

FCC CERTIFICATION  
On Behalf of  
Hobbico Inc

Revell 2.4G 2 channel Radio System  
Model No.: TX24201

FCC ID: IYFTX24201

Prepared for : Hobbico Inc  
Address : 2904 Research Road, Champaign, Illinois United States  
61821

Prepared by : ACCURATE TECHNOLOGY CO. LTD  
Address : F1, Bldg. A, Changyuan New Material Port, Keyuan Rd.  
Science & Industry Park, Nanshan, Shenzhen, Guangdong  
P.R. China

Tel: (0755) 26503290  
Fax: (0755) 26503396

Report Number : ATE20130972  
Date of Test : May 20-29, 2013  
Date of Report : May 31, 2013

## TABLE OF CONTENTS

Description	Page
Test Report Certification	
<b>1. GENERAL INFORMATION .....</b>	<b>4</b>
1.1. Description of Device (EUT).....	4
1.2. Description of Test Facility .....	4
1.3. Measurement Uncertainty .....	5
<b>2. MEASURING DEVICE AND TEST EQUIPMENT .....</b>	<b>6</b>
<b>3. SUMMARY OF TEST RESULTS.....</b>	<b>7</b>
<b>4. FUNDAMENTAL AND HARMONICS RADIATED EMISSION FOR SECTION 15.249(A) 8</b>	<b>8</b>
4.1. Block Diagram of Test Setup.....	8
4.2. The Emission Limit .....	9
4.3. Configuration of EUT on Measurement .....	9
4.4. Operating Condition of EUT .....	9
4.5. Test Procedure .....	10
4.6. The Field Strength of Radiation Emission Measurement Results .....	11
<b>5. SPURIOUS RADIATED EMISSION FOR SECTION 15.249(D) .....</b>	<b>14</b>
5.1. Block Diagram of Test Setup.....	14
5.2. The Emission Limit For Section 15.249(d) .....	14
5.3. EUT Configuration on Measurement .....	15
5.4. Operating Condition of EUT .....	15
5.5. Test Procedure .....	16
5.6. The Emission Measurement Result .....	17
<b>6. BAND EDGES .....</b>	<b>20</b>
6.1. The Requirement .....	20
6.2. EUT Configuration on Measurement .....	20
6.3. Operating Condition of EUT .....	20
6.4. Test Procedure .....	20
6.5. The Measurement Result .....	21
<b>7. ANTENNA REQUIREMENT.....</b>	<b>25</b>
7.1. The Requirement .....	25
7.2. Antenna Construction .....	25

APPENDIX I ( TEST CURVES) (26 pages)

## Test Report Certification

Applicant : Hobbico Inc  
Manufacturer : SHANG HAI C.C.LEE MODEL CO., LTD.  
EUT Description : Revell 2.4G 2 channel Radio System  
(A) MODEL NO.: TX24201  
(B) POWER SUPPLY: 6V DC ( “AA” batteries 4×)

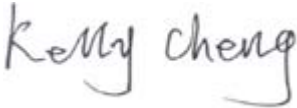
Measurement Procedure Used:


**FCC Rules and Regulations Part 15 Subpart C Section 15.249**  
**ANSI C63.4: 2009**

The device described above is tested by ACCURATE TECHNOLOGY CO. LTD to determine the maximum emission levels emanating from the device. The maximum emission levels are compared to the FCC Part 15 Subpart C Section 15.249 limits. The measurement results are contained in this test report and ACCURATE TECHNOLOGY CO. LTD is assumed full responsibility for the accuracy and completeness of these measurements. Also, this report shows that the Equipment Under Test (EUT) is to be technically compliant with the FCC requirements.

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

Date of Test : May 20-29, 2013

Prepared by :   
(Kelly Cheng, Engineer)

Approved & Authorized Signer :   
(Sean Liu, Manager)

## 1. GENERAL INFORMATION

### 1.1. Description of Device (EUT)

EUT : Revell 2.4G 2 channel Radio System

Model Number : TX24201

Power Supply : 6V DC ( “AA” batteries 4× )

Operate Frequency : 2402.000-2480.000MHz

Modulation Type : GFSK

Applicant : Hobbico Inc  
Address : 2904 Research Road, Champaign, Illinois United States  
61821

Manufacturer : SHANG HAI C.C.LEE MODEL CO., LTD.  
Address : No.1289, MIDDLE JIASONG ROAD, HUAXIN TOWN,  
QINGPU AREA, SHANGHAI, CHINA

Date of sample received : May 15, 2013

Date of Test : May 20-29, 2013

### 1.2. Description of Test Facility

EMC Lab : Accredited by TUV Rheinland Shenzhen

Listed by FCC  
The Registration Number is 752051

Listed by Industry Canada  
The Registration Number is 5077A-2

Accredited by China National Accreditation Committee  
for Laboratories  
The Certificate Registration Number is L3193

Name of Firm : ACCURATE TECHNOLOGY CO. LTD  
Site Location : F1, Bldg. A, Changyuan New Material Port, Keyuan Rd.  
Science & Industry Park, Nanshan, Shenzhen, Guangdong  
P.R. China

### 1.3.Measurement Uncertainty

Conducted Emission Expanded Uncertainty = 2.23dB, k=2

Radiated emission expanded uncertainty  
(9kHz-30MHz) = 3.08dB, k=2

Radiated emission expanded uncertainty  
(30MHz-1000MHz) = 4.42dB, k=2

Radiated emission expanded uncertainty  
(Above 1GHz) = 4.06dB, k=2

## 2. MEASURING DEVICE AND TEST EQUIPMENT

**Table 1: List of Test and Measurement Equipment**

Kind of equipment	Manufacturer	Type	S/N	Calibrated date	Calibrated until
EMI Test Receiver	Rohde&Schwarz	ESCS30	100307	Jan. 12, 2013	Jan. 11, 2014
EMI Test Receiver	Rohde&Schwarz	ESPI3	101526/003	Jan. 12, 2013	Jan. 11, 2014
Spectrum Analyzer	Agilent	E7405A	MY45115511	Jan. 12, 2013	Jan. 11, 2014
Pre-Amplifier	Rohde&Schwarz	CBLU118354 0-01	3791	Jan. 12, 2013	Jan. 11, 2014
Loop Antenna	Schwarzbeck	FMZB1516	1516131	Feb. 06, 2013	Feb. 05, 2014
Bilog Antenna	Schwarzbeck	VULB9163	9163-323	Feb. 06, 2013	Feb. 05, 2014
Horn Antenna	Schwarzbeck	BBHA9120D	9120D-655	Feb. 06, 2013	Feb. 05, 2014
Horn Antenna	Schwarzbeck	BBHA9170	9170-359	Feb. 06, 2013	Feb. 05, 2014
LISN	Rohde&Schwarz	ESH3-Z5	100305	Jan. 12, 2013	Jan. 11, 2014
LISN	Schwarzbeck	NSLK8126	8126431	Jan. 12, 2013	Jan. 11, 2014

### 3. SUMMARY OF TEST RESULTS

<b>FCC Rules</b>	<b>Description of Test</b>	<b>Result</b>
Section 15.207	Conducted Emission	N/A
Section 15.249(a)	Fundamental and Harmonics Radiated Emission	Compliant
Section 15.249(d)	Spurious Radiated Emission	Compliant
Section 15.249(d)	Band Edge	Compliant
Section 15.203	Antenna Requirement	Compliant

Remark: "N/A" means "Not applicable".

# 4. FUNDAMENTAL AND HARMONICS RADIATED EMISSION FOR SECTION 15.249(A)

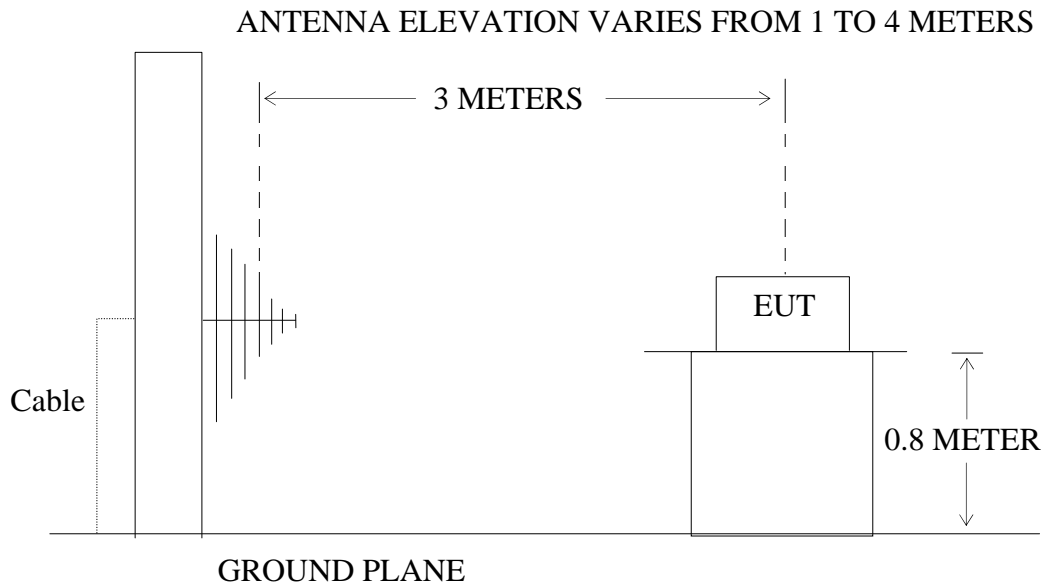
## 4.1. Block Diagram of Test Setup

### 4.1.1. Block diagram of connection between the EUT and simulators



(EUT: Revell 2.4G 2 channel Radio System)

### 4.1.2. Semi-Anechoic Chamber Test Setup Diagram



(EUT: Revell 2.4G 2 channel Radio System)



## 4.2.The Emission Limit

4.2.1.For intentional radiators, According to section 15.249(a), Operation within the frequency band of 2.4 to 2.4835GHz, The fundamental field strength shall not exceed 94 dB $\mu$ V/m and the harmonics shall not exceed 54 dB $\mu$ V/m.

Fundamental Frequency	Field Strength of Fundamental (millivolts/meter)	Field Strength of harmonics (microvolts/meter)
902-928MHz	50	500
2400-2483.5MHz	50	500
5725-5875MHz	50	500
24.0-24.25GHz	250	2500

4.2.2.According to section 15.249(e), as shown in section 15.35(b), the peak field strength of any emission shall not exceed the maximum permitted average limits specified above by more than 20 dB under any condition of modulation.

## 4.3.Configuration of EUT on Measurement

The following equipment are installed on Radiated Emission Measurement to meet the commission requirements and operating regulations in a manner which tends to maximize its emission characteristics in normal application.

### 4.3.1. Revell 2.4G 2 channel Radio System (EUT)

Model Number : TX24201  
 Serial Number : N/A  
 Manufacturer : SHANG HAI C.C.LEE MODEL CO., LTD.

## 4.4.Operating Condition of EUT

4.4.1.Setup the EUT and simulator as shown as Section 4.1.

4.4.2.Turn on the power of all equipment.

4.4.3. Let the EUT work in TX modes measure it. The transmit frequency are 2402.000-2480.000MHz. We are select 2402.000MHz, 2441.000MHz, 2480.000MHz TX frequency to transmit.

#### 4.5. Test Procedure

The EUT and its simulators are placed on a turntable, which is 0.8 meter high above ground. The turntable can rotate 360 degrees to determine the position of the maximum emission level. EUT is set 3.0 meters away from the receiving antenna, which is mounted on an antenna tower. The antenna can be moved up and down between 1.0 meter and 4 meters to find out the maximum emission level. Broadband antenna (calibrated bi-log antenna) is used as receiving antenna. Both horizontal and vertical polarizations of the antenna are set on measurement. In order to find the maximum emission levels, all of the interface cables must be manipulated according to ANSI C63.4: 2009 on radiated emission measurement. The EUT was tested in 3 orthogonal planes.

The bandwidth of test receiver is set at 120kHz in 30-1000MHz. and set at 1MHz in above 1000MHz.

The frequency range from 30MHz to 25000MHz is checked.

