TEST REPORT

APPLICANT	:	NiceRF Wireless Technology LTD.
PRODUCT NAME	:	Wireless Module
MODEL NAME	:	Lora1276-C1-915
BRAND NAME	:	G-NiceRF
FCC ID	:	2AD66-1276-C1
STANDARD(S)	:	47 CFR Part 15 Subpart C
RECEIPT DATE	:	2024-09-12
TEST DATE	:	2024-09-18 to 2024-09-23
ISSUE DATE	:	2024-10-29

Edited by: Zeng Xiaoying (Rapporteur)

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Change History		
Version	**Date**	**Reason for change**
1.0	2024-10-29	First edition

1. Summary of Test Result

No.	Section	Description	Test Date	Test Engineer	Result	Method Determination /Remark
1	15.203	Antenna Requirement	N/A	N/A	PASS	No deviation
2	N/A	Duty Cycle of Test Signal	Sep. 19, 2024	Li Xinpeng	PASS	No deviation
3	15.247(b)	Maximum Peak Conducted Output Power	Sep. 20, 2024	Li Xinpeng	PASS	No deviation
4	15.247(b)	Maximum Average Conducted Output Power	Sep. 20, 2024	Li Xinpeng	PASS	No deviation
5	15.247(a)	Bandwidth	Sep. 20, 2024	Li Xinpeng	PASS	No deviation
6	15.247(d)	Conducted Spurious Emission and Band Edge	Sep. 20, 2024	Li Xinpeng	PASS	No deviation
7	15.247(e)	Power Spectral Density	Sep. 19, 2024	Li Xinpeng	PASS	No deviation
8	15.207	Conducted Emission	N/A	N/A	N/A$_{Note1}$	N/A
9	15.209, 15.247(d)	Radiated Emission	Oct. 11, 2024	Li Hanbin	PASS	No deviation

Note 1: Measurements to demonstrate compliance with the conducted limits are not required for devices which only employ battery power for operation and which do not operate from the AC power lines or contain provisions for operation while connected to the AC power lines.

Note 1: The tests were performed according to the method of measurements prescribed in ANSI C63.10-2013 and KDB 558074 D01 v05r02.

Note 2: Additions to, deviation, or exclusions from the method shall be judged in the "method determination" column of add, deviate or exclude from the specific method shall be explained in the "Remark" of the above table.

Note 3: When the test result is a critical value, we will use the measurement uncertainty give the judgment result based on the 95% confidence intervals.

1.1. Testing Applied Standards

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:

• 47 CFR Part 15 Subpart C Radio Frequency Devices

1.2. Test Equipment List

1.2.1 Conducted Test Equipment

Equipment Name	Serial No.	Type	Manufacturer	Cal. Date	Due Date
EXA Signal Analzyer	MY53470836	N9010A	Agilent	2024.02.19	2025.02.18
RF Cable (30MHz-26GHz)	CB01	RF01	Morlab	N/A	N/A
SMA Connector	CN01	RF03	HUBER-SUHNER	N/A	N/A

1.2.2 Conducted Emission Test Equipment

Equipment	Serial No.	Type	Manufacturer	Cal. Date	Due Date
Receiver	MY56400093	N9038A	KEYSIGHT	2024.01.25	2025.01.24
LISN	8127449	NSLK 8127	Schwarzbeck	2024.02.02	2025.02.01
Pulse Limiter (10dB)	VTSD 9561 F-B #206	VTSD 9561-F	Schwarzbeck	2024.05.30	2025.05.29
RF Coaxial Cable (DC-100MHz)	BNC	MRE04	Qualwave	2024.07.02	2025.07.01

1.2.3 List of Software Used

Description	Manufacturer	Software Version
Test System	MaiWei	2.0.0.0
Morlab EMCR	Morlab	V1.2
TS+ -[JS32-CE]	Tonscend	V2.5.0.0

1.2.4 Radiated Test Equipment

Equipment	Serial No.	Type	Manufacturer	Cal. Date	Due Date
Signal Analyzer	MY56060145	N9020A	Agilent	2024.05.30	2025.05.29
Test Antenna - Bi-Log	9163-519	VULB 9163	Schwarzbeck	2024.06.22	2025.06.21
Test Antenna - Loop	1519-022	FMZB1519	Schwarzbeck	2024.06.03	2025.06.02
Test Antenna – Horn	01774	BBHA 9120D	Schwarzbeck	2024.06.22	2025.06.21
Test Antenna – Horn	BBHA9170 #773	BBHA9170	Schwarzbeck	2024.06.22	2025.06.21
Preamplifier (10MHz-6GHz)	46732	S10M100L3802	LUCIX CORP.	2024.05.30	2025.05.29
Preamplifier (2GHz-18GHz)	61171/61172	S020180L3203	LUCIX CORP.	2024.05.30	2025.05.29
Preamplifier (18GHz-40GHz)	DS77209	DCLNA0118-40C-S	Decentest	2024.05.30	2025.05.29
RF Coaxial Cable (DC-18GHz)	MRE001	PE330	Pasternack	2024.05.30	2025.05.29
RF Coaxial Cable (DC-18GHz)	MRE002	CLU18	Pasternack	2024.05.30	2025.05.29
RF Coaxial Cable (DC-18GHz)	MRE003	CLU18	Pasternack	2024.05.30	2025.05.29
RF Coaxial Cable (DC-40GHz)	22290045	QA360-40-KK-0.5	Qualwave	2024.07.03	2025.07.02
RF Coaxial Cable (DC-40GHz)	22290046	QA360-40-KKF-2	Qualwave	2024.07.03	2025.07.02
RF Coaxial Cable (DC-18GHz)	22120181	QA500-18-NN-5	Qualwave	2024.07.03	2025.07.02
Anechoic Chamber	N/A	9m*6m*6m	CRT	2022.05.10	2025.05.09

1.3. Measurement Uncertainty

Test Items	Uncertainty	Remark
Peak Output Power	±2.22dB	Confidence levels of 95%
Power Spectral Density	±2.22dB	Confidence levels of 95%
Bandwidth	±5%	Confidence levels of 95%
Conducted Spurious Emission	±2.77dB	Confidence levels of 95%
Restricted Frequency Bands	±5%	Confidence levels of 95%
Radiated Emission	±2.95dB	Confidence levels of 95%
Conducted Emission	±2.44dB	Confidence levels of 95%

1.4. Testing Laboratory

Laboratory Name	Shenzhen Morlab Communications Technology Co., Ltd.
Laboratory Address	FL.3, Building A, FeiYang Science Park, No.8 LongChang Road, Block 67, BaoAn District, ShenZhen, GuangDong Province, P. R. China
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FCC Designation Number	CN1192
FCC Test Firm Registration Number	226174

2. General Description

2.1. Information of Applicant and Manufacturer

Applicant	NiceRF Wireless Technology LTD.
Applicant Address	309-314, Bldg A,Hongdu business building, Xin'an street, Zone 43, Baoan Dist, Shenzhen 518101, China
Manufacturer	NiceRF Wireless Technology LTD.
Manufacturer Address	309-314, Bldg A,Hongdu business building, Xin'an street, Zone 43, Baoan Dist, Shenzhen 518101, China

2.2. Information of EUT

Product Name:	Wireless Module
Sample No.:	2#
Hardware Version:	V1.0
Software Version:	V1.0
Equipment Type:	DTS
Modulation Type:	LoRa
Operating Frequency Range:	DTS: 902.5MHz– 927.5MHz
Antenna Type:	Rod Antenna
Antenna Gain:	4.2dBi

Note 1: We use the dedicated software to control the EUT continuous transmission.

Note 2: For a more detailed description, please refer to Specification or User's Manual supplied by the applicant and/or manufacturer.

2.3. Channel List of EUT

Channel	Frequency(MHz)	Channel	Frequency(MHz)
1	**902.5**	14	915.5
2	903.5	15	916.5
3	904.5	16	917.5
4	905.5	17	918.5
5	906.5	18	919.5
6	907.5	19	920.5
7	908.5	20	921.5
8	909.5	21	922.5
9	910.5	22	923.5
10	911.5	23	924.5
11	912.5	24	925.5
12	913.5	25	926.5
13	**914.5**	**26**	**927.5**

Note 1: The black bold channels were selected for test.

2.4. Operation and Transmitter Power Level Setting

The EUT was tested while in a continues transmitter/receiver mode under the control of tool which is provided by manufacturer, all the items of transmitter were tested under the power setting as below:

Modulation	Bandwidth (kHz)	Data Rate	Power Setting
LoRa	500	SF7	6

2.5. Test Configuration of EUT

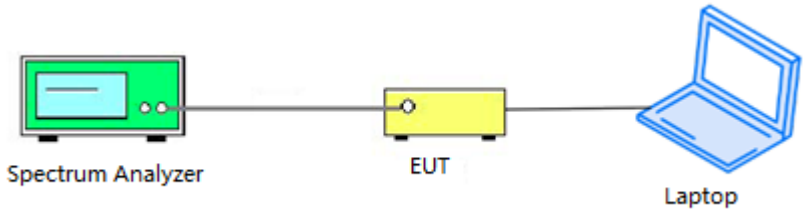
Test mode is used to control the EUT under the maximum power level during test.

2.6. Test Conditions

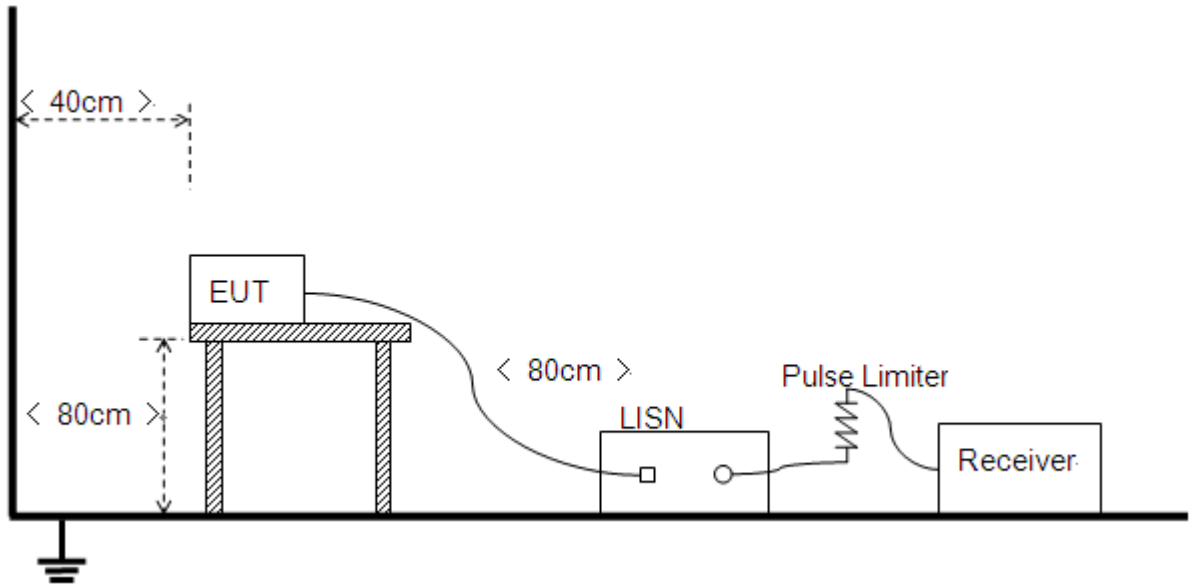
Temperature (°C)	15-35
Relative Humidity (%)	30-60
Atmospheric Pressure (kPa)	86-106

