

# FCC Test Report

Product Name : Tire Pressure Monitoring System-A Series  
Trade Name : Picolink  
Model No. : A1, A2  
FCC ID. : 2AEJRPA12X

Applicant : Picolink Technology Co., Ltd  
Address : 5F.-7, No.18, Taiyuan St.Zhubei 302 Taiwan

Date of Receipt : Jun. 03, 2016  
Issued Date : Mar. 16, 2017  
Report No. : 1660176R-RFUSP14V00  
Report Version : V1.0



The test results relate only to the samples tested.

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# Test Report Certification

Issued Date : Mar. 16, 2017

Report No. : 1660176R-RFUSP14V00



Product Name : Tire Pressure Monitoring System-A Series  
 Applicant : Picolink Technology Co., Ltd  
 Address : 5F.-7, No.18, Taiyuan St.Zhubei 302 Taiwan  
 Manufacturer : Picolink Technology Co., Ltd  
 Model No. : A1, A2  
 FCC ID. : 2AEJRPA12X  
 EUT Voltage : DC 3V (Power by Battery)  
 Testing Voltage : DC 3V (Power by Battery)  
 Trade Name : Picolink  
 Applicable Standard : FCC 15 Subpart C Section 15.231(b): 2015  
 Test Lab : Hsin Chu Laboratory  
 Test Result : Complied

The test results relate only to the samples tested.

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Approved By : Roy Wang  
 ( Roy Wang / Director )

**Revision History**

| Report No.          | Version | Description              | Issued Date   |
|---------------------|---------|--------------------------|---------------|
| 1660176R-RFUSP14V00 | V1.0    | Initial issue of report. | Mar. 16, 2017 |
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|                     |         |                          |               |

## Laboratory Information

We, **DEKRA Testing and Certification Co., Ltd.**, are an independent RF consultancy that was established the whole facility in our laboratories. The test facility has been accredited/accepted (audited or listed) by the following related bodies in compliance with ISO 17025 specified testing scopes:

**Taiwan R.O.C.** : TAF, Accreditation Number: 3024  
**USA** : FCC, Registration Number: 834100  
**Canada** : IC, Submission No: 181665  
IC Registration Number: 22397-1 / 22397-2 / 22397-3

The related certificate for our laboratories about the test site and management system can be downloaded from DEKRA Testing and Certification Co., Ltd. Web Site:

<http://www.dekra.com.tw/english/about/certificates.aspx?bval=5>

The address and introduction of DEKRA Testing and Certification Co., Ltd. laboratories can be founded in our Web site : [http://www.dekra.com.tw/index\\_en.aspx](http://www.dekra.com.tw/index_en.aspx)

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## 1. General Information

### 1.1. EUT Description

|                    |  |
|--------------------|--|
| Product Name       | Tire Pressure Monitoring System-A Series |
| Trade Name         | Picolink                                 |
| Model No.          | A1, A2                                   |
| Frequency Range    | 433.92 MHz                               |
| Channel Number     | 1  |
| Type of Modulation | FSK                                      |

| Antenna Information |                         |
|---------------------|-------------------------|
| Antenna Type        | Soldered on PCB Antenna |
| Antenna Gain        | 0 dBi                   |

| Working Frequency of Each Channel |            |
|-----------------------------------|------------|
| Channel                           | Frequency  |
| 001                               | 433.92 MHz |

Note:

1. This device is Tire Pressure Monitoring System-A Series included BT4.0 / 433.92MHz transceiver and receiving functions.
2. The different of the each model is shown as below:

| Model Number | Description  |
|--------------|--------------|
| A1           | Tire inside  |
| A2           | Tire outside |

3. These tests are conducted on a sample for the purpose of demonstrating compliance with Part 15 Subpart C Paragraph 15.231.
4. The radiation measurements are performed in X, Y, Z axis positioning. Only the worst case is shown in the report.
5. This device is a composite device in accordance with Part 15 regulations. The function of the BT4.0 transmitting was tested and its test report number is 1660176R-RFUSP01V00. The function receiving was tested and its test report number is 1660176R-RFUSP01V00-B under Declaration of Conformity.

## 1.2. Test Mode

DEKRA verified the construction and function in typical operation. All the test modes are performed in normal operation and are defined as:

|    |  |
|----|--|
| TX | Mode 1: Transmit Mode_A1<br>Mode 2: Transmit Mode_A2 |
|----|--|

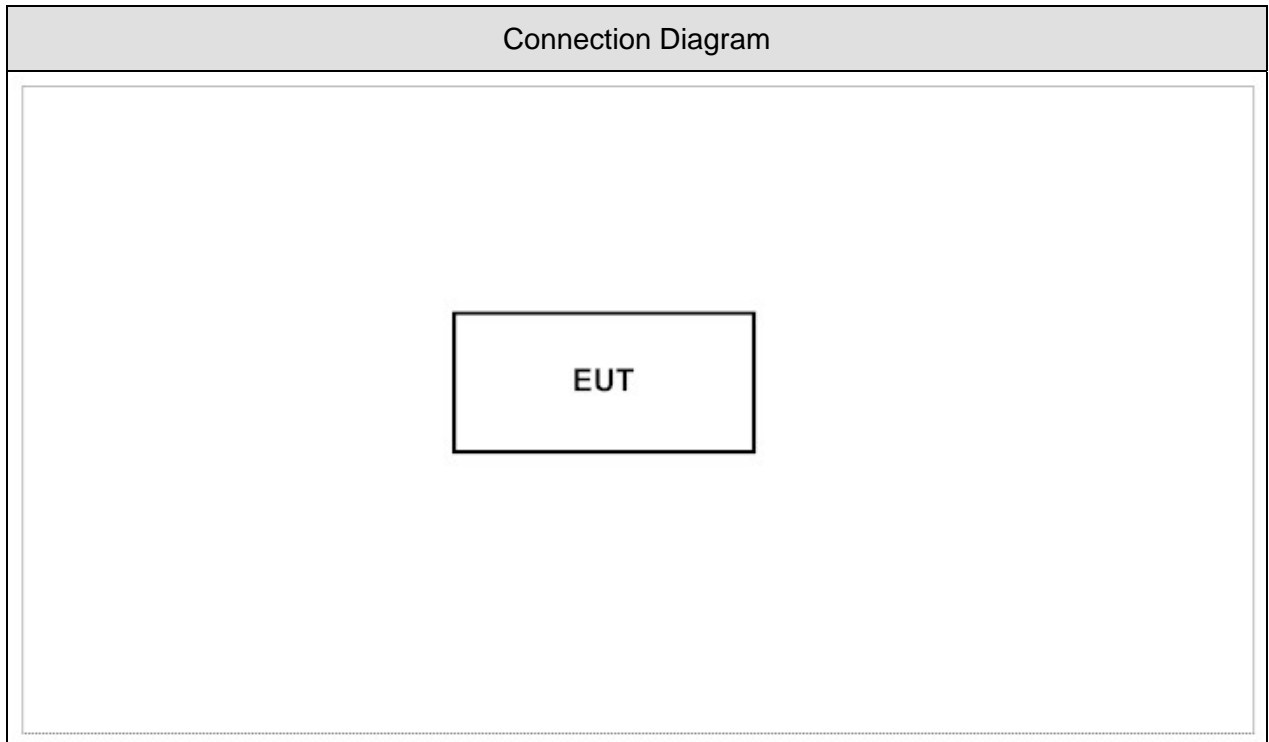
| Emission           |        |        |
|--------------------|--------|--------|
| Performed Item     | Mode 1 | Mode 2 |
| Conducted Emission | No     | No     |
| Radiated Emission  | Yes    | Yes    |
| Occupied Bandwidth | Yes    | Yes    |
| Duty cycle         | No     | No     |
| Transmitter time   | Yes    | Yes    |

**1.3. Tested System Details**

The types for all equipments, plus descriptions of all cables used in the tested system (including inserted cards) are:

| Product | Manufacturer | Model No. | Serial No. | FCC ID | Power Cord |
|---------|--------------|-----------|------------|--------|------------|
| N/A     |              |           |            |        |            |

**1.4. Configuration of tested System**



**1.5. EUT Exercise Software**

|   |  |
|---|--|
| 1 | Setup the EUT as shown in section 1.4. |
| 2 | The EUT will transmit automatically.   |
| 3 | Verify that the EUT works properly.    |



## 2. Radiated Emission

### 2.1. Test Equipment

The following test equipments are used during the test:

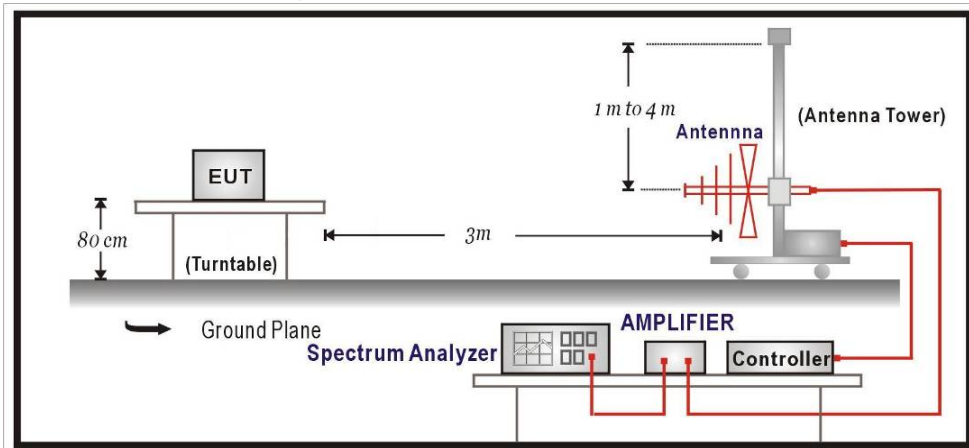
#### Radiated Emission / CB4-H

| Instrument                 | Manufacturer | Model No.            | Serial No | Next Cal. Date |
|----------------------------|--------------|----------------------|-----------|----------------|
| Bilog Antenna              | Schaffner    | CBL6112B             | 2891      | 2017/08/14     |
| Horn Antenna               | Schwarzbeck  | BBHA 9120            | D312      | 2017/10/25     |
| Pre-Amplifier              | EMCI         | EMC0031835           | 980233    | 2018/02/02     |
| Pre-Amplifier              | Schwarzbeck  | DBL-1840N506         | 013       | 2017/09/29     |
| Pre-Amplifier              | Miteq        | JS41-001040000-58-5P | 1573954   | 2017/10/04     |
| Horn Antenna               | Schwarzbeck  | BBHA 9170            | 203       | 2017/08/28     |
| Signal & Spectrum Analyzer | R&S          | FSV40                | 101049    | 2018/01/22     |

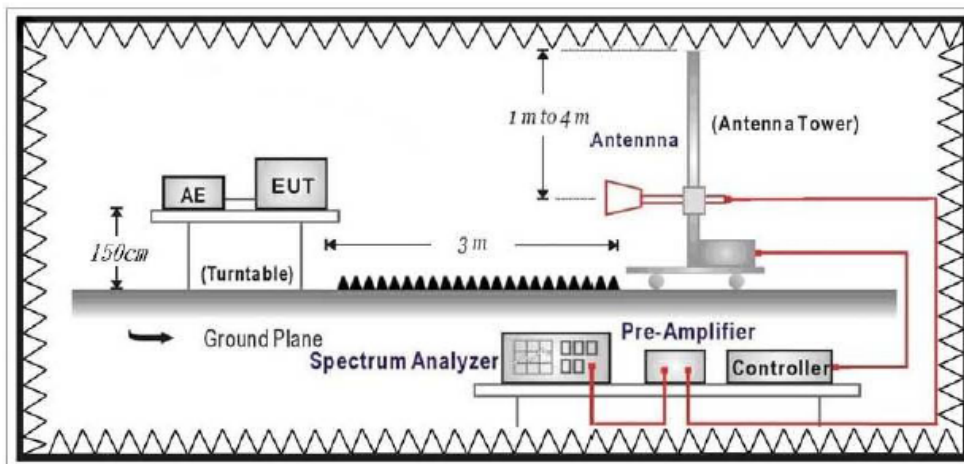
Note: All equipments that need to calibrate are with calibration period of 1 year.