## 4.6. The Field Strength of Radiation Emission Measurement Results PASS.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2402.000MHz</u>	Test Engineer:	<u>Alen</u>

### Fundamental Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2402.000	86.65	89.45	-6.76	79.89	82.69	94.00	114.00	-14.11	-31.31	Vertical
2402.000	86.39	89.29	-6.76	79.63	82.53	94.00	114.00	-14.37	-31.46	Horizontal

### Harmonics Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
---	---	---	---	---	---	---	---	---	---	Vertical
---	---	---	---	---	---	---	---	---	---	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$

3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2441.000MHz</u>	Test Engineer:	<u>Alen</u>

### Fundamental Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2441.000	86.75	89.53	-6.67	80.08	82.86	94.00	114.00	-13.92	-31.14	Vertical
2441.000	84.99	87.95	-6.67	78.32	81.28	94.00	114.00	-15.18	-32.72	Horizontal

### Harmonics Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
---	---	---	---	---	---	---	---	---	---	Vertical
---	---	---	---	---	---	---	---	---	---	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$

3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2480.000MHz</u>	Test Engineer:	<u>Alen</u>

### Fundamental Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2480.000	87.53	90.20	-6.56	80.97	83.64	94.00	114.00	-13.03	-30.36	Vertical
2480.000	90.01	92.69	-6.56	83.45	86.13	94.00	114.00	-10.55	-27.87	Horizontal

### Harmonics Radiated Emissions

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
---	---	---	---	---	---	---	---	---	---	Vertical
---	---	---	---	---	---	---	---	---	---	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$

3. The spectral diagrams in appendix I display the measurement of peak values.

## 5. SPURIOUS RADIATED EMISSION FOR SECTION 15.249(D)

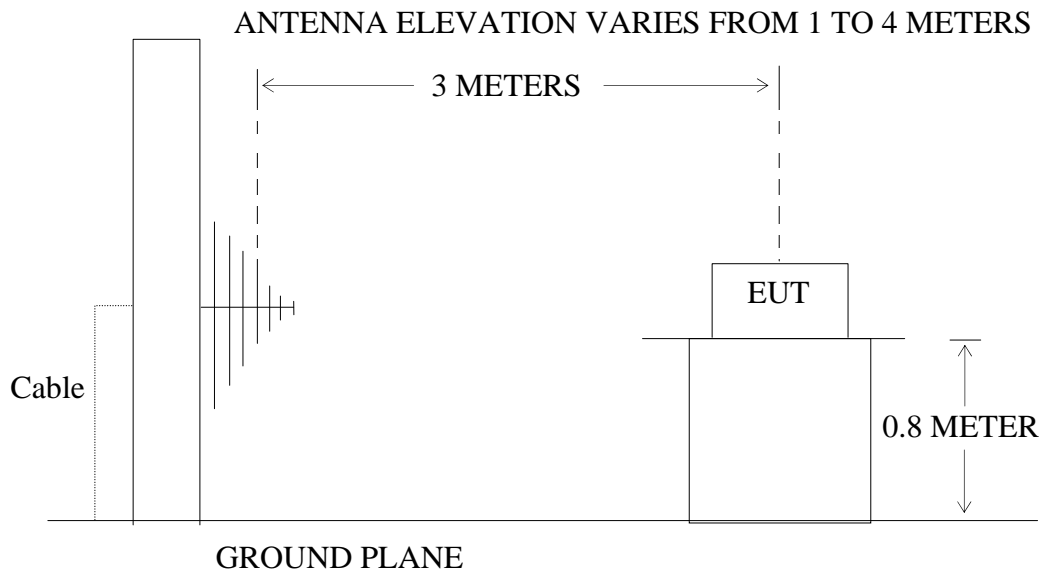
### 5.1. Block Diagram of Test Setup

#### 5.1.1. Block diagram of connection between the EUT and simulators



(EUT: Revell 2.4G 2 channel Radio System)

#### 5.1.2. Semi-Anechoic Chamber Test Setup Diagram



(EUT: Revell 2.4G 2 channel Radio System)

### 5.2. The Emission Limit For Section 15.249(d)

5.2.1. Emission radiated outside of the specified frequency bands, except for harmonics, shall be comply with the general radiated emission limits in Section 15.209.

Radiation Emission Measurement Limits According to Section 15.209

Frequency (MHz)	Limit		The final measurement in band 9-90kHz, 110-490kHz and above 1000MHz is performed with Average detector.
	Field Strength (microvolts/meter)	Measurement Distance (meters)	
0.009 – 0.490	2400/F(kHz)	300	

0.490 – 1.705	24000/F(kHz)	30	Except those frequency bands mention above, the final measurement for frequencies below 1000MHz is performed with Quasi Peak detector.
1.705 – 30.0	30	30	
30 - 88	100	3	
88 - 216	150	3	
216 - 960	200	3	
Above 960	500	3	

### 5.3.EUT Configuration on Measurement

The following equipment are installed on the emission Measurement to meet the commission requirements and operating regulations in a manner which tends to maximize its emission characteristics in normal application.

#### 5.3.1. Revell 2.4G 2 channel Radio System (EUT)

Model Number : TX24201  
Serial Number : N/A  
Manufacturer : SHANG HAI C.C.LEE MODEL CO., LTD.

### 5.4.Operating Condition of EUT

5.4.1.Setup the EUT and simulator as shown as Section 5.1.

5.4.2.Turn on the power of all equipment.

5.4.3. Let the EUT work in TX modes measure it. The transmit frequency are 2402.000-2480.000MHz. We are select 2402.000MHz, 2441.000MHz, 2480.000MHz TX frequency to transmit.

## 5.5. Test Procedure

The EUT and its simulators are placed on a turntable, which is 0.8 meter high above ground. The turntable can rotate 360 degrees to determine the position of the maximum emission level. EUT is set 3.0 meters away from the receiving antenna, which is mounted on an antenna tower. The antenna can be moved up and down between 1.0 meter and 4 meters to find out the maximum emission level. Broadband antenna (calibrated bilog antenna) is used as receiving antenna. Both horizontal and vertical polarizations of the antenna are set on measurement. In order to find the maximum emission levels, all of the interface cables must be manipulated according to ANSI C63.4: 2009 on radiated emission measurement. The EUT was tested in 3 orthogonal planes.

The bandwidth of test receiver is set at 9kHz in below 30MHz. and set at 120kHz in 30-1000MHz, and 1MHz in above 1000MHz.

The frequency range from 9kHz to 25GHz is checked.

The final measurement in band 9-90kHz, 110-490kHz and above 1000MHz is performed with Average detector. Except those frequency bands mention above, the final measurement for frequencies below 1000MHz is performed with Quasi Peak detector.



## 5.6.The Emission Measurement Result

**PASS.**

Date of Test:	<u>May 20-29, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2402.000MHz</u>	Test Engineer:	<u>Alen</u>

Below 30MHz

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	X
-	-	-	-	-	-	Y
-	-	-	-	-	-	Z

30MHz-25GHz

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$

3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	May 20-29, 2013	Temperature:	25°C
EUT:	Revell 2.4G 2 channel Radio System	Humidity:	50%
Model No.:	TX24201	Power Supply:	DC 6V
Test Mode:	TX 2441.000MHz	Test Engineer:	Alen

Below 30MHz

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	X
-	-	-	-	-	-	Y
-	-	-	-	-	-	Z

30MHz-25GH

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:  

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$
3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	May 20-29, 2013	Temperature:	25°C
EUT:	Revell 2.4G 2 channel Radio System	Humidity:	50%
Model No.:	TX24201	Power Supply:	DC 6V
Test Mode:	TX 2480.000MHz	Test Engineer:	Alen

## Below 30MHz

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	X
-	-	-	-	-	-	Y
-	-	-	-	-	-	Z

## 30MHz-25GH

Frequency (MHz)	Reading (dBμV/m)	Factor(dB) Corr.	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Polarization
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

## Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:  

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$
3. The spectral diagrams in appendix I display the measurement of peak values.

## 6. BAND EDGES

### 6.1.The Requirement

6.1.1.Band Edge from 2400MHz to 2483.5MHz. Emission radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in Section 15.209, whichever is the lesser attenuation.

### 6.2.EUT Configuration on Measurement

The following equipment are installed on the emission Measurement to meet the commission requirements and operating regulations in a manner which tends to maximize its emission characteristics in normal application.

#### 6.2.1. Revell 2.4G 2 channel Radio System (EUT)

Model Number : TX24201  
 Serial Number : N/A  
 Manufacturer : SHANG HAI C.C.LEE MODEL CO., LTD.

### 6.3.Operating Condition of EUT

6.3.1.Setup the EUT and simulator as shown as Section 4.1.

6.3.2.Turn on the power of all equipment.

6.3.3.Let the EUT work in TX modes measure it. The transmit frequency are 2402.000-2480.000MHz MHz. We are select 2402.000MHz, 2480.000MHz TX frequency to transmit.

### 6.4.Test Procedure

1. The EUT is placed on a turntable, which is 0.8m above the ground plane and worked at highest radiated power.
2. The turntable was rotated for 360 degrees to determine the position of maximum emission level.
3. EUT is set 3m away from the receiving antenna, which is varied from 1m to 4m to find out the highest emission.
4. Set the spectrum analyzer in the following setting in order to capture the lower and upper band-edges of the emission:  
 RBW=1MHz, VBW=1MHz

## 6.5.The Measurement Result

**Pass.**

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2402.000MHz (Hopping)</u>	Test Engineer:	<u>Alen</u>

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2310.000	39.68	44.00	-7.81	31.87	36.19	54.00	74.00	-22.13	-37.81	Vertical
2373.318	42.20	52.73	-7.64	34.56	45.09	54.00	74.00	-19.44	-28.91	Vertical
2390.000	39.17	44.34	-7.53	31.64	36.81	54.00	74.00	-22.36	-37.19	Vertical
2310.000	41.72	46.33	-7.81	33.91	38.52	54.00	74.00	-20.09	-35.48	Horizontal
2331.673	41.32	53.10	-7.81	33.51	45.29	54.00	74.00	-20.49	-28.71	Horizontal
2390.000	40.69	46.89	-7.53	33.16	39.36	54.00	74.00	-20.84	-34.64	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$

3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2480.000MHz(Hopping)</u>	Test Engineer:	<u>Alen</u>

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2483.500	48.69	53.31	-7.37	41.32	45.94	54.00	74.00	-12.68	-28.06	Vertical
2489.566	40.55	45.00	-7.39	33.16	37.61	54.00	74.00	-20.84	-36.39	Vertical
2500.000	38.33	43.64	-7.40	30.93	36.24	54.00	74.00	-23.07	-37.76	Vertical
2483.500	47.85	52.00	-7.37	40.48	44.63	54.00	74.00	-13.52	-29.37	Horizontal
2488.774	40.34	45.30	-7.39	37.91	32.95	54.00	74.00	-21.05	-36.09	Horizontal
2500.000	38.36	42.38	-7.40	30.96	34.98	54.00	74.00	-23.04	-39.02	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:  

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

$$\text{Where Corrected Factor} = \text{Antenna Factor} + \text{Cable Loss} + \text{High Pass Filter Loss} - \text{Amplifier Gain}$$
3. The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2402.000MHz (Non-hopping)</u>	Test Engineer:	<u>Alen</u>

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2310.000	39.68	44.00	-7.81	31.87	36.19	54.00	74.00	-22.13	-37.81	Vertical
2373.318	42.20	52.73	-7.64	34.56	45.09	54.00	74.00	-19.44	-28.91	Vertical
2390.000	39.17	44.34	-7.53	31.64	36.81	54.00	74.00	-22.36	-37.19	Vertical
2310.000	41.72	46.33	-7.81	33.91	38.52	54.00	74.00	-20.09	-35.48	Horizontal
2331.673	41.32	53.10	-7.81	33.51	45.29	54.00	74.00	-20.49	-28.71	Horizontal
2390.0000	40.69	46.89	-7.53	33.16	39.36	54.00	74.00	-20.84	-34.64	Horizontal

## Note:

- Emissions attenuated more than 20 dB below the permissible value are not reported.
- The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:  

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss – Amplifier Gain
- The spectral diagrams in appendix I display the measurement of peak values.

Date of Test:	<u>May 20, 2013</u>	Temperature:	<u>25°C</u>
EUT:	<u>Revell 2.4G 2 channel Radio System</u>	Humidity:	<u>50%</u>
Model No.:	<u>TX24201</u>	Power Supply:	<u>DC 6V</u>
Test Mode:	<u>TX 2480.000MHz (Non-hopping)</u>	Test Engineer:	<u>Alen</u>

Frequency (MHz)	Reading(dBμV/m)		Factor(dB) Corr.	Result(dBμV/m)		Limit(dBμV/m)		Margin(dB)		Polarization
	AV	PEAK		AV	PEAK	AV	PEAK	AV	PEAK	
2483.500	48.69	53.31	-7.37	41.32	45.94	54.00	74.00	-12.68	-28.06	Vertical
2489.566	40.55	45.00	-7.39	33.16	37.61	54.00	74.00	-20.84	-36.39	Vertical
2500.000	38.33	43.64	-7.40	30.93	36.24	54.00	74.00	-23.07	-37.76	Vertical
2483.500	47.85	52.00	-7.37	40.48	44.63	54.00	74.00	-13.52	-29.37	Horizontal
2488.774	40.34	45.30	-7.39	32.95	37.91	54.00	74.00	-21.05	-36.09	Horizontal
2500.000	38.36	42.38	-7.40	30.96	34.98	54.00	74.00	-23.04	-39.02	Horizontal

Note:

1. Emissions attenuated more than 20 dB below the permissible value are not reported.
2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:  

$$\text{Result} = \text{Reading} + \text{Corrected Factor}$$

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss – Amplifier Gain
3. The spectral diagrams in appendix I display the measurement of peak values.



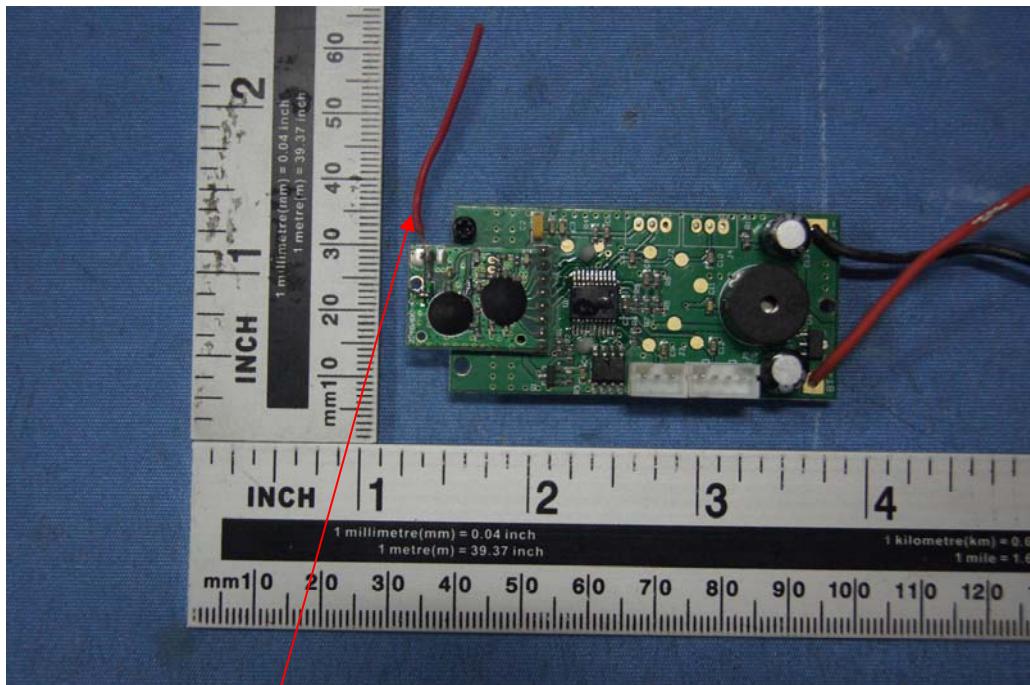
## 7. ANTENNA REQUIREMENT

### 7.1.The Requirement

7.1.1. According to 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.

### 7.2. Antenna Construction

The antenna is PCB Layout antenna, no consideration of replacement.