2.7. Test Setup Layout Diagram

2.7.1.Conducted Measurement

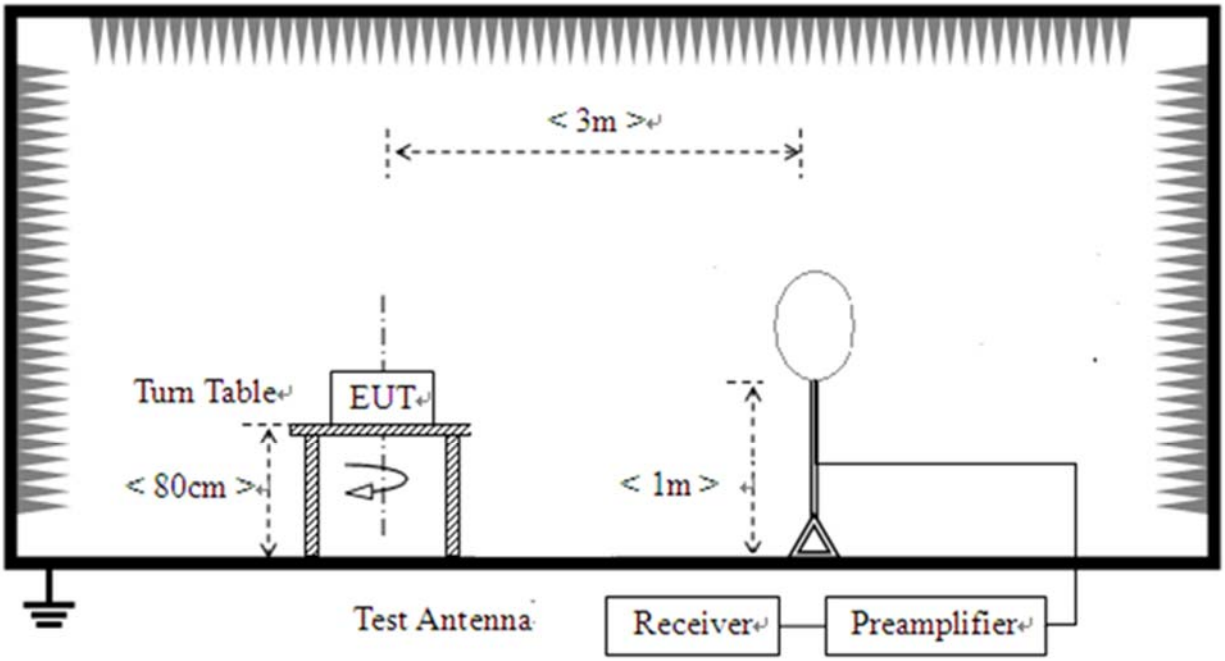


2.7.2.Conducted Emission Measurement

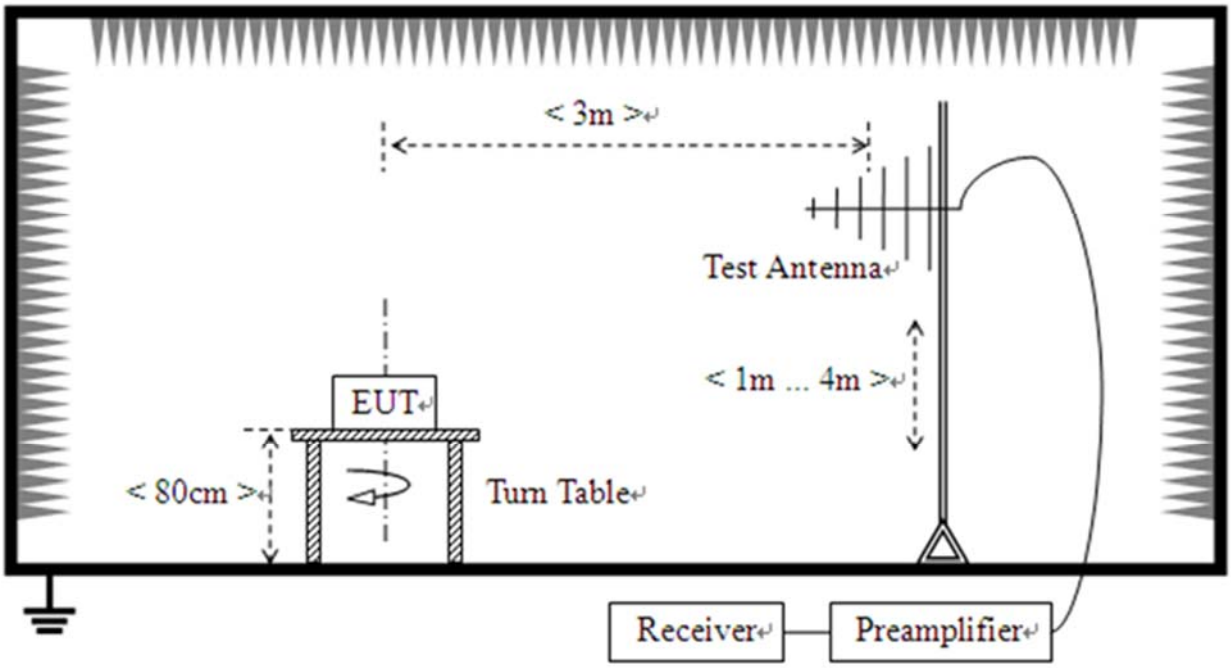


2.7.3.Radiation Measurement

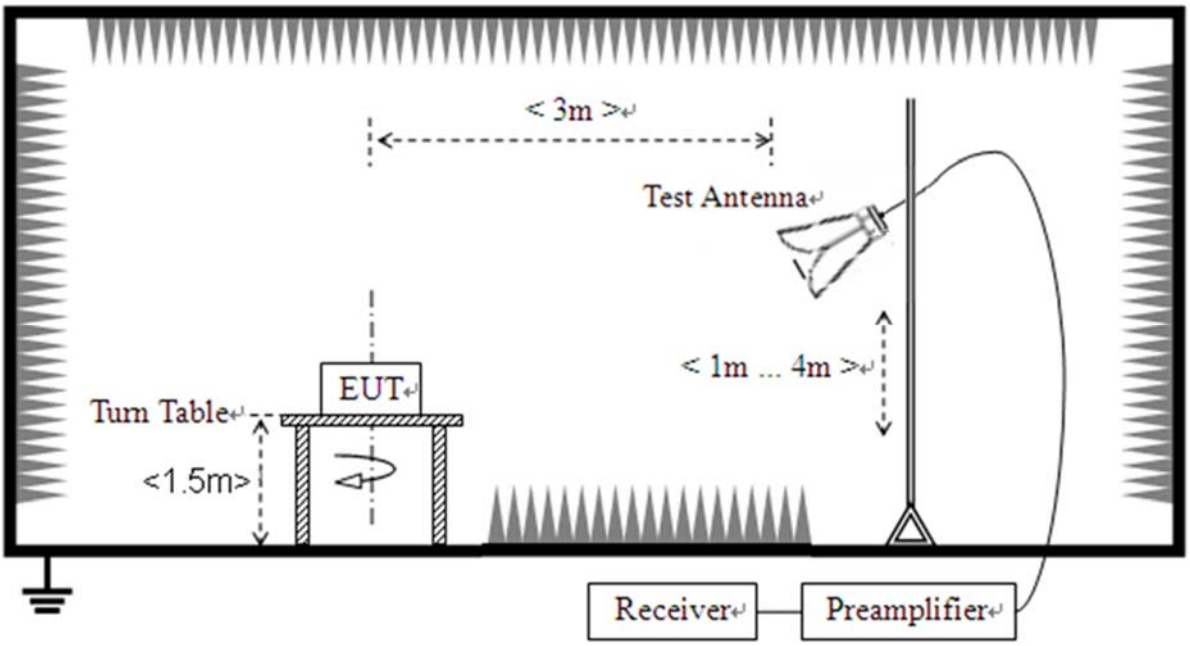
1) For radiated emissions from 9kHz to 30MHz



2) For radiated emissions from 30MHz to1GHz



3) For radiated emissions above 1GHz



3. Test Results

3.1. Antenna Requirement

3.1.1.Requirement

According to FCC 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. 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.

3.1.2.Test Result

The EUT has a permanently and irreplaceable attached antenna. Please refer to the EUT internal photos.

3.2. Duty Cycle of Test Signal

3.2.1.Requirement

Preferably, all measurements of maximum conducted (average) output power will be performed with the EUT transmitting continuously (i.e., with a duty cycle of greater than or equal to 98%).When continuous operation cannot be realized, then the use of sweep triggering/signal gating techniques can be used to ensure that measurements are made only during transmissions at the maximum power control level. Such sweep triggering/signal gating techniques will require knowledge of the minimum transmission duration(T) over which the transmitter is on and is transmitting at its maximum power control level for the tested mode of operation. Sweep triggering/signal gating techniques can then be used if the measurement/sweep time of the analyzer can be set such that it does not exceed T at any time that data are being acquired (i.e.,no transmitter OFF-time is to be considered).
When continuous transmission cannot be achieved and sweep triggering/signal gating cannot be implemented, alternative procedures are provided that can be used to measure the average power; however, they will require an additional measurement of the transmitter duty cycle (D). Within this sub clause, the duty cycle refers to the fraction of time over which the transmitter is ON and is transmitting at its maximum power control level. The duty cycle is considered to be constant if variations are less than ±2%; otherwise, the duty cycle is considered to be non constant.

3.2.2.Test Result

Refer to Annex A.1 in this report.

3.3. Maximum Peak Conducted Output Power

3.3.1. Requirement

According to FCC section 15.247(b)(3), For systems using digital modulation in the 902-928 MHz, 2400-2483.5 MHz, and 5725-5850 MHz bands: The maximum peak conducted output power of the intentional radiator shall not exceed 1 Watt.

3.3.2. Test Procedures

KDB 558074 Section 8.3.1 was used in order to prove compliance.

3.3.3. Test Setup Layout

Refer to chapter 2.6.1 in this report.

3.3.4. Test Result

Refer to Annex A.2 in this report.

3.4. Maximum Average Conducted Output Power

3.4.1. Requirement

According to FCC section 15.247(b)(3), for systems using digital modulation in the 902-928 MHz, 2400-2483.5 MHz, and 5725-5850 MHz bands: The maximum average conducted output power of the intentional radiator shall not exceed 1 Watt.

3.4.2. Test Procedures

KDB 558074 Section 8.3.2 was used in order to prove compliance.

3.4.3. Test Setup Layout

Refer to chapter 2.6.1 in this report.

3.4.4. Test Result

Refer to Annex A.3 in this report.

3.5.6 dB Bandwidth

3.5.1.Requirement

According to FCC section 15.247(a) (2), systems using digital modulation techniques may operate in the 902 - 928 MHz, 2400 - 2483.5 MHz, and 5725 - 5850 MHz bands. The minimum 6dB bandwidth shall be at least 500 kHz.

3.5.1.Test Procedures

The steps for the first option are as follows:
a) Set analyzer center frequency to channel center frequency
b) Set RBW to100kHz
c) Set VBW to 300kHz
d) Detector = peak.
e) Trace mode = max hold
f) Sweep time = auto couple
g) Allow the trace to fully stabilize
h) Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by6 dB relative to the maximum level measured in the fundamental emission
The automatic bandwidth measurement capability of an instrument may be employed using the X dB bandwidth mode with X set to 6 dB, if the functionality described in 11.8.1 (i.e., RBW = 100 kHz, VBW ≥ 3 ×RBW, and peak detector with maximum hold) is implemented by the instrumentation function. When using this capability, care shall be taken so that the bandwidth measurement is not influenced by any intermediate power nulls in the fundamental emission that might be ≥6 dB.

