FCC Part 15 SUBPART C Test Report

for

RADIO CONTROLLED TOYS

Model No.: 16712

FCC ID: X3J16712

of

Applicant: RADIO FUN INTERNATIONAL INVESTMENT LIMITED Address: FLAT A, 9/F., KUN LOCK BUILDING, 178 NATHAN ROAD, TSIMSHATSUI, KOW LOON, HONG KONG

Tested and Prepared

by

Worldwide Testing Services (Taiwan) Co., Ltd.

FCC Registration No.: 930600

Industry Canada filed test laboratory Reg. No. IC 5679A-1

A2LA Accredited No.: 2732.01





Report No.: W6M21001-10350-C-1

6F, NO. 58, LANE 188, RUEY-KUANG RD., NEIHU TAIPEI 114, TAIWAN, R.O.C. TEL: 886-2-66068877 FAX: 886-2-66068879 E-mail: wts@wts-lab.com

FCC ID: X3J16712

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1 General Information

1.1 Notes

The purpose of conformity testing is to increase the probability of adherence to the essential requirements or conformity specifications, as appropriate.

The complexity of the technical specifications, however, means that full and thorough testing is impractical for both technical and economic reasons.

Furthermore, there is no guarantee that a test sample which has passed all the relevant tests conforms to a specification.

Neither is there any guarantee that such a test sample will interwork with other genuinely open systems.

The existence of the tests nevertheless provides the confidence that the test sample possesses the qualities as maintained and that is performance generally conforms to representative cases of communications equipment.

The test results of this test report relate exclusively to the item tested as specified in 1.5.

The test report may only be reproduced or published in full.

Reproduction or publication of extracts from the report requires the prior written approval of the Worldwide Testing Services(Taiwan) Co., Ltd.

Tester:

January 13, 2010 Kevin Wang Kerbn Wang

Date WTS-Lab. Name Signature

Technical responsibility for area of testing:

January 13, 2010 Chang Tse-Ming

Date WTS Name Signature

FCC ID: X3J16712

1.2 Testing laboratory

1.2.1 Location

OATS

No.5-1, Shuang Sing Village, LiShuei Rd., Wanli Township, Taipei County 207, Taiwan (R.O.C.)

Company

Worldwide Testing Services(Taiwan) Co., Ltd. 6F, NO. 58, LANE 188, RUEY-KUANG RD. NEIHU, TAIPEI 114, TAIWAN R.O.C.

Tel : 886-2-66068877 Fax : 886-2-66068879

1.2.2 Details of accreditation status

Accredited testing laboratory

A2LA accredited number: 2732.01

FCC filed test laboratory Reg. No. 930600

Industry Canada filed test laboratory Reg. No. IC 5679A-1





Test location, where different from Worldwide Testing Services (Taiwan) Co., Ltd.:

| Name: | ./. |
|--------------------|-----|
| Accredited number: | ./. |
| Street: | ./. |
| Town: | ./. |
| Country: | ./. |
| Telephone: | ./. |
| Fax: | ./. |

1.3 Details of approval holder

Name: RADIO FUN INTERNATIONAL INVESTMENT LIMITED Street: FLAT A, 9/F., KUN LOCK BUILDING, 178 NATHAN ROAD,

Town: TSIMSHATSUI, KOW LOON,

Country: HONG KONG.
Telephone: +852-2377-9699
Fax: +852-2762-7822

FCC ID: X3J16712

1.4 Application details

Date of receipt of test item: January 11, 2010

Date of test: from January 11, 2010 to January 12, 2010

| 1 | .5 | General | information | of Test item |
|----|----|---------|-----------------|---------------|
| т. | | General | IIIIOIIIIalioii | OI LEST ITEIL |

| Гуре of test item: | RADIO CONTROLLED TOYS |
|--------------------|-----------------------|
| Model Number: | 16712 |

./.

Brand name: ./.

Multi-listing model number:

Photos: see Annex

Technical data

Transmitting Frequency: 27.145 MHz

Operation modes: simplex

Transmitting mode: A1B

Antenna Type: Integral antenna

Power supply: Battery 9 Vdc

Manufacturer: (if applicable)

Name: RADIO FUN TOYS (SHENZHEN) CO., LTD.

Street: 1/F 1 JINTANG INDUSTRIAL ESTATE, XINER JUSEI

ZHUANG VILLAGE, SHA JING, BAO AN,

City: SHENZHEN CITY,

Country: CHINA

Additional information: ./.