Antenna

# APPENDIX I (Test Curves)



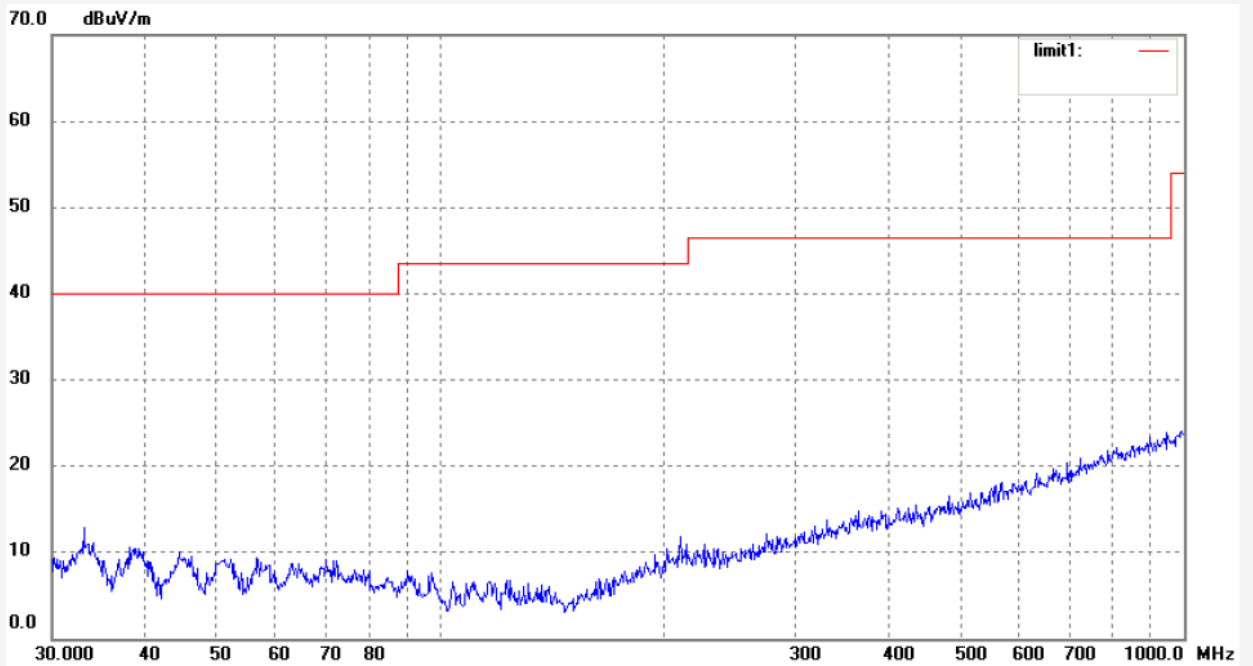
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #628	Polarization: Horizontal
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/29/39
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #627

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.( C)/Hum.(%) 26 C / 55 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2402MHz

Model: TX24201

Manufacturer: C.C.LEE

Polarization: Vertical

Power Source: DC 6V

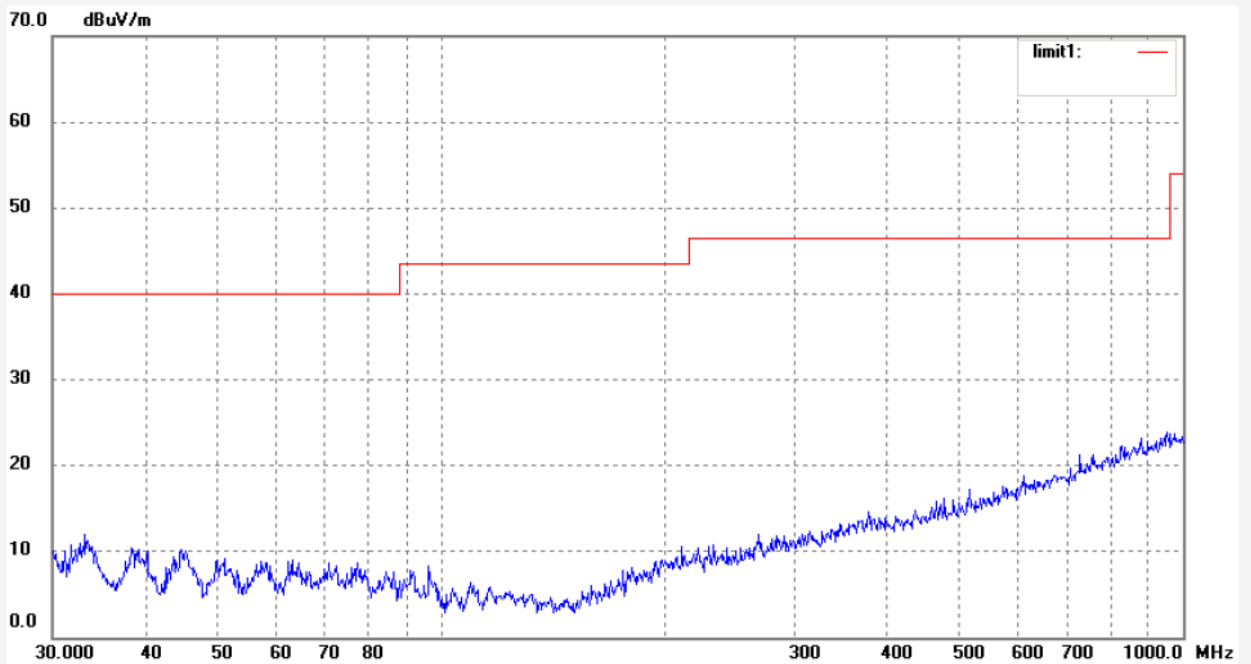
Date: 13/05/20/

Time: 10/28/49

Engineer Signature:

Distance: 3m

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark



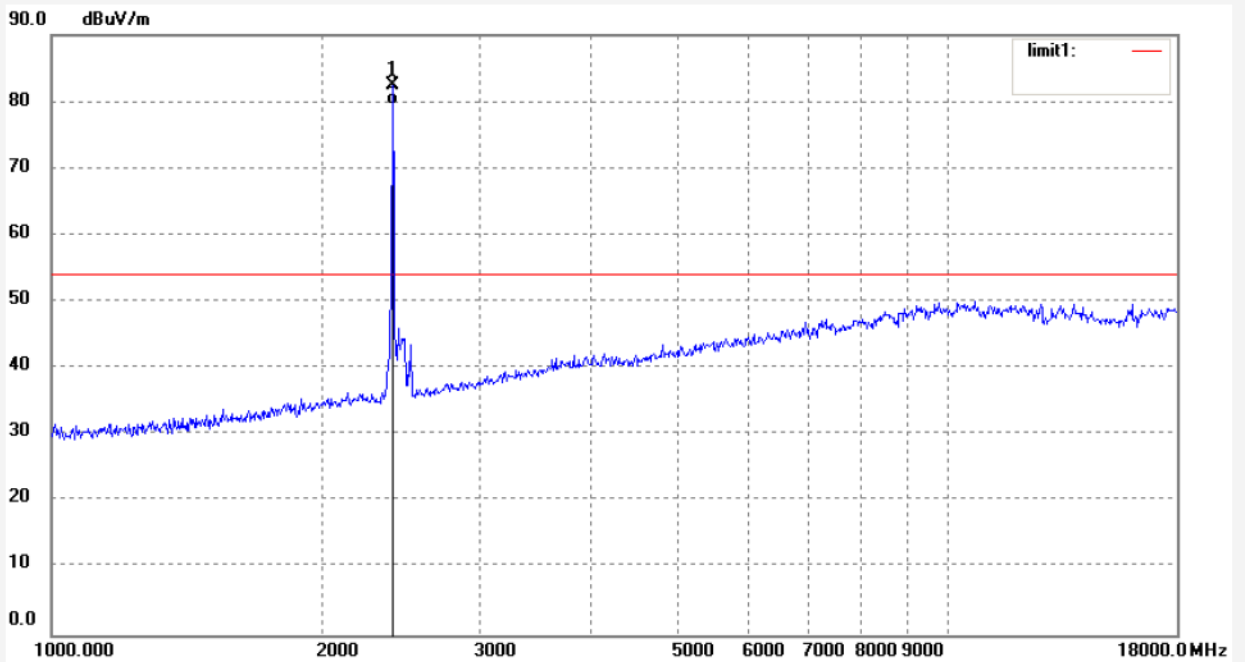
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #609	Polarization: Horizontal
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/30/21
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2402.000	89.29	-6.76	82.53	114.00	-31.46	peak			
2	2402.000	86.39	-6.76	79.63	94.00	-14.37	AVG			



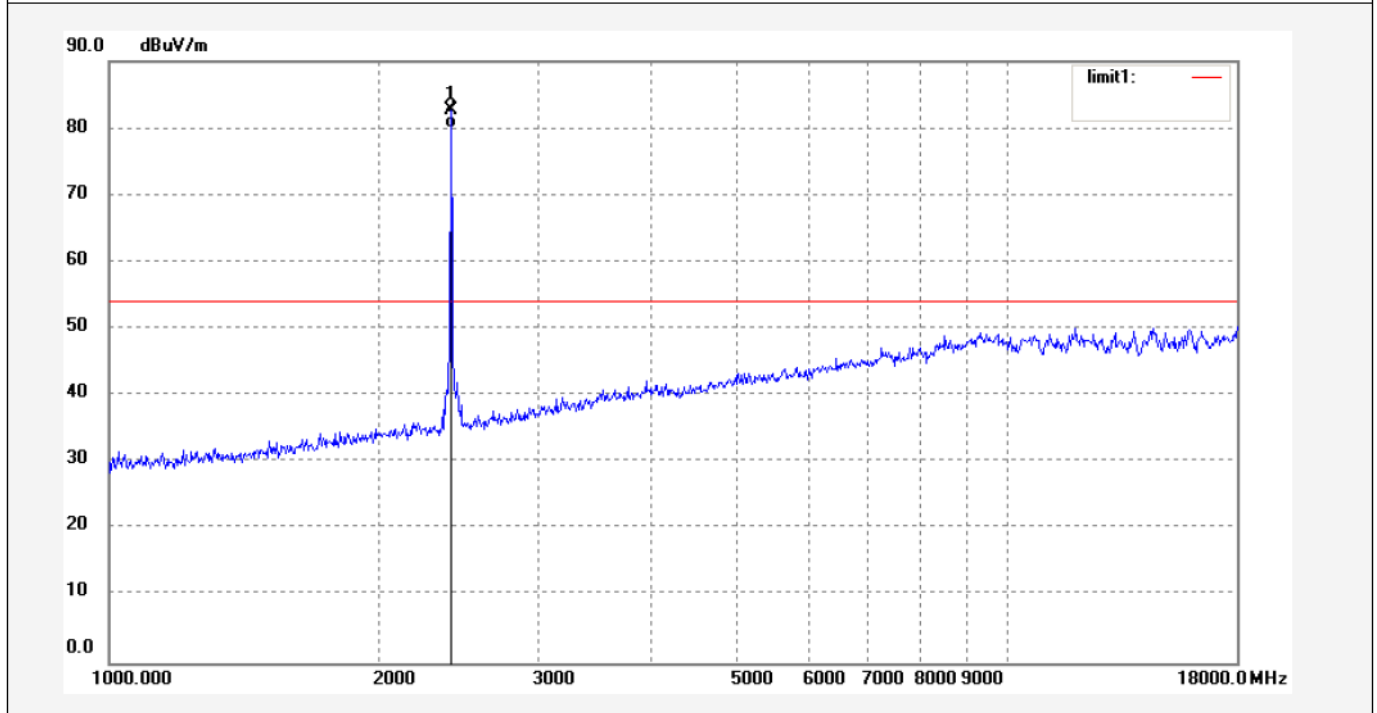
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg.A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #610	Polarization: Vertical
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/31/40
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2402.000	89.45	-6.76	82.69	114.00	-31.31	peak			
2	2402.000	86.65	-6.76	79.89	94.00	-14.11	AVG			



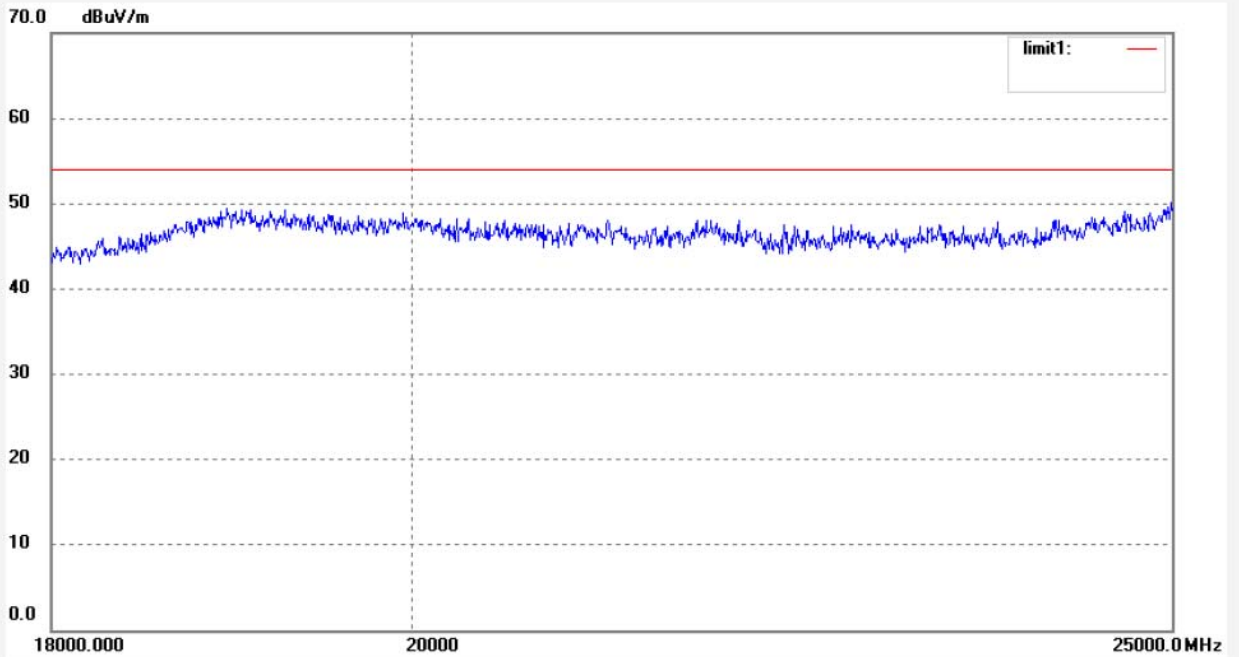
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: ALEN #674	Polarization: Horizontal
Standard: FCC 15C	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/29/
Temp.( C)/Hum.(%) 25 C / 50 %	Time: 11:23:55
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------