3.5.2.Test Setup Layout

Refer to chapter 2.6.1 in this report.

3.5.3.Test Result

Refer to Annex A.4 in this report.

3.6. Conducted Spurious Emissions and Band Edge

3.6.1. Requirement

According to FCC section 15.247(d), in any 100kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20dB below that in the 100kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement.

3.6.2. Test Procedures

KDB 558074 Section 8.5 and 8.7 was used in order to prove compliance.

3.6.3. Test Setup Layout

Refer to chapter 2.6.1 in this report.

3.6.4. Test Result

Refer to Annex A.5 and A.6 in this report.

3.7. Power Spectral Density

3.7.1.Requirement

For digitally modulated systems, the power spectral density conducted from the intentional radiator to the antenna shall not be greater than 8dBm in any 3 kHz band during any time interval of continuous transmission. This power spectral density shall be determined in accordance with the provisions of paragraph (b) of this section. The same method of determining the conducted output power shall be used to determine the power spectral density.

3.7.2.Test Procedures

The measured power spectral density was calculated by the reading of the spectrum analyzer and calibration. Following is the test procedure for PSD test:
a) Set analyzer center frequency to channel center frequency
b) Set span to1.5 times DTS
c) Set RBW to 3kHz
d) Set VBW to 10kHz
e) Detector = peak
f) Sweep time = auto couple
g) Trace mode = max hold
h) Allow trace to fully stabilize
i) Use the peak marker function to determine the maximum amplitude level within the RBW

3.7.3.Test Setup Layout

Refer to chapter 2.6.1 in this report.

3.7.4.Test Result

Refer to Annex A.7 in this report.

3.8. Conducted Emission

3.8.1.Requirement

According to FCC section 15.207, for an intentional radiator that is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC power line on any frequency within the band 150kHz to 30MHz shall not exceed the limits in the following table, as measured using a 50μH/50Ω line impedance stabilization network (LISN).

Frequency Range (MHz)	Conducted Limit (dBμV)	
	Quai-peak	Average
0.15 - 0.50	66 to 56	56 to 46
0.50 - 5	56	46
5 - 30	60	50

Note:

(a) The lower limit shall apply at the band edges.

(b) The limit decreases linearly with the logarithm of the frequency in the range 0.15 - 0.50MHz.

3.8.2.Test Procedures

The Table-top EUT was placed upon a non-metallic table 0.8m above the horizontal metal reference ground plane. EUT was connected to LISN and LISN was connected to reference Ground Plane. EUT was 80cm from LISN. The set-up and test methods were according to ANSI C63.10: 2013.

3.8.3.Test Setup Layout

Refer to chapter 2.6.2 in this report.

3.8.4.Test Result

This test case does not apply this kind of EUT.

3.9. Radiated Emission

3.9.1.Requirement

According to FCC section 15.247(d), radiated emission outside the frequency band attenuation below the general limits specified in FCC section 15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in FCC section 15.205(a), must also comply with the radiated emission limits specified in FCC section 15.209(a).

According to FCC section 15.209 (a), except as provided elsewhere in this subpart, the emissions from an intentional radiator shall not exceed the field strength levels specified in the following table:

Frequency (MHz)	Field Strength (μV/m)	Measurement Distance (m)
0.009 - 0.490	2400/F(kHz)	300
0.490 - 1.705	24000/F(kHz)	30
1.705 - 30.0	30	30
30 - 88	100	3
88 - 216	150	3
216 - 960	200	3
Above 960	500	3

Note1: For above 1000MHz, the emission limit in this paragraph is based on measurement instrumentation employing an average detector, measurement using instrumentation with a peak detector function, corresponding to 20dB above the maximum permitted average limit.
Note2: For above 1000MHz, limit field strength of harmonics: 54dBuV/m@3m (AV) and 74dBuV/m@3m (PK).In addition, radiated emissions which fall in the restricted bands, as defined in Section 15.205(a), also should comply with the radiated emission limits specified in Section 15.209(a)(above table).

3.9.2.Test Procedures

The EUT is placed on a non-conducting table 80 cm above the ground plane for measurement below 1GHz; 1.5 m above the ground plane for measurement above 1GHz.The antenna to EUT distance is 3meters. The EUT is configured in accordance with ANSI C63.10. The EUT is set to transmit in a continuous mode.

For measurements below 30MHz, the emission limits shown in the above table are based on measurements employing a CISPR quasi-peak detector except for the frequency bands 9kHz-90 kHz, 110kHz-490 kHz. Radiated emission limits in these two bands are based on measurements employing an average detector.

For measurements below 1GHz the resolution bandwidth is set to 100kHz for peak detection measurements or 120kHz for quasi-peak detection measurements. Peak detection is used unless otherwise noted as quasi-peak.

For measurements above 1GHz the resolution bandwidth is set to 1MHz, the video band width is set to 3MHz for peak measurements and as applicable for average measurements.

The EUT is rotated through 360 degrees to maximize emissions received. The antenna is scanned from 1 to 4 meters above the ground plane to further maximize the emission. Measurements are made with the antenna polarized in both the vertical and the horizontal positions. For measurements above 1 GHz, keeping the measurement antenna aimed at the source of emissions at each frequency of significant emissions, with polarization oriented for maximum response.

3.9.3.Test Setup Layout

Refer to chapter 2.6.3 in this report.

3.9.4.Test Result

Refer to Annex A.8 in this report.

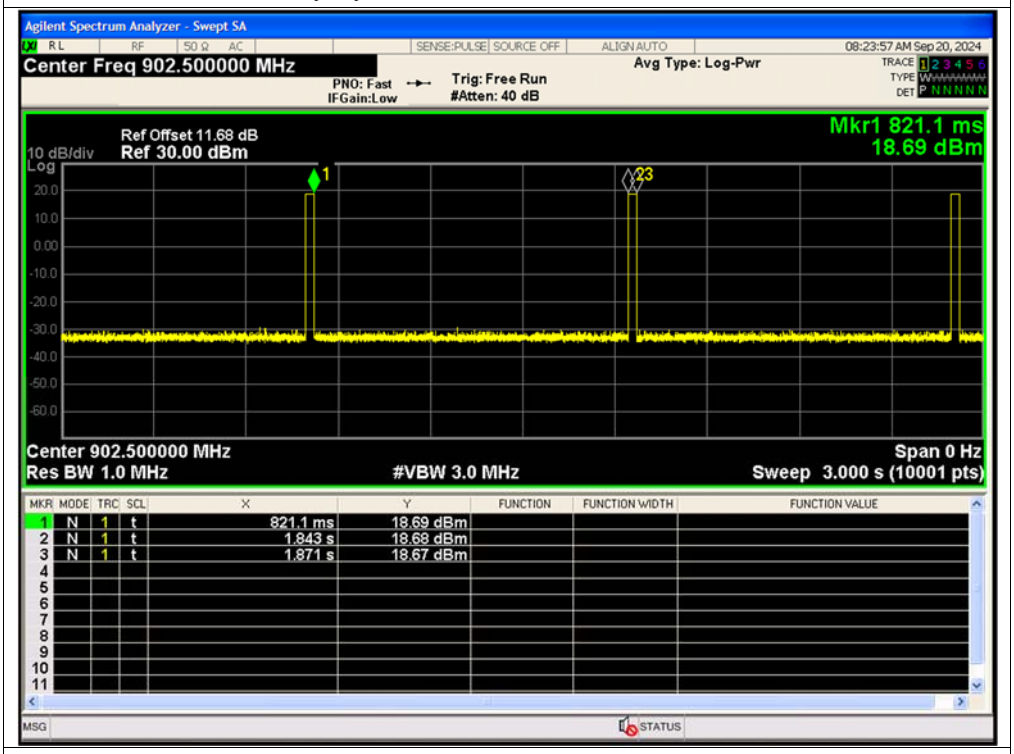
Annex A Test Data and Result

A.1. Duty Cycle of Test Signal

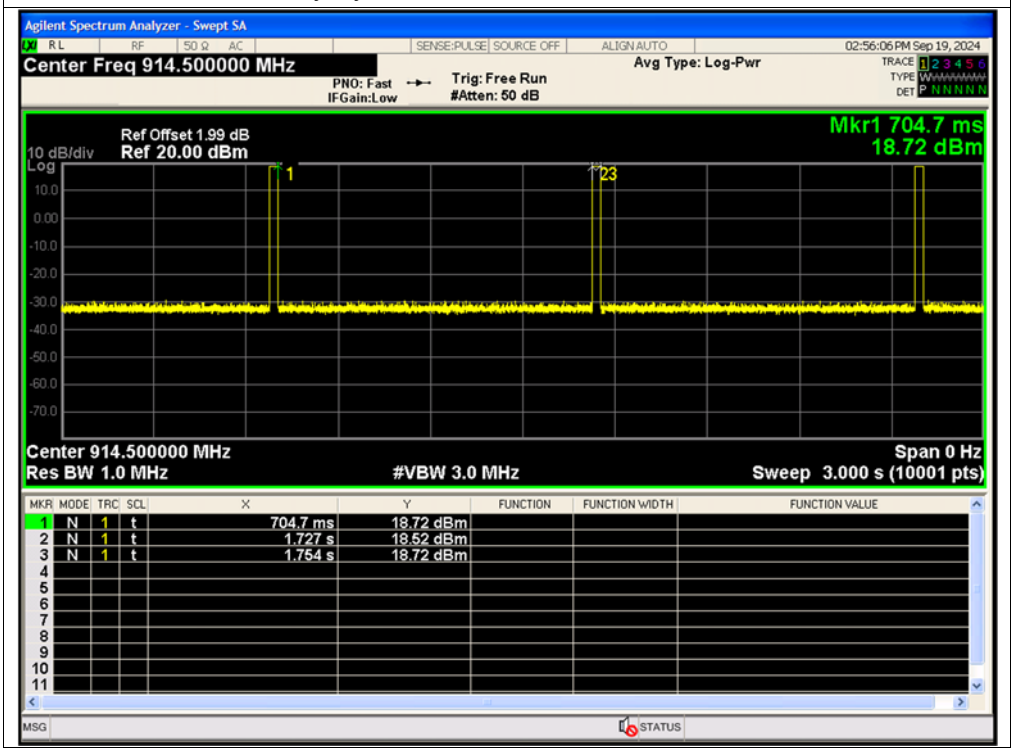
Condition	Mode	Frequency (MHz)	Antenna	Duty Cycle (%)	Correction Factor (dB)	1/T (kHz)
NVNT	LoRa	902.5	Ant1	2.6	15.85	0.04
NVNT	LoRa	914.5	Ant1	2.6	15.85	0.04
NVNT	LoRa	927.5	Ant1	2.6	15.85	0.04

