

APPLICATION FOR CERTIFICATION
On Behalf of
Datacom Wireless Corporation
Remote Transmitter for Security Division Datacom
Models : (1)MGTX2-V1 (2)TX142
FCC ID : RH6-MGTX

Prepared for : Datacom Wireless Corporation
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TEST REPORT CERTIFICATION

Applicant : Datacom Wireless Corporation
 Manufacturer : LEYTON Technologies Limited.
 EUT Description : Remote Transmitter for Security Division Datacom
 FCC ID : RH6-MGTX
 (A) MODEL NO. : (1)MGTX2-V1 (2)TX142
 (B) SERIAL NO. : N/A
 (C) POWER SUPPLY : DC 6V

Measurement Procedure Used:

FCC RULES AND REGULATIONS PART 15 SUBPART C, OCT 2006
 AND ANSI C63.4/2003
 (FCC CFR 47 Part 15C, §15.231, §15.207 and §15.209)

The device described above was tested by AUDIX TECHNOLOGY CORPORATION to determine the maximum emission levels emanating from the device. The maximum emission levels were compared to the FCC Part 15 subpart C limits both radiated and conducted emissions.

The measurement results are contained in this test report and AUDIX TECHNOLOGY CORPORATION is assumed full responsibility for the accuracy and completeness of these measurements. Also, this report shows that the EUT to be technically compliant with the FCC official limits.

This report applies to above tested sample only. This report shall not be reproduced in part without written approval of AUDIX TECHNOLOGY CORPORATION.

Date of Test: Apr. 27, 2007

Prepared by: Kitty Ni May 07, 2007
 (Kitty Ni/Administrator)

Test Engineer: Ben Cheng May. 09. 2007
 (Ben Cheng/Section Manager)

Approved & Authorized Signer: Leon Liu May. 9 2007
 (Leon Liu/Vice President)

1. GENERAL INFORMATION

1.1. Description of Device (EUT)

Description	:	Remote Transmitter for Security Division Datacom
Model Number	:	(1)MGTX2-V1 (2)TX142 Above all models are identical, the only difference is in customer. The model (2)TX-142 is representative selected in the test and included in this report.
FCC ID	:	RH6-MGTX
Applicant	:	Datacom Wireless Corporation 440, Armand Frappier Blvd, Suite 350, Laval, Quebec H7V 4B4, Canada.
Manufacturer	:	LEYTON Technologies Limited. No. 6, New Pioneering Park West Area of Ningbo Free Trade Zone, Beilum, Ningbo, China.
Fundamental Frequency	:	433MHz
Power Supply	:	2 x CR2016 3VOLT LITHIUM BATTERY
Date of Receipt of Sample	:	Mar. 28, 2007
Date of Test	:	Apr. 27, 2007

Remark:

Antenna requirement: This EUT's transmitter antenna is design in soldered to a printed circuit board, comply with §15.203 and inform to user that any change and modify is prohibited.

1.2. Description of Test Facility

Name of Firm : **Audix Technology Corporation**
EMC Department
 No. 53-11, Tin-Fu Tsun, Lin-Kou,
 Taipei County, Taiwan.

Test Location & Facility : **Semi-Anechoic Chamber**
 (A/C) No. 53-11, Tin-Fu Tsun, Lin-Kou,
 Taipei County, Taiwan.

May 16, 2006 Re-File on
 Federal Communication Commission
 Registration Number: 90993

NVLAP Lab. Code : 200077-0
 (NVLAP is a NATA accredited body under Mutual Recognition Agreement)

DAR-Registration No. : DAP-P-145/03-01

1.3. Measurement Uncertainty

Test Item	Frequency Range	Uncertainty (dB)
Radiation Test (Distance: 3m)	30MHz~300MHz	$\pm 2.91\text{dB}$
	300MHz~1000MHz	$\pm 2.94\text{dB}$

Remark : Uncertainty = $k_{uc}(y)$

2. POWERLINE CONDUCTED EMISSION MEASUREMENT

【The EUT only employ battery power for operation, no conductive emissions limits are required according to FCC Part 15 Section §15.207】

3. RADIATED EMISSION MEASUREMENT

3.1. Test Equipment

The following test equipment are used during the radiated emission measurement :

3.1.1. For 30MHz~1000MHz Frequency (at Semi-Anechoic Chamber)

Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Spectrum Analyzer	HP	8593EM	3826A00272	Aug.23, 06'	Aug.22, 07'
2.	Test Receiver	R&S	ESCS 30	100265	Sep.19, 06'	Sep.18, 07'
3.	Pre-Amplifier	HP	8447D	2944A06305	Mar.03, 07'	Mar.02, 08'
4.	Biconical Antenna	CHASE	VBA6106A	1264	Apr.11, 07'	Apr.10, 08'
5.	Log Periodic Antenna	Schwarzbeck	UHALP9108-A	0139	Apr.11, 07'	Apr.10, 08'
6.	Coaxial Switch	Anritsu	MP59B	6100226512	Mar.10, 07'	Mar.09, 08'

3.1.2. For 1GHz~5.5GHz frequency (at Semi-Anechoic Chamber)

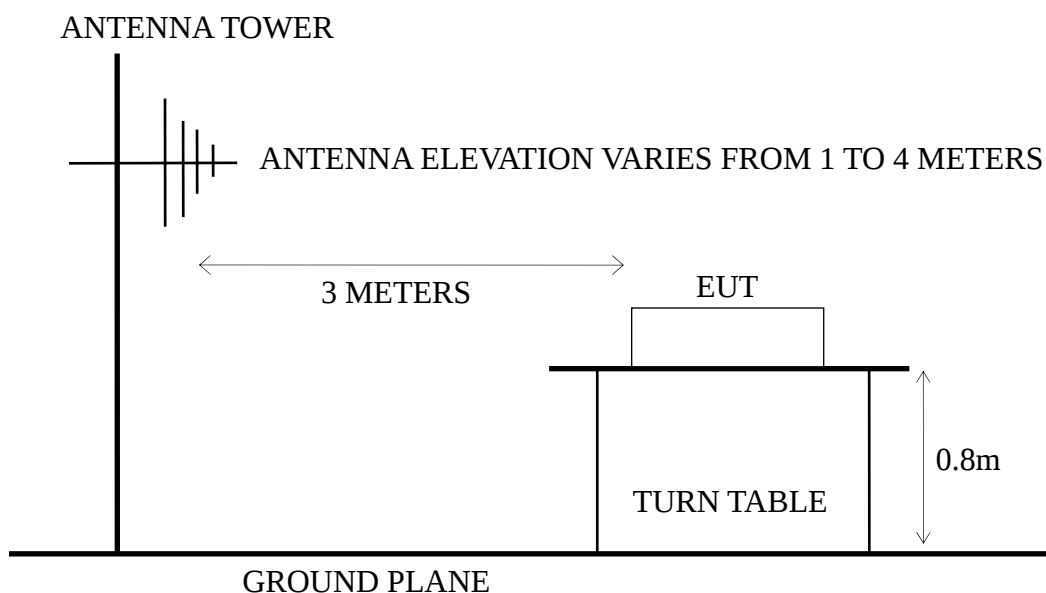
Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Spectrum Analyzer	HP	8593EM	3826A00272	Aug.23, 06'	Aug.22, 07'
2.	Pre-Amplifier	HP	8449B	3008A01284	Jun.30, 06'	Jun.29, 07'
3.	Horn Antenna	EMCO	3115	9112-3775	Jun.01, 06'	May 31, 07'

3.2. Test Setup

3.2.1. Block Diagram of connection between EUT and simulators

**REMOTE TRANSMITTER FOR SECURITY DIVISION DATACOM
(EUT)**

3.2.2. Semi-Anechoic Chamber (3m) Setup Diagram



3.3. Radiation Limit (§15.231)

FREQUENCY MHz	DISTANCE Meters	FIELD STRENGTHS LIMITS	
		$\mu\text{V/m}$	$\text{dB}\mu\text{V/m}$
Fundamental Freq.	3	11002.71	80.83 (Quasi-Peak)
Spurious Emission	3	1100.271	60.83 (Quasi-Peak)
Above 1GHz *(6)	3	---	74 (Peak)
Above 1GHz *(6)	3	---	54 (Average)

- Remark :
- (1) Emission level ($\text{dB}\mu\text{V/m}$) = $20 \log$ Emission level ($\mu\text{V/m}$)
 - (2) The tighter limit applies at the edge between two frequency bands.
 - (3) Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.
 - (4) Where limit of Fundamental Freq. is calculated by:
 $41.6667 \times 433.99 - 7083.3333 = 11002.71 \mu\text{V/m} = 80.83 \text{dB}\mu\text{V/m}$
 limit of spurious emission is $80.83 \text{dB}\mu\text{V/m} - 20 \text{dB} = 60.83 \text{dB}\mu\text{V/m}$
 - (5) The limits in this table are based on CFR 47 Part 15.205(a)(b) and Part 15.209(a) and Part 15.231(b).
 - (6) The over 1GHz limit, FCC limit is used based on CFR 47 Part 15.35 (b) and Part 15.205(b) & Part 15.209(b) & Part 15.231(a)-(3).

