

## 802.11g OFDM MODULATION:

### NOTE 1:

The band edge emission plot of OFDM technique on the next page shows 48.52dBc between carrier maximum power and local maximum emission in restrict band (2.390000000GHz).

The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 115.74dBuV/m (Peak), so the maximum field strength in restrict band is  $115.74 - 48.52 = 67.22$ dBuV/m which is under 74dBuV/m limit.

The band edge emission plot of OFDM technique on the next page shows 52.35dBc between carrier maximum power and local maximum emission in restrict band (2.390000000GHz).

The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 105.34dBuV/m (Average), so the maximum field strength in restrict band is  $105.34 - 52.35 = 52.99$ dBuV/m which is under 54dBuV/m limit.

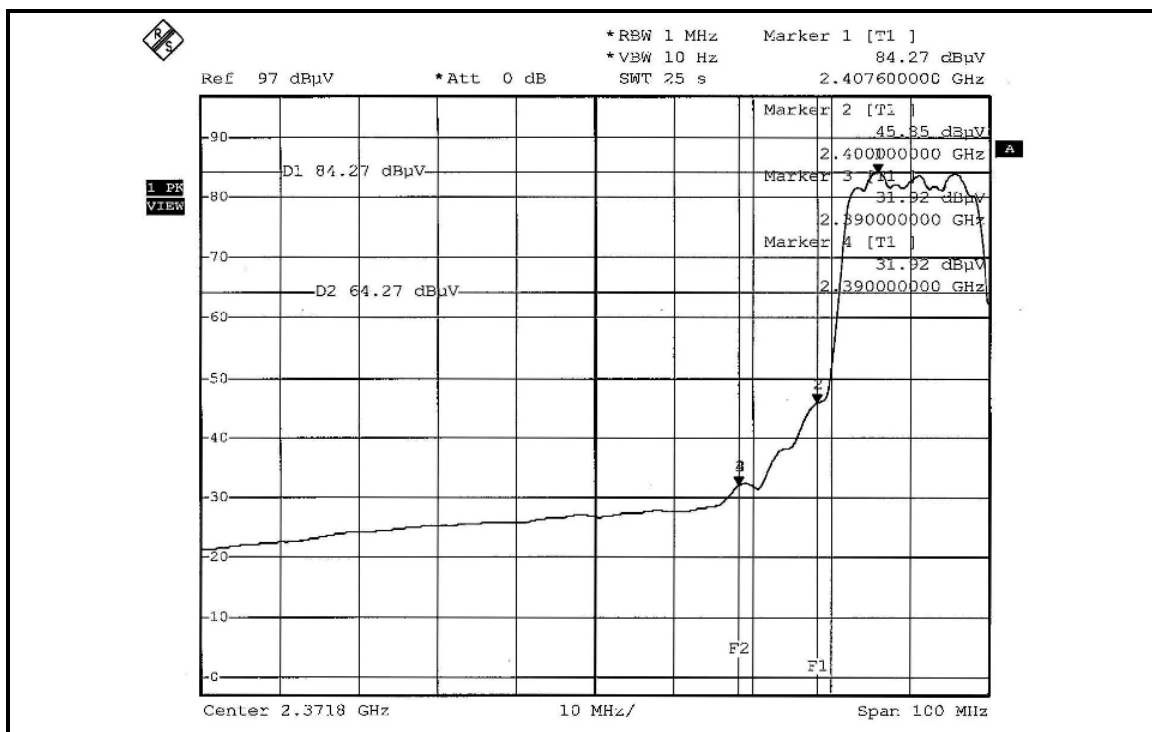
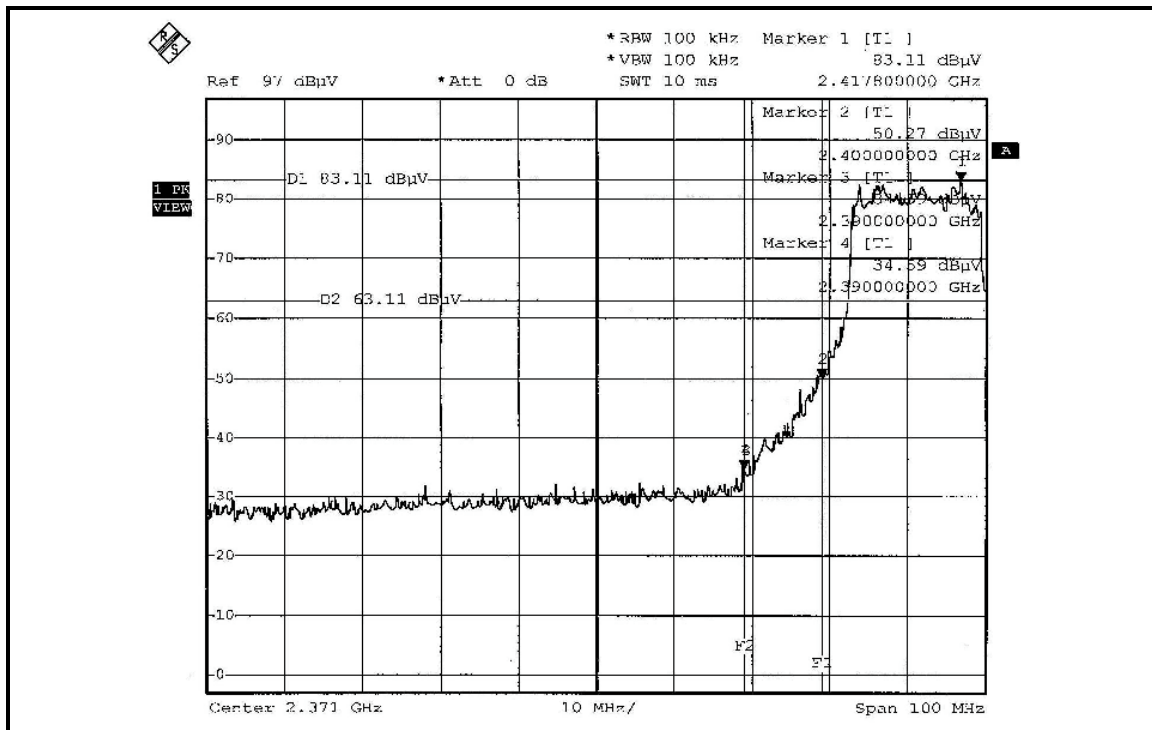
### NOTE 2:

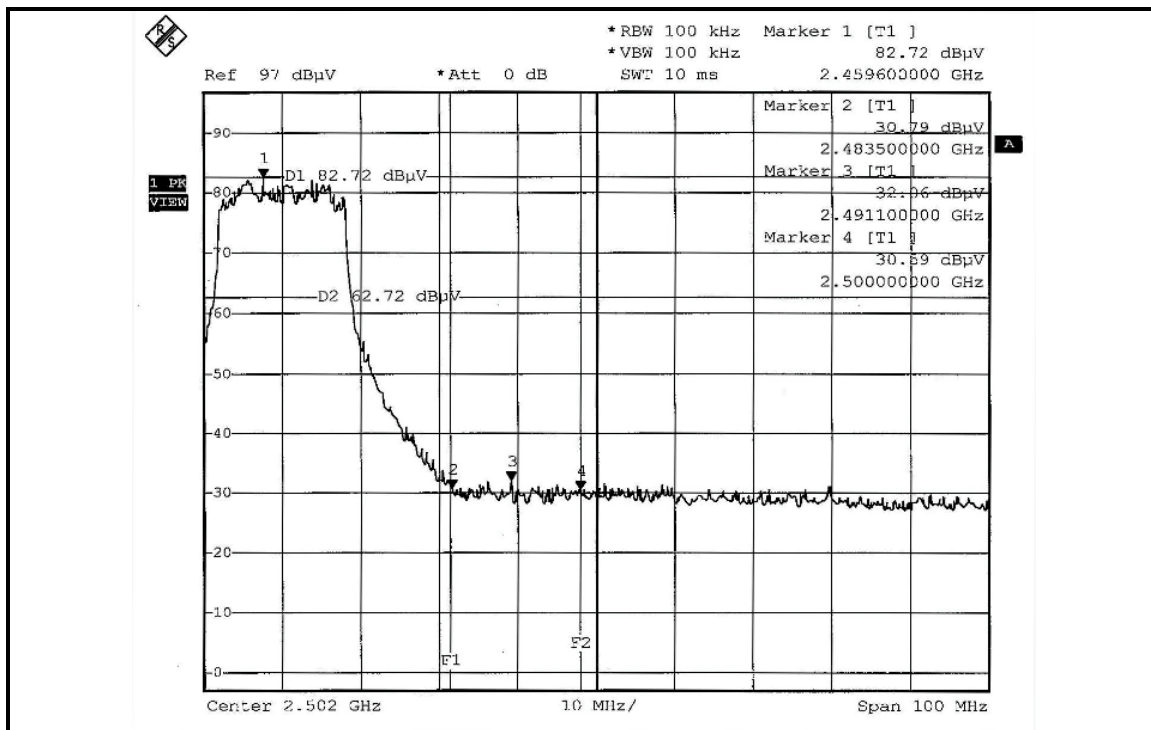
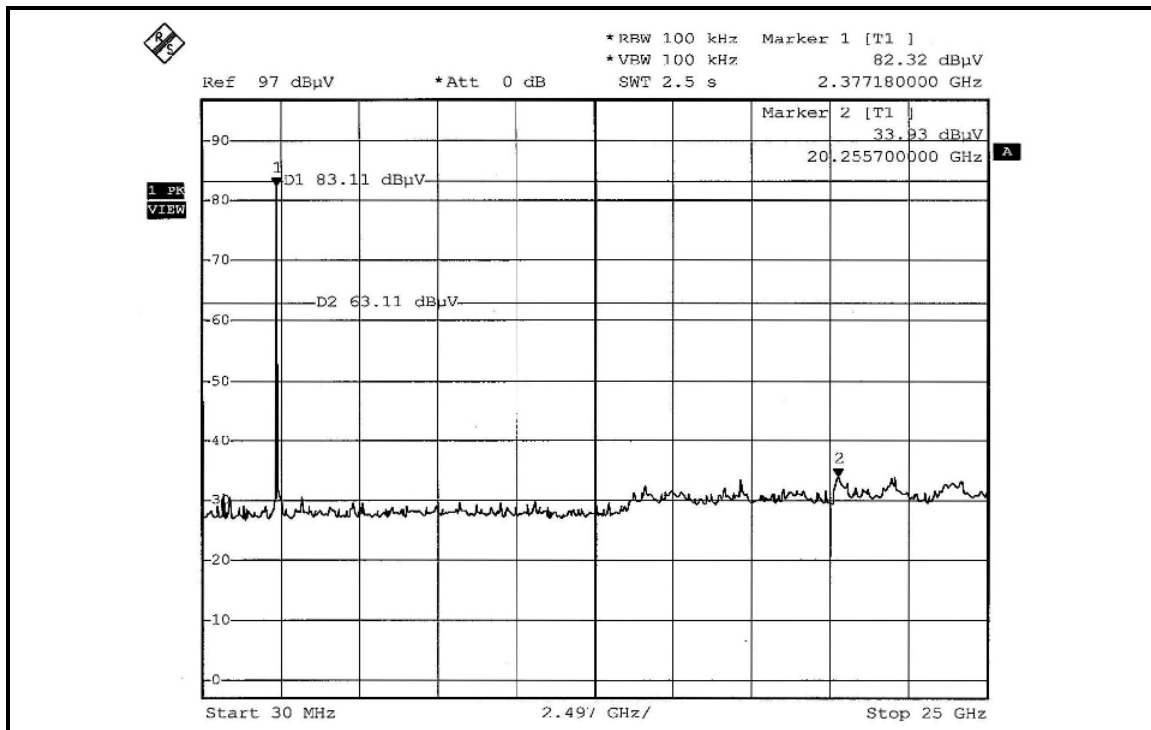
The band edge emission plot of OFDM technique on the next second page shows 50.66dBc between carrier maximum power and local maximum emission in restrict band