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1.6 Test standards

Technical standard: FCC RULES SUBPART C § 15.203, § 15.209, § 15.227 (2008-10)

2 Technical test

2.1 Summary of test results

| No deviations from the technical specification(s) were ascertained in the course of the tests performed. | × |
|--|---|
| or | |
| The deviations as specified in 3 were ascertained in the course of the tests performed. | |

2.2 Test environment

Temperature: 23 °C

Relative humidity content: 20 ... 75 %

Air pressure: 86 ... 103 kPa

Details of power supply Battery 9 Vdc

Extreme conditions parameters: test voltage : -- extreme

min : -- V max : -- V



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2.3 Test Equipment List

| No. | Test equipment | Туре | Serial No. | Manufacturer | Cal. Date | Next Cal. Date |
|--------------|---|----------------------------|----------------|--------------|---------------|-------------------|
| ETSTW-RE 002 | Function Generator | 33220A | MY43004982 | Agilent | Function | on Test |
| ETSTW-RE 003 | EMI TEST RECEIVER | ESI 26 | 831438/001 | R&S | 2009/10/1 | 2010/9/30 |
| ETSTW-RE 004 | EMI TEST RECEIVER | ESI 40 | 832427/004 | R&S | 2009/9/18 | 2010/9/17 |
| ETSTW-RE 005 | EMI TEST RECEIVER | ESVS10 | 843207/020 | R&S | 2009/9/11 | 2010/9/10 |
| ETSTW-RE 010 | ABSORBING CLAMP | MDS 21 | 3469 | Schwarzbeck | 2009/9/11 | 2010/9/10 |
| ETSTW-RE 011 | PROGRAMMABLE LINEAR POWER SUPPLY | LPS-305 | 30503070165 | МОТЕСН | Function | on Test |
| ETSTW-RE 017 | Log-Periodic Antenna | HL025 | 352886/001 | R&S | 2009/5/4 | 2010/5/3 |
| ETSTW-RE 018 | MICROWAVE HORN ANTENNA | AT4560 | 27212 | AR | 2009/10/1 | 2010/9/30 |
| ETSTW-RE 020 | MICROWAVE HORN ANTENNA | AT4002A | 306915 | AR | Function | on Test |
| ETSTW-RE 021 | SWEEP GENERATOR | SWM05 | 835130/010 | R&S | 2009/8/19 | 2010/8/18 |
| ETSTW-RE 027 | Passive Loop Antenna | 6512 | 00034563 | EMCO | 2009/8/14 | 2011/8/13 |
| ETSTW-RE 028 | Log-Periodic Dipole Array Antenna | 3148 | 34429 | EMCO | 2009/4/15 | 2010/4/14 |
| ETSTW-RE 029 | Biconical Antenna | 3109 | 33524 | EMCO | 2009/4/15 | 2010/4/14 |
| ETSTW-RE 030 | Double-Ridged Guide Horn Antenna | 3117 | 00035224 | EMCO | 2009/3/23 | 2010/3/22 |
| ETSTW-RE 032 | Millivoltmeter | URV 55 | 849086/013 | R&S | 2009/8/23 | 2010/8/22 |
| ETSTW-RE 033 | WaveRunner 6000A Serise Oscilloscope | WAVERUNNER 6100A | LCRY0604P14508 | LeCroy | 2009/6/15 | 2010/6/14 |
| ETSTW-RE 034 | Power Sensor | URV5-Z4 | 839313/006 | R&S | 2009/8/23 | 2010/8/22 |
| ETSTW-RE 042 | Biconical Antenna | HK116 | 100172 | R&S | 2010/1/7 | 2011/1/6 |
| ETSTW-RE 043 | Log-Periodic Dipole Antenna | HL223 | 100166 | R&S | 2009/5/5 | 2010/5/4 |
| ETSTW-RE 044 | Log-Periodic Antenna | HL050 | 100094 | R&S | 2009/5/21 | 2010/5/20 |
| ETSTW-RE 047 | PSA SERIES SPECTRUM ANALYZER | E4445A | MY46181369 | Agilent | 2009/6/15 | 2010/6/14 |
| ETSTW-RE 048 | Triple Loop Antenna | HXYZ 9170 | HXYZ 9170-134 | Schwarzbeck | 2009/8/31 | 2010/8/30 |
| ETSTW-RE 049 | TRILOG Super Broadband test Antenna | VULB 9160 | 9160-3185 | Schwarzbeck | 2009/4/14 | 2010/4/13 |
| ETSTW-RE 055 | SPECTRUM ANALYZER | FSU 26 | 200074 | R&S | 2009/6/10 | 2010/6/09 |
| ETSTW-RE 064 | Bluetooth Test Set | MT8852B-042 | 6K00005709 | Anritsu | Function | on Test |
| ETSTW-RE 065 | Amplifier | AMF-6F- 18002650-25-10P | 941608 | MITEQ | 2009/4/21 | 2010/4/20 |
| ETSTW-RE 072 | CELL SITE TEST SET | 8921A | 3339A00375 | HP | 2009/10/2 | 2010/10/1 |
| ETSTW-RE 073 | Power Meter | N1911A | MY45100769 | Agilent | 2010/1/7 | 2011/1/6 |
| ETSTW-RE 074 | Power Sensor | N1921A | MY45241198 | Agilent | 2010/1/7 | 2011/1/6 |
| ETSTW-RE 091 | Match Pad | MDCS1500 | None | WOKEN | Function Test | |
| ETSTW-RE 092 | Match Pad | MDCS1510 | None | WOKEN | Function | on Test |
| ETSTW-RE 093 | LUMPED ELEMENT POWER DIVIDER | PL2-10 | 146 | MCLI | 2009/3/6 | 2010/3/5 |
| ETSTW-RE 095 | Digital Thermo-Hygro Meter | 0410 | 01 | WISEWIND | 2009/3/24 | 2010/3/23 |
| ETSTW-RE 096 | SIGNAL GENERATOR | SMIQ 03B | 102274 | R&S | 2009/6/5 | 2010/6/4 |