3.4. Operating Condition of EUT

- 3.4.1. Setup the EUT and simulator as shown on 3.2.
- 3.4.2. Turned on the power of all equipment.
- 3.4.3. The EUT [Remote Transmitter for Security Division Datacom] was emitted the fundamental frequency at the stand, side and lie conditions.
- 3.4.4. The EUT was at worked on maximum transmitting status during all testing.

3.5. Test Procedure

The EUT and its simulators were placed on a turn table which was 0.8 meter above the ground. The turn table rotated 360 degrees to determine the position of the maximum emission level. EUT was set 3 meters away from the receiving antenna which was mounted on an antenna tower. The antenna moved up and down between 1 to 4 meters to find out the maximum emission level. Broadband antenna such as calibrated biconical and log- periodical antenna or horn antenna were used as a receiving antenna. Both horizontal and vertical polarization of the antenna were set on measurement. In order to find the maximum emission, all of the interface cables were manipulated according to FCC ANSI C63.4-2003 regulation.

The bandwidth of test receiver was set at 120kHz for 30-1000MHz frequency range and resolution bandwidth of spectrum analyzer was set at 1MHz for 1-5.5GHz frequency range.

The frequency range from 30MHz to 5.5GHz was checked.

EUT with three kinds of position (on Lie、Side、Stand) were done during radiated measurement and all the test results are listed in section 3.6.

Mode	Operation of EUT	Reference Test Data No.			
		Horizontal		Vertical	
Frequency Range: 30-1000MHz					
1.	EUT on Lie, Transmitting Mode	# 7.		# 8.	
2.	EUT on Side, Transmitting Mode	# 8.		# 7.	
3.	EUT on Stand, Transmitting Mode	# 7.		# 8.	
Frequency Range: 1000-2680MHz					
1.	EUT on Lie, Transmitting Mode	Peak	# 3.	Peak	# 4.
		Average	# 5.	Average	# 6.
2.	EUT on Side, Transmitting Mode	Peak	# 4.	Peak	# 3.
		Average	# 6.	Average	# 5.
3.	EUT on Stand, Transmitting Mode	Peak	# 4.	Peak	# 3.
		Average	# 6.	Average	# 5.
Frequency Range: 2680-5500MHz					
1.	EUT on Lie, Transmitting Mode	# 2.		# 1.	
2.	EUT on Side, Transmitting Mode	# 1.		# 2.	
3.	EUT on Stand, Transmitting Mode	# 1.		# 2.	

3.6. Radiated Emission Noise Measurement Results

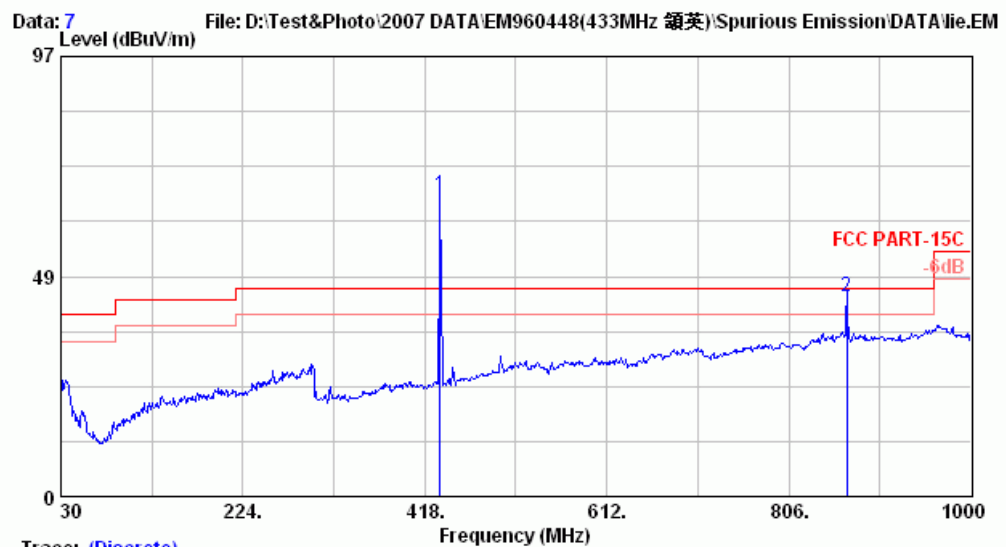
3.6.1. 30MHz to 1GHz Frequency Range Measurement Results: **PASSED.**

All the emissions not reported below are too low against the FCC part 15 Subpart C limit.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Lie Fundamental Freq. : 433MHz



Site no. : A/C Chamber Data no. : 7
 Dis. / Ant. : 3m VBA6106A/UHALP9108A Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Lie

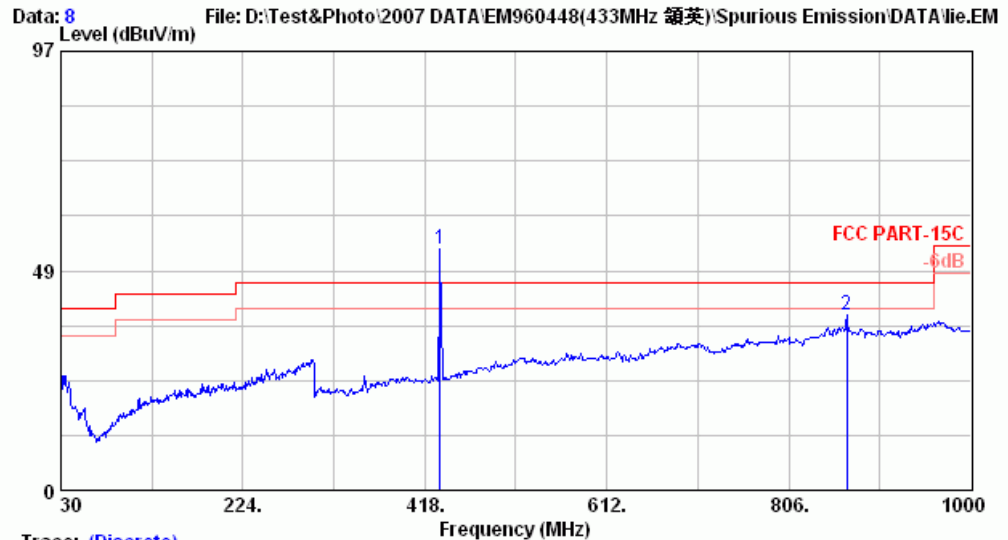
		Ant.	Cable		Emission		
	Freq.	Factor	Loss	Reading	Level	Limits	Margin Remark
	(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)
①	1 433.990	17.36	5.24	43.76	66.36	80.83	14.47
②	2 867.980	25.89	7.20	10.88	43.97	60.83	16.86

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.
 3. All readings are Quasi-Peak values.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Humidity : 68%
Division Datacom

Test Position : EUT on Lie Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 8
 Dis. / Ant. : 3m VBA6106A/UHALP9108A Ant. pol. : VERTICAL
 Limit : FCC PART-15C
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Lie

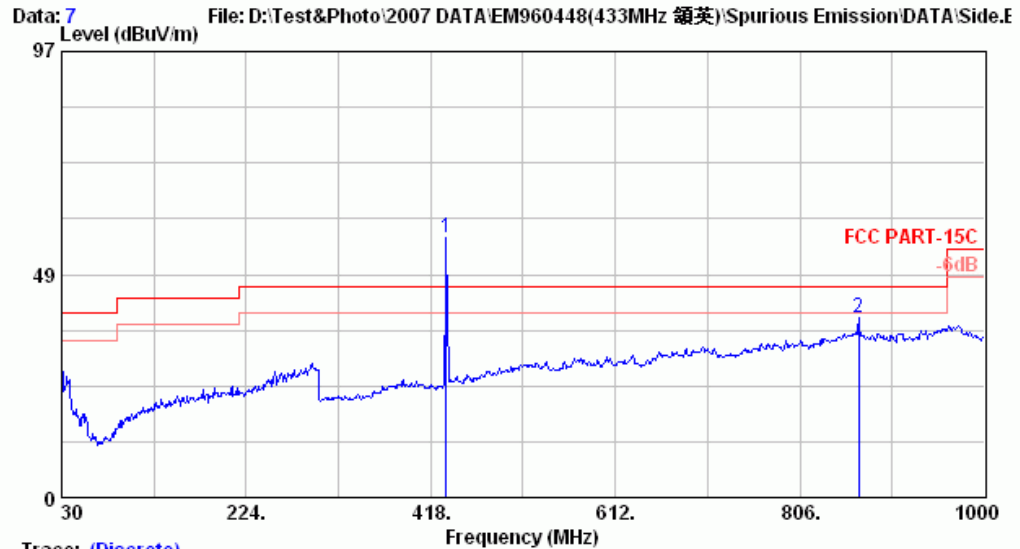
		Ant.	Cable		Emission		
	Freq.	Factor	Loss	Reading	Level	Limits	Margin Remark
	(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)
@ 1	433.990	17.36	5.24	30.61	53.21	80.83	27.62
2	867.980	25.89	7.20	5.76	38.85	60.83	21.98

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.
 3. All readings are Quasi-Peak values.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Humidity : 68%
Division Datacom

