

FCC Radio Test Report FCC ID: T58WF2411ER

This report concerns (check one): ⊠Original Grant □Class II Change

Project No. : 1506C211

Equipment : 150Mbps Wireless N Router

Model Name : WF2411E

Applicant : NETIS SYSTEMS CO., LTD

Address : 4F&5F R&D Building, Oriental Cyberport, High-Tech

Industrial Park, Nanshan, Shenzhen, China.

Date of Receipt: Jun. 23, 2015

Date of Test : Jun. 23, 2015 ~ Jul. 06, 2015 | Issued Date : Jul. 07, 2015 | Ested by : BTL Inc.

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Declaration

BTL represents to the client that testing is done in accordance with standard procedures as applicable and that test instruments used has been calibrated with the standards traceable to National Measurement Laboratory (**NML**) of **R.O.C**, or National Institute of Standards and Technology (**NIST**) of **U.S.A.**

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Limitation

For the use of the authority's logo is limited unless the Test Standard(s)/Scope(s)/Item(s) mentioned in this test report is (are) included in the conformity assessment authorities acceptance respective.

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REPORT ISSUED HISTORY

Issued No.	Description	Issued Date
BTL-FCCP-1-1506C211	Original Issue.	Jul. 07, 2015

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1. CERTIFICATION

Equipment : 150Mbps Wireless N Router

Brand Name: netis Model Name: WF2411E

Applicant : NETIS SYSTEMS CO., LTD Manufacturer: Shenzhen Netcore Industrial Ltd.

Address : 4F&5F R&D Building, Oriental Cyberport, High-Tech Industrial Park, Nanshan,

Shenzhen, China.

Factory

: Dongguan City Netcore Network Technology Co.,Ltd.: No.10-1,Sankeng Road,Qinghutou,Tangxia Town,Dongguan City Address

Date of Test : Jun. 23, 2015 ~ Jul. 06, 2015 Test Sample: ENGINEERING SAMPLE

Standard(s): FCC Part15, Subpart C: 2014 (15.247) / ANSI C63.10-2013

The above equipment has been tested and found compliance with the requirement of the relative standards by BTL Inc.

The test data, data evaluation, and equipment configuration contained in our test report (Ref No. BTL-FCCP-1-1506C211) were obtained utilizing the test procedures, test instruments, test sites that has been accredited by the Authority of TAF according to the ISO-17025 quality assessment standard and technical standard(s).

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2. SUMMARY OF TEST RESULTS

Test procedures according to the technical standard(s):

Applied Standard(s): FCC Part15 (15.247) , Subpart C: 2014					
Standard(s) Section FCC	Test Item	Judgment	Remark		
15.207	Conducted Emission	PASS			
15.247(d)	Antenna conducted Spurious Emission	PASS			
15.247(a)(2)	6dB Bandwidth	PASS			
15.247(b)(3)	Peak Output Power	PASS			
15.247(e)	Power Spectral Density	PASS			
15.203	Antenna Requirement	PASS			
15.209/15.205	Transmitter Radiated Emissions	PASS			

NOTE:

(1)" N/A" denotes test is not applicable in this test report.

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2.1 TEST FACILITY

The test facilities used to collect the test data in this report is at the location of No.3, Jinshagang 1st Road, Shixia, Dalang Town, Dongguan, Guangdong, China.

BTL's test firm number for FCC: 319330

2.2 MEASUREMENT UNCERTAINTY

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

The BTL measurement uncertainty is less than the CISPR 16-4-2 U_{cispr} requirement.

The reported uncertainty of measurement $y \pm U$, where expanded uncertainty U is based on a standard uncertainty multiplied by a coverage factor of k=2, providing a level of confidence of approximately 95 %.

A. Conducted Measurement:

Test Site	Method	Measurement Frequency Range	U, (dB)	Note
DG-C02	CISPR	150 KHz ~ 30MHz	2.59	

B. Radiated Measurement:

Test Site	Method	Measurement Frequency Range	Ant. H / V	U, (dB)	Note
		9KHz~30MHz	V	3.79	
		9KHz~30MHz	Ι	3.57	
		30MHz ~ 200MHz	V	3.82	
		30MHz ~ 200MHz	Ι	3.60	
DG-CB03	CISPR	200MHz ~ 1,000MHz	V	3.86	
DG-CB03	CISER	200MHz ~ 1,000MHz	Ι	3.94	
		1GHz~18GHz	V	3.12	
		1GHz~18GHz	Н	3.68	
		18GHz~40GHz	V	4.15	
		18GHz~40GHz	Н	4.14	

Note: Unless specifically mentioned, the uncertainty of measurement has not been taken into account to declare the compliance or non-compliance to the specification.

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3. GENERAL INFORMATION

3.1 GENERAL DESCRIPTION OF EUT

Equipment	150Mbps Wireless N Router			
Brand Name	netis			
Model Difference	WF2411E	WF2411E		
Model Difference	N/A			
	Operation Frequency	2412~2462 MHz		
Product Description	Modulation Technology	802.11b:DSSS 802.11g:OFDM 802.11n:OFDM		
	Bit Rate of Transmitter	802.11b: 11/5.5/2/1 Mbps 802.11g: 54/48/36/24/18/12/9/6 Mbps 802.11n up to 150 Mbps		
	Output Power (Max.)	802.11b: 16.93dBm 802.11g: 23.09dBm 802.11n(20MHz): 22.64dBm 802.11n(40MHz): 22.86dBm		
Power Source	DC Voltage supplied from AC/DC adapter.			
rower Source	Manufacturer/ model: DongGuan tenpao Power CO.,LTD/ NTPI2EU			
Power Rating	I/P AC 100-240V 50/60Hz 0.2A O/P DC 9V 500mA			

Note

1. For a more detailed features description, please refer to the manufacturer's specifications or the user's manual.

2. Channel List:

	CH01 – CH11 for 802.11b, 802.11g, 802.11n(20MHz) CH03 – CH09 for 802.11n(40MHz)						
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
01	2412	04	2427	07	2442	10	2457
02	2417	05	2432	08	2447	11	2462
03	2422	06	2437	09	2452		

3. Table for Filed Antenna

Ant.	Brand	Model Name	Antenna Type	Connector	Gain (dBi)	Note
1	RF link	RF21C00283A	Dipole	N/A	4.86	

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3.2 DESCRIPTION OF TEST MODES

To investigate the maximum EMI emission characteristics generates from EUT, the test system was pre-scanning tested base on the consideration of following EUT operation mode or test configuration mode which possible have effect on EMI emission level. Each of these EUT operation mode(s) or test configuration mode(s) mentioned above was evaluated respectively.

Pretest Mode	Description
Mode 1	TX B MODE CHANNEL 01/06/11
Mode 2	TX G MODE CHANNEL 01/06/11
Mode 3	TX N-20MHZ MODE CHANNEL 01/06/11
Mode 4	TX N-40MHZ MODE CHANNEL 03/06/09
Mode 5	TX MODE

The EUT system operated these modes were found to be the worst case during the pre-scanning test as following:

For Conducted Test		
Final Test Mode	Description	
Mode 5	TX MODE	

For Radiated Test		
Final Test Mode	Description	
Mode 1	TX B MODE CHANNEL 01/06/11	
Mode 2	TX G MODE CHANNEL 01/06/11	
Mode 3	TX N-20MHZ MODE CHANNEL 01/06/11	
Mode 4	TX N-40MHZ MODE CHANNEL 03/06/09	

Note:

- (1) The measurements are performed at the high, middle, low available channels.
- (2) 802.11b mode: DBPSK (1Mbps)
 - 802.11g mode: OFDM (6Mbps)
 - 802.11n HT20 mode : BPSK (6.5Mbps)
 - 802.11n HT40 mode: BPSK (13.5Mbps)
 - For radiated emission tests, the highest output powers were set for final test.
- (3) For radiated below 1G test, the 802.11b is found to be the worst case and recorded.
- (4) The EUT was programmed to be in continuously transmitting mode and the transmit duty cycle is not less than 98%.

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3.3 TABLE OF PARAMETERS OF TEXT SOFTWARE SETTING

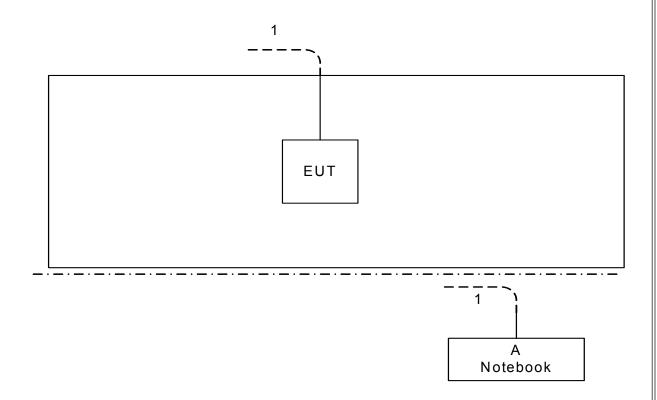
During testing, channel & power controlling software provided by the customer was used to control the operating channel as well as the output power level. The RF output power selection is for the setting of RF output power expected by the customer and is going to be fixed on the firmware of the final end product power parameters of WLAN

Test software version		MT7620 QA V1.0.6.0		
Frequency (MHz)	2412	2437	2462	
802.11b	0C	0B	0A	
802.11g	0B	0A	0A	
802.11n (20MHz)	0B	0A	0A	
Frequency	2422	2437	2452	
802.11n (40MHz)	0D	0D	0D	

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3.4 BLOCK DIAGRAM SHOWING THE CONFIGURATION OF SYSTEM TESTED



3.5 DESCRIPTION OF SUPPORT UNITS

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

Item	Equipment	Mfr/Brand	Model/Type No.	FCC ID	Series No.	Note
Α	Notebook	DELL	INSPIRON 1420	DOC	JX193A01SDC2	-

Item	Shielded Type	Ferrite Core	Length	Note
1	YES	NO	10m	RJ45

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4. EMC EMISSION TEST

4.1 CONDUCTED EMISSION MEASUREMENT

4.1.1 POWER LINE CONDUCTED EMISSION LIMITS (Frequency Range 150KHz-30MHz)

Fraguency of Emission (MHz)	Conducted Li	mit (dBµV)
Frequency of Emission (MHz)	Quasi-peak	Average
0.15 -0.5	66 to 56*	56 to 46*
0 50 -5.0	56	46
5.0 -30.0	60	50

Note:

- (1) The limit of " * " decreases with the logarithm of the frequency
- (2) The test result calculated as following: Measurement Value = Reading Level + Correct Factor Correct Factor = Insertion Loss + Cable Loss + Attenuator Factor(if use) Margin Level = Measurement Value - Limit Value

The following table is the setting of the receiver

Receiver Parameters	Setting	
Attenuation	10 dB	
Start Frequency	0.15 MHz	
Stop Frequency	30 MHz	
IF Bandwidth	9 KHz	

4.1.2 TEST PROCEDURE

- a. The EUT was placed 0.8 meters from the horizontal ground plane with EUT being connected to the power mains through a line impedance stabilization network (LISN). All other support equipments powered from additional LISN(s). The LISN provide 50 Ohm/ 50uH of coupling impedance for the measuring instrument.
- b. Interconnecting cables that hang closer than 40 cm to the ground plane shall be folded back and forth in the center forming a bundle 30 to 40 cm long.
- c. I/O cables that are not connected to a peripheral shall be bundled in the center. The end of the cable may be terminated, if required, using the correct terminating impedance. The overall length shall not exceed 1 m.
- d. LISN at least 80 cm from nearest part of EUT chassis.
- e For the actual test configuration, please refer to the related Item –EUT Test Photos.

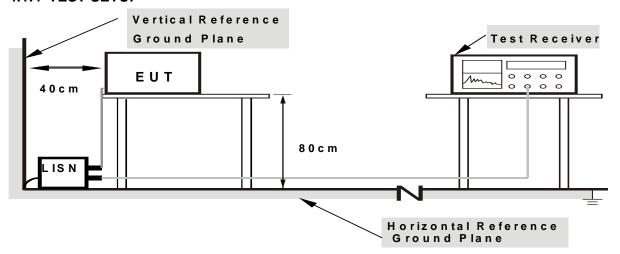
4.1.3 DEVIATION FROM TEST STANDARD

No deviation

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4.1.4 TEST SETUP



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

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

4.1.5 EUT OPERATING CONDITIONS

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.

4.1.6 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 60% Test Voltage: AC 120V/60Hz

4.1.7 TEST RESULTS

Please refer to the Attachment A.

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4.2 RADIATED EMISSION MEASUREMENT

4.2.1 RADIATED EMISSION LIMITS

20dB in any 100 KHz bandwidth outside the operating frequency band. In case the emission fall within the restricted band specified on 15.205(a), then the 15.209(a) limit in the table below has to be followed.

LIMITS OF RADIATED EMISSION MEASUREMENT (9KHz-1000MHz)

Frequency	Field Strength	Measurement Distance
(MHz)	(microvolts/meter)	(meters)
0.009~0.490	2400/F(KHz)	300
0.490~1.705	24000/F(KHz)	30
1.705~30.0	30	30
30~88	100	3
88~216	150	3
216~960	200	3
960~1000	500	3

LIMITS OF RADIATED EMISSION MEASUREMENT (Above 1000MHz)

Frequency (MHz)	(dBuV/m) (at 3 meters)		
	PEAK	AVERAGE	
Above 1000	74	54	

Notes:

- (1) The limit for radiated test was performed according to FCC PART 15C.
- (2) The tighter limit applies at the band edges.
- (3) Emission level (dBuV/m)=20log Emission level (uV/m).
- (4) The test result calculated as following: Measurement Value = Reading Level + Correct Factor Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain(if use) Margin Level = Measurement Value - Limit Value

Spectrum Parameter	Setting
Attenuation	Auto
Start Frequency	1000 MHz
Stop Frequency	10th carrier harmonic
RBW / VBW	RBW 1MHz VBW 3MHz peak detector for Pk value
(Emission in restricted band)	RMS detector for AV value

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Receiver Parameter	Setting
Attenuation	Auto
Start ~ Stop Frequency	9KHz~90KHz for PK/AVG detector
Start ~ Stop Frequency	90KHz~110KHz for QP detector
Start ~ Stop Frequency	110KHz~490KHz for PK/AVG detector
Start ~ Stop Frequency	490KHz~30MHz for QP detector
Start ~ Stop Frequency	30MHz~1000MHz for QP detector

4.2.2 TEST PROCEDURE

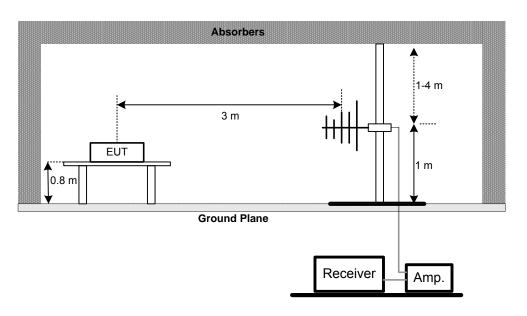
- a. The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.(below 1GHz)
- b. The EUT was placed on the top of a rotating table 1.5 meters above the ground at a 3 meter fully-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.(above 1GHz)
- c. The height of the equipment or of the substitution antenna shall be 1.5 m, the height of the test antenna shall vary between 1 m to 4 m. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. The initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured.
- e. If the Peak Mode measured value compliance with and lower than Quasi Peak Mode Limit, the EUT shall be deemed to meet QP Limits and then no additional QP Mode measurement performed.
- f. For the actual test configuration, please refer to the related Item –EUT Test Photos.