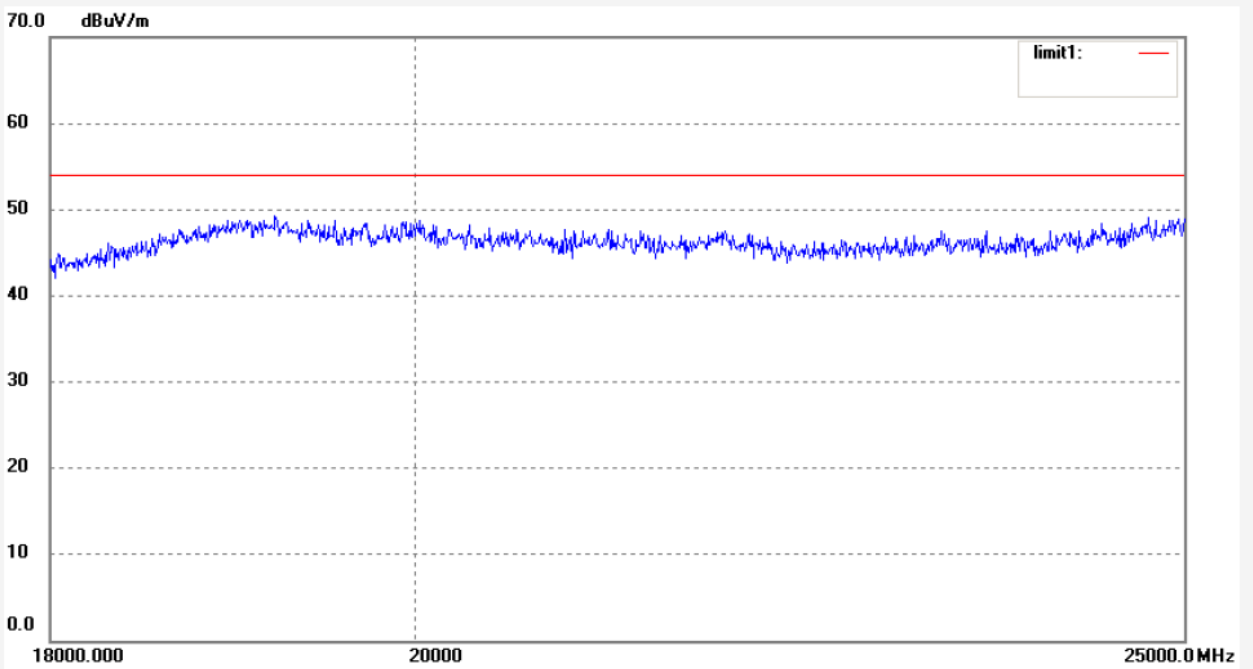
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: ALEN#675	Polarization: Vertical
Standard: FCC 15C	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/29/
Temp.( C)/Hum.(%) 25 C / 50 %	Time: 11:27:11
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------





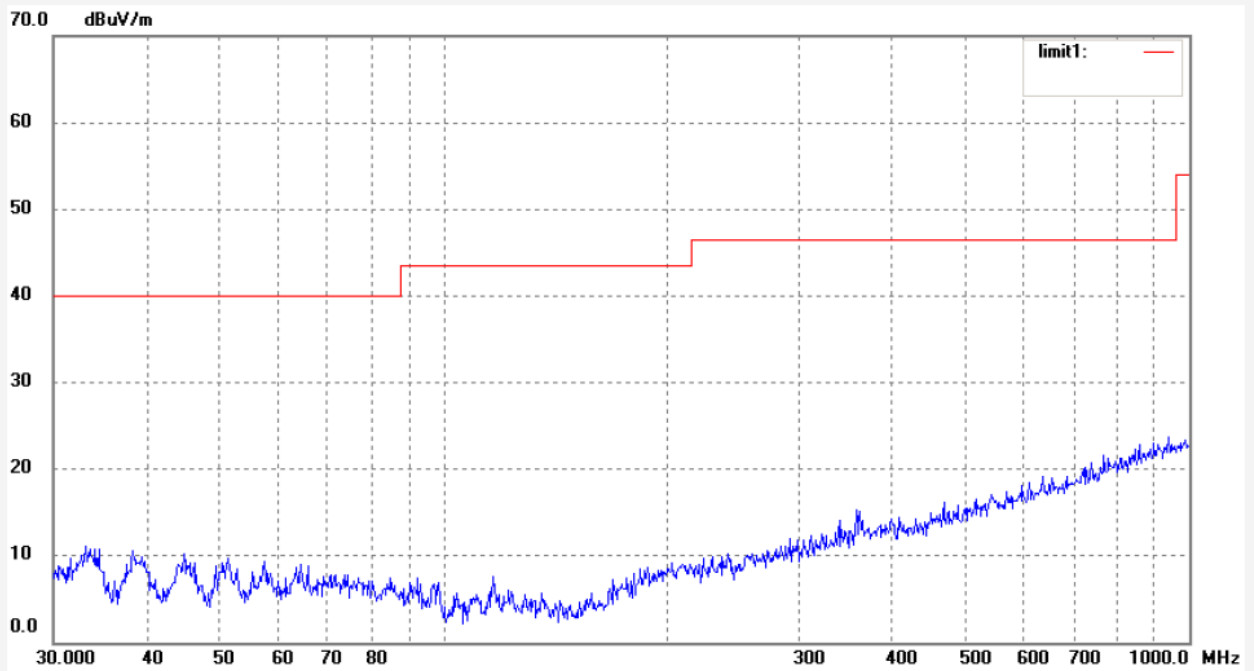
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #625	Polarization: Horizontal
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/27/52
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2441MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #626

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.( C)/Hum.(%) 26 C / 55 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2441MHz

Model: TX24201

Manufacturer: C.C.LEE

Polarization: Vertical

Power Source: DC 6V

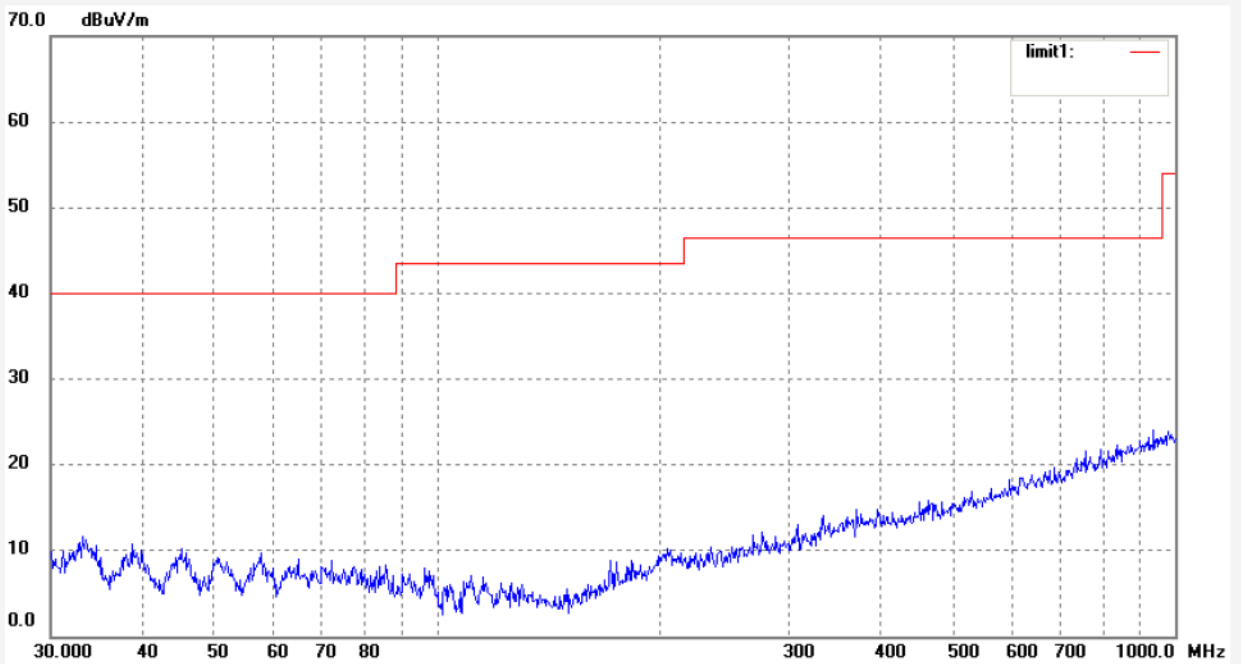
Date: 13/05/20/

Time: 10/28/28

Engineer Signature:

Distance: 3m

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber

Tel:+86-0755-26503290

Fax:+86-0755-26503396

Job No.: alen #619

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.( C)/Hum.(%) 26 C / 55 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2441MHz

Model: TX24201

Manufacturer: C.C.LEE

Polarization: Horizontal

Power Source: DC 6V

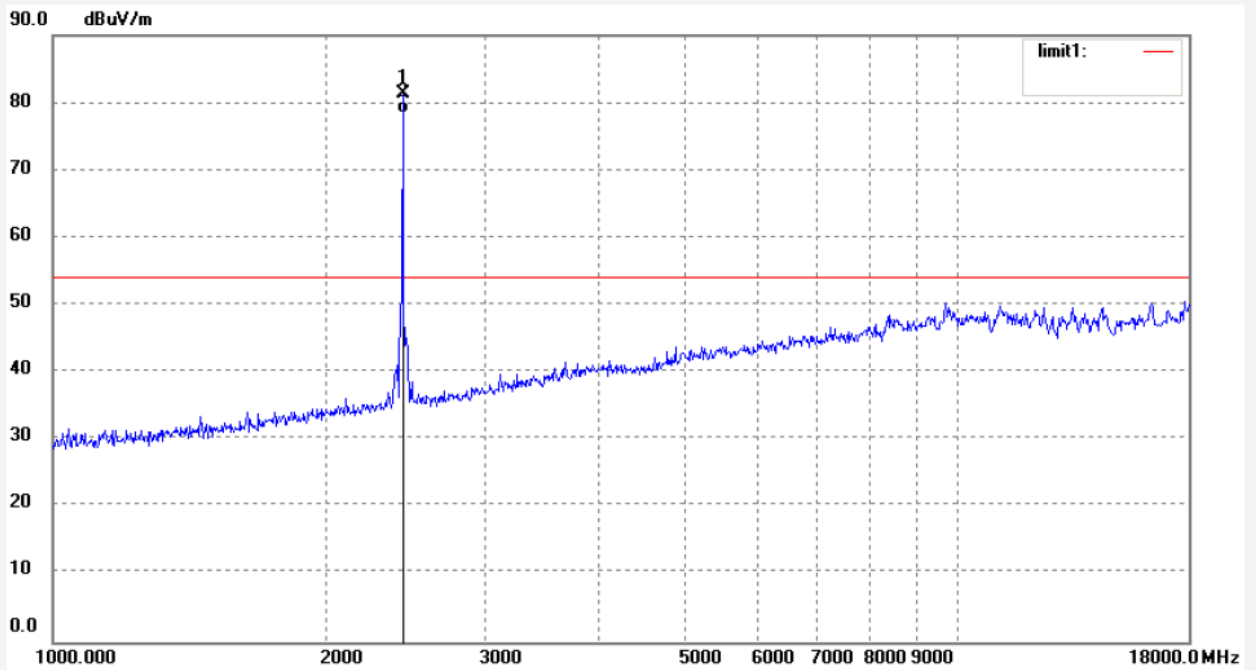
Date: 13/05/20/

Time: 10/10/08

Engineer Signature:

Distance: 3m

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2438.000	87.95	-6.67	81.28	114.00	-32.72	peak			
2	2438.000	84.99	-6.67	78.32	94.00	-15.18	AVG			



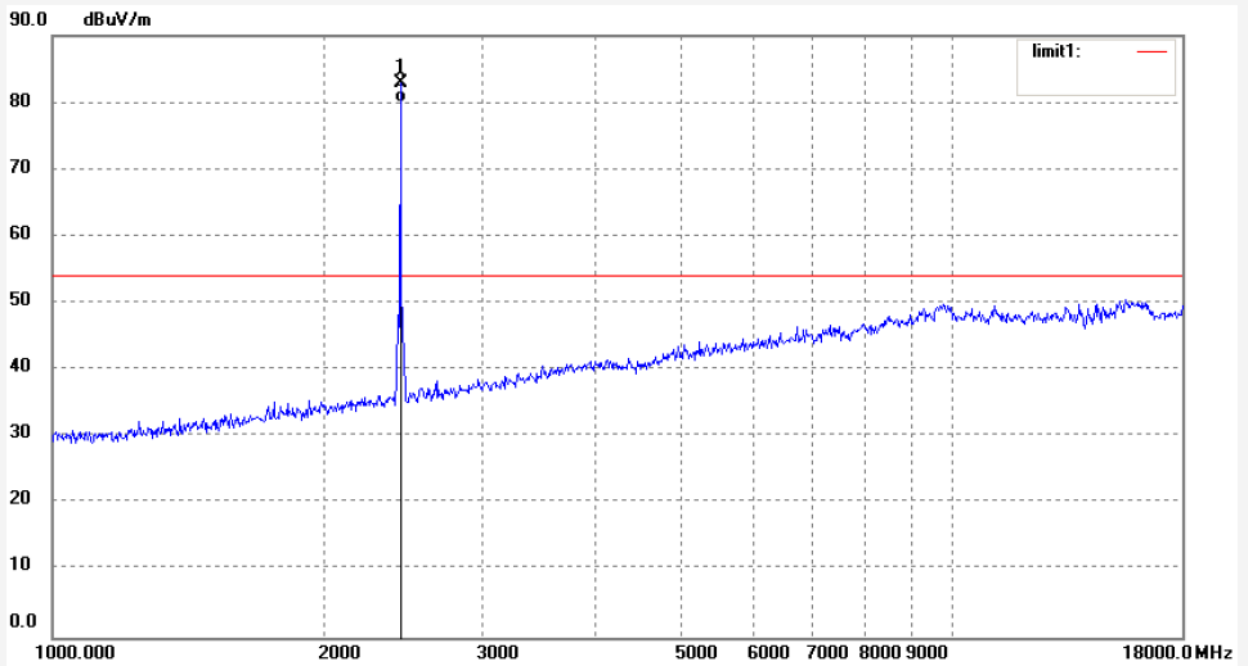
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #620	Polarization: Vertical
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/12/00
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2441MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2438.000	89.53	-6.67	82.86	114.00	-31.14	peak			
2	2438.000	86.75	-6.67	80.08	94.00	-13.92	AVG			