Test Position : EUT on Side Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 7
 Dis. / Ant. : 3m VBA6106A/UHALP9108A Ant. pol. : VERTICAL
 Limit : FCC PART-15C
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

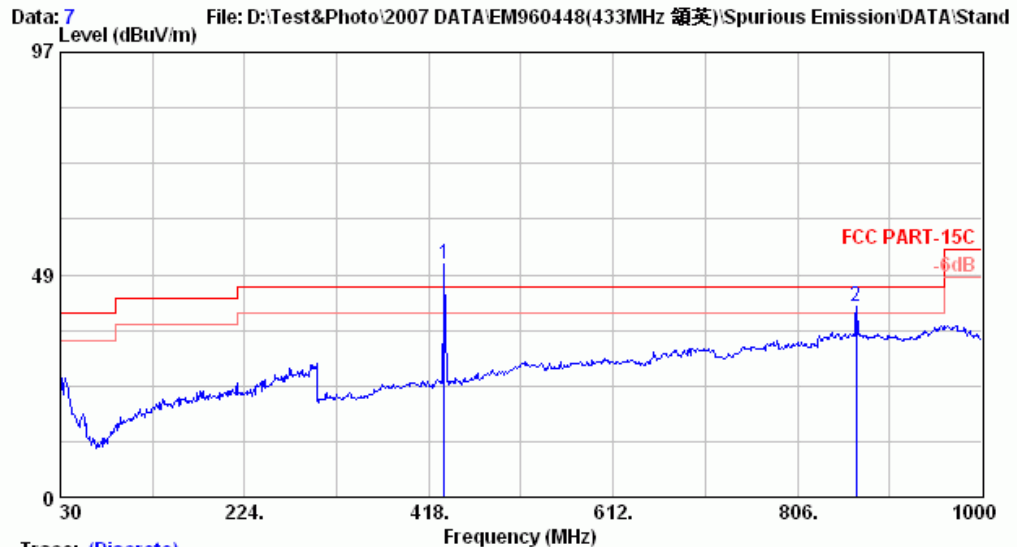
		Ant.	Cable		Emission			
	Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark
	(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1	433.990	17.36	5.24	33.89	56.49	80.83	24.34	
2	867.980	25.89	7.20	6.14	39.23	60.83	21.60	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.
 3. All readings are Quasi-Peak values.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Stand Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 7

Dis. / Ant. : 3m VBA6106A/UHALP9108A Ant. pol. : HORIZONTAL

Limit : FCC PART-15C

Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang

EUT : Remote Transmitter for Security Division Datacom

Power Rating : DC6V M/N:TX142

Test Mode : Stand

		Ant.	Cable		Emission			
	Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark
	(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
@ 1	433.990	17.36	5.24	28.21	50.81	80.83	30.02	
2	867.980	25.77	7.20	8.62	41.59	60.83	19.24	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.

2. The emission levels that are 20dB below the official limit are not reported.

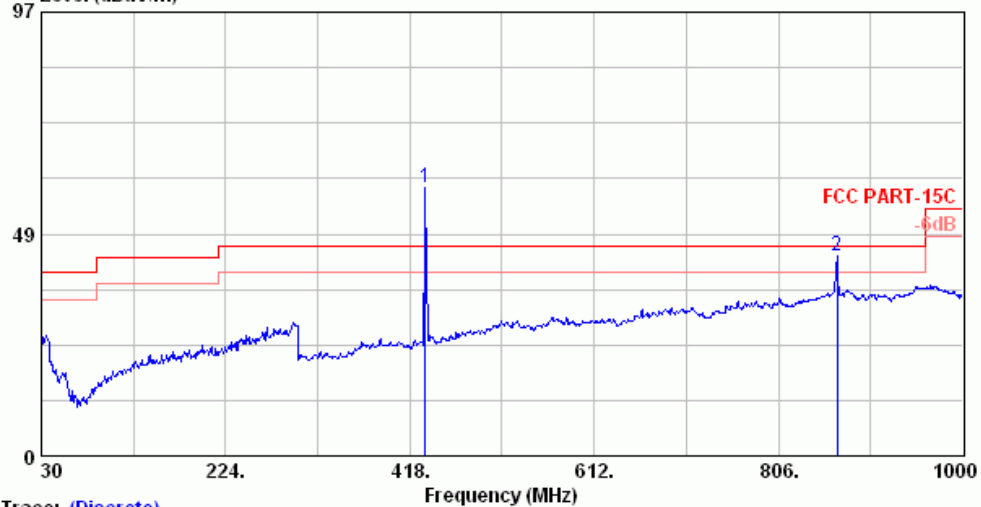
3. All readings are Quasi-Peak values.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Stand Fundamental Freq. : 433MHz

Data: 8 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 領英)\Spurious Emission\DATA\Stand
Level (dBuV/m)



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 8
Dis. / Ant. : 3m VBA6106A/UHALP9108A Ant. pol. : VERTICAL
Limit : FCC PART-15C
Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
EUT : Remote Transmitter for Security Division Datacom
Power Rating : DC6V M/N:TX142
Test Mode : Stand

		Ant.	Cable		Emission			
	Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark
	(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
@ 1	433.990	17.33	5.20	36.25	58.78	80.83	22.05	
2	867.980	25.89	7.20	10.79	43.88	60.83	16.95	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
2. The emission levels that are 20dB below the official limit are not reported.
3. All readings are Quasi-Peak values.

3.6.2. 1GHz to 5GHz Frequency Range Measurement Results: **PASSED.**

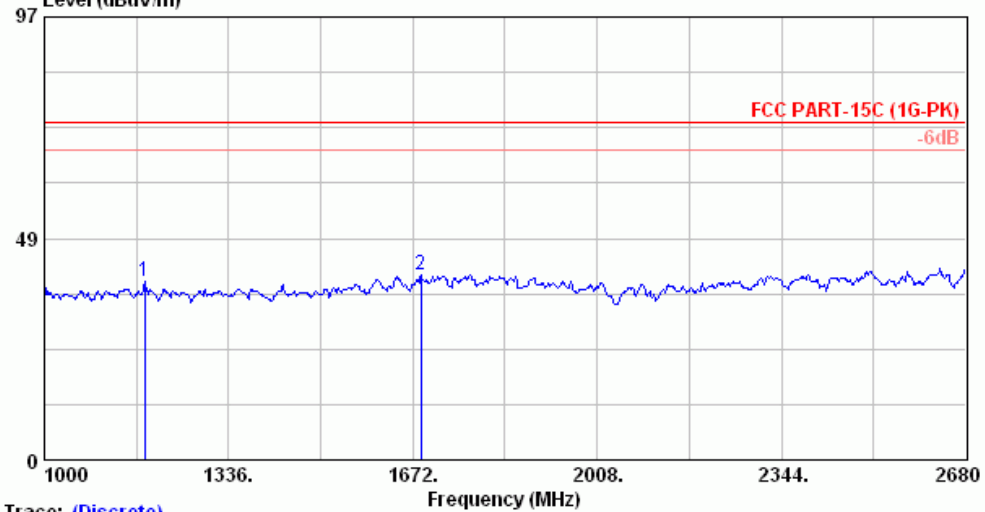
The frequency spectrum from 1GHz to 5.5GHz (up to 10th harmonics) was investigated. All the emissions not reported below are too low against the FCC part 15 Subpart C limit.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Lie Fundamental Freq. : 433MHz

Data: 3 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 領英)\Spurious Emission\DATA\lie.EM
Level (dBuV/m)



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 3
Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
Limit : FCC PART-15C (1G-PK)
Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
EUT : Remote Transmitter for Security Division Datacom
Power Rating : DC6V M/N:TX142
Test Mode : Lie

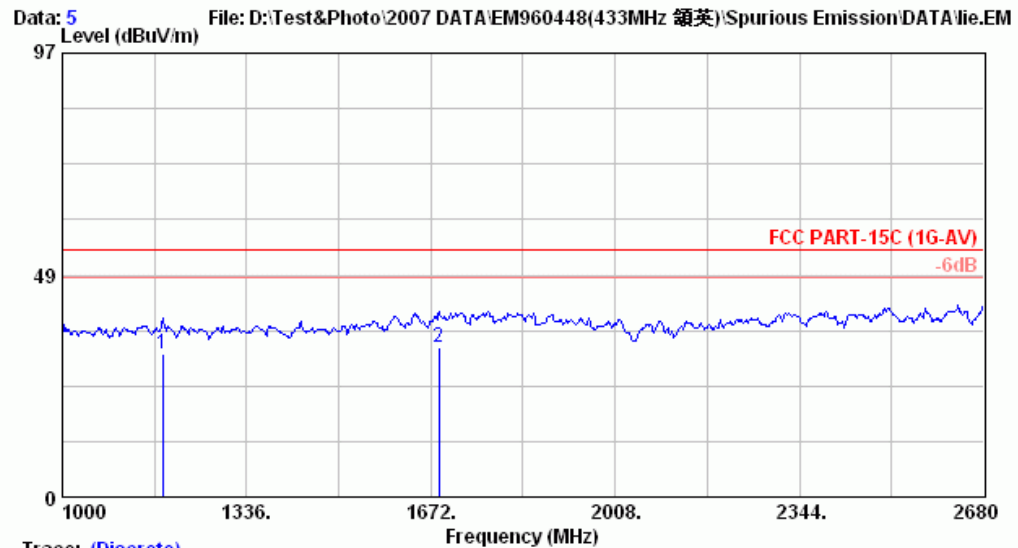
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1183.120	25.28	4.55	9.41	39.24	74.00	34.76	Peak	
2 1687.120	26.38	6.76	7.46	40.60	74.00	33.40	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Lie Fundamental Freq. : 433MHz



