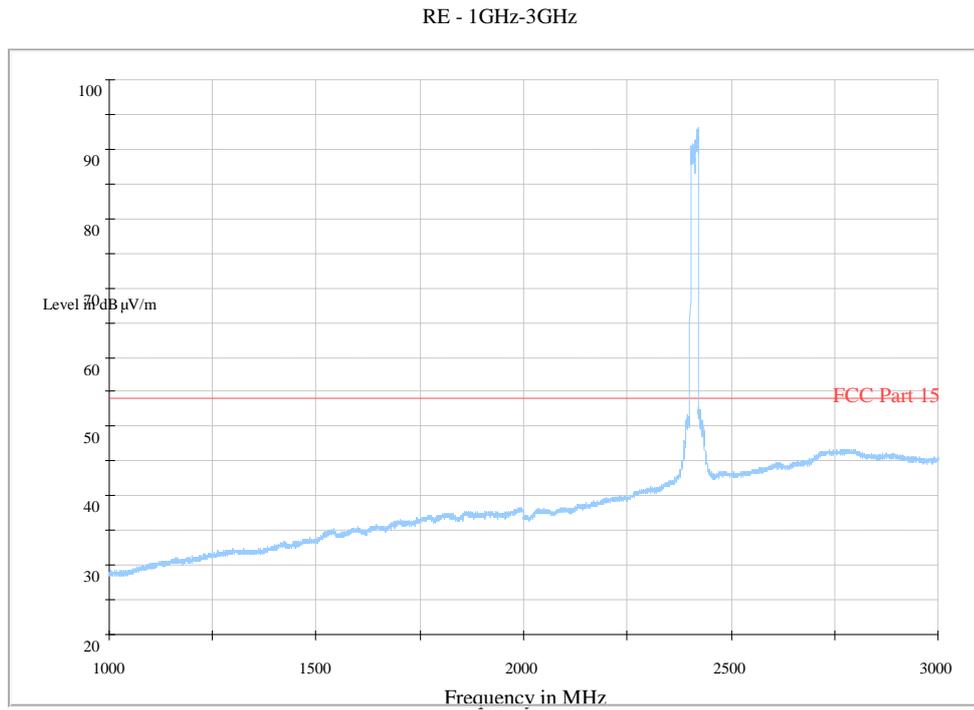


Fig. 153 Radiated Spurious Emission (802.11n-20MHz, Ch1, 1 GHz-3 GHz)

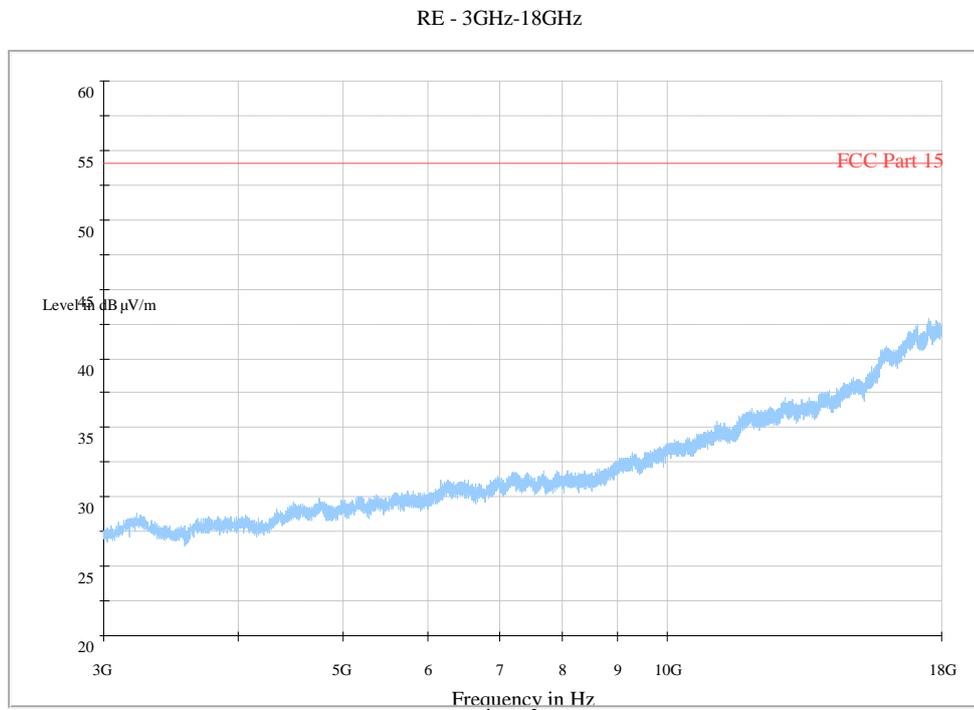


Fig. 154 Radiated Spurious Emission (802.11n-20MHz, Ch1, 3 GHz-18 GHz)

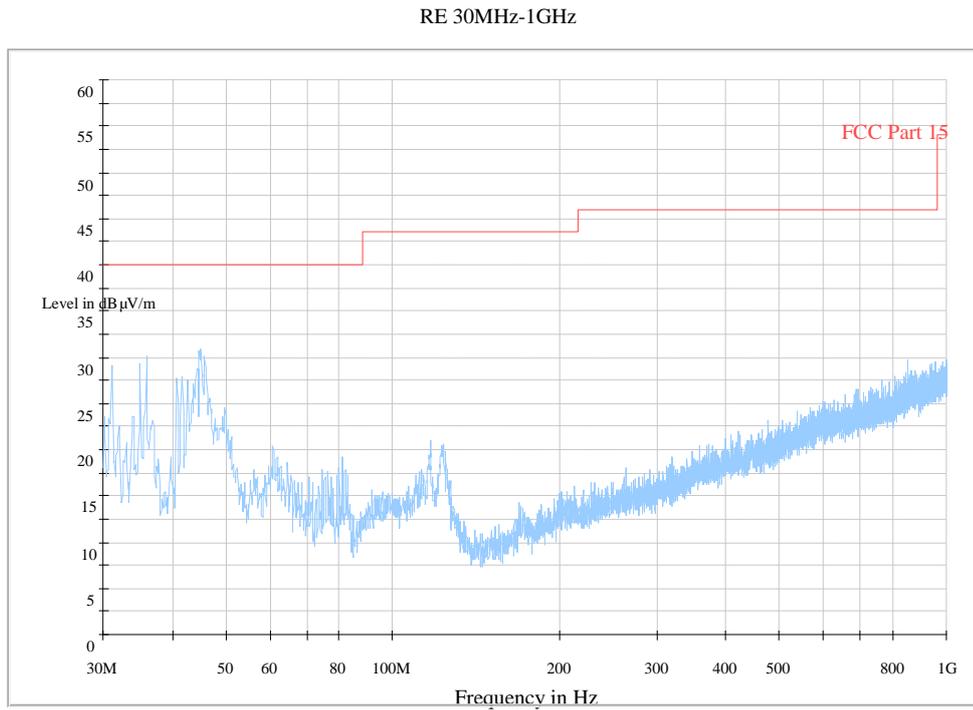


Fig. 155 Radiated Spurious Emission (802.11n-20MHz, Ch6, 30 MHz-1 GHz)