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| ETSTW-RE 097 | GPS SIGNAL GENERATOR | GSG-L1 | 06-0507-0311 | Naviva | Function | on Test |
|-----------------|---|------------------------------|--------------|------------------|-----------|-----------|
| ETSTW-GSM 002 | Universal Radio Communication Tester | CMU 200 | 109439 | 109439 R&S | | 2010/9/21 |
| ETSTW-GSM 023 | Power Divider | 4901.19.A | None | SUHNER | 2009/9/21 | 2010/9/20 |
| ETSTW-Cable 001 | Microwave Cable | SUCOFLEX 104 (S Cable 1) | 238094 | HUBER+SUHNER | 2009/9/16 | 2010/9/15 |
| ETSTW-Cable 002 | Microwave Cable | SUCOFLEX 104 (S_Cable 7) | 238093 | HUBER+SUHNER | 2009/9/16 | 2010/9/15 |
| ETSTW-Cable 003 | Microwave Cable | SUCOFLEX 104 (S_Cable 11) | 209953 | HUBER+SUHNER | 2009/9/16 | 2010/9/15 |
| ETSTW-Cable 006 | Microwave Cable | SUCOFLEX 104 (S_Cable 8) | 238095 | HUBER+SUHNER | 2009/3/6 | 2010/3/5 |
| ETSTW-Cable 010 | BNC Cable | 5 M BNC Cable | None | JYE BAO CO.,LTD. | 2009/3/6 | 2010/3/5 |
| ETSTW-Cable 011 | BNC Cable | BNC Cable 1 | None | JYE BAO CO.,LTD. | 2009/8/20 | 2010/8/19 |
| ETSTW-Cable 012 | BNC Cable | BNC Cable 2 | None | JYE BAO CO.,LTD. | 2009/8/20 | 2010/8/19 |
| ETSTW-Cable 013 | Microwave Cable | SUCOFLEX 104 (S_Cable 5) | 232345 | HUBER+SUHNER | 2009/3/6 | 2010/3/5 |
| ETSTW-Cable 022 | N TYPE Cable | OATS Cable 3 | 0002 | JYE BAO CO.,LTD. | 2009/3/6 | 2010/3/5 |

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2.4 General Test Procedure

POWER LINE CONDUCTED INTERFERENCE: The procedure used was ANSI STANDARD C63.4-2003 using a 50µH LISN (if necessary). Both lines were observed. The bandwidth of the spectrum analyzer was 10 kHz with an appropriate sweep speed.

RADIATION INTERFERENCE: The test procedure used was according to ANSI STANDARD C63.4-2003 employing a spectrum analyzer. For investigated frequency is equal to or below 1GHz, the RBW and VBW of the spectrum analyzer was 100 kHz and 100kHz respectively with an appropriate sweep speed. For investigated frequency is above 1GHz, both of RBW and VBW of the spectrum analyzer were 1 MHz with an appropriate sweep speed. The analyzer was calibrated in dB above a microvolt at the output of the antenna.

FORMULA OF CONVERSION FACTORS: The Field Strength at 3m was established by adding the meter reading of the spectrum analyzer (which is set to read in units of $dB\mu V$) to the antenna correction factor supplied by the antenna manufacturer. The antenna correction factors are stated in terms of dB.

Example:

Freq (MHz) METER READING + ACF + CABLE LOSS (to the receiver) = FS

33 $20 dB\mu V + 10.36 dB + 6 dB = 36.36 dB\mu V/m @3m$

ANSI STANDARD C63.4-2003 10.1.7 MEASUREMENT PROCEDURES: The EUT was placed on a table 80 cm height and with dimensions of 1m by 1.5m (non metallic table). The EUT was placed in the centre of the table. The table used for radiated measurements is capable of continuous rotation. The spectrum was scanned from 30 MHz to 10th harmonic of the fundamental.

Peak readings were taken in three (3) orthogonal planes and the highest readings.

Measurements were made by Worldwide Testing Services(Taiwan) Co., Ltd. at the registered open field test site located at No.5-1, Shuang Sing Village, LiShuei Rd., Wanli Township, Taipei County 207, Taiwan (R.O.C.) The Registration Number: 930600.

When an emission was found, the table was rotated to produce the maximum signal strength. At this point, the antenna was raised and lowered from 1m to 4m. The antenna was placed in both the horizontal and vertical planes.