Site no. : A/C Chamber Data no. : 5
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-AV)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Lie

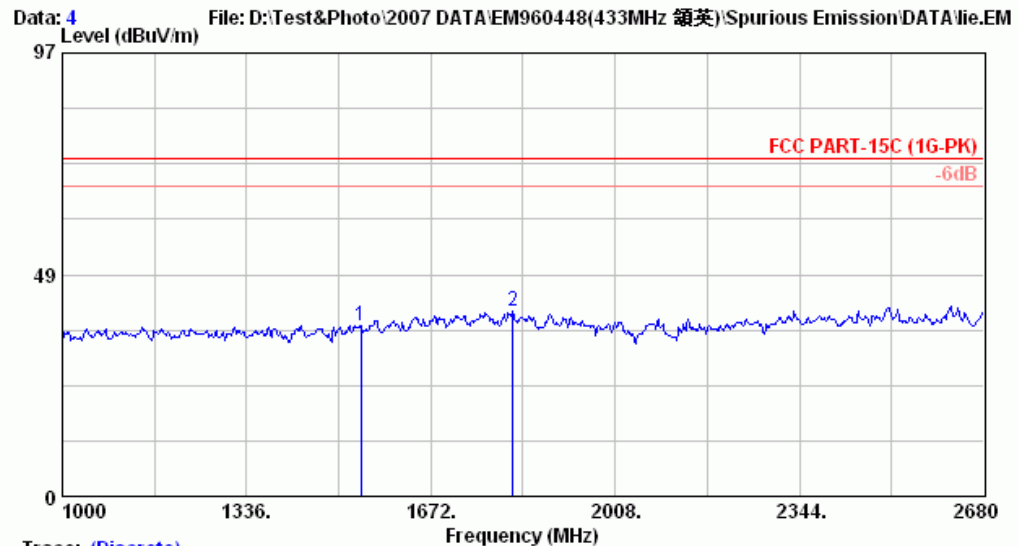
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1183.120	25.28	4.55	1.41	31.24	54.00	22.76	Average	
2 1687.120	26.38	6.76	-0.54	32.60	54.00	21.40	Average	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Humidity : 68%
Division Datacom

Test Position : EUT on Lie Fundamental Freq. : 433MHz



Site no. : A/C Chamber Data no. : 4
 Dis. / Ant. : 3m 3115 Ant. pol. : VERTICAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Lie

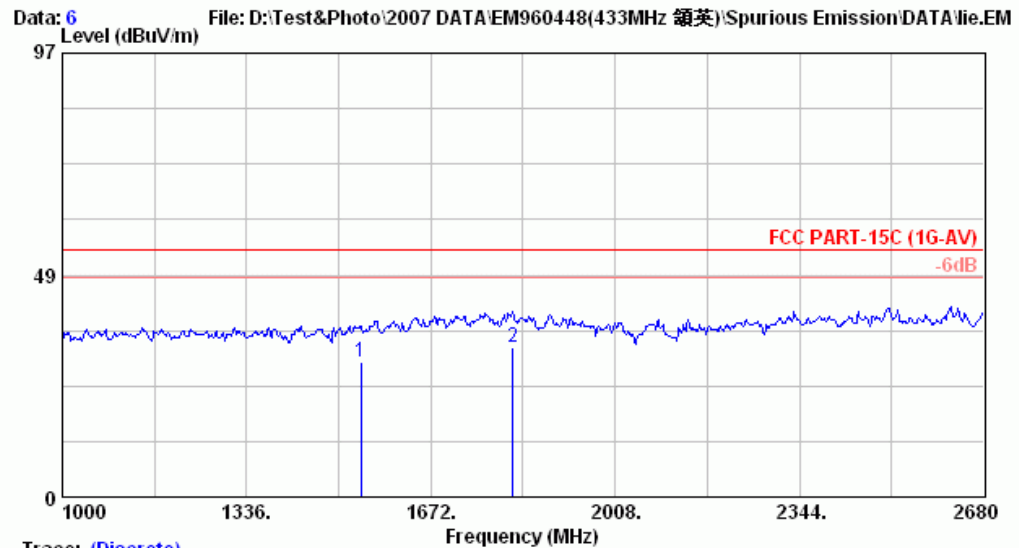
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1544.320	25.64	5.74	6.08	37.46	74.00	36.54	Peak	
2 1821.520	27.01	6.80	6.85	40.67	74.00	33.33	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Lie Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 6
 Dis. / Ant. : 3m 3115 Ant. pol. : VERTICAL
 Limit : FCC PART-15C (1G-AV)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Lie

	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1544.320	25.64	5.74	-1.92	29.46	54.00	24.54	Average	
2 1821.520	27.01	6.80	-1.15	32.67	54.00	21.33	Average	

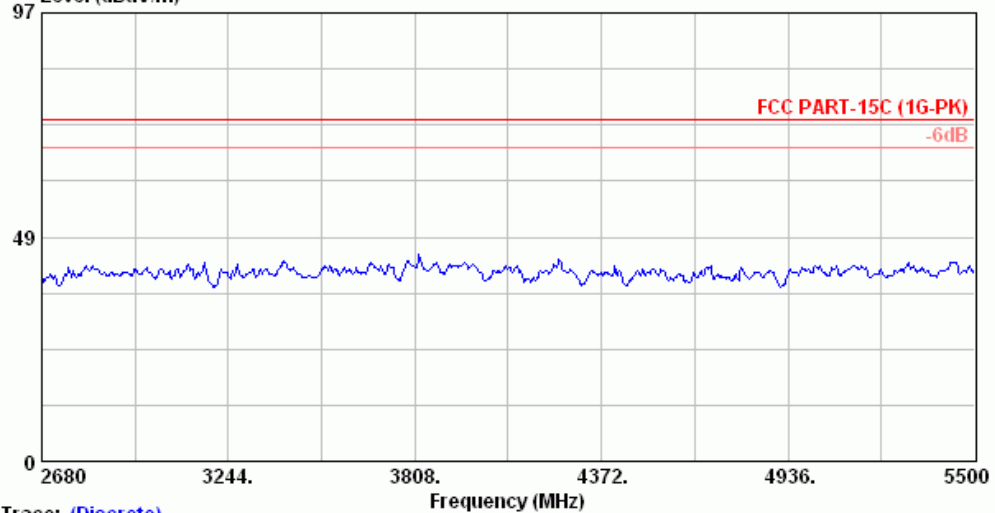
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Lie Fundamental Freq. : 433MHz

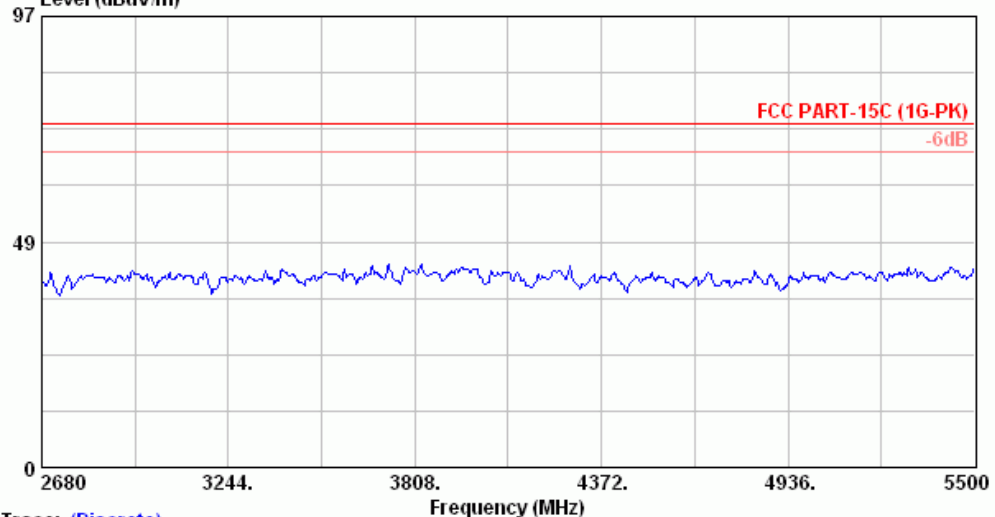
Data: **2** File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\lie.EM
Level (dBuV/m)



Trace: (Discrete)

Site no.	: A/C Chamber	Data no.	: 2
Dis. / Ant.	: 3m 3115	Ant. pol.	: HORIZONTAL
Limit	: FCC PART-15C (1G-PK)		
Env. / Ins.	: 8593EM 20°C/68%	Engineer	: Alvin_Yang
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:TX142	
Test Mode	: Lie		

Data: **1** File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\lie.EM
Level (dBuV/m)



Trace: (Discrete)