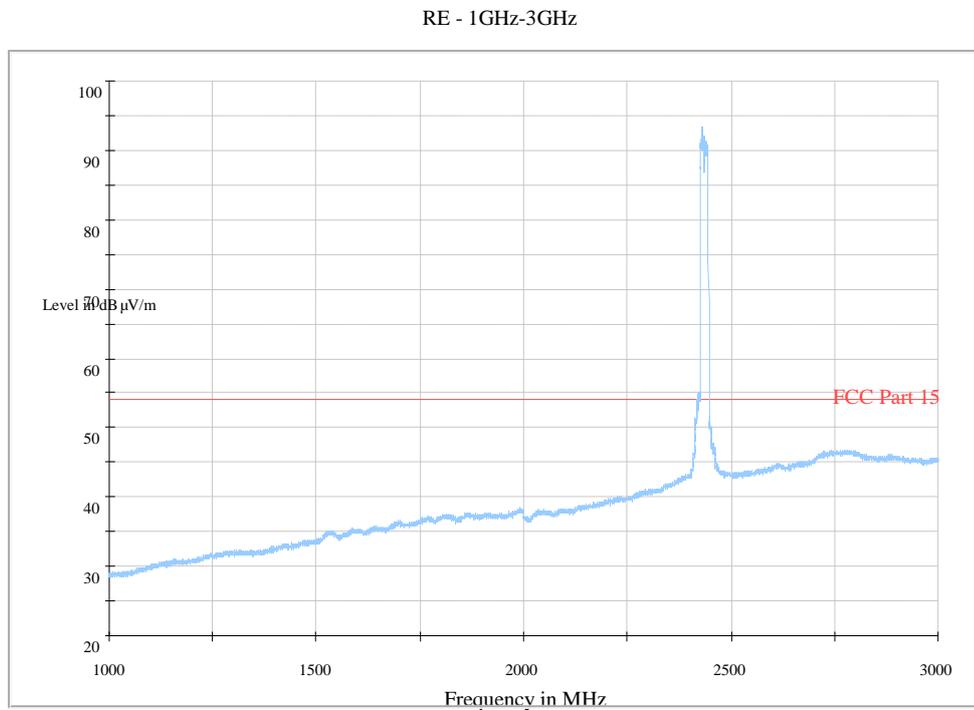


Fig. 156 Radiated Spurious Emission (802.11n-20MHz, Ch6, 1 GHz-3 GHz)

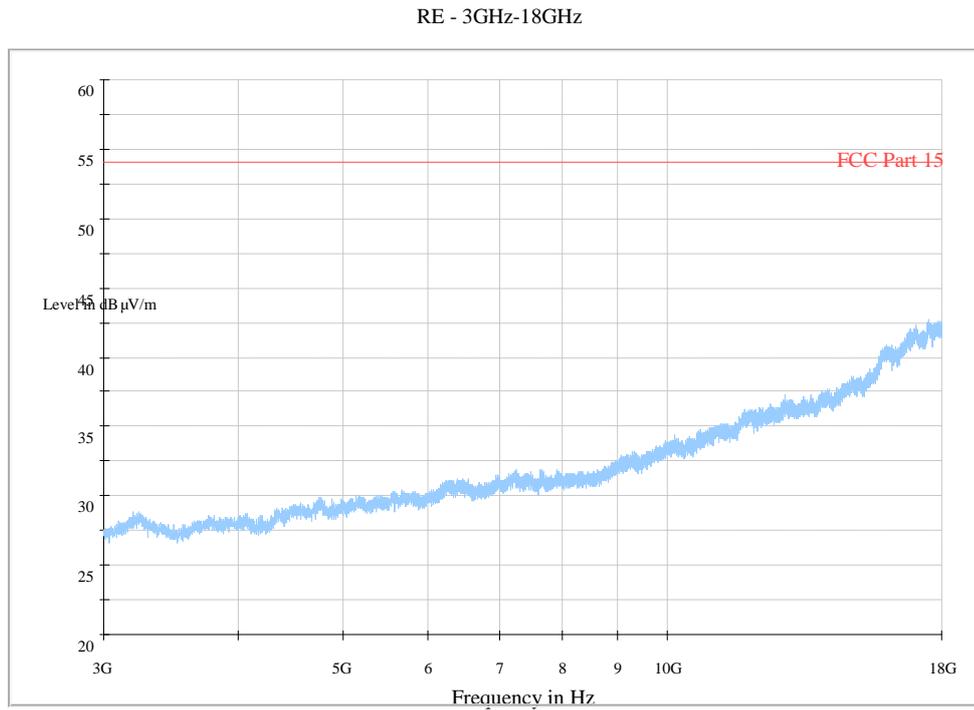


Fig. 157 Radiated Spurious Emission (802.11n-20MHz, Ch6, 3 GHz-18 GHz)

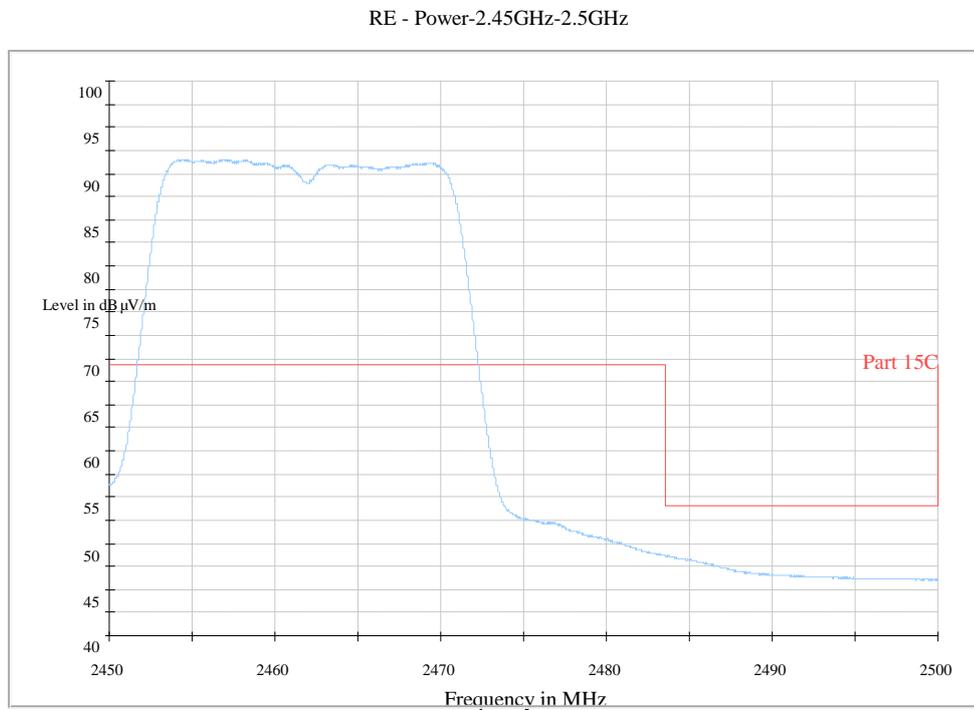


Fig. 158 Radiated Spurious Emission (Power): 802.11n-20MHz, ch11, 2.45 GHz - 2.50GHz