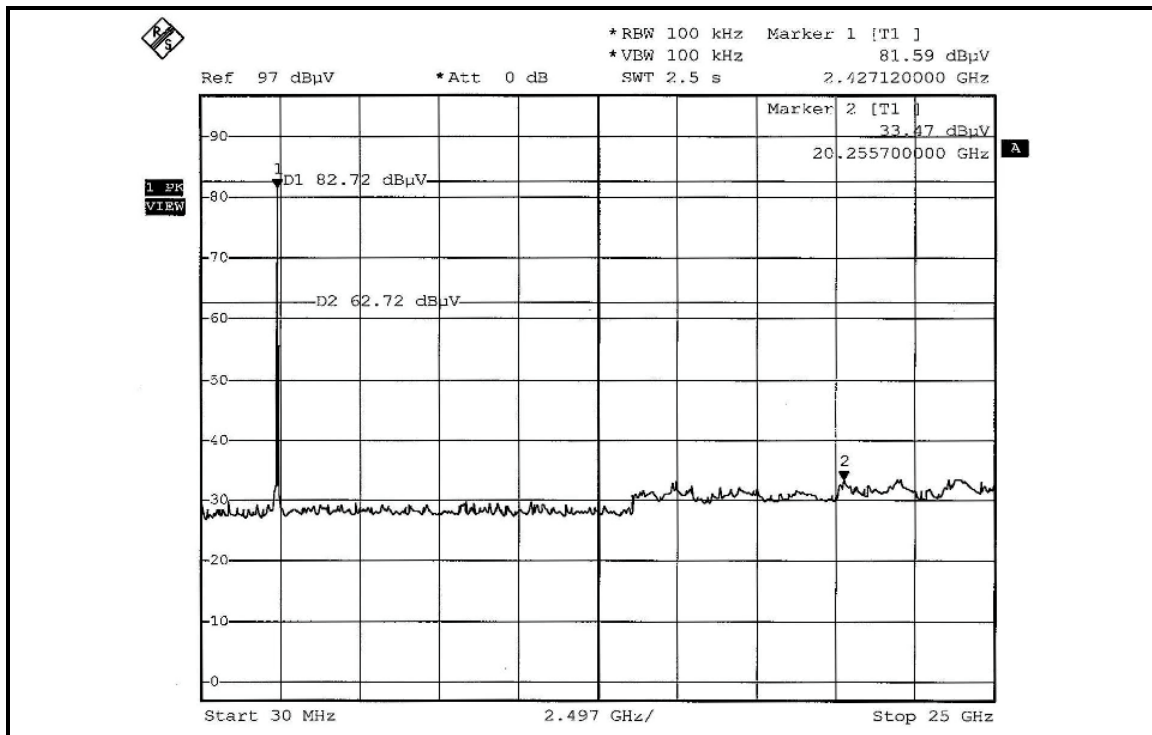
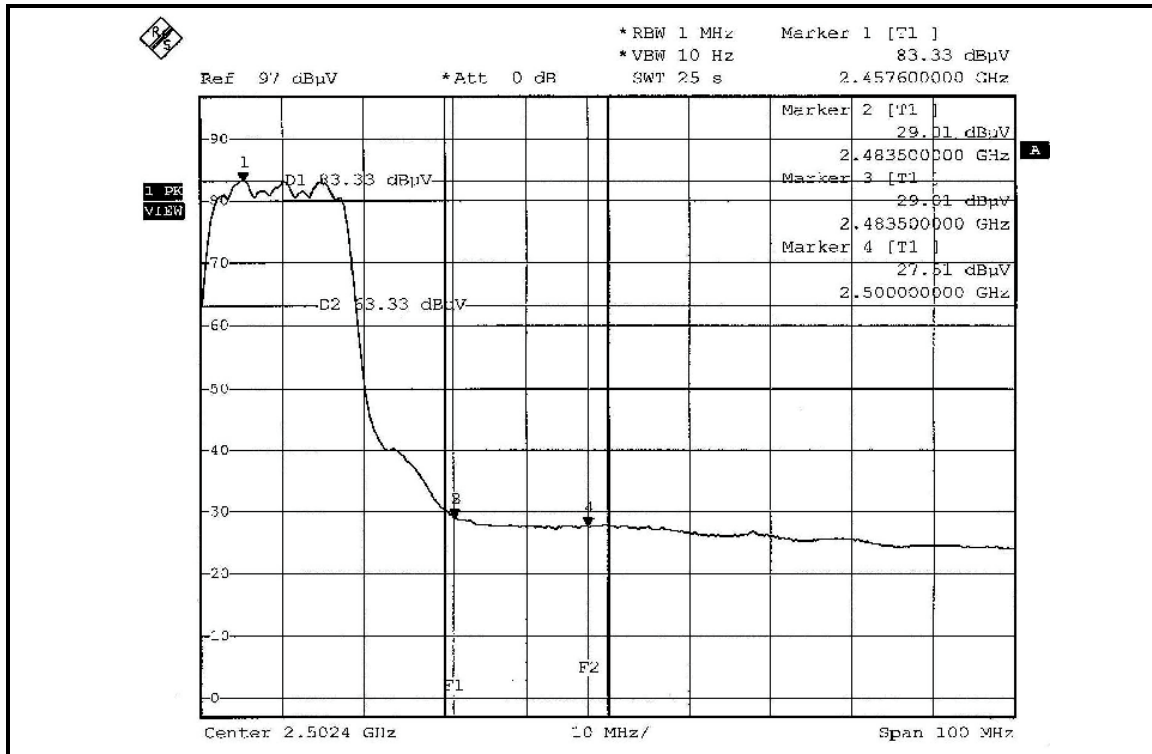
(2.491100000GHz). The emission of carrier strength list in the test result of channel 11 at the item 4.2.7 is 114.05dBuV/m (Peak), so the maximum field strength in restrict band is  $114.05 - 50.66 = 63.39$ dBuV/m which is under 74dBuV/m limit.

The band edge emission plot of OFDM technique on the next third page shows 54.32dBc between carrier maximum power and local maximum emission in restrict band (2.4835GHz).

The emission of carrier strength list in the test result of channel 11 at the item 4.2.7 is 105.01dBuV/m (Average), so the maximum field strength in restrict band is  $105.01 - 54.32 = 50.69$ dBuV/m which is under 54dBuV/m limit.







## **DRAFT 802.11n (20MHz) OFDM MODULATION: TRIPLE TX:**

### **NOTE 1:**

The band edge emission plot of OFDM technique on the next page shows 49.40dBc between carrier maximum power and local maximum emission in restrict band (2.388600000GHz).

The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 113.77dBuV/m (Peak), so the maximum field strength in restrict band is  $113.77 - 49.40 = 64.37$ dBuV/m which is under 74dBuV/m limit.

The band edge emission plot of OFDM technique on the next page shows 52.23dBc between carrier maximum power and local maximum emission in restrict band (2.390000000GHz).

The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 103.85dBuV/m (Average), so the maximum field strength in restrict band is  $103.85 - 52.23 = 51.62$ dBuV/m which is under 54dBuV/m limit.