4.2.3 DEVIATION FROM TEST STANDARD

No deviation

4.2.4 TEST SETUP

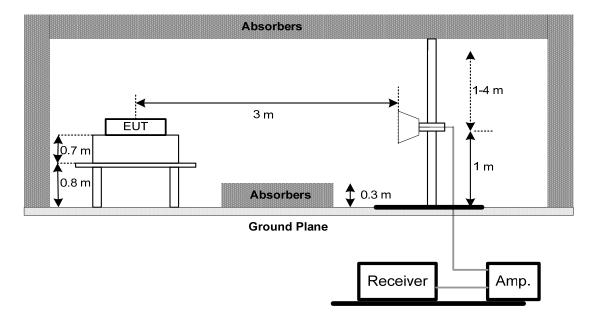
(A) Radiated Emission Test Set-Up Frequency Below 1 GHz



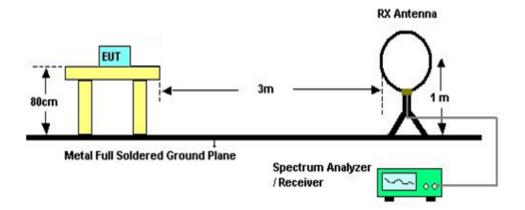
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(B) Radiated Emission Test Set-Up Frequency Above 1 GHz



(C) For radiated emissions below 30MHz



4.2.5 EUT OPERATING CONDITIONS

The EUT tested system was configured as the statements of **4.1.5 Unless** otherwise a special operating condition is specified in the follows during the testing.

4.2.6 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 52% Test Voltage: AC 120V/60Hz

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4.2.7 TEST RESULTS (9KHZ TO 30MHZ)

Please refer to the Attachment B

Remark:

- (1) The amplitude of spurious emissions which are attenuated by more than 20 dB below the permissible value has no need to be reported.
- (2) Distance extrapolation factor = 40 log (specific distance / test distance) (dB).
- (3) Limit line = specific limits (dBuV) + distance extrapolation factor.

4.2.8 TEST RESULTS (30MHZ TO 1000 MHZ)

Please refer to the Attachment C.

4.2.9 TEST RESULTS (ABOVE 1000 MHZ)

Please refer to the Attachment D.

Remark:

(1) No limit: This is fundamental signal, the judgment is not applicable. For fundamental signal judgment was referred to Peak output test.

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5. BANDWIDTH TEST

5.1 APPLIED PROCEDURES

FCC Part15 (15.247) , Subpart C				
Section	Frequency Range (MHz)	Result		
15.247(a)(2)	2400-2483.5	PASS		

5.1.1 TEST PROCEDURE

- a. The EUT was directly connected to the spectrum analyzer and antenna output port as show in the block diagram below,
- h Spectrum Setting: RBW= 100KHz, VBW=300KHz, Sweep time = 2.5 ms.

5.1.2 DEVIATION FROM STANDARD

No deviation.

5.1.3 TEST SETUP

EUT	SPECTRUM
	ANALYZER

5.1.4 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 4.1.5 Unless otherwise a special operating condition is specified in the follows during the testing.

5.1.5 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 52% Test Voltage: AC 120V/60Hz

5.1.6 TEST RESULTS

Please refer to the Attachment E.

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6. MAXIMUM PEAK CONDUCTED OUTPUT POWER TEST

6.1 APPLIED PROCEDURES / LIMIT

FCC Part15 (15.247) , Subpart C				
Section	Test Item	Limit	Frequency Range (MHz)	Result
15.247(b)(3)	Maximum Output Power	1 Watt or 30dBm	2400-2483.5	PASS

6.1.1 TEST PROCEDURE

a. The EUT was directly connected to the power meter and antenna output port as show in the block diagram below,

6.1.2 DEVIATION FROM STANDARD

No deviation.

6.1.3 TEST SETUP

EUT	Power Meter
-----	-------------

6.1.4 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 4.1.5 Unless otherwise a special operating condition is specified in the follows during the testing.

6.1.5 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 52% Test Voltage: AC 120V/60Hz

6.1.6 TEST RESULTS

Please refer to the Attachment F.

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7. ANTENNA CONDUCTED SPURIOUS EMISSION

7.1 APPLIED PROCEDURES / LIMIT

In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted measurement, provided the transmitter demonstrates compliance with the peak conducted power limits.

7.1.1 TEST PROCEDURE

- a. The EUT was directly connected to the spectrum analyzer and antenna output port as show in the block diagram below,
- b Spectrum Setting: RBW= 100KHz, VBW=300KHz, Sweep time = Auto.

7.1.2 DEVIATION FROM STANDARD

No deviation.

7.1.3 TEST SETUP

EUT	SPECTRUM
	ANALYZER

7.1.4 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 4.1.5 Unless otherwise a special operating condition is specified in the follows during the testing.

7.1.5 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 52% Test Voltage: AC 120V/60Hz

7.1.6 TEST RESULTS

Please refer to the Attachment G.

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8. POWER SPECTRAL DENSITY TEST

8.1 APPLIED PROCEDURES / LIMIT

	FCC Part15 (15.247) , Subpart C						
Section	Test Item	Limit	Frequency Range (MHz)	Result			
15.247(e)	Power Spectral Density	8 dBm (in any 3KHz)	2400-2483.5	PASS			

8.1.1 TEST PROCEDURE

- a. The EUT was directly connected to the spectrum analyzer and antenna output port as show in the block diagram below,
- b. Spectrum Setting: RBW=3KHz, VBW=10KHz, Sweep time = Auto.

8.1.2 DEVIATION FROM STANDARD

No deviation.

8.1.3 TEST SETUP

EUT	SPECTRUM
	ANALYZER

8.1.4 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 4.1.5 Unless otherwise a special operating condition is specified in the follows during the testing.

8.1.5 EUT TEST CONDITIONS

Temperature: 24°C Relative Humidity: 52% Test Voltage: AC 120V/60Hz

8.1.6 TEST RESULTS

Please refer to the Attachment H.

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9. MEASUREMENT INSTRUMENTS LIST

		Conducted Emis	sion Measure	ment	
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	LISN	EMCO	3816/2	00052765	Mar. 28, 2016
2	LISN	R&S	ENV216	101447	Mar. 28, 2016
3	Test Cable	N/A	C_17	N/A	Mar. 13, 2016
4	EMI TEST RECEIVER	R&S	ESCS30	833364/017	Mar. 28, 2016
5	50Ω Terminator	SHX	TF2-3G-A	08122902	Mar. 28, 2016
6	Measurement Software	Farad	EZ-EMC Ver.NB-03A1 -01	N/A	N/A

	Radiated Emission Measurement						
Item	Kind of Equipment Manufacturer		Type No.	Serial No.	Calibrated until		
1	Antenna	Schwarbeck	VULB9160	9160-3232	Mar. 28, 2016		
2	Amplifier	HP	8447D	2944A09673	Nov. 17, 2015		
3	Receiver	AGILENT	N9038A	MY5213003 9	Sep. 30, 2015		
4	Test Cable	emci	LMR-400(30MH z-1GHz)	C-01	Jun. 28, 2016		
5	Controller	СТ	SC100	N/A	N/A		
6	Measurement Software	Farad	EZ-EMC Ver.NB-03A1-01	N/A	N/A		
7	Antenna	ETS	3115	00075789	Mar. 28, 2016		
8	Amplifier	Agilent	8449B	3008A02274	Nov. 02, 2015		
9	Receiver	AGILENT	N9038A	MY5213003 9	Sep. 30, 2015		
10	Test Cable	emci	EMC104-SM-S M-10000(1GHz -26.5GHz)	C-68	Jun. 28, 2016		
11	Controller	СТ	SC100	N/A	N/A		
12	Broad-Band Horn Antenna	Schwarzbeck	BBHA 9170	9170319	Mar. 28, 2016		
13	Microwave Preamplifier With Adaptor	EMC INSTRUMENT	EMC2654045	980039 & HA01	Mar. 28, 2016		
14	Active Loop Antenna	R&S	HFH2-Z2	830749/020	Aug. 16, 2015		

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	6dB Bandwidth Measurement					
Item Kind of Equipment Manufacturer Type No. Serial No. Calibrated un					Calibrated until	
1	Spectrum Analyzer	R&S	FSP 40	100185	Nov. 02, 2015	

	Peak Output Power Measurement						
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until		
1	power Meter	ANRITSU	ML2495A	1128009	Mar. 28, 2016		
2	Pulse Power Sensor	ANRITSU	MA 2411B	1027500	Mar. 28, 2016		

	Antenna Conducted Spurious Emission Measurement						
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until		
1	1 Spectrum Analyzer R&S		FSP 40	100185	Nov. 02, 2015		

Power Spectral Density Measurement					
Item Kind of Equipment Manufacturer Type No. Serial No. Calibrated unti					Calibrated until
1	Spectrum Analyzer	R&S	FSP 40	100185	Nov. 02, 2015

Remark: "N/A" denotes no model name, serial no. or calibration specified. All calibration period of equipment list is one year.

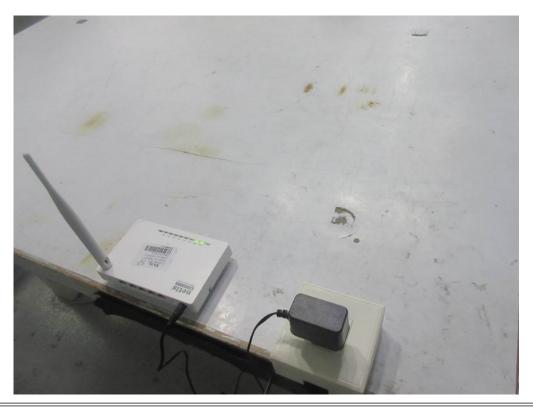
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10. EUT TEST PHOTO

Conducted Measurement Photos





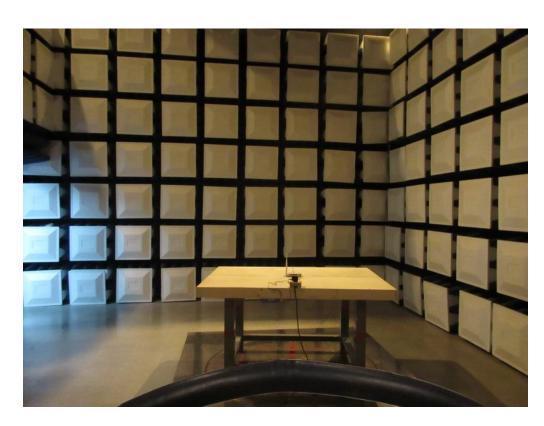
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Radiated Measurement Photos

9KHz to 30MHz





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Radiated Measurement Photos

30MHz to 1000MHz





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Radiated Measurement Photos

Above 1000MHz





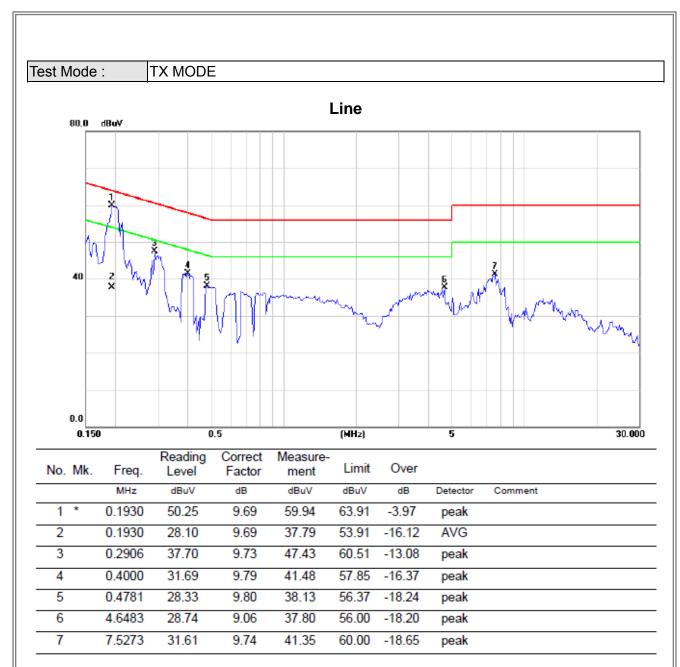
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ATTACHMENT A - CONDUCTED EMISSION	

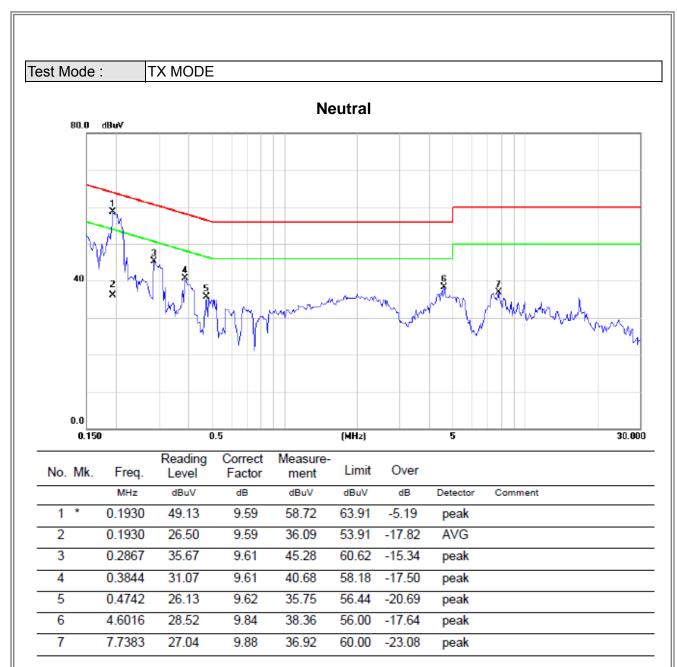
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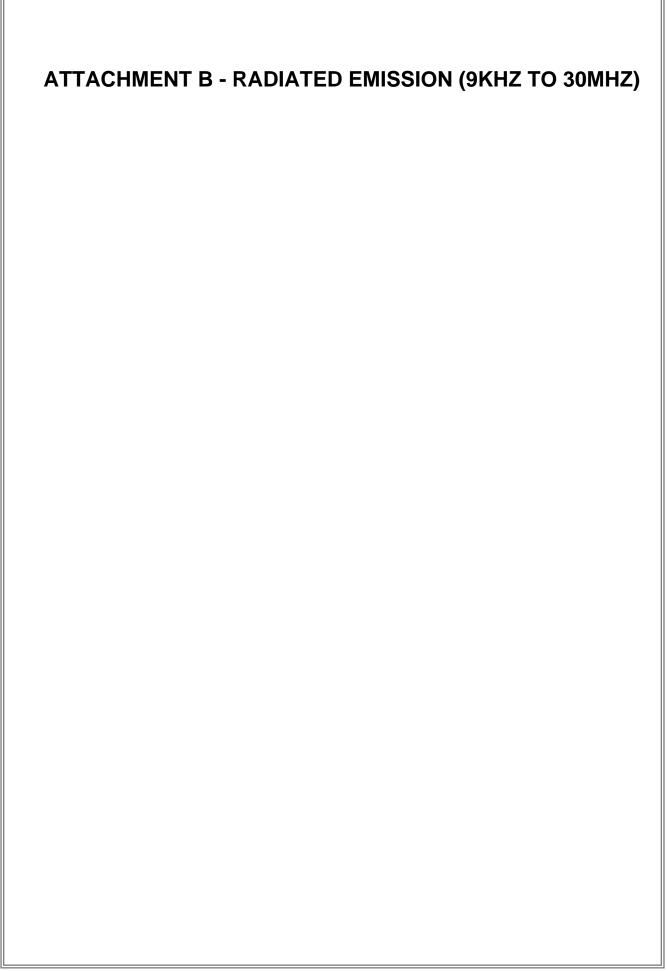
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Test Mode: TX Mode 2412MHz