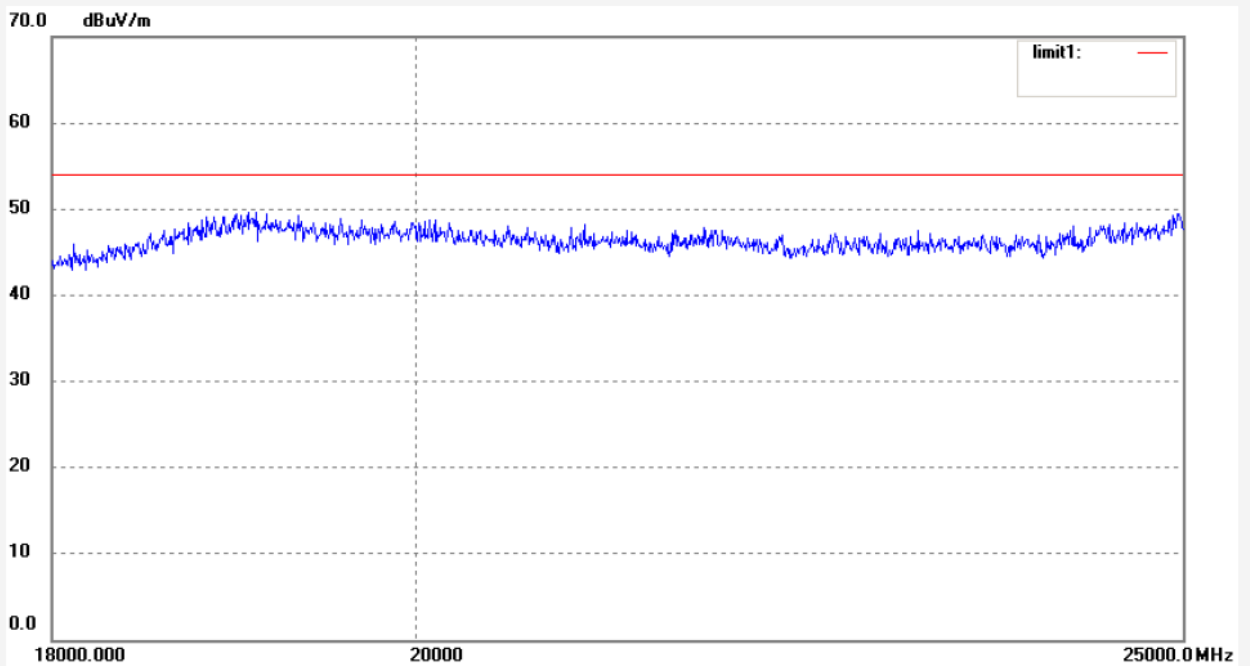
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: ALEN #673	Polarization: Horizontal
Standard: FCC 15C	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/29/
Temp.( C)/Hum.(%) 25 C / 50 %	Time: 11:18:36
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2441MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: ALEN #672

Standard: FCC 15C

Test item: Radiation Test

Temp.( C)/Hum.(%) 25 C / 50 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2441MHz

Model: TX24201

Manufacturer: C.C.LEE

Polarization: Vertical

Power Source: DC 6V

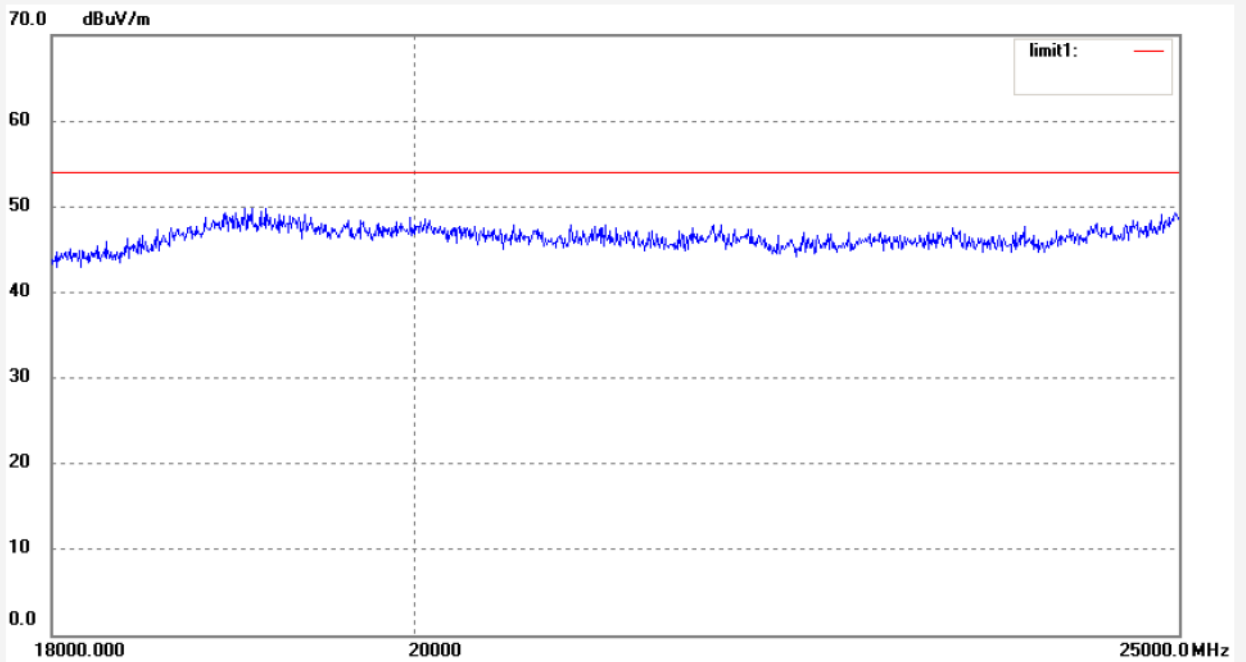
Date: 13/05/29/

Time: 11:14:45

Engineer Signature:

Distance: 3m

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



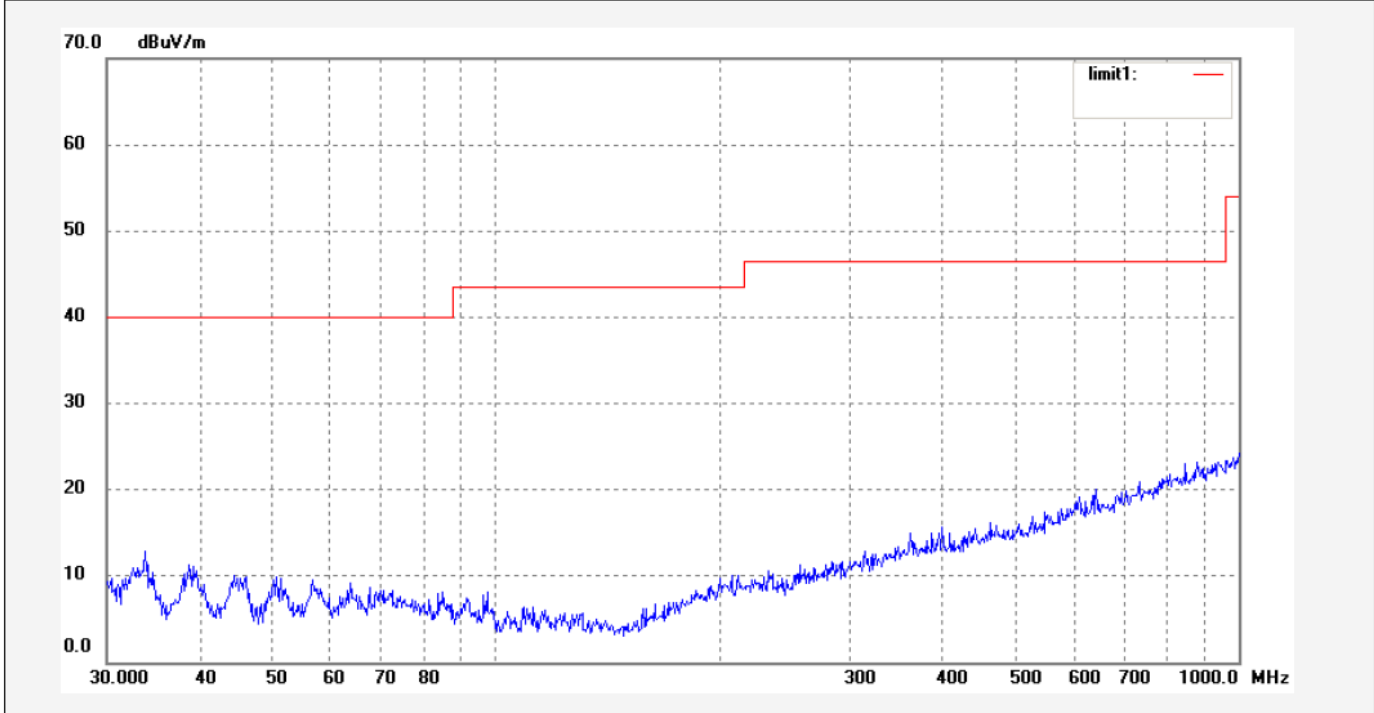
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #624	Polarization: Horizontal
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/27/23
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



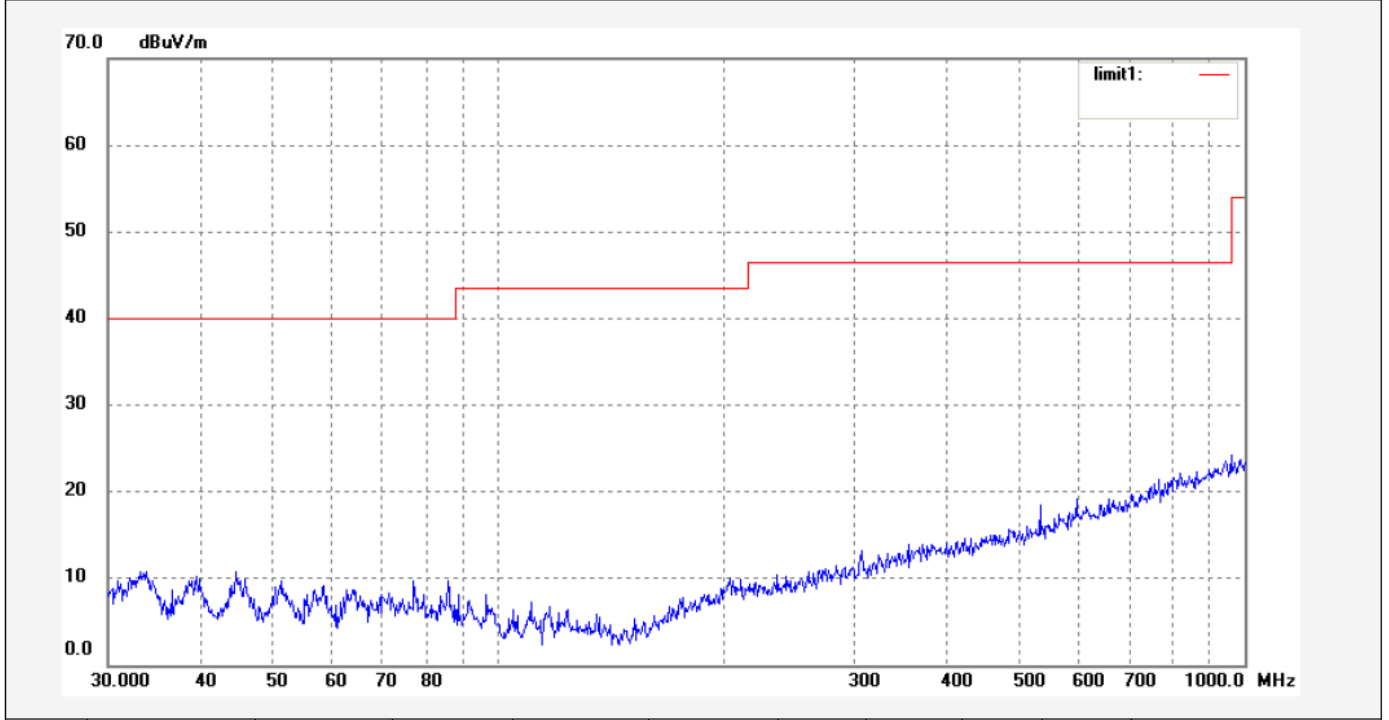
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #623	Polarization: Vertical
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/26/48
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------





