FCC TEST REPORT

REPORT NO.: RF980204L06

MODEL NO.: Libra 5816 BS

RECEIVED: Feb. 04, 2009

TESTED: Mar. 02 ~ Mar. 05, 2009

ISSUED: Mar. 10, 2009

APPLICANT: GIL Technology Co., Ltd

ADDRESS: 6F., No. 8, Lane 345, Yangguang St., Neihu District, Taipei City 114, Taiwan

ISSUED BY: Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch

LAB ADDRESS: No. 47, 14th Ling, Chia Pau Tsuen, Lin Kou Hsiang, Taipei Hsien 244, Taiwan, R.O.C.

TEST LOCATION: No. 19, Hwa Ya 2nd Rd, Wen Hwa Tsuen, Kwei Shan Hsiang, Taoyuan Hsien 333, Taiwan, R.O.C.

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1. CERTIFICATION

PRODUCT: WiMax Outdoor CPE (N-TYPE)
MODEL: Libra 5816 BS
BRAND: GIL
APPLICANT: GIL Technology Co., Ltd
TESTED: Mar. 02 ~ Mar. 05, 2009
TEST SAMPLE: ENGINEERING SAMPLE
STANDARDS: **FCC Part 15, Subpart C (Section 15.247)**
ANSI C63.4-2003

The above equipment (Model no.: Libra 5816 BS) has been tested by **Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's EMC characteristics under the conditions specified in this report.

PREPARED BY : Andrea Hsia , **DATE:** Mar. 10, 2009
Andrea Hsia / Specialist

TECHNICAL ACCEPTANCE : Long Chen , **DATE:** Mar. 10, 2009
Responsible for RF
Long Chen / Senior Engineer

APPROVED BY : Gary Chang , **DATE:** Mar. 10, 2009
Gary Chang / Assistant Manager

2. SUMMARY OF TEST RESULTS

The EUT has been tested according to the following specifications:

APPLIED STANDARD: FCC PART 15, SUBPART C (SECTION 15.247)			
STANDARD SECTION	**TEST TYPE AND LIMIT**	**RESULT**	**REMARK**
15.207	AC Power Conducted Emission	PASS	Meet the requirement of limit. Minimum passing margin is -18.83dB at 6.947MHz
15.247(a)(2)	Spectrum Bandwidth of a Direct Sequence Spread Spectrum System Limit: min. 500kHz	PASS	Meet the requirement of limit.
15.247(b)	Maximum Peak Output Power Limit: max. 30dBm	PASS	Meet the requirement of limit.
15.247(d)	Radiated Emissions Limit: Table 15.209	PASS	Meet the requirement of limit. Minimum passing margin is -1.08dB at 11685.00MHz
15.247(e)	Power Spectral Density Limit: max. 8dBm	PASS	Meet the requirement of limit.
15.247(d)	Band Edge Measurement Limit: 20dB less than the peak value of fundamental frequency	PASS	Meet the requirement of limit.

2.1 MEASUREMENT UNCERTAINTY

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

MEASUREMENT	FREQUENCY	UNCERTAINTY
Conducted emissions	9kHz~30MHz	2.44 dB
Radiated emissions	30MHz ~ 200MHz	3.34 dB
	200MHz ~1000MHz	3.35 dB
	1GHz ~ 18GHz	2.26 dB
	18GHz ~ 40GHz	1.94 dB

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

3. GENERAL INFORMATION

3.1 GENERAL DESCRIPTION OF EUT

PRODUCT	WiMax Outdoor CPE (N-TYPE)
MODEL NO.	Libra 5816 BS
FCC ID	WRZGILBS
POWER SUPPLY	56Vdc from POE
MODULATION TYPE	BPSK, QPSK, 16QAM, 64QAM (refer to NOTE for more details)
CODING RATE	1/2, 2/3, 3/4 (refer to NOTE for more details)
MODULATION TECHNOLOGY	OFDM
DUPLEX METHOD	TDD
FREQUENCY RANGE	5729.0 ~ 5846.0MHz
CHANNEL BANDWIDTH	5MHz, 10MHz, 15MHz, 20MHz
OUTPUT POWER	319.154mW
ANTENNA TYPE	Sector antenna with 16.5dBi gain
OPERATION TEMPERATURE RANGE	-40°C ~ 70°C
DATA CABLE	1.5m shielded RJ45 cable without core
I/O PORTS	RJ45
ACCESSORY DEVICES	POE

NOTE:

1. The EUT was powered by the following POE:

BRAND:	PHIHONG
MODEL:	POE30U-560(G)
INPUT:	100-240Vac, 50-60Hz, 0.95A
OUTPUT:	56Vdc, 0.55A
POWER LINE:	AC: 1.8 m non-shielded without core

2. For the EUT with modulation type and coding rate. After pre-testing in test items of output power and spurious emissions, BPSK was found to be worst case and was selected for the final test configuration.

DOWN LINK		**UP LINK**	
MODULATION	**CODING RATE**	**MODULATION**	**CODING RATE**
BPSK	1/2	BPSK	1/2
QPSK	1/2	QPSK	1/2
	3/4		3/4
16QAM	1/2	16QAM	1/2
	3/4		3/4
64QAM	2/3	64QAM	2/3
	3/4		3/4

3. EUT can supports different duty cycle of transmission, max duty cycle is up to 75%. After pretesting of output power and spurious emission, 75 % duty cycle was found to be worst case and was selected for the final test configuration.

4. The above EUT information was declared by manufacturer and for more detailed features description, please refer to the manufacturer's specifications or user's manual.

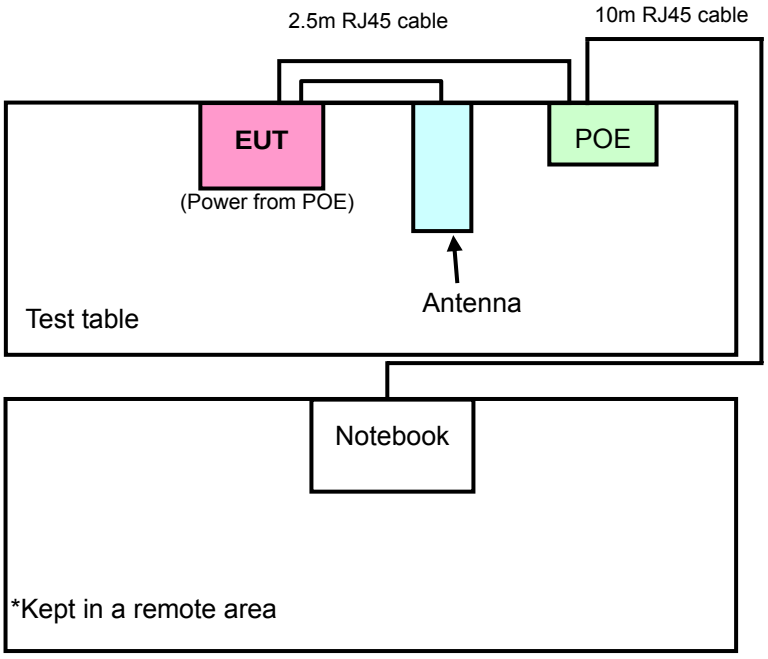
3.2 DESCRIPTION OF TEST MODES

3 channels had been tested for each channel bandwidth.

CHANNEL BANDWIDTH: 5MHz	CHANNEL BANDWIDTH: 10MHz
Low channel (L): 5729.0MHz.	**Low channel (L)**: 5732.5MHz.
Middle channel (M): 5788.0MHz.	**Middle channel (M)**: 5788.0MHz.
High channel (H): 5846.0MHz.	**High channel (H)**: 5842.5MHz.

CHANNEL BANDWIDTH: 15MHz	CHANNEL BANDWIDTH: 20MHz
Low channel (L): 5734.0MHz.	**Low channel (L)**: 5736.5MHz.
Middle channel (M): 5788.0MHz.	**Middle channel (M)**: 5788.0MHz.
High channel (H): 5841.0MHz.	**High channel (H)**: 5838.5MHz.

3.2.1 CONFIGURATION OF SYSTEM UNDER TEST



3.2.2 TEST MODE APPLICABILITY AND TESTED CHANNEL DETAIL

EUT CONFIGURE MODE	APPLICABLE TO				DESCRIPTION
	RE≥1G	RE<1G	PLC	APCM	
A	√	√	√	√	Channel bandwidth: 5MHz
B	√	√	√	√	Channel bandwidth: 10MHz
C	√	√	√	√	Channel bandwidth: 15MHz
D	√	√	√	√	Channel bandwidth: 20MHz

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

PLC: Power Line Conducted Emission **APCM:** Antenna Port Conducted Measurement

RADIATED EMISSION TEST (ABOVE 1GHz):

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

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

EUT CONFIGURE MODE	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	CHANNEL BANDWIDTH	CODING RATE
A	L, M, H	OFDM	BPSK	5MHz	1/2
B	L, M, H	OFDM	BPSK	10MHz	1/2
C	L, M, H	OFDM	BPSK	15MHz	1/2
D	L, M, H	OFDM	BPSK	20MHz	1/2

RADIATED EMISSION TEST (BELOW 1GHz):

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

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

EUT CONFIGURE MODE	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	CHANNEL BANDWIDTH	CODING RATE
A	H	OFDM	BPSK	5MHz	1/2
B	H	OFDM	BPSK	10MHz	1/2
C	H	OFDM	BPSK	15MHz	1/2
D	H	OFDM	BPSK	20MHz	1/2

POWER LINE CONDUCTED EMISSION TEST:

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

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

EUT CONFIGURE MODE	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	CHANNEL BANDWIDTH	CODING RATE
A	H	OFDM	BPSK	5MHz	1/2
B	H	OFDM	BPSK	10MHz	1/2
C	H	OFDM	BPSK	15MHz	1/2
D	H	OFDM	BPSK	20MHz	1/2

BANDEDGE MEASUREMENT:

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

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

EUT CONFIGURE MODE	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	CHANNEL BANDWIDTH	CODING RATE
A	L, H	OFDM	BPSK	5MHz	1/2
B	L, H	OFDM	BPSK	10MHz	1/2
C	L, H	OFDM	BPSK	15MHz	1/2
D	L, H	OFDM	BPSK	20MHz	1/2

ANTENNA PORT CONDUCTED MEASUREMENT:

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

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

EUT CONFIGURE MODE	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	CHANNEL BANDWIDTH	CODING RATE
A	L, M, H	OFDM	BPSK	5MHz	1/2
B	L, M, H	OFDM	BPSK	10MHz	1/2
C	L, M, H	OFDM	BPSK	15MHz	1/2
D	L, M, H	OFDM	BPSK	20MHz	1/2

3.3 GENERAL DESCRIPTION OF APPLIED STANDARDS

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

FCC Part 15, Subpart C (15.247)
ANSI C63.4-2003

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

NOTE: The EUT is also considered as a kind of computer peripheral, because the connection to computer is necessary for typical use. It has been verified to comply with the requirements of FCC Part 15, Subpart B, Class B (DoC). The test report has been issued separately.

3.4 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.

NO.	PRODUCT	BRAND	MODEL NO.	SERIAL NO.	FCC ID
1	NOTEBOOK	DELL	PP05L	12130898320	E2K24CLNS

NO.	SIGNAL CABLE DESCRIPTION OF THE ABOVE SUPPORT UNITS
1	10m RJ45 cable

NOTE: All power cords of the above support units are non shielded (1.8m).

4. TEST TYPES AND RESULTS

4.1 RADIATED EMISSION MEASUREMENT

4.1.1 LIMITS OF RADIATED EMISSION MEASUREMENT

Emissions radiated outside of the specified bands, shall be according to the general radiated limits in 15.209 as following:

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

NOTE:

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

4.1.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	DUE DATE OF CALIBRATION
Test Receiver ROHDE & SCHWARZ	ESI7	838496/016	Dec. 29, 2008	Dec. 28, 2009
Spectrum Analyzer ROHDE & SCHWARZ	FSP40	100039	Dec. 08, 2008	Dec. 07, 2009
BILOG Antenna SCHWARZBECK	VULB9168	9168-155	Apr. 30, 2008	Apr. 29, 2009
HORN Antenna SCHWARZBECK	BBHA 9120D	9120D-408	Dec. 29, 2008	Dec. 28, 2009
HORN Antenna SCHWARZBECK	BBHA 9170	BBHA9170242	Jan. 06, 2009	Jan. 05, 2010
Preamplifier Agilent	8449B	3008A01960	Nov. 03, 2008	Nov. 02, 2009
Preamplifier Agilent	8447D	2944A10631	Nov. 03, 2008	Nov. 02, 2009
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	274041/4	Aug. 21, 2008	Aug. 20, 2009
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	283397/4	Aug. 21, 2008	Aug. 20, 2009
Software ADT.	ADT_Radiated_ V7.6.15.9.2	NA	NA	NA
Antenna Tower inn-co GmbH	MA 4000	010303	NA	NA
Antenna Tower Controller inn-co GmbH	CO2000	019303	NA	NA
Turn Table ADT.	TT100.	TT93021704	NA	NA
Turn Table Controller ADT.	SC100.	SC93021704	NA	NA

NOTE: 1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

2. The test was performed in HwaYa Chamber 4.

3. The horn antenna and HP preamplifier (model: 8449B) are used only for the measurement of emission frequency above 1GHz if tested.

4. The FCC Site Registration No. is 988962.

5. The IC Site Registration No. is IC7450F-4.

4.1.3 TEST PROCEDURES

a. The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meters semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.

b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.

c. The antenna is a broadband antenna, and its height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.

d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.

e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.

f. If the emission level of the EUT in peak mode was lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet.

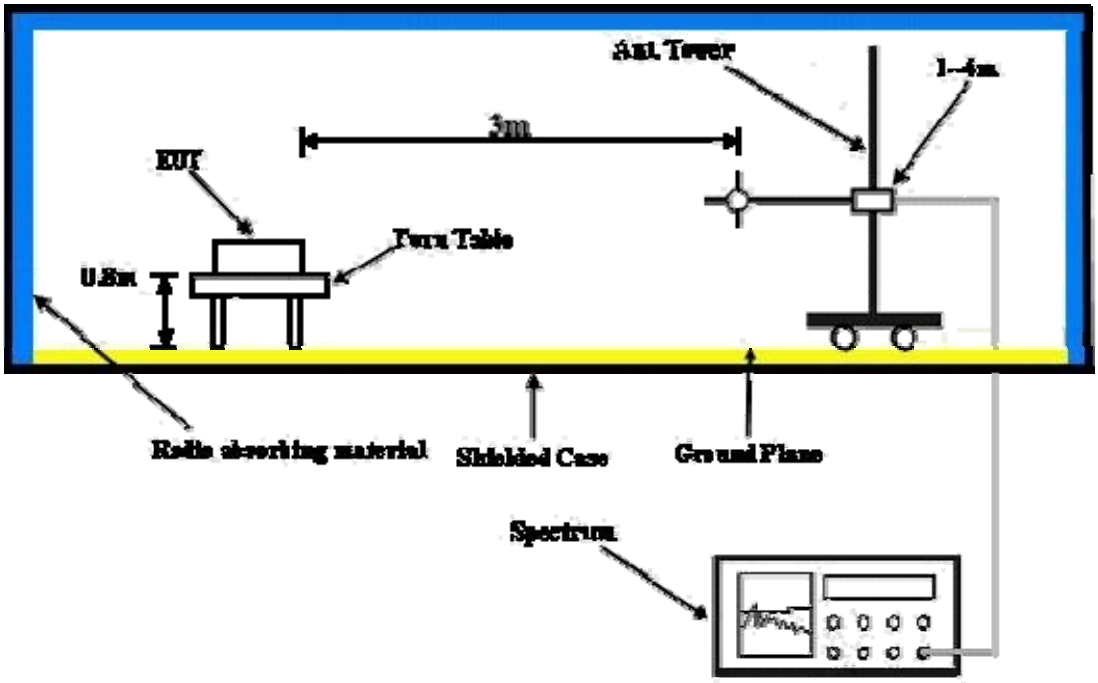
NOTE:

1. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 120kHz for Quasi-peak detection at frequency below 1GHz.
2. The resolution bandwidth of test receiver/spectrum analyzer is 100kHz and video bandwidth is 300kHz for Peak detection at frequency above 1GHz.
3. The resolution bandwidth of test receiver/spectrum analyzer is 1MHz and the video bandwidth is 10Hz for Average detection (AV) at frequency above 1GHz.
4. All modes of operation were investigated and the worst-case emissions are reported.

4.1.4 DEVIATION FROM TEST STANDARD

No deviation

4.1.5 TEST SETUP



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

4.1.6 EUT OPERATING CONDITIONS

a. Placed the EUT on a testing table.

b. Prepared a notebook computer and placed it outside of testing area to act as communication partner for EUT.

c. The EUT ran a test program (provided by manufacturer) to enable all functions under transmission condition continuously at specific channel frequency.

d. The necessary accessories enable the EUT in full functions.

4.1.7 TEST RESULTS

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Low channel: 5729.0MHz	**FREQUENCY RANGE**	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	**DETECTOR FUNCTION**	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	**TEST MODE**	A
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4583.10	51.63 PK	74.00	-22.37	1.10 H	56	13.65	37.98
2	4583.10	45.60 AV	54.00	-8.40	1.10 H	56	7.62	37.98
3	#5725.00	72.25 PK	95.92	-23.67	1.49 H	39	32.22	40.03
4	#5725.00	61.67 AV	85.34	-23.67	1.49 H	39	21.64	40.03
5	*5729.00	115.92 PK			1.49 H	39	75.88	40.04
6	*5729.00	105.34 AV			1.49 H	39	65.30	40.04
7	11458.00	65.26 PK	74.00	-8.74	1.00 H	360	14.12	51.14
8	11458.00	52.26 AV	54.00	-1.74	1.00 H	360	1.12	51.14
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4583.10	49.47 PK	74.00	-24.53	1.07 V	55	11.49	37.98
2	4583.10	40.09 AV	54.00	-13.91	1.07 V	55	2.11	37.98
3	#5725.00	82.03 PK	105.70	-23.67	1.29 V	23	42.00	40.03
4	#5725.00	71.55 AV	95.22	-23.67	1.29 V	23	31.52	40.03
5	*5729.00	125.70 PK			1.29 V	23	85.66	40.04
6	*5729.00	115.22 AV			1.29 V	23	75.18	40.04
7	11458.00	65.27 PK	74.00	-8.73	1.23 V	2	14.13	51.14
8	11458.00	52.83 AV	54.00	-1.17	1.23 V	2	1.69	51.14

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.
7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Mid. channel: 5788.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	A
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.00	52.53 PK	74.00	-21.47	1.07 H	52	14.44	38.09
2	4630.00	46.19 AV	54.00	-7.81	1.07 H	52	8.10	38.09
3	*5788.00	118.25 PK			1.50 H	40	78.09	40.16
4	*5788.00	107.93 AV			1.50 H	40	67.77	40.16
5	11576.00	63.62 PK	74.00	-10.38	1.41 H	303	12.59	51.02
6	11576.00	51.56 AV	54.00	-2.44	1.41 H	303	0.53	51.02
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.00	52.39 PK	74.00	-21.61	1.08 V	343	14.30	38.09
2	4630.00	45.70 AV	54.00	-8.30	1.08 V	343	7.61	38.09
3	*5788.00	127.61 PK			1.27 V	13	87.45	40.16
4	*5788.00	117.12 AV			1.27 V	13	76.96	40.16
5	11576.00	62.80 PK	74.00	-11.20	1.00 V	8	11.78	51.02
6	11576.00	51.94 AV	54.00	-2.06	1.00 V	8	0.92	51.02

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5846.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	A
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4583.10	52.43 PK	74.00	-21.57	1.00 H	57	14.45	37.98
2	4583.10	45.71 AV	54.00	-8.29	1.00 H	57	7.73	37.98
3	*5846.00	119.13 PK			1.48 H	40	78.84	40.29
4	*5846.00	109.99 AV			1.48 H	40	69.70	40.29
5	#5850.00	72.93 PK	99.13	-26.20	1.48 H	40	32.63	40.30
6	#5850.00	63.79 AV	89.99	-26.20	1.48 H	40	23.49	40.30
7	11692.00	67.34 PK	74.00	-6.66	1.48 H	51	16.52	50.81
8	11692.00	52.91 AV	54.00	-1.09	1.48 H	51	2.09	50.81
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4583.10	52.17 PK	74.00	-21.83	1.10 V	343	14.19	37.98
2	4583.10	46.14 AV	54.00	-7.86	1.10 V	343	8.16	37.98
3	*5846.00	129.83 PK			1.32 V	15	89.54	40.29
4	*5846.00	119.33 AV			1.32 V	15	79.04	40.29
5	#5850.00	83.63 PK	109.83	-26.20	1.32 V	15	43.33	40.30
6	#5850.00	73.13 AV	99.33	-26.20	1.32 V	15	32.83	40.30
7	11692.00	63.35 PK	74.00	-10.65	1.07 V	23	12.53	50.81
8	11692.00	52.84 AV	54.00	-1.16	1.07 V	23	2.03	50.81

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Low channel: 5732.5MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	B
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4586.00	47.76 PK	74.00	-26.24	1.04 H	118	9.77	37.99
2	4586.00	35.86 AV	54.00	-18.14	1.04 H	118	-2.13	37.99
3	#5725.00	69.99 PK	93.86	-23.87	1.56 H	352	29.96	40.03
4	#5725.00	58.55 AV	82.42	-23.87	1.56 H	352	18.52	40.03
5	*5732.50	113.86 PK			1.56 H	352	73.81	40.05
6	*5732.50	102.42 AV			1.56 H	352	62.37	40.05
7	11465.00	62.25 PK	74.00	-11.75	1.00 H	31	11.11	51.14
8	11465.00	49.10 AV	54.00	-4.90	1.00 H	31	-2.04	51.14
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4586.00	51.02 PK	74.00	-22.98	1.27 V	1	13.03	37.99
2	4586.00	40.57 AV	54.00	-13.43	1.27 V	1	2.58	37.99
3	#5725.00	79.85 PK	103.72	-23.87	1.24 V	13	39.82	40.03
4	#5725.00	68.87 AV	92.74	-23.87	1.24 V	13	28.84	40.03
5	*5732.50	123.72 PK			1.24 V	13	83.67	40.05
6	*5732.50	112.74 AV			1.24 V	13	72.69	40.05
7	11465.00	64.85 PK	74.00	-9.15	1.00 V	108	13.71	51.14
8	11465.00	51.82 AV	54.00	-2.18	1.00 V	108	0.68	51.14

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.
7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Mid. channel: 5788.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	B
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	48.14 PK	74.00	-25.86	1.02 H	33	10.05	38.09
2	4630.40	36.00 AV	54.00	-18.00	1.02 H	33	-2.09	38.09
3	*5788.00	115.06 PK			1.53 H	352	74.90	40.16
4	*5788.00	104.73 AV			1.53 H	352	64.57	40.16
5	11576.00	62.37 PK	74.00	-11.63	1.02 H	89	11.34	51.02
6	11576.00	49.63 AV	54.00	-4.37	1.02 H	89	-1.40	51.02
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	50.16 PK	74.00	-23.84	1.24 V	29	12.07	38.09
2	4630.40	40.13 AV	54.00	-13.87	1.24 V	29	2.04	38.09
3	*5788.00	124.46 PK			1.28 V	14	84.30	40.16
4	*5788.00	113.82 AV			1.28 V	14	73.66	40.16
5	11576.00	65.59 PK	74.00	-8.41	1.14 V	10	14.56	51.02
6	11576.00	52.10 AV	54.00	-1.90	1.14 V	10	1.07	51.02

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5842.5MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	B
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4674.00	48.86 PK	74.00	-25.14	1.02 H	49	10.66	38.20
2	4674.00	36.41 AV	54.00	-17.59	1.02 H	49	-1.79	38.20
3	*5842.50	117.81 PK			1.51 H	357	77.53	40.28
4	*5842.50	106.64 AV			1.51 H	357	66.36	40.28
5	#5850.00	82.01 PK	97.81	-15.80	1.51 H	357	41.71	40.30
6	#5850.00	70.84 AV	86.64	-15.80	1.51 H	357	30.54	40.30
7	11685.00	65.40 PK	74.00	-8.60	1.06 H	319	14.57	50.83
8	**11685.00**	**52.92 AV**	**54.00**	**-1.08**	**1.06 H**	**319**	**2.09**	**50.83**
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4674.00	51.08 PK	74.00	-22.92	1.24 V	14	12.88	38.20
2	4674.00	41.46 AV	54.00	-12.54	1.24 V	14	3.26	38.20
3	*5842.50	127.65 PK			1.27 V	10	87.37	40.28
4	*5842.50	116.33 AV			1.27 V	10	76.05	40.28
5	#5850.00	91.85 PK	107.65	-15.80	1.27 V	10	51.55	40.30
6	#5850.00	80.53 AV	96.33	-15.80	1.27 V	10	40.23	40.30
7	11685.00	61.08 PK	74.00	-12.92	1.02 V	141	10.25	50.83
8	11685.00	48.88 AV	54.00	-5.12	1.02 V	141	-1.95	50.83

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Low channel: 5734.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	C
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4587.20	48.29 PK	74.00	-25.71	1.08 H	282	10.30	37.99
2	4587.20	37.21 AV	54.00	-16.79	1.08 H	282	-0.78	37.99
3	#5725.00	79.10 PK	93.90	-14.80	1.52 H	36	39.07	40.03
4	#5725.00	67.01 AV	81.81	-14.80	1.52 H	36	26.98	40.03
5	*5734.00	113.90 PK			1.52 H	36	73.85	40.05
6	*5734.00	101.81 AV			1.52 H	36	61.76	40.05
7	11468.00	61.41 PK	74.00	-12.59	1.04 H	126	10.27	51.14
8	11468.00	49.90 AV	54.00	-4.10	1.04 H	126	-1.24	51.14
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4587.20	50.27 PK	74.00	-23.73	1.28 V	22	12.28	37.99
2	4587.20	40.76 AV	54.00	-13.24	1.28 V	22	2.77	37.99
3	#5725.00	88.61 PK	103.41	-14.80	1.23 V	15	48.58	40.03
4	#5725.00	77.09 AV	91.89	-14.80	1.23 V	15	37.06	40.03
5	*5734.00	123.41 PK			1.23 V	15	83.36	40.05
6	*5734.00	111.89 AV			1.23 V	15	71.84	40.05
7	11468.00	63.06 PK	74.00	-10.94	1.00 V	35	11.92	51.14
8	11468.00	51.61 AV	54.00	-2.39	1.00 V	35	0.47	51.14

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Mid. channel: 5788.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	C
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	48.08 PK	74.00	-25.92	1.00 H	30	9.99	38.09
2	4630.40	36.36 AV	54.00	-17.64	1.00 H	30	-1.73	38.09
3	*5788.00	114.88 PK			1.51 H	41	74.72	40.16
4	*5788.00	103.51 AV			1.51 H	41	63.35	40.16
5	11576.00	62.19 PK	74.00	-11.81	1.00 H	23	11.16	51.02
6	11576.00	49.47 AV	54.00	-4.53	1.00 H	23	-1.56	51.02
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	50.52 PK	74.00	-23.48	1.11 V	32	12.43	38.09
2	4630.40	41.48 AV	54.00	-12.52	1.11 V	32	3.39	38.09
3	*5788.00	124.38 PK			1.26 V	24	84.22	40.16
4	*5788.00	113.31 AV			1.26 V	24	73.15	40.16
5	11576.00	62.91 PK	74.00	-11.09	1.03 V	218	11.89	51.02
6	11576.00	51.35 AV	54.00	-2.65	1.03 V	218	0.33	51.02