Test Graphs

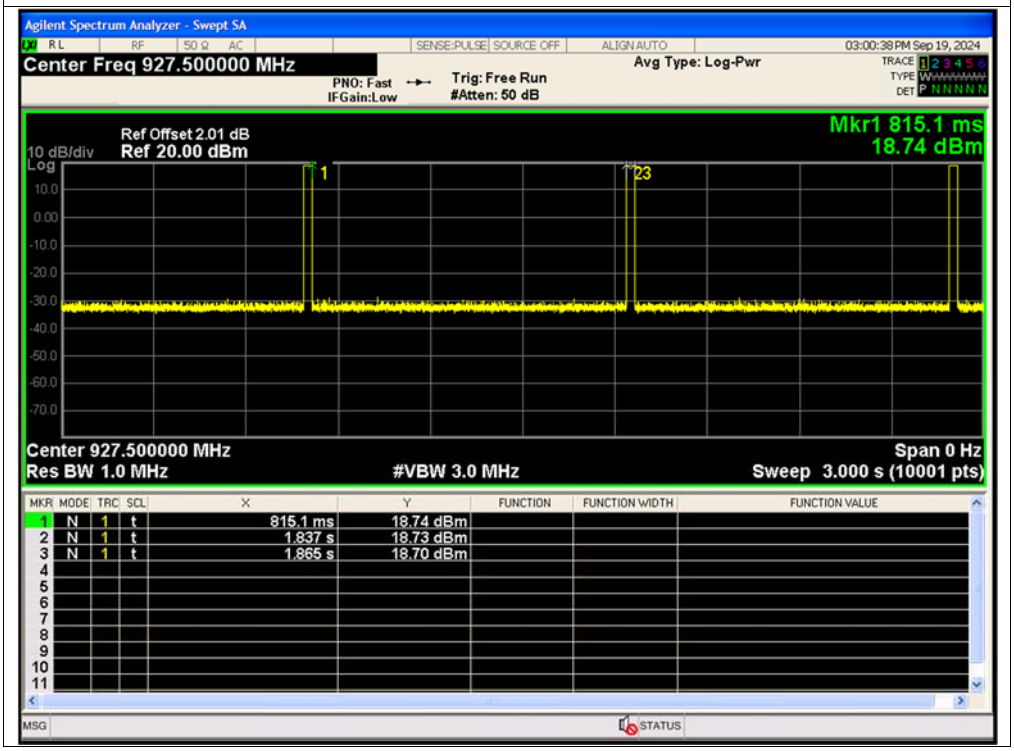
Duty Cycle NVNT LoRa 902.5MHz Ant1



Duty Cycle NVNT LoRa 914.5MHz Ant1



Duty Cycle NVNT LoRa 927.5MHz Ant1

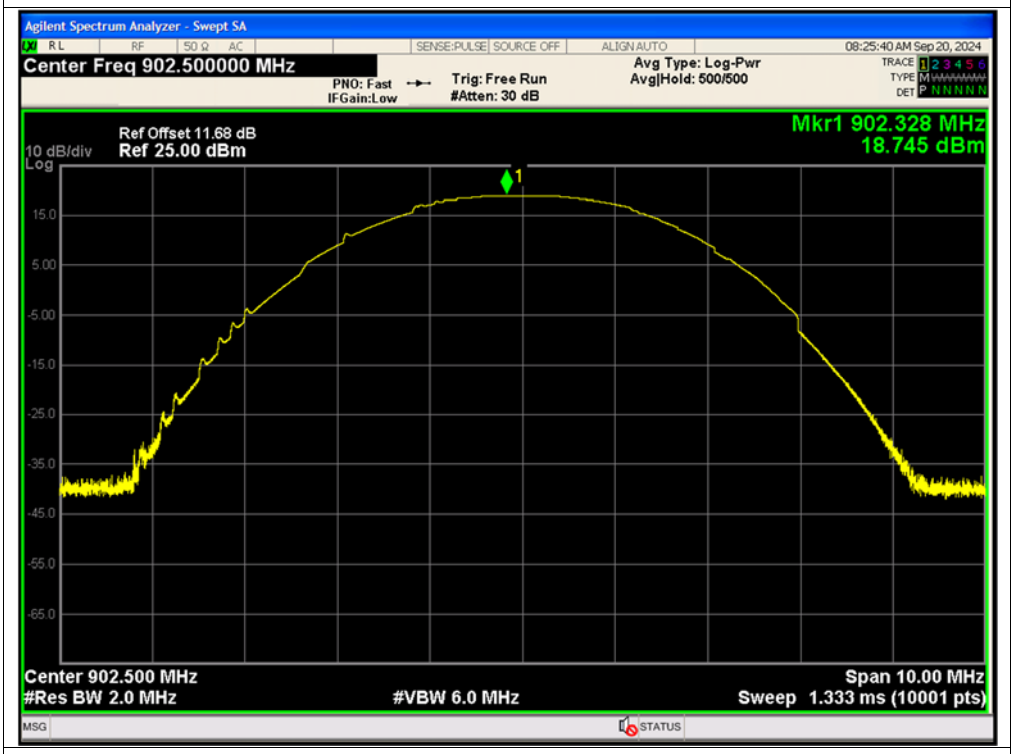


A.2. Maximum Peak Conducted Output Power

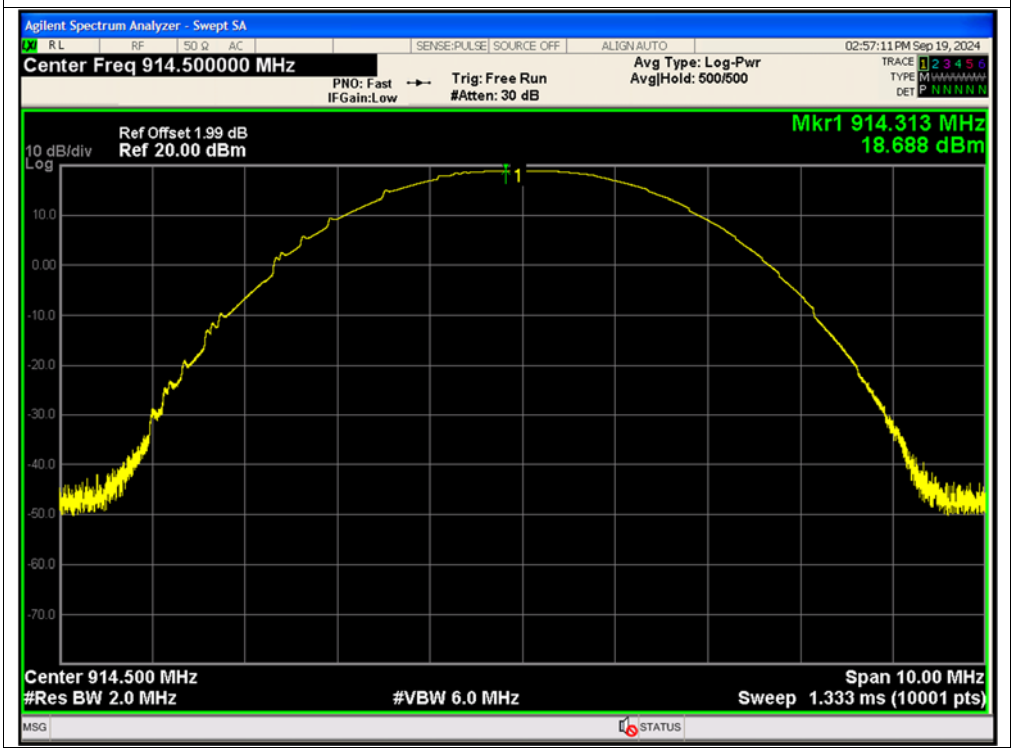
Condition	Mode	Frequency (MHz)	Antenna	Conducted Power (dBm)	Duty Factor (dB)	Total Conducted Power (dBm)	Total Conducted Power (W)	Limit (dBm)	Verdict
NVNT	LoRa	902.5	Ant1	18.75	0	18.75	0.07499	30	Pass
NVNT	LoRa	914.5	Ant1	18.69	0	18.69	0.07396	30	Pass
NVNT	LoRa	927.5	Ant1	18.63	0	18.63	0.07295	30	Pass