### 2.2. Test Setup

Under 1GHz Test Setup:



Above 1GHz Test Setup:



## 2.3. Limits

### ➤ Fundamental and Harmonics Emission Limits

| <b>FCC Part 15 Subpart C Paragraph 15.231(b) Limits</b> |                                  |               |                                |               |
|---|----------------------------------|---------------|--------------------------------|---------------|
| Fundamental Frequency<br>MHz                            | Field Strength of<br>Fundamental |               | Field Strength of<br>Harmonics |               |
|   | uV/m                             | dBuV/m        | uV/m                           | dBuV/m        |
| 40.66 - 40.70   | 2250                             | 67.04         | 225                            | 47.04         |
| 70 - 130  | 1250                             | 61.94         | 125                            | 41.94         |
| 130 - 174   | 1250 - 3750                      | 61.94 - 71.48 | 125 - 375                      | 41.94 - 51.48 |
| 174 - 260   | 3750                             | 71.48         | 375                            | 51.48         |
| 260 - 470   | 3750 - 12500                     | 71.48 - 81.94 | 375 - 1250                     | 51.48 - 61.94 |
| above 470   | 12500                            | 81.94         | 1250                           | 61.94         |

Remarks: 1. RF Voltage (dBuV) = 20 log RF Voltage (uV)

2. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.

3. The emission limit in this paragraph is based on measurement instrumentation employing an average detector.

### ➤ Spurious electric field strength limits

| <b>FCC Part 15 Subpart C Paragraph 15.209 Limits</b> |              |                         |                                 |
|--|--------------|-------------------------|---------------------------------|
| Frequency<br>MHz                                     | uV/m         | dBuV/m                  | Measurement<br>distance (meter) |
| 0.009 - 0.490  | 2400/F(kHz)  | See Remark <sup>1</sup> | 300                             |
| 0.490 - 1.705  | 24000/F(kHz) | See Remark <sup>1</sup> | 30                              |
| 1.705 - 30   | 30           | 29.5                    | 30                              |
| 30 - 88  | 100          | 40                      | 3                               |
| 88 - 216   | 150          | 43.5                    | 3                               |
| 216 - 960  | 200          | 46                      | 3                               |
| Above 960  | 500          | 54                      | 3                               |

Remarks : 1. RF Voltage (dBuV) = 20 log RF Voltage (uV)

2. In the Above Table, the tighter limit applies at the band edges.

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.

## 2.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 and 1.5 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The EUT was positioned such that the distance from antenna to the EUT was 3 meters.

The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.

Both horizontal and vertical polarizations of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.10: 2013 on radiated measurement.

The resolution bandwidth below 1GHz setting on the field strength meter is 120 kHz and above 1GHz is 1MHz.

Radiated emission measurements below 1GHz are made using broadband Bilog antenna and above 1GHz are made using Horn Antennas.

The measurement is divided into the Preliminary Measurement and the Final Measurement.

The suspected frequencies are searched for in Preliminary Measurement with the measurement antenna kept pointed at the source of the emission both in azimuth and elevation, with the polarization of the antenna oriented for maximum response. The antenna is pointed at an angle towards the source of the emission, and the EUT is rotated in both height and polarization to maximize the measured emission. The emission is kept within the illumination area of the 3 dB beamwidth of the antenna.

The worst radiated emission is measured on the Final Measurement.

The frequency range from 30MHz to 10th harmonics is checked.

## 2.5. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.231(b): 2015

## 2.6. Uncertainty

± 3.8 dB below 1GHz

± 3.9 dB above 1GHz

## 2.7. Test Result

|              |  |           |       |
|--------------|--|-----------|-------|
| Product      | Tire Pressure Monitoring System-A Series |           |       |
| Test Item    | Fundamental Radiated Emission            |           |       |
| Test Mode    | Mode 1: Transmit Mode_A1                 |           |       |
| Date of Test | 2017/02/08                               | Test Site | CB4-H |

| Frequency (MHz)   | Correct Factor (dB) | Reading Level (dBuV) | Peak Measurement Level (dBuV/m) | Average Measurement Level (dBuV/m) | Average Limit (dBuV/m) |
|-------------------|---------------------|----------------------|---------------------------------|------------------------------------|------------------------|
| <b>Horizontal</b> |                     |                      |                                 |                                    |                        |
| 433.920(X-axis)   | 25.917              | 58.666               | 84.582                          | 75.759                             | 80.830                 |
| 433.920(Y-axis)   | 25.917              | 53.792               | 79.708                          | 70.885                             | 80.830                 |
| 433.920(Z-axis)   | 25.917              | 53.703               | 79.619                          | 70.796                             | 80.830                 |
| <b>Vertical</b>   |                     |                      |                                 |                                    |                        |
| 433.920(X-axis)   | 25.917              | 52.589               | 78.505                          | 69.682                             | 80.830                 |
| 433.920(Y-axis)   | 25.917              | 56.968               | 82.884                          | 74.061                             | 80.830                 |
| 433.920(Z-axis)   | 25.917              | 56.986               | 82.902                          | 74.079                             | 80.830                 |

Note:

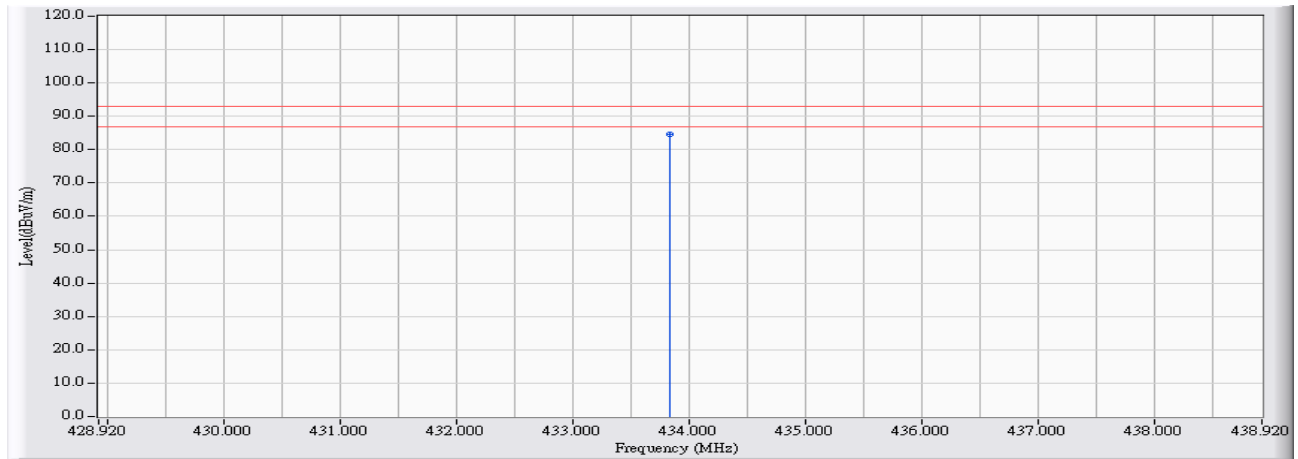
Peak Measurement Level = Reading Level +Correct factor

Average Measurement Level = Peak Measurement Level +20Log(Duty Cycle)

(Duty Cycle)=(Ton/(Ton+Toff)=36.21/100=0.362

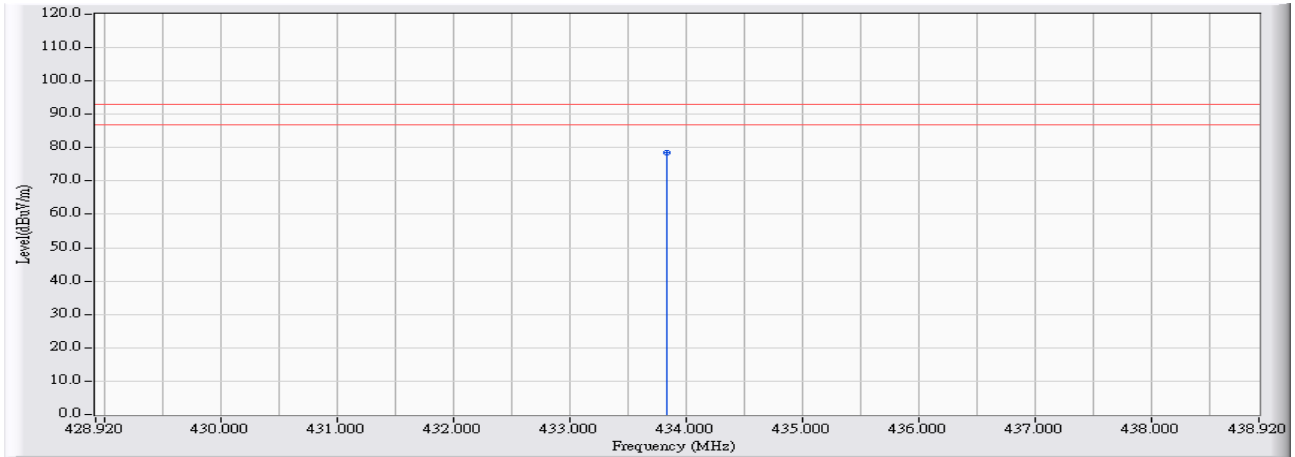
20Log(Duty Cycle)= -8.823

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK        | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 1: Transmit Mode_A1_433.92MHz_X-axis |



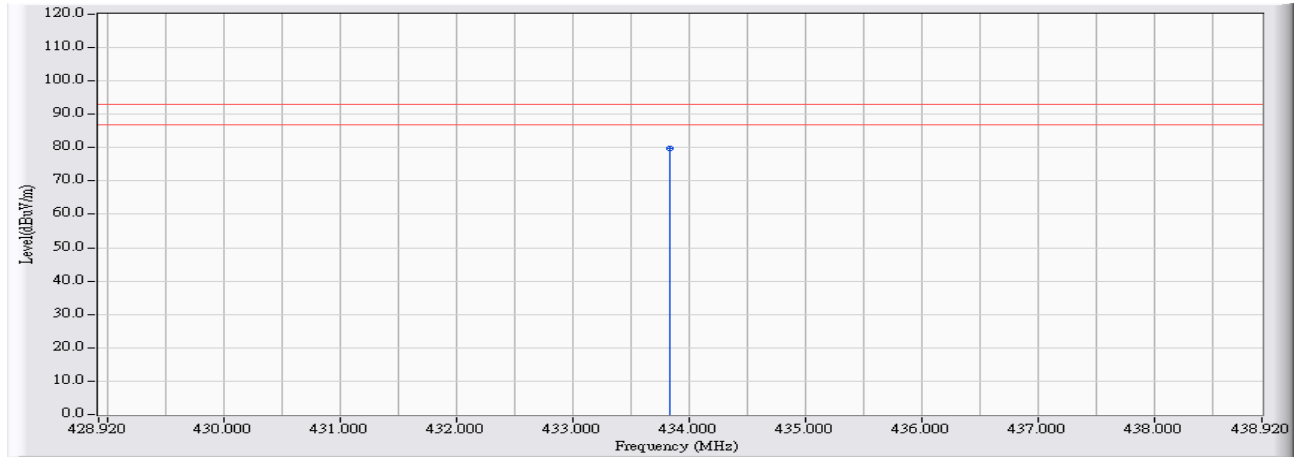
|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.834            | 25.917                 | 58.666                  | 84.582                    | -8.288         | 92.870            | PEAK          |

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK      | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 1: Transmit Mode_A1_433.92MHz_X-axis |