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5841.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	C
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4672.80	48.34 PK	74.00	-25.66	1.00 H	298	10.15	38.19
2	4672.80	36.98 AV	54.00	-17.02	1.00 H	298	-1.21	38.19
3	*5841.00	116.82 PK			1.50 H	36	76.54	40.28
4	*5841.00	104.59 AV			1.50 H	36	64.31	40.28
5	#5850.00	79.98 PK	96.82	-16.84	1.50 H	36	39.68	40.30
6	#5850.00	67.75 AV	84.59	-16.84	1.50 H	36	27.45	40.30
7	11684.00	63.39 PK	74.00	-10.61	1.00 H	49	12.56	50.83
8	11684.00	51.78 AV	54.00	-2.22	1.00 H	49	0.95	50.83
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4672.80	51.52 PK	74.00	-22.48	1.22 V	15	13.32	38.19
2	4672.80	40.79 AV	54.00	-13.21	1.22 V	15	2.59	38.19
3	*5841.00	126.31 PK			1.30 V	13	86.03	40.28
4	*5841.00	114.90 AV			1.30 V	13	74.62	40.28
5	#5850.00	89.47 PK	106.31	-16.84	1.30 V	13	49.17	40.30
6	#5850.00	78.06 AV	94.90	-16.84	1.30 V	13	37.76	40.30
7	11684.00	65.97 PK	74.00	-8.03	1.00 V	33	15.14	50.83
8	11684.00	52.85 AV	54.00	-1.15	1.00 V	33	2.02	50.83

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Low channel: 5736.5MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	D
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4589.20	47.98 PK	74.00	-26.02	1.00 H	31	9.99	38.00
2	4589.20	36.19 AV	54.00	-17.81	1.00 H	31	-1.80	38.00
3	#5725.00	78.66 PK	93.62	-14.96	1.52 H	33	38.63	40.03
4	#5725.00	67.47 AV	82.43	-14.96	1.52 H	33	27.44	40.03
5	*5736.50	113.62 PK			1.52 H	33	73.56	40.06
6	*5736.50	102.43 AV			1.52 H	33	62.37	40.06
7	11473.00	62.72 PK	74.00	-11.28	1.09 H	18	11.57	51.14
8	11473.00	49.76 AV	54.00	-4.24	1.09 H	18	-1.39	51.14
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4589.20	50.91 PK	74.00	-23.09	1.33 V	10	12.92	38.00
2	4589.20	40.23 AV	54.00	-13.77	1.33 V	10	2.24	38.00
3	#5725.00	87.92 PK	102.88	-14.96	1.25 V	21	47.89	40.03
4	#5725.00	77.00 AV	91.96	-14.96	1.25 V	21	36.97	40.03
5	*5736.50	122.88 PK			1.25 V	21	82.82	40.06
6	*5736.50	111.96 AV			1.25 V	21	71.90	40.06
7	11473.00	62.95 PK	74.00	-11.05	1.00 V	49	11.81	51.14
8	11473.00	51.34 AV	54.00	-2.66	1.00 V	49	0.20	51.14

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Mid. channel: 5788.0MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	D
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	48.22 PK	74.00	-25.78	1.07 H	47	10.13	38.09
2	4630.40	35.96 AV	54.00	-18.04	1.07 H	47	-2.13	38.09
3	*5788.00	114.99 PK			1.53 H	37	74.83	40.16
4	*5788.00	103.39 AV			1.53 H	37	63.23	40.16
5	11576.00	61.46 PK	74.00	-12.54	1.00 H	23	10.43	51.02
6	11576.00	49.51 AV	54.00	-4.49	1.00 H	23	-1.52	51.02
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4630.40	50.35 PK	74.00	-23.65	1.11 V	15	12.26	38.09
2	4630.40	40.43 AV	54.00	-13.57	1.11 V	15	2.34	38.09
3	*5788.00	123.65 PK			1.29 V	17	83.49	40.16
4	*5788.00	112.83 AV			1.29 V	17	72.67	40.16
5	11576.00	63.95 PK	74.00	-10.05	1.11 V	24	12.93	51.02
6	11576.00	51.97 AV	54.00	-2.03	1.11 V	24	0.95	51.02

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. " * ": Fundamental frequency.
6. The limit value is defined as per 15.247.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5838.5MHz	FREQUENCY RANGE	1 ~ 40GHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Peak (PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	D
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4670.80	49.38 PK	74.00	-24.62	1.08 H	75	11.19	38.19
2	4670.80	36.73 AV	54.00	-17.27	1.08 H	75	-1.46	38.19
3	*5838.50	116.37 PK			1.45 H	40	76.10	40.27
4	*5838.50	105.71 AV			1.45 H	40	65.44	40.27
5	#5850.00	79.95 PK	96.37	-16.42	1.45 H	40	39.65	40.30
6	#5850.00	69.29 AV	85.71	-16.42	1.45 H	40	28.99	40.30
7	11677.00	61.61 PK	74.00	-12.39	1.00 H	71	10.76	50.84
8	11677.00	50.45 AV	54.00	-3.55	1.00 H	71	-0.40	50.84
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	4670.80	50.77 PK	74.00	-23.23	1.11 V	16	12.58	38.19
2	4670.80	41.70 AV	54.00	-12.30	1.11 V	16	3.51	38.19
3	*5838.50	126.02 PK			1.27 V	9	85.75	40.27
4	*5838.50	115.19 AV			1.27 V	9	74.92	40.27
5	#5850.00	89.60 PK	106.02	-16.42	1.27 V	9	49.30	40.30
6	#5850.00	78.77 AV	95.19	-16.42	1.27 V	9	38.47	40.30
7	11677.00	64.16 PK	74.00	-9.84	1.00 V	33	13.31	50.84
8	11677.00	51.86 AV	54.00	-2.14	1.00 V	33	1.01	50.84

REMARKS: 1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).

2. Correction Factor (dB/m) = Antenna Factor (dB/m) + Cable Factor (dB).

3. The other emission levels were very low against the limit.

4. Margin value = Emission level – Limit value.

5. " * ": Fundamental frequency.

6. The limit value is defined as per 15.247.

7. "#":The radiated frequency is out the restricted band.

BELOW 1GHz WORST-CASE DATA：

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5846.0MHz	FREQUENCY RANGE	Below 1000MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	A
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	113.50	39.43 QP	43.50	-4.07	1.50 H	112	28.05	11.39
2	181.55	35.58 QP	43.50	-7.92	1.25 H	58	23.02	12.56
3	311.82	35.62 QP	46.00	-10.38	2.50 H	172	20.54	15.08
4	354.60	36.74 QP	46.00	-9.26	1.50 H	124	20.57	16.17
5	500.42	42.30 QP	46.00	-3.70	2.00 H	34	21.80	20.50
6	667.63	38.41 QP	46.00	-7.59	1.50 H	319	13.87	24.55
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	43.51	36.40 QP	40.00	-3.60	1.00 V	46	23.57	12.84
2	64.90	34.06 QP	40.00	-5.94	1.00 V	82	21.19	12.88
3	105.73	37.41 QP	43.50	-6.09	1.00 V	49	26.87	10.55
4	132.95	37.54 QP	43.50	-5.96	1.00 V	4	24.67	12.87
5	175.72	35.59 QP	43.50	-7.91	1.00 V	310	22.24	13.35
6	354.60	40.64 QP	46.00	-5.36	1.25 V	358	24.47	16.17

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

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5842.5MHz	FREQUENCY RANGE	Below 1000MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	B
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	113.50	38.31 QP	43.50	-5.19	3.00 H	88	26.92	11.39
2	249.60	34.45 QP	46.00	-11.55	1.00 H	349	20.77	13.68
3	354.60	37.91 QP	46.00	-8.09	3.00 H	352	21.74	16.17
4	500.42	42.07 QP	46.00	-3.93	1.50 H	13	21.57	20.50
5	665.68	38.36 QP	46.00	-7.64	2.00 H	328	13.85	24.50
6	834.84	38.01 QP	46.00	-7.99	1.50 H	280	10.99	27.02
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	43.51	35.34 QP	40.00	-4.66	1.00 V	106	22.51	12.84
2	101.84	36.57 QP	43.50	-6.93	1.25 V	31	26.45	10.12
3	132.95	41.57 QP	43.50	-1.93	1.25 V	22	28.70	12.87
4	154.33	40.37 QP	43.50	-3.13	1.50 V	166	25.83	14.54
5	500.42	36.60 QP	46.00	-9.40	1.00 V	10	16.10	20.50
6	665.68	41.64 QP	46.00	-4.36	2.00 V	103	17.13	24.50
7	914.02	41.11 QP	46.00	-4.89	1.92 V	153	12.86	28.25

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

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5841.0MHz	FREQUENCY RANGE	Below 1000MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	C
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	113.50	37.20 QP	43.50	-6.30	1.50 H	85	25.82	11.39
2	249.60	34.20 QP	46.00	-11.80	1.00 H	10	20.52	13.68
3	354.60	33.59 QP	46.00	-12.41	1.50 H	211	17.42	16.17
4	399.31	33.53 QP	46.00	-12.47	1.25 H	40	16.24	17.29
5	500.42	41.91 QP	46.00	-4.09	1.50 H	25	21.41	20.50
6	665.68	38.17 QP	46.00	-7.83	2.00 H	115	13.67	24.50
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	43.51	36.20 QP	40.00	-3.80	1.00 V	10	23.37	12.84
2	113.50	36.13 QP	43.50	-7.37	1.00 V	55	24.74	11.39
3	132.95	36.76 QP	43.50	-6.74	2.50 V	289	23.89	12.87
4	300.16	32.40 QP	46.00	-13.60	1.50 V	352	17.62	14.78
5	665.68	39.82 QP	46.00	-6.18	1.00 V	295	15.32	24.50
6	914.00	40.23 QP	46.00	-5.77	1.00 V	0	11.98	28.25

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

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5838.5MHz	FREQUENCY RANGE	Below 1000MHz
INPUT POWER (SYSTEM)	120Vac, 60 Hz	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH 1024hPa	TEST MODE	D
TESTED BY	Sun Lin		

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	113.50	36.08 QP	43.50	-7.42	1.25 H	82	24.70	11.39
2	249.60	34.37 QP	46.00	-11.63	1.00 H	10	20.69	13.68
3	354.60	35.55 QP	46.00	-10.45	1.00 H	10	19.38	16.17
4	500.42	42.37 QP	46.00	-3.63	1.25 H	10	21.87	20.50
5	599.58	35.84 QP	46.00	-10.16	1.25 H	7	12.73	23.11
6	667.63	34.66 QP	46.00	-11.34	1.25 H	37	10.11	24.55
ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	43.51	36.66 QP	40.00	-3.34	1.25 V	10	23.82	12.84
2	111.56	35.65 QP	43.50	-7.85	1.25 V	73	24.47	11.18
3	132.95	39.26 QP	43.50	-4.24	1.00 V	73	26.39	12.87
4	354.60	34.90 QP	46.00	-11.10	1.00 V	10	18.74	16.17
5	500.42	36.44 QP	46.00	-9.56	1.00 V	40	15.93	20.50
6	675.40	39.97 QP	46.00	-6.03	1.25 V	94	15.26	24.71

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

4.2 CONDUCTED EMISSION MEASUREMENT

4.2.1 LIMITS OF CONDUCTED EMISSION MEASUREMENT

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

NOTE: 1. The lower limit shall apply at the transition frequencies.

2. The limit decreases in line with the logarithm of the frequency in the range of 0.15 to 0.50MHz.

3. All emanations from a class A/B digital device or system, including any network of conductors and apparatus connected thereto, shall not exceed the level of field strengths specified above.

4.2.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	DUE DATE OF CALIBRATION
Test Receiver ROHDE & SCHWARZ	ESCS30	100291	Nov. 19, 2008	Nov. 18, 2009
RF signal cable Woken	5D-FB	Cable-HYC01-01	Dec. 31, 2008	Dec. 30, 2009
LISN ROHDE & SCHWARZ	ESH3-Z5	100312	Jun. 13, 2008	Jun. 12, 2009
LISN ROHDE & SCHWARZ	ESH2-Z5	100104	Dec. 04, 2008	Dec. 03, 2009
Software ADT	ADT_Cond_ V7.3.7	NA	NA	NA

NOTE: 1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

2. The test was performed in HwaYa Shielded Room 1.

3. The VCCI Site Registration No. is C-2040.

4.2.3 TEST PROCEDURES

a. The EUT was placed 0.4 meters from the conducting wall of the shielded room with EUT being connected to the power mains through a line impedance stabilization network (LISN). Other support units were connected to the power mains through another LISN. The two LISNs provide 50 ohm/ 50uH of coupling impedance for the measuring instrument.

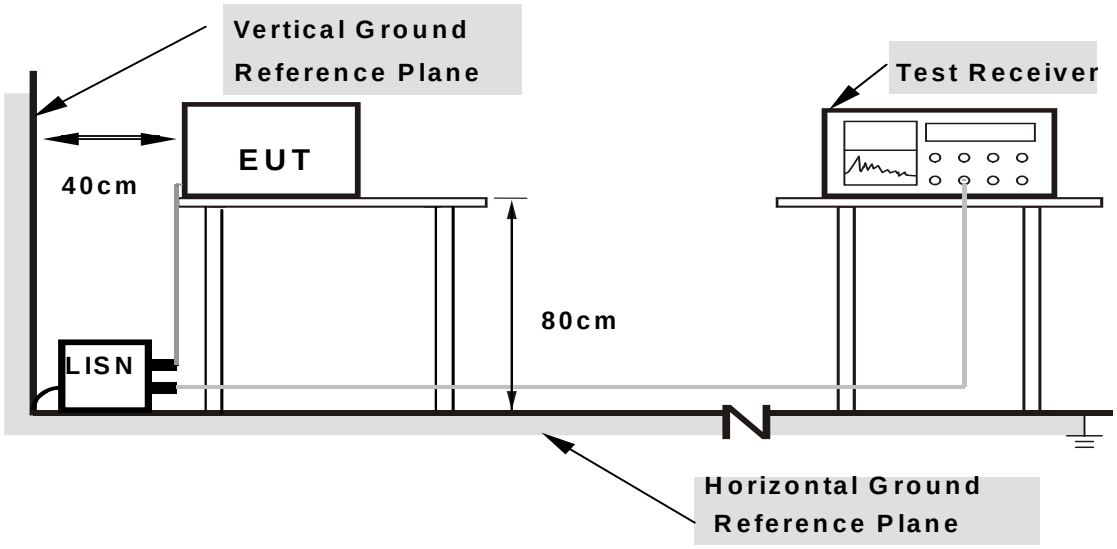
b. Both lines of the power mains connected to the EUT were checked for maximum conducted interference.

c. The frequency range from 150kHz to 30MHz was searched. Emission levels under (Limit - 20dB) was not recorded.

4.2.4 DEVIATION FROM TEST STANDARD

No deviation

4.2.5 TEST SETUP



Note: 1.Support units were connected to second LISN.
2.Both of LISNs (AMN) are 80 cm from EUT and at least 80 from other units and other metal planes

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

4.2.6 EUT OPERATING CONDITIONS

Same as 4.1.6

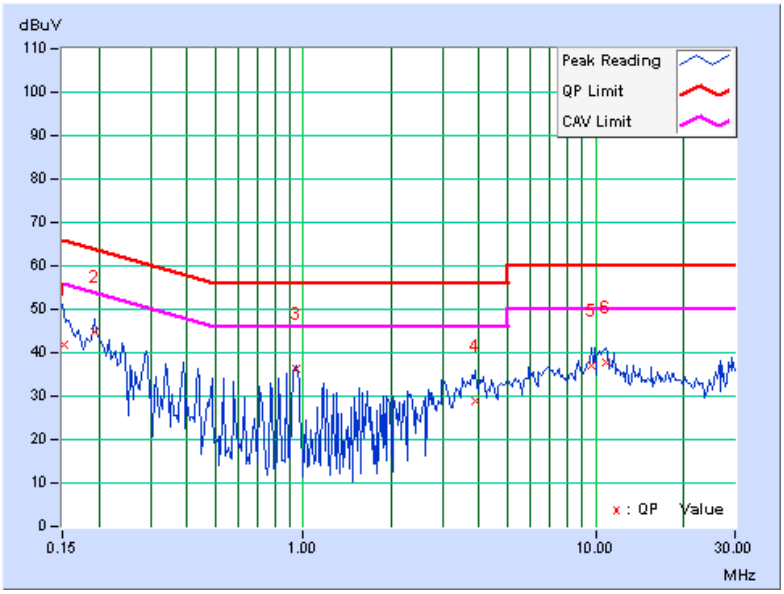
4.2.7 TEST RESULTS

CONDUCTED WORST-CASE DATA：

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5846.0MHz	PHASE	Line 1
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	A	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.151	0.13	41.90	-	42.03	-	65.93	55.93	-23.90	-
2	0.194	0.13	44.75	-	44.88	-	63.84	53.84	-18.96	-
3	0.944	0.18	36.09	-	36.27	-	56.00	46.00	-19.73	-
4	3.879	0.36	28.52	-	28.88	-	56.00	46.00	-27.12	-
5	9.694	0.65	36.29	-	36.94	-	60.00	50.00	-23.06	-
6	10.793	0.70	36.94	-	37.64	-	60.00	50.00	-22.36	-

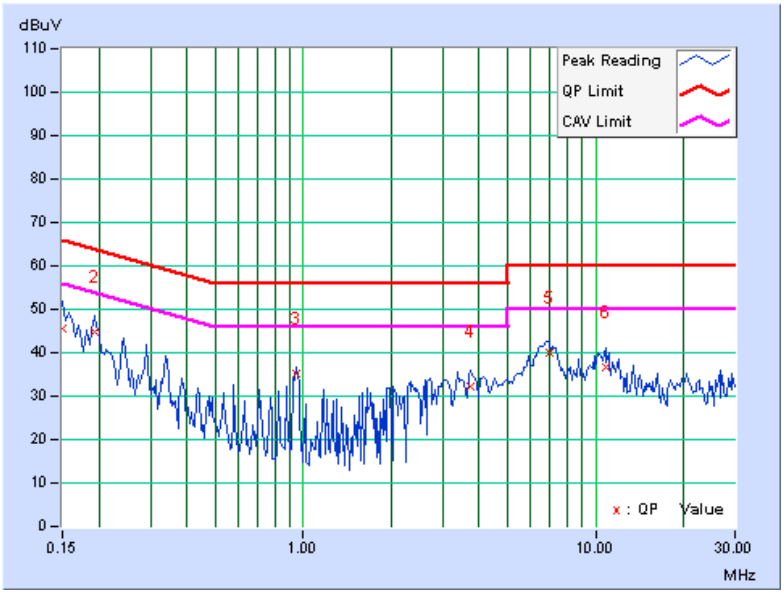
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5846.0MHz	PHASE	Line 2
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	A	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.150	0.14	45.32	-	45.46	-	66.00	56.00	-20.54	-
2	0.194	0.15	44.63	-	44.78	-	63.84	53.84	-19.06	-
3	0.945	0.20	35.05	-	35.25	-	56.00	46.00	-20.75	-
4	3.732	0.37	31.67	-	32.04	-	56.00	46.00	-23.96	-
5	6.978	0.52	39.64	-	40.16	-	60.00	50.00	-19.84	-
6	10.796	0.69	36.11	-	36.80	-	60.00	50.00	-23.20	-

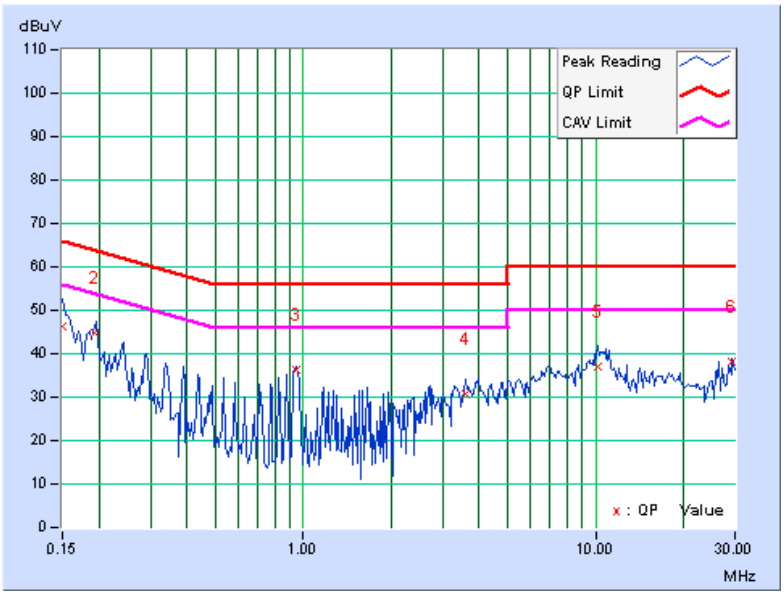
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5842.5MHz	PHASE	Line 1
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	B	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.150	0.13	46.19	-	46.32	-	66.00	56.00	-19.68	-
2	0.194	0.13	44.83	-	44.96	-	63.86	53.86	-18.90	-
3	0.944	0.18	36.13	-	36.31	-	56.00	46.00	-19.69	-
4	3.590	0.34	30.54	-	30.88	-	56.00	46.00	-25.12	-
5	10.246	0.67	36.51	-	37.18	-	60.00	50.00	-22.82	-
6	29.234	1.24	36.77	-	38.01	-	60.00	50.00	-21.99	-

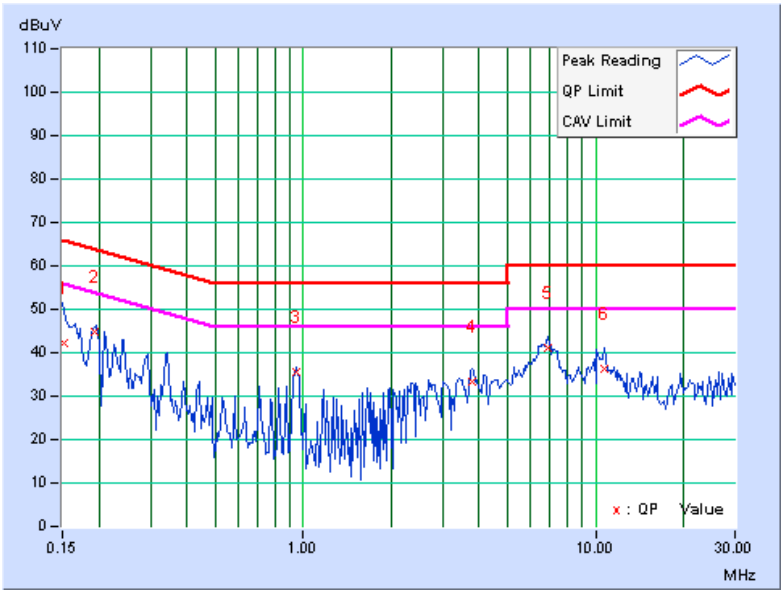
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5842.5MHz	PHASE	Line 2
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	B	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.151	0.14	42.15	-	42.29	-	65.93	55.93	-23.64	-
2	0.194	0.15	44.73	-	44.88	-	63.85	53.85	-18.97	-
3	0.945	0.20	35.42	-	35.62	-	56.00	46.00	-20.38	-
4	3.784	0.37	33.08	-	33.45	-	56.00	46.00	-22.55	-
5	6.840	0.52	40.52	-	41.04	-	60.00	50.00	-18.96	-
6	10.731	0.68	35.44	-	36.12	-	60.00	50.00	-23.88	-

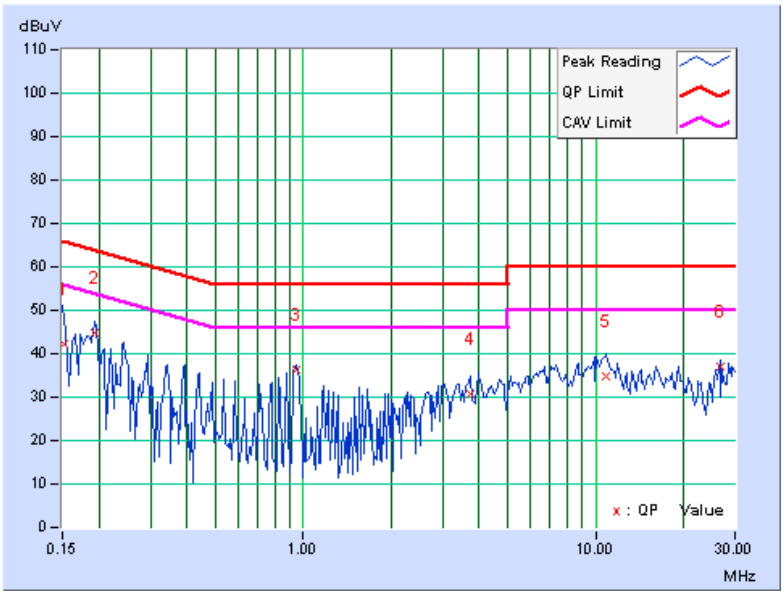
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5841.0MHz	PHASE	Line 1
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	C	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.151	0.13	42.27	-	42.40	-	65.93	55.93	-23.53	-
2	0.194	0.13	44.81	-	44.94	-	63.85	53.85	-18.91	-
3	0.946	0.18	36.07	-	36.25	-	56.00	46.00	-19.75	-
4	3.738	0.35	30.37	-	30.72	-	56.00	46.00	-25.28	-
5	10.875	0.70	34.30	-	35.00	-	60.00	50.00	-25.00	-
6	26.609	1.23	35.71	-	36.94	-	60.00	50.00	-23.06	-

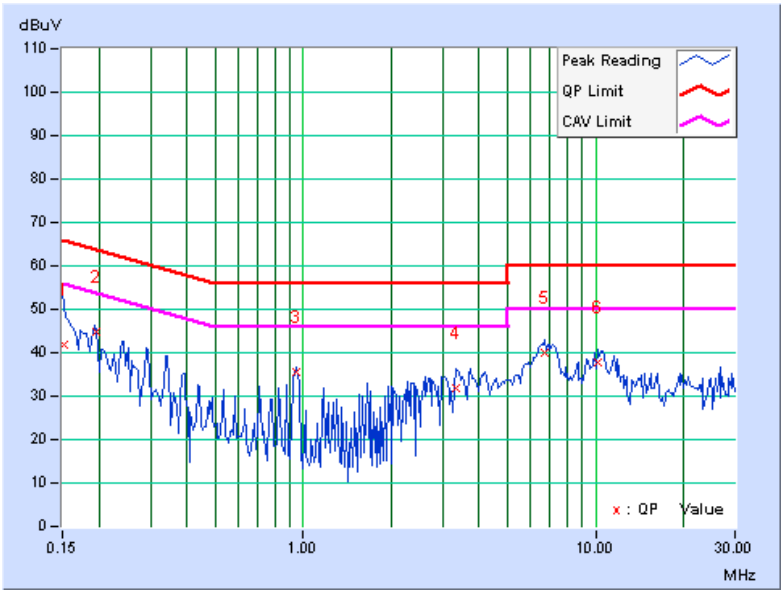
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5841.0MHz	PHASE	Line 2
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	C	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.152	0.14	41.58	-	41.72	-	65.90	55.90	-24.18	-
2	0.196	0.15	44.48	-	44.63	-	63.80	53.80	-19.17	-
3	0.945	0.20	35.48	-	35.68	-	56.00	46.00	-20.32	-
4	3.350	0.34	31.62	-	31.96	-	56.00	46.00	-24.04	-
5	6.701	0.51	39.57	-	40.08	-	60.00	50.00	-19.92	-
6	10.246	0.67	37.00	-	37.67	-	60.00	50.00	-22.33	-

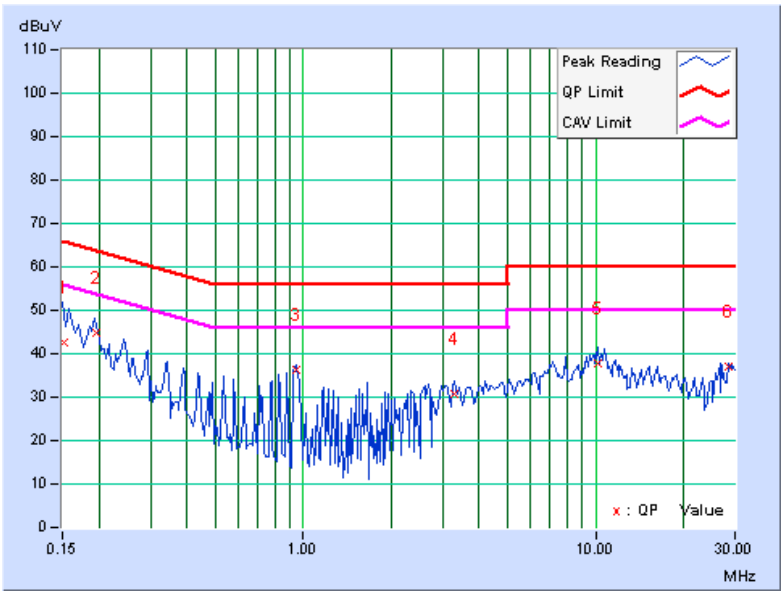
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5838.5MHz	PHASE	Line 1
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	D	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.151	0.13	42.53	-	42.66	-	65.92	55.92	-23.26	-
2	0.195	0.13	44.77	-	44.90	-	63.83	53.83	-18.93	-
3	0.946	0.18	36.09	-	36.27	-	56.00	46.00	-19.73	-
4	3.305	0.32	30.43	-	30.75	-	56.00	46.00	-25.25	-
5	10.246	0.67	37.16	-	37.83	-	60.00	50.00	-22.17	-
6	28.686	1.23	35.75	-	36.98	-	60.00	50.00	-23.02	-

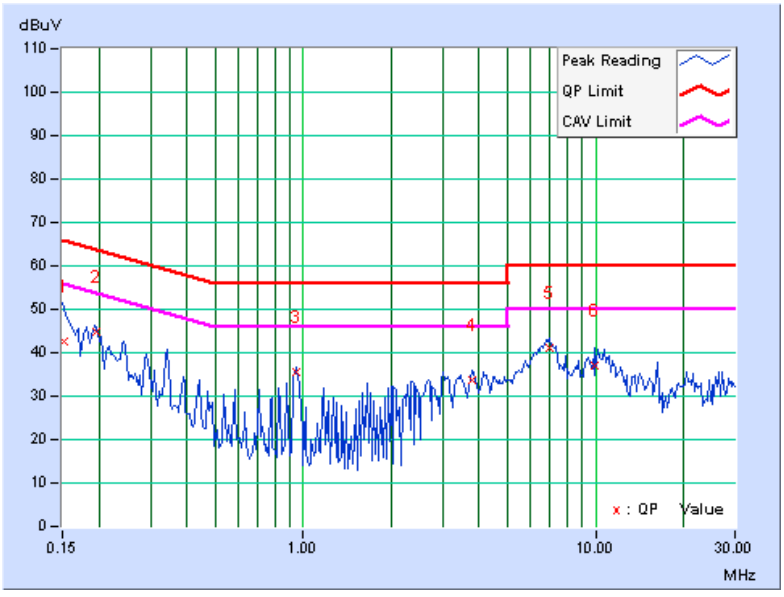
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
3. The emission levels of other frequencies were very low against the limit.
4. Margin value = Emission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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	High channel: 5838.5MHz	PHASE	Line 2
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60Hz
ENVIRONMENTAL CONDITIONS	18deg. C, 66%RH, 1026hPa	6dB BANDWIDTH	9kHz
TEST MODE	D	TESTED BY	Dean Wang

	Freq.	Corr.	Reading Value		Emission Level		Limit		Margin	
No		Factor	[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
	[MHz]	(dB)	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.151	0.14	42.39	-	42.53	-	65.92	55.92	-23.39	-
2	0.195	0.15	44.58	-	44.73	-	63.80	53.80	-19.07	-
3	0.945	0.20	35.50	-	35.70	-	56.00	46.00	-20.30	-
4	3.789	0.38	33.20	-	33.58	-	56.00	46.00	-22.42	-
5	**6.947**	**0.52**	**40.65**	**-**	**41.17**	**-**	**60.00**	**50.00**	**-18.83**	**-**
6	9.938	0.66	36.28	-	36.94	-	60.00	50.00	-23.06	-

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



4.3 6dB BANDWIDTH MEASUREMENT

4.3.1 LIMITS OF 6dB BANDWIDTH MEASUREMENT

The minimum of 6dB Bandwidth Measurement is 0.5MHz.