Test Graphs

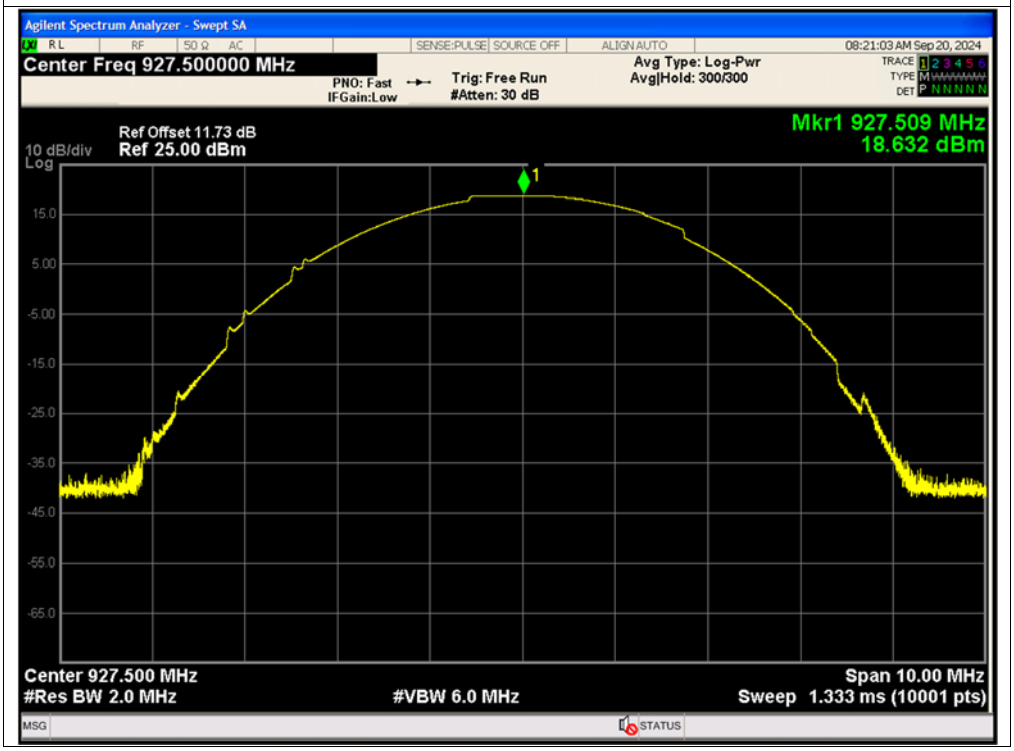
Peak Power NVNT LoRa 902.5MHz Ant1



Peak Power NVNT LoRa 914.5MHz Ant1



Peak Power NVNT LoRa 927.5MHz Ant1

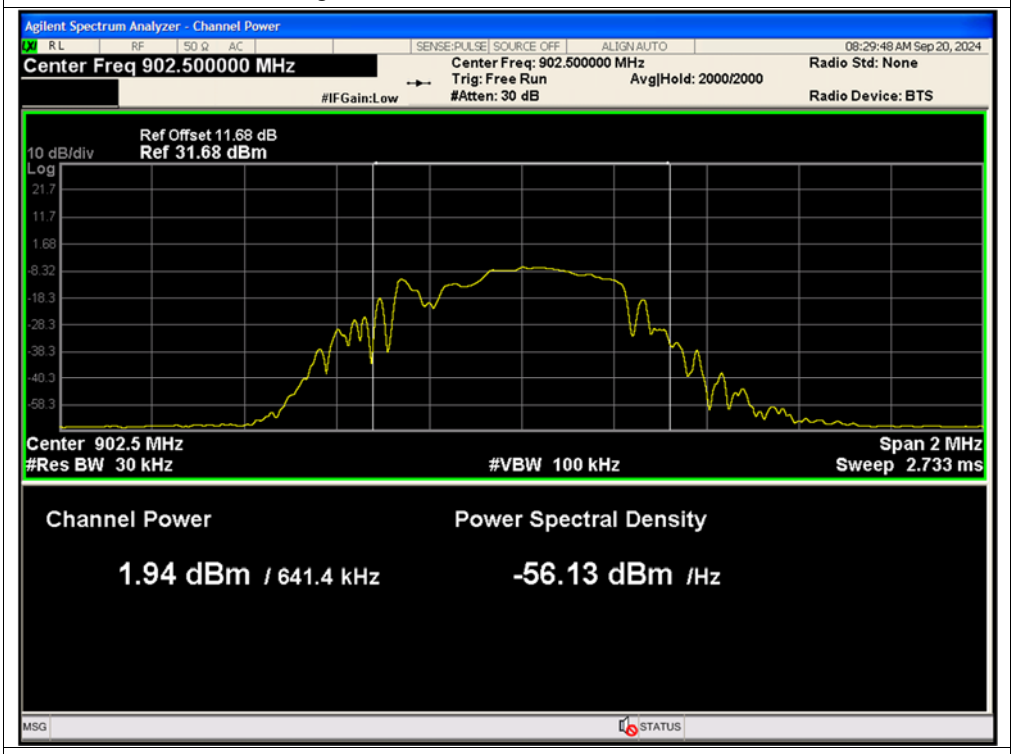


A.3. Maximum Average Conducted Output Power

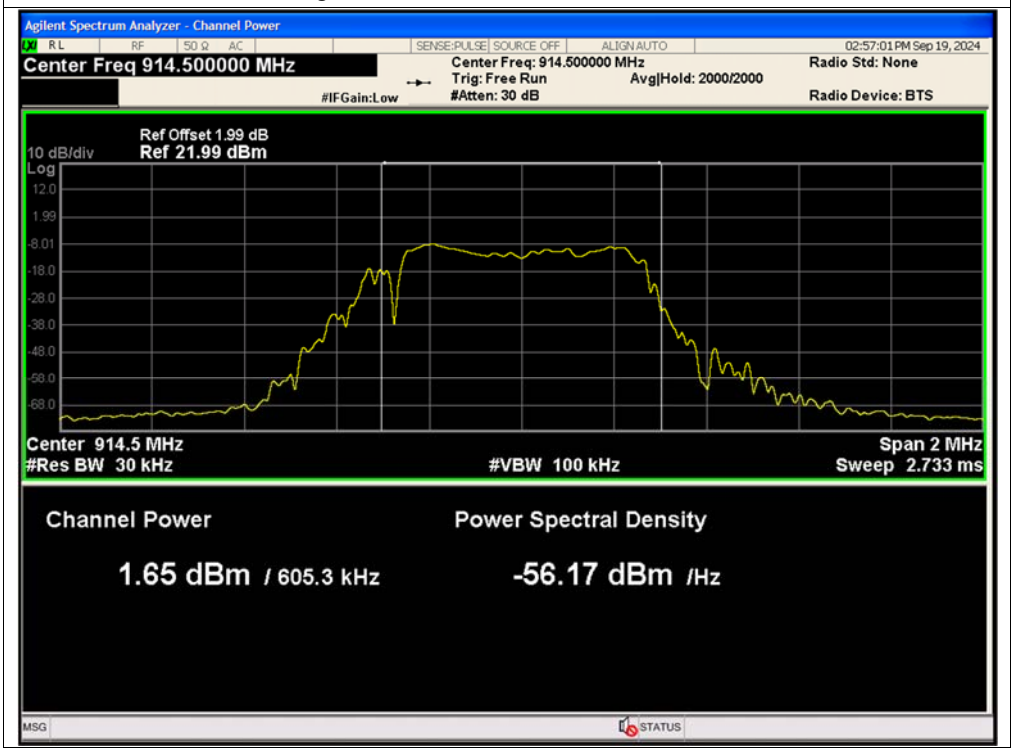
Condition	Mode	Frequency (MHz)	Antenna	Conducted Power (dBm)	Duty Factor (dB)	Total Conducted Power (dBm)	Total Conducted Power (W)	Limit (dBm)	Verdict
NVNT	LoRa	902.5	Ant1	1.94	15.85	17.79	0.06012	30	Pass
NVNT	LoRa	914.5	Ant1	1.65	15.85	17.50	0.05623	30	Pass
NVNT	LoRa	927.5	Ant1	2.32	15.85	18.17	0.06561	30	Pass

Test Graphs

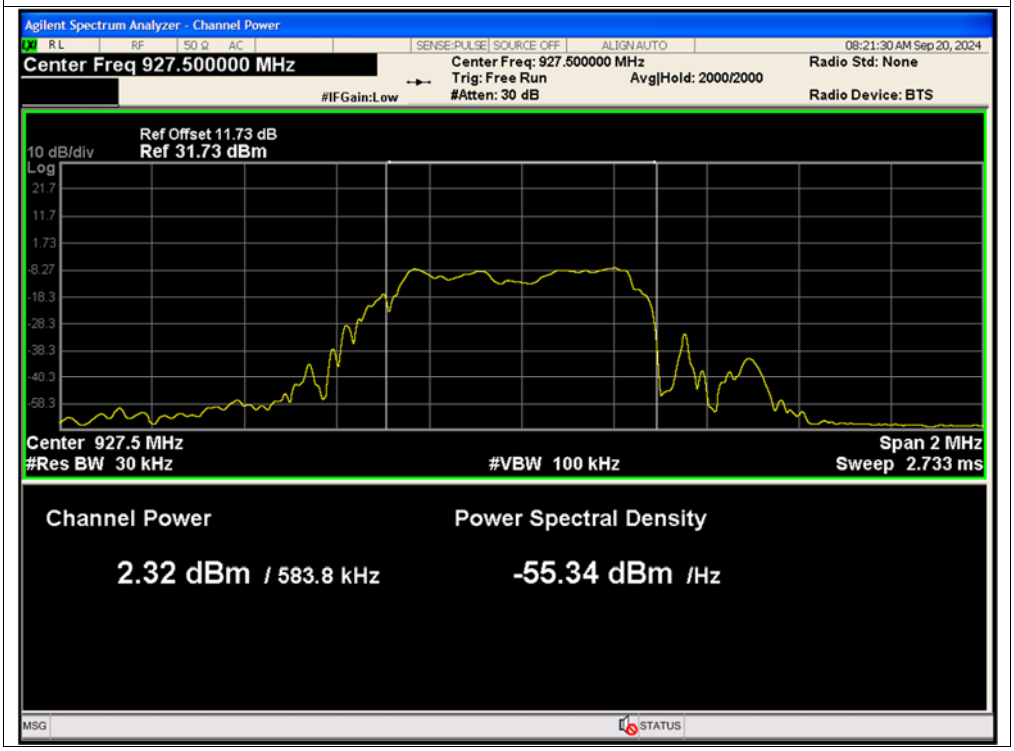
Average Power NVNT LoRa 902.5MHz Ant1



Average Power NVNT LoRa 914.5MHz Ant1



Average Power NVNT LoRa 927.5MHz Ant1

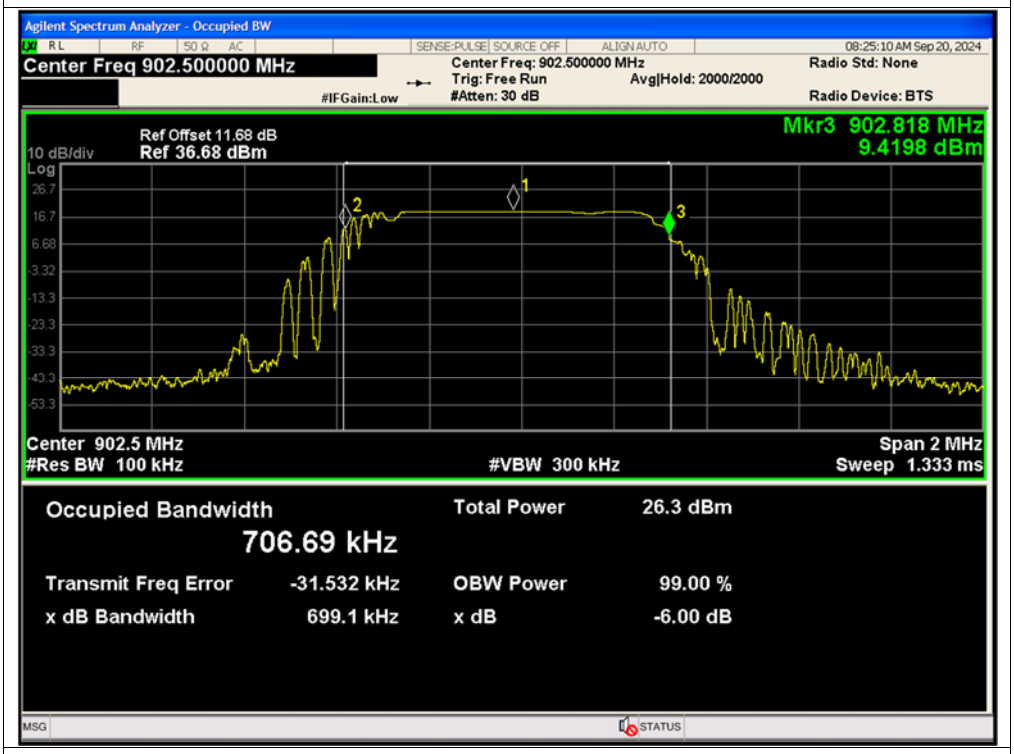


A.4. 6 dB Bandwidth

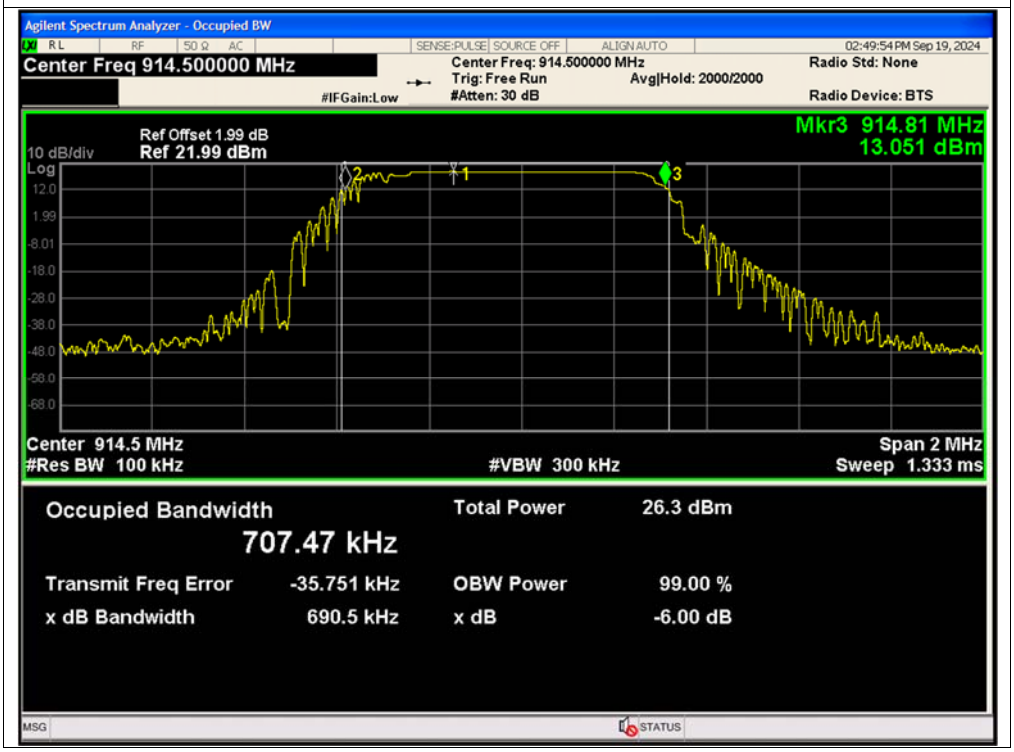
Condition	Mode	Frequency (MHz)	Antenna	-6 dB Bandwidth (MHz)	Limit -6 dB Bandwidth (MHz)	Verdict
NVNT	LoRa	902.5	Ant1	0.699	0.5	Pass
NVNT	LoRa	914.5	Ant1	0.691	0.5	Pass
NVNT	LoRa	927.5	Ant1	0.714	0.5	Pass