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3 Test results (enclosure)

| TEST CASE | Para. Number | Required | Test passed | Test failed |
|---|----------------------|----------|----------------|----------------|
| Output Power (Field Strength) | 15.227(a) | × | × | |
| Spurious Emissions radiated – Transmitter operating | 15.227(b), 15.209 | × | × | |
| Band Edge Measurement | 15.227(b) | × | × | |
| Antenna Requirement | 15.203 | × | × | |
| Power Line Conducted Emission | 15.207(a) | | | |

The follows is intended to leave blank.

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3.1 Output Power (Field Strength)

FCC Rules: 15.227 (a)

Model: 16712 Date: 2010/1/11

Mode: Temperature: 24 °C Engineer: Kevin

Polarization: Horizontal Humidity: 60 %

| Ī | Frequency | Reading | | Factor | Resul | t @3m | Limit @3m | | Margin | Table | |
|---|-----------|---------|-------|--------|-------|-------|-----------|-------|--------|--------|-----------|
| | | (dBuV) | | (dB) | (dBu | ıV/m) | (dBuV/m) | | | Degree | Ant. High |
| | (MHz) | Peak | Ave. | Corr. | Peak | Ave. | Peak | Ave. | (dB) | (Deg.) | (cm) |
| Ī | 27.1248 | | 56.78 | 15.35 | | 72.13 | 100.00 | 80.00 | -7.87 | 120 | 150 |

Polarization: Vertical Humidity: 60 %

| Frequency | Reading | | Factor | Result | t @3m | Limit @3m | | Margin | Table | |
|-----------|---------|-------|--------|--------|-------|-----------|-------|--------|--------|-----------|
| | (dBuV) | | (dB) | (dBu | V/m) | (dBuV/m) | | | Degree | Ant. High |
| (MHz) | Peak | Ave. | Corr. | Peak | Ave. | Peak | Ave. | (dB) | (Deg.) | (cm) |
| 27.1232 | | 54.97 | 15.35 | | 70.32 | 100.00 | 80.00 | -9.68 | 170 | 150 |

Measurement uncertainty: 4.94dB

Limit

| Fundamental Frequency | Field strength of fundamental, limit |
|-----------------------|---|
| 26.96 – 27.28 MHz | $80.0 \text{ dB}\mu\text{V/m} = 10,\!000 \mu\text{V/m}$ |

Test equipment used: ETSTW-RE 004, ETSTW-RE 042

Explanation: See attached diagrams in appendix.

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3.2 Spurious emissions (tx)

FCC Rules: 15.227 (b), 15.209

Radiated emission measurements were performed from 30 MHz to 1000 MHz.

For radiated emission tests, the analyzer setting was as followings:

Frequency \leq 1 GHz, RBW:100 kHz, VBW: 100 kHz (Peak measurements) Frequency > 1 GHz, RBW: 1 MHz, VBW: 1 MHz (Peak measurements) Frequency > 1 GHz, RBW:1 MHz, VBW: 10Hz (Average measurements)

The peak and average spurious emission plots was measured with the average limits.

In the Table being listed the critical peak and average value an exhibit the compliance with the above calculated Limits.

Summary table with radiated data of the test plots

| Model: | 16712 | | | | Date | e: | 2010/1/11 | |
|--------------------|-------------------|----------|----------------|--------------------|-------------------|----------------|---------------------------|----------------------|
| Mode: | | | | Temperature: | 24 | °C | Engineer: | Kevin |
| Polarization: | Horizontal | | | Humidity: | 60 | % | | |
| Frequency (MHz) | Reading (dBuV) | Detector | Factor (dB) | Result (dBuV/m) | Limit (dBuV/m) | Margin (dB) | Table Degree (Deg.) | Ant. High (cm) |
| 114.9500 | 6.85 | peak | 13.16 | 20.01 | 43.50 | -23.49 | 140 | 150 |
| 177.7155 | 11.25 | peak | 13.94 | 25.19 | 43.50 | -18.31 | 110 | 150 |
| 270.2405 | 12.04 | peak | 15.23 | 27.27 | 46.00 | -18.73 | 50 | 150 |
| 618.4370 | 6.93 | peak | 23.76 | 30.69 | 46.00 | -15.31 | 220 | 150 |
| 824.6493 | 7.03 | peak | 26.66 | 33.69 | 46.00 | -12.31 | 140 | 150 |
| 869.5391 | 7.57 | peak | 27.15 | 34.72 | 46.00 | -11.28 | 210 | 150 |