4.3.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	CALIBRATED UNTIL
R&S SPECTRUM ANALYZER	FSP40	100041	Apr. 22, 2008	Apr. 21, 2009

NOTE: The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

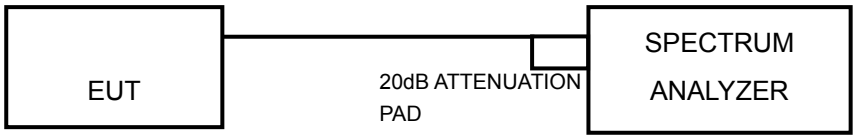
4.3.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer through an attenuator. The bandwidth of the fundamental frequency was measured by spectrum analyzer with 100kHz RBW and 300kHz VBW. The 6dB bandwidth is defined as the total spectrum the power of which is higher than peak power minus 6dB.

4.3.4 DEVIATION FROM TEST STANDARD

No deviation

4.3.5 TEST SETUP



4.3.6 EUT OPERATING CONDITIONS

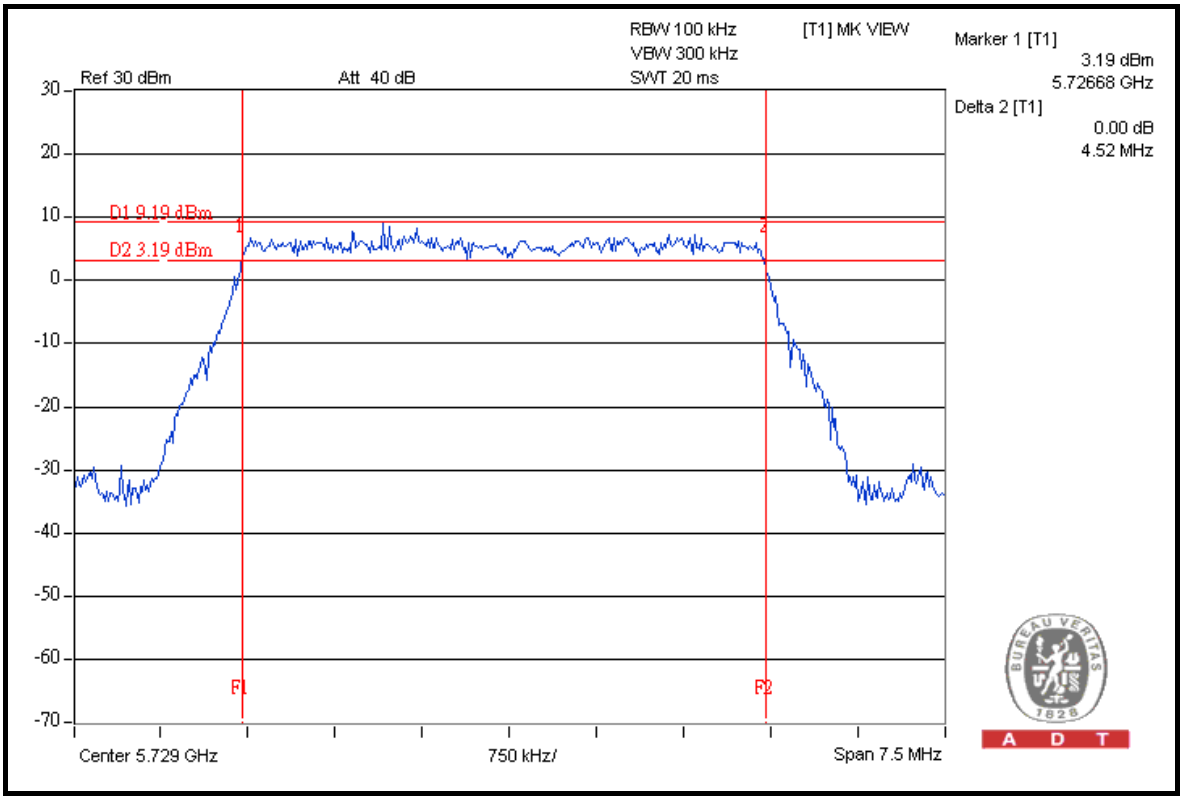
The software provided by client to enable the EUT under transmission condition continuously at lowest, middle and highest channel frequencies individually.

4.3.7 TEST RESULTS

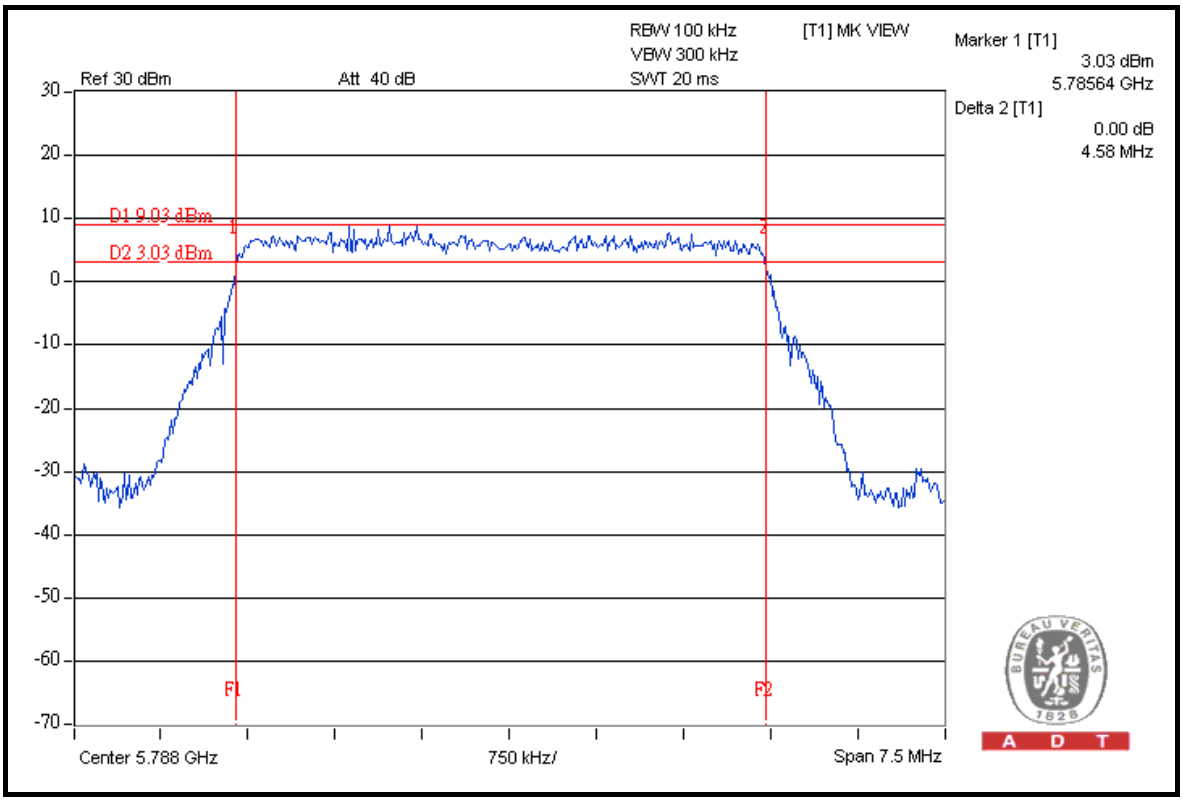
MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	22 deg.C, 66%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	A
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
Low	5729	4.52	0.5	PASS
Middle	5788	4.58	0.5	PASS
High	5846	4.54	0.5	PASS

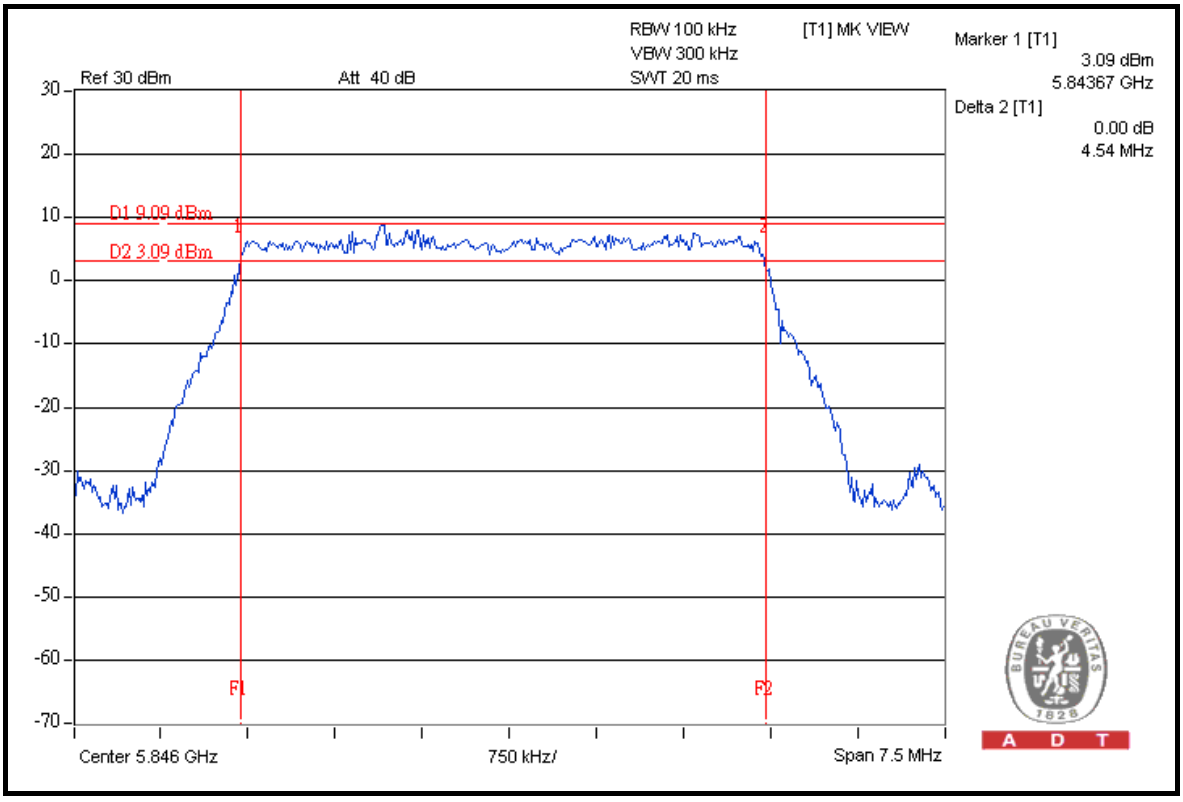
Low



Middle


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
3.03 dBm
5.78564 GHz
Delta 2 [T1]
0.00 dB
4.58 MHz
Ref 30 dBm
Att 40 dB
D1 9.03 dBm
D2 3.03 dBm
F1
F2
Center 5.788 GHz
750 kHz/
Span 7.5 MHz

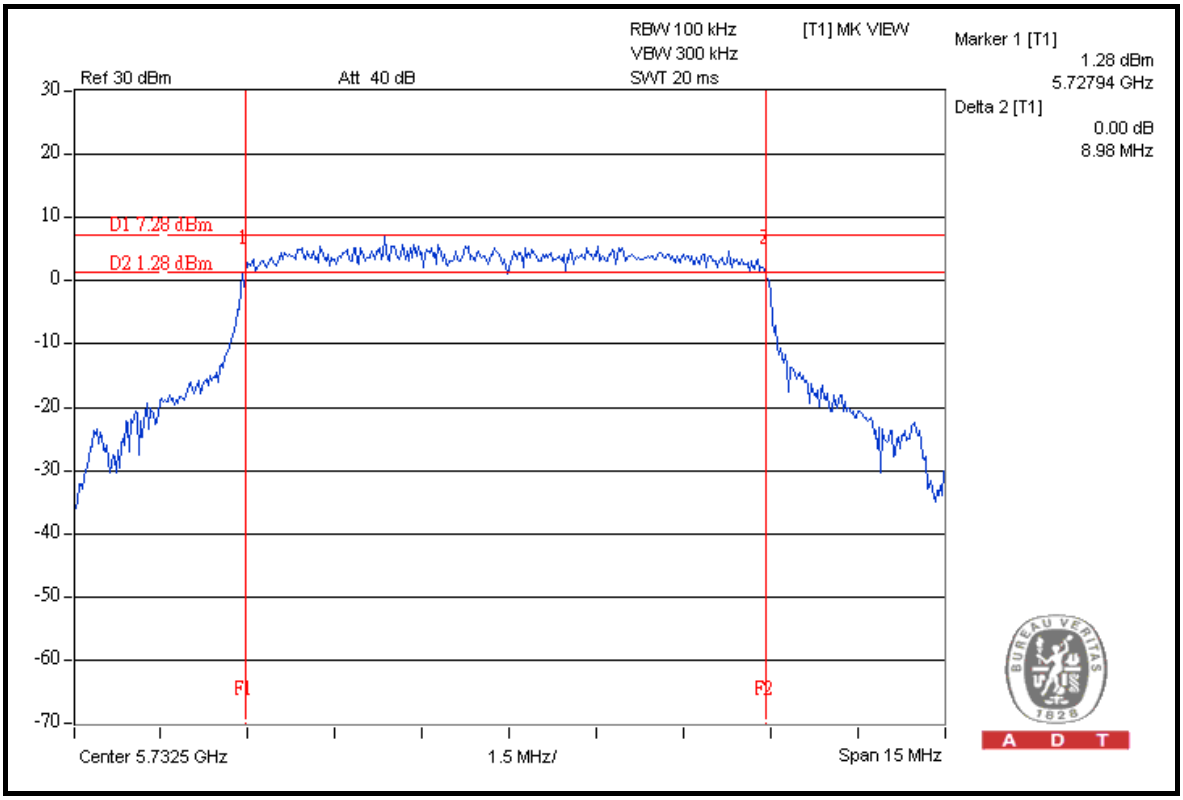
High


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
3.09 dBm
5.84367 GHz
Delta 2 [T1]
0.00 dB
4.54 MHz
Ref 30 dBm
Att 40 dB
D1 9.09 dBm
D2 3.09 dBm
F1
F2
Center 5.846 GHz
750 kHz/
Span 7.5 MHz

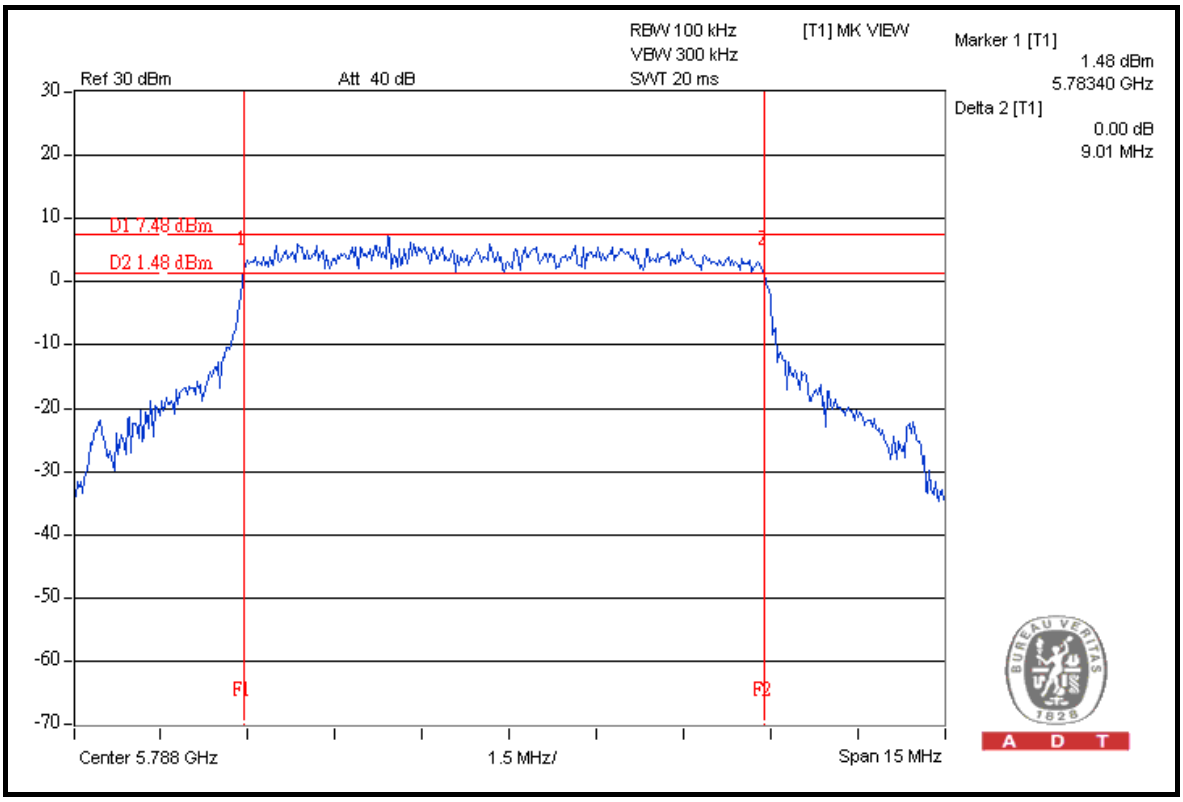
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	B
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
Low	5732.5	8.98	0.5	PASS
Middle	5788.0	9.01	0.5	PASS
High	5842.5	9.05	0.5	PASS

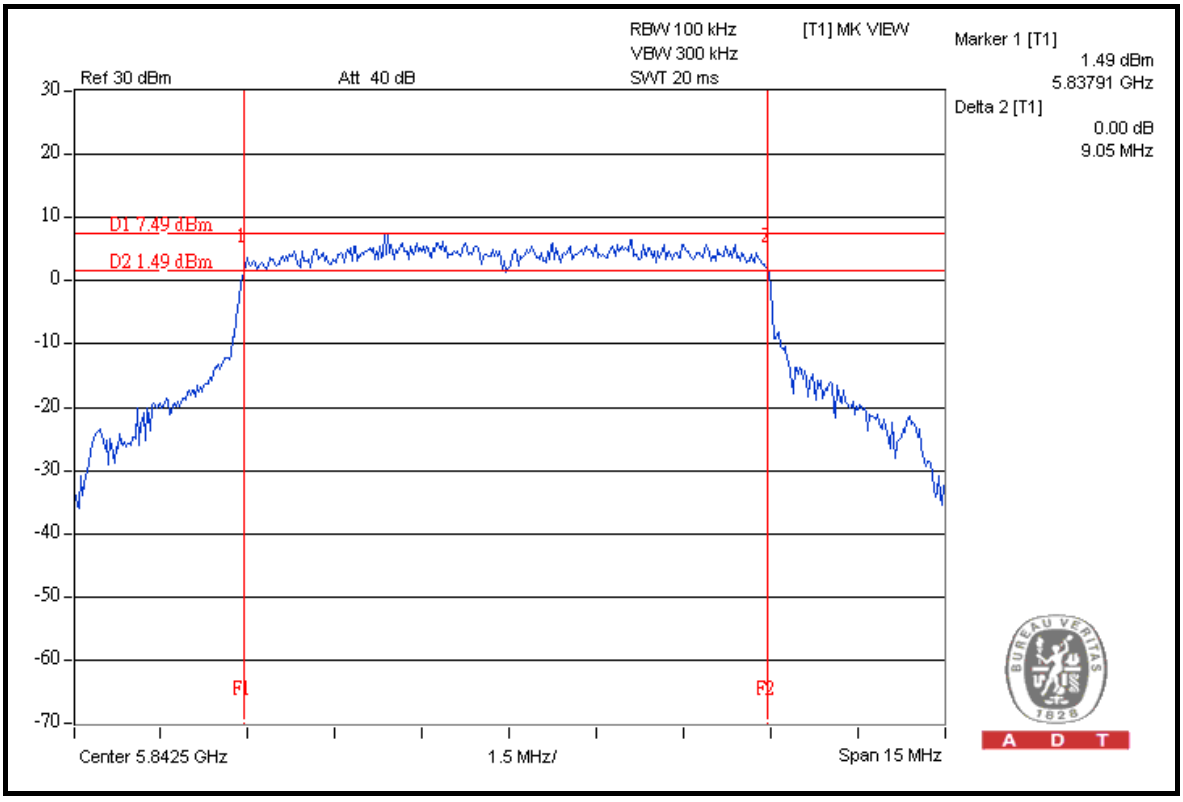
Low



Middle


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
1.48 dBm
5.78340 GHz
Delta 2 [T1]
0.00 dB
9.01 MHz
Ref 30 dBm
Att 40 dB
D1 7.48 dBm
D2 1.48 dBm
F1
F2
Center 5.788 GHz
1.5 MHz/
Span 15 MHz

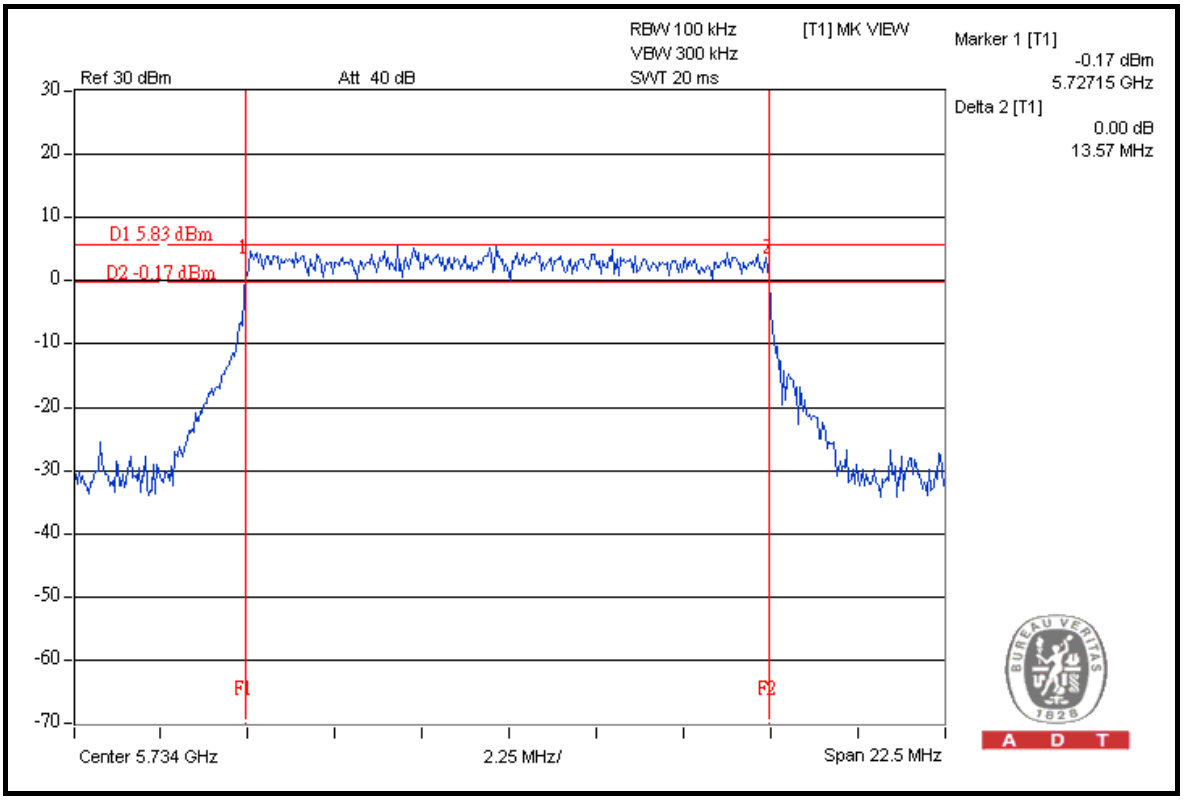
High


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
1.49 dBm
5.83791 GHz
Delta 2 [T1]
0.00 dB
9.05 MHz
Ref 30 dBm
Att 40 dB
D1 7.49 dBm
D2 1.49 dBm
F1
F2
Center 5.8425 GHz
1.5 MHz/
Span 15 MHz