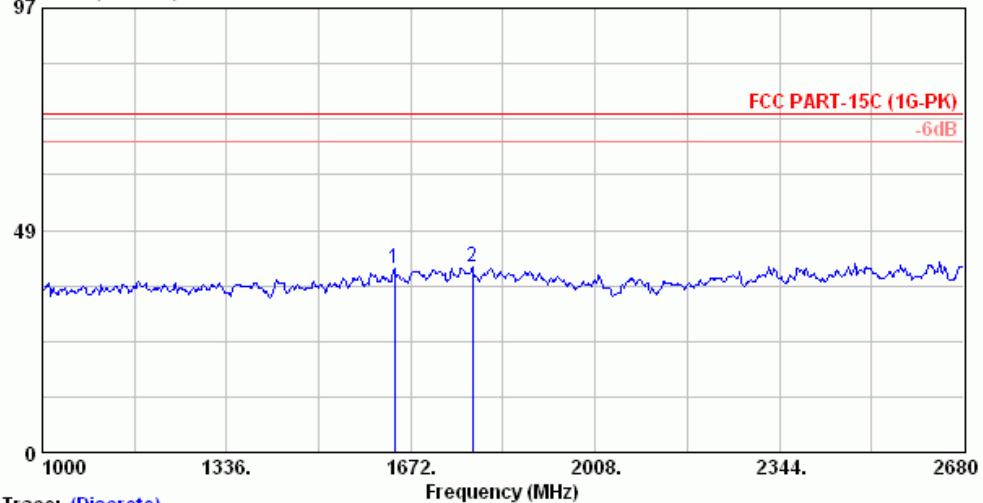
Site no.	: A/C Chamber	Data no.	: 1
Dis. / Ant.	: 3m 3115	Ant. pol.	: VERTICAL
Limit	: FCC PART-15C (1G-PK)		
Env. / Ins.	: 8593EM 20°C/68%	Engineer	: Alvin_Yang
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:TX142	
Test Mode	: Lie		

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Side Fundamental Freq. : 433MHz

Data: 4 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 領英)\Spurious Emission\DATA\Side.E



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 4
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

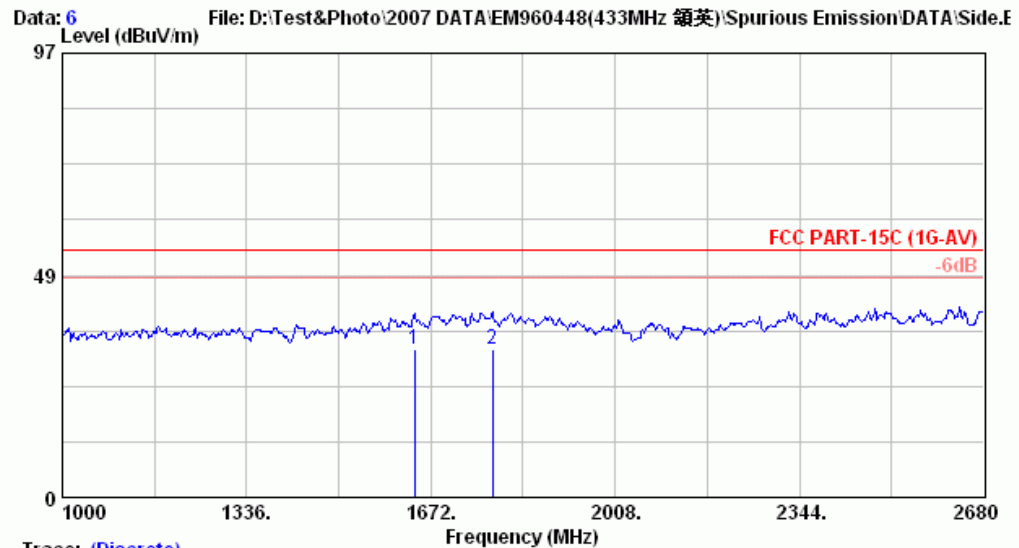
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1641.760	26.17	6.41	7.71	40.29	74.00	33.71	Peak	
2 1784.560	26.84	7.01	6.53	40.38	74.00	33.62	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Side Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no. : A/C Chamber Data no. : 6
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-AV)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

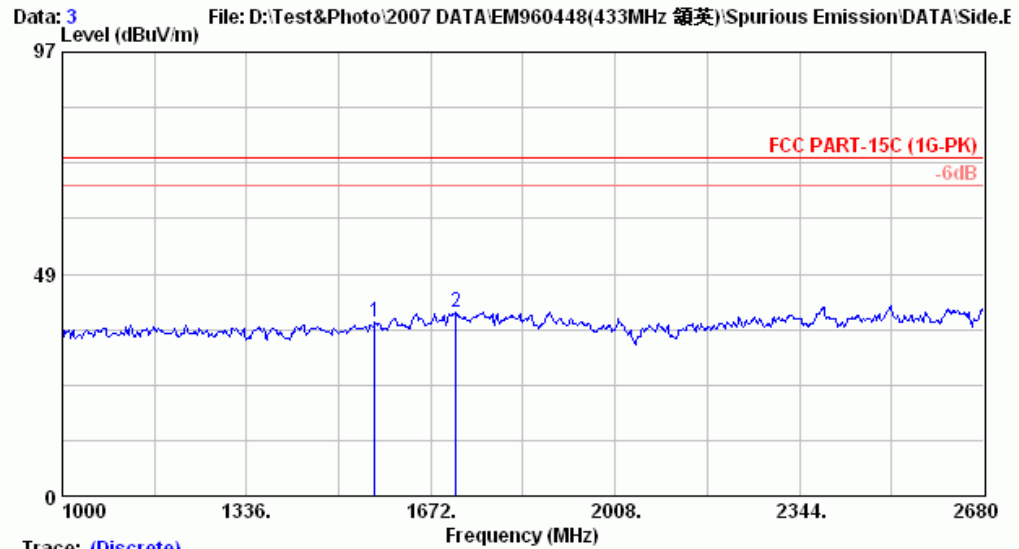
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1641.760	26.17	6.41	-0.29	32.29	54.00	21.71	Average	
2 1784.560	26.84	7.01	-1.47	32.38	54.00	21.62	Average	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security
Division Datacom Humidity : 68%

Test Position : EUT on Side Fundamental Freq. : 433MHz



Site no. : A/C Chamber Data no. : 3
 Dis. / Ant. : 3m 3115 Ant. pol. : VERTICAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

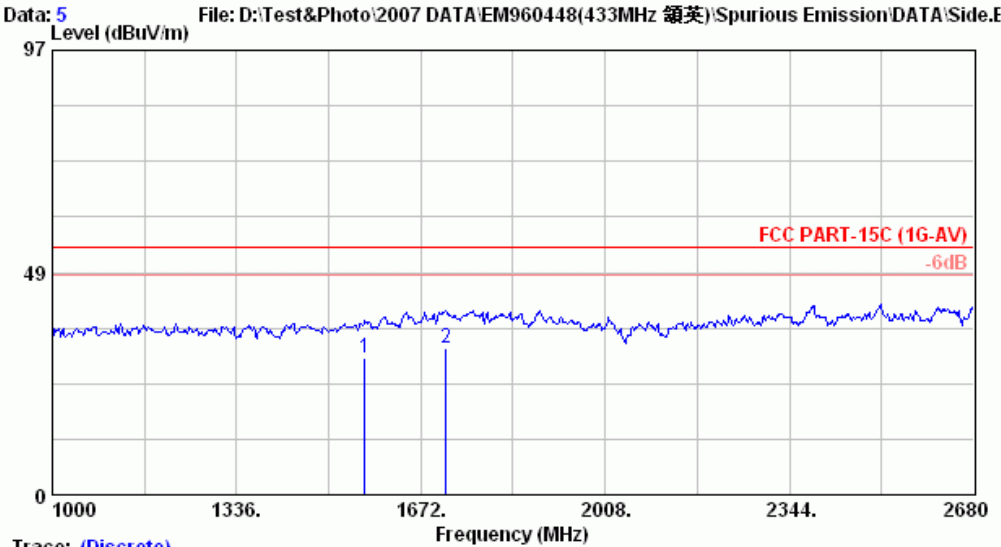
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1	1569.520	25.78	5.90	6.20	37.89	74.00	36.11	Peak
2	1717.360	26.53	6.96	6.63	40.12	74.00	33.88	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Side Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no.	: A/C Chamber	Data no.	: 5
Dis. / Ant.	: 3m 3115	Ant. pol.	: VERTICAL
Limit	: FCC PART-15C (1G-AV)		
Env. / Ins.	: 8593EM 20°C/68%	Engineer	: Alvin_Yang
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:TX142	
Test Mode	: Side		

	Freq. (MHz)	Ant.	Cable	Emission				Remark
		Factor (dB/m)	Loss (dB)	Reading (dBµV)	Level (dBµV/m)	Limits (dBµV/m)	Margin (dB)	
1	1569.520	25.78	5.90	-1.80	29.89	54.00	24.11	Average
2	1717.360	26.53	6.96	-1.37	32.12	54.00	21.88	Average