Test Graphs

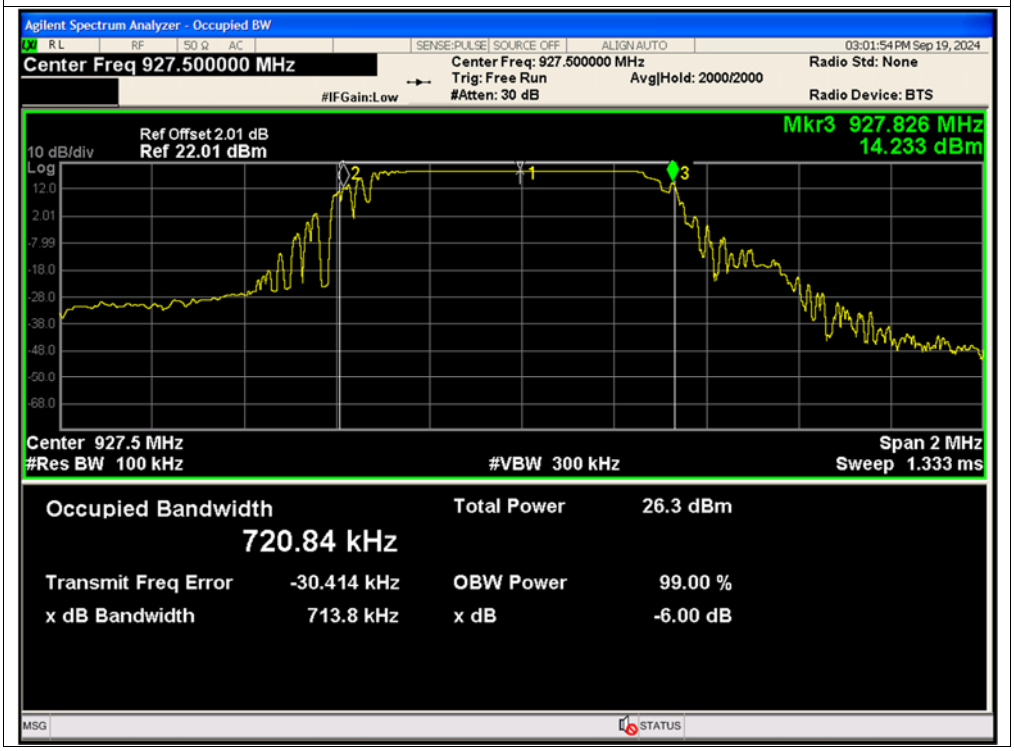
-6dB Bandwidth NVNT LoRa 902.5MHz Ant1



-6dB Bandwidth NVNT LoRa 914.5MHz Ant1



-6dB Bandwidth NVNT LoRa 927.5MHz Ant1



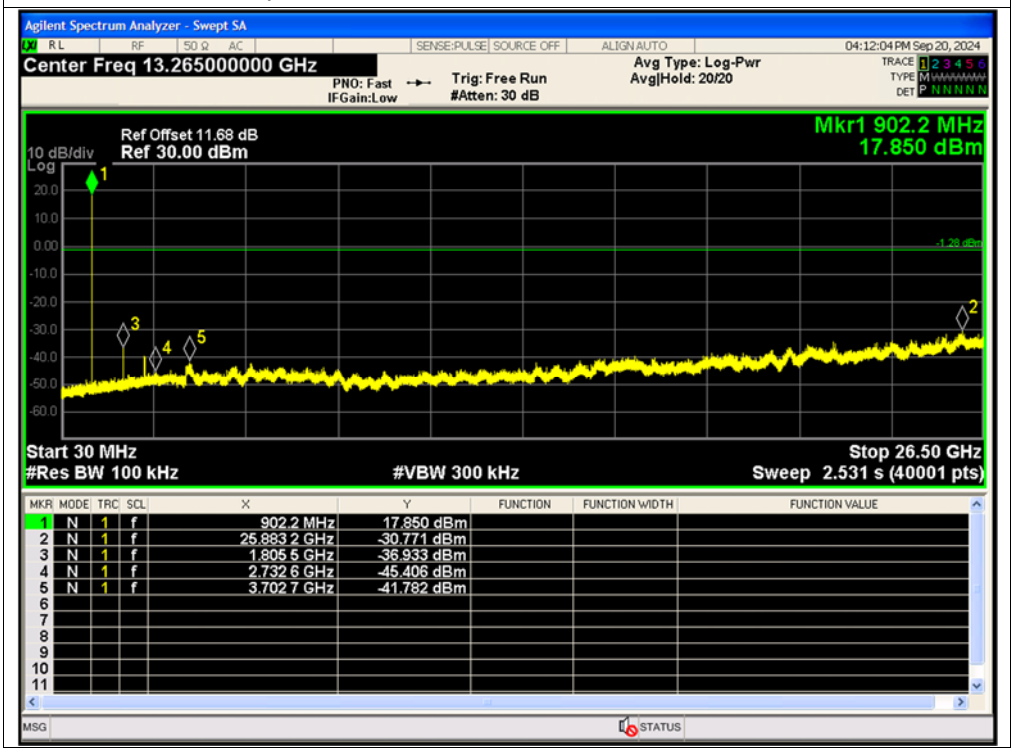
A.5. Conducted Spurious Emissions

Condition	Mode	Frequency (MHz)	Antenna	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	LoRa	902.5	Ant1	-49.49	-20	Pass
NVNT	LoRa	914.5	Ant1	-49.18	-20	Pass
NVNT	LoRa	927.5	Ant1	-48.51	-20	Pass

Test Graphs

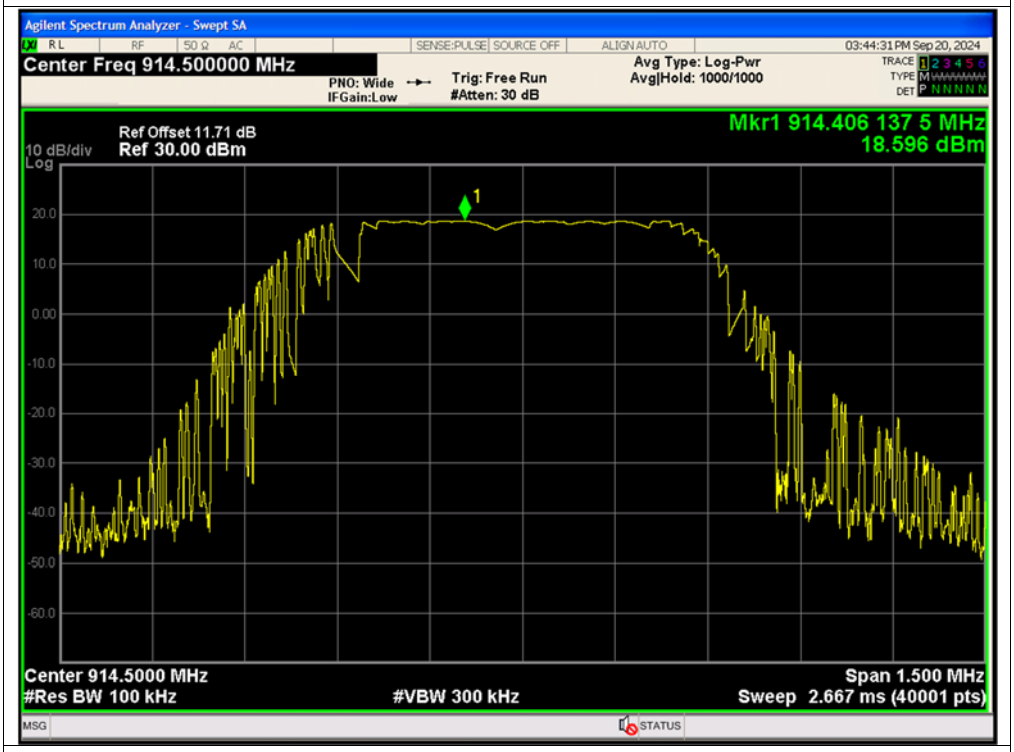
Tx. Spurious NVNT LoRa 902.5MHz Ant1 Ref

Tx. Spurious NVNT LoRa 902.5MHz Ant1 Emission

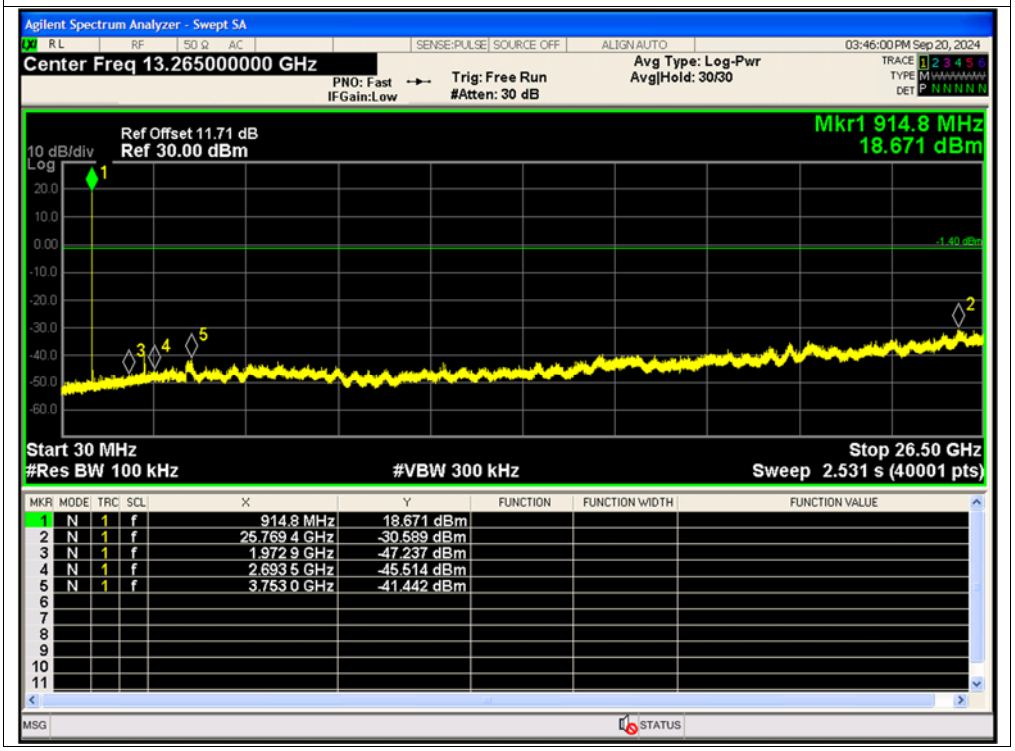


MKR	MODE	TRC	SCL	X	Y	FUNCTION	FUNCTION WIDTH	FUNCTION VALUE
1	N	1	f	902.2 MHz	17.850 dBm			
2	N	1	f	25.883 2 GHz	-30.771 dBm			
3	N	1	f	1.805 5 GHz	-36.933 dBm			
4	N	1	f	2.732 6 GHz	-45.406 dBm			
5	N	1	f	3.702 7 GHz	-41.782 dBm			
6								
7								
8								
9								
10								
11								