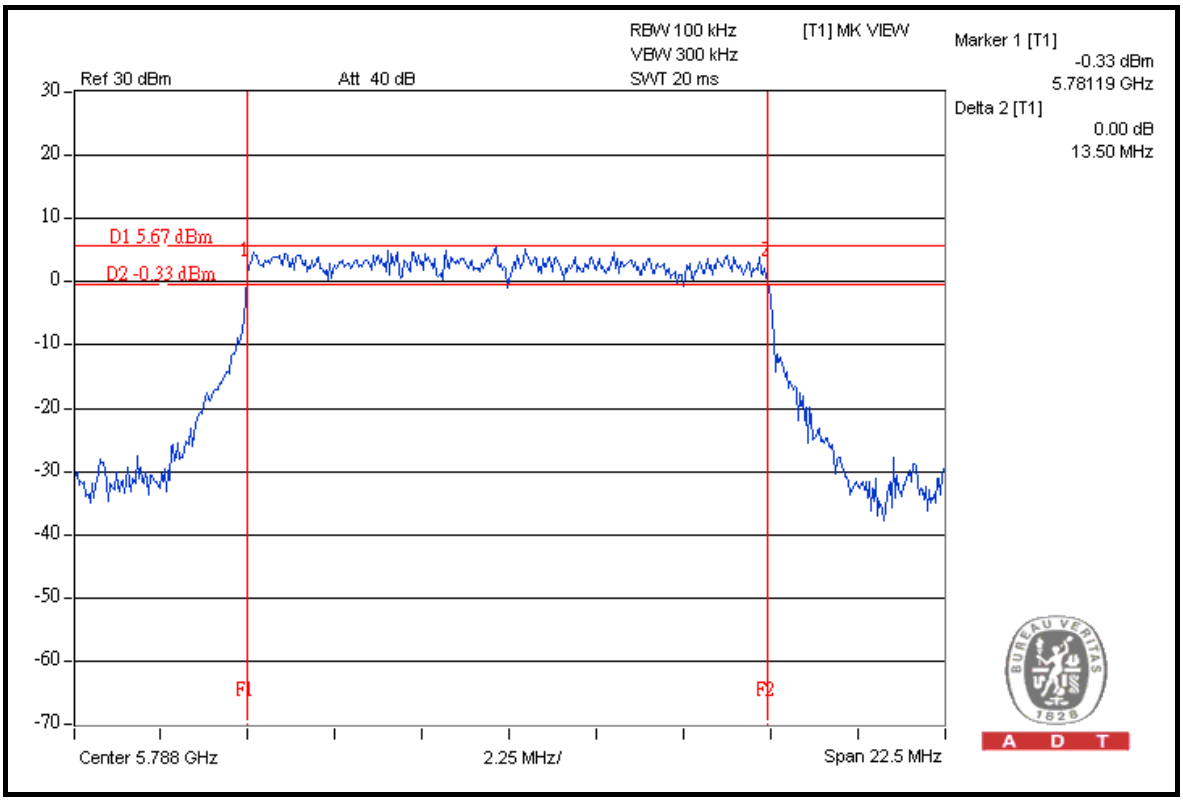
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	C
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
Low	5734.0	13.57	0.5	PASS
Middle	5788.0	13.50	0.5	PASS
High	5841.0	13.60	0.5	PASS

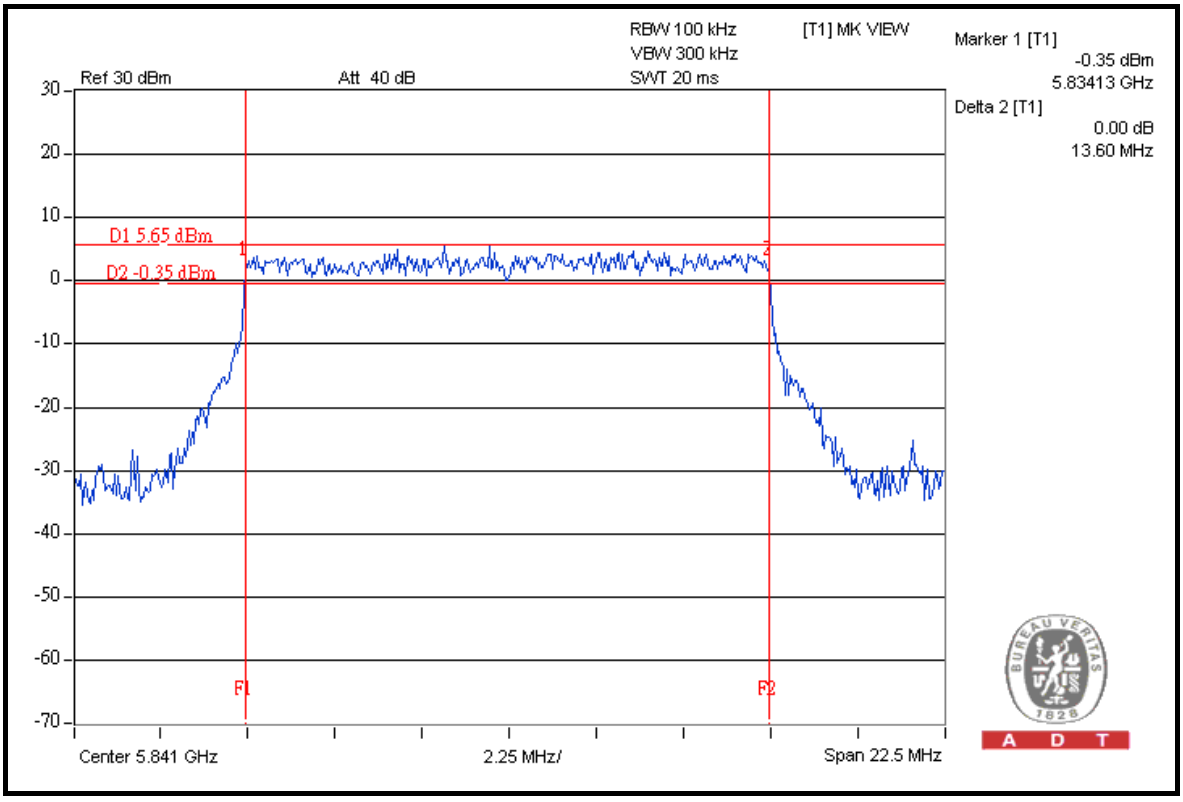
Low



Middle


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
-0.33 dBm
5.78119 GHz
Delta 2 [T1]
0.00 dB
13.50 MHz
Ref 30 dBm
Att 40 dB
D1 5.67 dBm
D2 -0.33 dBm
Center 5.788 GHz
2.25 MHz/
Span 22.5 MHz

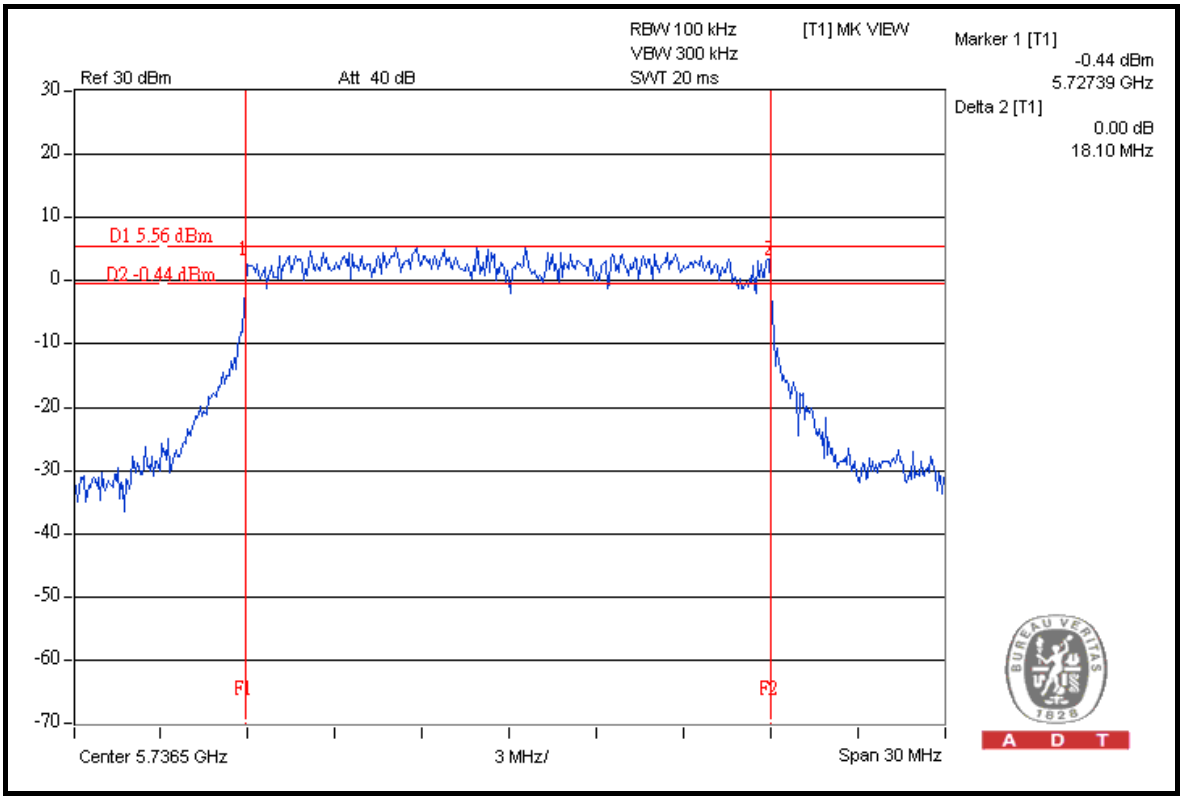
High


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
-0.35 dBm
5.83413 GHz
Delta 2 [T1]
0.00 dB
13.60 MHz
Ref 30 dBm
Att 40 dB
D1 5.65 dBm
D2 -0.35 dBm
Center 5.841 GHz
2.25 MHz/
Span 22.5 MHz

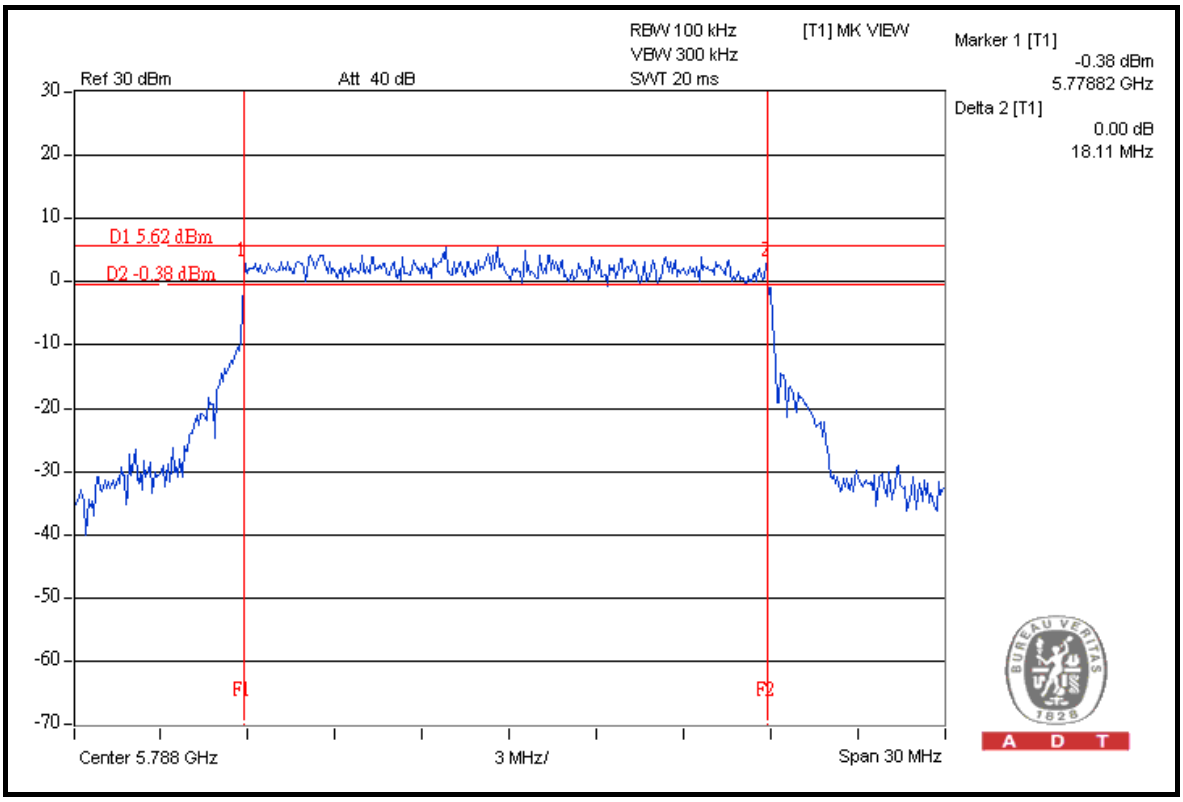
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	D
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)	MINIMUM LIMIT (MHz)	PASS / FAIL
Low	5736.5	18.10	0.5	PASS
Middle	5788.0	18.11	0.5	PASS
High	5838.5	18.13	0.5	PASS

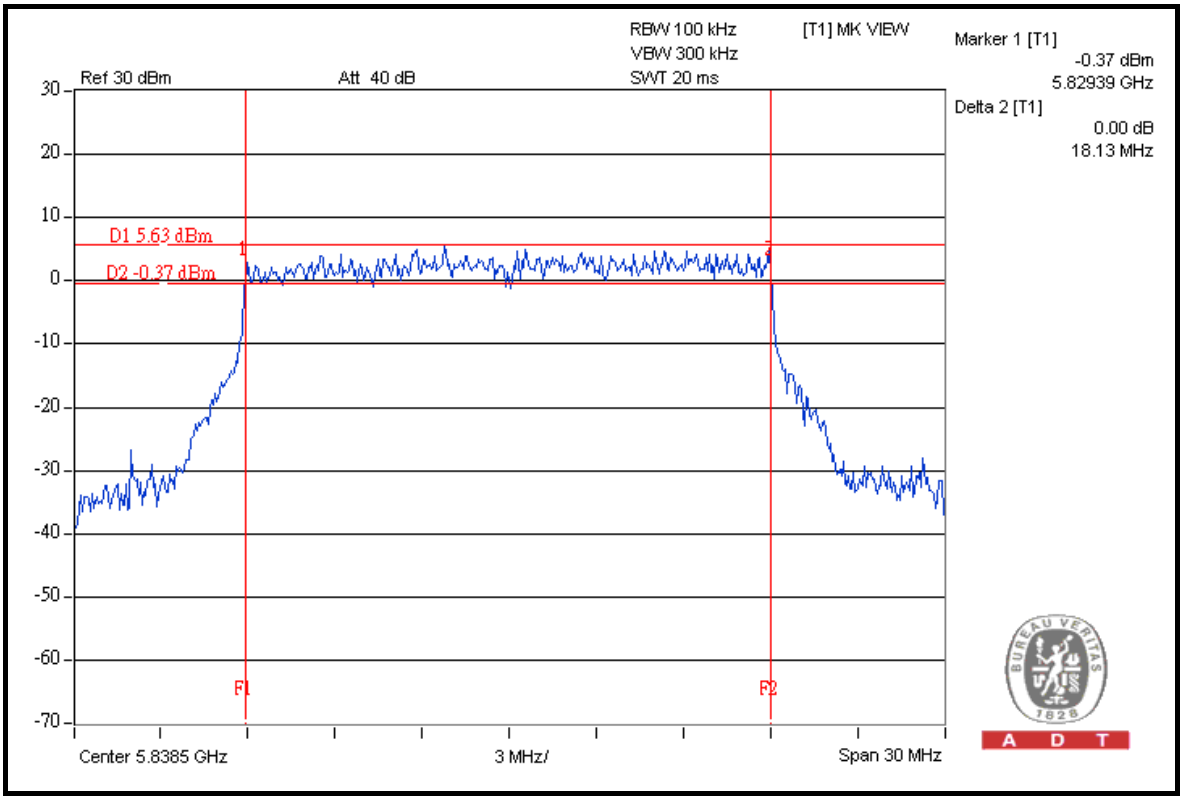
Low



Middle


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
-0.38 dBm
5.77882 GHz
Delta 2 [T1]
0.00 dB
18.11 MHz
Ref 30 dBm
Att 40 dB
D1 5.62 dBm
D2 -0.38 dBm
F1
F2
Center 5.788 GHz
3 MHz/
Span 30 MHz

High


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Marker 1 [T1]
-0.37 dBm
5.82939 GHz
Delta 2 [T1]
0.00 dB
18.13 MHz
Ref 30 dBm
Att 40 dB
D1 5.63 dBm
D2 -0.37 dBm
F1
F2
Center 5.8385 GHz
3 MHz/
Span 30 MHz

4.4 MAXIMUM PEAK OUTPUT POWER

4.4.1 LIMITS OF MAXIMUM PEAK OUTPUT POWER MEASUREMENT

The Maximum Peak Output Power Measurement is 30dBm.

4.4.2 INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	CALIBRATED UNTIL
High Speed Peak Power Meter	ML2495A	0824012	Aug. 04, 2008	Aug. 03, 2009
Power Sensor	MA2444B	0738138	Aug. 04, 2008	Aug. 03, 2009

Note:

1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.
2. Measurement Bandwidth of ML2495A is 65MHz greater than 6dB bandwidth of emission.

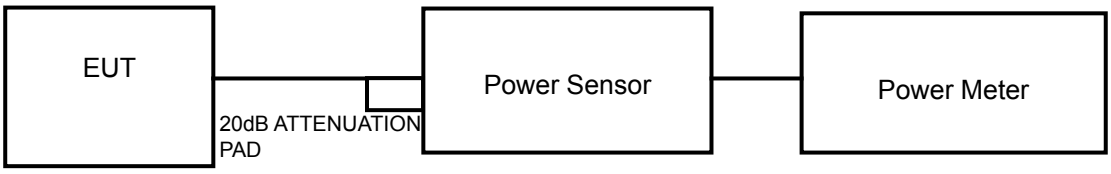
4.4.3 TEST PROCEDURES

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

4.4.4 DEVIATION FROM TEST STANDARD

No deviation

4.4.5 TEST SETUP



4.4.6 EUT OPERATING CONDITIONS

Same as Item 5.3.6

4.4.7 TEST RESULTS

MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	A
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)	PEAK POWER OUTPUT (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
Low	5729.0	200.447	23.02	30.00	PASS
Middle	5788.0	201.372	23.04	30.00	PASS
High	5846.0	201.837	23.05	30.00	PASS

MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	B
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)	PEAK POWER OUTPUT (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
Low	5732.5	201.372	23.04	30.00	PASS
Middle	5788.0	200.909	23.03	30.00	PASS
High	5842.5	201.837	23.05	30.00	PASS

MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	C
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)	PEAK POWER OUTPUT (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
Low	5734.0	317.687	25.02	30.00	PASS
Middle	5788.0	318.420	25.03	30.00	PASS
High	5841.0	319.154	25.04	30.00	PASS

MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	D
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)	PEAK POWER OUTPUT (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
Low	5736.5	252.348	24.02	30.00	PASS
Middle	5788.0	252.930	24.03	30.00	PASS
High	5838.5	253.513	24.04	30.00	PASS

4.5 POWER SPECTRAL DENSITY MEASUREMENT

4.5.1 LIMITS OF POWER SPECTRAL DENSITY MEASUREMENT

The Maximum of Power Spectral Density Measurement is 8dBm.

4.5.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	CALIBRATED UNTIL
R&S SPECTRUM ANALYZER	FSP40	100041	Apr. 22, 2008	Apr. 21, 2009

NOTE: The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.5.3 TEST PROCEDURE

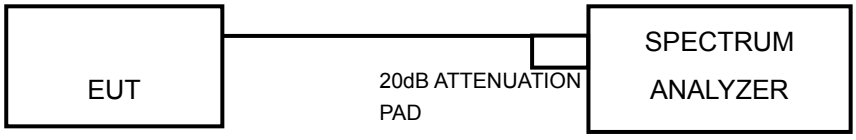
The transmitter output was connected to the spectrum analyzer through an attenuator, the bandwidth of the fundamental frequency was measured with the spectrum analyzer using 3kHz RBW and 30kHz VBW, set sweep time = span/3kHz. The power spectral density was measured and recorded.

The sweep time is allowed to be longer than span/3kHz for a full response of the mixer in the spectrum analyzer.

4.5.4 DEVIATION FROM TEST STANDARD

No deviation

4.5.5 TEST SETUP



4.5.6 EUT OPERATING CONDITION

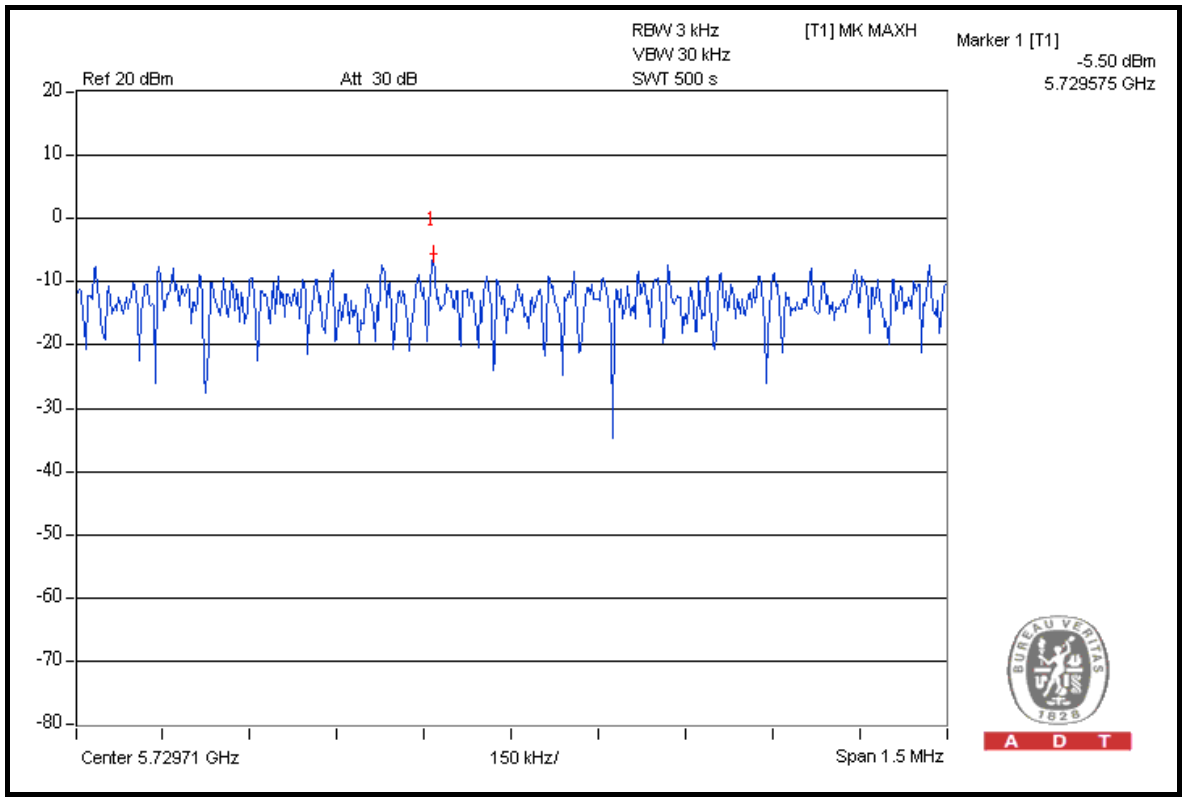
Same as Item 5.3.6

4.5.7 TEST RESULTS

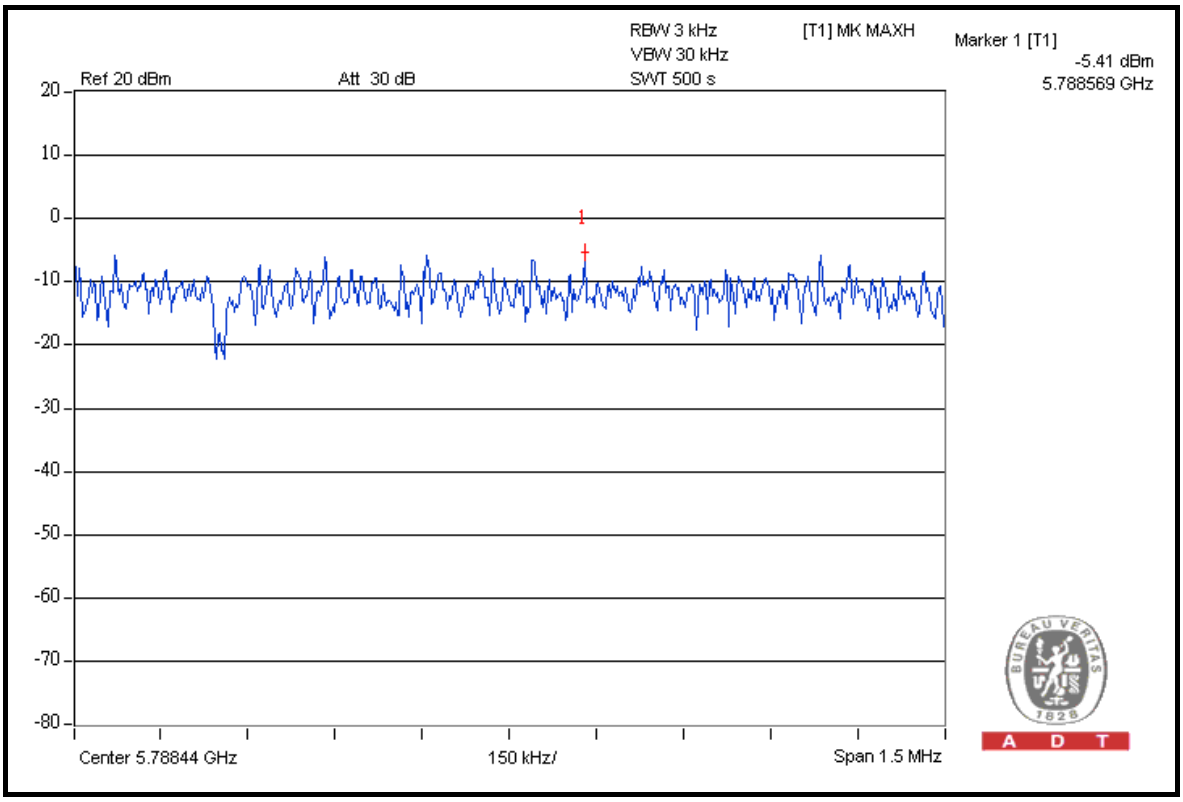
MODULATION TYPE	BPSK	ENVIRONMENTAL CONDITIONS	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	TEST MODE	A
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3kHz BW (dBm)	MAXIMUM LIMIT (dBm)	PASS / FAIL
Low	5729	-5.50	8.0	PASS
Middle	5788	-5.41	8.0	PASS
High	5846	-5.46	8.0	PASS

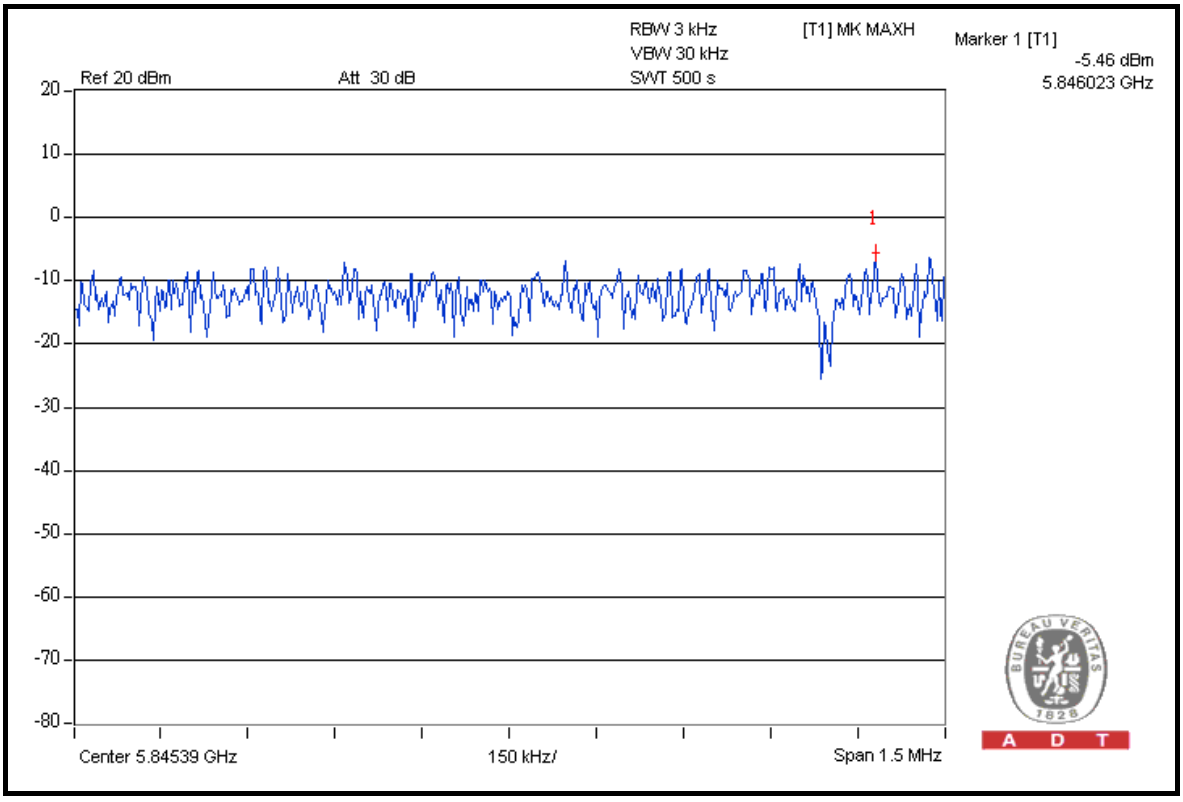
Low



Middle


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-5.41 dBm
5.788569 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
Center 5.78844 GHz
150 kHz/
Span 1.5 MHz