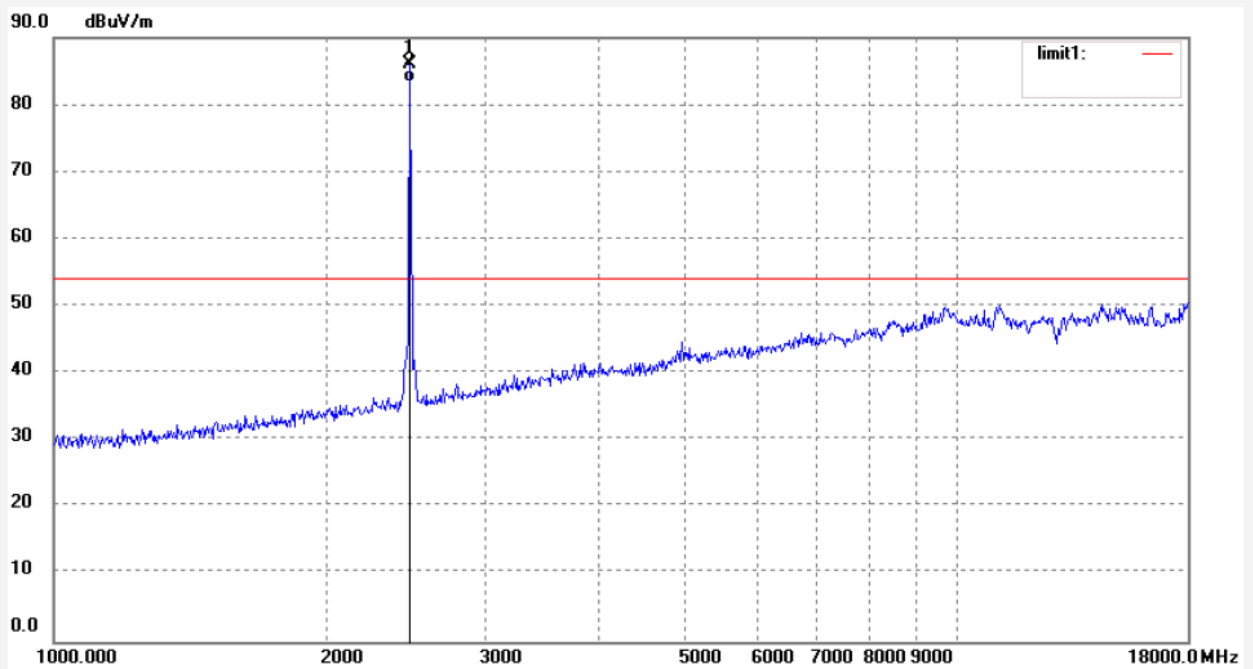
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #615	Polarization: Horizontal
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/52/14
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2480.000	92.69	-6.56	86.13	114.00	-27.87	peak			
2	2480.000	90.01	-6.56	83.45	94.00	-10.55	AVG			



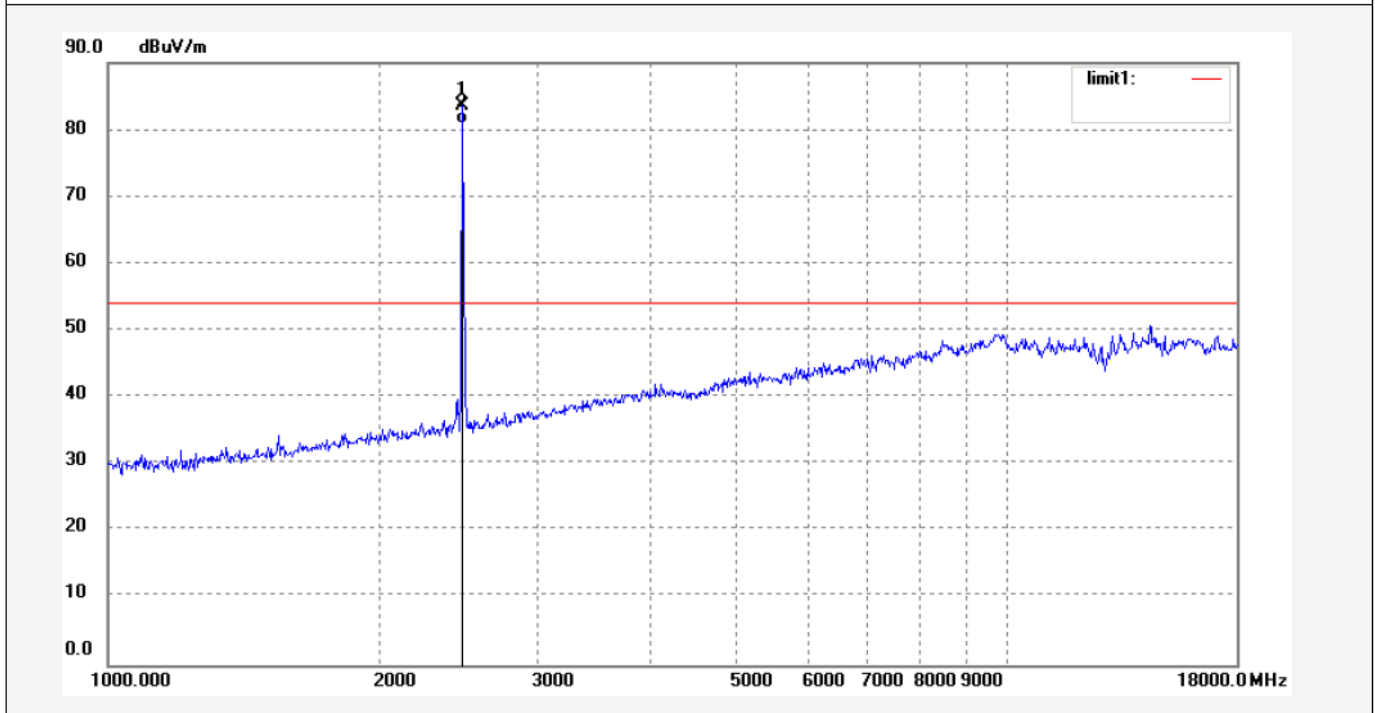
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #616	Polarization: Vertical
Standard: FCC Class B 3M Radiated	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/53/43
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2480.000	90.20	-6.56	83.64	114.00	-30.36	peak			
2	2480.000	87.53	-6.56	80.97	94.00	-13.03	AVG			



**ACCURATE TECHNOLOGY CO., LTD.**  
 F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
 Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
 Tel:+86-0755-26503290  
 Fax:+86-0755-26503396

Job No.: ALEN #670

Standard: FCC 15C

Test item: Radiation Test

Temp.( C)/Hum.(%) 25 C / 50 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2480MHz

Model: TX24201

Manufacturer: C.C.LEE

Polarization: Horizontal

Power Source: DC 6V

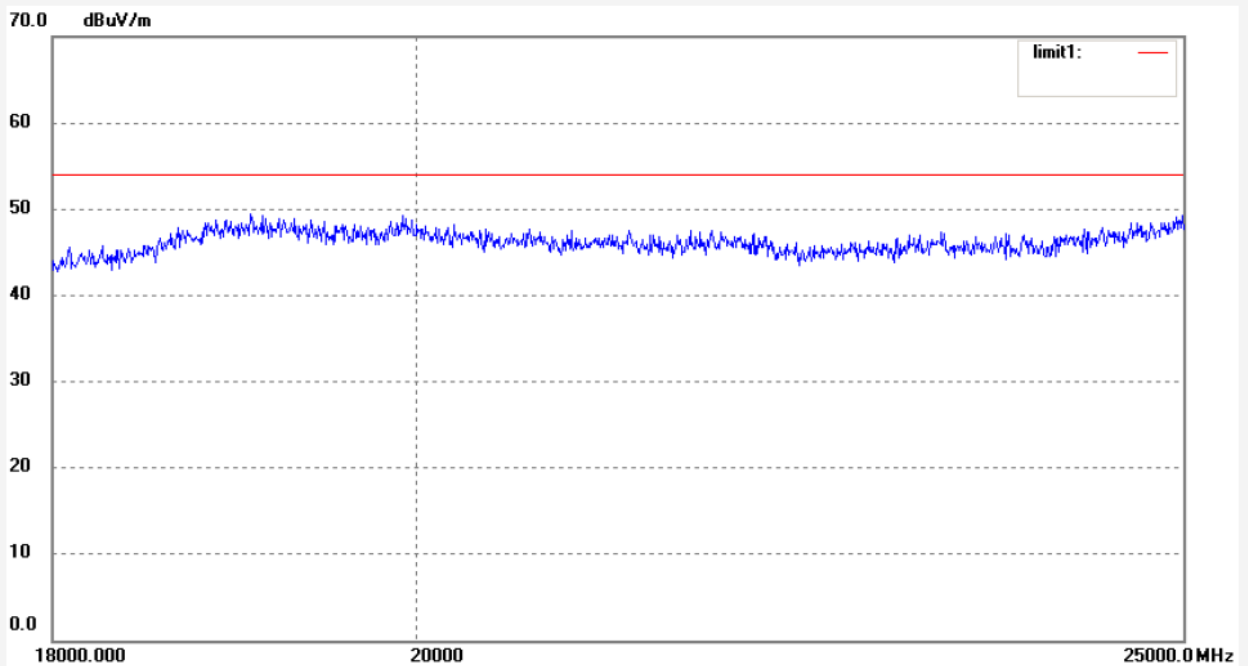
Date: 13/05/29/

Time: 11:07:15

Engineer Signature:

Distance: 3m

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



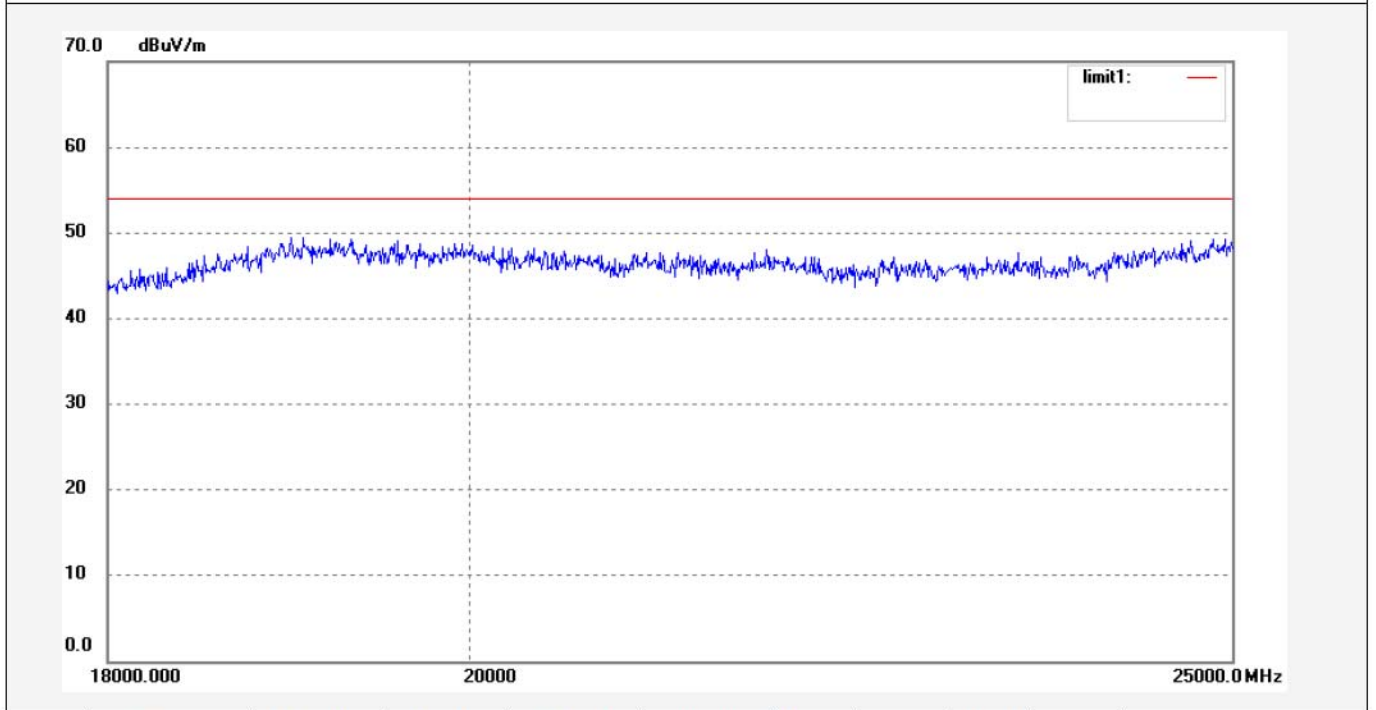
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: ALEN #671	Polarization: Vertical
Standard: FCC 15C	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/29/
Temp.( C)/Hum.(%) 25 C / 50 %	Time: 11:09:22
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
-----	-------------	------------------	-------------	-----------------	----------------	-------------	----------	-------------	---------------	--------