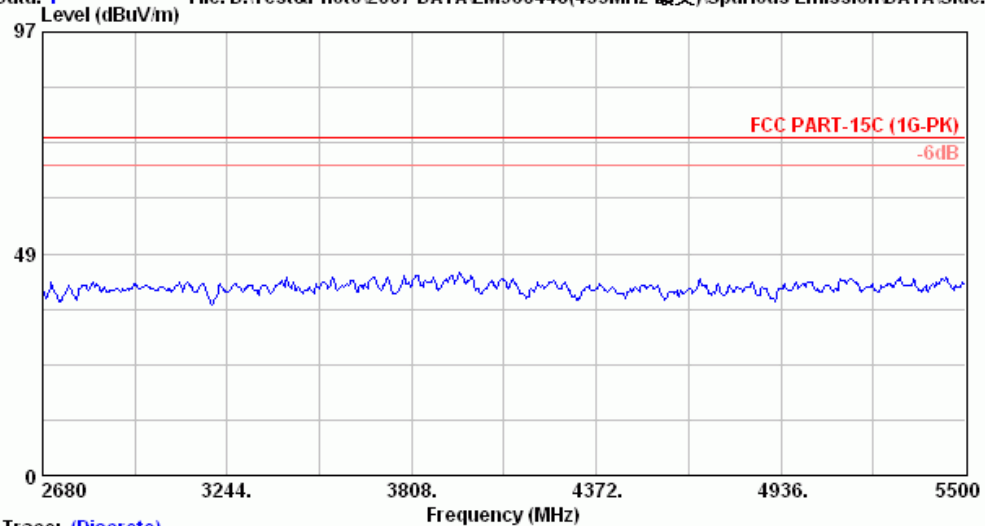
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Side Fundamental Freq. : 433MHz

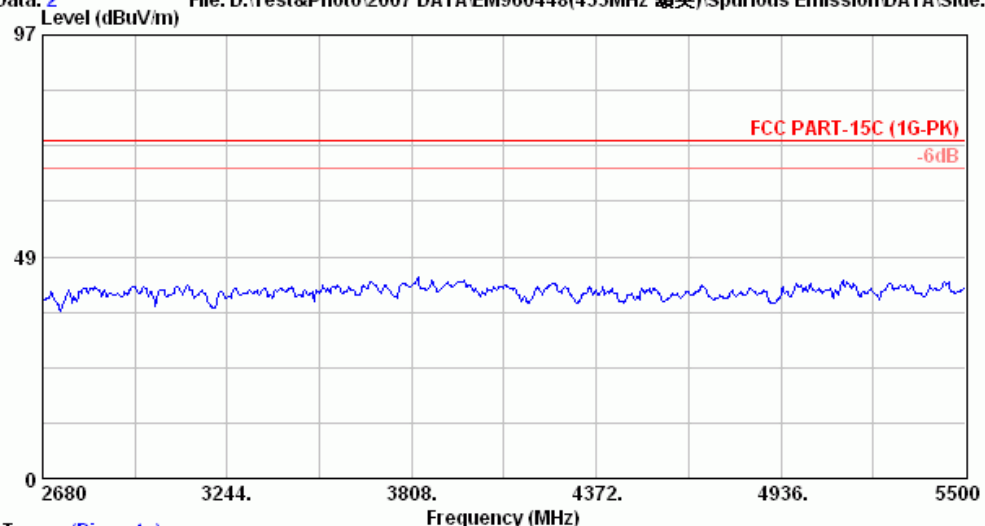
Data: 1 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\Side.F



Trace: (Discrete)

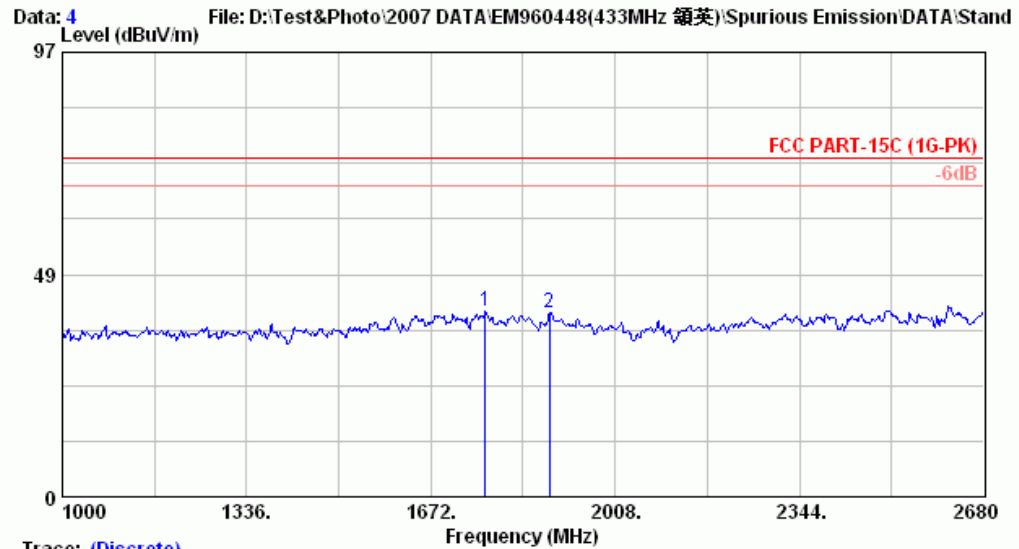
Site no. : A/C Chamber Data no. : 1
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

Data: 2 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\Side.F



Trace: (Discrete)

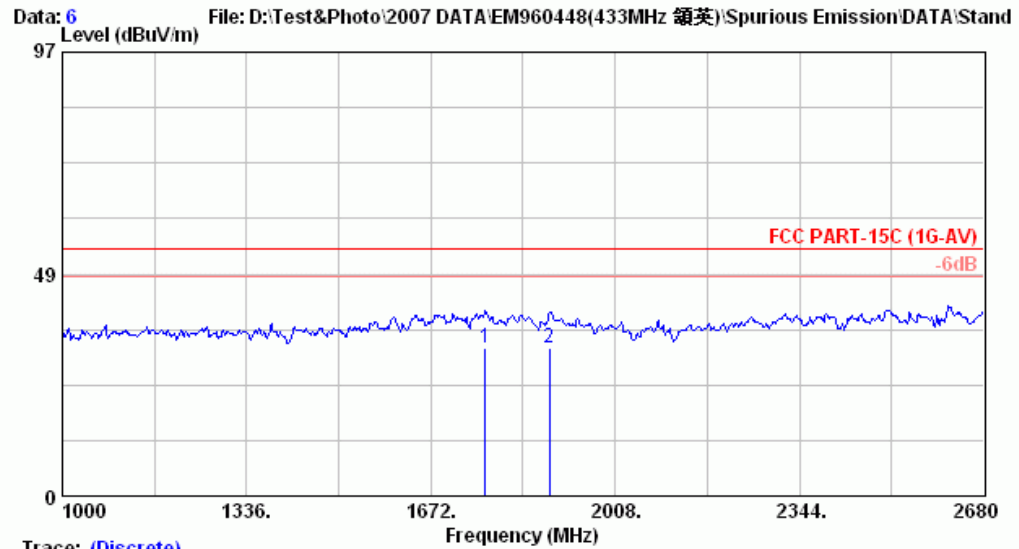
Site no. : A/C Chamber Data no. : 2
 Dis. / Ant. : 3m 3115 Ant. pol. : VERTICAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Side

Date of Test : Apr. 27, 2007 Temperature : 20EUT : Remote Transmitter for Security
Division Datacom Humidity : 68%Test Position : EUT on Stand Fundamental Freq. : 433MHz

Site no. : A/C Chamber Data no. : 4
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-PK)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Stand

	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1771.120	26.79	7.07	6.48	40.34	74.00	33.66	Peak	
2 1888.720	27.32	6.45	6.46	40.23	74.00	33.77	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20EUT : Remote Transmitter for Security
Division Datacom Humidity : 68%Test Position : EUT on Stand Fundamental Freq. : 433MHz

Site no. : A/C Chamber Data no. : 6
 Dis. / Ant. : 3m 3115 Ant. pol. : HORIZONTAL
 Limit : FCC PART-15C (1G-AV)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Stand

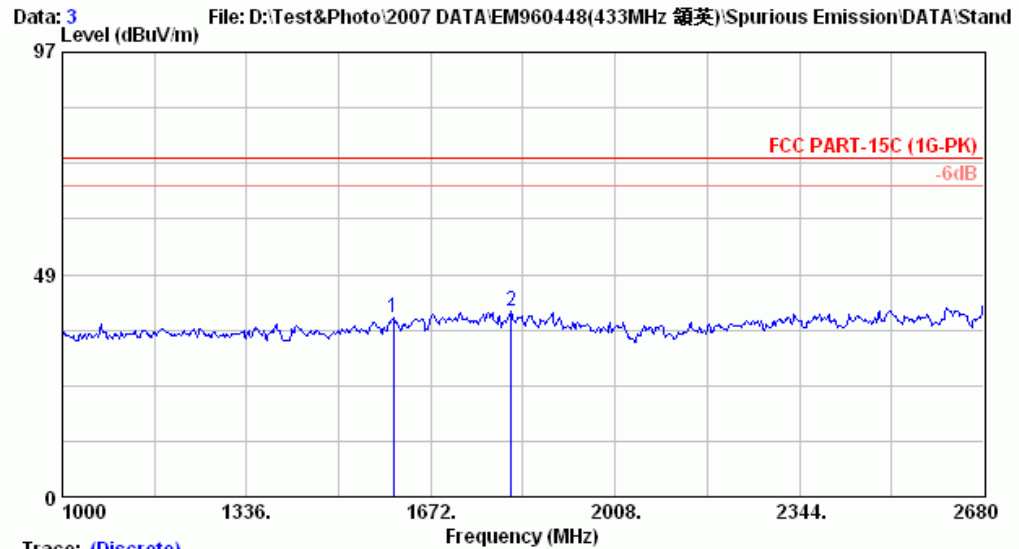
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1771.120	26.79	7.07	-1.52	32.34	54.00	21.66	Average	
2 1888.720	27.32	6.45	-1.54	32.23	54.00	21.77	Average	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security Division Datacom Humidity : 68%