Frequency (MHz)	Ant 0°/90°	Read level dBuV/m	Factor (dB)	Measured(FS) (dBuV/m)	Limit(QP) (dBuV/m)	Margin (dB)	Note
0.0095	0°	13.43	24.96	38.39	128.03	-89.64	AVG
0.0095	0°	14.23	24.96	39.19	148.03	-108.84	PEAK
0.0226	0°	6.78	24.14	30.92	120.52	-89.61	AVG
0.0226	0°	8.10	24.14	32.24	140.52	-108.29	PEAK
0.0316	0°	3.15	23.57	26.72	117.61	-90.90	AVG
0.0316	0°	5.53	23.57	29.10	137.61	-108.52	PEAK
0.0427	0°	1.26	22.86	24.12	115.00	-90.87	AVG
0.0427	0°	2.54	22.86	25.40	135.00	-109.59	PEAK
0.4932	0°	19.66	19.82	39.48	73.74	-34.27	QP
1.7151	0°	23.71	19.33	43.04	69.54	-26.50	QP

Frequency (MHz)	Ant 0°/90°	Read level dBuV/m	Factor (dB)	Measured(FS) (dBuV/m)	Limit(QP) (dBuV/m)	Margin (dB)	Note
0.0096	90°	13.11	24.30	37.41	127.93	-90.52	AVG
0.0096	90°	14.82	24.30	39.12	147.93	-108.81	PEAK
0.0257	90°	7.28	23.94	31.22	119.41	-88.19	AVG
0.0257	90°	8.94	23.94	32.88	139.41	-106.53	PEAK
0.0312	90°	5.23	23.59	28.82	117.72	-88.90	AVG
0.0312	90°	6.10	23.59	29.69	137.72	-108.03	PEAK
0.0444	90°	1.55	22.75	24.30	114.66	-90.35	AVG
0.0437	90°	2.83	22.75	25.58	134.66	-109.07	PEAK
0.4915	90°	22.14	19.82	41.96	73.77	-31.81	QP
1.7160	90°	24.51	19.53	44.04	69.54	-25.50	QP

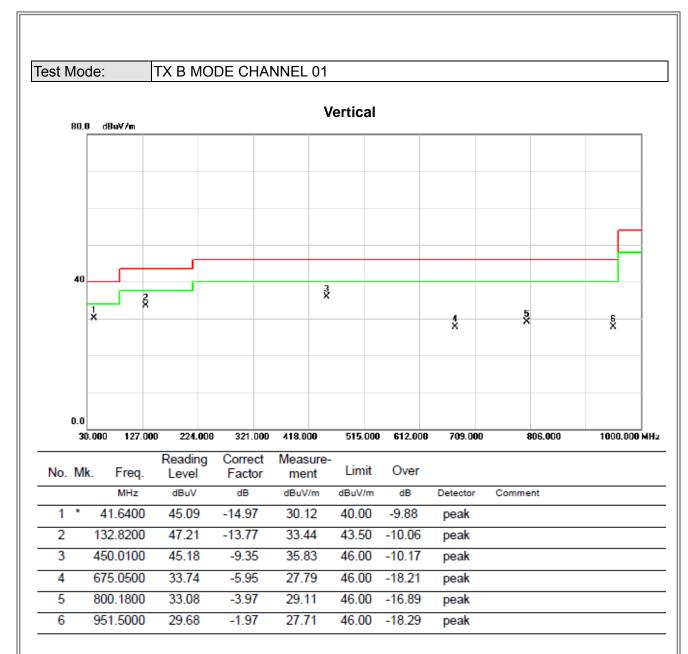
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ATTACHMENT C - RADIATED EMISSION (30MHZ TO 1000MHZ)

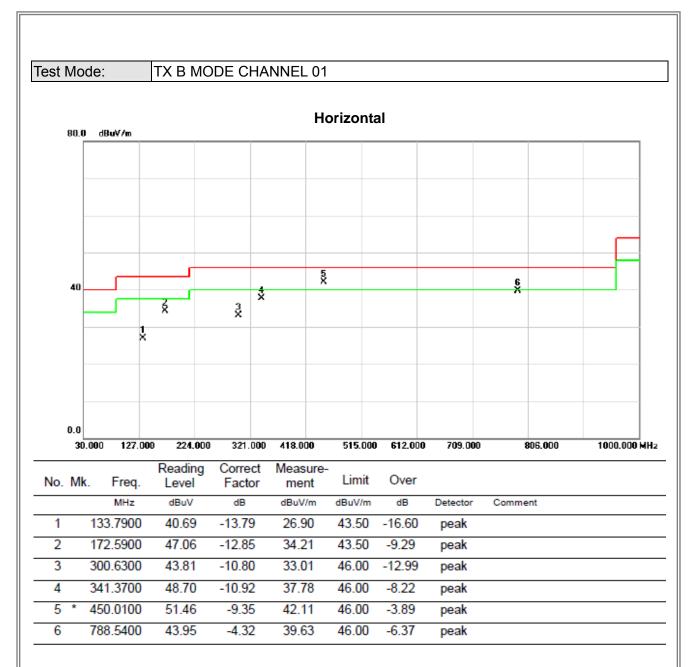
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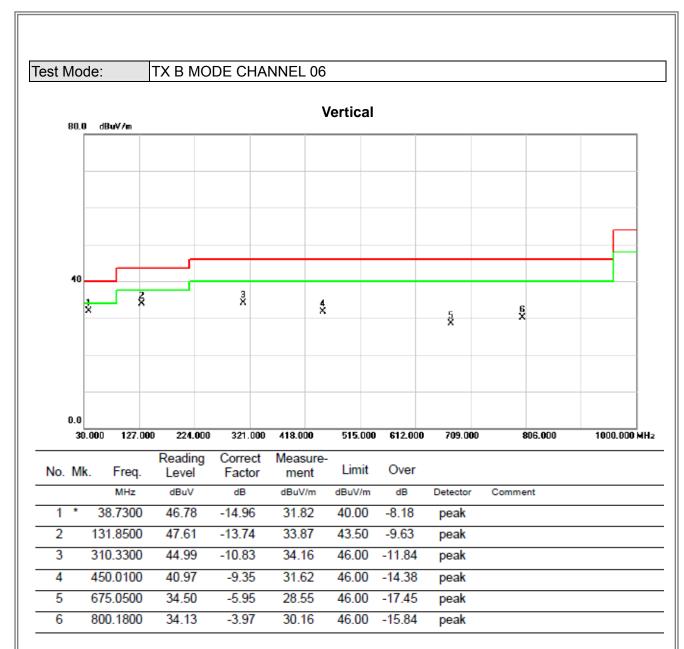
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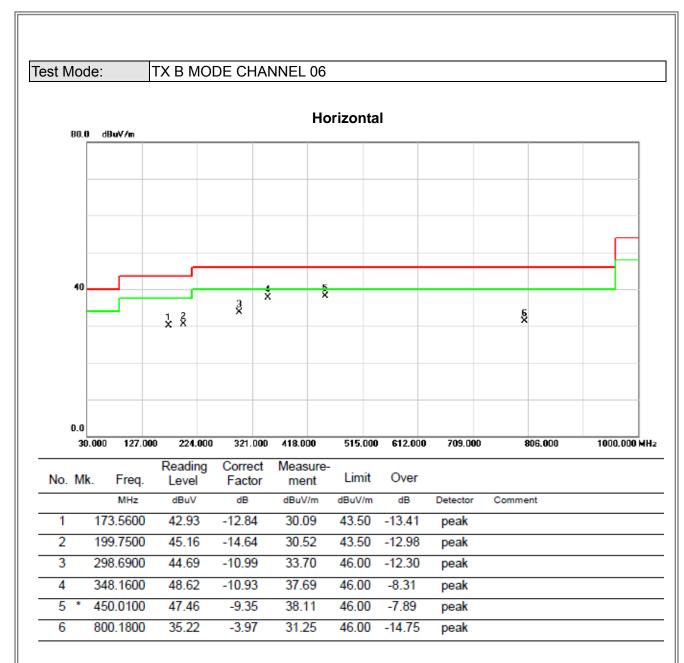
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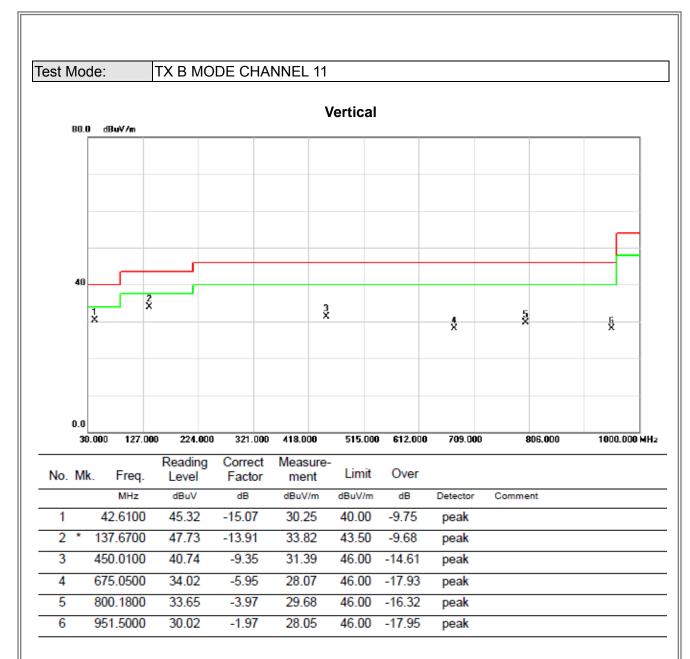
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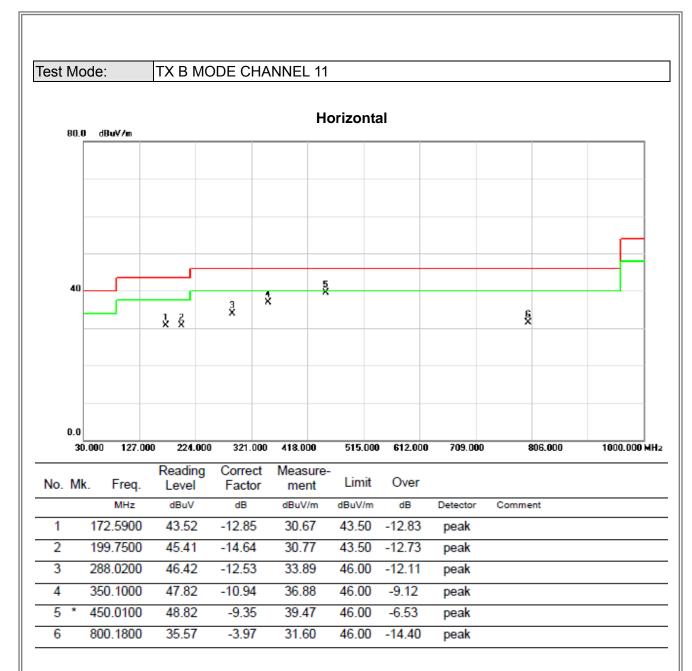
Report No.: BTL-FCCP-1-1506C211 Page 38 of 126





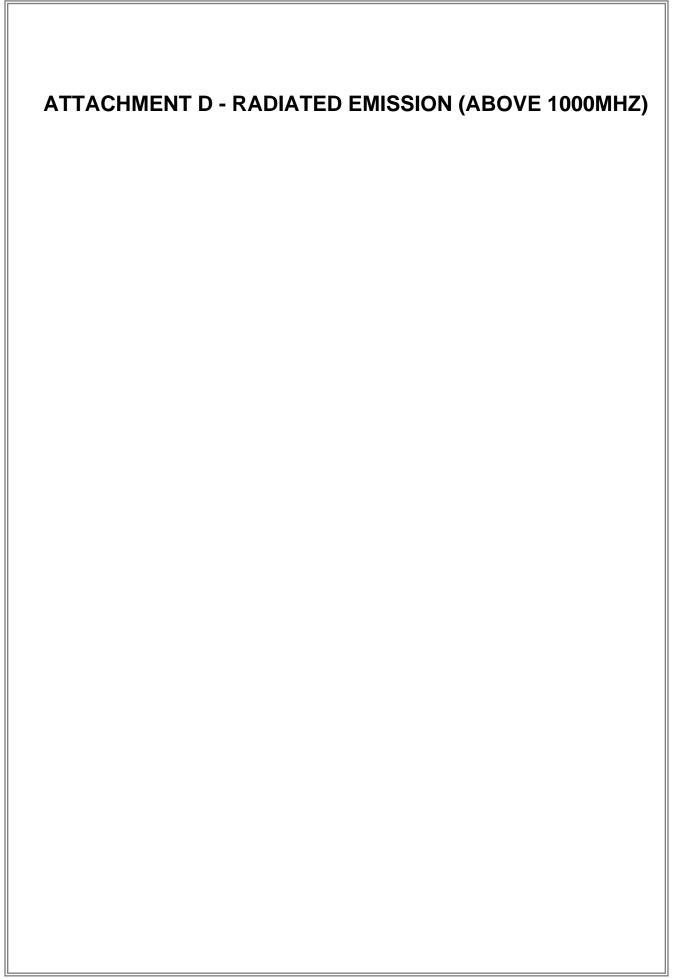
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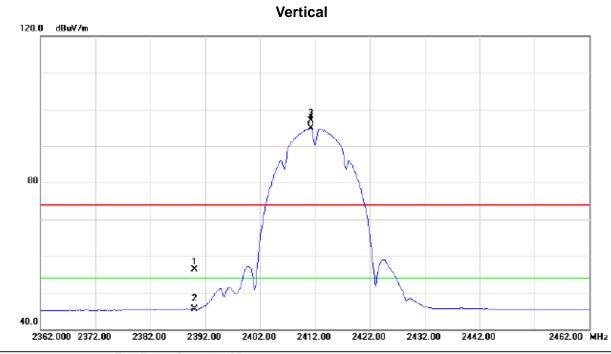
Report No.: BTL-FCCP-1-1506C211 Page 40 of 126





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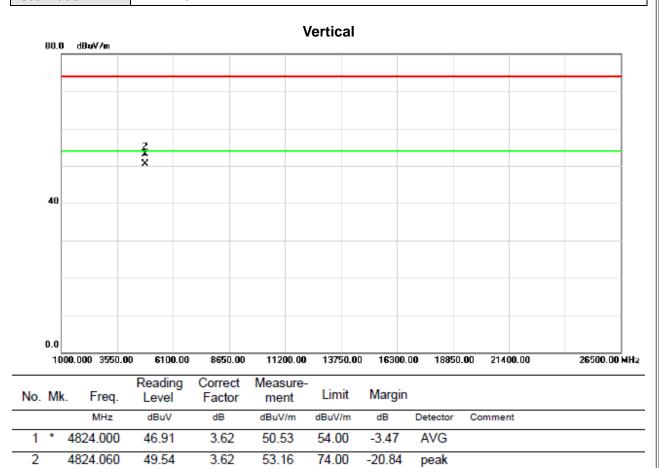