Tx. Spurious NVNT LoRa 914.5MHz Ant1 Ref

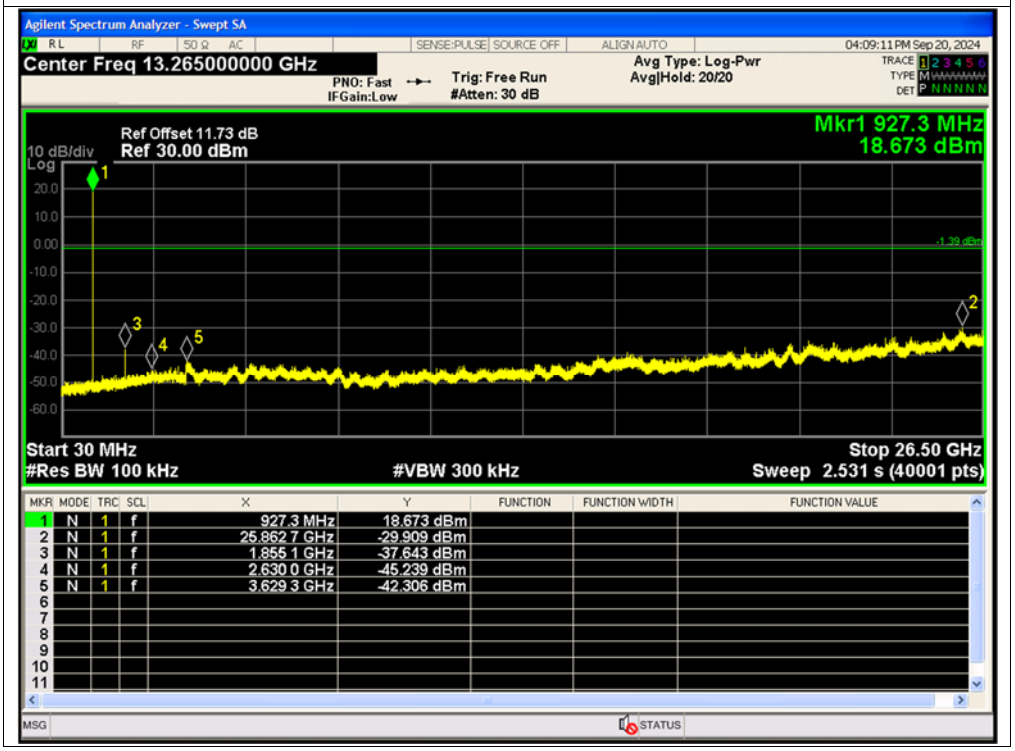


Tx. Spurious NVNT LoRa 914.5MHz Ant1 Emission



Tx. Spurious NVNT LoRa 927.5MHz Ant1 Ref

Tx. Spurious NVNT LoRa 927.5MHz Ant1 Emission

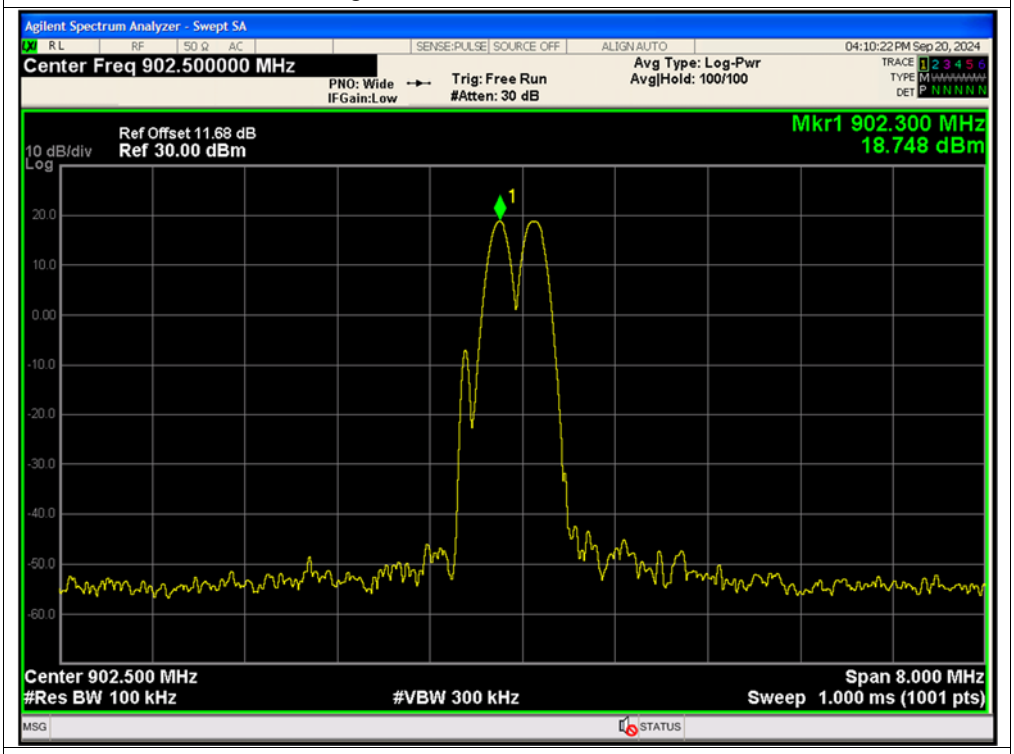


A.6. Band Edge

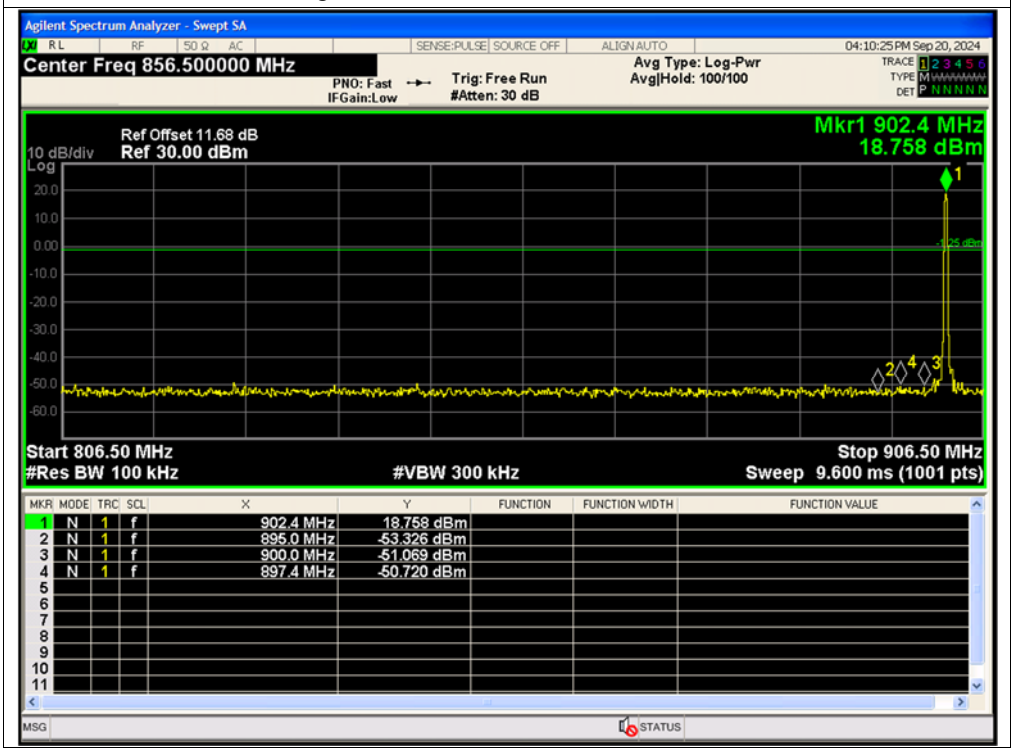
Condition	Mode	Frequency (MHz)	Antenna	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	LoRa	902.5	Ant1	-69.46	-20	Pass
NVNT	LoRa	927.5	Ant1	-45.36	-20	Pass

Test Graphs

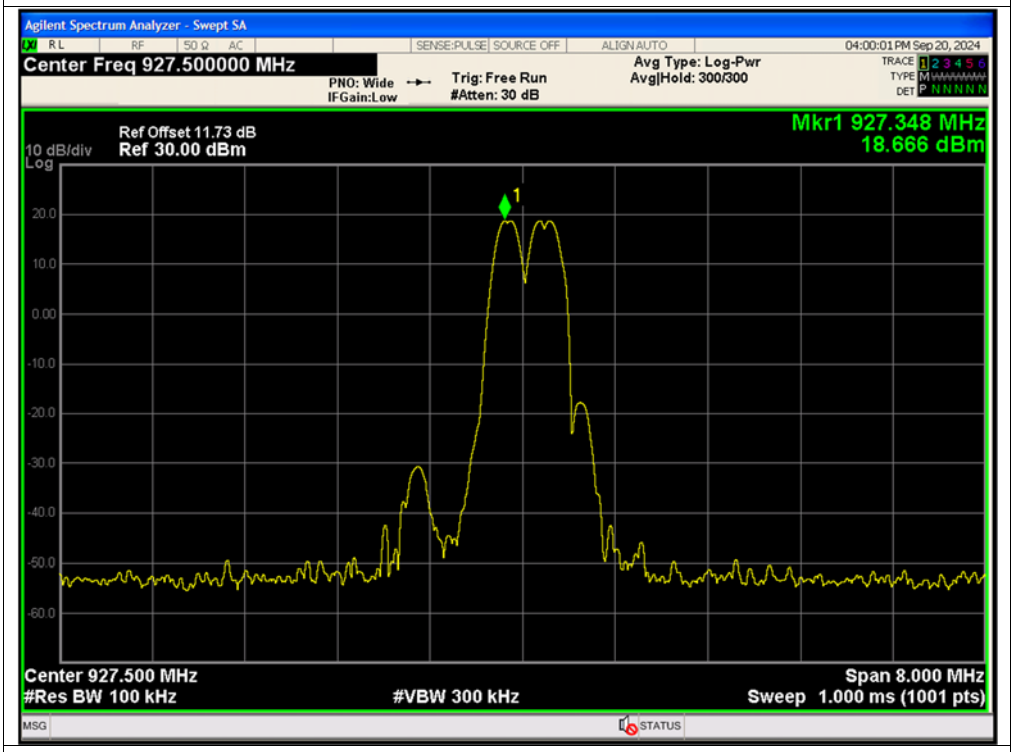
Band Edge NVNT LoRa 902.5MHz Ant1 Ref



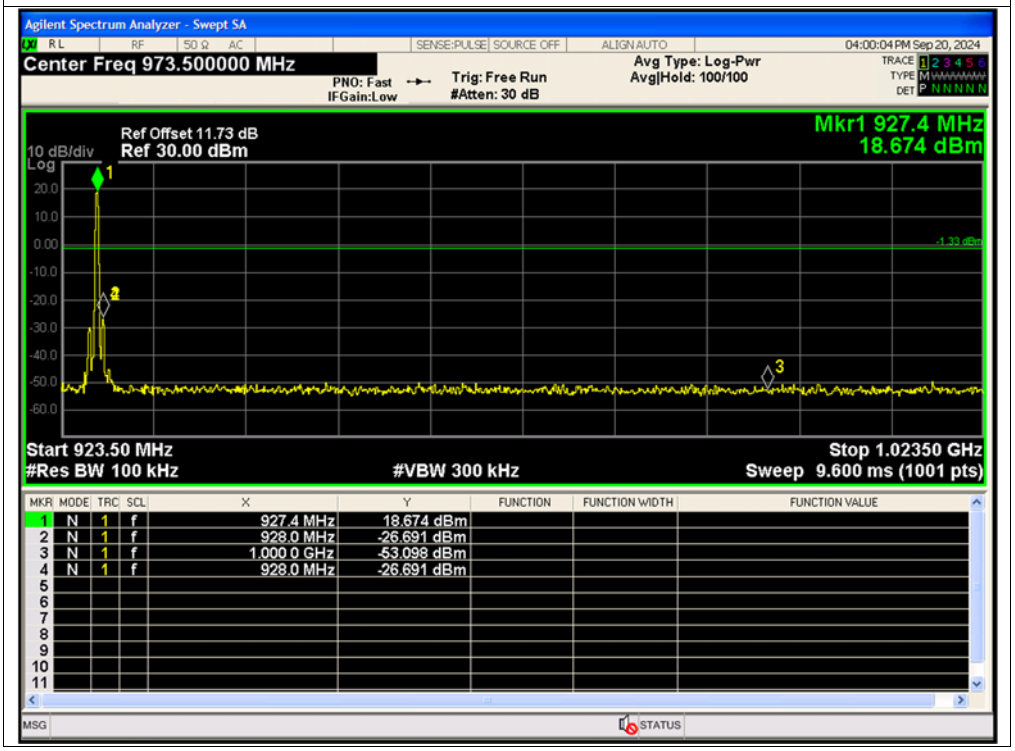
Band Edge NVNT LoRa 902.5MHz Ant1 Emission