Test Position : EUT on Stand Fundamental Freq. : 433MHz



Trace: (Discrete)

Site no.	: A/C Chamber	Data no.	: 3
Dis. / Ant.	: 3m 3115	Ant. pol.	: VERTICAL
Limit	: FCC PART-15C (1G-PK)	Engineer	: Alvin_Yang
Env. / Ins.	: 8593EM 20°C/68%		
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:TX142	
Test Mode	: Stand		

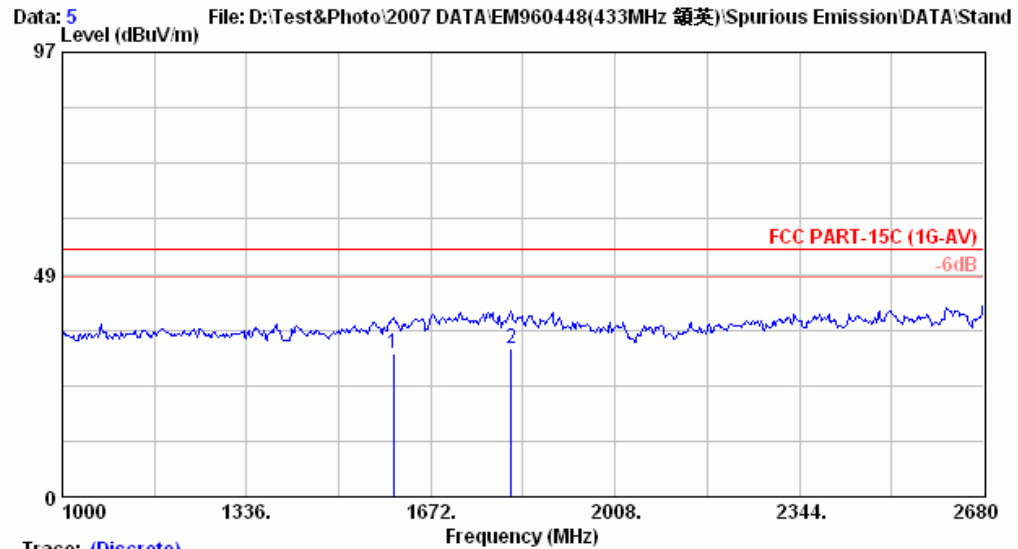
	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1	25.95	6.18	7.13	39.25	74.00	34.75	Peak	
2	27.01	6.80	6.53	40.34	74.00	33.66	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security
Division Datacom Humidity : 68%

Test Position : EUT on Stand Fundamental Freq. : 433MHz



Site no. : A/C Chamber Data no. : 5
 Dis. / Ant. : 3m 3115 Ant. pol. : VERTICAL
 Limit : FCC PART-15C (1G-AV)
 Env. / Ins. : 8593EM 20°C/68% Engineer : Alvin_Yang
 EUT : Remote Transmitter for Security Division Datacom
 Power Rating : DC6V M/N:TX142
 Test Mode : Stand

	Ant.	Cable		Emission				
Freq.	Factor	Loss	Reading	Level	Limits	Margin	Remark	
(MHz)	(dB/m)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)		
1 1603.120	25.95	6.18	-0.87	31.25	54.00	22.75	Average	
2 1818.160	27.01	6.80	-1.47	32.34	54.00	21.66	Average	

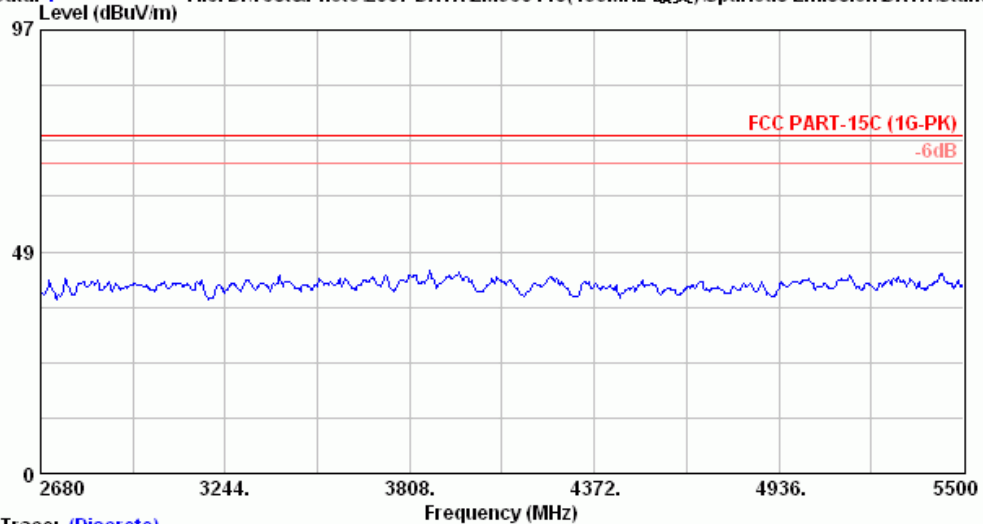
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

Date of Test : Apr. 27, 2007 Temperature : 20

EUT : Remote Transmitter for Security
Division Datacom Humidity : 68%

Test Position : EUT on Stand Fundamental Freq. : 433MHz

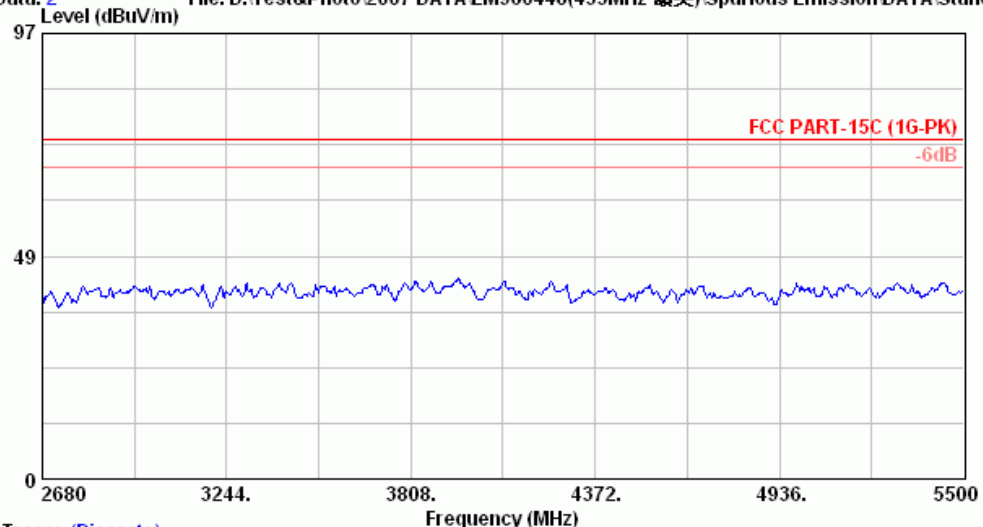
Data: 1 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\Stand



Trace: (Discrete)

Site no.	: A/C Chamber	Data no.	: 1
Dis. / Ant.	: 3m 3115	Ant. pol.	: HORIZONTAL
Limit	: FCC PART-15C (1G-PK)		
Env. / Ins.	: 8593EM 20°C/68%	Engineer	: Alvin_Yang
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:	: TX142
Test Mode	: Stand		

Data: 2 File: D:\Test&Photo\2007 DATA\EM960448(433MHz 額英)\Spurious Emission\DATA\Stand



Trace: (Discrete)

Site no.	: A/C Chamber	Data no.	: 2
Dis. / Ant.	: 3m 3115	Ant. pol.	: VERTICAL
Limit	: FCC PART-15C (1G-PK)		
Env. / Ins.	: 8593EM 20°C/68%	Engineer	: Alvin_Yang
EUT	: Remote Transmitter for Security Division Datacom		
Power Rating	: DC6V	M/N:	: TX142
Test Mode	: Stand		

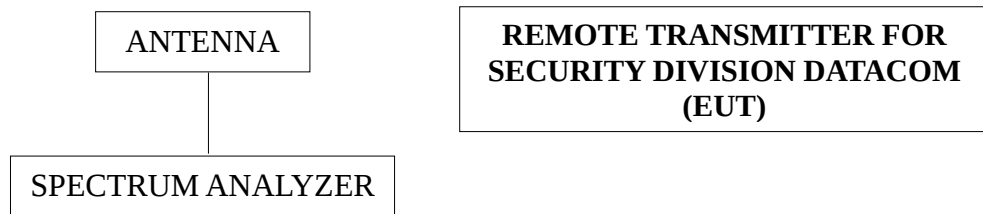
4. EMISSION BANDWIDTH MEASUREMENT

4.1. Test Equipment

The following test equipment were used during the Bandwidth Measurement :

Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Spectrum Analyzer	Agilent	E4446A	US44300366	Aug.11, 06'	Aug.10, 07'
2.	Wide Band Antenna	Diamond	RH799	N/A	N/A	N/A

4.2. Block Diagram of Test Setup



4.3. Specification Limits [§15.231-(c)]

The bandwidth of emission shall be no wider than 0.25% of the center frequency for device operating above 70MHz and below 900MHz. Bandwidth is determined at the points 20dB down from the modulated carrier.