N	0.	Mk.	Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1		2390.000	24.33	31.88	56.21	74.00	-17.79	peak	
	2		2390.000	13.69	31.88	45.57	54.00	-8.43	AVG	
	3	Χ	2411.200	64.90	31.91	96.81	74.00	22.81	peak	No Limit
	4	*	2411.200	62.97	31.91	94.88	54.00	40.88	AVG	No Limit

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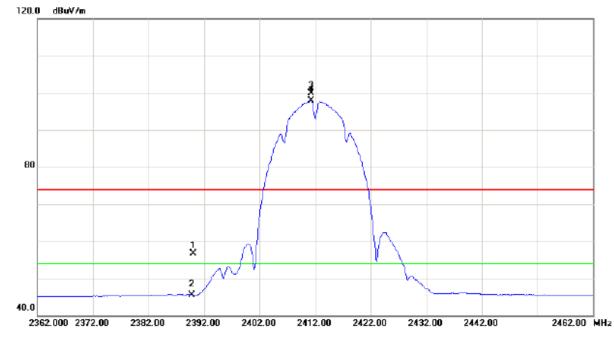
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Orthogonal Axis: X

Test Mode: TX B MODE 2412MHz

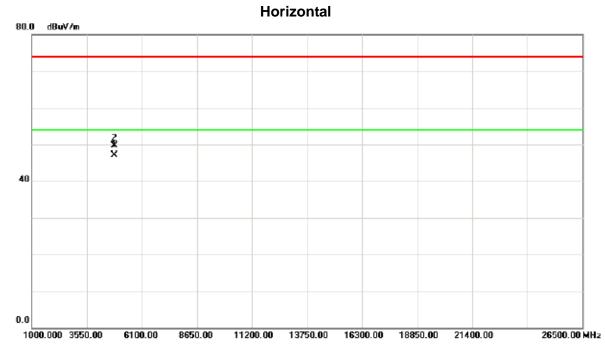
Horizontal



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		2390.000	24.76	31.88	56.64	74.00	-17.36	peak	
2		2390.000	13.70	31.88	45.58	54.00	-8.42	AVG	
3	X	2411.200	67.90	31.91	99.81	74.00	25.81	peak	No Limit
4	*	2411.200	65.94	31.91	97.85	54.00	43.85	AVG	No Limit

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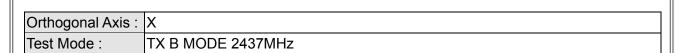


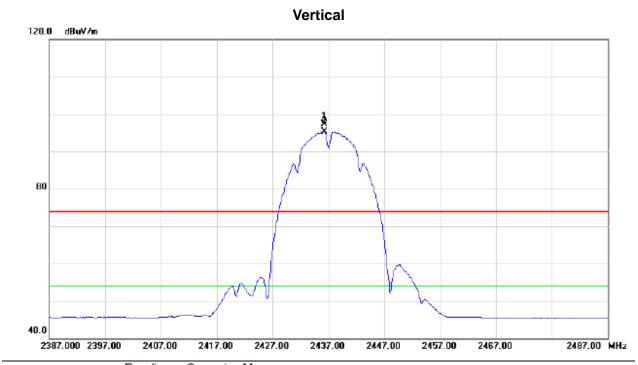


No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4824.060	43.54	3.62	47.16	54.00	-6.84	AVG	
2		4824.080	46.16	3.62	49.78	74.00	-24.22	peak	

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١	lo.	Mk.	Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1	X :	2436.200	65.37	31.94	97.31	74.00	23.31	peak	No Limit	
	2	*	2436.200	63.42	31.94	95.36	54.00	41.36	AVG	No Limit	

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Vertical 80.0 dBuV/m 40 0.0 1000.000 3550.00 6100.00 8650.00 11200.00 13750.00 16300.00 18850.00 21400.00 26500.00 MHz

No.	М	k. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4874.020	47.81	3.72	51.53	54.00	-2.47	AVG	
2		4874.040	50.44	3.72	54.16	74.00	-19.84	peak	

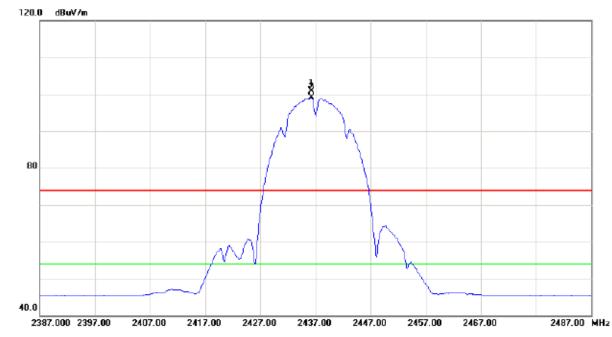
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Orthogonal Axis: X

Test Mode: TX B MODE 2437MHz

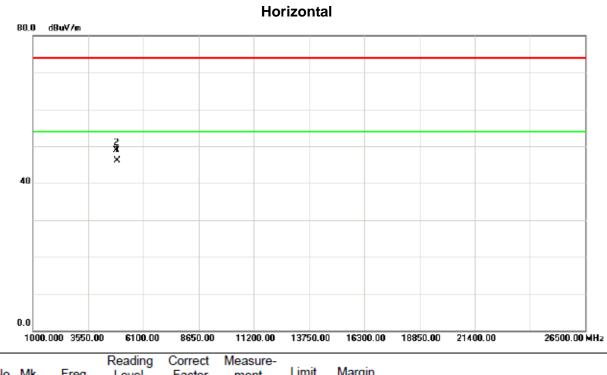
Horizontal



	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1	Χ	2436.200	68.95	31.94	100.89	74.00	26.89	peak	No Limit
Ī	2	*	2436.200	67.11	31.94	99.05	54.00	45.05	AVG	No Limit

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No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4874.150	42.44	3.72	46.16	54.00	-7.84	AVG	
2		4874.090	45.12	3.72	48.84	74.00	-25.16	peak	

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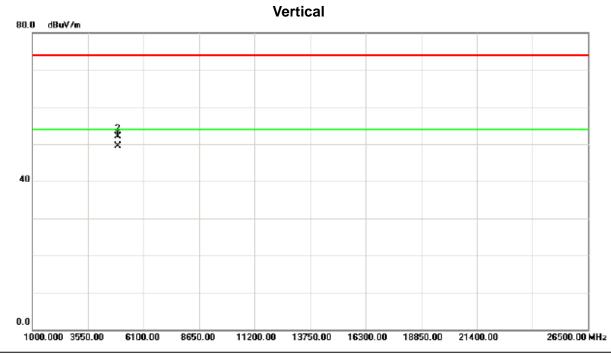


Vertical 120.0 dBuV/m 80 40.0 2412.000 2422.00 2432.00 2432.00 2452.00 2462.00 2472.00 2482.00 2492.00 2512.00 MHz

No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	Χ	2461.200	62.66	31.98	94.64	74.00	20.64	peak	No Limit
2	*	2461.200	60.73	31.98	92.71	54.00	38.71	AVG	No Limit
3		2483.500	23.83	32.01	55.84	74.00	-18.16	peak	
4		2483.500	13.46	32.01	45.47	54.00	-8.53	AVG	

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No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4924.050	45.73	3.80	49.53	54.00	-4.47	AVG		
2		4924.010	48.36	3.80	52.16	74.00	-21.84	peak		

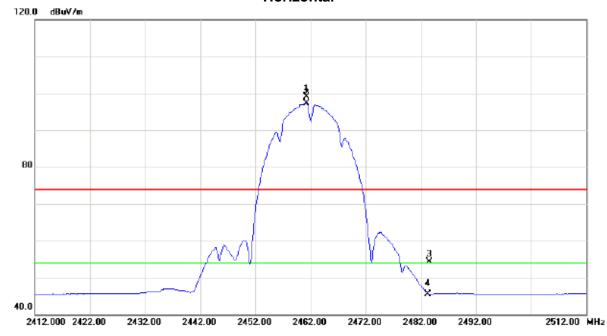
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Orthogonal Axis: X

Test Mode: TX B MODE 2462MHz

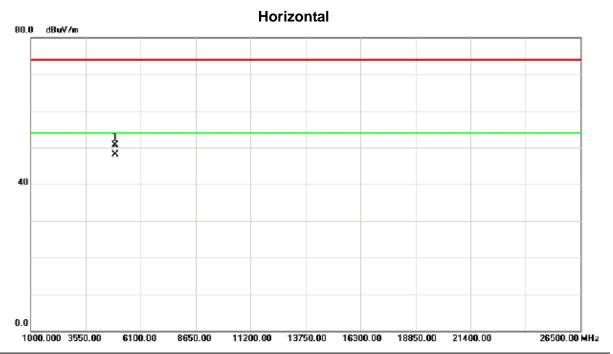
Horizontal



	No.	Mk	. Freq.		Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1	Χ	2461.200	67.15	31.98	99.13	74.00	25.13	peak	No Limit
Ī	2	*	2461.200	65.28	31.98	97.26	54.00	43.26	AVG	No Limit
-	3		2483.500	22.24	32.01	54.25	74.00	-19.75	peak	
	4		2483.500	13.57	32.01	45.58	54.00	-8.42	AVG	
_										

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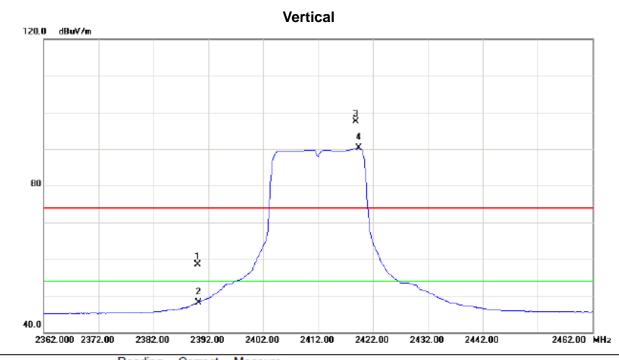




No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		4924.090	46.87	3.80	50.67	74.00	-23.33	peak	
2	*	4924.110	44.36	3.80	48.16	54.00	-5.84	AVG	

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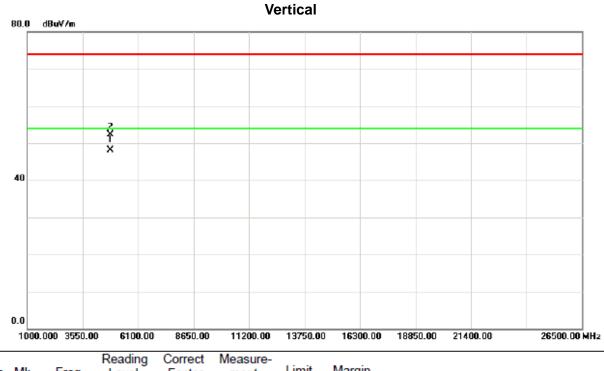




No.	Mk	. Freq.	Reading Level		Measure- ment	Limit	Margin				
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment		
1		2390.000	26.66	31.88	58.54	74.00	-15.46	peak			
2		2390.000	16.31	31.88	48.19	54.00	-5.81	AVG			
3	X	2418.900	65.55	31.92	97.47	74.00	23.47	peak	No Limit		
4	*	2419.400	58.30	31.92	90.22	54.00	36.22	AVG	No Limit		

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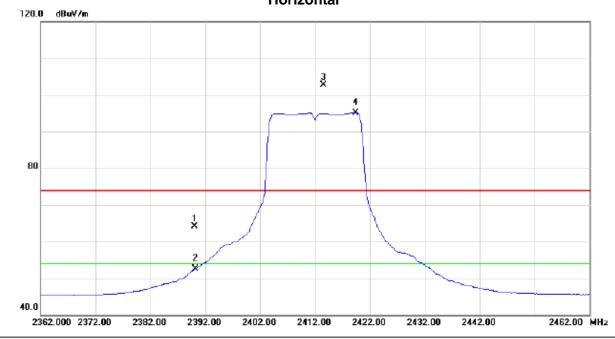


No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4824.020	44.58	3.62	48.20	54.00	-5.80	AVG	
2		4824.050	48.69	3.62	52.31	74.00	-21.69	peak	

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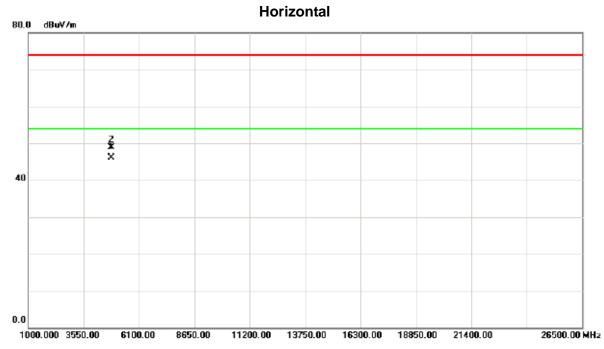
Horizontal



ı	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1		2390.000	32.16	31.88	64.04	74.00	-9.96	peak	
	2		2390.000	20.58	31.88	52.46	54.00	-1.54	AVG	
	3	Χ	2413.500	70.71	31.91	102.62	74.00	28.62	peak	No Limit
	4	×	2419.400	63.24	31.92	95.16	54.00	41.16	AVG	No Limit

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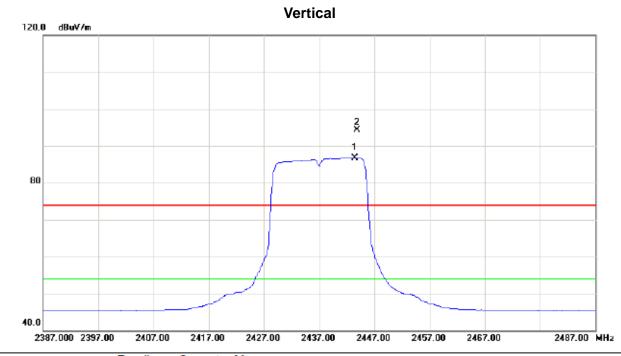


No	. N	Иk.	Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	k /	4824.010	42.47	3.62	46.09	54.00	-7.91	AVG	
2		4	4824.020	45.28	3.62	48.90	74.00	-25.10	peak	

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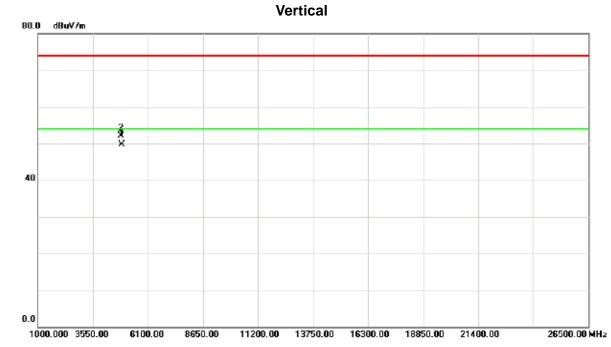