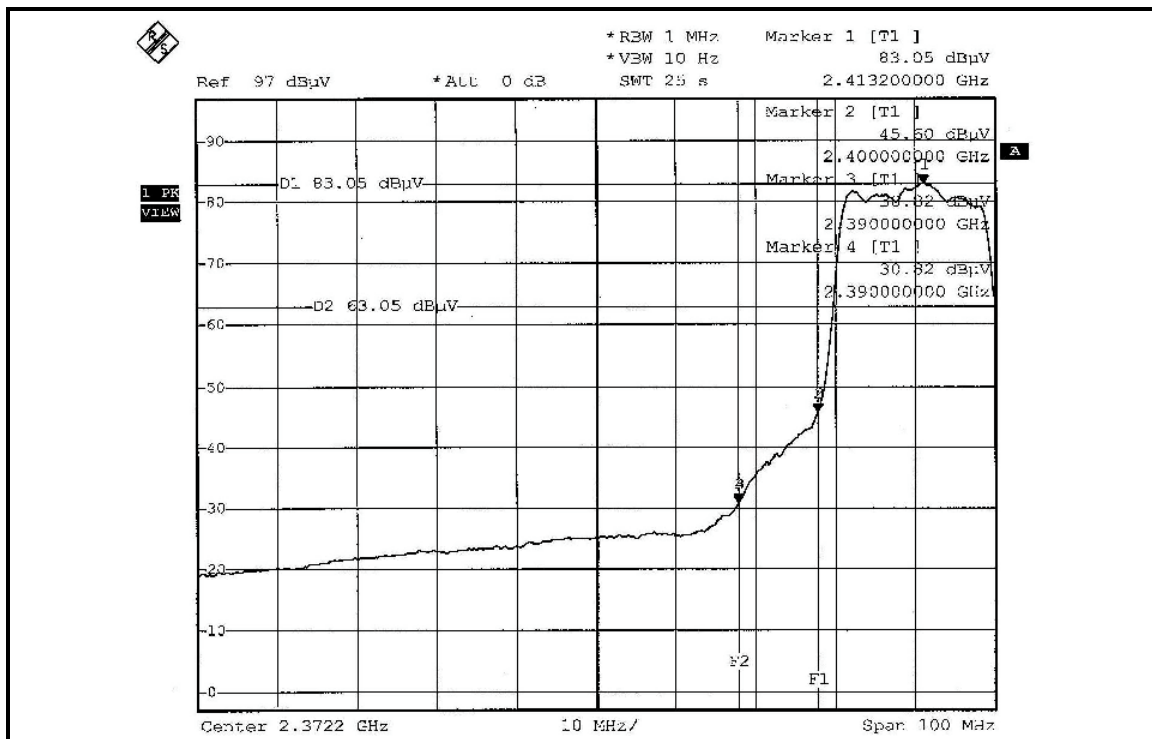
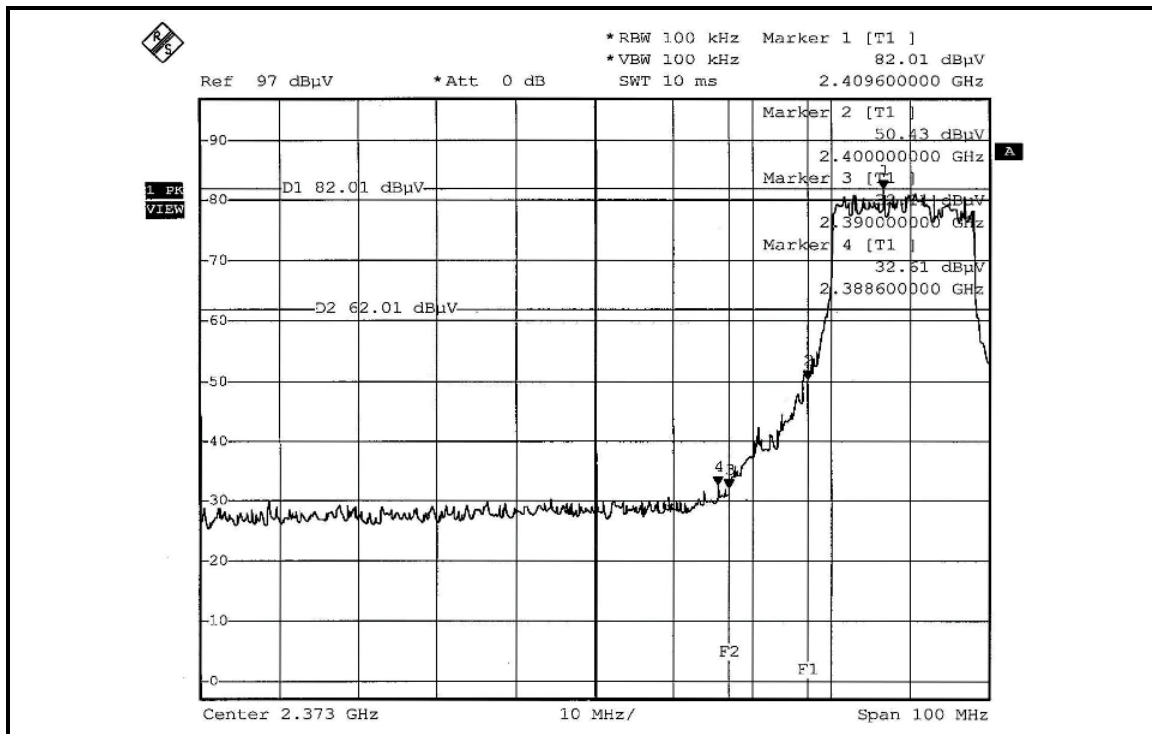
### **NOTE 2:**

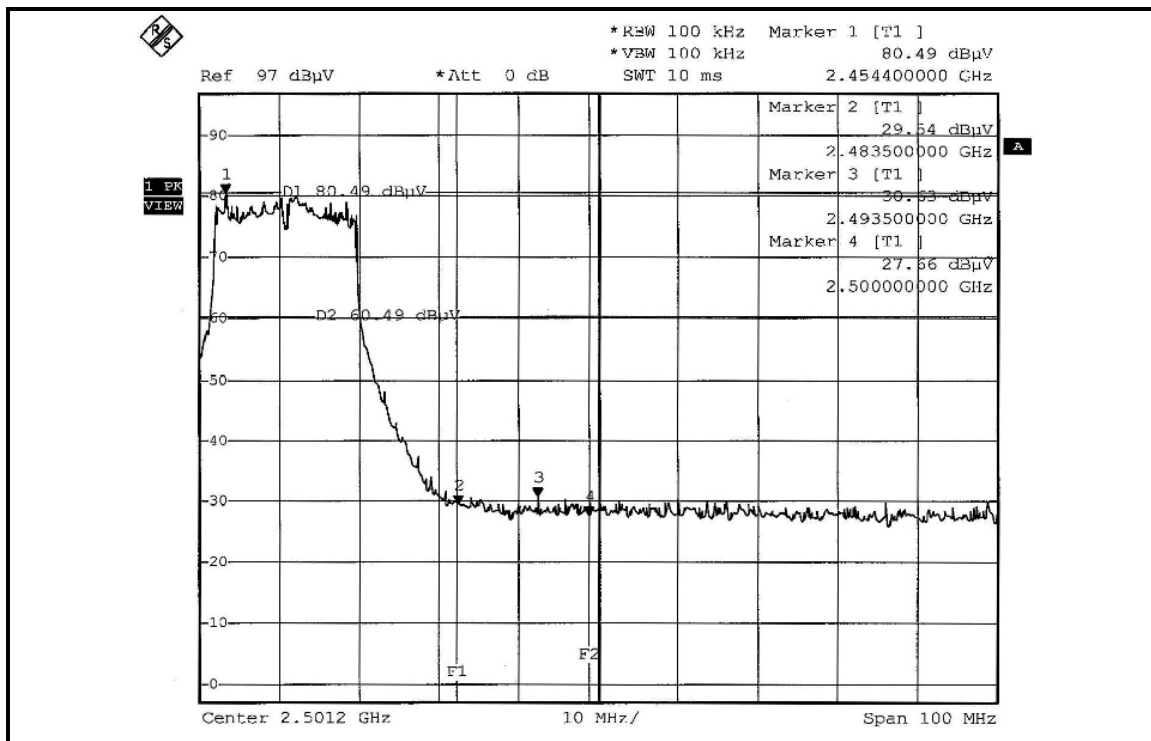
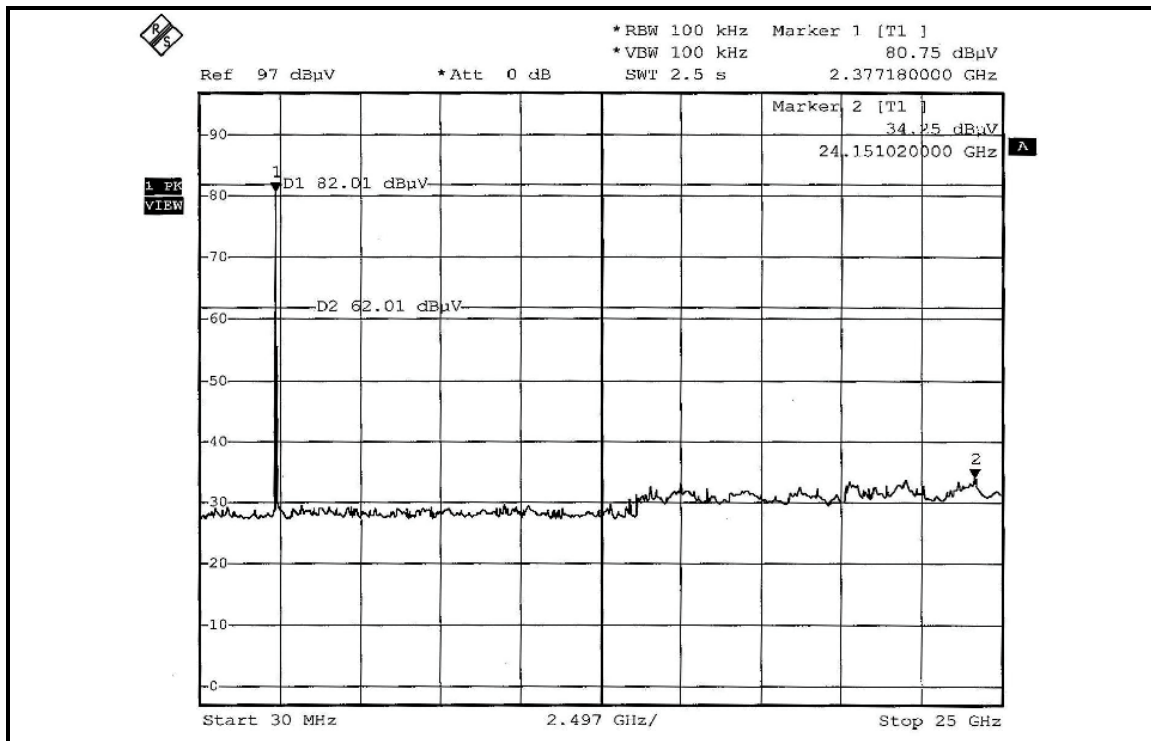
The band edge emission plot of OFDM technique on the next second page shows 49.86dBc between carrier maximum power and local maximum emission in restrict band