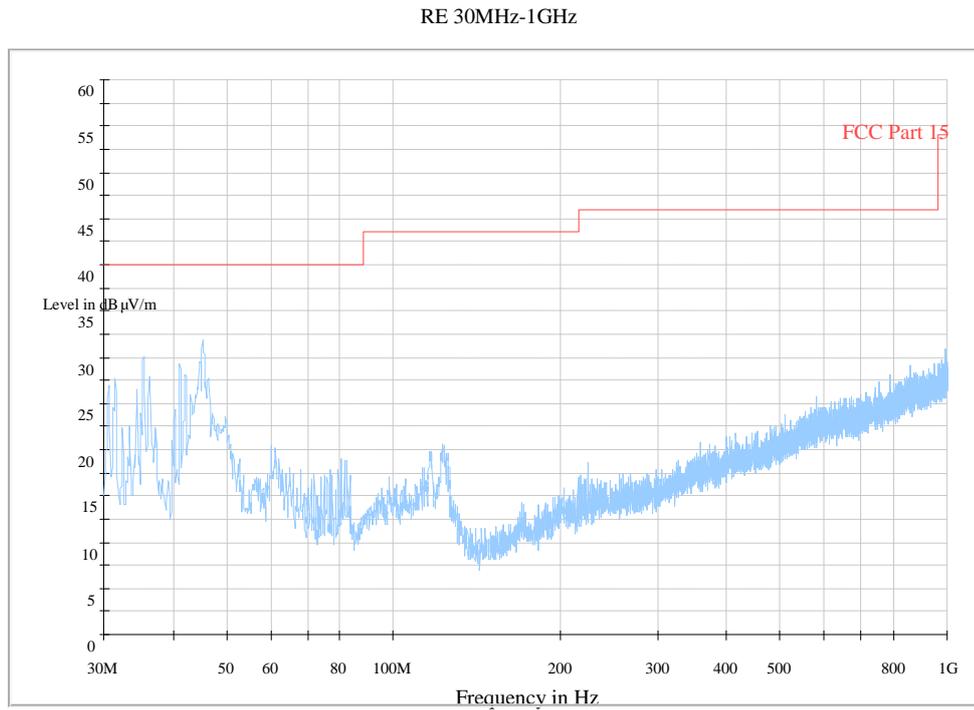


Fig. 159 Radiated Spurious Emission (802.11n-20MHz, Ch11, 30 MHz-1 GHz)

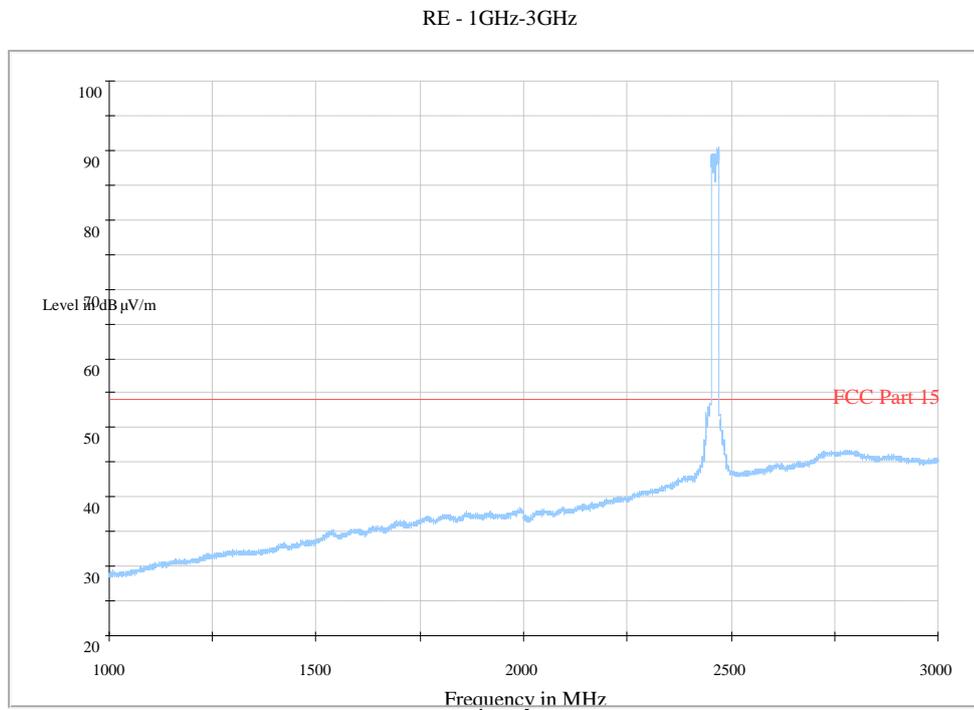


Fig. 160 Radiated Spurious Emission (802.11n-20MHz, Ch11, 1 GHz-3 GHz)