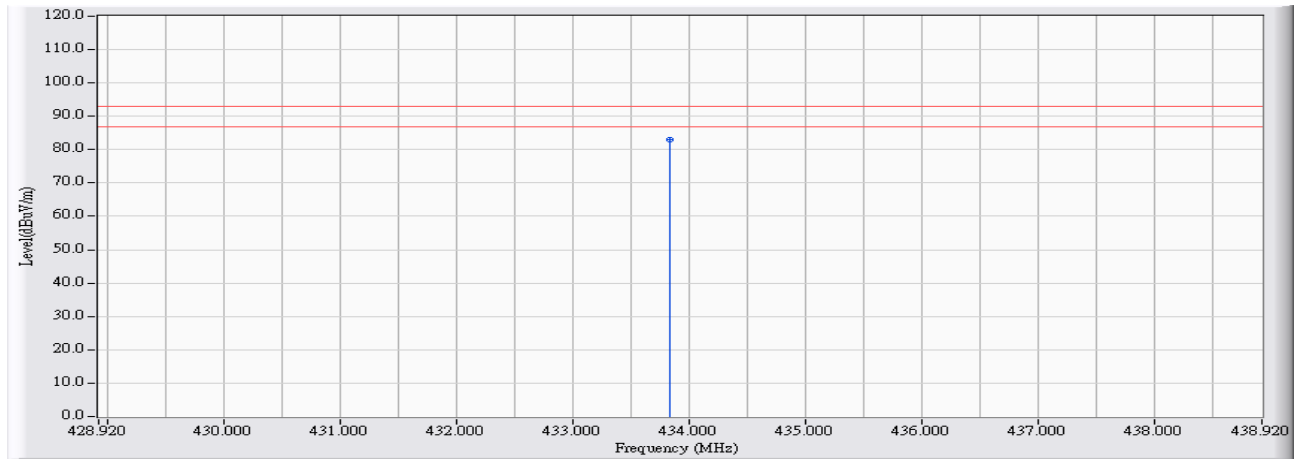
|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.835            | 25.917                 | 52.589                  | 78.505                    | -14.365        | 92.870            | PEAK          |

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK        | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 1: Transmit Mode_A1_433.92MHz_Y-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.834            | 25.917                 | 53.792                  | 79.708                    | -13.162        | 92.870            | PEAK          |

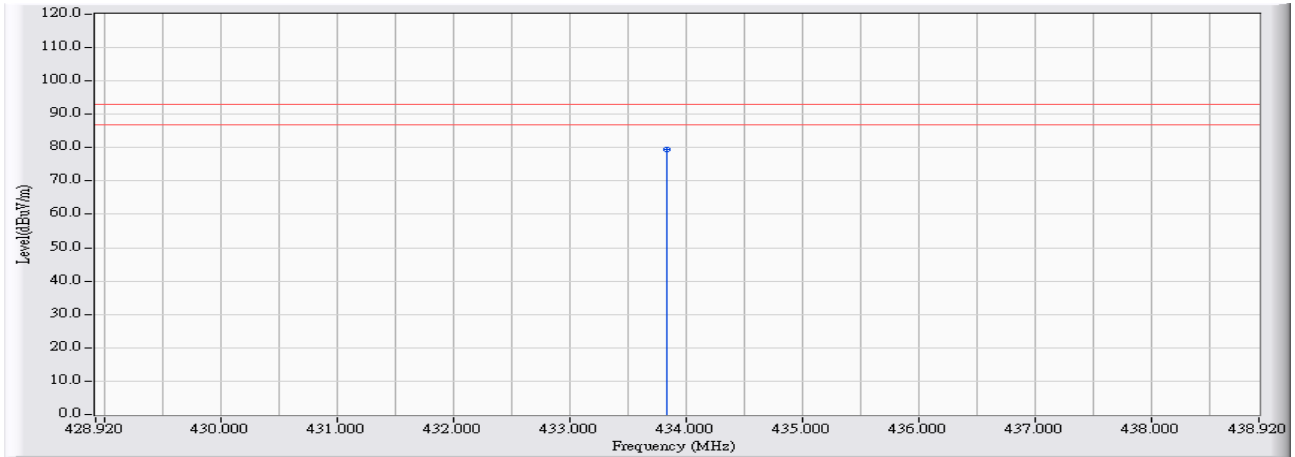
|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK      | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 1: Transmit Mode_A1_433.92MHz_Y-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.835            | 25.917                 | 56.968                  | 82.884                    | -9.986         | 92.870            | PEAK          |

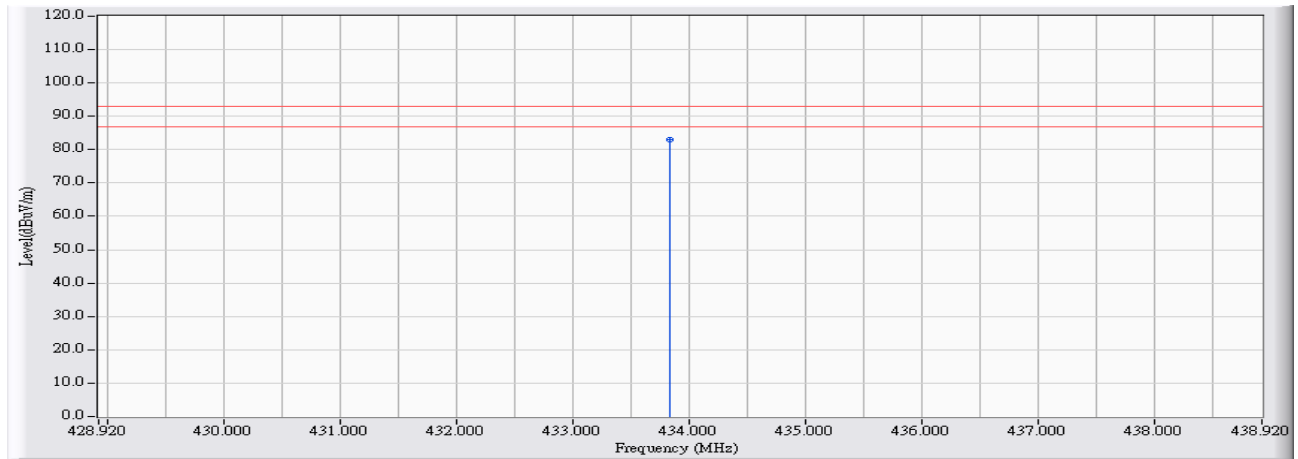


|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK        | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 1: Transmit Mode_A1_433.92MHz_Z-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.834            | 25.917                 | 53.703                  | 79.619                    | -13.251        | 92.870            | PEAK          |

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK      | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 1: Transmit Mode_A1_433.92MHz_Z-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.834            | 25.917                 | 56.986                  | 82.902                    | -9.968         | 92.870            | PEAK          |

|              |  |           |       |
|--------------|--|-----------|-------|
| Product      | Tire Pressure Monitoring System-A Series |           |       |
| Test Item    | Fundamental Radiated Emission            |           |       |
| Test Mode    | Mode 2: Transmit Mode_A2                 |           |       |
| Date of Test | 2017/02/08                               | Test Site | CB4-H |

| Frequency (MHz)   | Correct Factor (dB) | Reading Level (dBuV) | Peak Measurement Level (dBuV/m) | Average Measurement Level (dBuV/m) | Average Limit (dBuV/m) |
|-------------------|---------------------|----------------------|---------------------------------|------------------------------------|------------------------|
| <b>Horizontal</b> |                     |                      |                                 |                                    |                        |
| 433.920(X-axis)   | 25.918              | 35.730               | 61.648                          | 52.825                             | 80.830                 |
| 433.920(Y-axis)   | 25.917              | 50.240               | 76.156                          | 67.333                             | 80.830                 |
| <b>Vertical</b>   |                     |                      |                                 |                                    |                        |
| 433.920(X-axis)   | 25.918              | 49.286               | 75.204                          | 66.381                             | 80.830                 |
| 433.920(Y-axis)   | 25.917              | 40.250               | 66.166                          | 57.343                             | 80.830                 |

Note1:

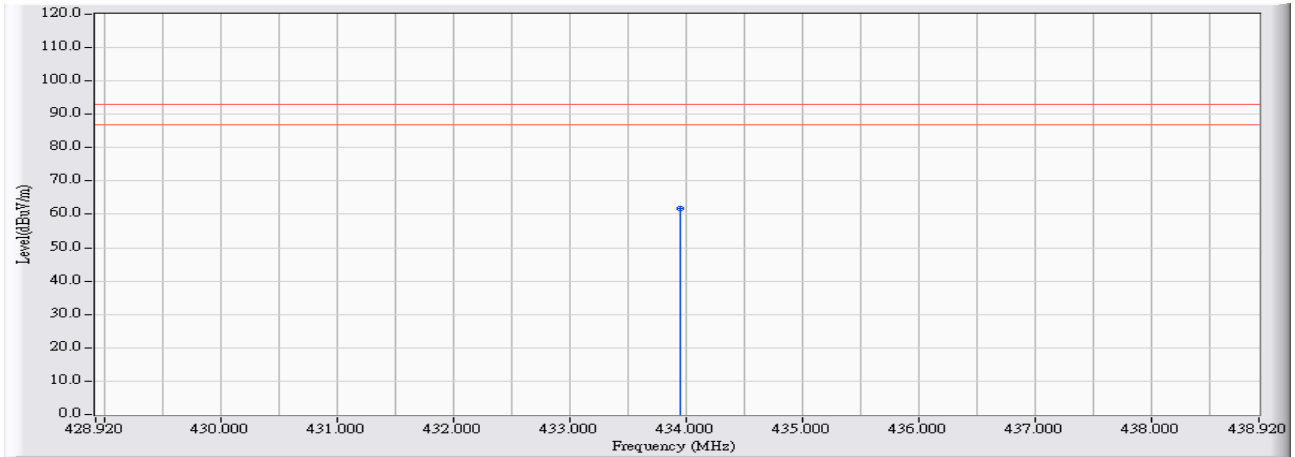
Peak Measurement Level = Reading Level +Correct factor

Average Measurement Level = Peak Measurement Level +20Log(Duty Cycle)

(Duty Cycle)=(Ton/(Ton+Toff)=36.21/100=0.362

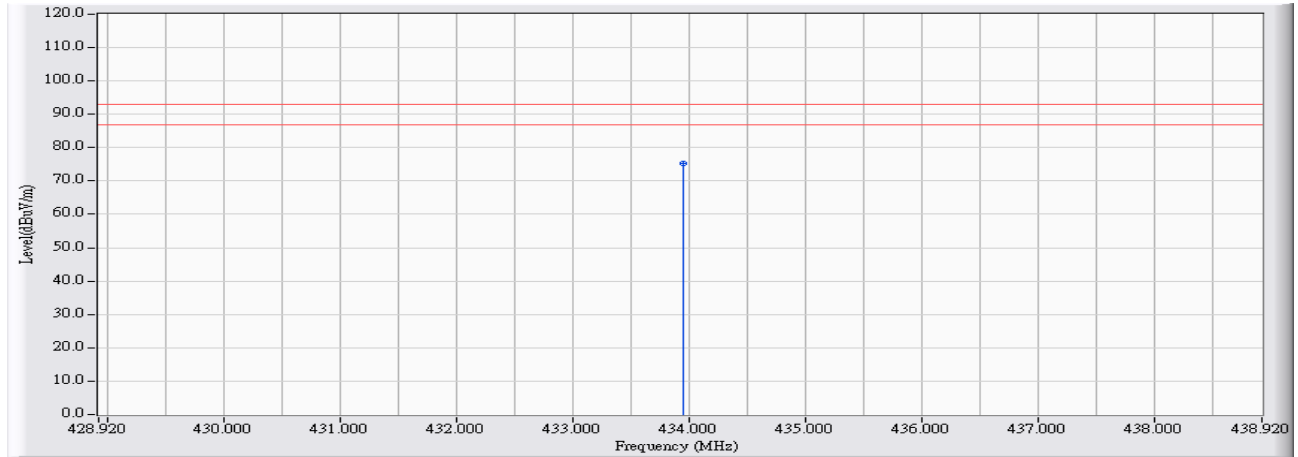
20Log(Duty Cycle)= -8.823

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK        | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 2: Transmit Mode_A2_433.92MHz_X-axis |