(2.493500000GHz). The emission of carrier strength list in the test result of channel 11 at the item 4.2.7 is 113.65dBuV/m (Peak), so the maximum field strength in restrict band is  $113.65 - 49.86 = 63.79$ dBuV/m which is under 74dBuV/m limit.

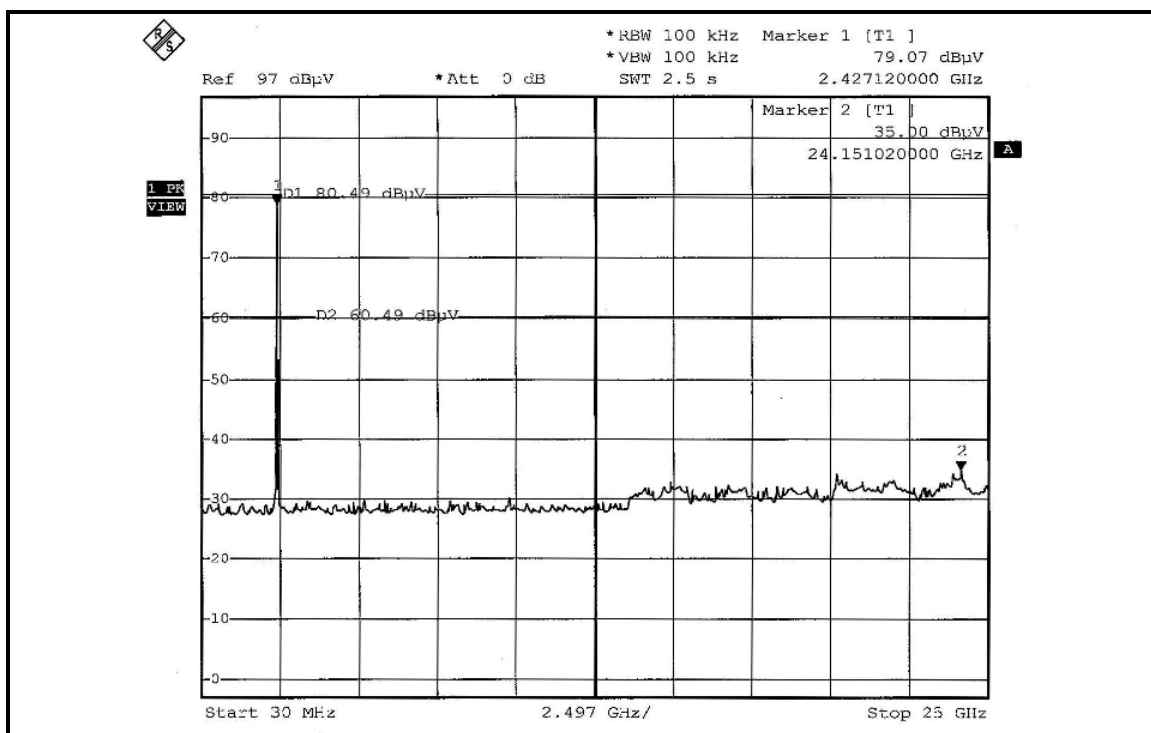
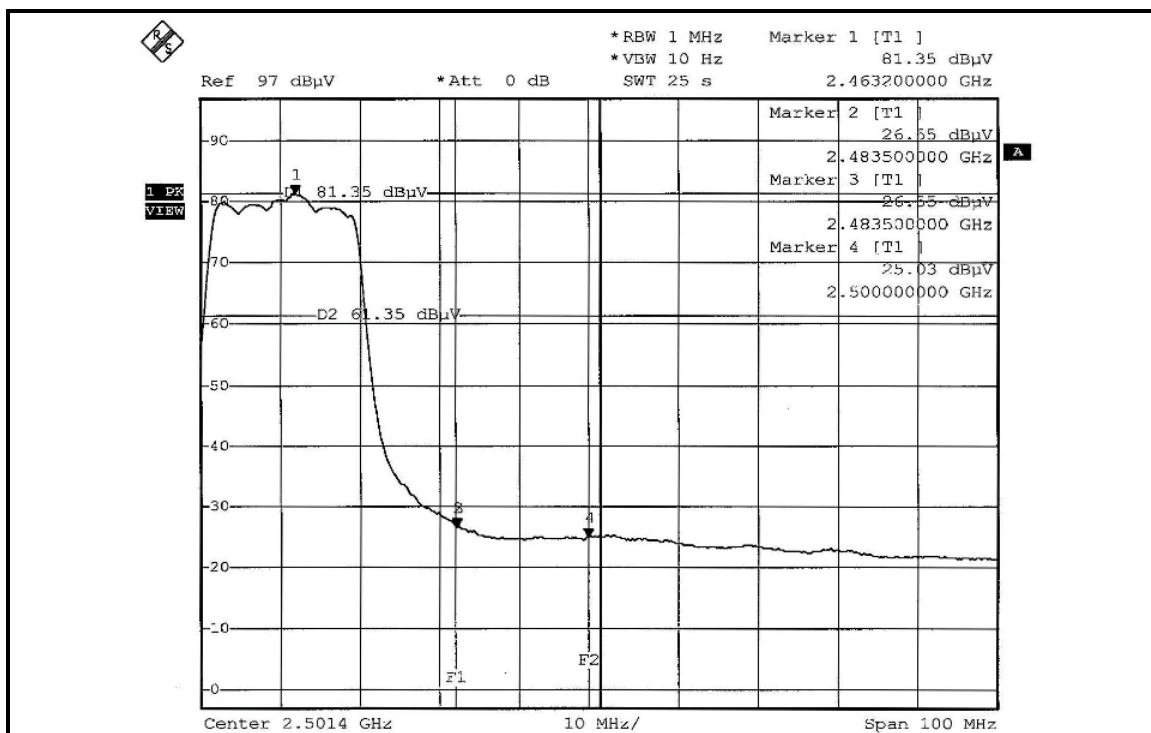
The band edge emission plot of OFDM technique on the next third page shows 54.80dBc between carrier maximum power and local maximum emission in restrict band