	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1	*	2443.500	54.83	31.95	86.78	54.00	32.78	AVG	No Limit	
Ī	2	Х	2443.800	62.26	31.96	94.22	74.00	20.22	peak	No Limit	

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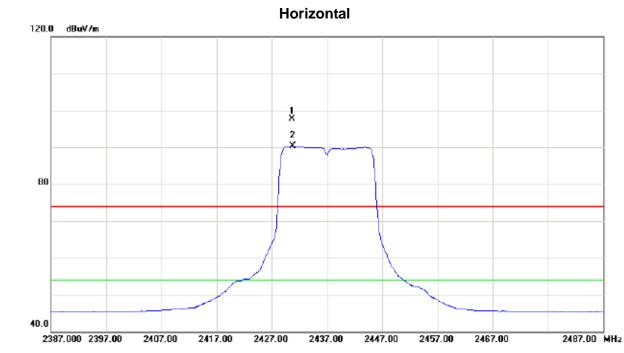




•	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1	*	4873.950	45.93	3.72	49.65	54.00	-4.35	AVG		
	2		4874.020	48.44	3.72	52.16	74.00	-21.84	peak		

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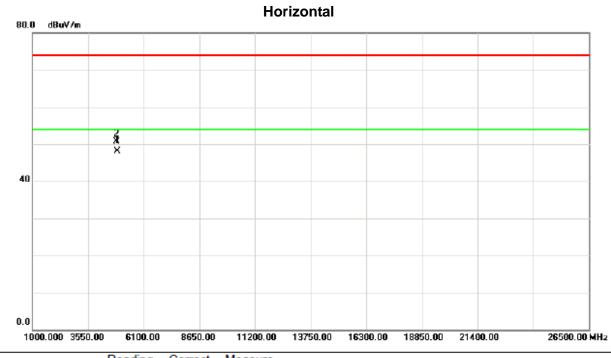




No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	Χ	2430.600	65.72	31.93	97.65	74.00	23.65	peak	No Limit
2	*	2430.800	58.41	31.93	90.34	54.00	36.34	AVG	No Limit

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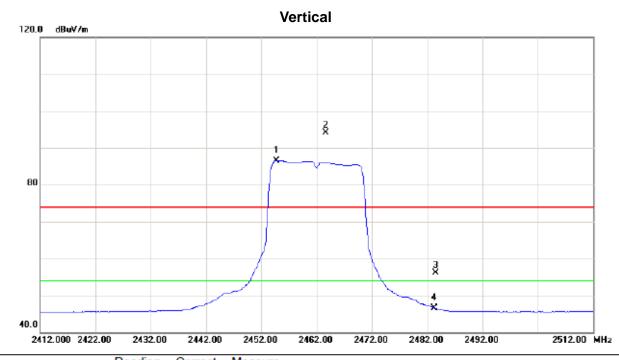




No.	Mk	. Freq.	Level	Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4874.030	44.32	3.72	48.04	54.00	-5.96	AVG	
2		4874.010	47.06	3.72	50.78	74.00	-23.22	peak	

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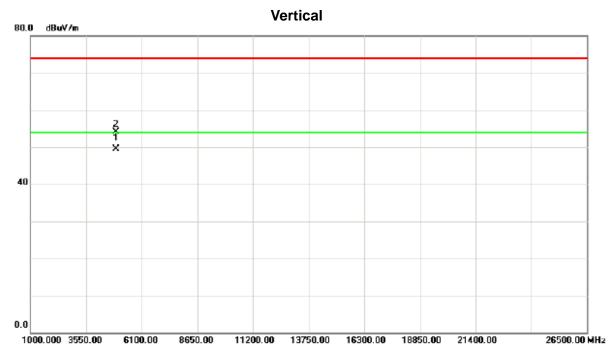




	No.	Mk	. Freq.	_		Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
Ī	1	*	2454.700	54.54	31.96	86.50	54.00	32.50	AVG	No Limit
	2	Χ	2463.600	62.09	31.98	94.07	74.00	20.07	peak	No Limit
Ī	3		2483.500	24.08	32.01	56.09	74.00	-17.91	peak	
_	4		2483.500	14.58	32.01	46.59	54.00	-7.41	AVG	

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No.	M	k. Freq	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4924.030	45.68	3.80	49.48	54.00	-4.52	AVG		
2		4924.050	50.36	3.80	54.16	74.00	-19.84	peak		

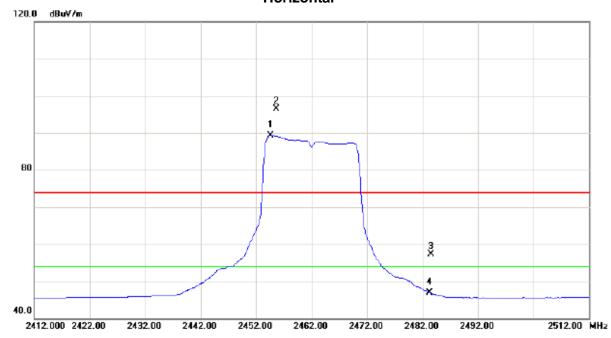
Report No.: BTL-FCCP-1-1506C211 Page 63 of 126



Orthogonal Axis: X

Test Mode: TX G MODE 2462MHz

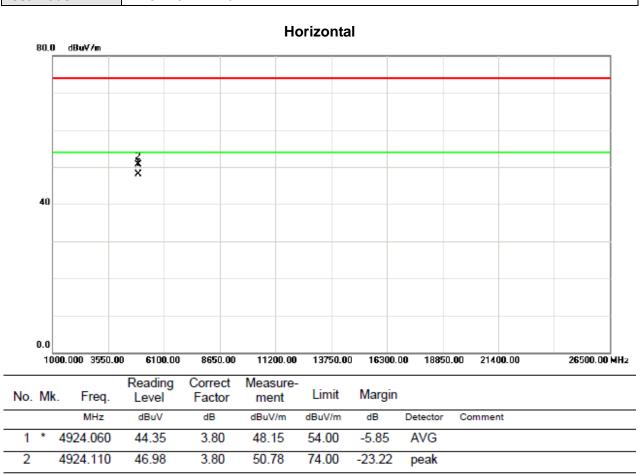
Horizontal



No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	2454.600	57.40	31.96	89.36	54.00	35.36	AVG	No Limit
2	Х	2455.600	64.60	31.96	96.56	74.00	22.56	peak	No Limit
3		2483.500	25.22	32.01	57.23	74.00	-16.77	peak	
4		2483.500	14.85	32.01	46.86	54.00	-7.14	AVG	

Report No.: BTL-FCCP-1-1506C211 Page 64 of 126

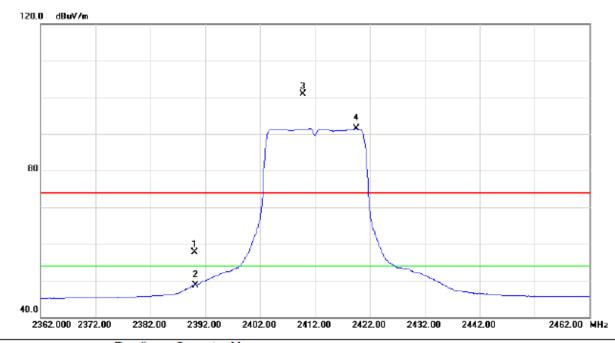




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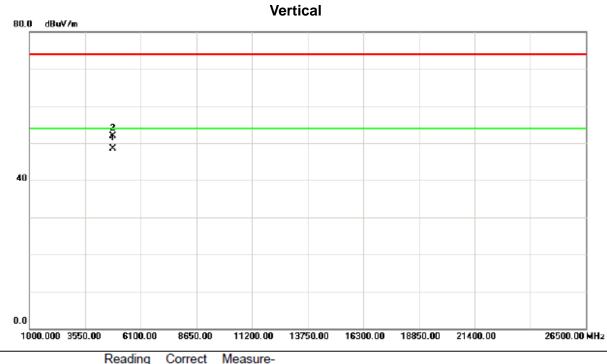
Vertical



	No.	Mk	. Freq.	Reading Level		Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1		2390.000	25.79	31.88	57.67	74.00	-16.33	peak		
	2		2390.000	16.90	31.88	48.78	54.00	-5.22	AVG		
Ī	3	X	2409.800	68.92	31.91	100.83	74.00	26.83	peak	No Limit	
Ī	4	*	2419.500	59.52	31.92	91.44	54.00	37.44	AVG	No Limit	

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No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4823.950	44.91	3.62	48.53	54.00	-5.47	AVG	
2		4824.020	48.32	3.62	51.94	74.00	-22.06	peak	

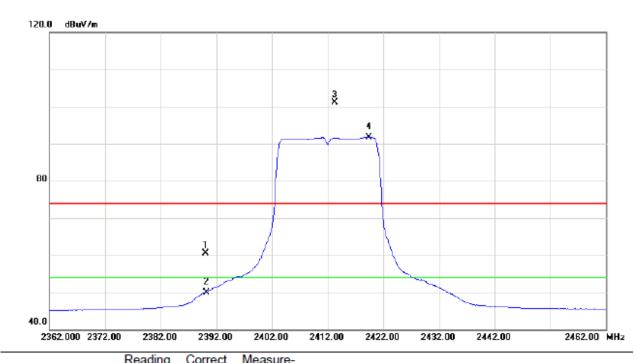
Report No.: BTL-FCCP-1-1506C211 Page 67 of 126



Orthogonal Axis: X

Test Mode: TX N-20M MODE 2412MHz

Horizontal



	No.	Mk	Freq.			ment	Limit	Margin			
Ī			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
Ī	1		2390.000	28.72	31.88	60.60	74.00	-13.40	peak		
	2		2390.000	18.08	31.88	49.96	54.00	-4.04	AVG		
-	3	Χ	2413.300	69.25	31.91	101.16	74.00	27.16	peak	No Limit	
-	4	*	2419.400	59.88	31.92	91.80	54.00	37.80	AVG	No Limit	
-											

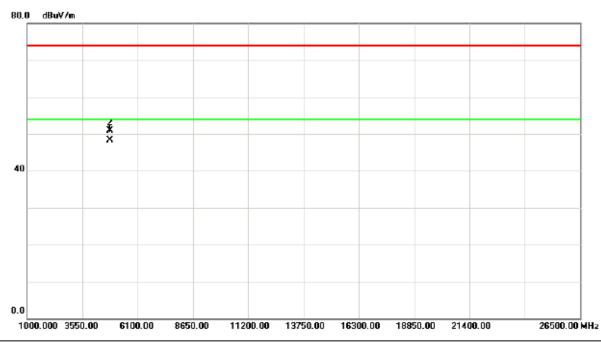
Report No.: BTL-FCCP-1-1506C211 Page 68 of 126



Orthogonal Axis: X

Test Mode: TX N-20M MODE 2412MHz

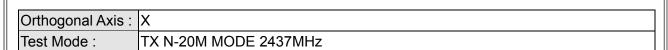
Horizontal

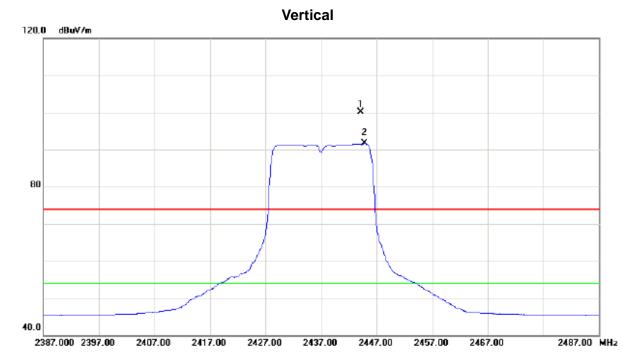


No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	4824.010	44.64	3.62	48.26	54.00	-5.74	AVG	
2		4824.060	47.35	3.62	50.97	74.00	-23.03	peak	

Report No.: BTL-FCCP-1-1506C211 Page 69 of 126







-	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1	X	2444.100	68.12	31.96	100.08	74.00	26.08	peak	No Limit
	2	*	2444.800	59.66	31.96	91.62	54.00	37.62	AVG	No Limit

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Orthogonal Axis: X
Test Mode: TX N-20M MODE 2437MHz

Vertical



No).	Mk.	. Freq.	Level	Factor	ment	Limit	Margin		
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	1	*	4874.000	45.77	3.72	49.49	54.00	-4.51	AVG	
2	2		4874.060	48.81	3.72	52.53	74.00	-21.47	peak	

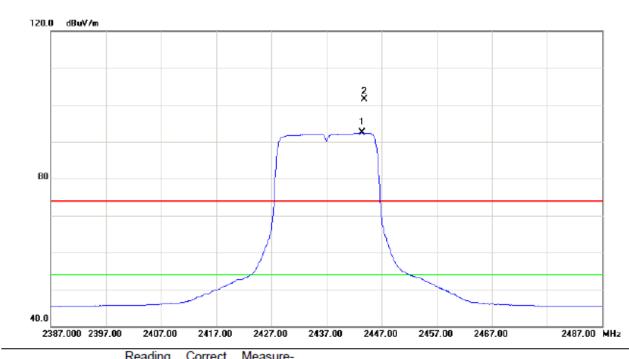
Report No.: BTL-FCCP-1-1506C211 Page 71 of 126



Orthogonal Axis: X

Test Mode: TX N-20M MODE 2437MHz

Horizontal



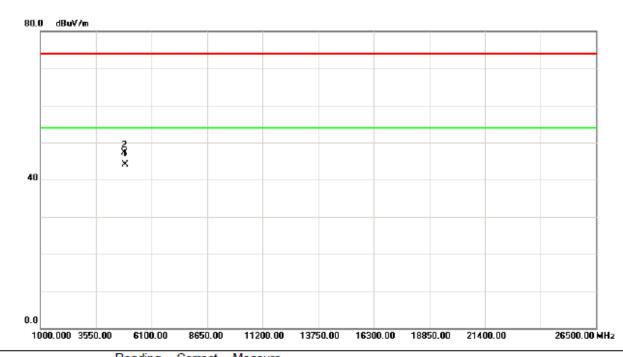
No. M	k.	Freq.	Level	Factor	ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	24	143.500	60.46	31.95	92.41	54.00	38.41	AVG	No Limit
2 X	24	143.800	69.54	31.96	101.50	74.00	27.50	peak	No Limit

Report No.: BTL-FCCP-1-1506C211 Page 72 of 126



Test Mode: TX N-20M MODE 2437MHz

Horizontal



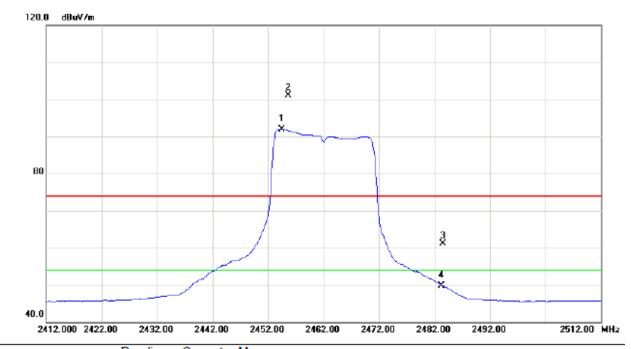
	No.	Mk	. Freq.	Level	Factor	ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
•	1	*	4874.060	40.38	3.72	44.10	54.00	-9.90	AVG		
	2		4874.080	43.62	3.72	47.34	74.00	-26.66	peak		
-											