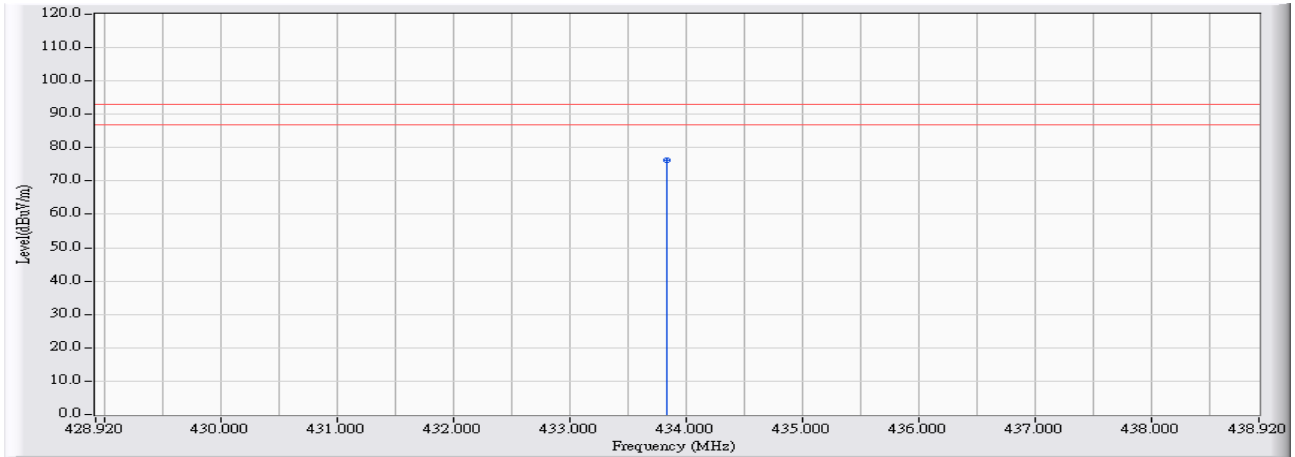
|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.949            | 25.918                 | 35.730                  | 61.648                    | -31.222        | 92.870            | PEAK          |

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK      | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 2: Transmit Mode_A2_433.92MHz_X-axis |



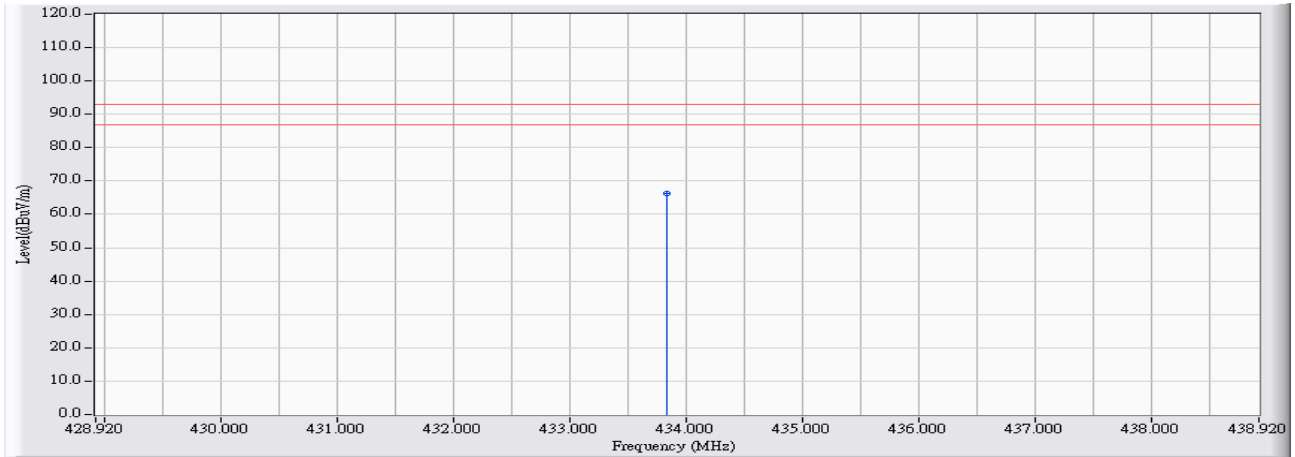
|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.950            | 25.918                 | 49.286                  | 75.204                    | -17.666        | 92.870            | PEAK          |

|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK        | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 2: Transmit Mode_A2_433.92MHz_Y-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.835            | 25.917                 | 50.240                  | 76.156                    | -16.714        | 92.870            | PEAK          |

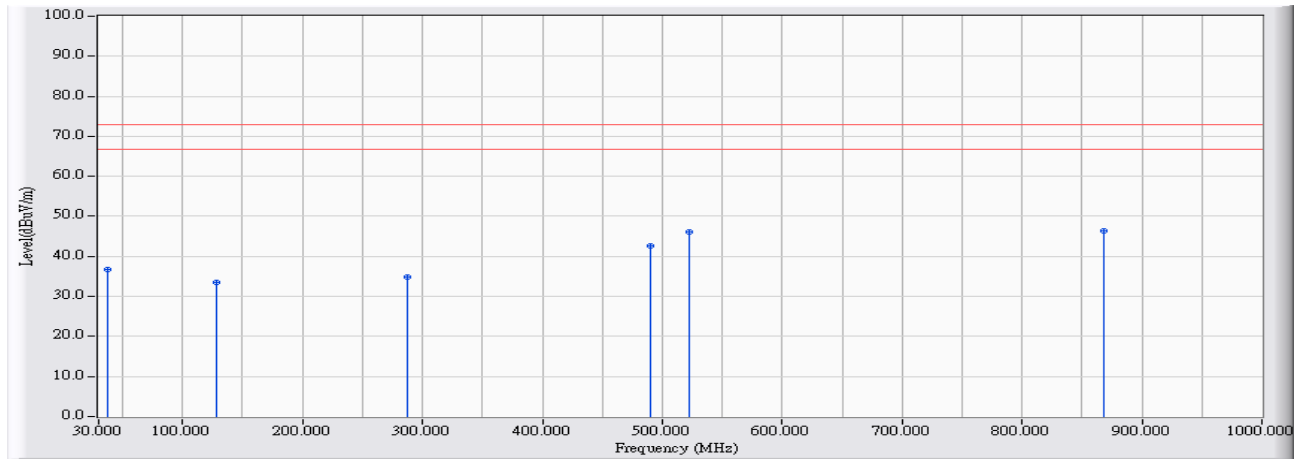
|  |  |
|--|--|
| Site : CB4-H   | Time : 2017/02/08                                |
| Limit : FCC_SpartC_15.231(e)_F_433.92MHz_03M_PK      | Margin : 6                                       |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)                 |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 2: Transmit Mode_A2_433.92MHz_Y-axis |



|   |   | Frequency<br>(MHz) | Correct Factor<br>(dB) | Reading Level<br>(dBuV) | Measure Level<br>(dBuV/m) | Margin<br>(dB) | Limit<br>(dBuV/m) | Detector Type |
|---|---|--------------------|------------------------|-------------------------|---------------------------|----------------|-------------------|---------------|
| 1 | * | 433.834            | 25.917                 | 40.250                  | 66.166                    | -26.704        | 92.870            | PEAK          |

**30MHz-1GHz Spurious :**

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK        | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 1: Transmit Mode_A1_433.92MHz |



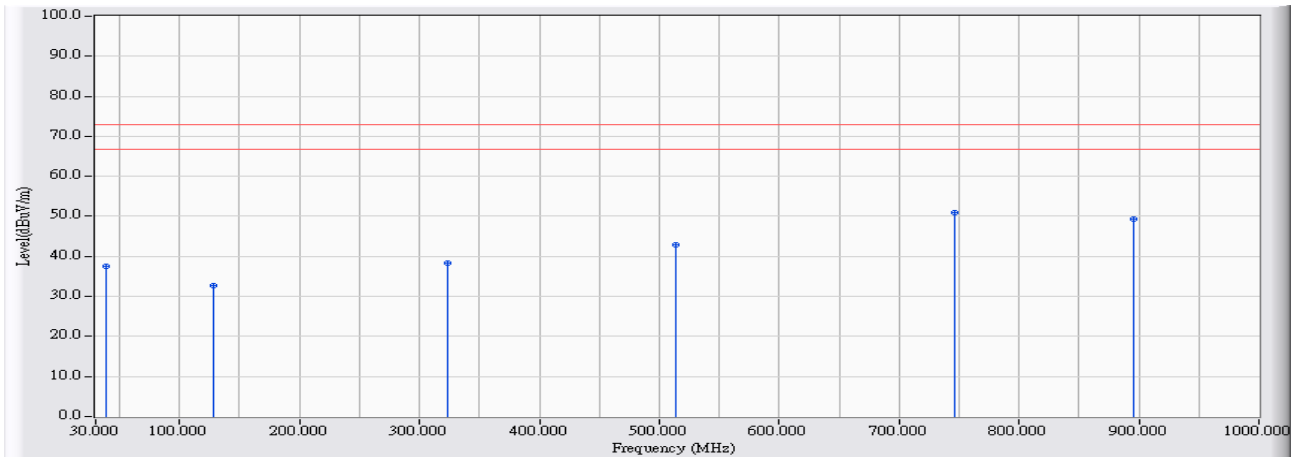
|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 37.662          | -14.215             | 50.991               | 36.776                 | -36.094     | 72.870         | QUASPEAK      |
| 2 | 128.445         | -14.215             | 47.742               | 33.527                 | -39.343     | 72.870         | QUASPEAK      |
| 3 | 287.994         | -14.215             | 49.110               | 34.895                 | -37.975     | 72.870         | QUASPEAK      |
| 4 | 490.025         | -14.215             | 56.769               | 42.554                 | -30.316     | 72.870         | QUASPEAK      |
| 5 | 522.905         | -14.215             | 60.343               | 46.128                 | -26.742     | 72.870         | QUASPEAK      |
| 6 | * 867.608       | -14.215             | 60.468               | 46.253                 | -26.617     | 72.870         | QUASPEAK      |

**Note:**

1. All Reading Levels are Quasi-Peak value.
2. " \* ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.



|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK      | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 1: Transmit Mode_A1_433.92MHz |

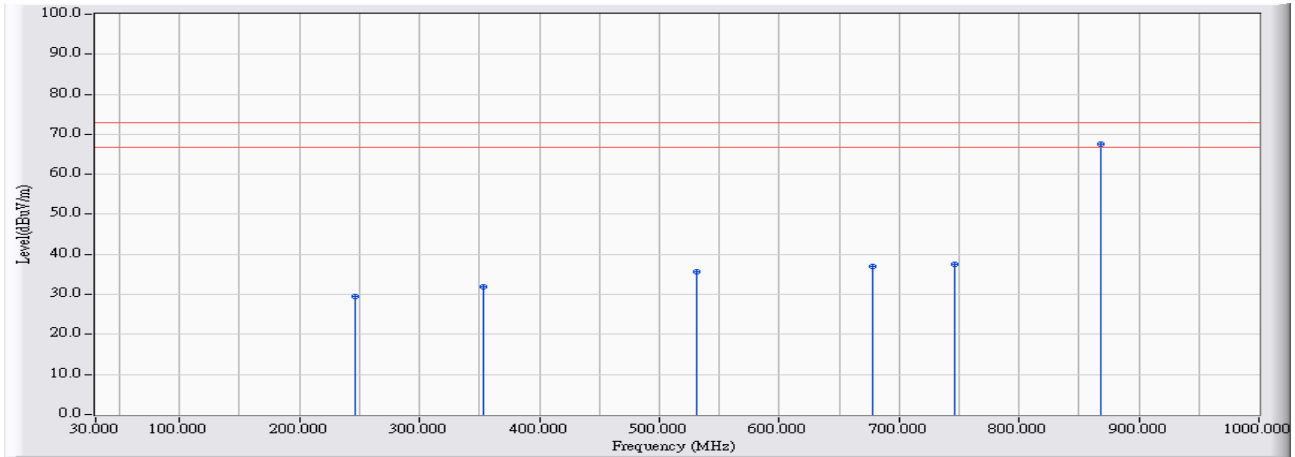


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 38.147          | 25.644              | 11.813               | 37.457                 | -35.413     | 72.870         | QUASPEAK      |
| 2 | 128.251         | 20.652              | 12.150               | 32.803                 | -40.067     | 72.870         | QUASPEAK      |
| 3 | 323.978         | 22.976              | 15.355               | 38.331                 | -34.539     | 72.870         | QUASPEAK      |
| 4 | 513.982         | 27.173              | 15.647               | 42.820                 | -30.050     | 72.870         | QUASPEAK      |
| 5 | * 746.855       | 29.537              | 21.314               | 50.851                 | -22.019     | 72.870         | QUASPEAK      |
| 6 | 895.929         | 31.288              | 18.030               | 49.318                 | -23.552     | 72.870         | QUASPEAK      |