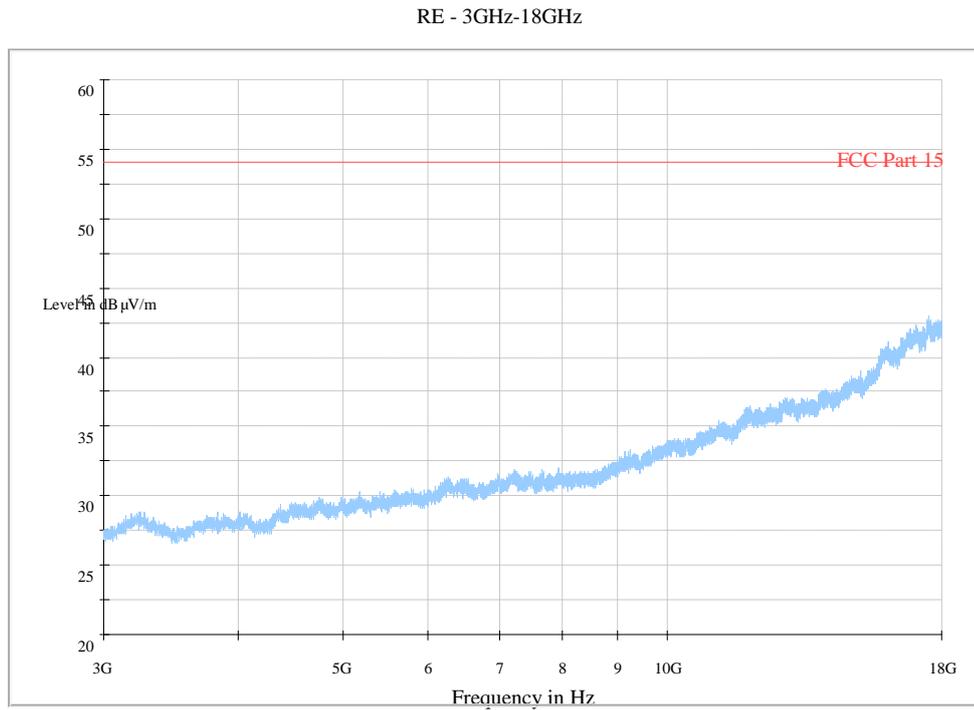


Fig. 161 Radiated Spurious Emission (802.11n-20MHz, Ch11, 3 GHz-18 GHz)

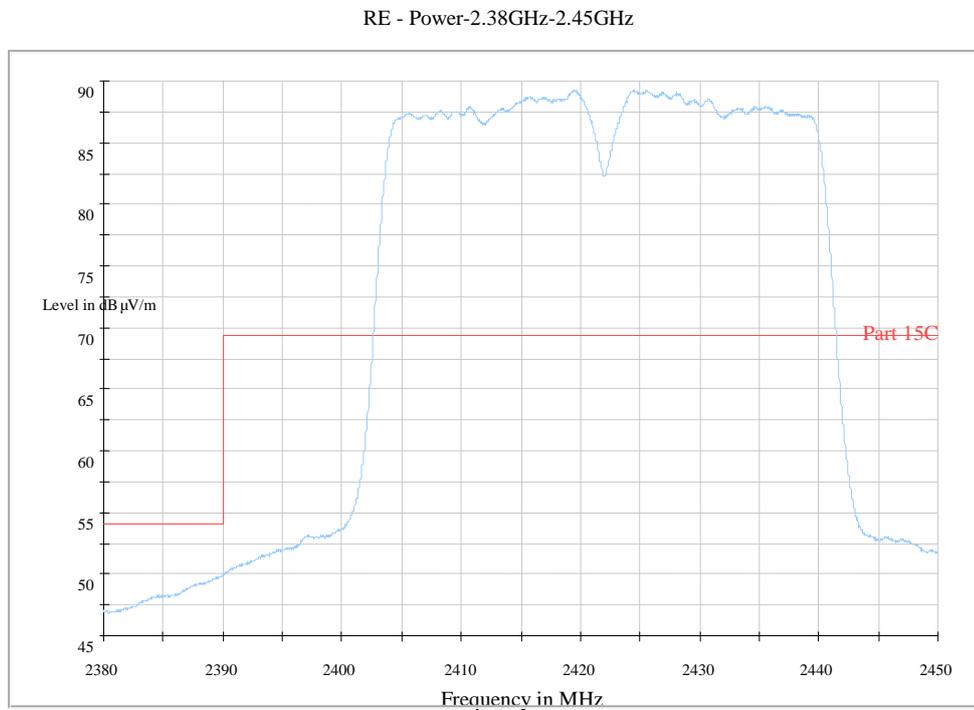


Fig. 162 Radiated Spurious Emission (Power): 802.11n-40MHz, ch3, 2.38 GHz - 2.45GHz

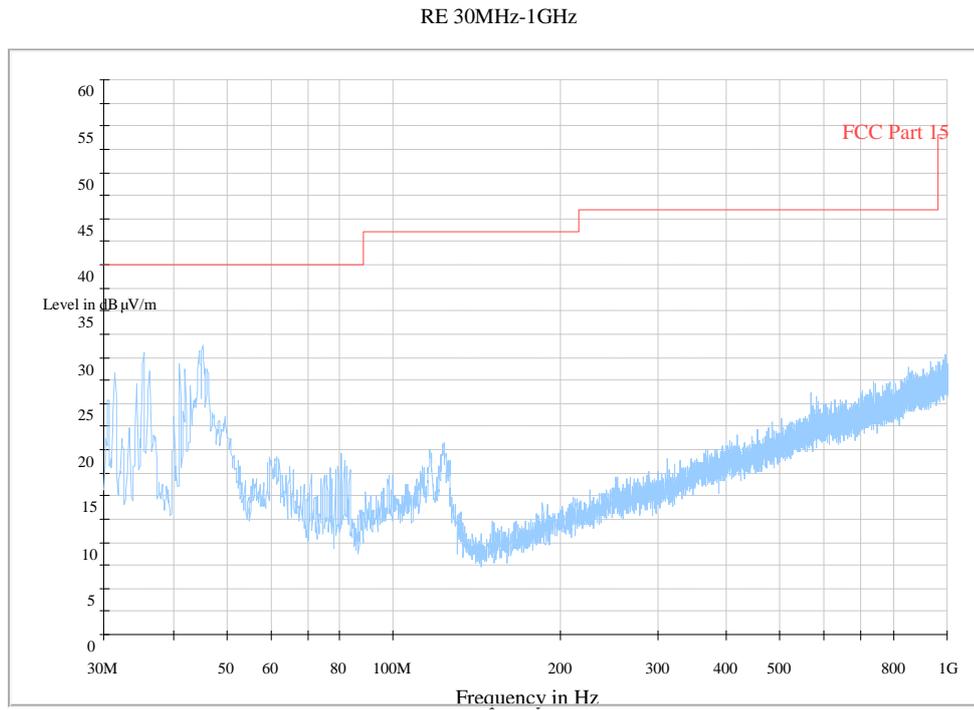


Fig. 163 Radiated Spurious Emission (802.11n-40MHz, Ch3, 30 MHz-1 GHz)