Report No.: BTL-FCCP-1-1506C211 Page 73 of 126



Orthogonal Axis: X
Test Mode: TX N-20M MODE 2462MHz

Vertical

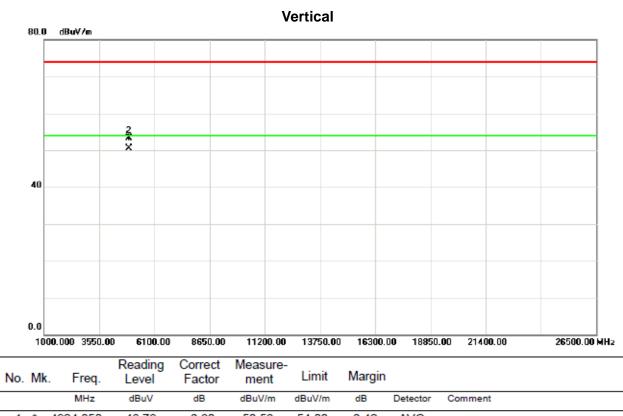


	No.	Mk	. Freq.			Measure- ment	Limit	Margin		
_			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
-	1	*	2454.400	60.02	31.96	91.98	54.00	37.98	AVG	No Limit
-	2	Χ	2455.600	69.08	31.96	101.04	74.00	27.04	peak	No Limit
-	3		2483.500	29.16	32.01	61.17	74.00	-12.83	peak	
_	4		2483.500	17.70	32.01	49.71	54.00	-4.29	AVG	

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Orthogonal Axis: X Test Mode: TX N-20M MODE 2462MHz



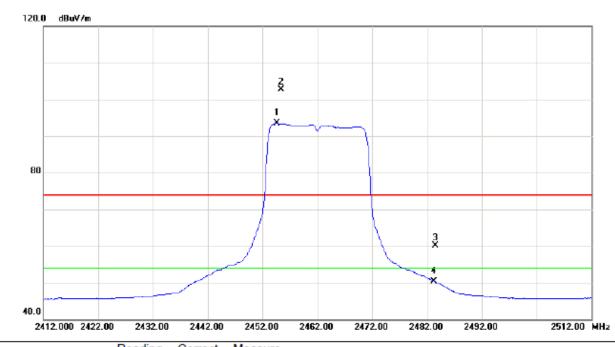
No.	M	c. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4924.050	46.78	3.80	50.58	54.00	-3.42	AVG		
2		4924.060	49.51	3.80	53.31	74.00	-20.69	peak		

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Test Mode: TX N-20M MODE 2462MHz

Horizontal

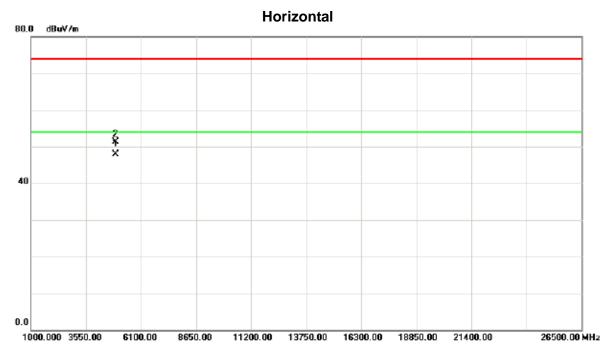


	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
-			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
	1	*	2454.600	61.49	31.96	93.45	54.00	39.45	AVG	No Limit
-	2	Х	2455.400	70.69	31.96	102.65	74.00	28.65	peak	No Limit
-	3		2483.500	28.09	32.01	60.10	74.00	-13.90	peak	
	4		2483.500	18.26	32.01	50.27	54.00	-3.73	AVG	
_										

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Orthogonal Axis: X
Test Mode: TX N-20M MODE 2462MHz



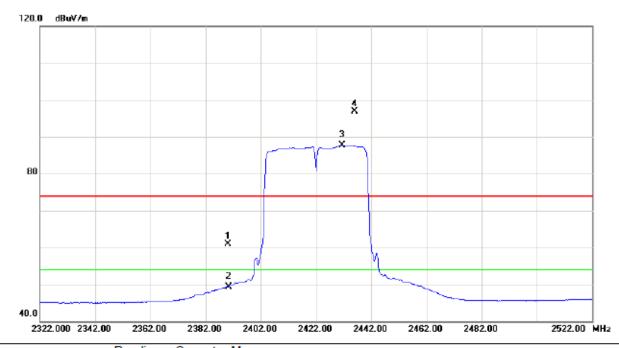
-	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
_			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
-	1	*	4924.030	44.05	3.80	47.85	54.00	-6.15	AVG	
_	2		4924.080	47.49	3.80	51.29	74.00	-22.71	peak	

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Orthogonal Axis: X
Test Mode: TX N-40M MODE 2422MHz

Vertical



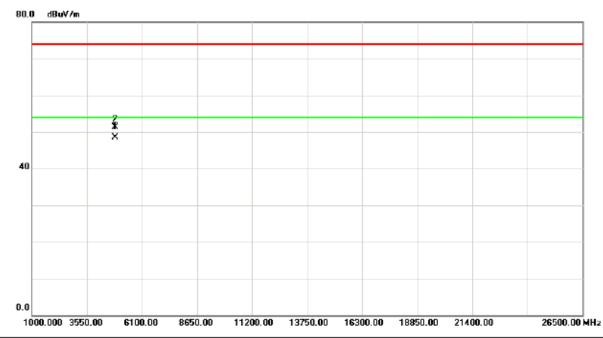
	No.	Mk.	. Freq.	Reading Level		Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1		2390.000	28.99	31.88	60.87	74.00	-13.13	peak		
	2		2390.000	17.44	31.88	49.32	54.00	-4.68	AVG		
Ī	3	*	2431.400	55.82	31.94	87.76	54.00	33.76	AVG	No Limit	
-	4	Х	2436.000	64.97	31.94	96.91	74.00	22.91	peak	No Limit	

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Test Mode: TX N-40M MODE 2422MHz

Vertical



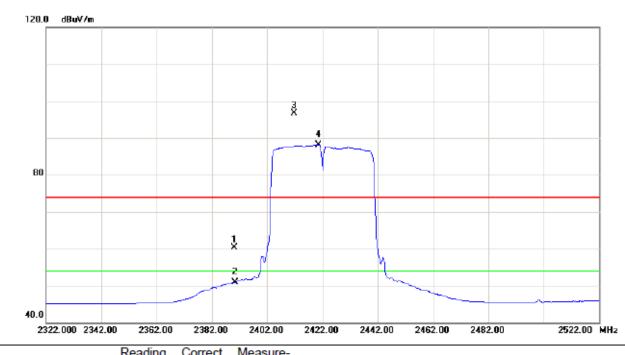
No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4844.000	44.86	3.66	48.52	54.00	-5.48	AVG		
2		4844.010	47.69	3.66	51.35	74.00	-22.65	peak		

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Test Mode: TX N-40M MODE 2422MHz

Horizontal



	No.	Mk.	Freq.			ment	Limit	Margin			
Ī			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
Ī	1		2390.000	28.47	31.88	60.35	74.00	-13.65	peak		
-	2		2390.000	18.97	31.88	50.85	54.00	-3.15	AVG		
-	3	X	2411.600	64.70	31.91	96.61	74.00	22.61	peak	No Limit	
-	4	*	2420.600	56.22	31.92	88.14	54.00	34.14	AVG	No Limit	
_											

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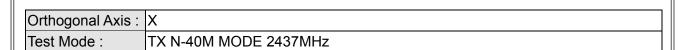


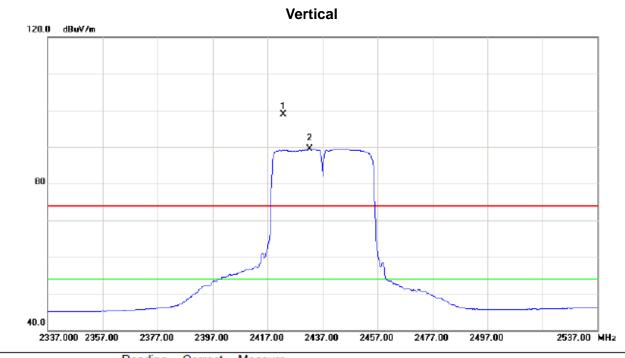
Orthogonal Axis: X TX N-40M MODE 2422MHz Test Mode:

Horizontal 80.0 dBuV/m 40 0.0 1000.000 3550.00 6100.00 8650.00 11200.00 13750.00 16300.00 18850.00 21400.00 26500.00 MHz Reading Correct Measure-Limit Margin No. Mk. Freq. Level Factor ment MHz dBuV dB dBuV/m dBuV/m dΒ Detector Comment 4844.030 40.56 44.22 54.00 -9.78 AVG 3.66 2 4844.020 44.19 3.66 47.85 74.00 -26.15 peak

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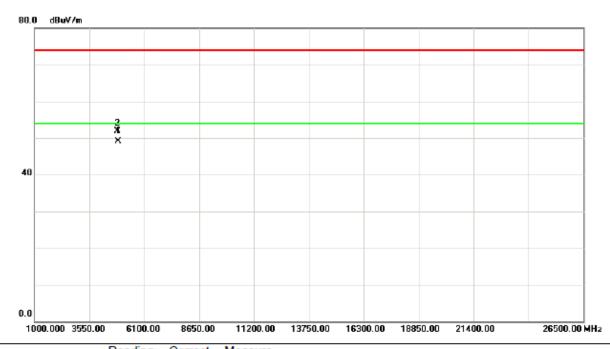
No.	Mk	. Freq.	Level	Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	Χ	2422.800	66.92	31.93	98.85	74.00	24.85	peak	No Limit	
2	*	2432.400	57.52	31.94	89.46	54.00	35.46	AVG	No Limit	

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Test Mode: TX N-40M MODE 2437MHz

Vertical



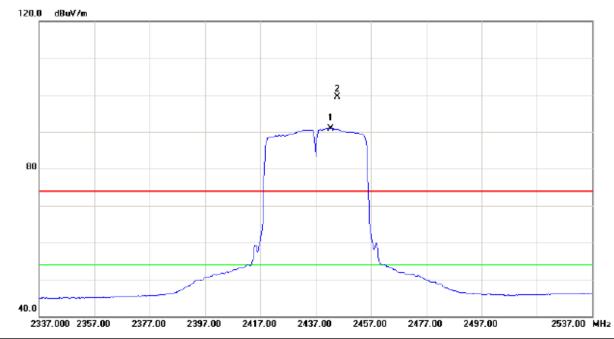
MHz dBuV dB dBuV/m dB Detector Comment 1 * 4874.020 45.37 3.72 49.09 54.00 -4.91 AVG 2 4874.100 48.09 3.72 51.81 74.00 -22.19 peak	No	. M	k. Freq.	Level	Correct Factor	Measure- ment	Limit	Margin				
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment		
2 4874.100 48.09 3.72 51.81 74.00 -22.19 peak	1	*	4874.020	45.37	3.72	49.09	54.00	-4.91	AVG			
	2		4874.100	48.09	3.72	51.81	74.00	-22.19	peak			

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Test Mode: TX N-40M MODE 2437MHz

Horizontal



No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	2442.400	58.93	31.95	90.88	54.00	36.88	AVG	No Limit	
2	X	2444.800	67.56	31.96	99.52	74.00	25.52	peak	No Limit	

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Test Mode: TX N-40M MODE 2437MHz

Horizontal



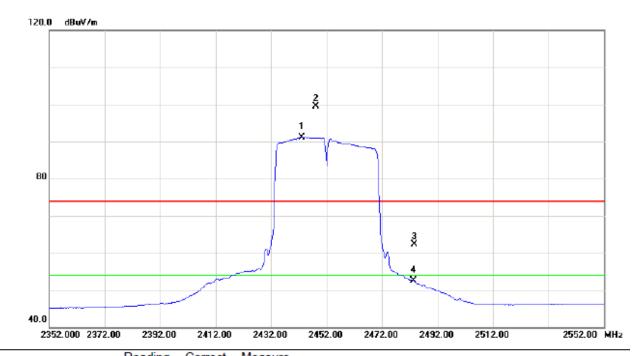
No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4874.030	44.32	3.72	48.04	54.00	-5.96	AVG		
2		4874.050	47.18	3.72	50.90	74.00	-23.10	peak		

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Orthogonal Axis: X
Test Mode: TX N-40M MODE 2452MHz

Vertical



	No.	Mk	. Freq.	_	Factor	ment	Limit	Margin		
-			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
-	1	*	2443.000	59.12	31.95	91.07	54.00	37.07	AVG	No Limit
-	2	Χ	2448.200	67.58	31.96	99.54	74.00	25.54	peak	No Limit
_	3		2483.500	30.36	32.01	62.37	74.00	-11.63	peak	
-	4		2483.500	20.54	32.01	52.55	54.00	-1.45	AVG	
_										

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Test Mode: TX N-40M MODE 2452MHz

Vertical



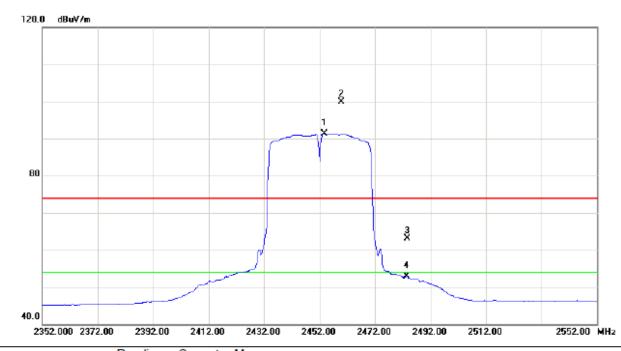
No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
1	*	4904.000	45.64	3.77	49.41	54.00	-4.59	AVG		
2		4904.030	48.47	3.77	52.24	74.00	-21.76	peak		

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Test Mode: TX N-40M MODE 2452MHz

Horizontal



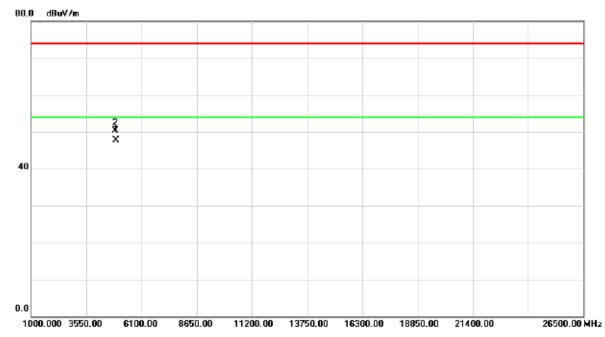
	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin		
Ī			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
-	1	*	2453.600	59.36	31.96	91.32	54.00	37.32	AVG	No Limit
	2	Х	2459.800	67.88	31.98	99.86	74.00	25.86	peak	No Limit
Ī	3		2483.500	31.04	32.01	63.05	74.00	-10.95	peak	
	4		2483.500	20.86	32.01	52.87	54.00	-1.13	AVG	

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Test Mode: TX N-40M MODE 2452MHz

Horizontal



_	No.	Mk	. Freq.	Reading Level	Correct Factor	Measure- ment	Limit	Margin			
			MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment	
	1	*	4904.010	43.87	3.77	47.64	54.00	-6.36	AVG		
_	2		4904.030	46.56	3.77	50.33	74.00	-23.67	peak		