(2.483500000GHz). The emission of carrier strength list in the test result of channel 11 at the item 4.2.7 is 103.72dBuV/m (Average), so the maximum field strength in restrict band is  $103.72 - 54.80 = 48.92$ dBuV/m which is under 54dBuV/m limit.









## **DRAFT 802.11n (40MHz) OFDM MODULATION: TRIPLE TX:**

### **NOTE 1:**

The band edge emission plot of OFDM technique on the next page shows 43.28dBc between carrier maximum power and local maximum emission in restrict band (2.390000000GHz).

The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 107.50dBuV/m (Peak), so the maximum field strength in restrict band is  $107.50 - 43.28 = 64.22$ dBuV/m which is under 74dBuV/m limit.

The band edge emission plot of OFDM technique on the next page shows 46.37dBc between carrier maximum power and local maximum emission in restrict band (2.388800000GHz).

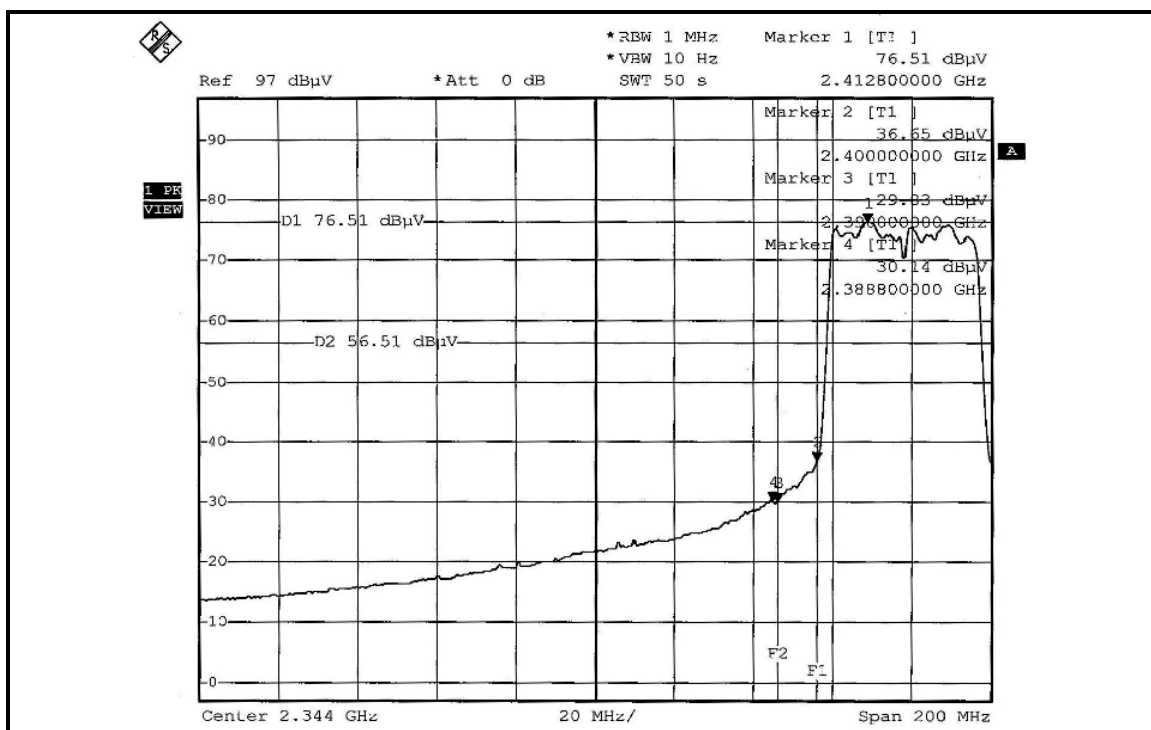
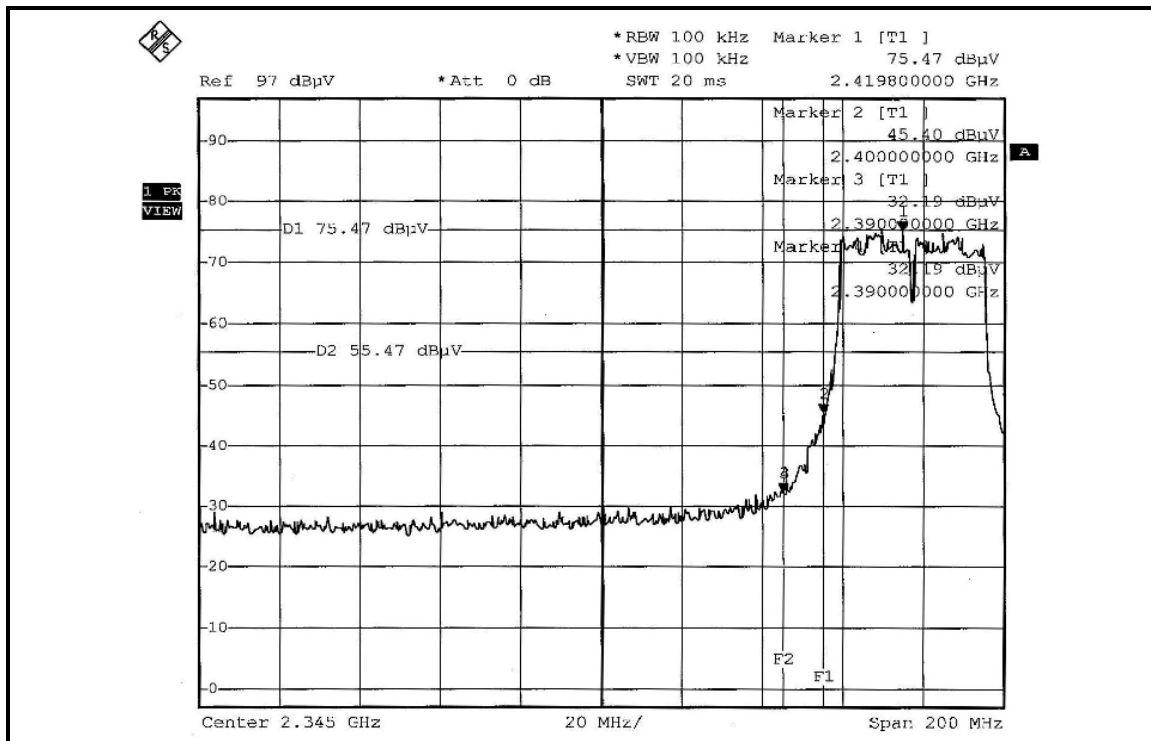
The emission of carrier strength list in the test result of channel 1 at the item 4.2.7 is 98.31dBuV/m (Average), so the maximum field strength in restrict band is  $98.31 - 46.37 = 51.94$ dBuV/m which is under 54dBuV/m limit.