Note:

1. All Reading Levels are Quasi-Peak value.
2. " \* ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/10                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK        | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series         | Note : Mode 2: Transmit Mode_A2_433.92MHz |

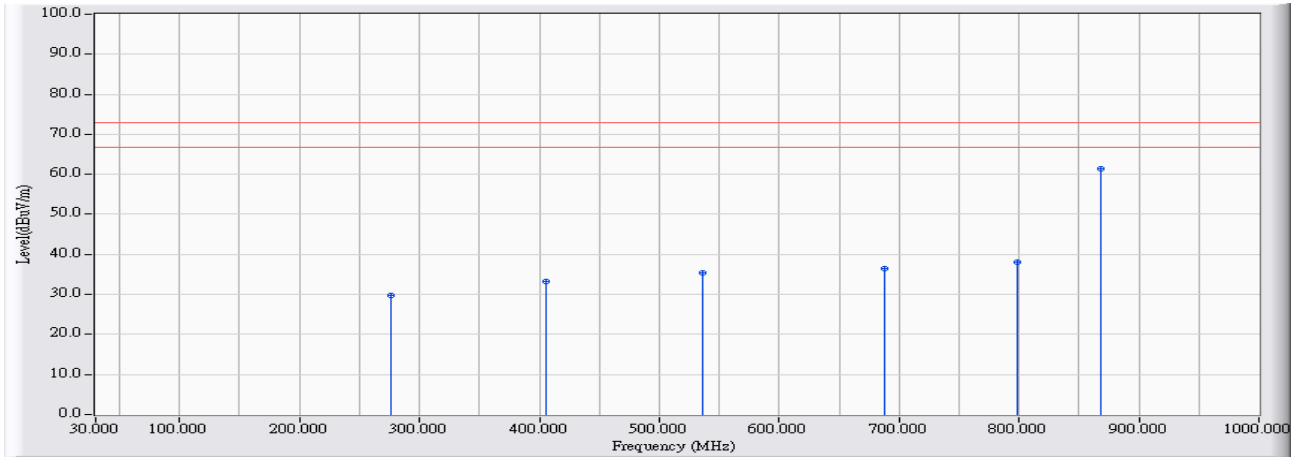


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 246.967         | 21.170              | 8.408                | 29.578                 | -43.292     | 72.870         | QUASPEAK      |
| 2 | 352.881         | 23.868              | 8.099                | 31.967                 | -40.903     | 72.870         | QUASPEAK      |
| 3 | 531.343         | 27.366              | 8.189                | 35.555                 | -37.315     | 72.870         | QUASPEAK      |
| 4 | 678.477         | 28.864              | 8.203                | 37.067                 | -35.803     | 72.870         | QUASPEAK      |
| 5 | 745.982         | 29.524              | 8.094                | 37.617                 | -35.253     | 72.870         | QUASPEAK      |
| 6 | * 867.608       | 30.886              | 36.718               | 67.604                 | -5.266      | 72.870         | QUASPEAK      |

Note:

1. All Reading Levels are Quasi-Peak value.
2. " \* ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/10                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK      | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_S2_30M-1GHz_1116 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series       | Note : Mode 2: Transmit Mode_A2_433.92MHz |



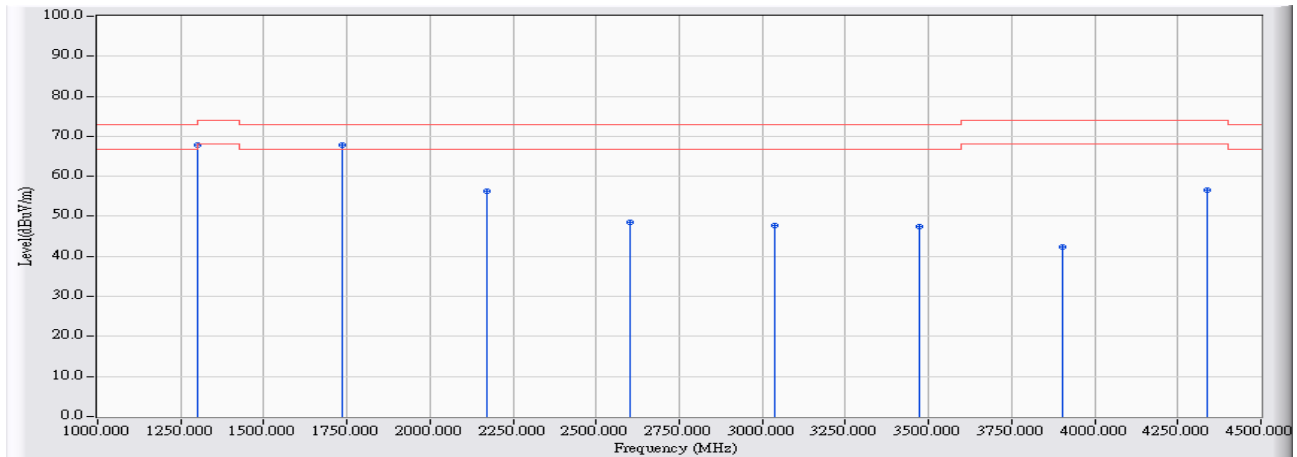
|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 276.549         | 21.804              | 8.030                | 29.833                 | -43.037     | 72.870         | QUASPEAK      |
| 2 | 405.352         | 25.436              | 7.714                | 33.150                 | -39.720     | 72.870         | QUASPEAK      |
| 3 | 536.095         | 27.431              | 7.876                | 35.307                 | -37.563     | 72.870         | QUASPEAK      |
| 4 | 687.982         | 28.856              | 7.713                | 36.568                 | -36.302     | 72.870         | QUASPEAK      |
| 5 | 798.745         | 30.175              | 7.784                | 37.958                 | -34.912     | 72.870         | QUASPEAK      |
| 6 | * 867.899       | 30.885              | 30.581               | 61.466                 | -11.404     | 72.870         | QUASPEAK      |

Note:

1. All Reading Levels are Quasi-Peak value.
2. " \* ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.

**Above 1GHz Spurious:**

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK            | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series             | Note : Mode 1: Transmit Mode_A1_433.92MHz |

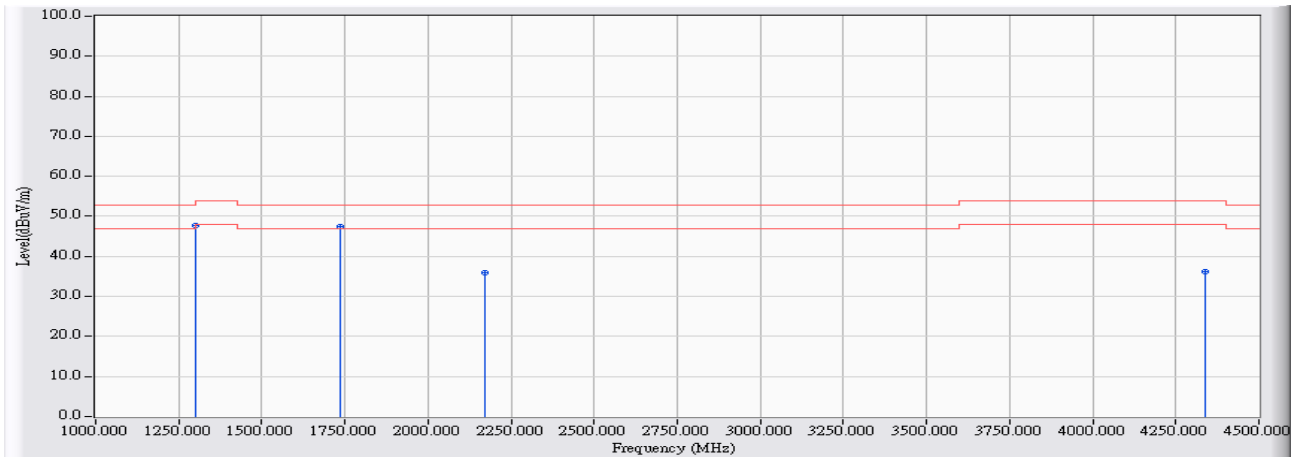


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 1301.670        | -13.150             | 81.103               | 67.954                 | -6.046      | 74.000         | PEAK          |
| 2 | * 1735.626      | -11.557             | 79.442               | 67.885                 | -4.985      | 72.870         | PEAK          |
| 3 | 2169.233        | -9.820              | 66.040               | 56.220                 | -16.650     | 72.870         | PEAK          |
| 4 | 2603.190        | -7.962              | 56.579               | 48.617                 | -24.253     | 72.870         | PEAK          |
| 5 | 3037.846        | -6.828              | 54.460               | 47.632                 | -25.238     | 72.870         | PEAK          |
| 6 | 3470.403        | -6.151              | 53.539               | 47.388                 | -25.482     | 72.870         | PEAK          |
| 7 | 3904.359        | -4.591              | 46.943               | 42.351                 | -31.649     | 74.000         | PEAK          |
| 8 | 4338.316        | -2.723              | 59.363               | 56.640                 | -17.360     | 74.000         | PEAK          |

**Note:**

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_AV            | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series             | Note : Mode 1: Transmit Mode_A1_433.92MHz |

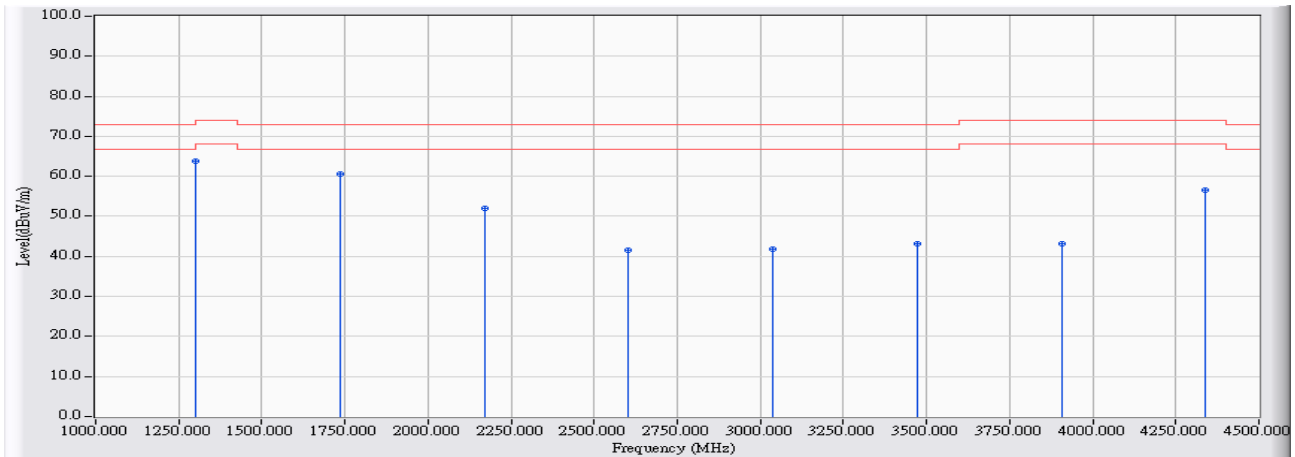


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 1301.670        | -13.150             | 60.763               | 47.614                 | -6.386      | 54.000         | AVERAGE       |
| 2 | * 1735.626      | -11.557             | 59.102               | 47.545                 | -5.325      | 52.870         | AVERAGE       |
| 3 | 2169.233        | -9.820              | 45.700               | 35.880                 | -16.990     | 52.870         | AVERAGE       |
| 4 | 4338.316        | -2.723              | 39.023               | 36.300                 | -17.700     | 54.000         | AVERAGE       |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK          | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series           | Note : Mode 1: Transmit Mode_A1_433.92MHz |