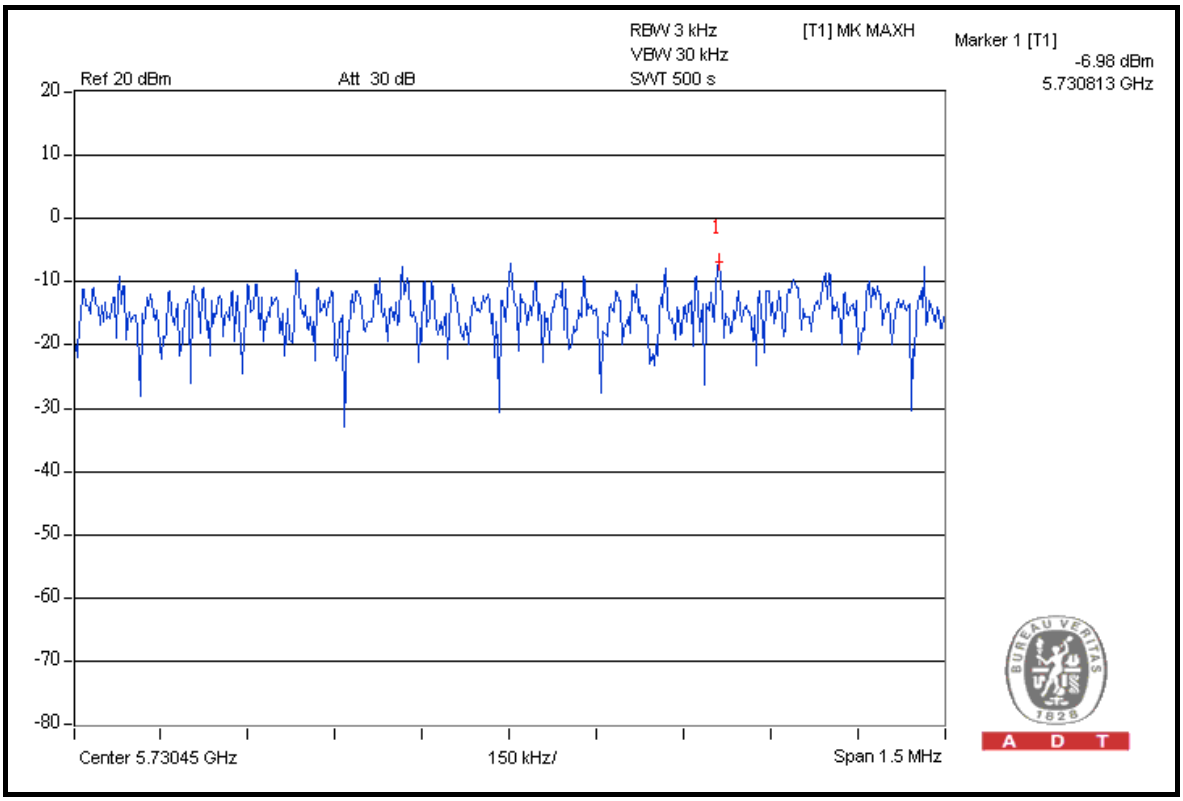
High


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-5.46 dBm
5.846023 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
Center 5.84539 GHz
150 kHz/
Span 1.5 MHz

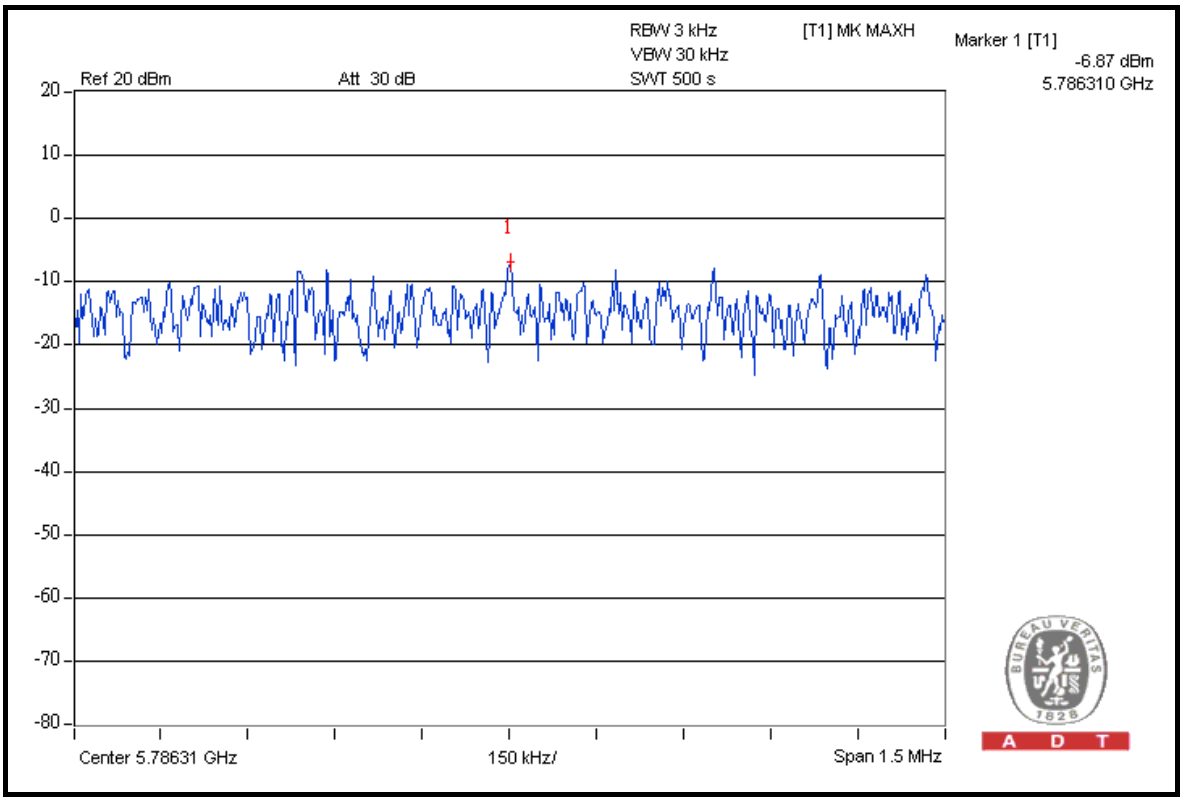
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	B
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3kHz BW (dBm)	MAXIMUM LIMIT (dBm)	PASS / FAIL
Low	5732.5	-6.98	8.0	PASS
Middle	5788.0	-6.87	8.0	PASS
High	5842.5	-6.78	8.0	PASS

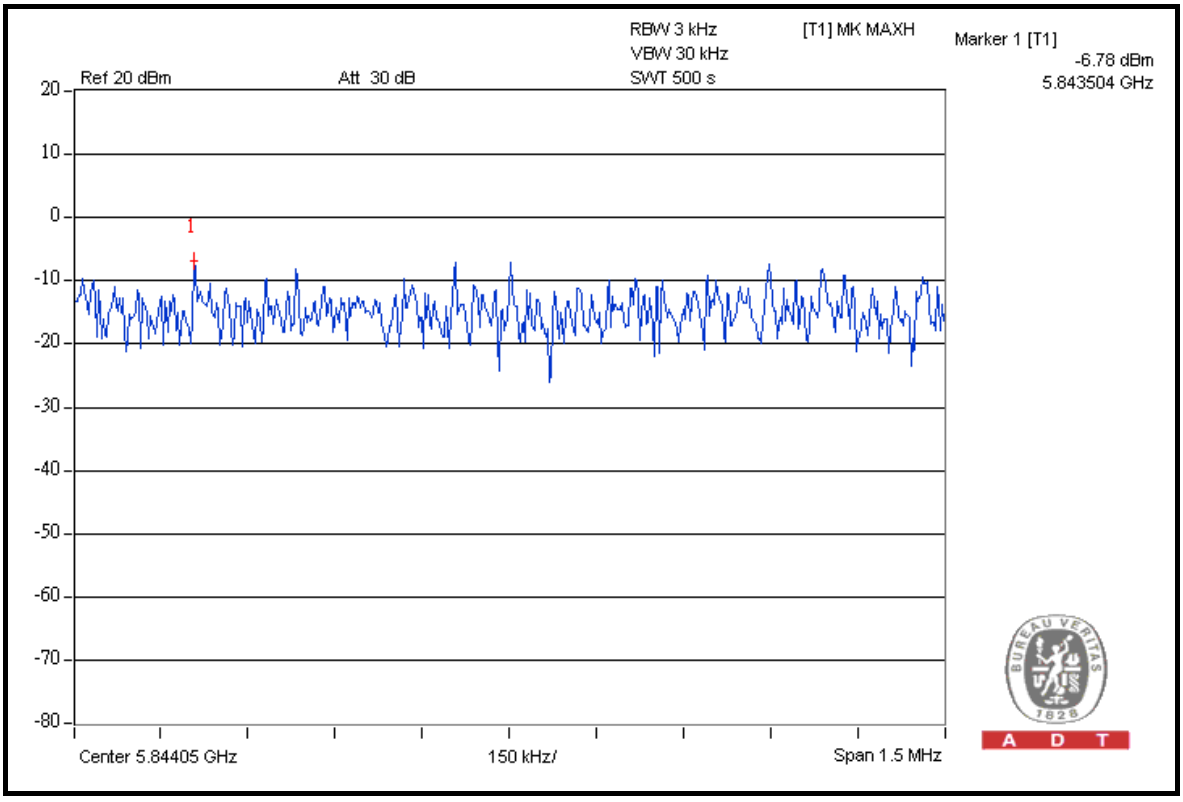
Low



Middle


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-6.87 dBm
5.786310 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
Center 5.78631 GHz
150 kHz/
Span 1.5 MHz

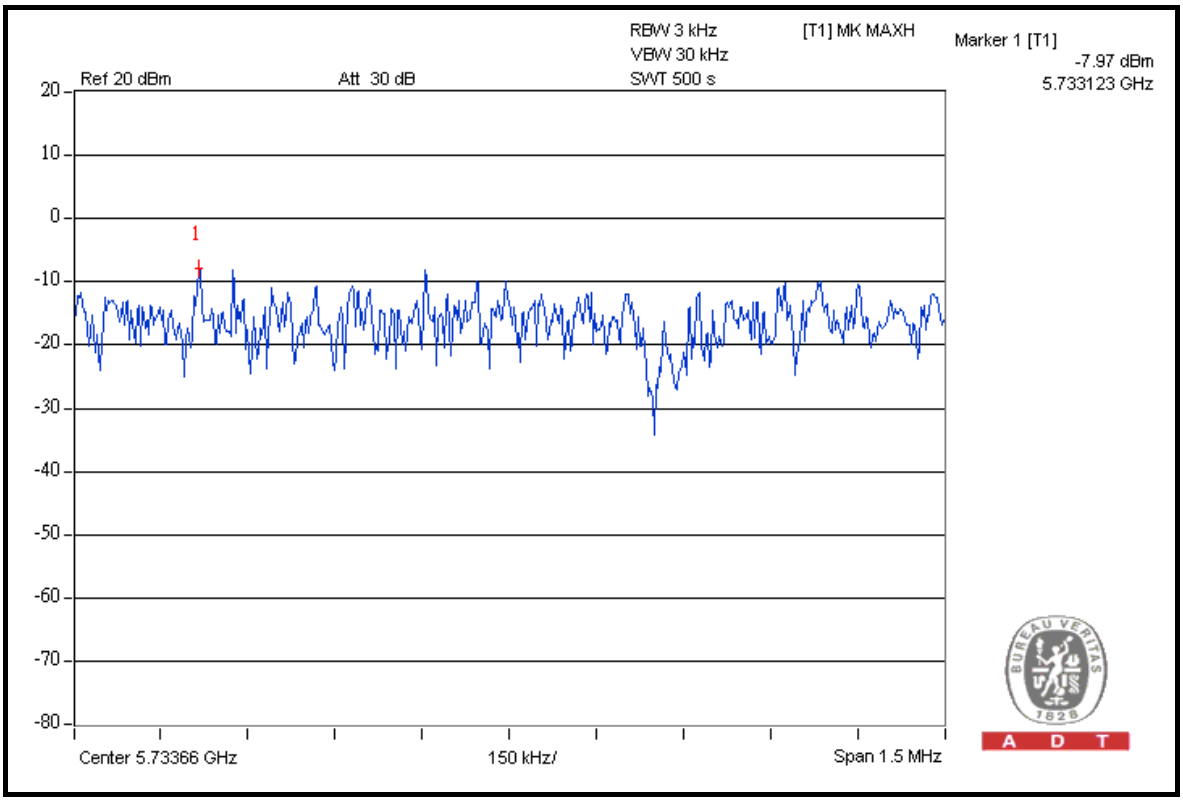
High


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-6.78 dBm
5.843504 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
Center 5.84405 GHz
150 kHz/
Span 1.5 MHz

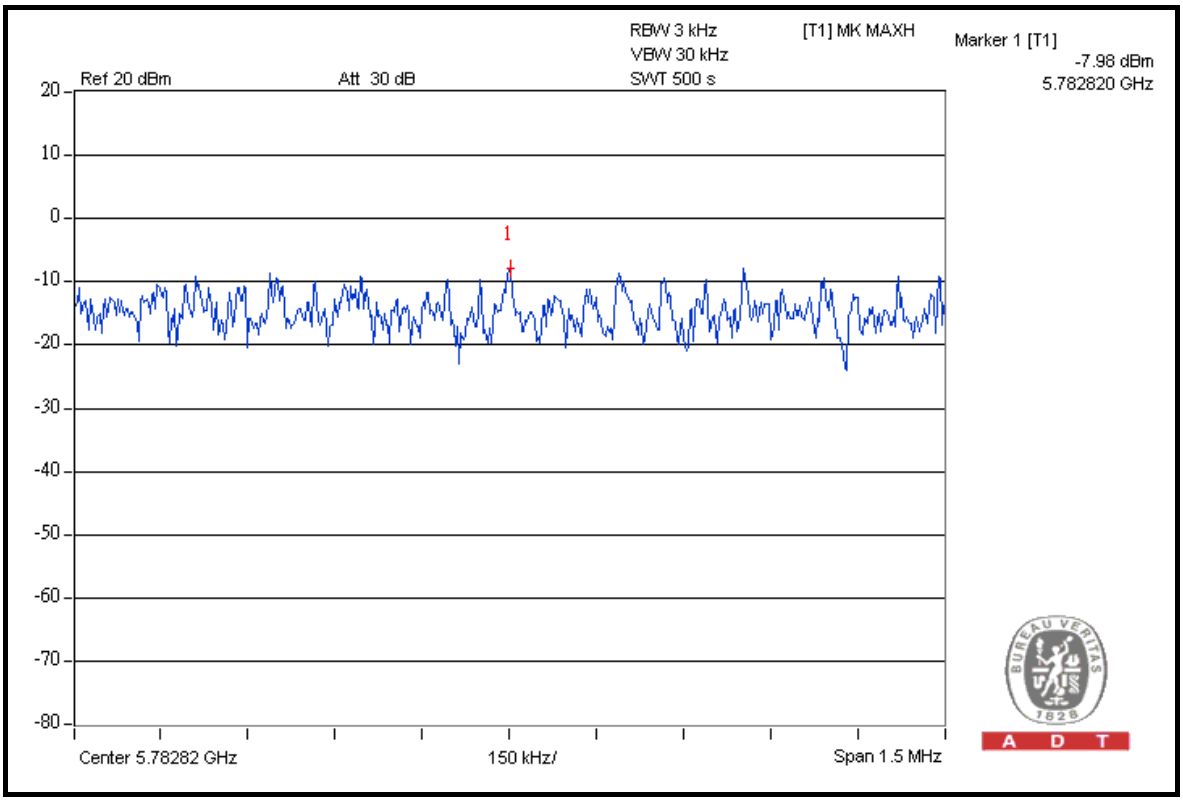
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	C
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3kHz BW (dBm)	MAXIMUM LIMIT (dBm)	PASS / FAIL
Low	5734.0	-7.97	8.0	PASS
Middle	5788.0	-7.98	8.0	PASS
High	5841.0	-7.97	8.0	PASS

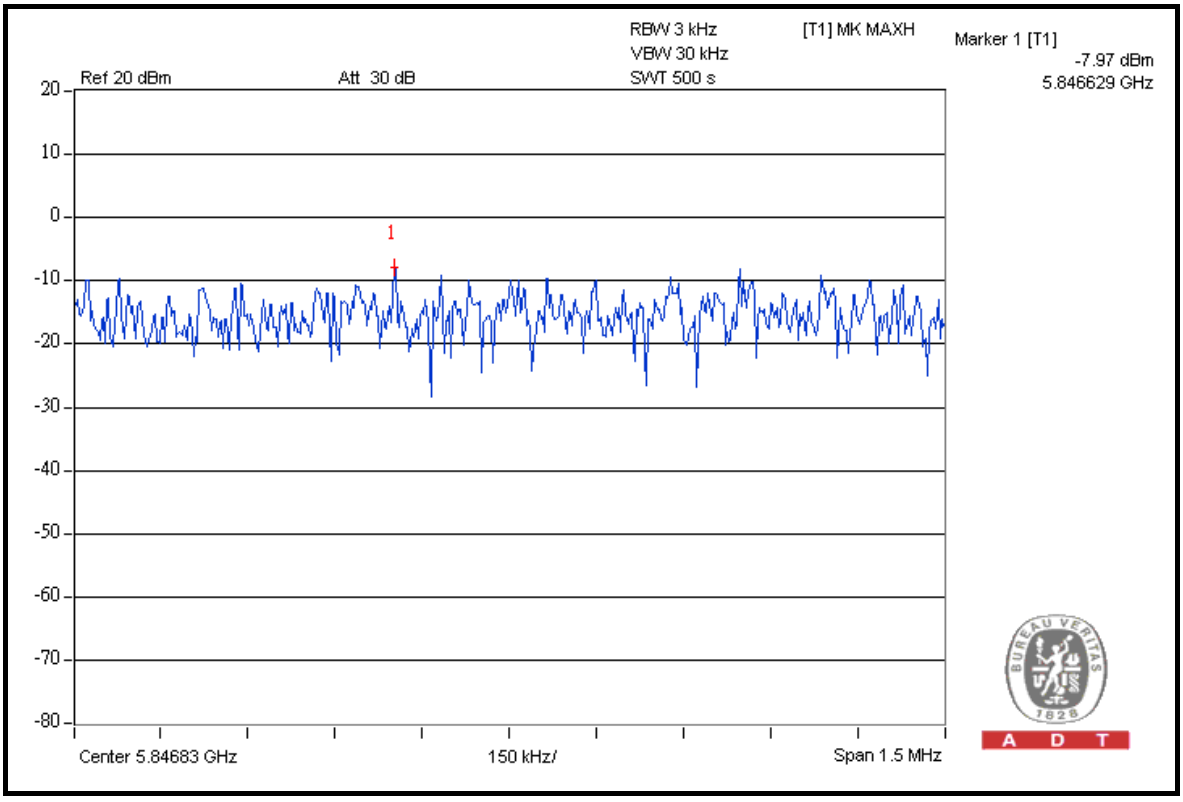
Low



Middle


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-7.98 dBm
5.782820 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
1
Center 5.78282 GHz
150 kHz/
Span 1.5 MHz

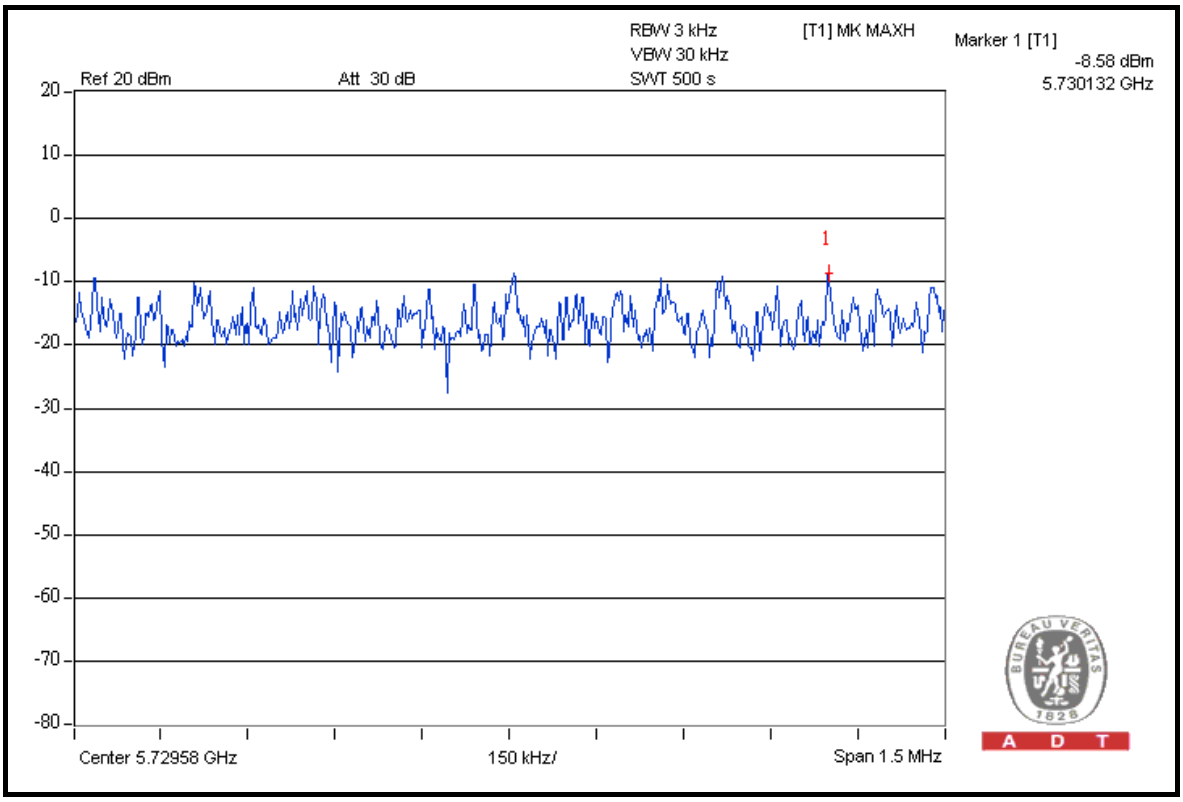
High


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-7.97 dBm
5.846629 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
1
Center 5.84683 GHz
150 kHz/
Span 1.5 MHz

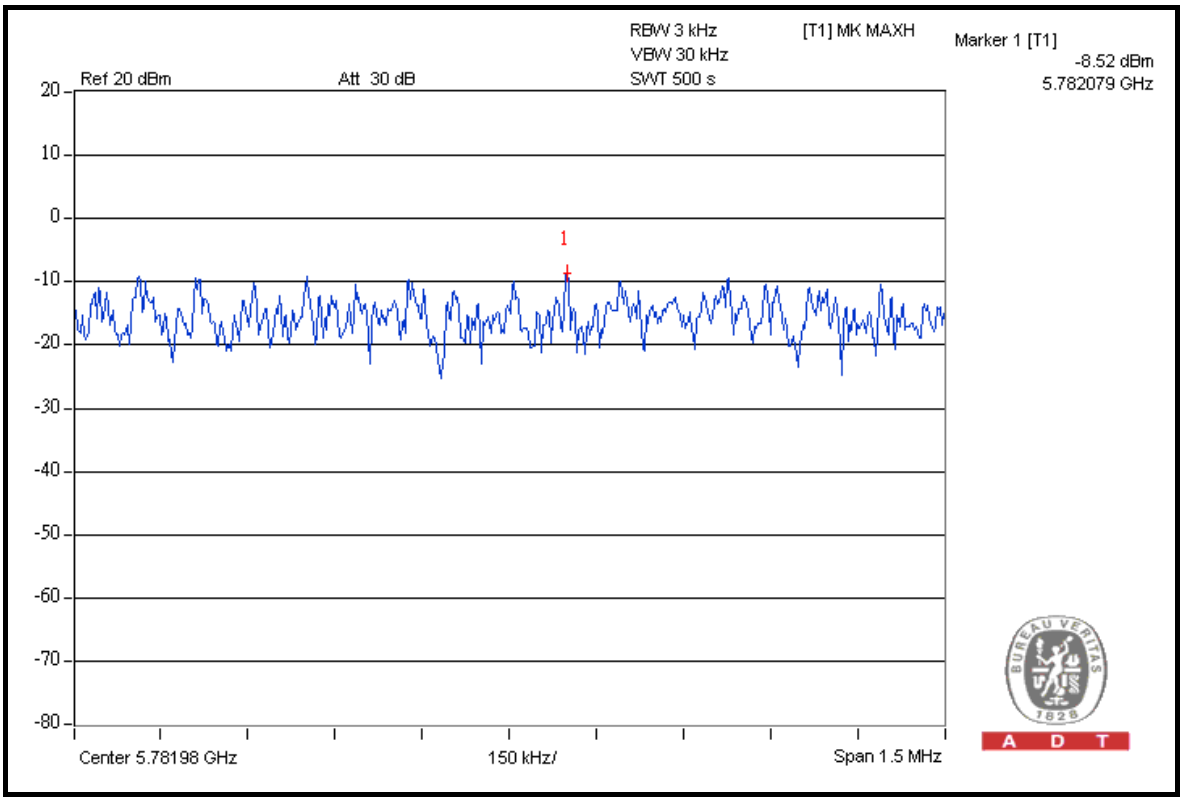
MODULATION TYPE	BPSK	**ENVIRONMENTAL CONDITIONS**	25 deg.C, 65%RH, 1024hPa
INPUT POWER (SYSTEM)	120Vac, 60Hz	**TEST MODE**	D
TESTED BY	Brad Wu		

CHANNEL	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3kHz BW (dBm)	MAXIMUM LIMIT (dBm)	PASS / FAIL
Low	5736.5	-8.58	8.0	PASS
Middle	5788.0	-8.52	8.0	PASS
High	5838.5	-8.45	8.0	PASS

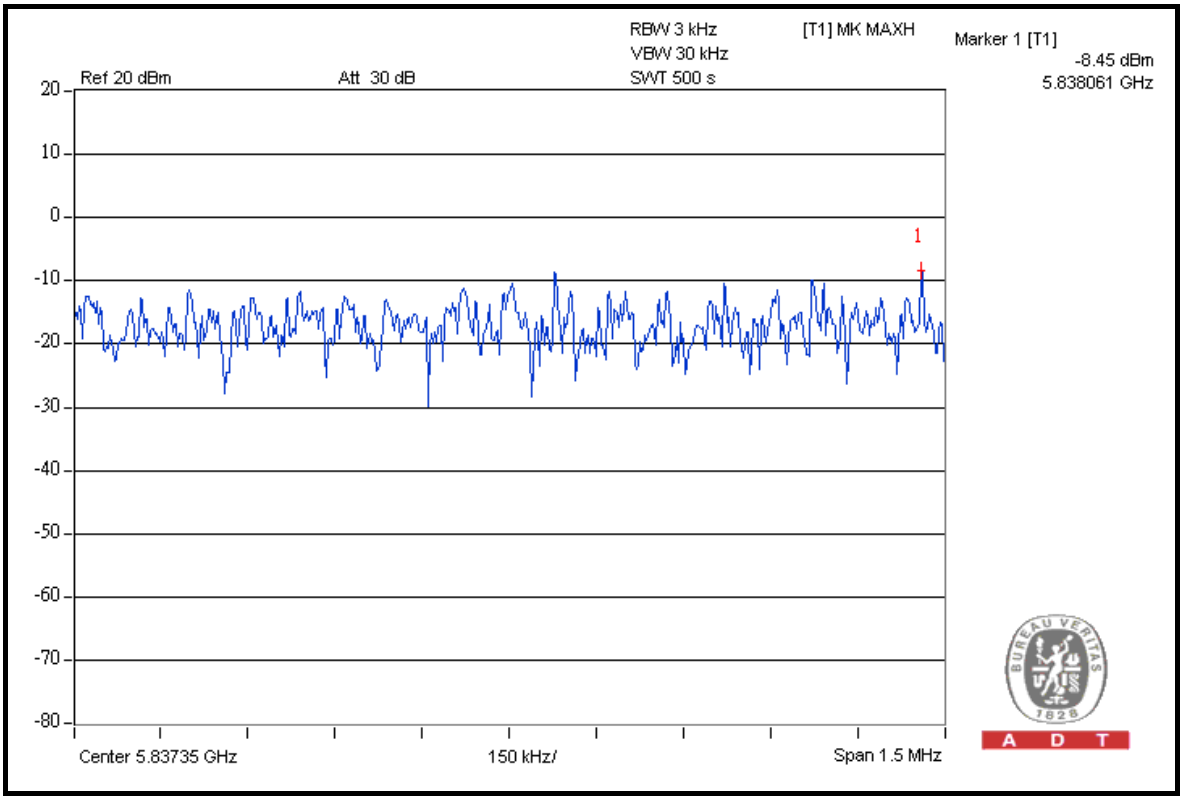
Low



Middle


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-8.52 dBm
5.782079 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
1
Center 5.78198 GHz
150 kHz/
Span 1.5 MHz

High


RBW 3 kHz
VBW 30 kHz
SWT 500 s
[T1] MK MAXH
Marker 1 [T1]
-8.45 dBm
5.838061 GHz
Ref 20 dBm
Att 30 dB
20
10
0
-10
-20
-30
-40
-50
-60
-70
-80
1
Center 5.83735 GHz
150 kHz/
Span 1.5 MHz

4.6 BAND EDGES MEASUREMENT

4.6.1 LIMITS OF BAND EDGES MEASUREMENT

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

4.6.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	DATE OF CALIBRATION	DUE DATE OF CALIBRATION
R&S SPECTRUM ANALYZER	FSP40	100041	Apr. 22, 2008	Apr. 21, 2009

NOTE: The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

4.6.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer via a low lose cable. Set both RBW and VBW of spectrum analyzer to 100kHz and 300kHz with suitable frequency span including 100MHz bandwidth from band edge. The band edges was measured and recorded.