Polarization: Vertical

| Frequency (MHz) | Reading (dBuV) | Detector | Factor (dB) | Result (dBuV/m) | Limit (dBuV/m) | Margin (dB) | Table Degree (Deg.) | Ant. High (cm) |
|--------------------|-------------------|----------|----------------|--------------------|-------------------|----------------|---------------------------|----------------------|
| 30.0001 | 22.99 | QP | 13.30 | 36.29 | 40.00 | -3.71 | 120 | 150 |
| 194.4890 | 13.38 | peak | 12.26 | 25.64 | 43.50 | -17.86 | 60 | 150 |
| 278.8977 | 12.63 | peak | 15.67 | 28.30 | 46.00 | -17.70 | 170 | 150 |
| 385.5711 | 12.25 | peak | 18.40 | 30.65 | 46.00 | -15.35 | 170 | 150 |
| 713.8277 | 7.62 | peak | 25.09 | 32.71 | 46.00 | -13.29 | 130 | 150 |
| 797.9960 | 6.72 | peak | 26.46 | 33.18 | 46.00 | -12.82 | 50 | 150 |

Note

- 1. Correction Factor = Antenna factor + Cable loss Preamplifier
- 2. The formula of measured value as: Test Result = Reading + Correction Factor
- 3. Detector function in the form : PK = Peak, QP = Quasi Peak, AV = Average
- 4. All not in the table noted test results are more than 20 dB below the relevant limits.
- 5. See the attached diagram as appendix.

All other not noted test plots do not contain significant test results in relation to the limits.

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TEST RESULT (**Transmitter**): The unit DOES meet the FCC requirements.

Limits: 15.209

| Frequency of Emission (MHz) | Field strength (microvolts/meter) | Field Strength (dB microvolts/meter) | |
|-----------------------------|-----------------------------------|--------------------------------------|--|
| 30 – 88 | 100 | 40.0 | |
| 88 – 216 | 150 | 43.5 | |
| 216 – 960 | 200 | 46.0 | |
| Above 960 | 500 | 54.0 | |

Test equipment used: ETSTW-RE 003, ETSTW-RE 004, ETSTW-RE 028, ETSTW-RE 029, ETSTW-RE 042, ETSTW-RE 043

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3.3 Band Edge Measurement

FCC Rule: 15.227(b)

| Channel | Frequency MHz | Detector | Test Results (dBµV/m) | Limit (dBµV/m) | |
|-----------------|------------------|----------|-----------------------|-------------------|--|
| Lower Band-edge | 26.96 | Peak | 37.49 | 49.54 | |
| Upper Band-edge | 27.28 | Peak | 38.34 | 49.54 | |

Limit:

The field strength of any emissions appearing outside of the 26.96-27.28 MHz band shall not exceed the general radiated emission limits in § 15.209.

| Frequency of Emission (MHz) | Limit | Measurement distance | |
|-----------------------------|-----------------|----------------------|--|
| 0.009 - 0.490 | 2400 / f (KHz) | 300 | |
| 0.49 - 1.705 | 24000 / f (KHz) | 30 | |
| 1.705 - 30 | 30 | 30 | |
| 30 – 88 | 100 | 3 | |
| 88 – 216 | 150 | 3 | |
| 216 – 960 | 200 | 3 | |
| Above 960 | 500 | 3 | |

Test equipment used: ETSTW-RE 003, ETSTW-RE 004, ETSTW-RE 029, ETSTW-RE 042, ETSTW-RE 043

Explanation: See attached diagrams in appendix.

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3.4 Antenna requirement

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. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this Section. The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited. This requirement does not apply to carrier current devices or to devices operated under the provisions of Sections 15.211, 15.213, 15.217, 15.219, or 15.221. Further, this requirement does not apply to intentional radiators that must be professionally installed, such as perimeter protection systems and some field disturbance sensors, or to other intentional radiators which, in accordance with Section 15.31(d), must be measured at the installation site. However, the installer shall be responsible for ensuring that the proper antenna is employed so that the limits in this Part are not exceeded.

Explanation: This antenna is integral antenna which passes antenna requirement.

| The equipment meets the | yes | no |
|-------------------------|-----|----|
| requirements | × | |

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3.5 Power Line Conducted Emission

For an intentional radiator which is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC line on any frequency or frequencies within the band 150 kHz to 30 MHz shall not exceed the limits in the table bellows with this provision shall be based on the measurement of the radio frequency voltage between each power line and ground at the power terminals.

This measurement was transact first with instrumentation using an average and peak detector and a 10 kHz bandwidth. If the peak detector achieves a calculated level, the measurement is repeated by an instrumentation using a quasi-peak detector.

| Frequency | Level (dBµV) | | | |
|-----------|------------------|------------------|--|--|
| requency | quasi-peak | average | | |
| 150 kHz | lower limit line | Lower limit line | | |

Model: 16712 Date: ---

Mode: Temperature: -- °C Engineer: --- Polarization: N Humidity: -- %

Frequency Reading Factor Result Limit Margin (dBuV) (dB) (dBuV) (dBuV) (MHz) OP Ave. Corr. OP OP Ave. (dB) Ave. ------------------