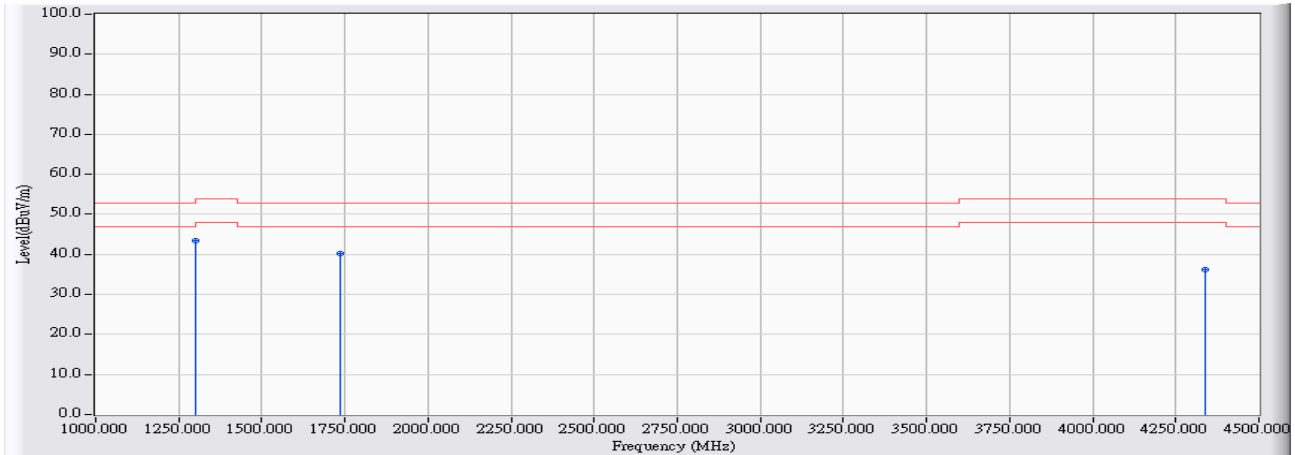


|   |   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | * | 1301.670        | -13.150             | 76.852               | 63.703                 | -10.297     | 74.000         | PEAK          |
| 2 |   | 1735.976        | -11.556             | 72.195               | 60.639                 | -12.231     | 72.870         | PEAK          |
| 3 |   | 2169.233        | -9.820              | 61.781               | 51.961                 | -20.909     | 72.870         | PEAK          |
| 4 |   | 2602.840        | -7.962              | 49.464               | 41.501                 | -31.369     | 72.870         | PEAK          |
| 5 |   | 3037.496        | -6.828              | 48.704               | 41.876                 | -30.994     | 72.870         | PEAK          |
| 6 |   | 3470.403        | -6.151              | 49.386               | 43.235                 | -29.635     | 72.870         | PEAK          |
| 7 |   | 3905.759        | -4.585              | 47.734               | 43.148                 | -30.852     | 74.000         | PEAK          |
| 8 |   | 4337.966        | -2.724              | 59.389               | 56.664                 | -17.336     | 74.000         | PEAK          |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/16                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_AV          | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series           | Note : Mode 1: Transmit Mode_A1_433.92MHz |

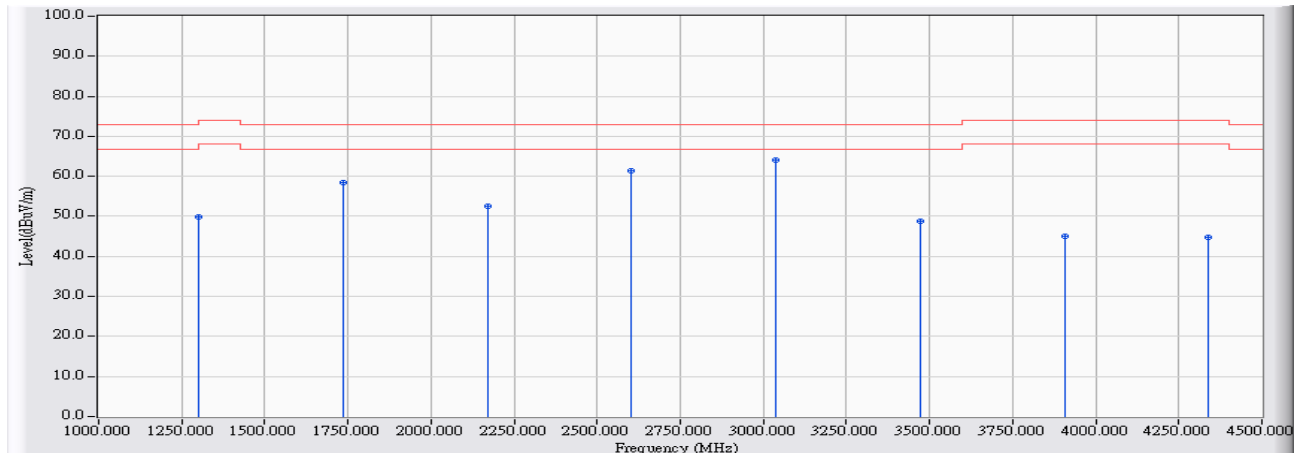


|   |   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | * | 1301.670        | -13.150             | 56.512               | 43.363                 | -10.637     | 54.000         | AVERAGE       |
| 2 |   | 1735.976        | -11.556             | 51.855               | 40.299                 | -12.571     | 52.870         | AVERAGE       |
| 3 |   | 4337.966        | -2.724              | 39.049               | 36.324                 | -17.676     | 54.000         | AVERAGE       |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|   |   |
|---|---|
| Site : CB4-H  | Time : 2017/02/08                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK         | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 - HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series          | Note : Mode 2: Transmit Mode_A2_433.92MHz |



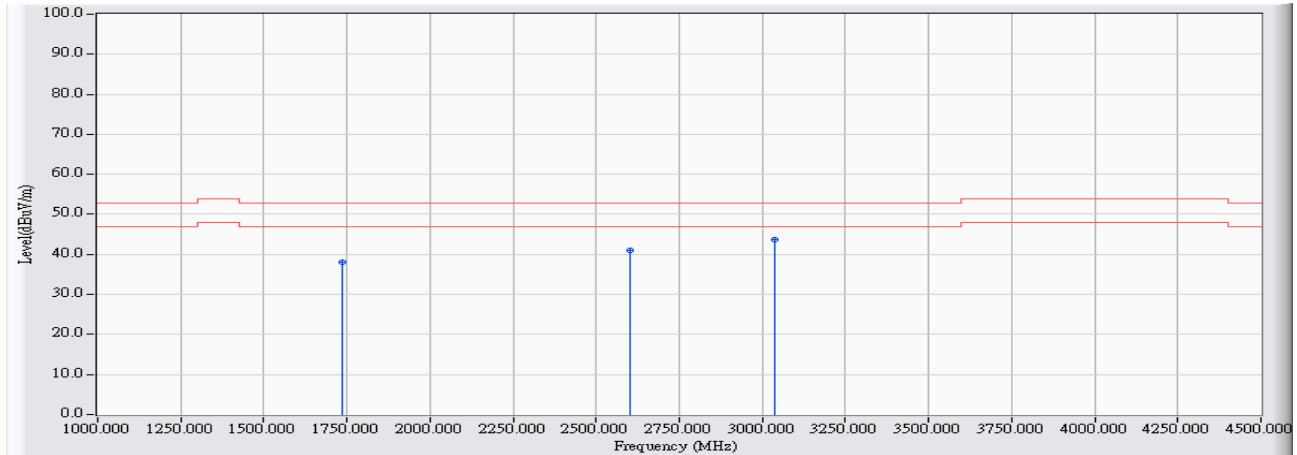
|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 1301.320        | -6.121              | 56.104               | 49.983                 | -24.017     | 74.000         | PEAK          |
| 2 | 1735.276        | -4.511              | 62.965               | 58.454                 | -14.416     | 72.870         | PEAK          |
| 3 | 2169.233        | -2.744              | 55.255               | 52.511                 | -20.359     | 72.870         | PEAK          |
| 4 | 2602.840        | -0.922              | 62.237               | 61.315                 | -11.555     | 72.870         | PEAK          |
| 5 | * 3036.796      | 0.243               | 63.851               | 64.094                 | -8.776      | 72.870         | PEAK          |
| 6 | 3471.103        | 1.054               | 47.764               | 48.818                 | -24.052     | 72.870         | PEAK          |
| 7 | 3905.759        | 2.707               | 42.254               | 44.960                 | -29.040     | 74.000         | PEAK          |
| 8 | 4339.200        | 4.463               | 40.420               | 44.882                 | -29.118     | 74.000         | PEAK          |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.



|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/14                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_AV            | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>HORIZONTAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series             | Note : Mode 2: Transmit Mode_A2_433.92MHz |

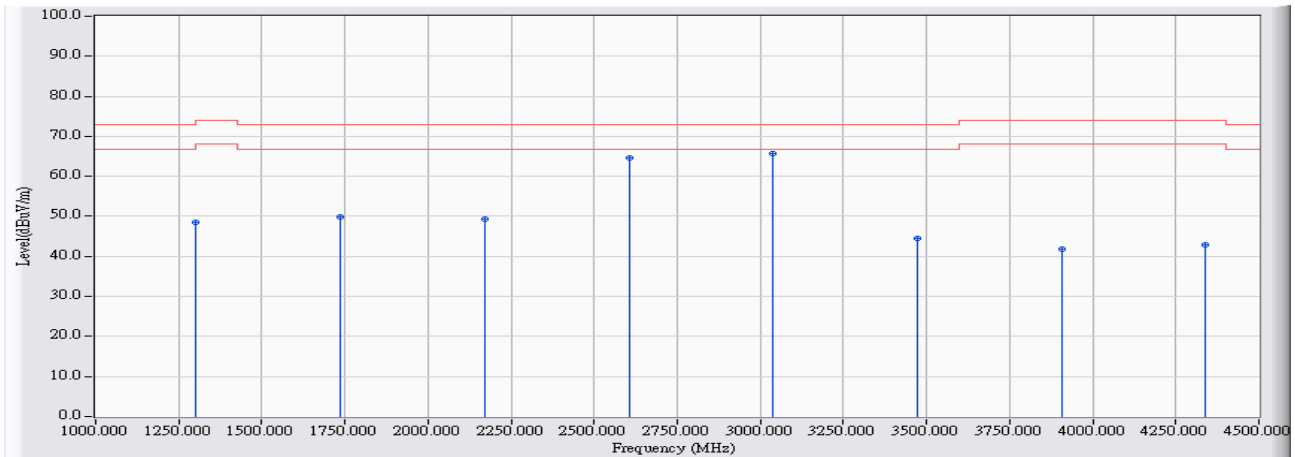


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 1735.276        | -4.511              | 42.702               | 38.191                 | -14.679     | 52.870         | AVERAGE       |
| 2 | 2602.840        | -0.922              | 41.974               | 41.052                 | -11.818     | 52.870         | AVERAGE       |
| 3 | * 3036.796      | 0.243               | 43.588               | 43.831                 | -9.039      | 52.870         | AVERAGE       |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/08                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_PK          | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series           | Note : Mode 2: Transmit Mode_A2_433.92MHz |