The spectrum plots (Peak RBW=100kHz, VBW=300kHz; Average RBW=1MHz, VBW= 10Hz are attached on the following pages.

4.6.4 DEVIATION FROM TEST STANDARD

No deviation

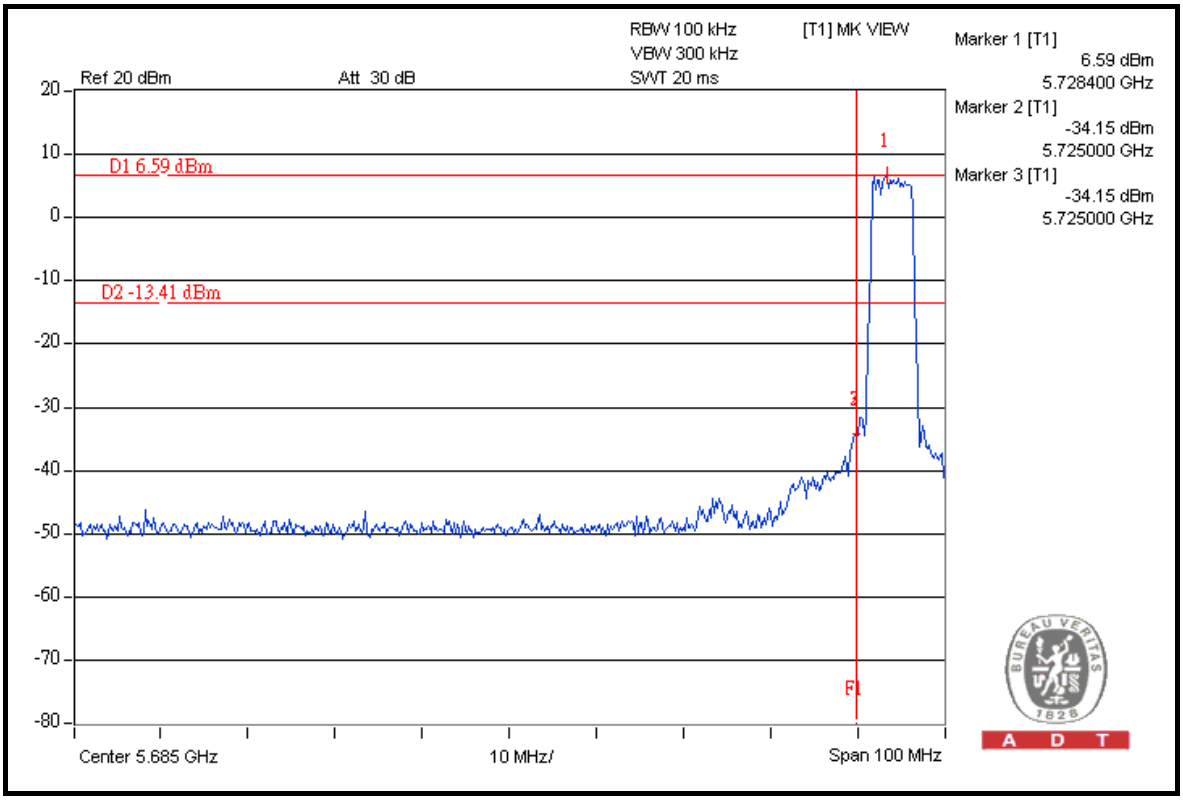
4.6.5 EUT OPERATING CONDITION

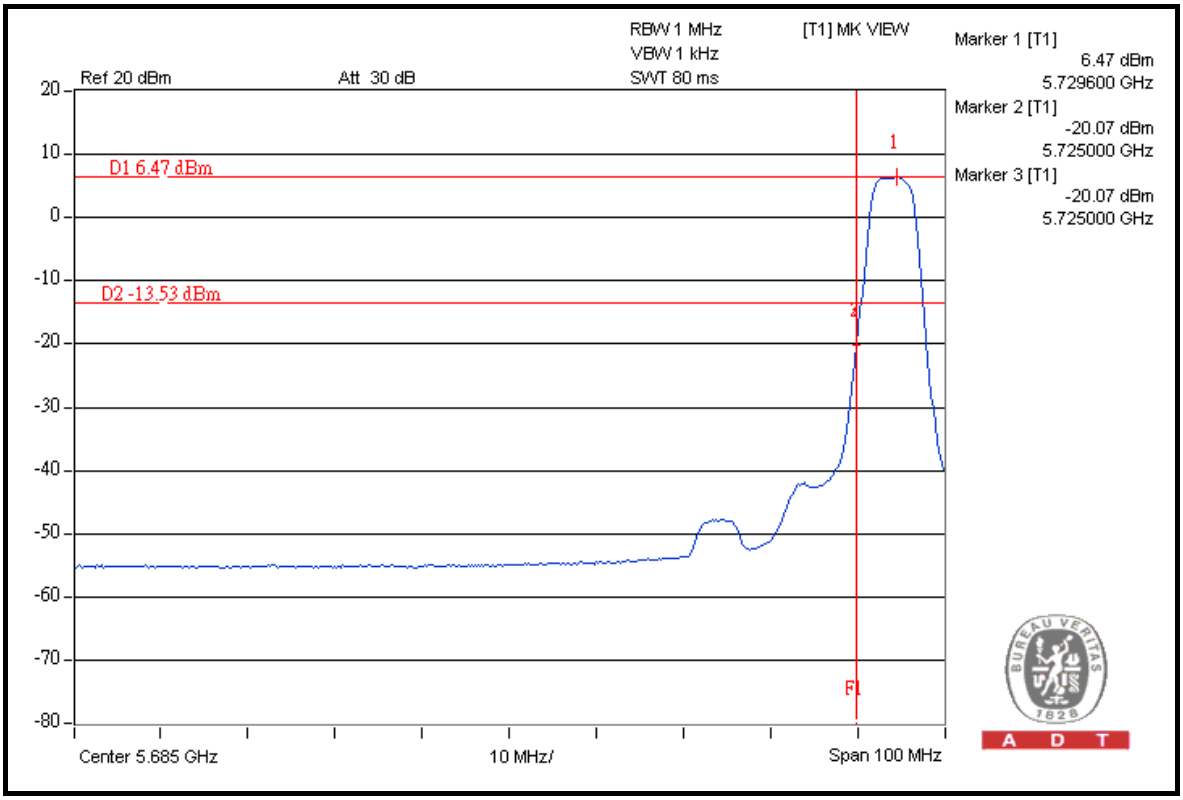
Same as Item 5.3.6

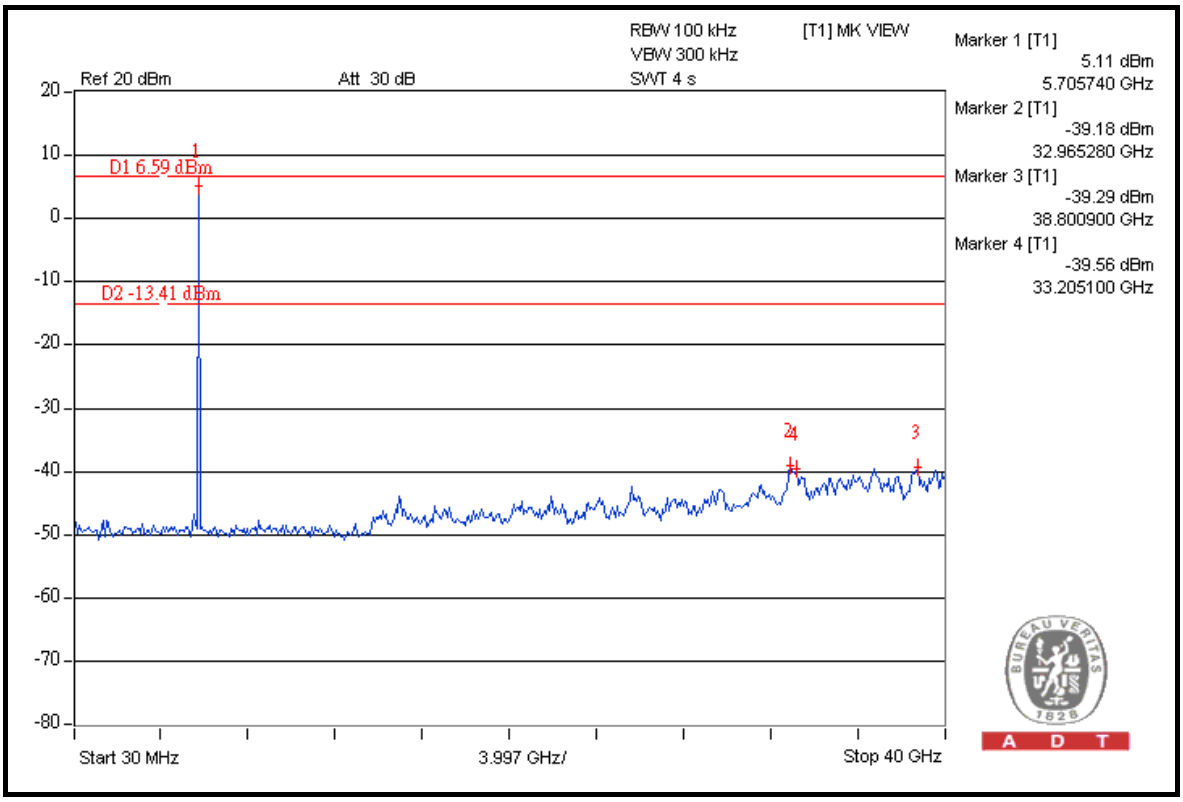
4.6.6 TEST RESULTS

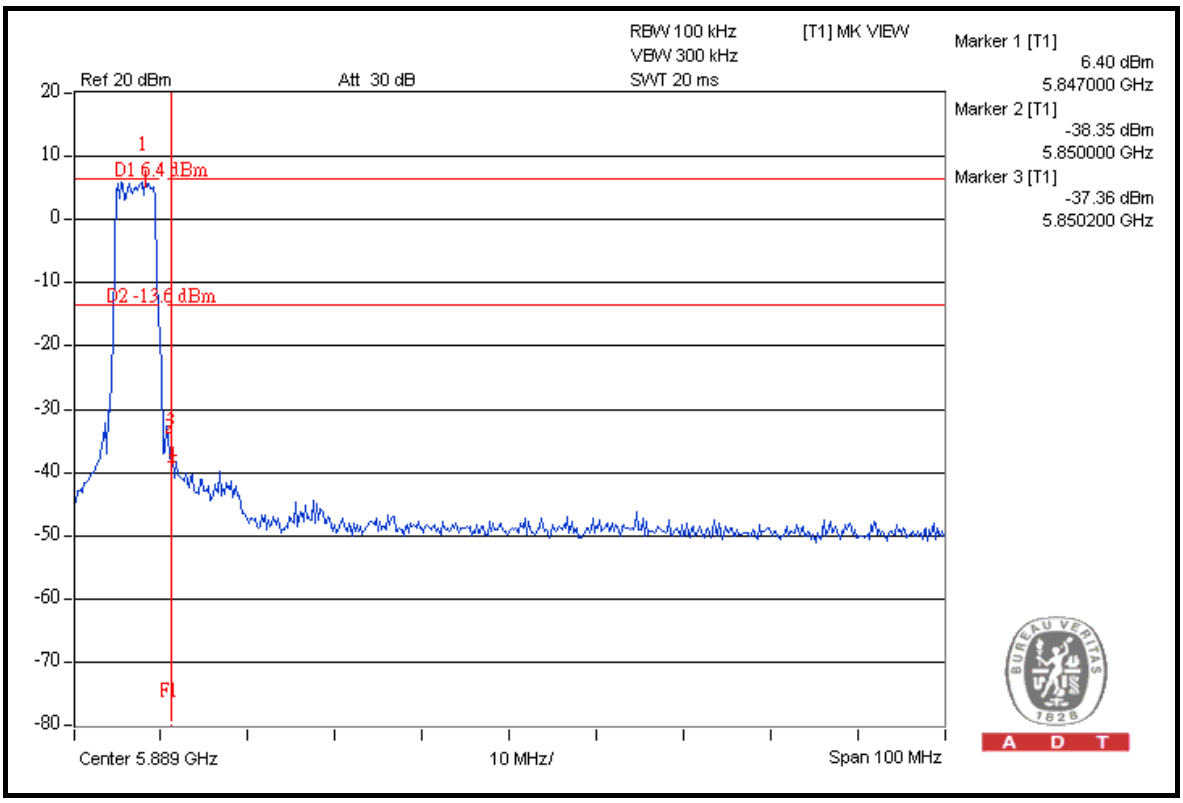
The spectrum plots are attached on the following pages. D1 line indicates the highest level, D2 line indicates the 20dB offset below D1. It shows compliance with the requirement in part 15.247(d).

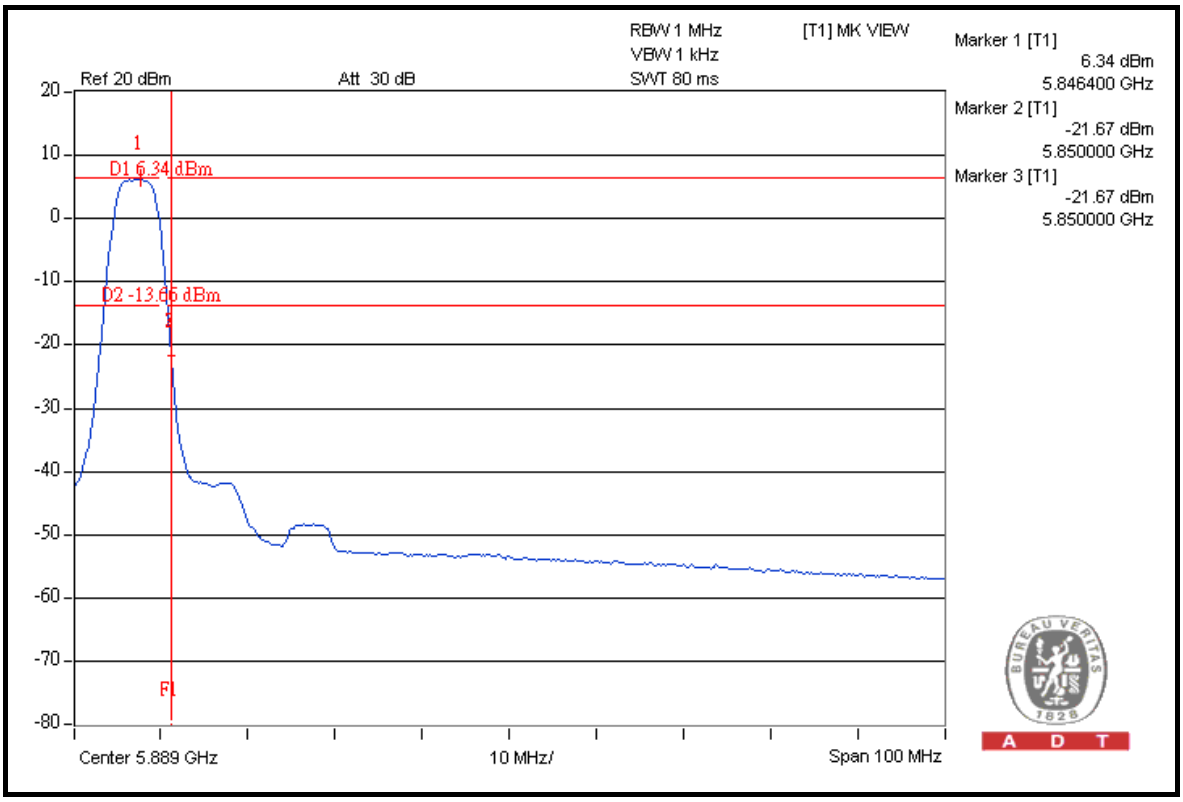
TEST MODE A

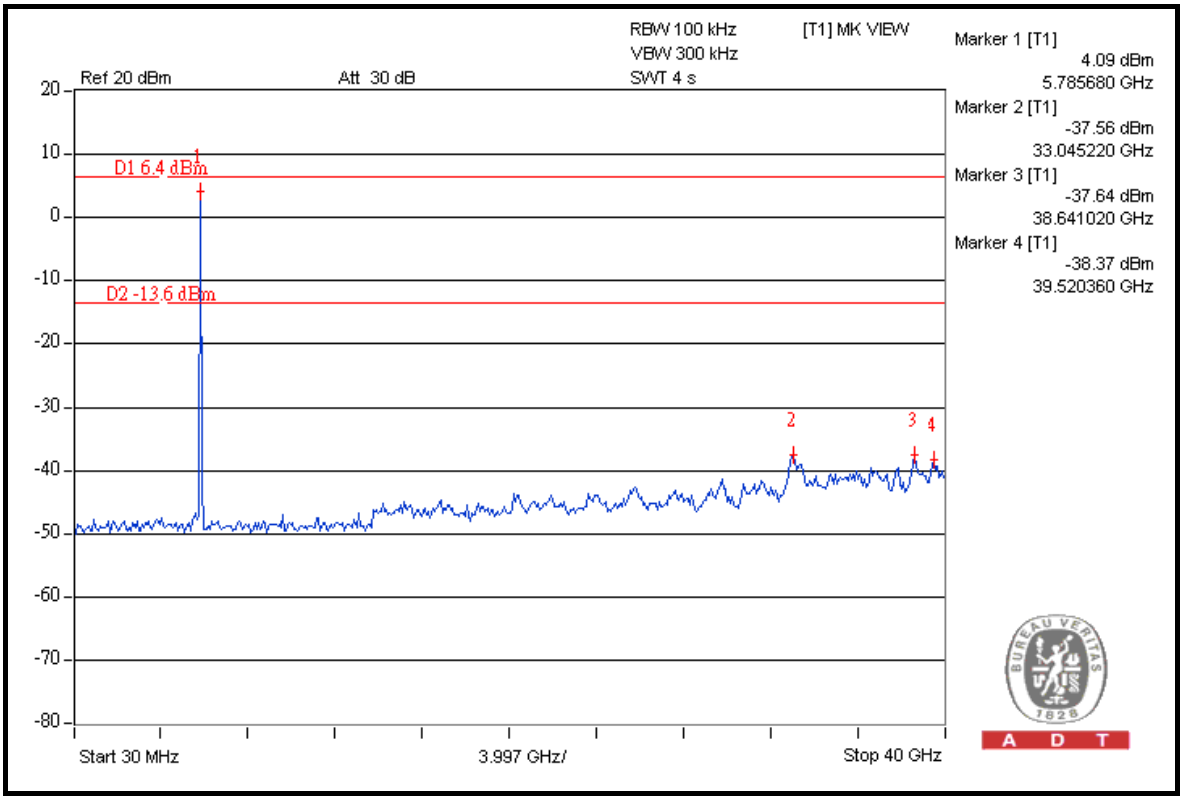

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
6.59 dBm
5.728400 GHz
Marker 2 [T1]
-34.15 dBm
5.725000 GHz
Marker 3 [T1]
-34.15 dBm
5.725000 GHz
D1 6.59 dBm
D2 -13.41 dBm
Center 5.685 GHz
10 MHz/
Span 100 MHz


RBW 1 MHz
VBW 1 kHz
SWT 80 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
6.47 dBm
5.729600 GHz
Marker 2 [T1]
-20.07 dBm
5.725000 GHz
Marker 3 [T1]
-20.07 dBm
5.725000 GHz
D1 6.47 dBm
D2 -13.53 dBm
Center 5.685 GHz
10 MHz/
Span 100 MHz

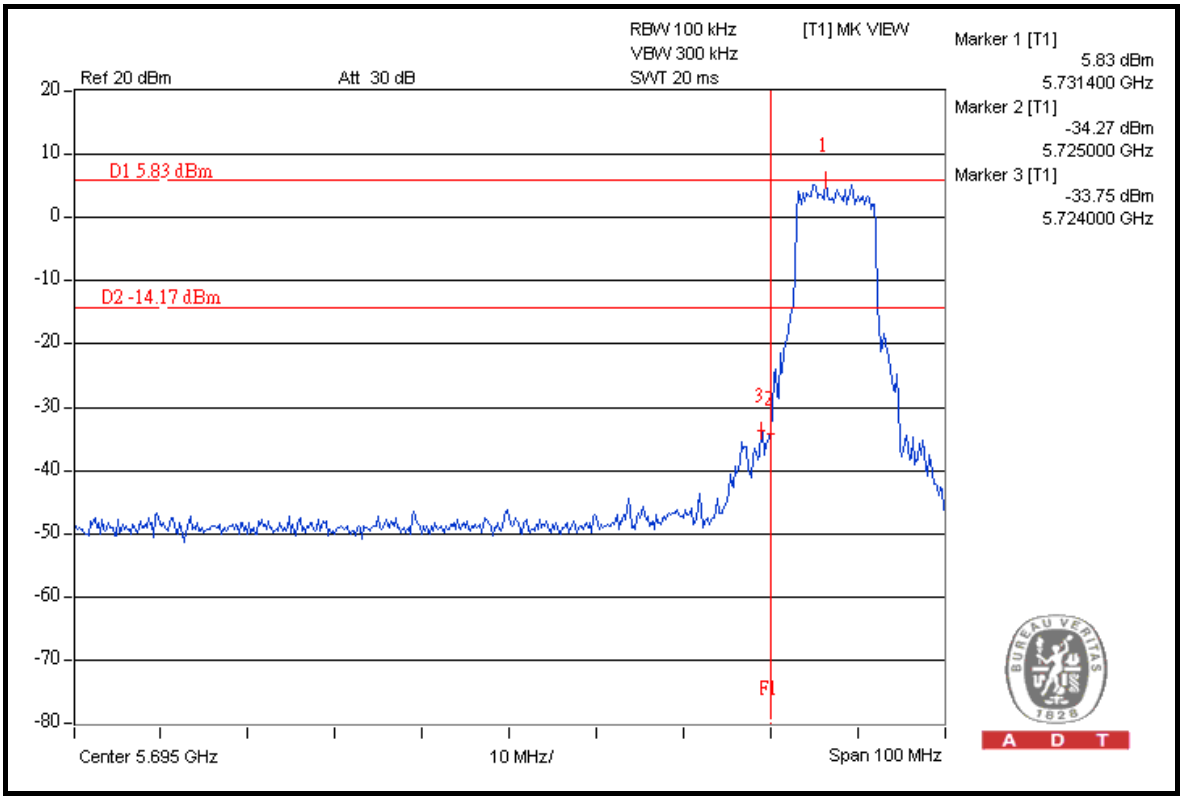

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 6.59 dBm
D2 -13.41 dBm
Marker 1 [T1]
5.11 dBm
5.705740 GHz
Marker 2 [T1]
-39.18 dBm
32.965280 GHz
Marker 3 [T1]
-39.29 dBm
38.800900 GHz
Marker 4 [T1]
-39.56 dBm
33.205100 GHz
Start 30 MHz
3.997 GHz/
Stop 40 GHz

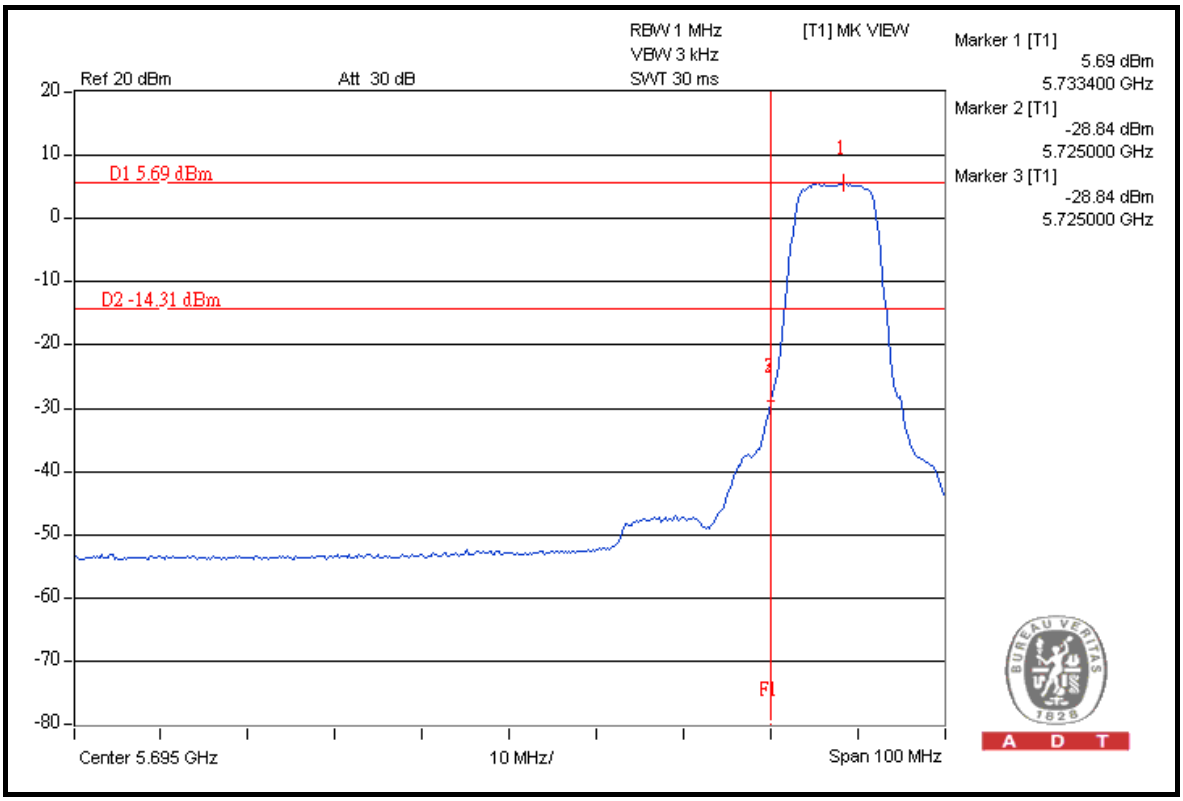

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 6.4 dBm
D2 -13.6 dBm
Marker 1 [T1]
6.40 dBm
5.847000 GHz
Marker 2 [T1]
-38.35 dBm
5.850000 GHz
Marker 3 [T1]
-37.36 dBm
5.850200 GHz
Center 5.889 GHz
10 MHz/
Span 100 MHz