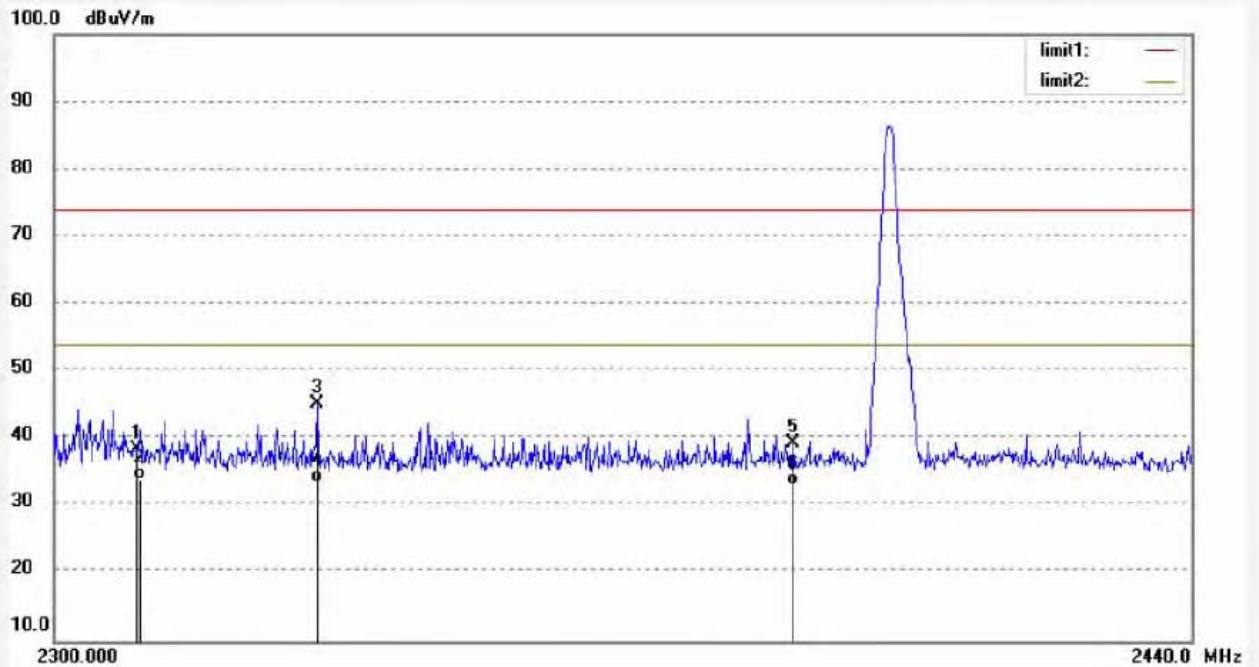
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #613	Polarization: Horizontal
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/39/54
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201 (Hopping)	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2310.000	46.33	-7.81	38.52	74.00	-35.48	peak			
2	2310.000	41.72	-7.81	33.91	54.00	-20.09	AVG			
3	2331.673	53.10	-7.81	45.29	74.00	-28.71	peak			
4	2331.673	41.32	-7.81	33.51	54.00	-20.49	AVG			
5	2390.000	46.89	-7.53	39.36	74.00	-34.64	peak			
6	2390.000	40.69	-7.53	33.16	54.00	-20.84	AVG			





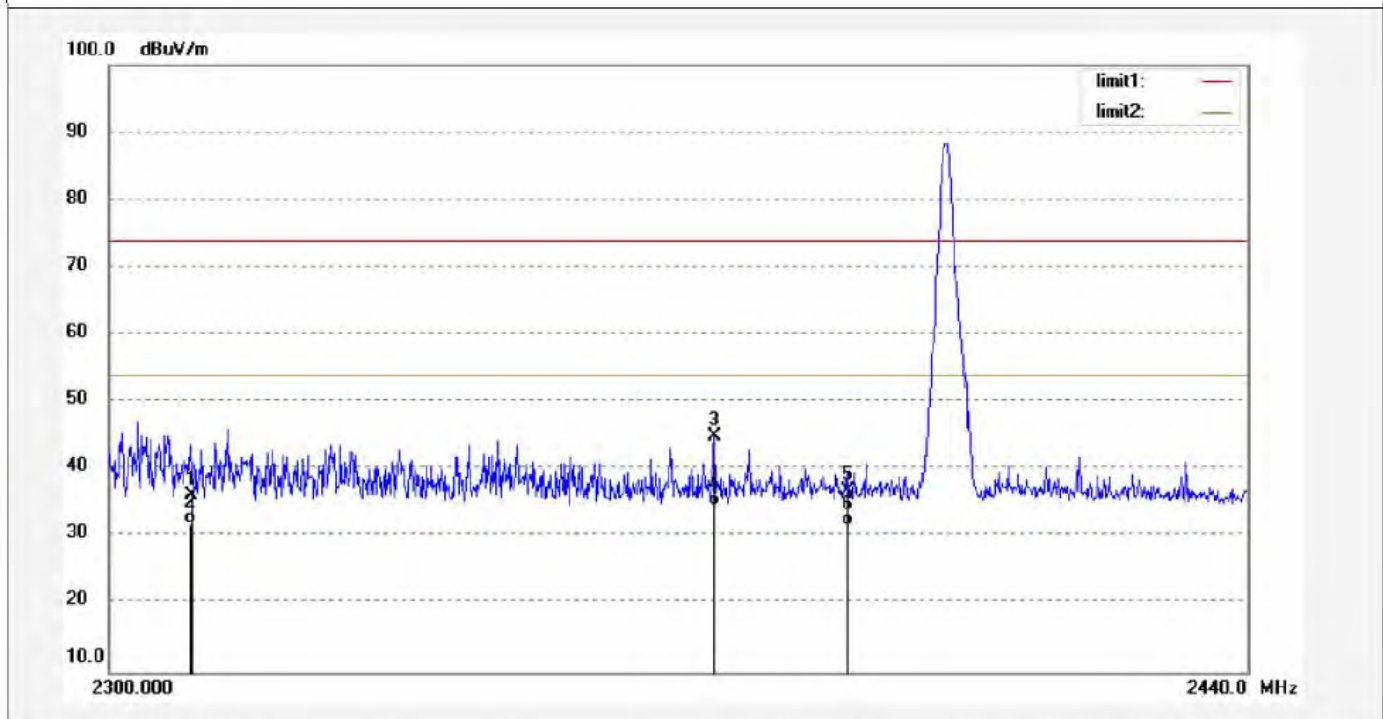
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #612	Polarization: Vertical
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 9/38/37
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz	Distance: 3m
Model: TX24201 (Hopping)	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2310.000	44.00	-7.81	36.19	74.00	-37.81	peak			
2	2310.000	39.68	-7.81	31.87	54.00	-22.13	AVG			
3	2373.318	52.73	-7.64	45.09	74.00	-28.91	peak			
4	2373.318	42.20	-7.64	34.56	54.00	-19.44	AVG			
5	2390.000	44.34	-7.53	36.81	74.00	-37.19	peak			
6	2390.000	39.17	-7.53	31.64	54.00	-22.36	AVG			



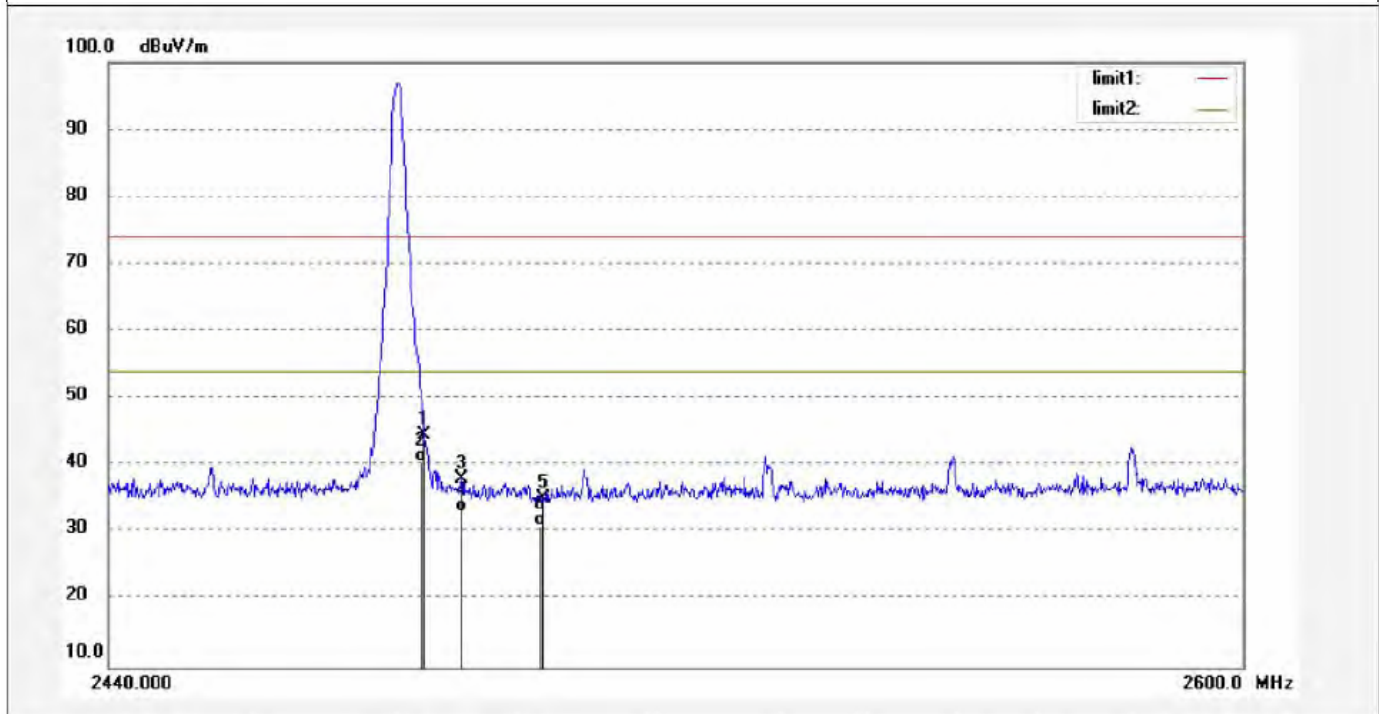
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #622	Polarization: Horizontal
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/06/26
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201(Hopping)	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2483.500	52.00	-7.37	44.63	74.00	-29.37	peak			
2	2483.500	47.85	-7.37	40.48	54.00	-13.52	AVG			
3	2488.774	45.30	-7.39	37.91	74.00	-36.09	peak			
4	2488.774	40.34	-7.39	32.95	54.00	-21.05	AVG			
5	2500.000	42.38	-7.40	34.98	74.00	-39.02	peak			
6	2500.000	38.36	-7.40	30.96	54.00	-23.04	AVG			



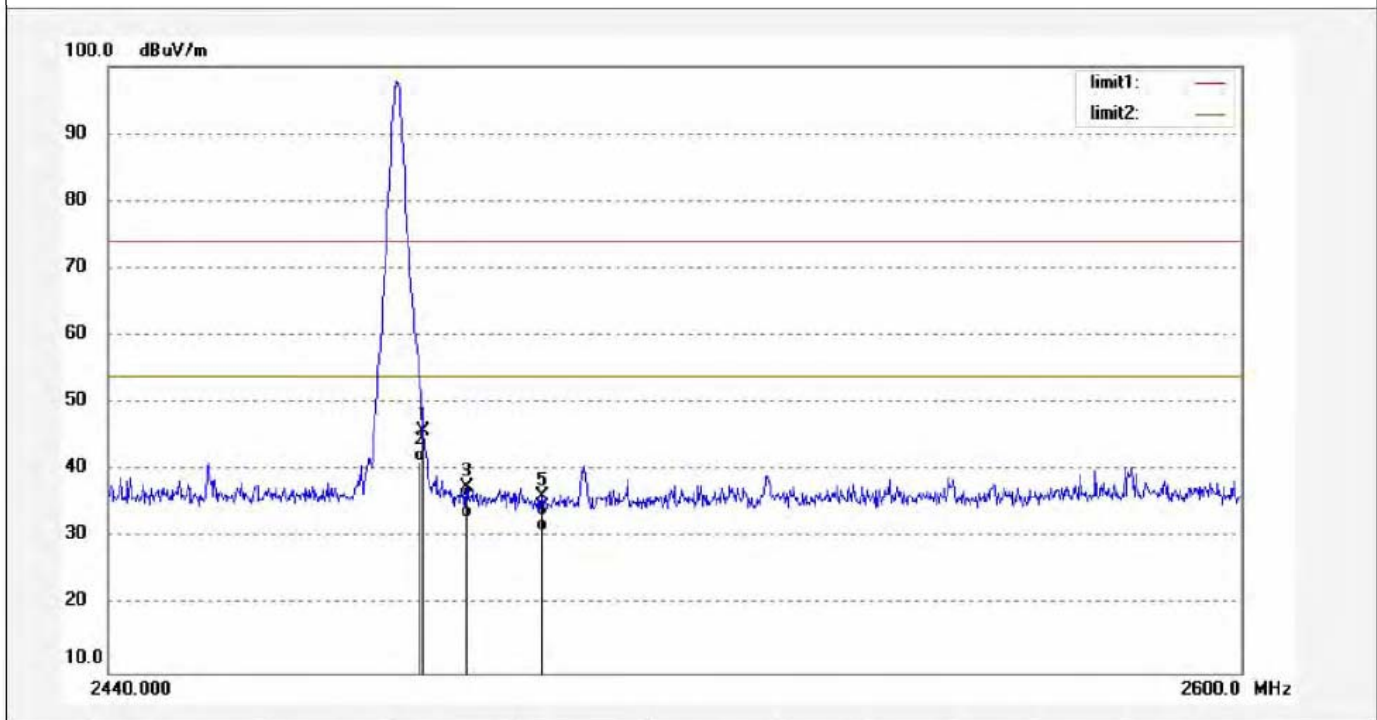
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 1# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #621	Polarization: Vertical
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 13/05/20/
Temp.( C)/Hum.(%) 26 C / 55 %	Time: 10/17/43
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz	Distance: 3m
Model: TX24201(Hopping)	
Manufacturer: C.C.LEE	

Note: Report No:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2483.500	53.31	-7.37	45.94	74.00	-28.06	peak			
2	2483.500	48.69	-7.37	41.32	54.00	-12.68	AVG			
3	2489.566	45.00	-7.39	37.61	74.00	-36.39	peak			
4	2489.566	40.55	-7.39	33.16	54.00	-20.84	AVG			
5	2500.000	43.64	-7.40	36.24	74.00	-37.76	peak			
6	2500.000	38.33	-7.40	30.93	54.00	-23.07	AVG			