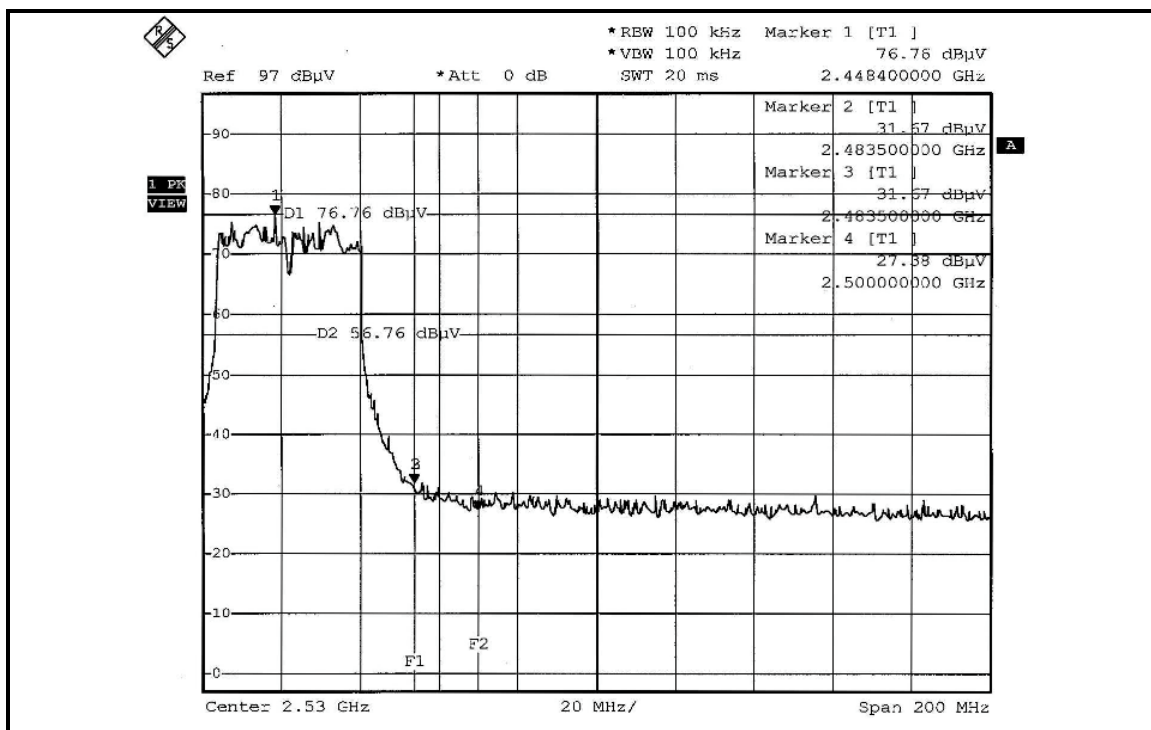
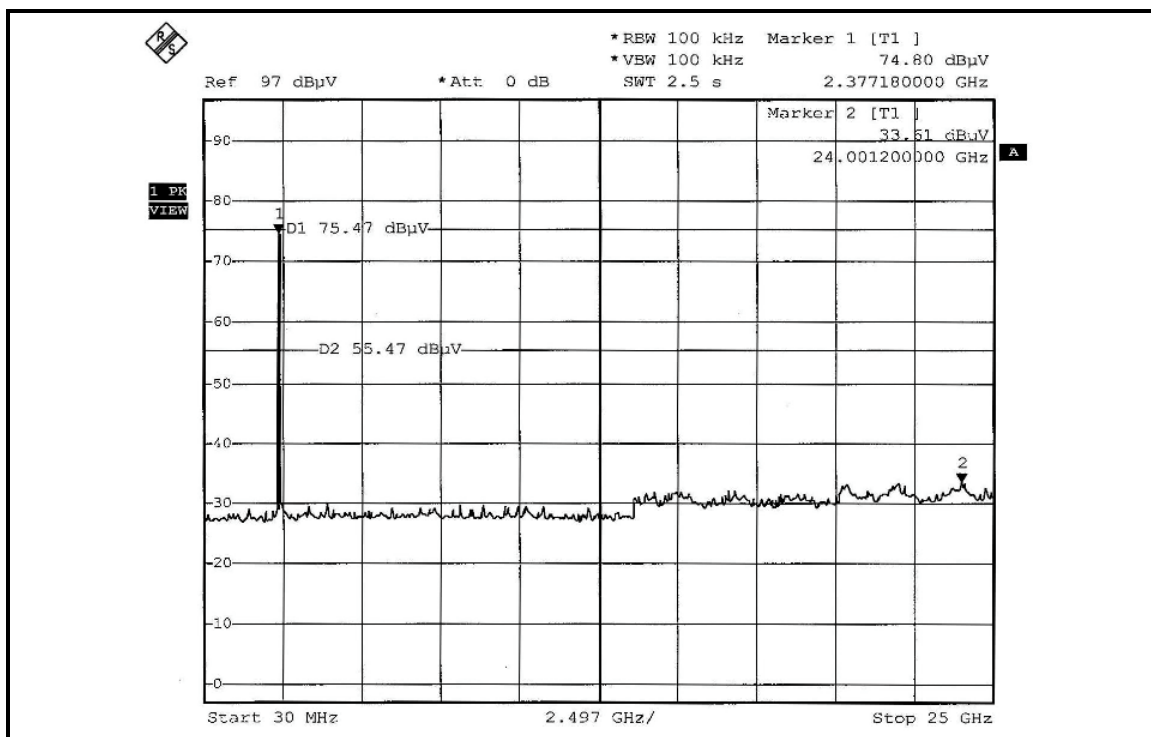
### **NOTE 2:**