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ATTACHMENT E - BANDWIDTH

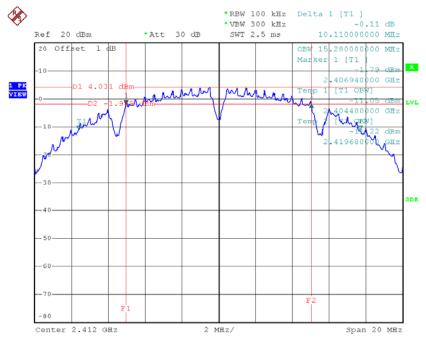
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Test Mode: TX B Mode_CH01/06/11

Frequency (MHz)	6dB Bandwidth (MHz)	99% Occupied BW (MHz)	Min. Limit (kHz)	Test Result
2412	10.11	15.28	500	Complies
2437	10.10	15.32	500	Complies
2462	10.11	15.24	500	Complies

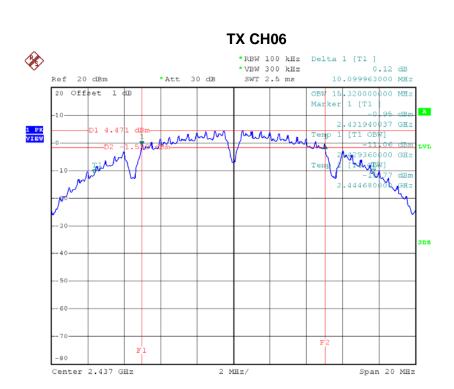
TX CH01



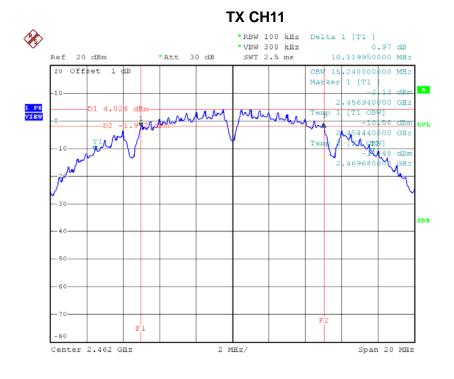
Date: 1.JUL.2015 09:06:00

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Date: 1.JUL.2015 09:07:43



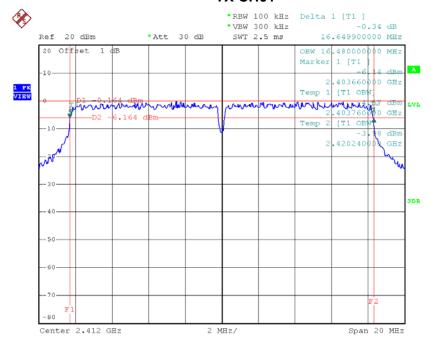
Date: 1.JUL.2015 09:08:57



Test Mode: TX G Mode_CH01/06/11

Frequency (MHz)	6dB Bandwidth (MHz)	99% Occupied BW (MHz)	Min. Limit (kHz)	Test Result
2412	16.65	16.48	500	Complies
2437	16.61	16.48	500	Complies
2462	16.66	16.48	500	Complies

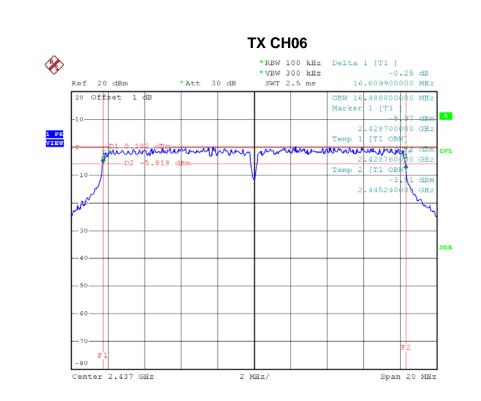
TX CH01



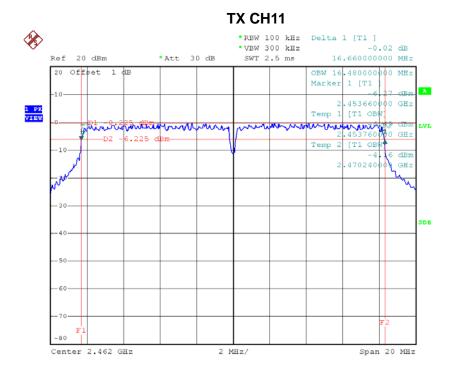
Date: 1.JUL.2015 09:10:35

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Date: 1.JUL.2015 09:11:36



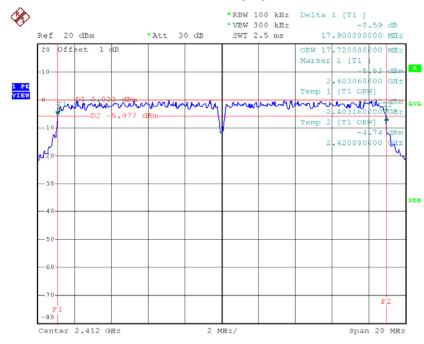
Date: 1.JUL.2015 09:12:31



Test Mode: TX N-20MHz Mode_CH01/06/11

Frequency (MHz)	6dB Bandwidth (MHz)	99% Occupied BW (MHz)	Min. Limit (kHz)	Test Result
2412	17.90	17.72	500	Complies
2437	17.86	17.72	500	Complies
2462	17.88	17.72	500	Complies

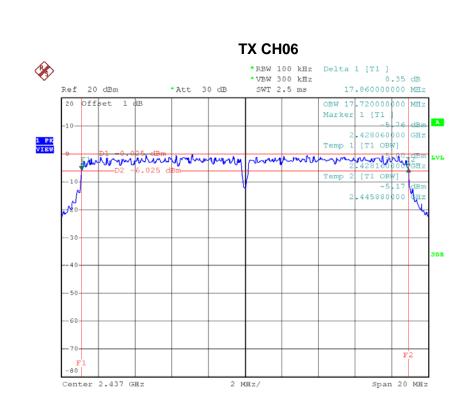
TX CH01



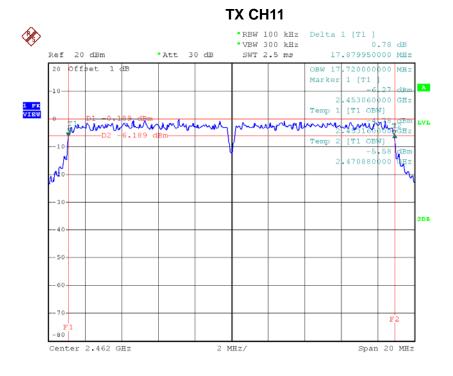
Date: 1.JUL.2015 09:15:32

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Date: 1.JUL.2015 09:16:32



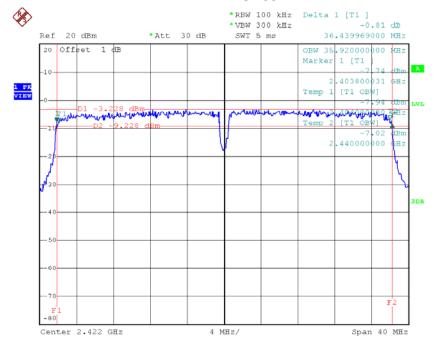
Date: 1.JUL.2015 09:17:22



Test Mode: TX N-40MHz Mode_CH03/06/09

Frequency (MHz)	6dB Bandwidth (MHz)	99% Occupied BW (MHz)	Min. Limit (kHz)	Test Result
2422	36.44	35.92	500	Complies
2437	35.56	36.08	500	Complies
2452	36.49	36.00	500	Complies

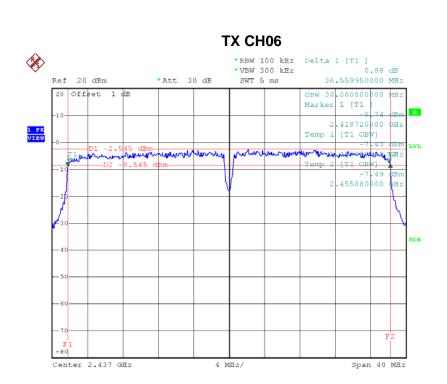
TX CH03



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Date: 1.JUL.2015 09:20:31

*RBW 100 kHz Delta 1 [T1] *VBW 300 kHz 2.13 dB *Ref 20 dBm *Att 30 dB SWT 5 ms 36.489250000 MHz 20 Offset 1 dB OBW 36.00000000 MHz Marker 1 [T1] -10 2.433790700 GHz Temp 1 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -8.34 dBm -2.47080000 GHz 2.47080000 GHz Tomp 2 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -7 80 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -8 34 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.47080000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 2 [T1 OBW] -8 30 dBm VAL 2.470800000 GHz Tomp 3 dBm VAL 3 dBm VAL 4 MHz/ Span 40 MHz

Date: 1.JUL.2015 09:21:35



ATTACHMENT F – MAXIMUM PEAK CONDUCTED OUTPUT POWER

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Test Mode :TX B Mode_CH01/06/11

Frequency (MHz)	Conducted Power (dBm)	Conducted Power (W)	Max. Limit (dBm)	Max. Limit (W)	Result
2412	16.27	0.0424	30.00	1.00	Complies
2437	16.93	0.0493	30.00	1.00	Complies
2462	16.67	0.0465	30.00	1.00	Complies

Test Mode :TX G Mode_CH01/06/11

Frequency (MHz)	Conducted Power (dBm)	Conducted Power (W)	Max. Limit (dBm)	Max. Limit (W)	Result
2412	22.66	0.1845	30.00	1.00	Complies
2437	23.09	0.2037	30.00	1.00	Complies
2462	22.85	0.1928	30.00	1.00	Complies

Test Mode :TX N-20M Mode_CH01/06/11

Frequency (MHz)	Conducted Power (dBm)	Conducted Power (W)	Max. Limit (dBm)	Max. Limit (W)	Result
2412	22.64	0.1837	30.00	1.00	Complies
2437	22.45	0.1758	30.00	1.00	Complies
2462	22.03	0.1596	30.00	1.00	Complies

Test Mode: TX N-40M Mode_CH03/06/09

Frequency	Conducted Power	Conducted Power	Max. Limit	Max. Limit	Result
(MHz)	(dBm)	(W)	(dBm)	(W)	result
2422	22.59	0.1816	30.00	1.00	Complies
2437	22.86	0.1932	30.00	1.00	Complies
2452	22.42	0.1746	30.00	1.00	Complies

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ATTACHMENT G - ANTENNA CONDUCTED SPURIOUS EMISSION

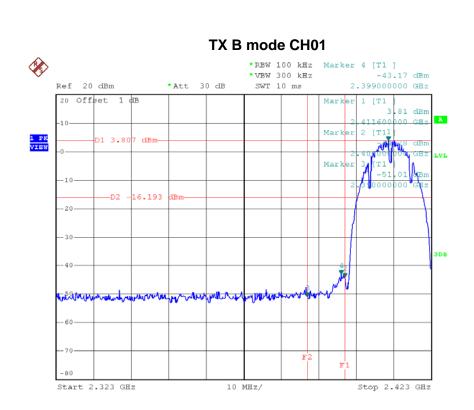
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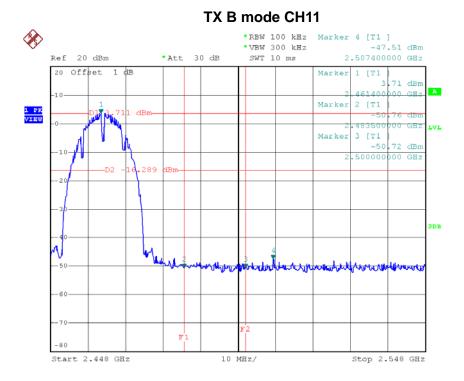
T(TV D M
Test Mode :	TX B Mode

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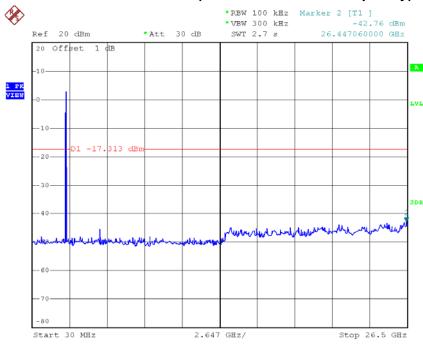
Date: 1.JUL.2015 09:06:22



Date: 1.JUL.2015 09:09:19

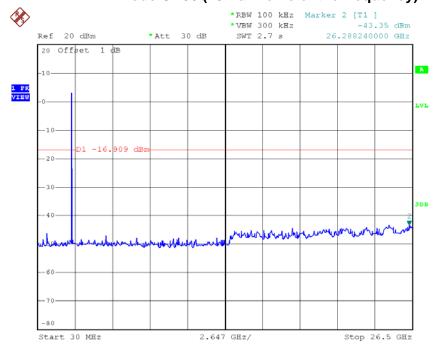






Date: 1.JUL.2015 09:06:14

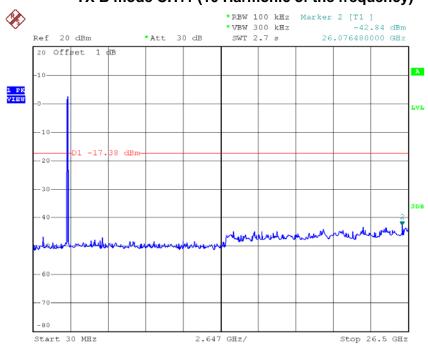
TX B mode CH06 (10 Harmonic of the frequency)



Date: 1.JUL.2015 09:07:57







Date: 1.JUL.2015 09:09:11

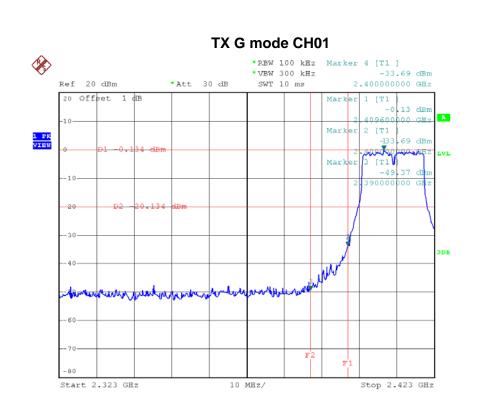
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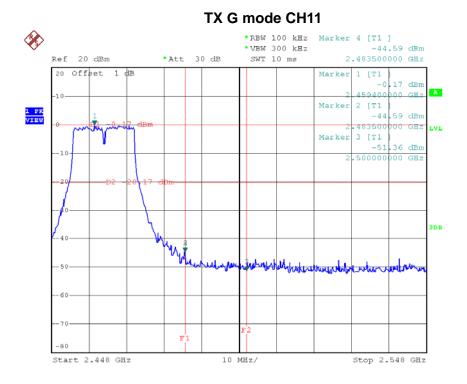
Test Mode :	TX G Mode

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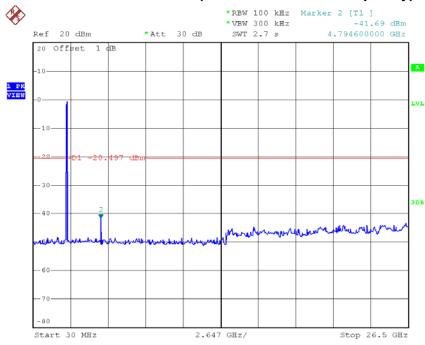