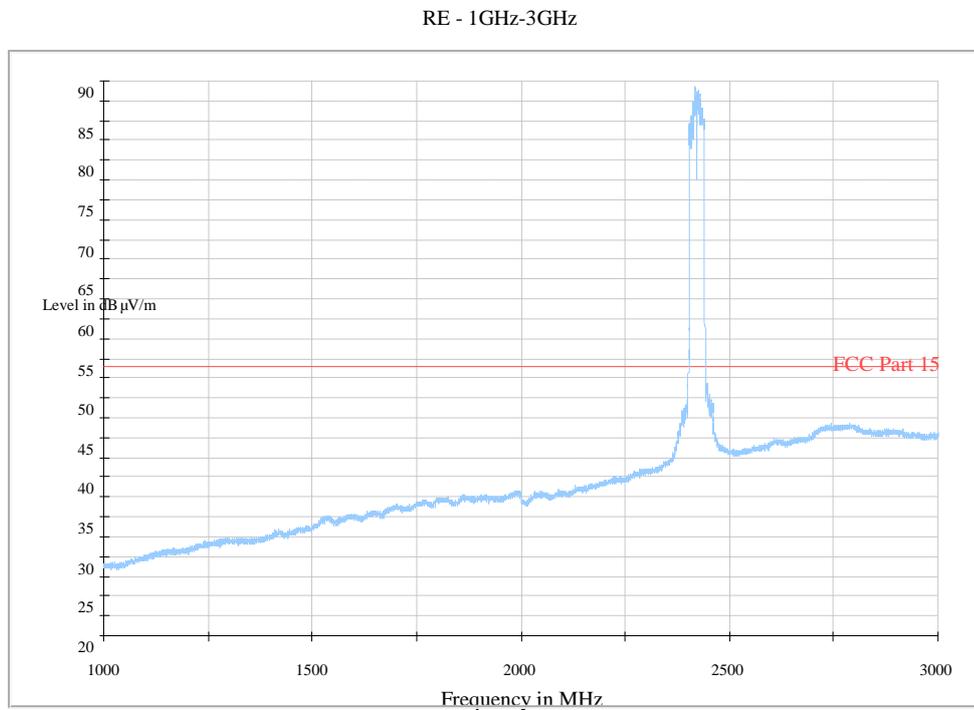


Fig. 164 Radiated Spurious Emission (802.11n-40MHz, Ch3, 1 GHz-3 GHz)

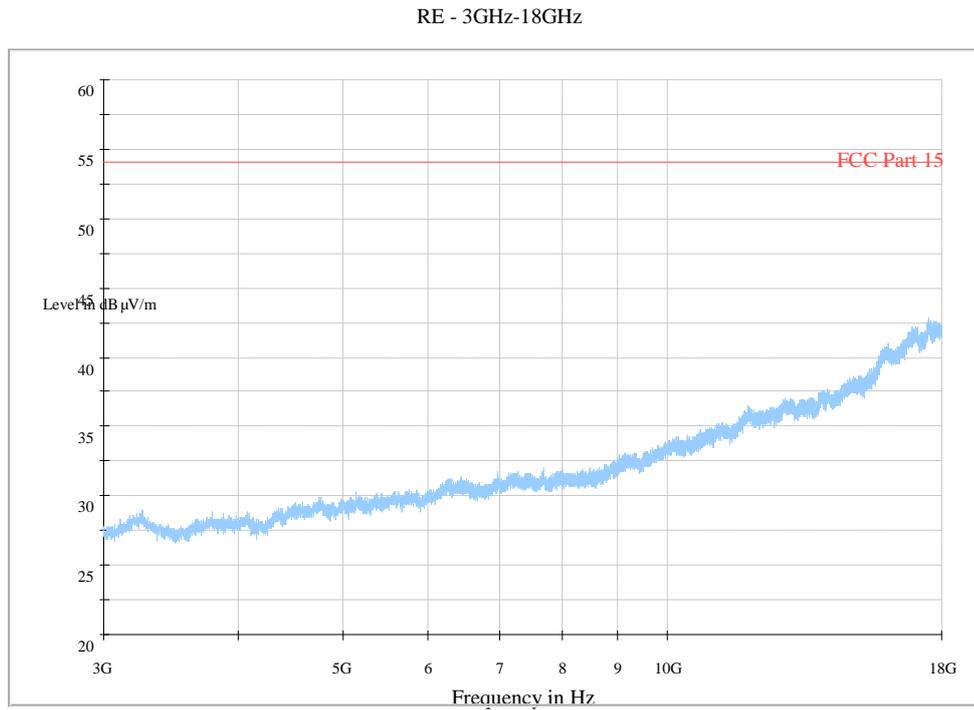


Fig. 165 Radiated Spurious Emission (802.11n-40MHz, Ch3, 3 GHz-18 GHz)

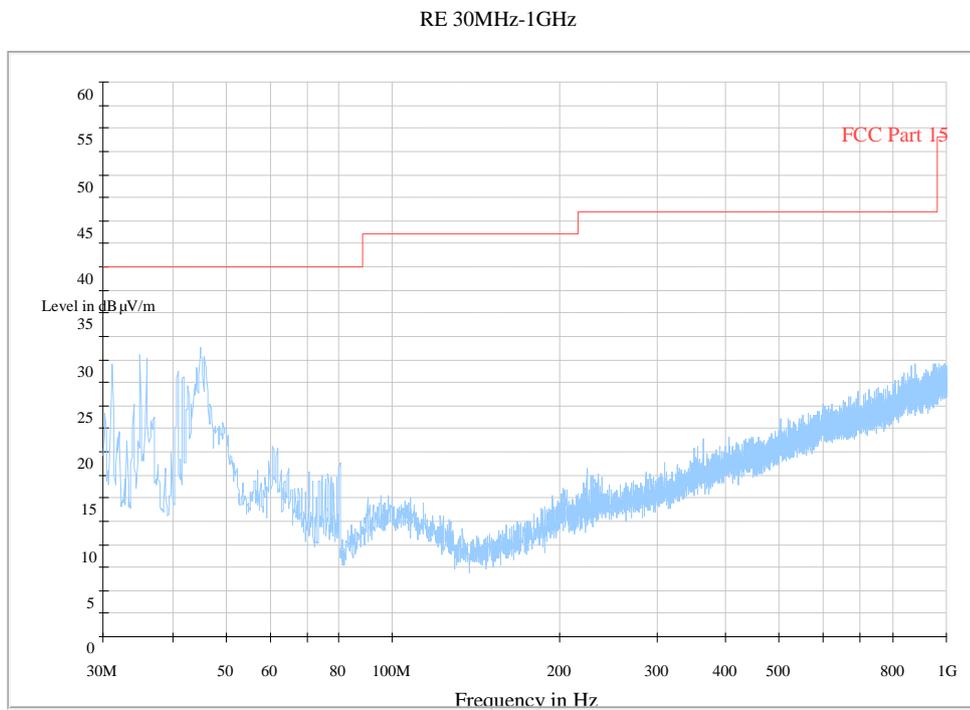


Fig. 166 Radiated Spurious Emission (802.11n-40MHz, Ch6, 30 MHz-1 GHz)