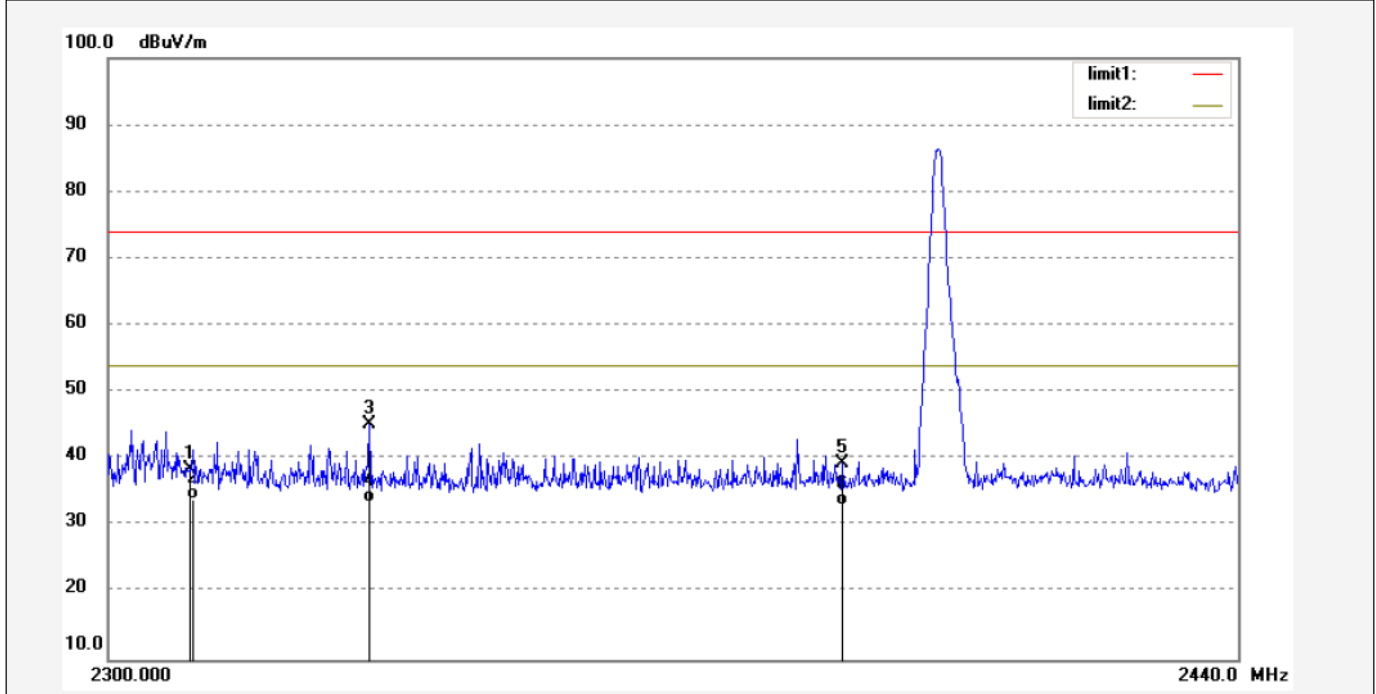
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 2# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #306	Polarization: Horizontal
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 2013-5-20
Temp.( C)/Hum.(%) 25 C / 55 %	Time: 12:51:19
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz(Non-hopping)	Distance: 3m
Model: 24201	
Manufacturer: C.C.LEE	

Note: Report No.:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2310.000	46.33	-7.81	38.52	74.00	-35.48	peak			
2	2310.000	41.72	-7.81	33.91	54.00	-20.09	AVG			
3	2331.673	53.10	-7.81	45.29	74.00	-28.71	peak			
4	2331.673	41.32	-7.81	33.51	54.00	-20.49	AVG			
5	2390.000	46.89	-7.53	39.36	74.00	-34.64	peak			
6	2390.000	40.69	-7.53	33.16	54.00	-20.84	AVG			



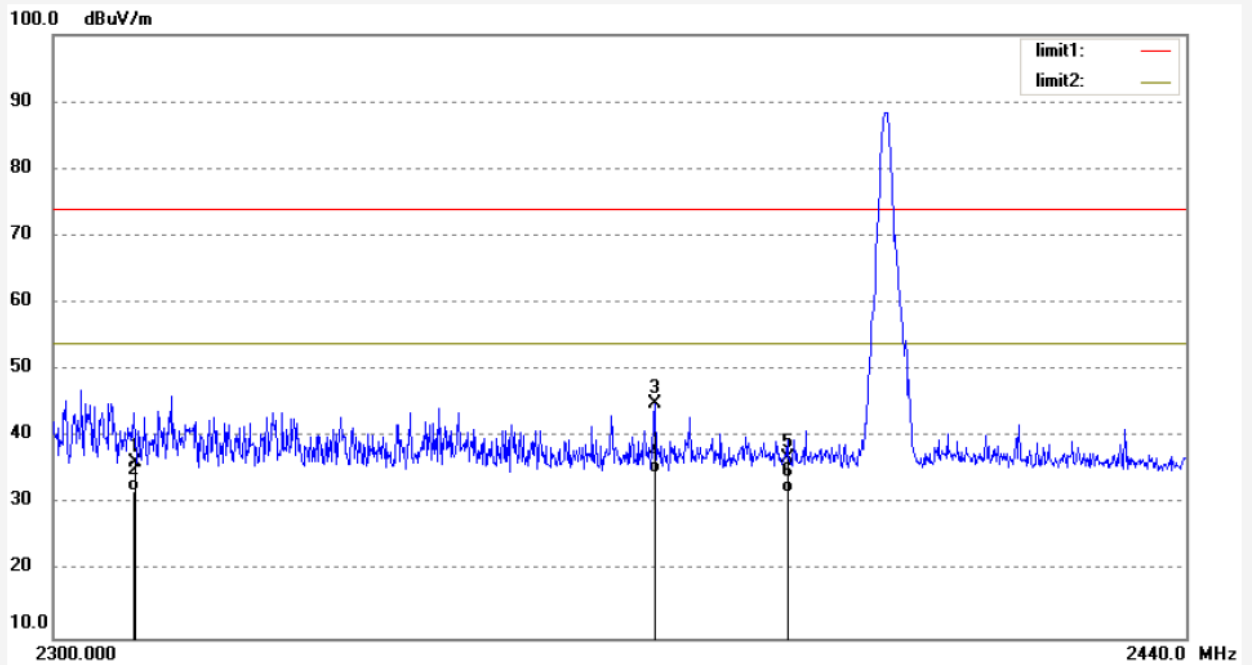
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 2# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #306	Polarization: Vertical
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 2013-5-20
Temp.( C)/Hum.(%) 25 C / 55 %	Time: 12:55:27
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2402MHz(Non-hopping)	Distance: 3m
Model: 24201	
Manufacturer: C.C.LEE	

Note: Report No.:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2310.000	44.00	-7.81	36.19	74.00	-37.81	peak			
2	2310.000	39.68	-7.81	31.87	54.00	-22.13	AVG			
3	2373.318	52.73	-7.64	45.09	74.00	-28.91	peak			
4	2373.318	42.20	-7.64	34.56	54.00	-19.44	AVG			
5	2390.000	44.34	-7.53	36.81	74.00	-37.19	peak			
6	2390.000	39.17	-7.53	31.64	54.00	-22.36	AVG			



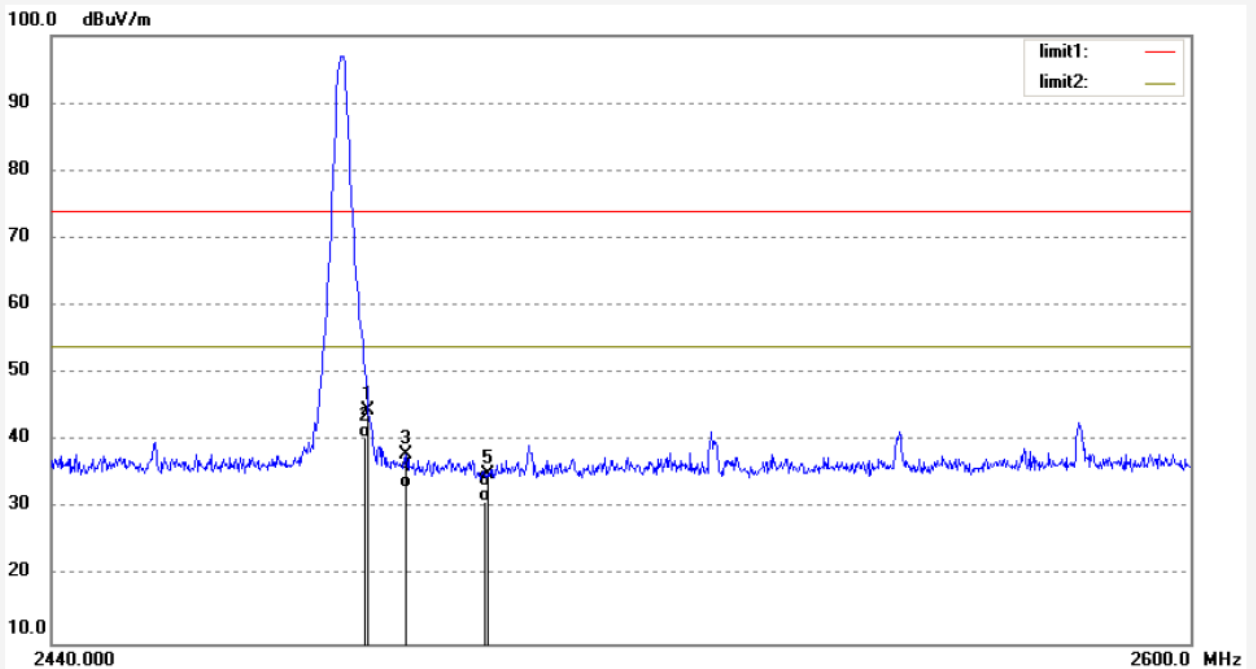
**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 2# Chamber  
Tel:+86-0755-26503290  
Fax:+86-0755-26503396

Job No.: alen #306	Polarization: Horizontal
Standard: FCC PK	Power Source: DC 6V
Test item: Radiation Test	Date: 2013-5-20
Temp.( C)/Hum.(%) 25 C / 55 %	Time: 13:04:09
EUT: Revell 2.4G 2 Channel Radio System	Engineer Signature:
Mode: TX 2480MHz (Non-hopping)	Distance: 3m
Model: 24201	
Manufacturer: C.C.LEE	

Note: Report No.:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2483.500	52.00	-7.37	44.63	74.00	-29.37	peak			
2	2483.500	47.85	-7.37	40.48	54.00	-13.52	AVG			
3	2488.774	45.30	-7.39	37.91	74.00	-36.09	peak			
4	2488.774	40.34	-7.39	32.95	54.00	-21.05	AVG			
5	2500.000	42.38	-7.40	34.98	74.00	-39.02	peak			
6	2500.000	38.36	-7.40	30.96	54.00	-23.04	AVG			



**ACCURATE TECHNOLOGY CO., LTD.**

F1,Bldg,A,Changyuan New Material Port Keyuan Rd,  
Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 2# Chamber

Tel:+86-0755-26503290

Fax:+86-0755-26503396

Job No.: alen#306

Standard: FCC PK

Test item: Radiation Test

Temp.( C)/Hum.(%) 25 C / 55 %

EUT: Revell 2.4G 2 Channel Radio System

Mode: TX 2480MHz(Non-hopping)

Model: 24201

Manufacturer: C.C.LEE

Polarization: Vertical

Power Source: DC 6V

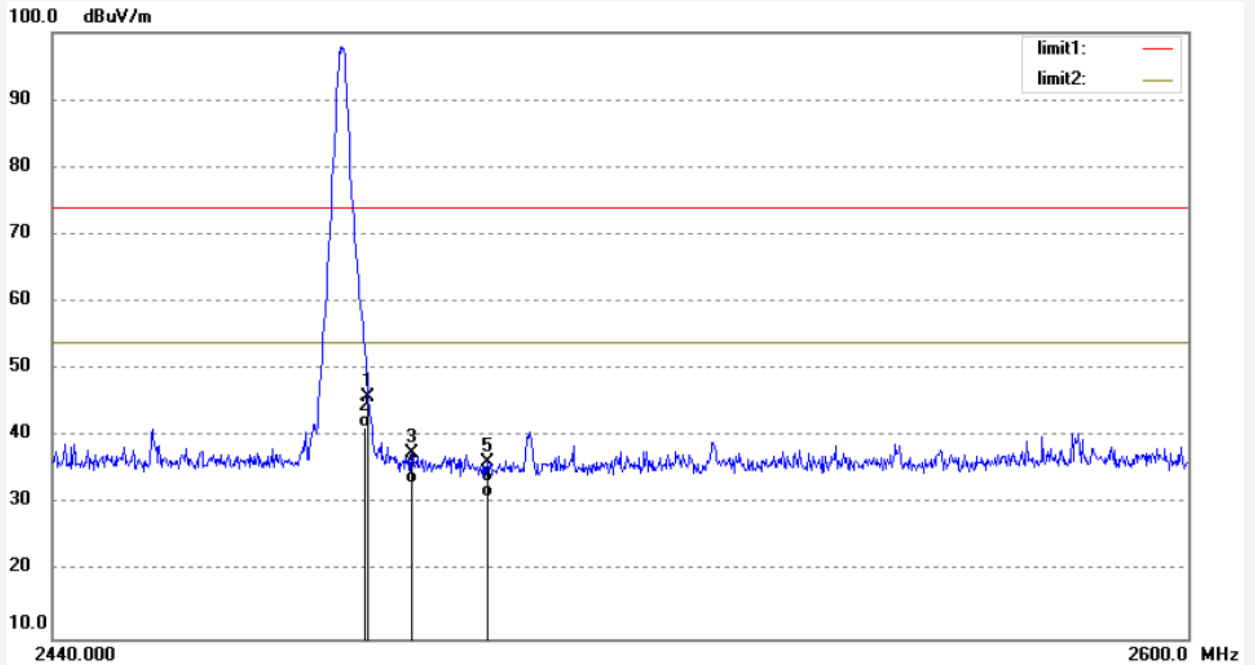
Date: 2013-5-20

Time: 12:59:52

Engineer Signature:

Distance: 3m

Note: Report No.:ATE20130972



No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2483.500	53.31	-7.37	45.94	74.00	-28.06	peak			
2	2483.500	48.69	-7.37	41.32	54.00	-12.68	AVG			
3	2489.566	45.00	-7.39	37.61	74.00	-36.39	peak			
4	2489.566	40.55	-7.39	33.16	54.00	-20.84	AVG			
5	2500.000	43.64	-7.40	36.24	74.00	-37.76	peak			
6	2500.000	38.33	-7.40	30.93	54.00	-23.07	AVG			