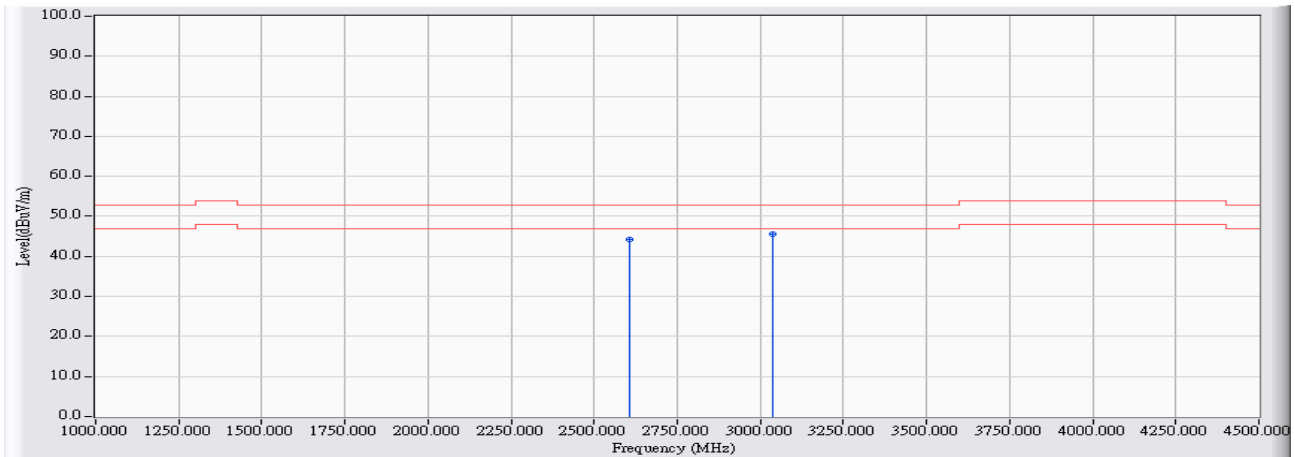


|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 1301.320        | -6.121              | 54.579               | 48.458                 | -25.542     | 74.000         | PEAK          |
| 2 | 1735.276        | -4.511              | 54.290               | 49.779                 | -23.091     | 72.870         | PEAK          |
| 3 | 2169.583        | -2.743              | 52.091               | 49.348                 | -23.522     | 72.870         | PEAK          |
| 4 | 2604.589        | -0.918              | 65.407               | 64.490                 | -8.380      | 72.870         | PEAK          |
| 5 | * 3037.496      | 0.244               | 65.499               | 65.743                 | -7.127      | 72.870         | PEAK          |
| 6 | 3471.453        | 1.056               | 43.514               | 44.569                 | -28.301     | 72.870         | PEAK          |
| 7 | 3905.759        | 2.707               | 39.219               | 41.925                 | -32.075     | 74.000         | PEAK          |
| 8 | 4339.200        | 4.463               | 38.520               | 42.982                 | -31.018     | 74.000         | PEAK          |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

|  |   |
|--|---|
| Site : CB4-H   | Time : 2017/02/14                         |
| Limit : FCC_SpartC_15.231(e)_H_433.92MHz_03M_AV          | Margin : 6                                |
| Probe : CB4-H_FCC_EFS_B091_1-18GHz_3M_0117 -<br>VERTICAL | Power : DC 3V (Power by Battery)          |
| EUT : Tire Pressure Monitoring System-A Series           | Note : Mode 2: Transmit Mode_A2_433.92MHz |



|   | Frequency (MHz) | Correct Factor (dB) | Reading Level (dBuV) | Measure Level (dBuV/m) | Margin (dB) | Limit (dBuV/m) | Detector Type |
|---|-----------------|---------------------|----------------------|------------------------|-------------|----------------|---------------|
| 1 | 2604.589        | -0.918              | 45.144               | 44.227                 | -8.643      | 52.870         | AVERAGE       |
| 2 | * 3037.496      | 0.244               | 45.236               | 45.480                 | -7.390      | 52.870         | AVERAGE       |

Note:

1. All readings above 1GHz are performed with peak and/or average measurements as necessary.
2. Peak measurements: RBW = 1MHz, VBW = 3 MHz, Sweep: Auto.
3. “ \* ”, means this data is the worst emission level.
4. Measurement Level = Reading Level + Correct Factor.
5. Average Measurement Level = Peak Measurement Level + 20Log (Duty Cycle)  
 Duty Cycle(Only Ton)= Ton/ (Ton+off)=8.45/100=0.0845  
 20\*Log(Duty Cycle) = -21.463
6. The average measurement was not performed when the peak measured data under the limit of peak detection.

### 3. Occupied Bandwidth

#### 3.1. Test Equipment

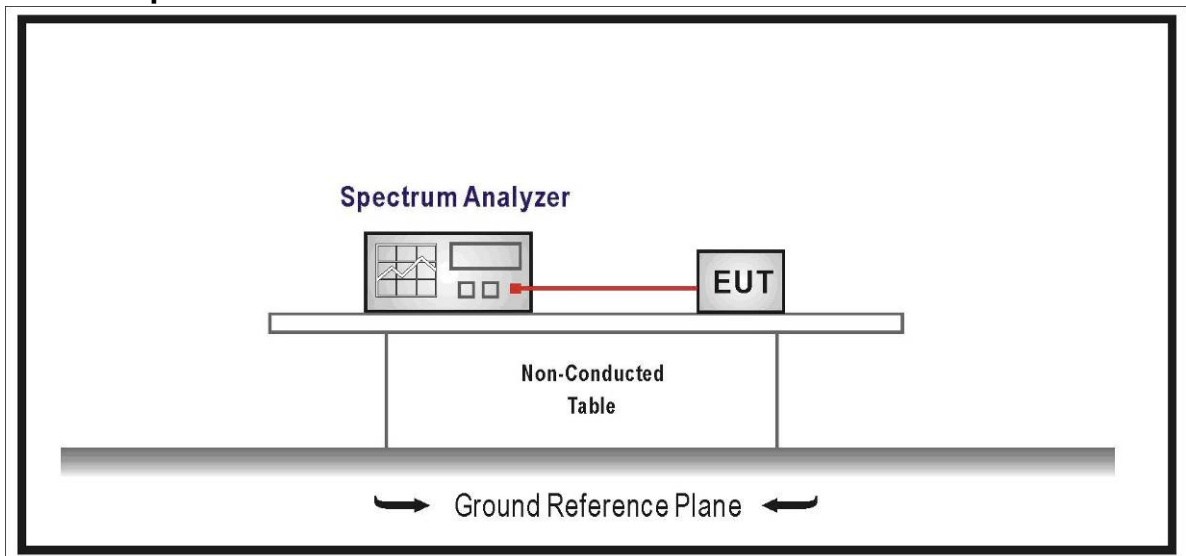
The following test equipments are used during the radiated emission tests:

Occupied Bandwidth / SR10-H

| Instrument        | Manufacturer | Model No. | Serial No  | Next Cal. Date |
|-------------------|--------------|-----------|------------|----------------|
| Spectrum Analyzer | Agilent      | N9010A    | US47140172 | 2017/08/08     |

Note: All equipments that need to calibrate are with calibration period of 1 year.

#### 3.2. Test Setup



#### 3.3. Limits

The bandwidth of the emission shall be no wider than 0.25% of the center frequency for devices operating above 70 MHz and below 900 MHz. For devices operating above 900 MHz, the emission shall be no wider than 0.5% of the center frequency. Bandwidth is determined at the points 20 dB down from the modulated carrier.