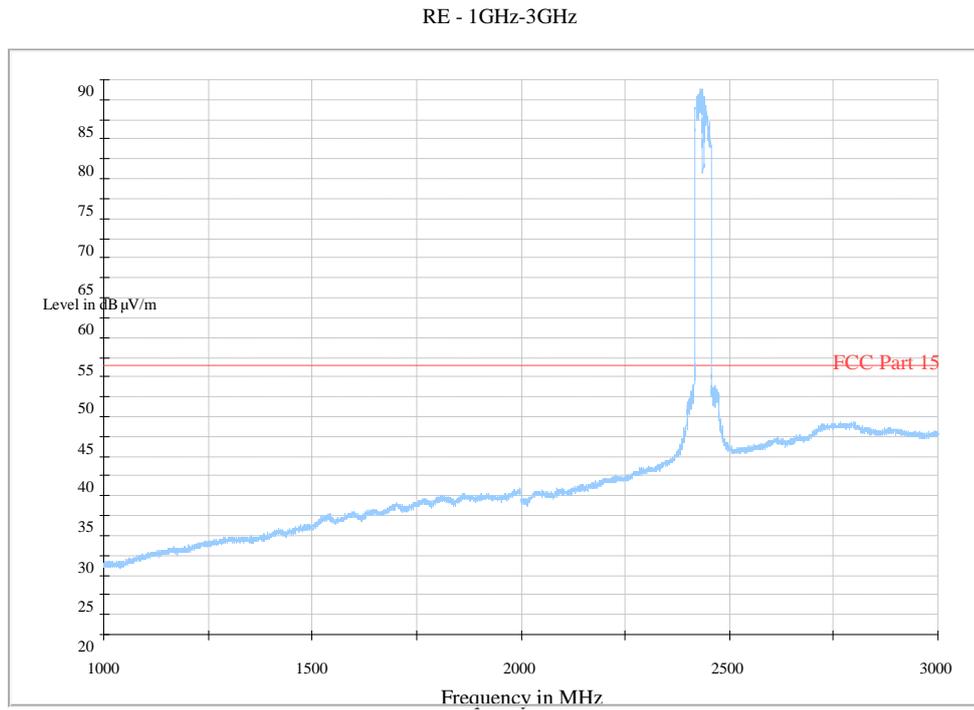


Fig. 167 Radiated Spurious Emission (802.11n-40MHz, Ch6, 1 GHz-3 GHz)

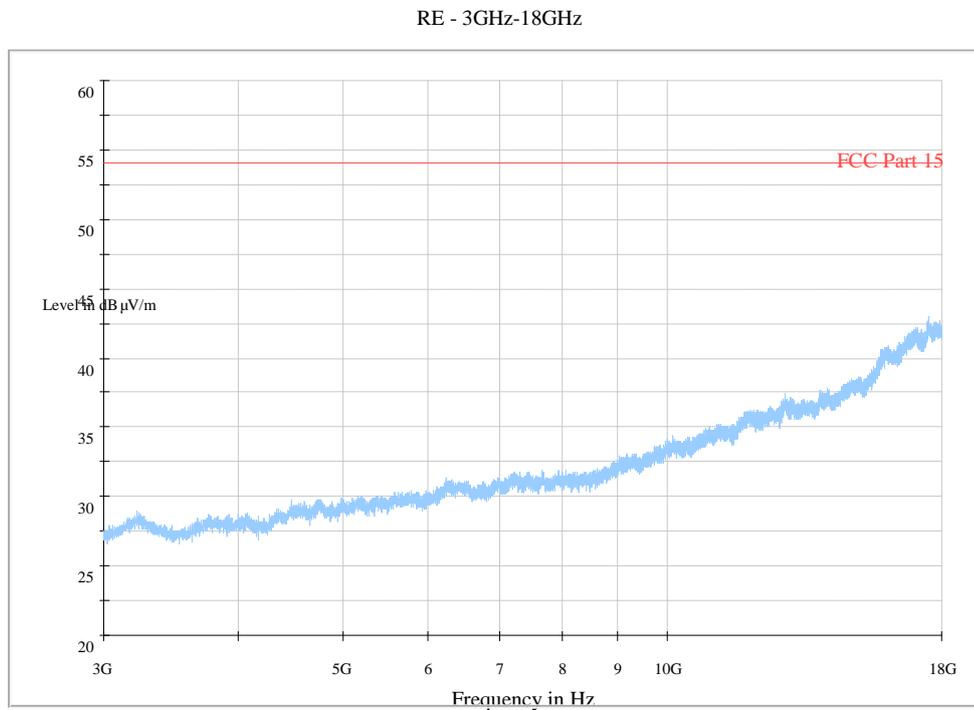


Fig. 168 Radiated Spurious Emission (802.11n-40MHz, Ch6, 3 GHz-18 GHz)

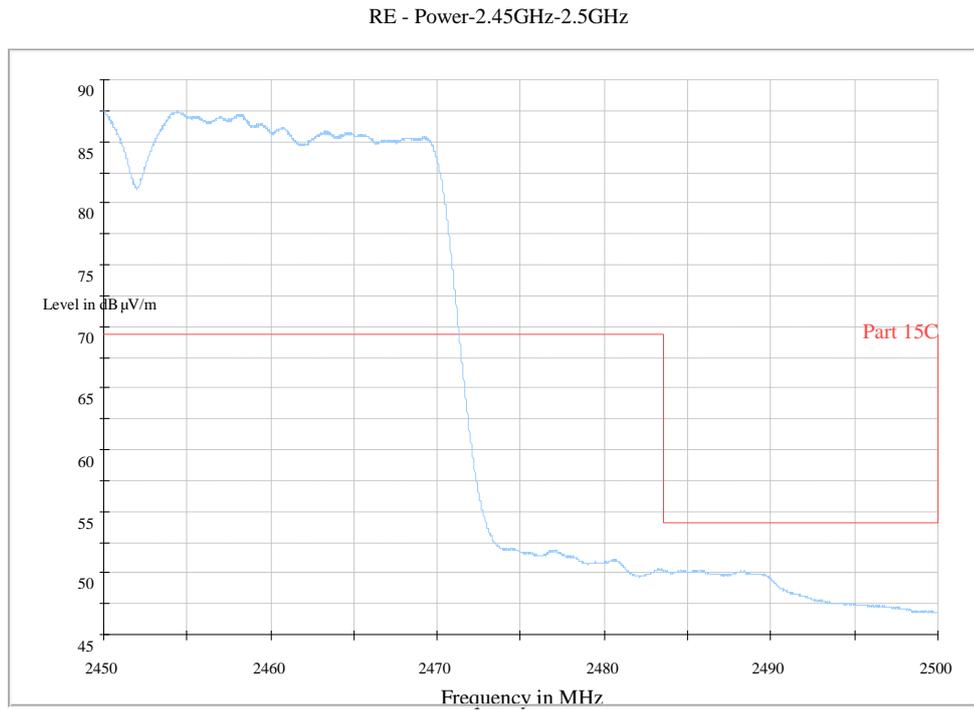


Fig. 169 Radiated Spurious Emission (Power): 802.11n-40MHz, ch9, 2.45 GHz - 2.50GHz