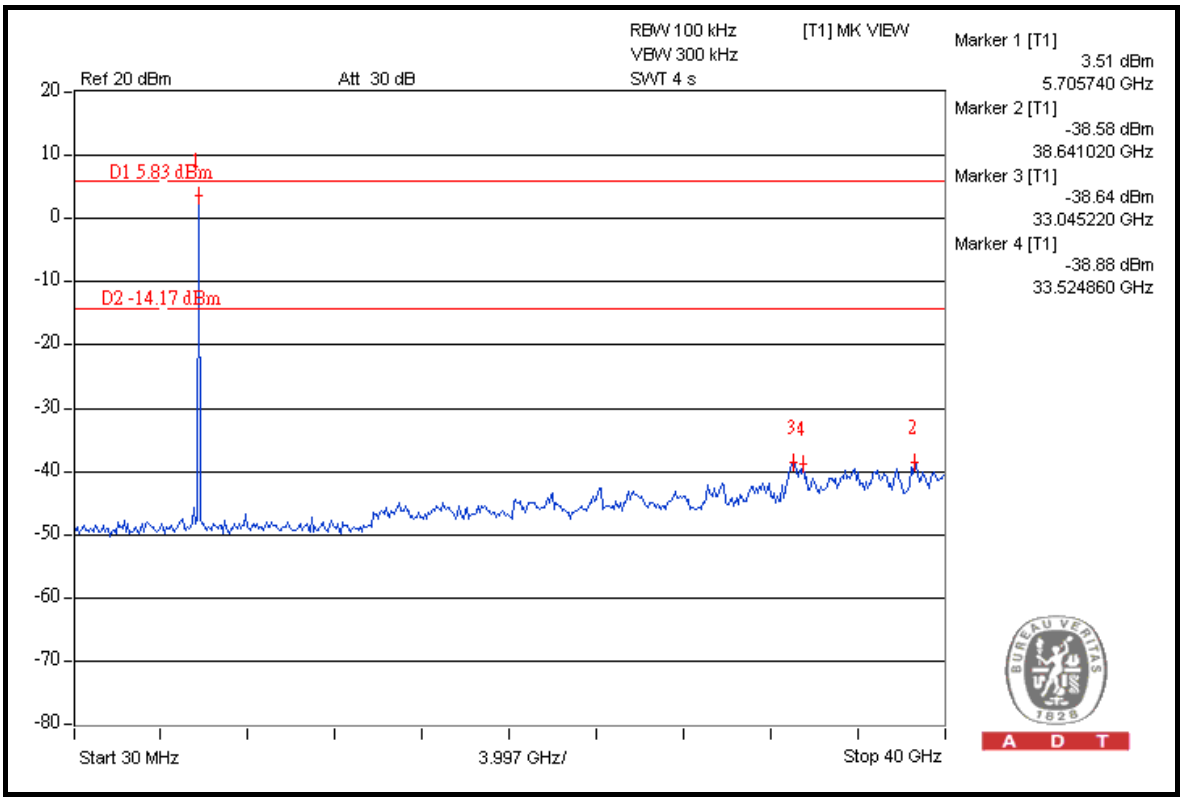

RBW 1 MHz
VBW 1 kHz
SWT 80 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
6.34 dBm
5.846400 GHz
Marker 2 [T1]
-21.67 dBm
5.850000 GHz
Marker 3 [T1]
-21.67 dBm
5.850000 GHz
D1 6.34 dBm
D2 -13.66 dBm
Center 5.889 GHz
10 MHz/
Span 100 MHz

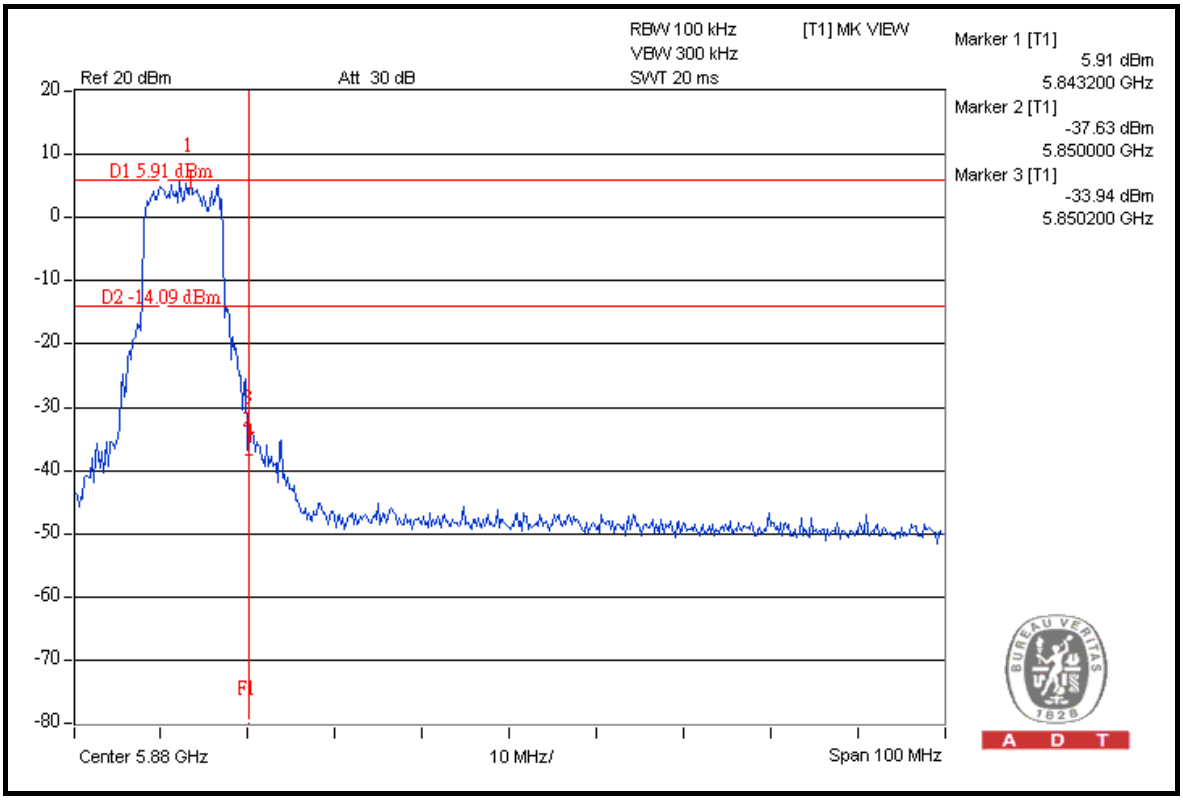

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
4.09 dBm
5.785680 GHz
Marker 2 [T1]
-37.56 dBm
33.045220 GHz
Marker 3 [T1]
-37.64 dBm
38.641020 GHz
Marker 4 [T1]
-38.37 dBm
39.520360 GHz
D1 6.4 dBm
D2 -13.6 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz

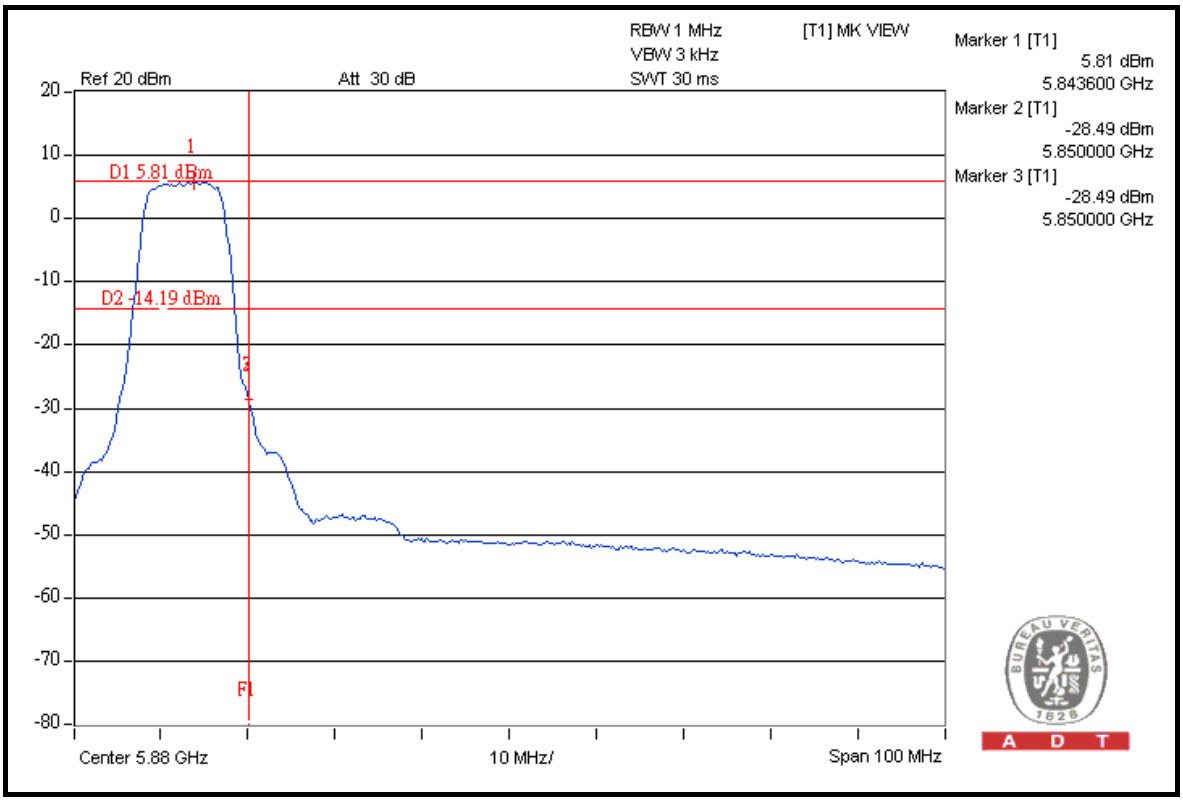
TEST MODE B

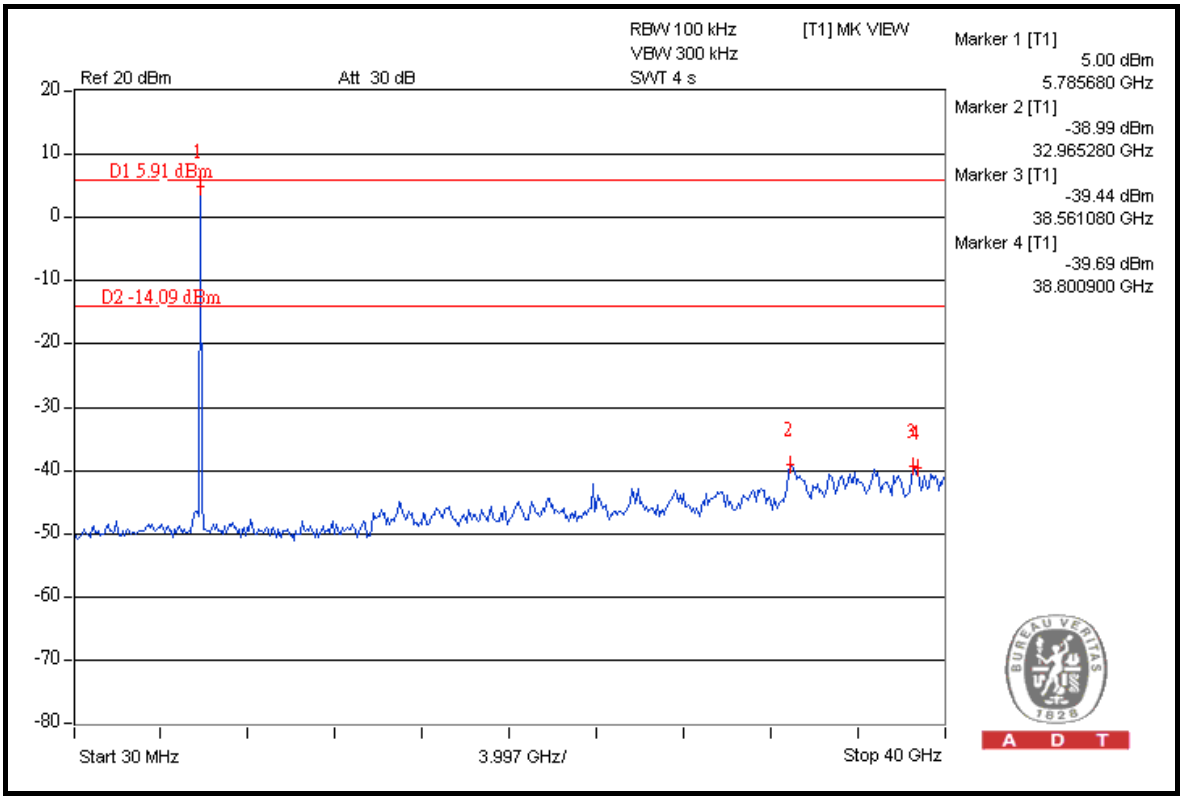

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.83 dBm
D2 -14.17 dBm
Marker 1 [T1]
5.83 dBm
5.731400 GHz
Marker 2 [T1]
-34.27 dBm
5.725000 GHz
Marker 3 [T1]
-33.75 dBm
5.724000 GHz
Center 5.695 GHz
10 MHz/
Span 100 MHz


RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.69 dBm
D2 -14.31 dBm
Marker 1 [T1]
5.69 dBm
5.733400 GHz
Marker 2 [T1]
-28.84 dBm
5.725000 GHz
Marker 3 [T1]
-28.84 dBm
5.725000 GHz
Center 5.695 GHz
10 MHz/
Span 100 MHz

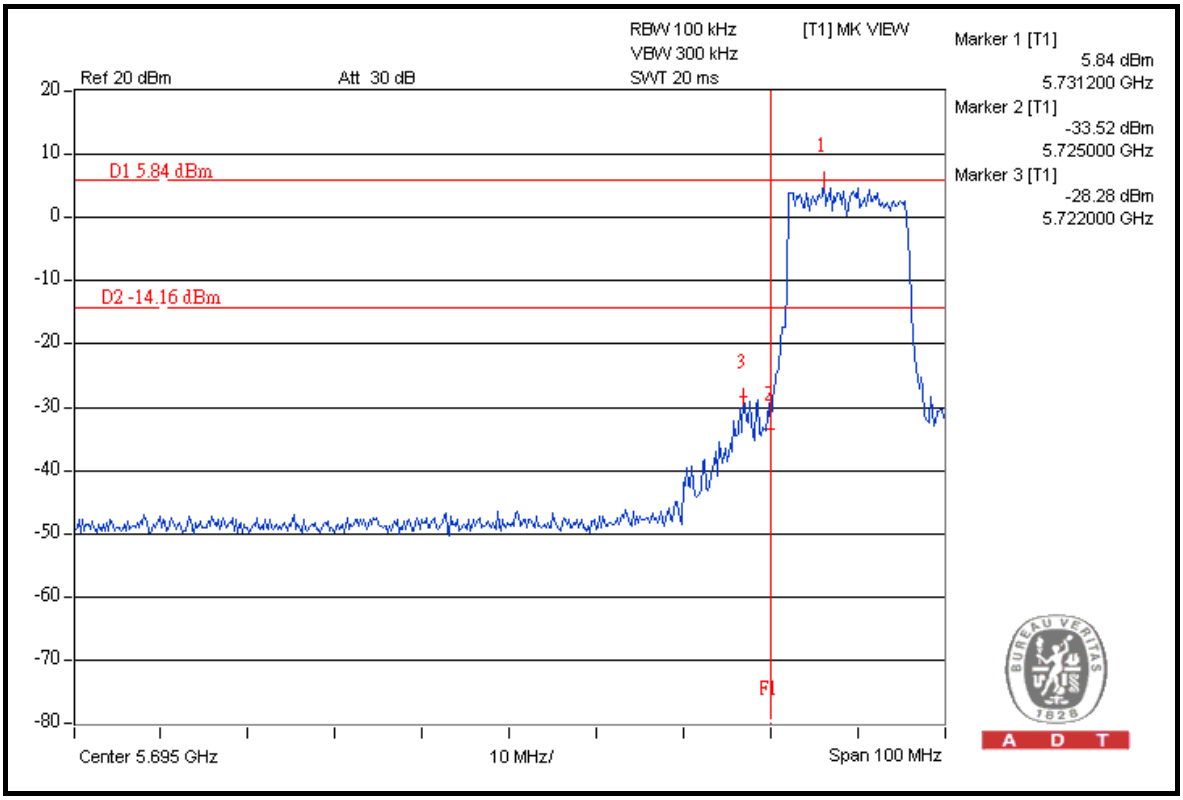

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
3.51 dBm
5.705740 GHz
Marker 2 [T1]
-38.58 dBm
38.641020 GHz
Marker 3 [T1]
-38.64 dBm
33.045220 GHz
Marker 4 [T1]
-38.88 dBm
33.524860 GHz
D1 5.83 dBm
D2 -14.17 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz

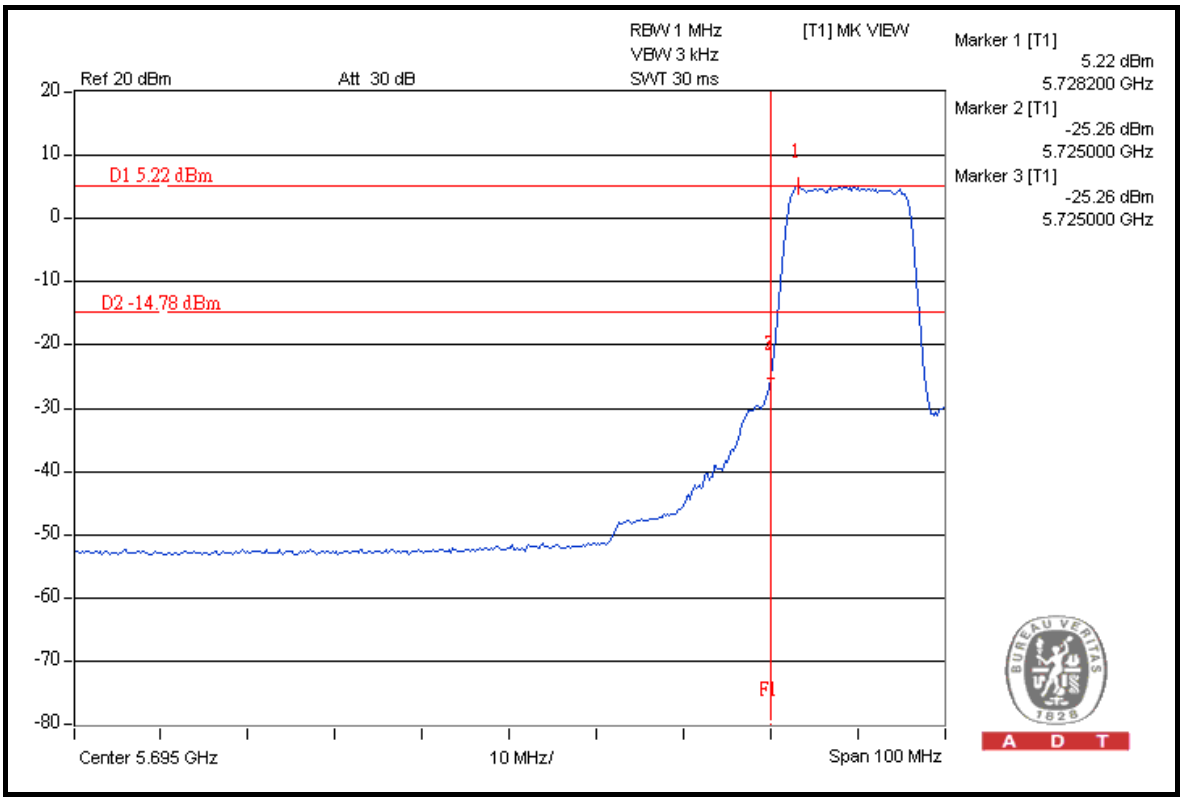

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.91 dBm
5.843200 GHz
Marker 2 [T1]
-37.63 dBm
5.850000 GHz
Marker 3 [T1]
-33.94 dBm
5.850200 GHz
D1 5.91 dBm
D2 -14.09 dBm
Center 5.88 GHz
10 MHz/
Span 100 MHz

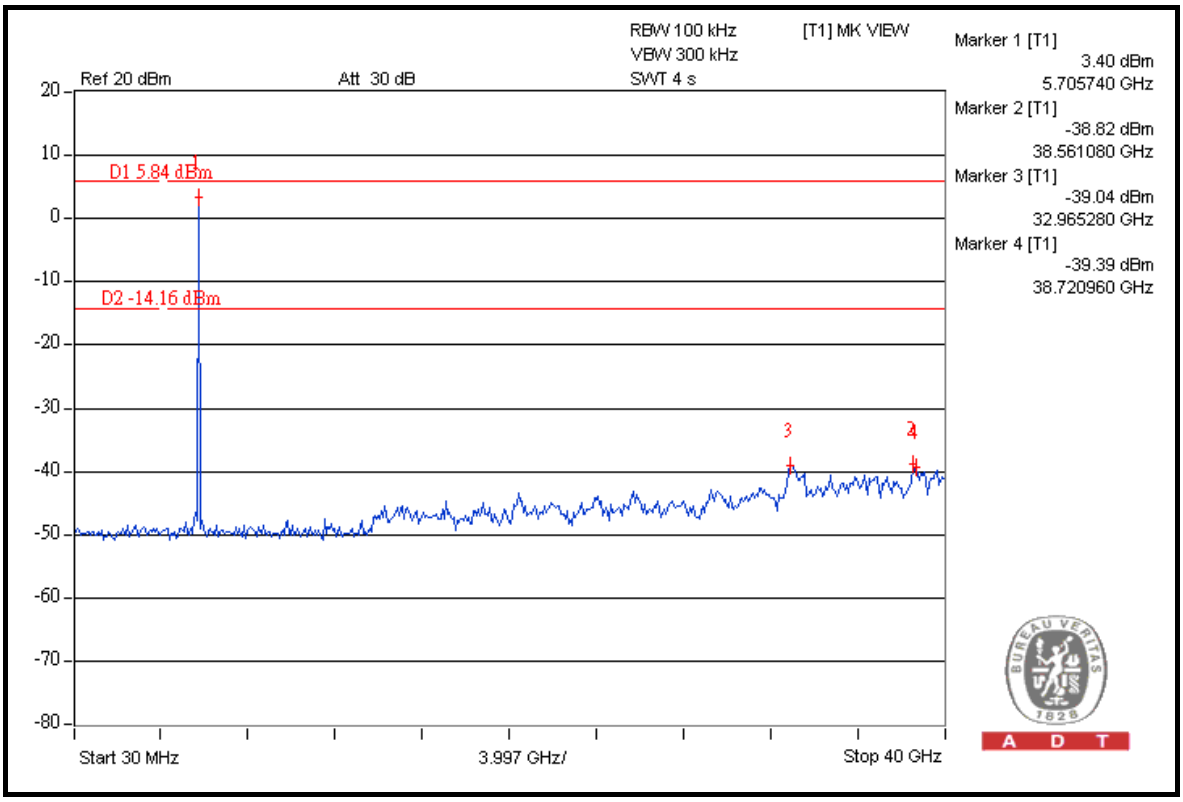

RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.81 dBm
5.843600 GHz
Marker 2 [T1]
-28.49 dBm
5.850000 GHz
Marker 3 [T1]
-28.49 dBm
5.850000 GHz
D1 5.81 dBm
D2 -14.19 dBm
Center 5.88 GHz
10 MHz/
Span 100 MHz

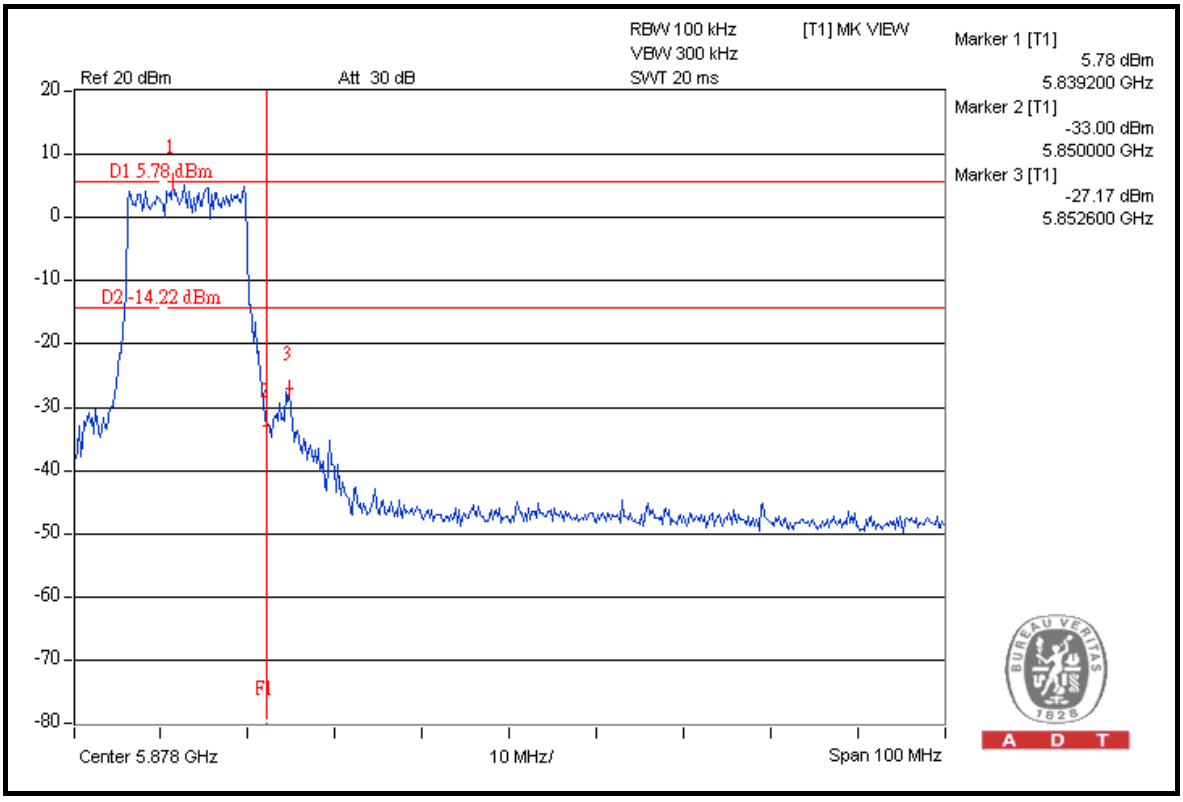

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.00 dBm
5.785680 GHz
Marker 2 [T1]
-38.99 dBm
32.965280 GHz
Marker 3 [T1]
-39.44 dBm
38.561080 GHz
Marker 4 [T1]
-39.69 dBm
38.800900 GHz
D1 5.91 dBm
D2 -14.09 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz

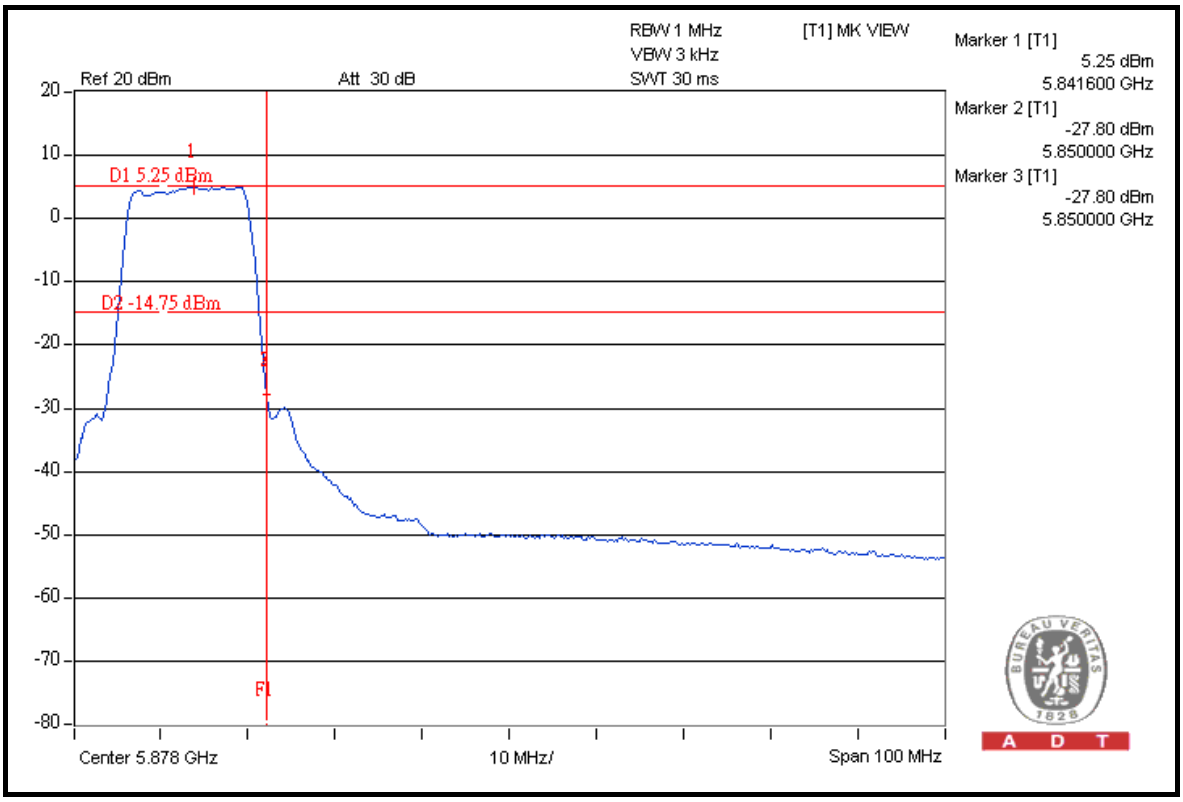
TEST MODE C

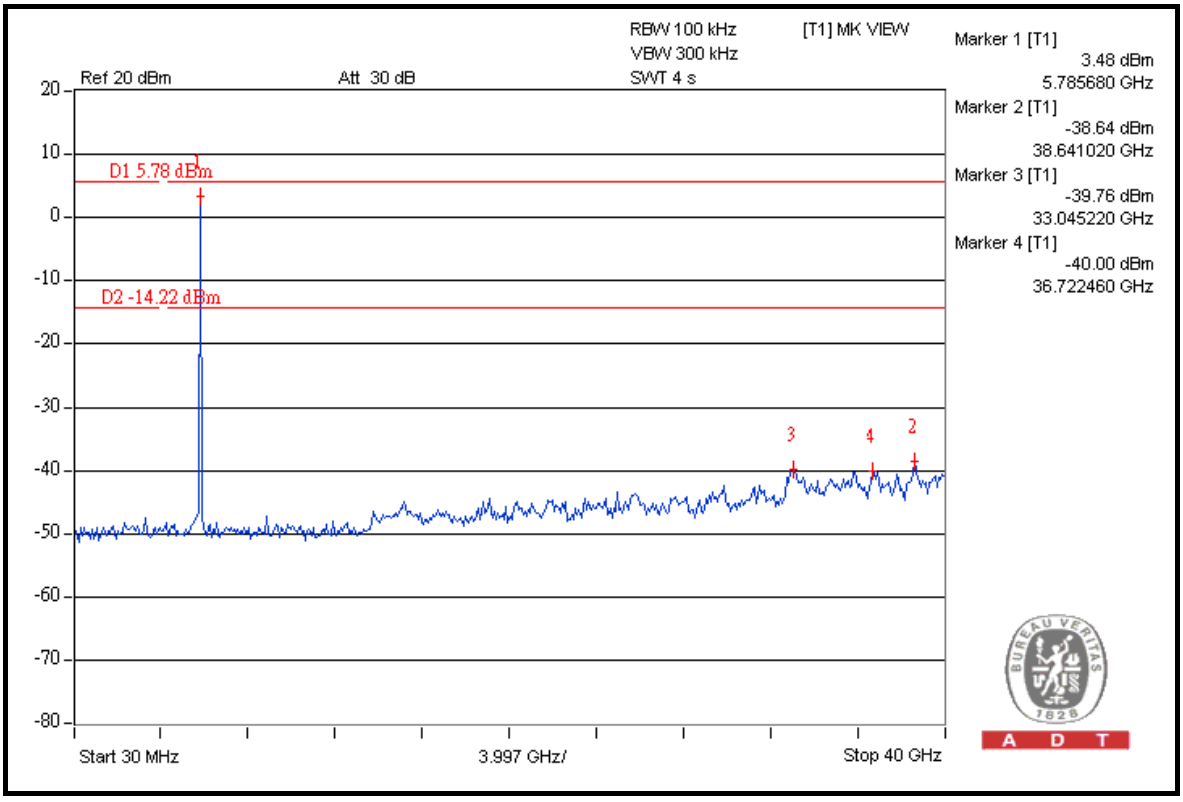

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.84 dBm
D2 -14.16 dBm
Marker 1 [T1]
5.84 dBm
5.731200 GHz
Marker 2 [T1]
-33.52 dBm
5.725000 GHz
Marker 3 [T1]
-28.28 dBm
5.722000 GHz
Center 5.695 GHz
10 MHz/
Span 100 MHz


RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.22 dBm
D2 -14.78 dBm
Marker 1 [T1]
5.22 dBm
5.728200 GHz
Marker 2 [T1]
-25.26 dBm
5.725000 GHz
Marker 3 [T1]
-25.26 dBm
5.725000 GHz
Center 5.695 GHz
10 MHz/
Span 100 MHz

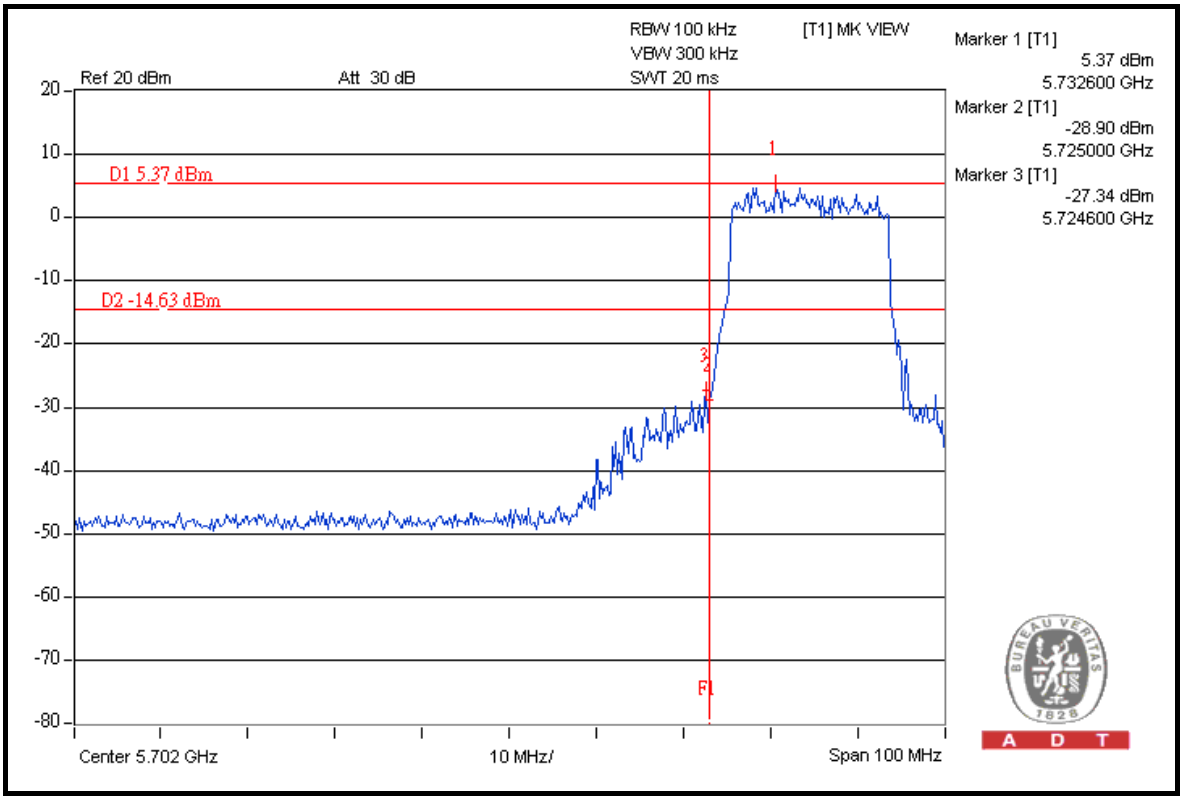

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.84 dBm
D2 -14.16 dBm
Marker 1 [T1]
3.40 dBm
5.705740 GHz
Marker 2 [T1]
-38.82 dBm
38.561080 GHz
Marker 3 [T1]
-39.04 dBm
32.965280 GHz
Marker 4 [T1]
-39.39 dBm
38.720960 GHz
Start 30 MHz
3.997 GHz/
Stop 40 GHz

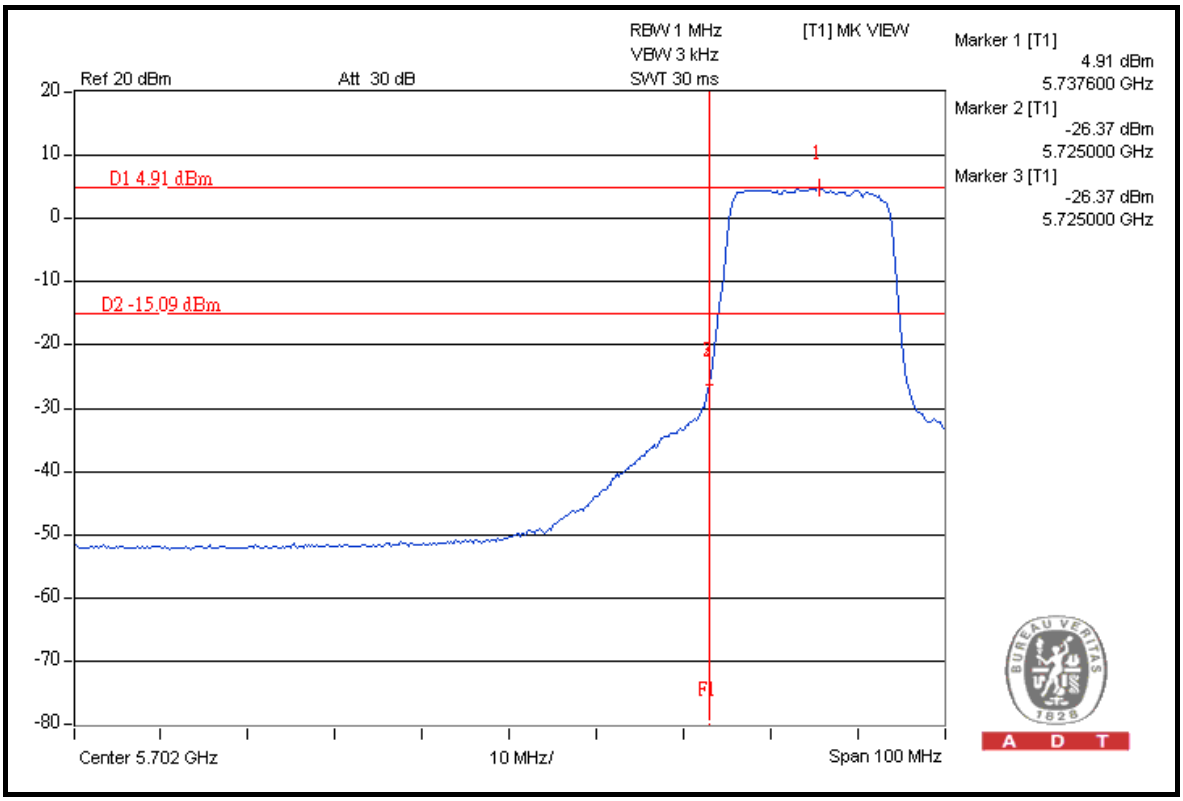

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
D1 5.78 dBm
D2 -14.22 dBm
Marker 1 [T1]
5.78 dBm
5.839200 GHz
Marker 2 [T1]
-33.00 dBm
5.850000 GHz
Marker 3 [T1]
-27.17 dBm
5.852600 GHz
Center 5.878 GHz
10 MHz/
Span 100 MHz

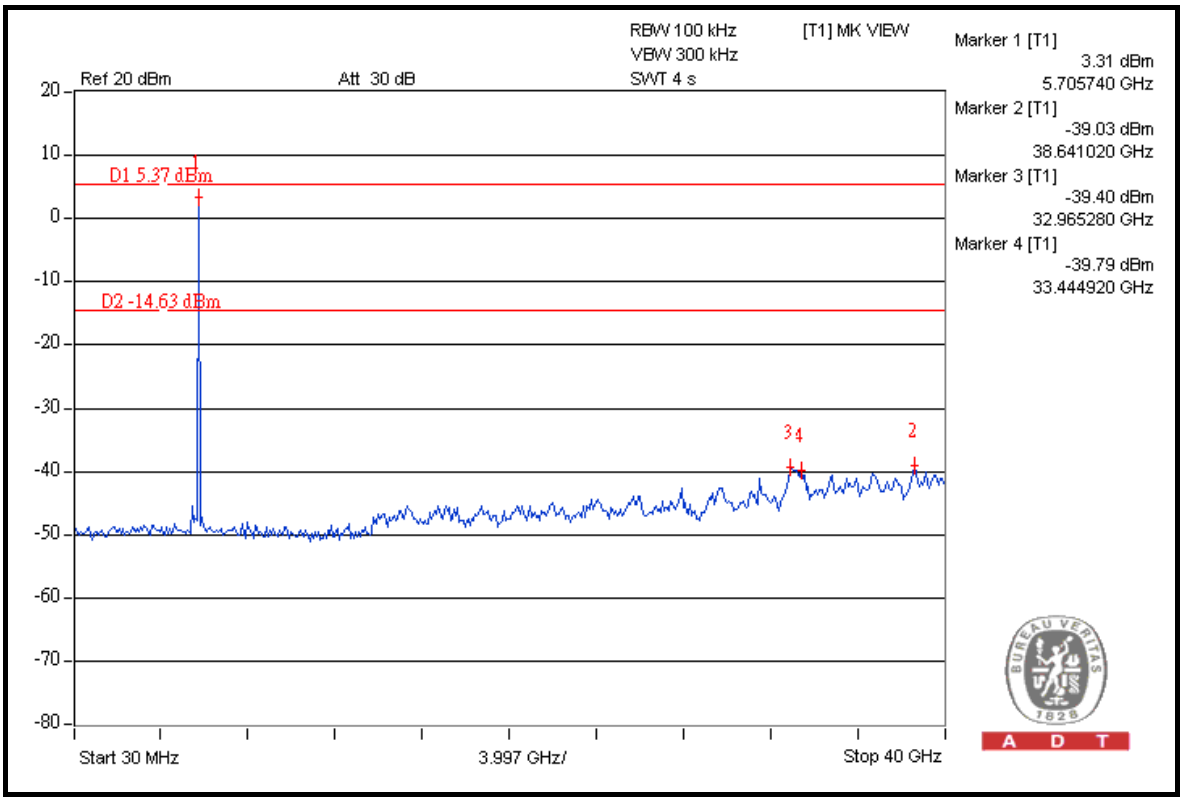

RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.25 dBm
5.841600 GHz
Marker 2 [T1]
-27.80 dBm
5.850000 GHz
Marker 3 [T1]
-27.80 dBm
5.850000 GHz
D1 5.25 dBm
D2 -14.75 dBm
Center 5.878 GHz
10 MHz/
Span 100 MHz

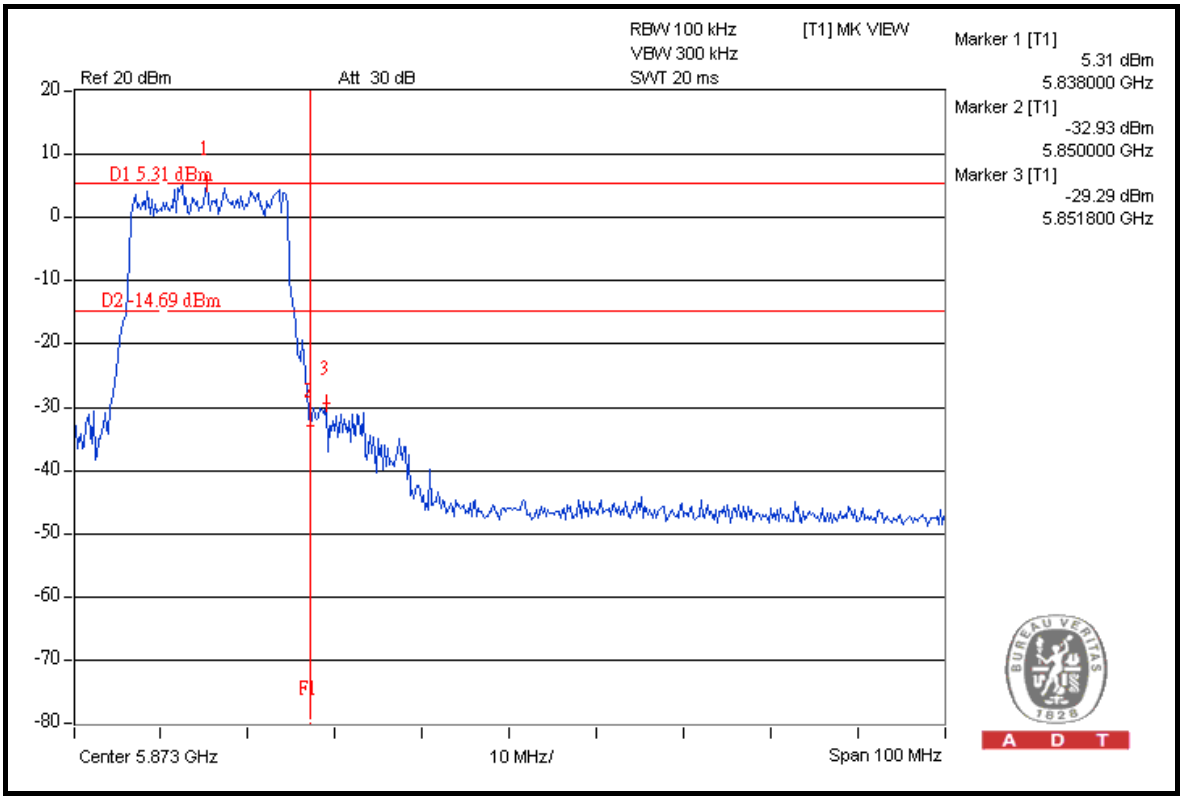

RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
3.48 dBm
5.785680 GHz
Marker 2 [T1]
-38.64 dBm
38.641020 GHz
Marker 3 [T1]
-39.76 dBm
33.045220 GHz
Marker 4 [T1]
-40.00 dBm
36.722460 GHz
D1 5.78 dBm
D2 -14.22 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz

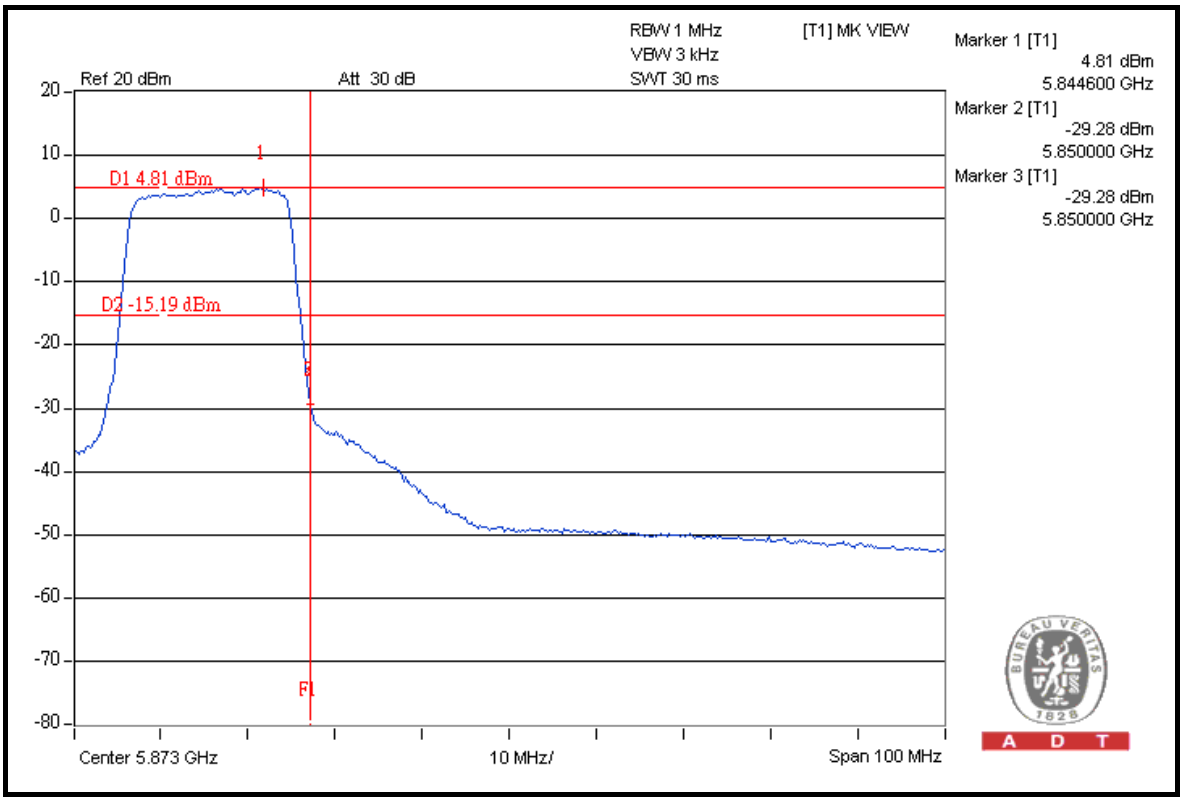
TEST MODE D

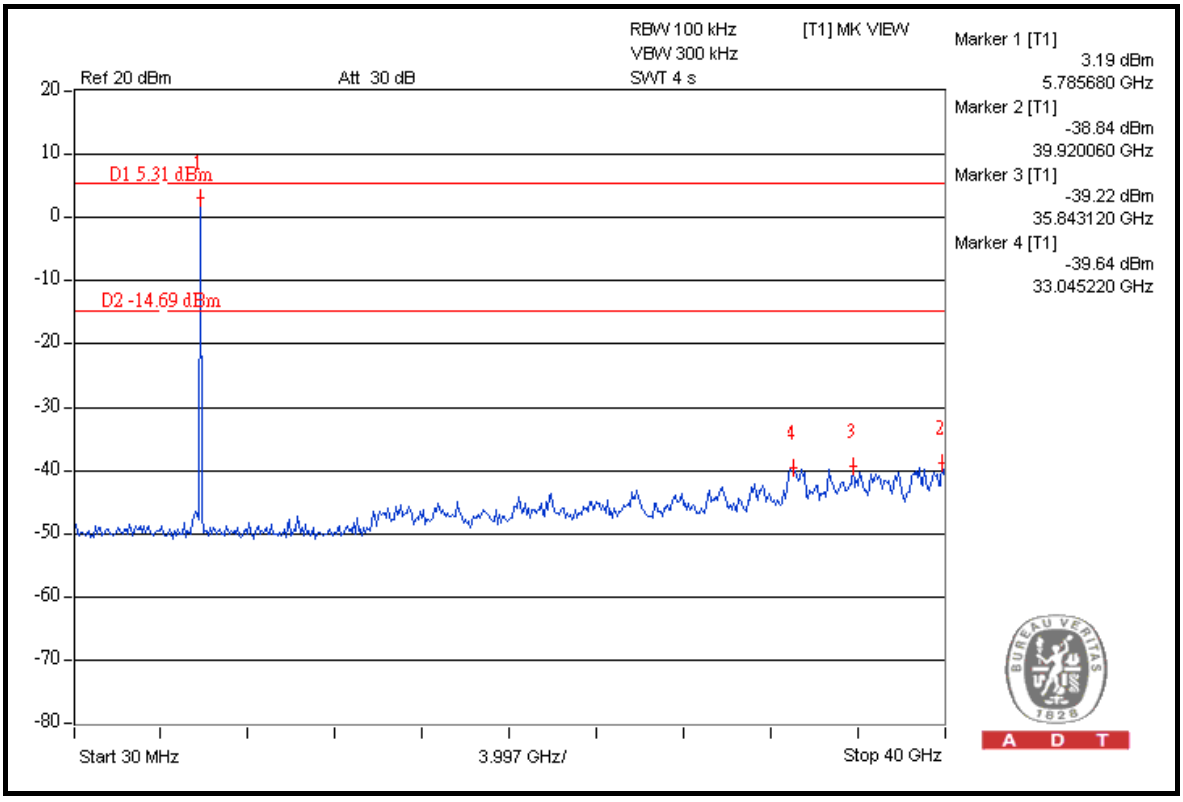

RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.37 dBm
5.732600 GHz
Marker 2 [T1]
-28.90 dBm
5.725000 GHz
Marker 3 [T1]
-27.34 dBm
5.724600 GHz
D1 5.37 dBm
D2 -14.63 dBm
Center 5.702 GHz
10 MHz/
Span 100 MHz


RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
4.91 dBm
5.737600 GHz
Marker 2 [T1]
-26.37 dBm
5.725000 GHz
Marker 3 [T1]
-26.37 dBm
5.725000 GHz
D1 4.91 dBm
D2 -15.09 dBm
Center 5.702 GHz
10 MHz/
Span 100 MHz


RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
3.31 dBm
5.705740 GHz
Marker 2 [T1]
-39.03 dBm
38.641020 GHz
Marker 3 [T1]
-39.40 dBm
32.965280 GHz
Marker 4 [T1]
-39.79 dBm
33.444920 GHz
D1 5.37 dBm
D2 -14.63 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz


RBW 100 kHz
VBW 300 kHz
SWT 20 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
5.31 dBm
5.838000 GHz
Marker 2 [T1]
-32.93 dBm
5.850000 GHz
Marker 3 [T1]
-29.29 dBm
5.851800 GHz
D1 5.31 dBm
D2 -14.69 dBm
Center 5.873 GHz
10 MHz/
Span 100 MHz


RBW 1 MHz
VBW 3 kHz
SWT 30 ms
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
4.81 dBm
5.844600 GHz
Marker 2 [T1]
-29.28 dBm
5.850000 GHz
Marker 3 [T1]
-29.28 dBm
5.850000 GHz
D1 4.81 dBm
D2 -15.19 dBm
Center 5.873 GHz
10 MHz/
Span 100 MHz


RBW 100 kHz
VBW 300 kHz
SWT 4 s
[T1] MK VIEW
Ref 20 dBm
Att 30 dB
Marker 1 [T1]
3.19 dBm
5.785680 GHz
Marker 2 [T1]
-38.84 dBm
39.920060 GHz
Marker 3 [T1]
-39.22 dBm
35.843120 GHz
Marker 4 [T1]
-39.64 dBm
33.045220 GHz
D1 5.31 dBm
D2 -14.69 dBm
Start 30 MHz
3.997 GHz/
Stop 40 GHz

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(a), 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 Sector antenna with N-Female connector. The maximum Gain of the antenna is 16.5dBi.

5. PHOTOGRAPHS OF THE TEST CONFIGURATION

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

6. INFORMATION ON THE TESTING LABORATORIES

We, Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch, 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.

USA	FCC, NVLAP
Germany	TUV Rheinland
Japan	VCCI
Norway	NEMKO
Canada	INDUSTRY CANADA , CSA
R.O.C.	TAF, BSMI, NCC
Netherlands	Telefication
Singapore	GOST-ASIA(MOU)
Russia	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. If you have any comments, please feel free to contact us at the following:

Linko EMC/RF Lab:
Tel: 886-2-26052180
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

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

7. APPENDIX A - MODIFICATIONS RECORDERS FOR ENGINEERING CHANGES TO THE EUT BY THE LAB

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

---END---