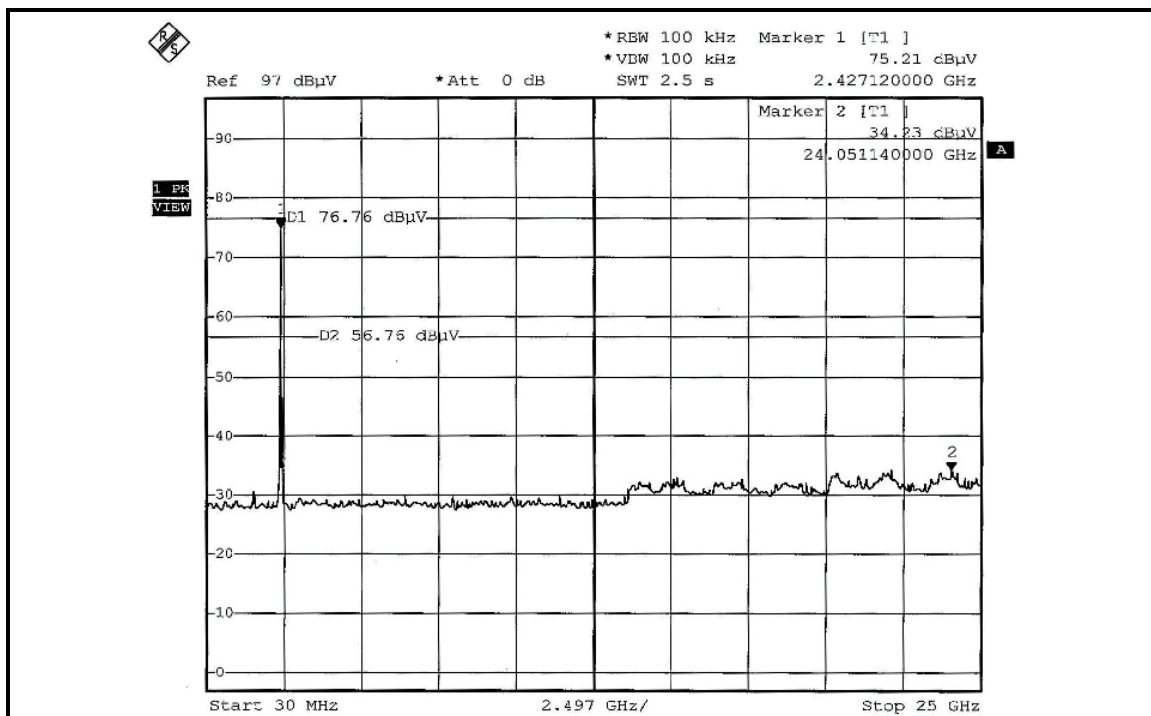
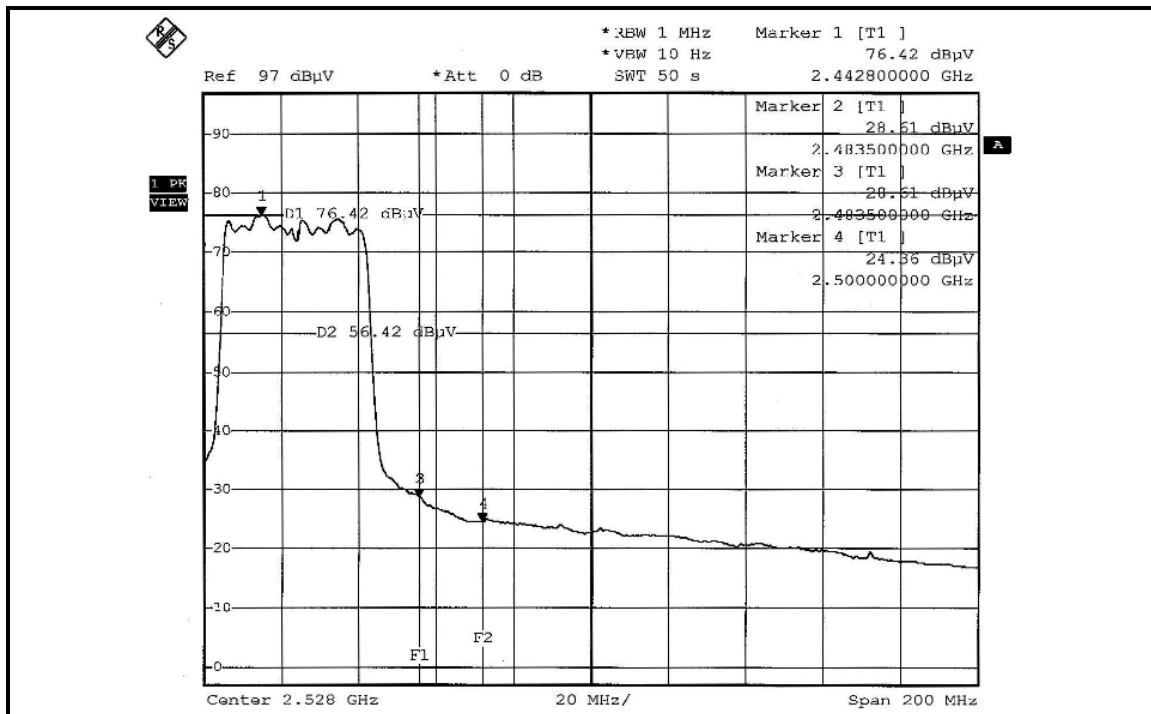
The band edge emission plot of OFDM technique on the next second page shows 45.09dBc between carrier maximum power and local maximum emission in restrict band (2.4835GHz).

The emission of carrier strength list in the test result of channel 7 at the item 4.2.7 is 107.95dBuV/m (Peak), so the maximum field strength in restrict band is  $107.95 - 45.09 = 62.86$ dBuV/m which is under 74dBuV/m limit.

The band edge emission plot of OFDM technique on the next third page shows 47.81dBc between carrier maximum power and local maximum emission in restrict band (2.483500000GHz). The emission of carrier strength list in the test result of channel 7 at the item 4.2.7 is 98.94dBuV/m (Average), so the maximum field strength in restrict band is  $98.94 - 47.81 = 51.13$ dBuV/m which is under 54dBuV/m limit.







## **4.7 ANTENNA REQUIREMENT**

### **4.7.1 STANDARD APPLICABLE**

For intentional device, according to FCC 47 CFR Section 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. And according to FCC 47 CFR Section 15.247 (b), if transmitting antennas of directional gain greater than 6dBi are used, the power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

### **4.7.2 ANTENNA CONNECTED CONSTRUCTION**

The antenna used in this product is Dipole antenna with R-SMA connector. The maximum Gain of the antenna is 2.0dBi.

## 5. INFORMATION ON THE TESTING LABORATORIES

We, ADT Corp., were founded in 1988 to provide our best service in EMC, Radio, Telecom and Safety consultation. Our laboratories are accredited and approved by the following approval agencies according to ISO/IEC 17025.

<b>USA</b>	FCC, UL, A2LA
<b>Germany</b>	TUV Rheinland
<b>Japan</b>	VCCI
<b>Norway</b>	NEMKO
<b>Canada</b>	INDUSTRY CANADA , CSA
<b>R.O.C.</b>	CNLA, BSMI, DGT
<b>Netherlands</b>	Telefication
<b>Singapore</b>	PSB , GOST-ASIA(MOU)
<b>Russia</b>	CERTIS(MOU)

Copies of accreditation certificates of our laboratories obtained from approval agencies can be downloaded from our web site:

[www.adt.com.tw/index.5/phtml](http://www.adt.com.tw/index.5/phtml). If you have any comments, please feel free to contact us at the following:

**Linko EMC/RF Lab:**

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Fax: 886-2-26051924

**Hsin Chu EMC/RF Lab:**

Tel: 886-3-5935343

Fax: 886-3-5935342

**Hwa Ya EMC/RF/Safety Telecom Lab:**

Tel: 886-3-3183232

Fax: 886-3-3185050

**Web Site:** [www.adt.com.tw](http://www.adt.com.tw)

The address and road map of all our labs can be found in our web site also.



## **APPENDIX-A**

### **MODIFICATIONS RECORDERS FOR ENGINEERING CHANGES TO THE EUT BY THE LAB**

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