Date: 1.JUL.2015 09:12:53

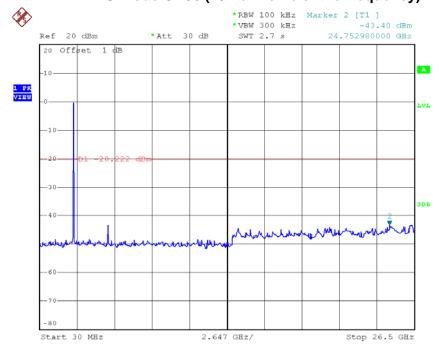






Date: 1.JUL.2015 09:10:49

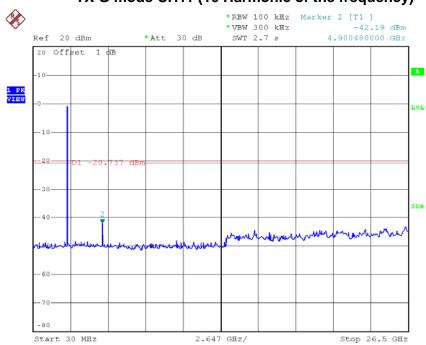
TX G mode CH06 (10 Harmonic of the frequency)



Date: 1.JUL.2015 09:11:49



TX G mode CH11 (10 Harmonic of the frequency)



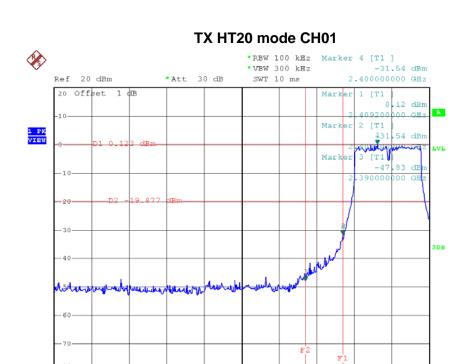
Date: 1.JUL.2015 09:12:45

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est Mode :	TX N-20M Mode





10 MHz/

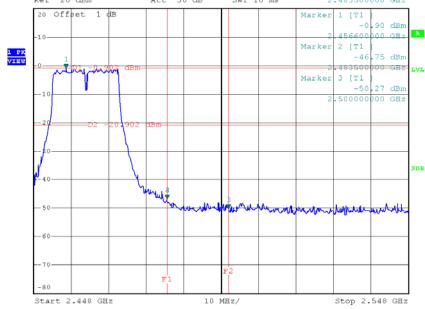
TX HT20 mode CH11

Stop 2.423 GHz

Date: 1.JUL.2015 09:15:54

Start 2.323 GHz

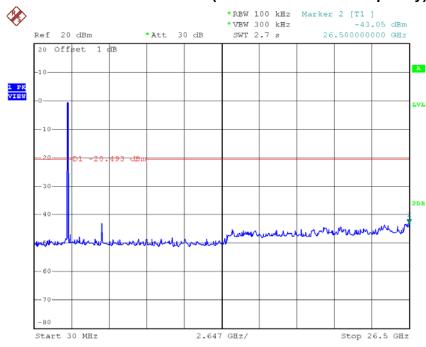
*RBW 100 kHz Marker 4 [T1] -46.75 dBm 2.483500000 GHz *VBW 300 kHz Ref 20 dBm *Att 30 dB SWT 10 ms 20 Offset 1 dB



Date: 1.JUL.2015 09:17:44

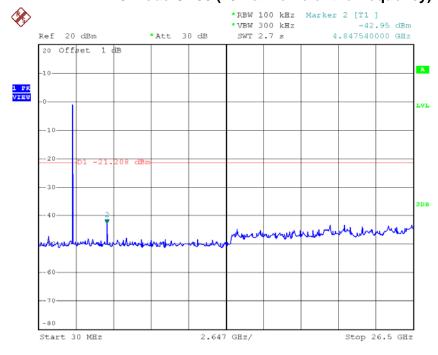






Date: 1.JUL.2015 09:15:46

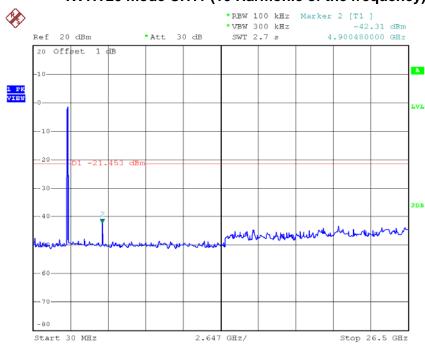
TX HT20 mode CH06 (10 Harmonic of the frequency)



Date: 1.JUL.2015 09:16:45







Date: 1.JUL.2015 09:17:36

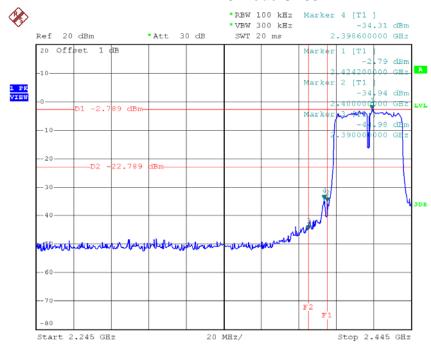
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est Mode :	TX N-40M Mode	

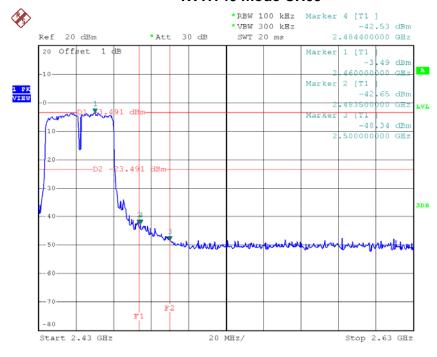






Date: 1.JUL.2015 09:19:40

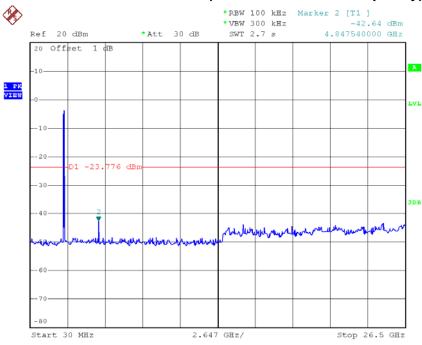
TX HT40 mode CH09



Date: 1.JUL.2015 09:21:57

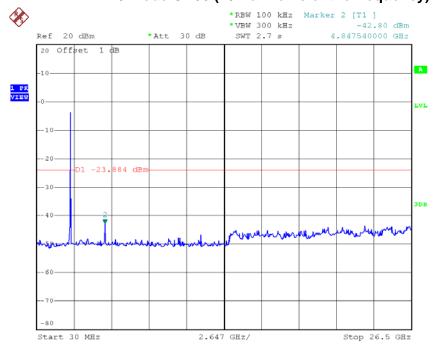






Date: 1.JUL.2015 09:19:33

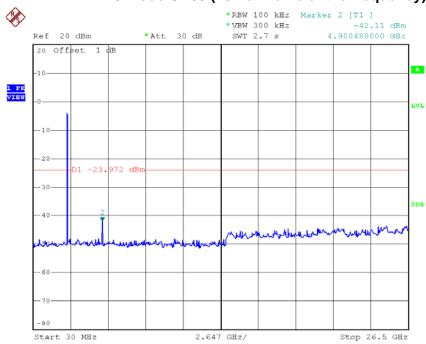
TX HT40 mode CH06 (10 Harmonic of the frequency)



Date: 1.JUL.2015 09:20:45







Date: 1.JUL.2015 09:21:49

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ATTACHMENT H - POWER SPECTRAL DENSITY					

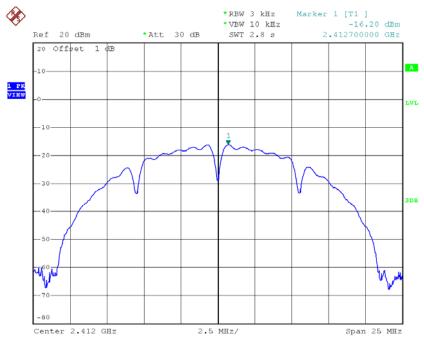
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Test Mode :TX B Mode_CH01/06/11

Frequency (MHz)	Power Density (dBm/3kHz)	Power Density (mW/3kHz)	Max. Limit (dBm/3kHz)	Result
2412	-16.20	8	8.00	Complies
2437	-15.81	8	8.00	Complies
2462	-16.29	8	8.00	Complies

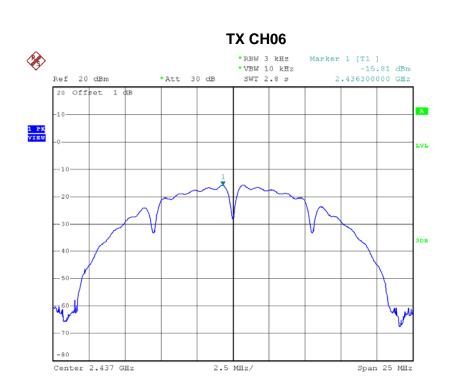
TX CH01



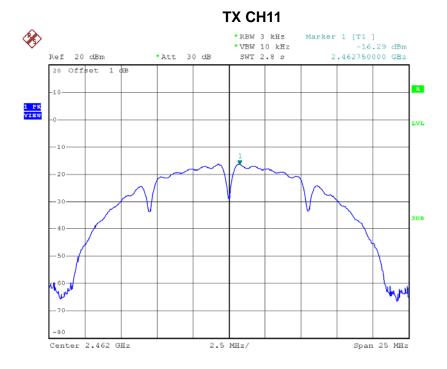
Date: 1.JUL.2015 09:06:31

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Date: 1.JUL.2015 09:08:07



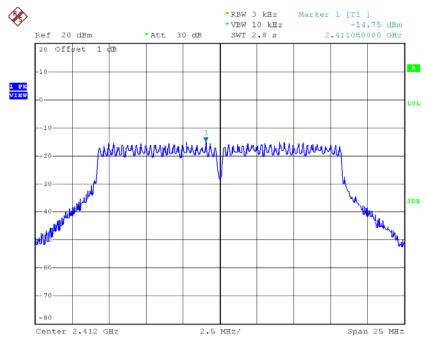
Date: 1.JUL.2015 09:09:28



Test Mode :TX G Mode_CH01/06/11

Frequency (MHz)	Power Density (dBm/3kHz)	Power Density (mW/3kHz)	Max. Limit (dBm/3kHz)	Result
2412	-14.75	8	8.00	Complies
2437	-14.14	8	8.00	Complies
2462	-14.64	8	8.00	Complies

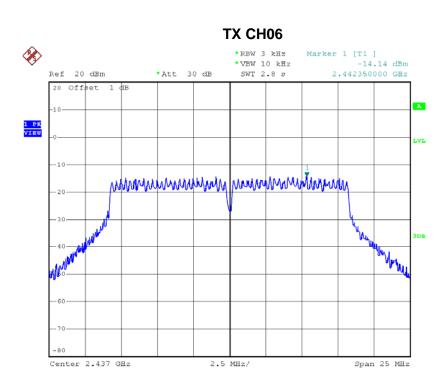
TX CH01



Date: 1.JUL.2015 09:11:06

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Date: 1.JUL.2015 09:11:59

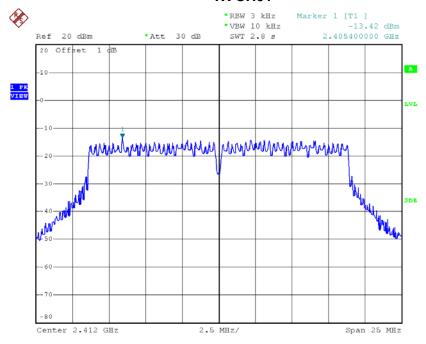
Date: 1.JUL.2015 09:13:02



Test Mode: TX N-20M Mode_CH01/06/11

Frequency (MHz)	Power Density (dBm/3kHz)	Power Density (mW/3kHz)	Max. Limit (dBm/3kHz)	Result
2412	-13.42	8	8.00	Complies
2437	-14.20	8	8.00	Complies
2462	-14.72	8	8.00	Complies

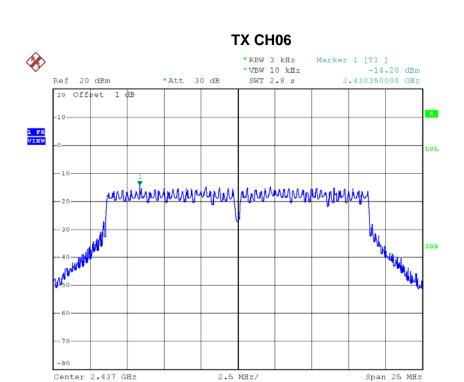
TX CH01



Date: 1.JUL.2015 09:16:03

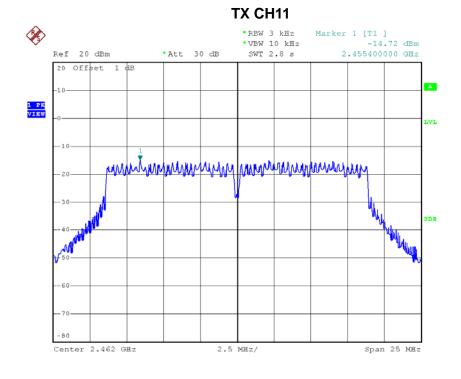
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Date: 1.JUL.2015 09:16:55

Date: 1.JUL.2015 09:17:53

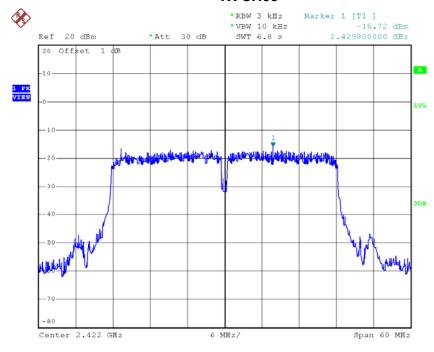




Test Mode: TX N-40M Mode_CH03/06/09

Frequency (MHz)	Power Density (dBm/3kHz)	Power Density (mW/3kHz)	Max. Limit (dBm/3kHz)	Result
2422	-15.72	8	8.00	Complies
2437	-14.55	8	8.00	Complies
2452	-16.18	8	8.00	Complies

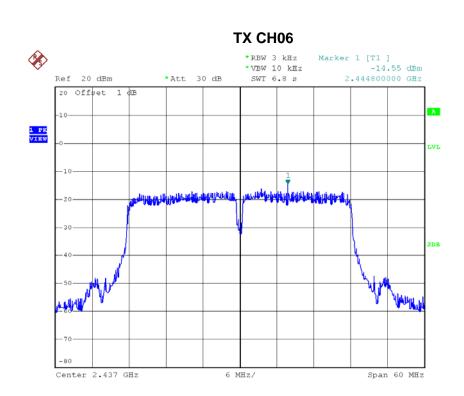
TX CH03



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Date: 1.JUL.2015 09:20:57

Date: 1.JUL.2015 09:22:09