Polarization: L1

| Frequency | | ding aV) | Factor (dB) | | sult BuV) | | mit uV) | Margin |
|-----------|----|-------------|-------------|----|--------------|----|------------|--------|
| (MHz) | QP | Äve. | Corr. | QP | Äve. | QΡ | Áve. | (dB) |
| | | | | | | | | |
| | | | | | | | | |
| | | | | 1 | | - | | - |
| | | | | 1 | 1 | 1 | | 1 |
| | | | | 1 | - | 1 | | 1 |
| | | | | - | | | | |



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Limits:

| Frequency of Emission (MHz) | Conducted Limit (dBuV) | | |
|-----------------------------|------------------------|----------|--|
| | 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 formula of measured value as: Test Result = Reading + Correction Factor

2.The Correction Factor = Cable Loss + LISN Insertion Loss + Pulse Limit Loss

3.Detector function in the form: PK = Peak, QP = Quasi Peak, AV = Average

4.All not in the table noted test results are more than 20 dB below the relevant limits.

5. The EUT is battery used, so this test is not required.

Test equipment used: ETSTW-CE 001, ETSTW-CE 003, ETSTW-CE 004, ETSTW-CE 006, ETSTW-RE 064

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Appendix

A Measurement diagrams

- 1. Output Power
- 2. Spurious Emissions radiated- transmitter
- 3. Band Edge measurement

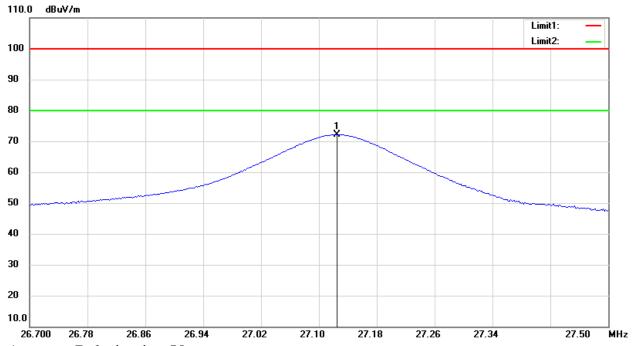
B Photos

- 1. External Photos
- 2. Internal Photos
- 3. Set Up Photo of Radiated Emission

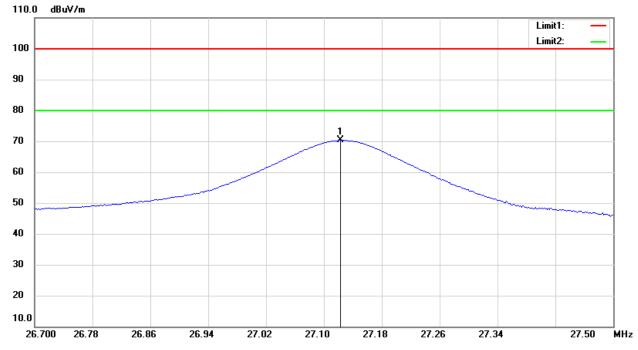


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Antenna Polarization V



Up Line: Peak Limit Line Down Line: Ave Limit Line

- 1. The attached measurement plots are preliminarily pre-scanned with peak detector for determining the final checking frequencies and are for reference only.
- 2. The some frequencies may exceed the limit line without the specified detectors, but that cannot present the results are failed to the specification of test standard.
- 3. For corrected test results are listed in the relevant table of output power test data of this test report.

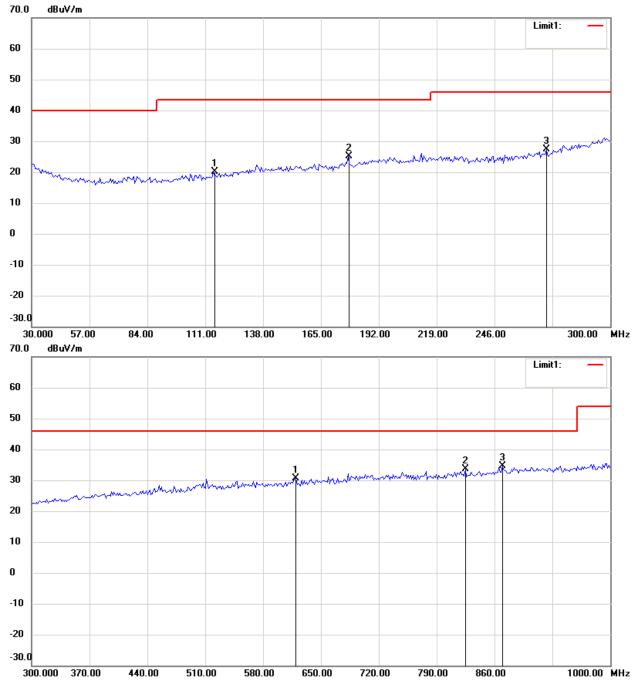


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FCC ID: X3J16712

Spurious Emissions radiated

Antenna Polarization H



Note:

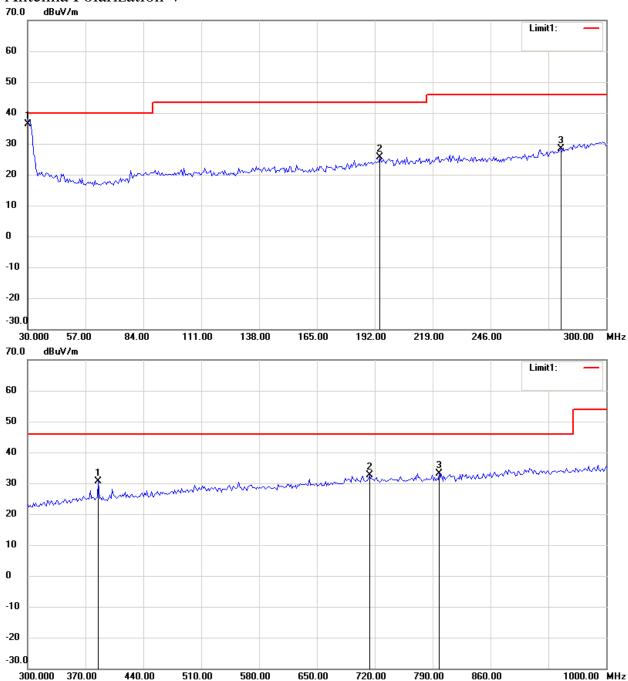
- The attached measurement plots are preliminarily pre-scanned with peak detector for determining the final checking frequencies and are for reference only.
- 2. The some frequencies may exceed the limit line without the specified detectors, but that cannot present the results are failed to the specification of test standard.
- 3. For corrected test results are listed in the relevant table of radiated test data of this test report.



Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

Antenna Polarization V

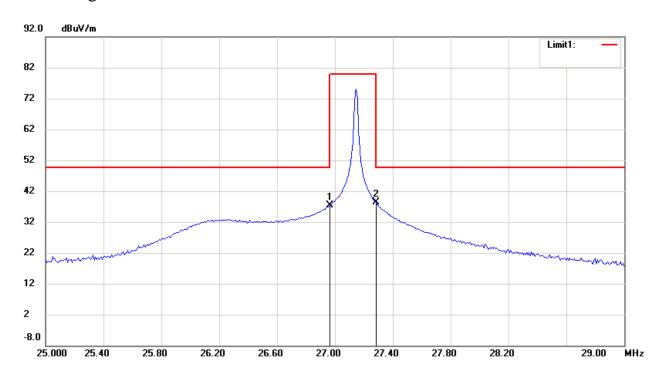


Note:

- The attached measurement plots are preliminarily pre-scanned with peak detector for determining the final checking frequencies and are for reference only.
- 2. The some frequencies may exceed the limit line without the specified detectors, but that cannot present the results are failed to the specification of test standard.
- 3. For corrected test results are listed in the relevant table of radiated test data of this test report.

FCC ID: X3J16712

Band Edge Measurement



FCC ID: X3J16712 **External Photos**

WITH DOOR SWITCH AND WITH ON/OFF SWITCH (10731, 10732)





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

WITH TURBO SWITCH AND WITH ON/OFF SWITCH





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

WITH TURBO SWITCH AND WITHOUT ON/OFF SWITCH





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

WITHOUT TURBO SWITCH AND WITH ON/OFF SWITCH





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

WITHOUT TURBO SWITCH AND WITHOUT ON/OFF SWITCH





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





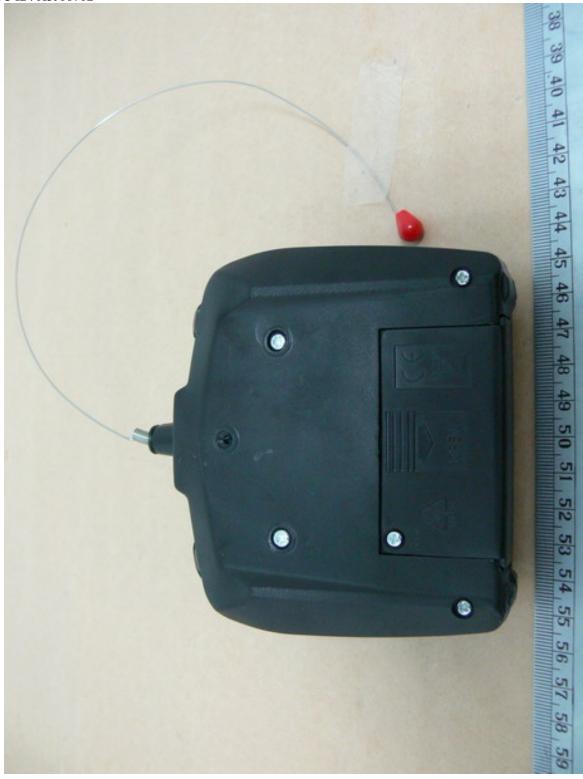
FCC ID: X3J16712

WITH DOOR SWITCH AND WITHOUT ON/OFF SWITCH (10731, 10732)