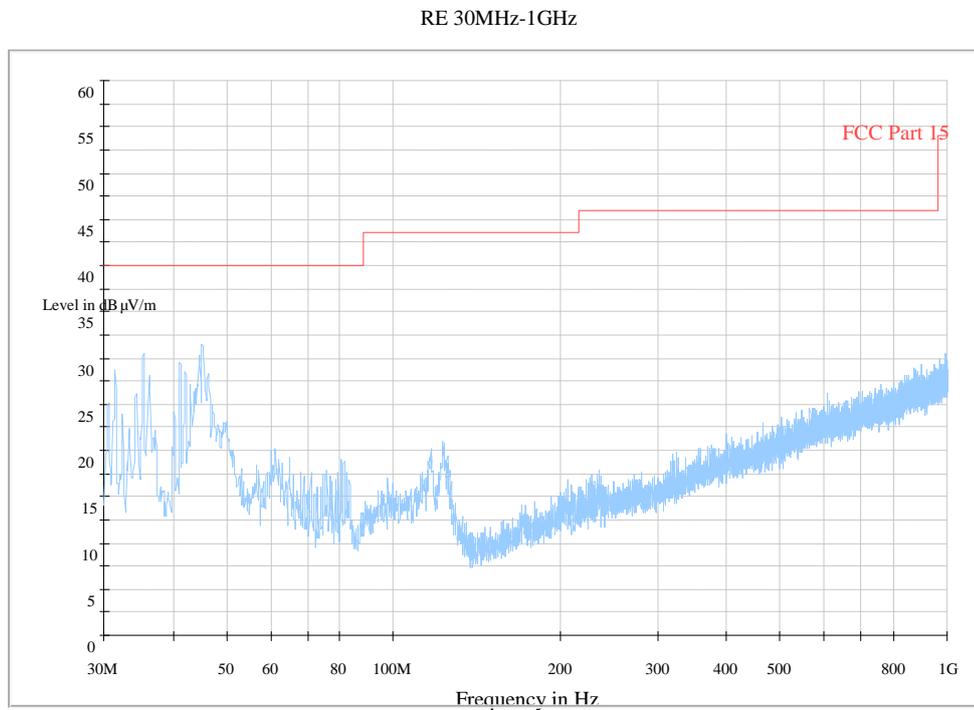


Fig. 170 Radiated Spurious Emission (802.11n-40MHz, Ch9, 30 MHz-1 GHz)

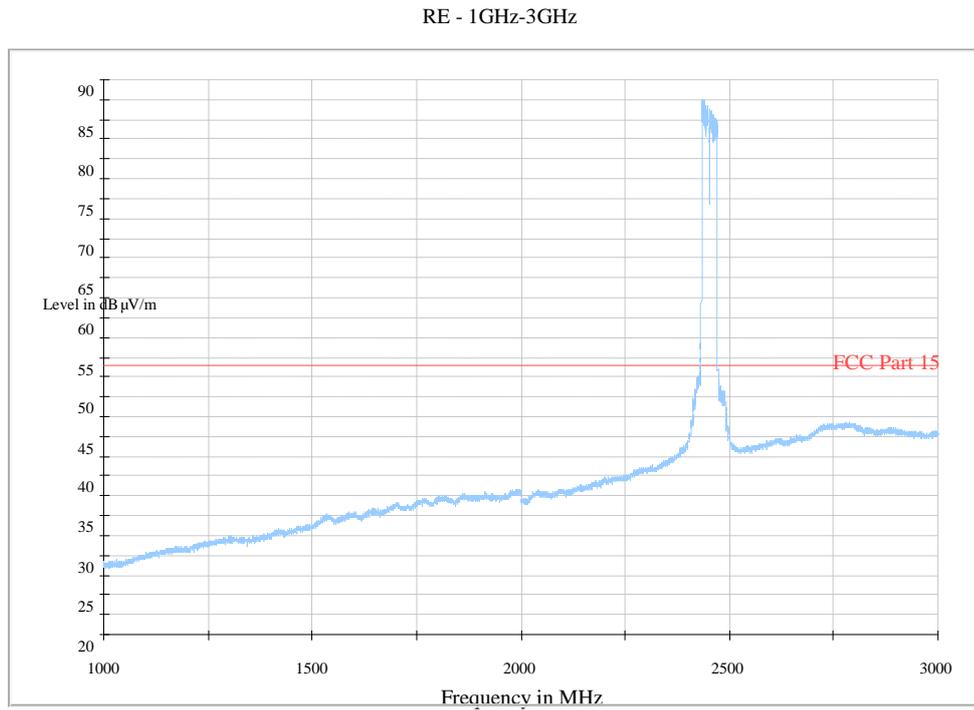


Fig. 171 Radiated Spurious Emission (802.11n-40MHz, Ch9, 1 GHz-3 GHz)

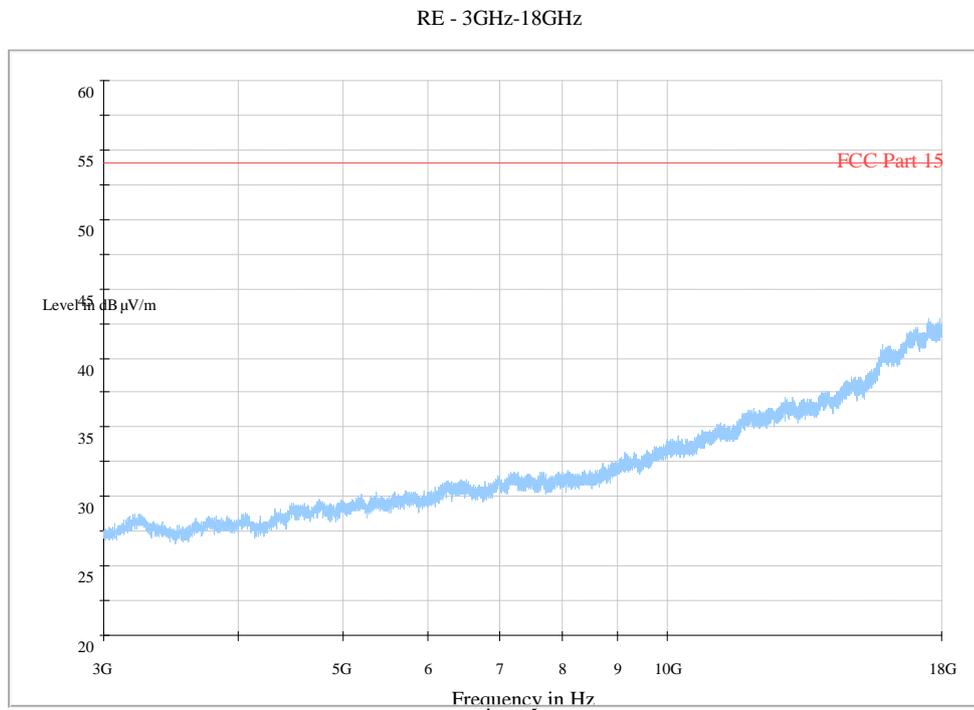


Fig. 172 Radiated Spurious Emission (802.11n-40MHz, Ch9, 3 GHz-18 GHz)