4.4. Emission Bandwidth Measurement Results

PASSED. (0.0118% < 0.25%)

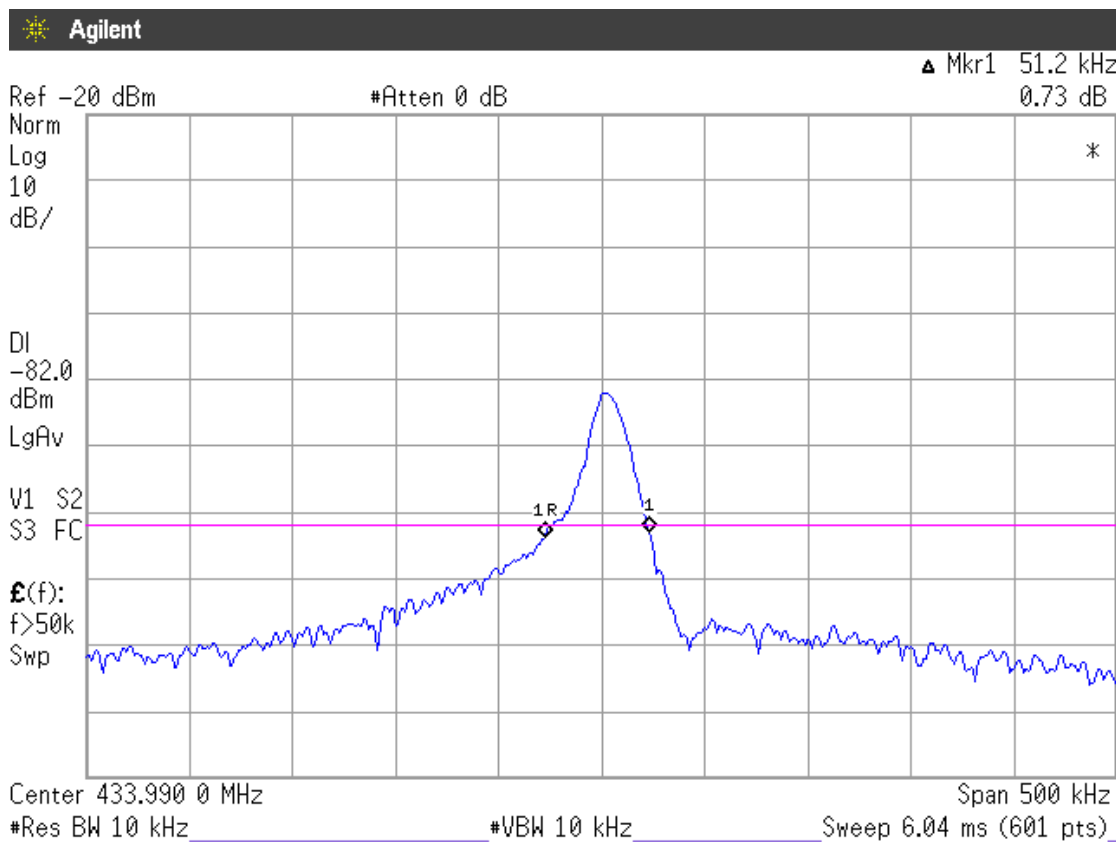
Fundamental Frequency: 433MHz

(Test Date: Apr. 27, 2007, Temperature: 20 , Humidity: 68%)

No.	Center Frequency	Bandwidth	Tolerance (%)
1.	433MHz	51.2kHz	0.0118%

The graph of bandwidth measured is attached in next page.

(Graph of Bandwidth Measurement)



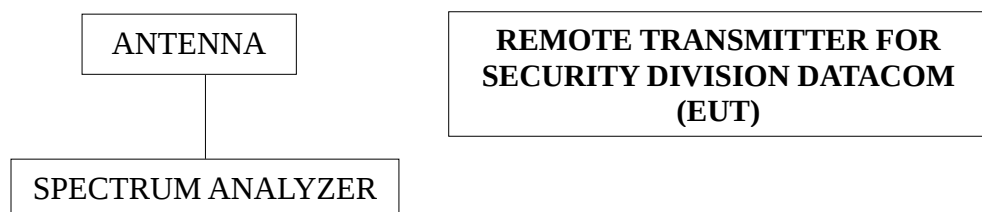
5. PERIODIC OPERATED MEASUREMENT

5.1. Test Equipment

The following test equipment were used during the periodic operated Measurement :

Item	Type	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
1.	Spectrum Analyzer	Agilent	E4446A	US44300366	Aug.11, 06'	Aug.10, 07'
2.	Wide Band Antenna	Diamond	RH799	N/A	N/A	N/A

5.2. Block Diagram of Test Setup



5.3. Specification Limits [§15.231-(a)-(1)]

The operation of this device is manually operated transmitter that is automatically deactivated the transmitter within not more than 5 seconds of being released, Compliance with §15.231 (a)- (1).

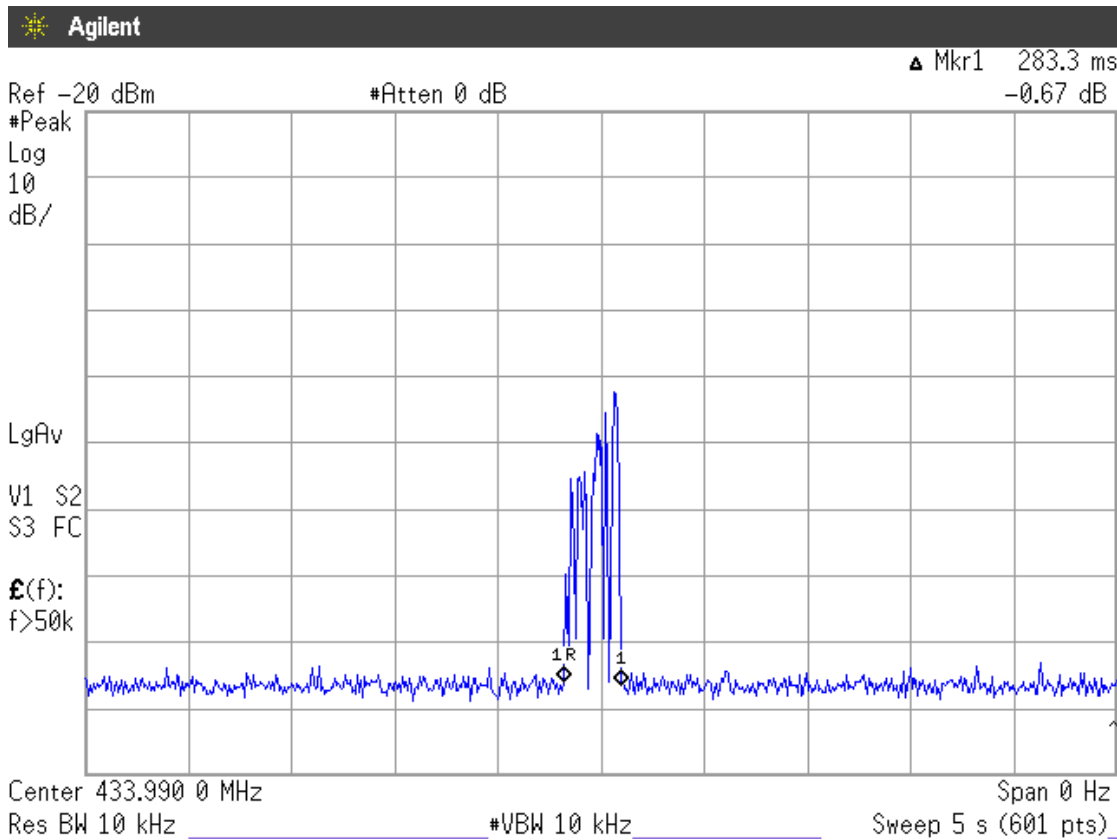
5.4. Periodic Operated Measurement Results

PASSED. T = 283.3ms. (< 5sec.)

(Test Date: Apr. 27, 2007, Temperature: 20 , Humidity: 68%)

The graph of testing is attached in next page.

(Graph of Periodic Operated Measurement)



6. DEVIATION TO TEST SPECIFICATIONS

【NONE】