Registration number: W6M21001-10350-C-1





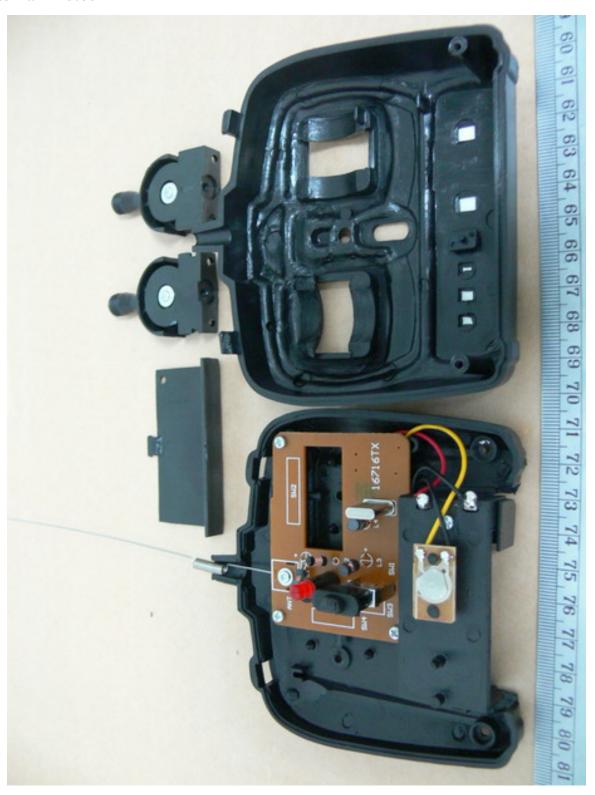
Registration number: W6M21001-10350-C-1





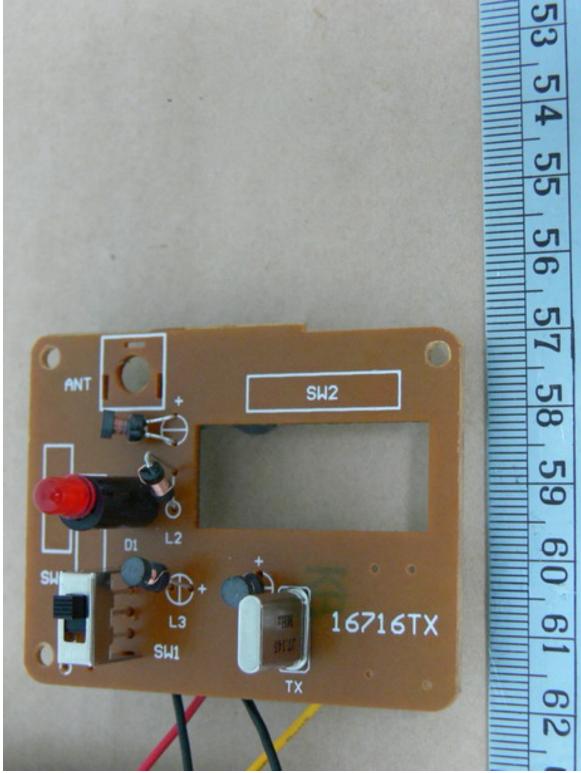
Registration number: W6M21001-10350-C-1

FCC ID: X3J16712 Internal Photos



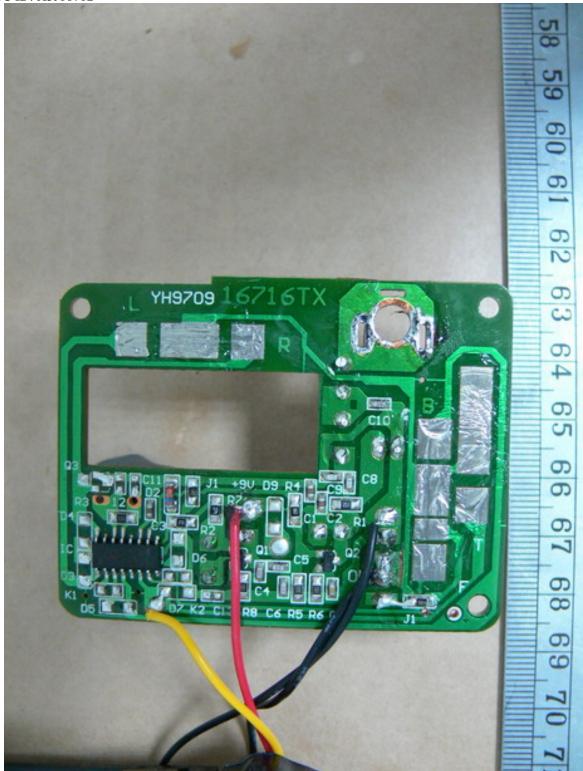


Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1





Registration number: W6M21001-10350-C-1

FCC ID: X3J16712

Set Up Photo of Radiated Emission