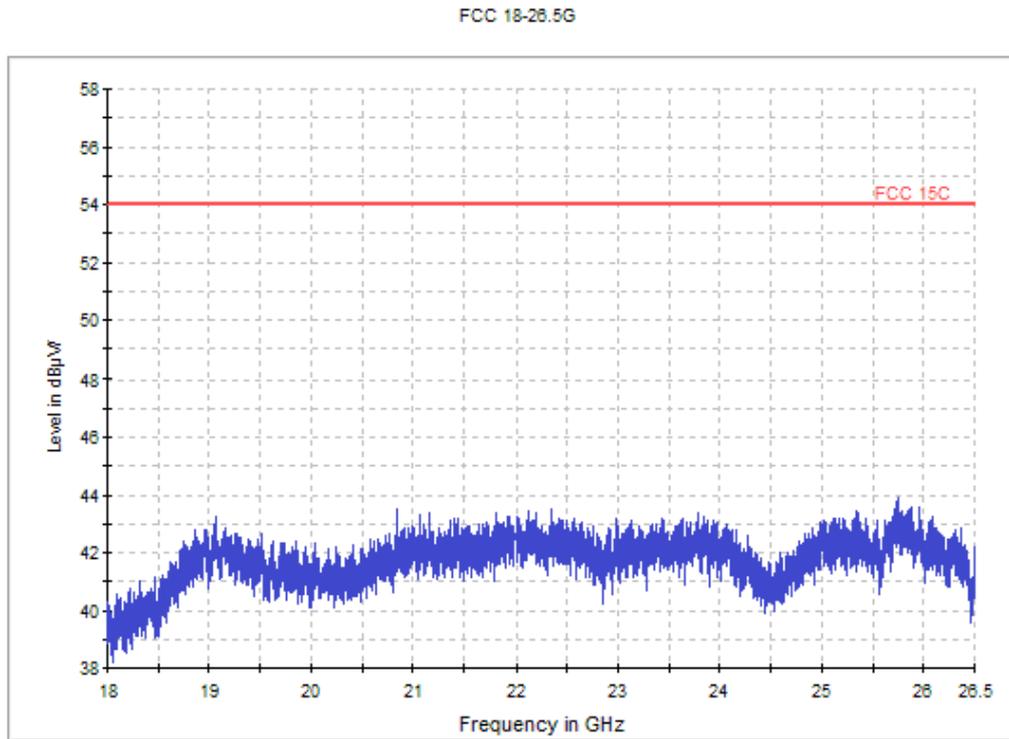


Fig. 173 Radiated Spurious Emission (All channels): 18GHz – 26.5GHz

A.7. AC Powerline Conducted Emission

Test Condition:

Voltage (V)	Frequency (Hz)
120	60

Measurement Result and limit:

WLAN (Quasi-peak Limit)

Frequency range (MHz)	Quasi-peak Limit (dB μ V)	Result (dB μ V)	Conclusion
		With charger	
		802.11b	
0.15 to 0.5	66 to 56	Fig. 174	P
0.5 to 5	56		
5 to 30	60		

NOTE: The limit decreases linearly with the logarithm of the frequency in the range 0.15 MHz to 0.5 MHz.

WLAN (Average Limit)

Frequency range (MHz)	Average Limit (dB μ V)	Result (dB μ V)	Conclusion
		With charger	
		802.11b	
0.15 to 0.5	56 to 46	Fig.174	P
0.5 to 5	46		
5 to 30	50		

NOTE: The limit decreases linearly with the logarithm of the frequency in the range 0.15 MHz to 0.5 MHz.

The measurement is made according to ANSI C63.4 and KDB558074 D01.

Conclusion: PASS

Test graphs as below:

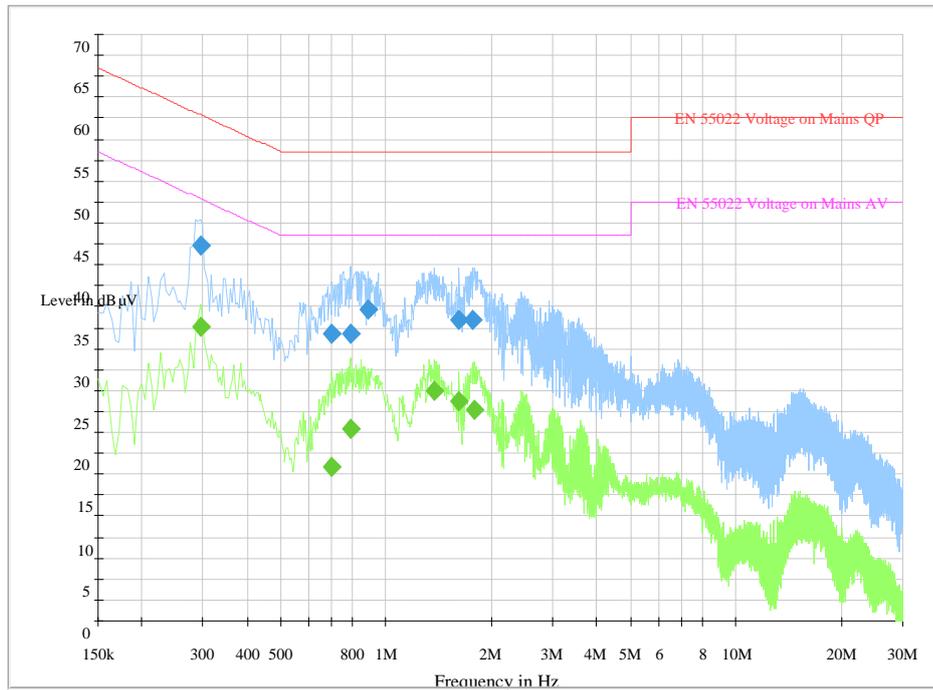


Fig. 174 AC Powerline Conducted Emission-802.11b

Final Result 1

Frequency	QuasiPeak	PE	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.29400	44.7	GND	L1	10.0	15.7	60.4
0.69900	34.2	GND	L1	10.0	21.8	56.0
0.78900	34.3	GND	L1	10.0	21.7	56.0
0.88800	37.2	GND	L1	10.0	18.8	56.0
1.61700	35.9	GND	L1	10.0	20.1	56.0
1.76100	35.9	GND	L1	10.0	20.1	56.0

Final Result 2

Frequency	Average (dBµV)	PE	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.29400	35.1	GND	L1	10.0	15.3	50.4
0.69900	18.4	GND	L1	10.0	27.6	46.0
0.78900	22.8	GND	L1	10.0	23.2	46.0
1.36950	27.6	GND	L1	10.0	18.4	46.0
1.61700	26.2	GND	L1	10.0	19.8	46.0
1.77900	25.3	GND	L1	10.0	20.7	46.0

*** END OF REPORT BODY ***