#### 3.4. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.231(b): 2015

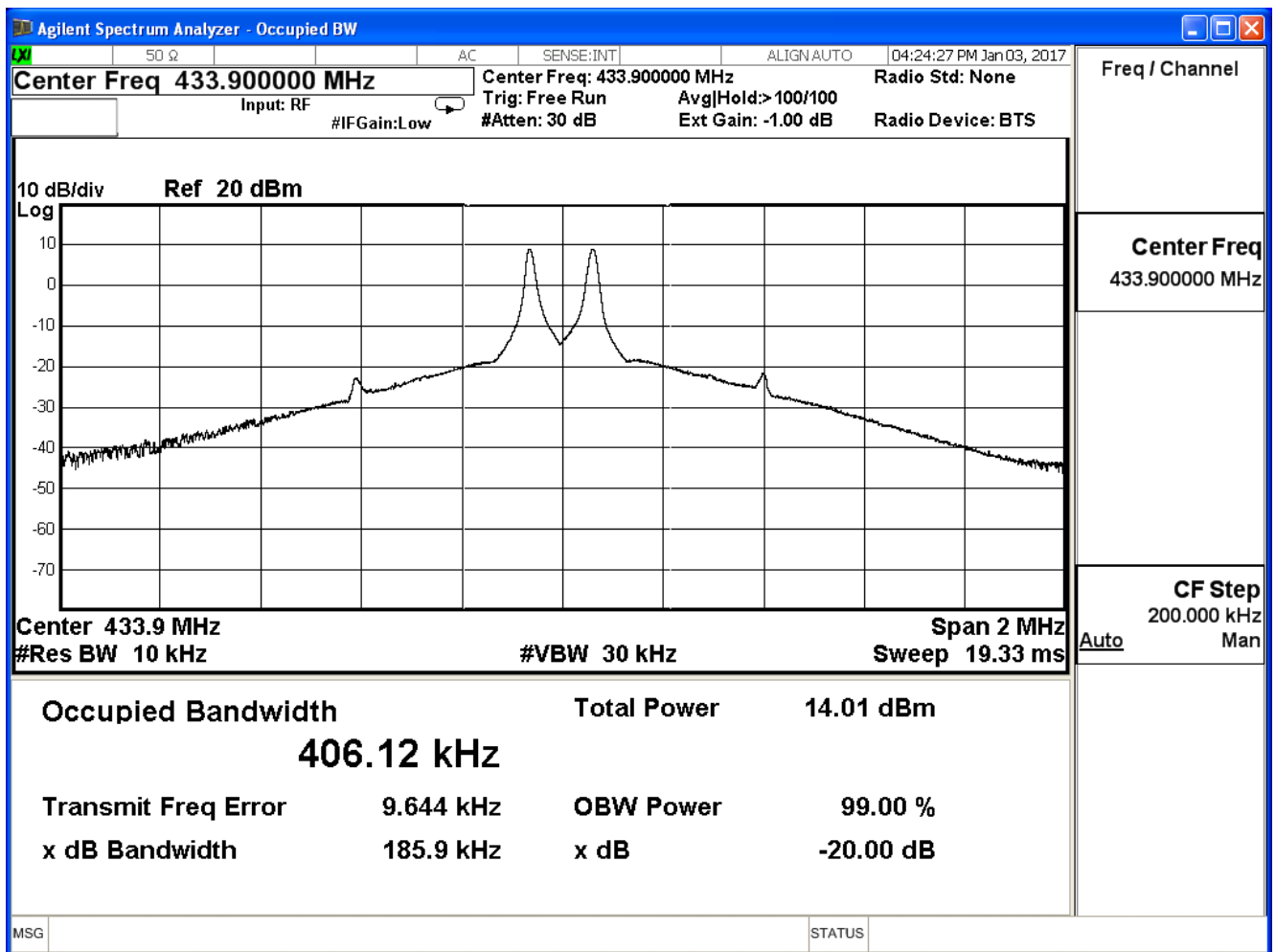
#### 3.5. Uncertainty

$\pm 150\text{Hz}$

### 3.6. Test Result

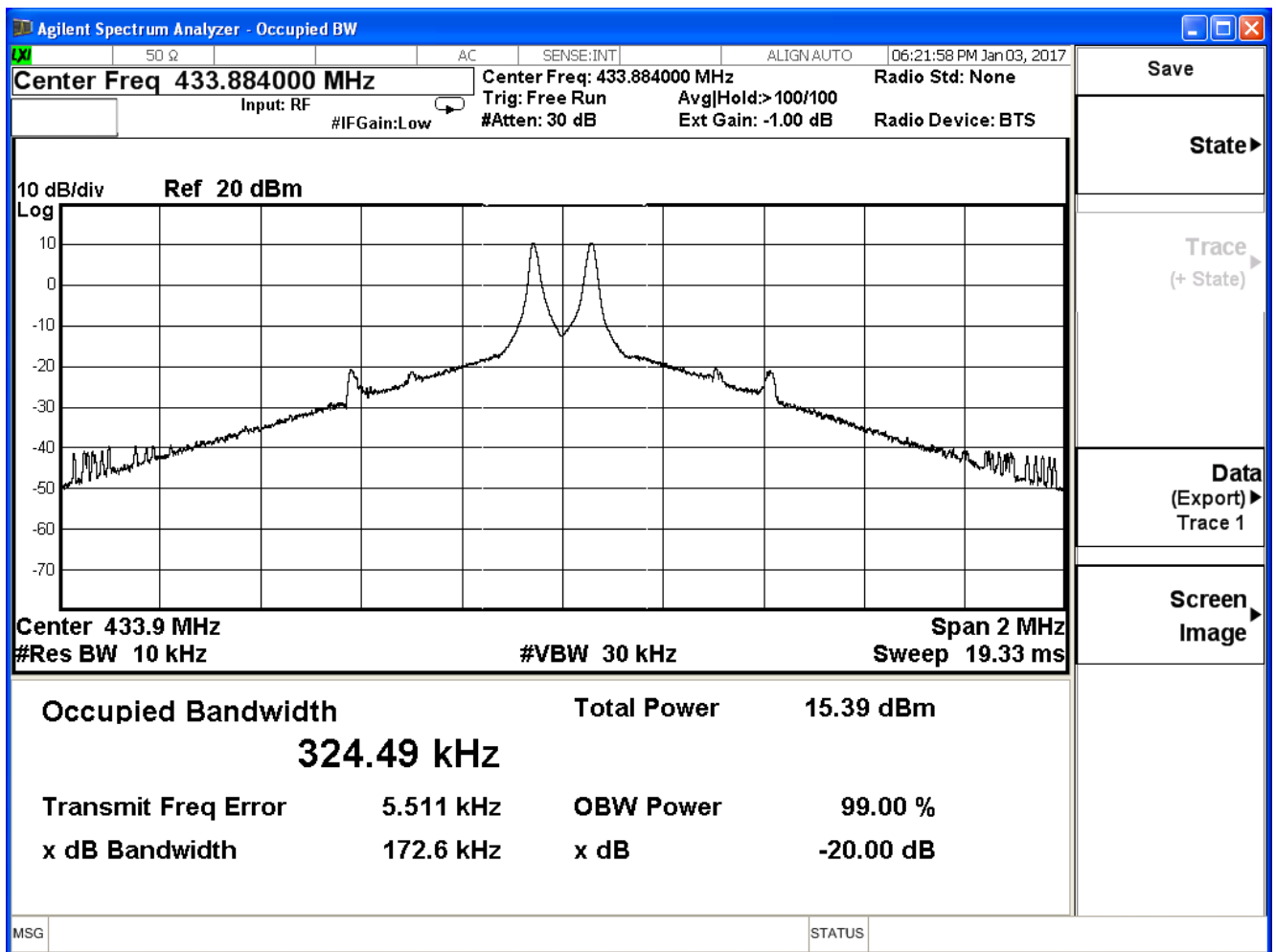
|              |  |           |        |
|--------------|--|-----------|--------|
| Product      | Tire Pressure Monitoring System-A Series |           |        |
| Test Item    | Occupied Bandwidth                       |           |        |
| Test Mode    | Mode 1: Transmit Mode_A1                 |           |        |
| Date of Test | 2017/02/21                               | Test Site | SR10-H |

|   |            |
|---|------------|
| Center Frequency  | 433.92 MHz |
| Allowable Bandwidth (70-900 MHz: 0.25%, Above 900MHz: 0.5%) | 1.0848MHz  |
| Bandwidth at 20dB down (Max)                                | 185.9KHz   |
| Result  | PASS       |



|              |  |           |        |
|--------------|--|-----------|--------|
| Product      | Tire Pressure Monitoring System-A Series |           |        |
| Test Item    | Occupied Bandwidth                       |           |        |
| Test Mode    | Mode 2: Transmit Mode_A2                 |           |        |
| Date of Test | 2017/02/21                               | Test Site | SR10-H |

|   |            |
|---|------------|
| Center Frequency  | 433.92 MHz |
| Allowable Bandwidth (70-900 MHz: 0.25%, Above 900MHz: 0.5%) | 1.0848MHz  |
| Bandwidth at 20dB down (Max)                                | 172.6KHz   |
| Result  | PASS       |



## 4. Transmitter time

### 4.1. Test Equipment

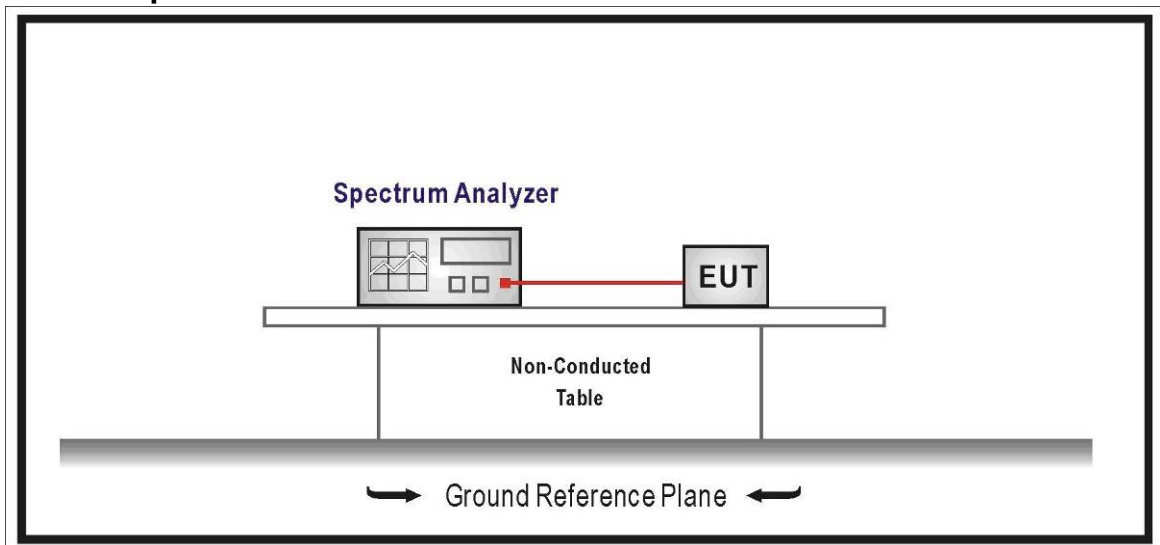
The following test equipments are used during the radiated emission tests:

Transmitter time / SR10-H

| Instrument        | Manufacturer | Model No. | Serial No  | Next Cal. Date |
|-------------------|--------------|-----------|------------|----------------|
| Spectrum Analyzer | Agilent      | N9010A    | US47140172 | 2017/08/08     |

Note: All equipments that need to calibrate are with calibration period of 1 year.

### 4.2. Test Setup



### 4.3. Limits

A manually operated transmitter shall employ a switch that will automatically deactivate the transmitter within not more than 5 seconds of being released. A transmitter activated automatically shall cease transmission within 5 seconds after activation.

### 4.4. Test Specification

According to FCC Part 15 Subpart C Paragraph 15.231(b): 2015

### 4.5. Uncertainty

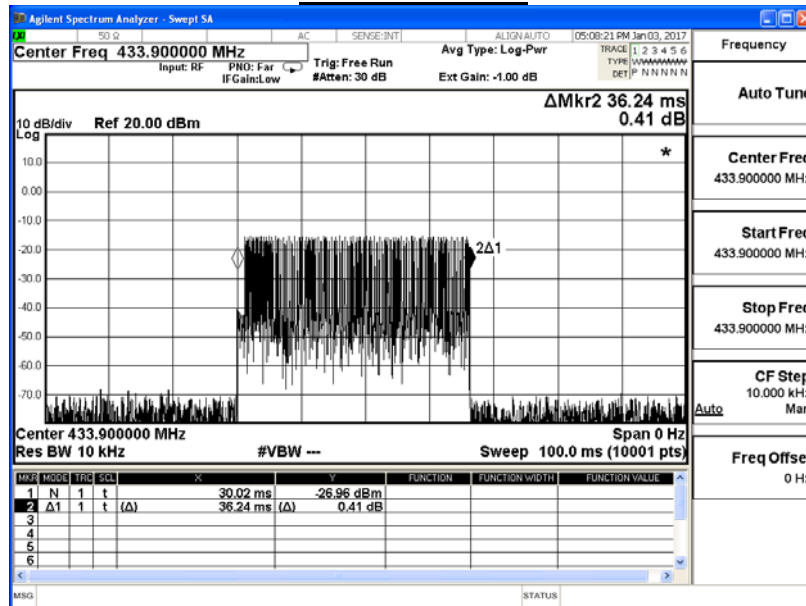
± 25msec

### 4.6. Test Result

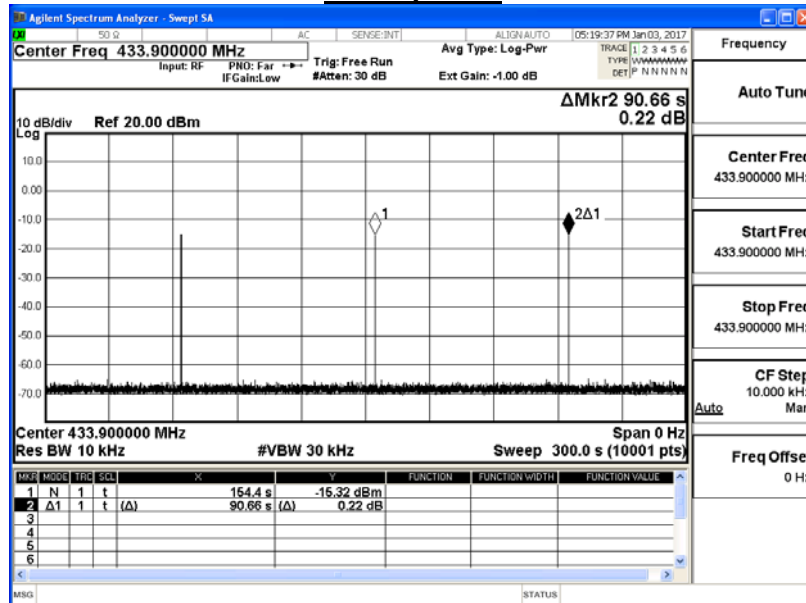
|              |  |           |        |
|--------------|--|-----------|--------|
| Product      | Tire Pressure Monitoring System-A Series |           |        |
| Test Item    | Transmitter time                         |           |        |
| Test Mode    | Mode 1: Transmit Mode_A1                 |           |        |
| Date of Test | 2017/01/03                               | Test Site | SR10-H |

| Frequency (MHz) | Transmitter time (ms.) |       | Silent period (sec.) |       |
|-----------------|------------------------|-------|----------------------|-------|
|                 | Measure value          | Limit | Measure value        | Limit |
| 433.92          | 36.24                  | 1000  | 90.66                | 10    |

**Transmitter time**



**Silent period**

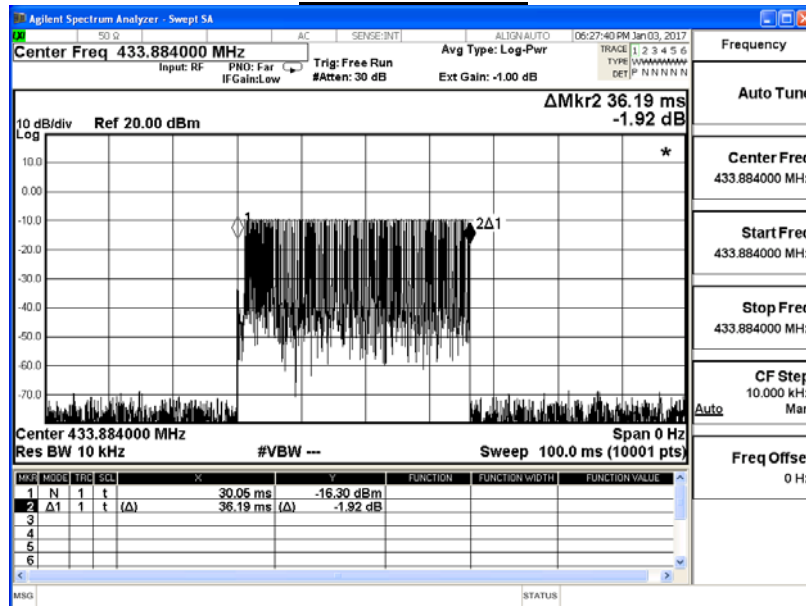




|              |  |           |        |
|--------------|--|-----------|--------|
| Product      | Tire Pressure Monitoring System-A Series |           |        |
| Test Item    | Transmitter time                         |           |        |
| Test Mode    | Mode 2: Transmit Mode_A2                 |           |        |
| Date of Test | 2017/01/03                               | Test Site | SR10-H |

| Frequency (MHz) | Transmitter time (ms.) |       | Silent period (sec.) |       |
|-----------------|------------------------|-------|----------------------|-------|
|                 | Measure value          | Limit | Measure value        | Limit |
| 433.92          | 36.19                  | 1000  | 90.69                | 10    |

### Transmitter time



### Silent period