Band Edge NVNT LoRa 927.5MHz Ant1 Ref



Band Edge NVNT LoRa 927.5MHz Ant1 Emission



A.7. Power Spectral Density

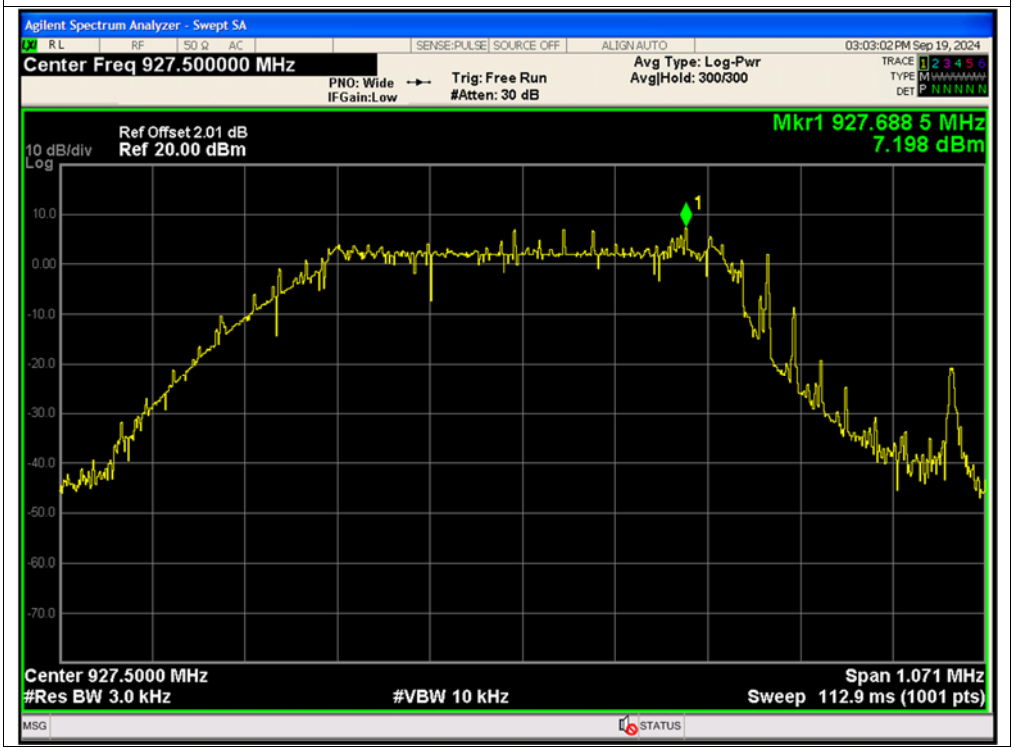
Condition	Mode	Frequency (MHz)	Antenna	Conducted PSD (dBm/3kHz)	Duty Factor (dB)	Total PSD (dBm/3kHz)	Limit (dBm/3kHz)	Verdict
NVNT	LoRa	902.5	Ant1	7.74	0	7.74	8	Pass
NVNT	LoRa	914.5	Ant1	7.54	0	7.54	8	Pass
NVNT	LoRa	927.5	Ant1	7.20	0	7.20	8	Pass

Test Graphs

PSD NVNT LoRa 902.5MHz Ant1

PSD NVNT LoRa 914.5MHz Ant1

PSD NVNT LoRa 927.5MHz Ant1



A.8. Radiated Emission

According to ANSI C63.10, because of peak detection will yield amplitudes equal to or greater than amplitudes measured with the quasi-peak (or average) detector, the measurement data from a spectrum analyzer peak detector will represent the worst-case results, if the peak measured value complies with the quasi-peak (or average) limit, it is unnecessary to perform an quasi-peak measurement (or average).

The measurement results are obtained as below:

E [dBμV/m] $=U_R + A_T + A_{Factor}$ [dB]; $A_T = L_{Cable\ loss}$ [dB]$-G_{preamp}$ [dB]

A_T: Total correction Factor except Antenna

U_R: Receiver Reading

G_{preamp}: Preamplifier Gain

A_{Factor}: Antenna Factor at 3m

During the test, the total correction Factor A_T and A_{Factor} were built in test software.

Note1: All radiated emission tests were performed in X, Y, Z axis direction. And only the worst axis test condition was recorded in this test report.

Note2: For the frequency, which started from 9kHz to 30MHz, was pre-scanned and the result which was 20dB lower than the limit was not recorded.

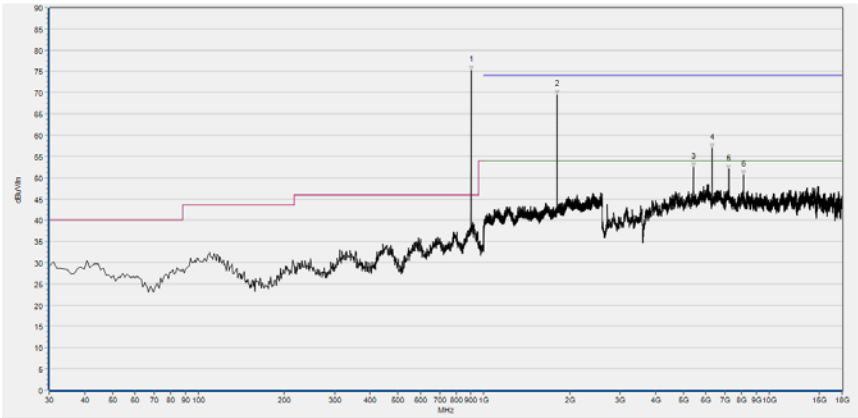
Note 3: N/A means the frequency is the basic frequency or the base station frequency, they are no need to verdict.

Field strength of fundamental:

Frequency (MHz)	Reading_Peak (dBμV/m)	Antenna Factor (dB)	Path Loss (dB)	Final_Peak (dBμV/m)	Antenna Polarity
914.34	78.49	21.70	6.20	106.39	Horizontal

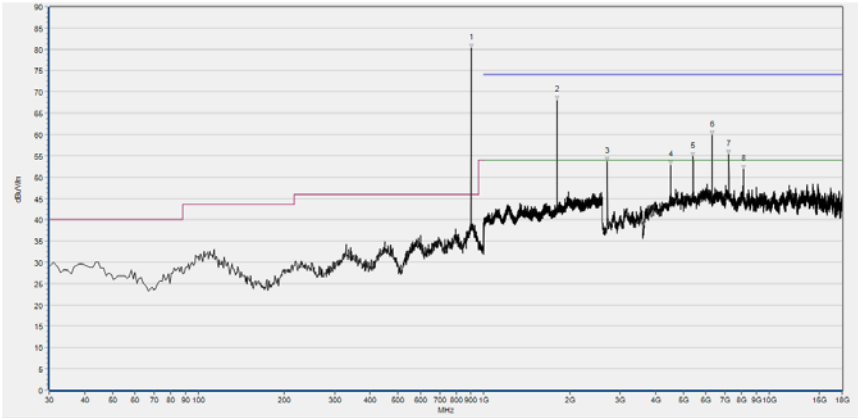
The field strength(the lowest) of fundamenta is more than 20dB higher than the unwanted emissions, in accordance with FCC part 15.215(b).

Plot for Channel 1



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
902.030	75.32	N/A	N/A	N/A	46.00	N/A	Horizontal	PASS
1804.800	69.47	N/A	52.97	74.00	N/A	54.00	Horizontal	PASS
5415.120	52.47	N/A	35.97	74.00	N/A	54.00	Horizontal	PASS
6317.560	57.02	N/A	40.52	74.00	N/A	54.00	Horizontal	PASS
7220.000	52.02	N/A	35.52	74.00	N/A	54.00	Horizontal	PASS
8119.360	50.64	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS

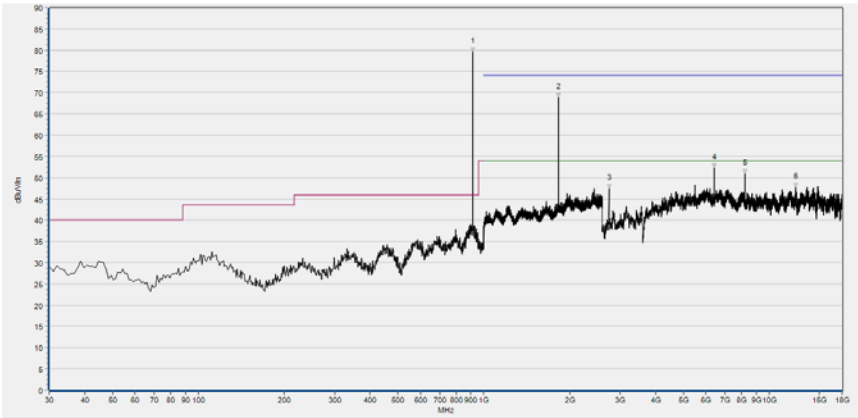
(Antenna Horizontal, 30MHz to 18GHz)



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
902.030	80.35	N/A	N/A	N/A	46.00	N/A	Vertical	PASS
1804.800	68.00	N/A	51.50	74.00	N/A	54.00	Vertical	PASS
2707.800	53.58	N/A	37.08	74.00	N/A	54.00	Vertical	PASS
4512.680	52.86	N/A	36.36	74.00	N/A	54.00	Vertical	PASS
5412.040	54.81	N/A	38.31	74.00	N/A	54.00	Vertical	PASS
6317.560	59.81	N/A	43.31	74.00	N/A	54.00	Vertical	PASS
7220.000	55.23	N/A	38.73	74.00	N/A	54.00	Vertical	PASS

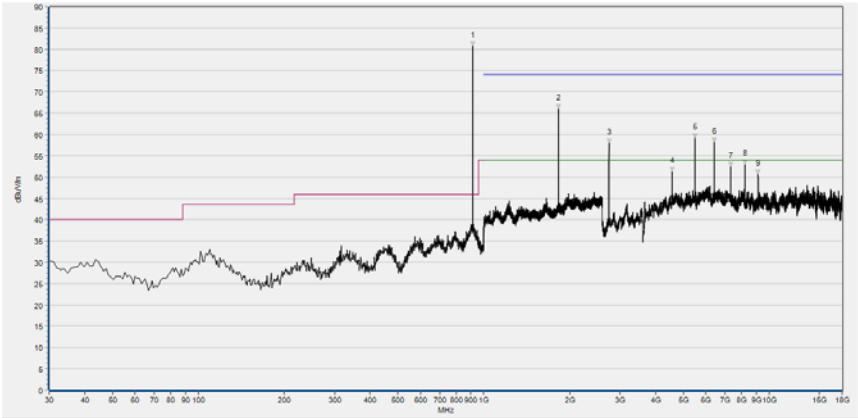
(Antenna Vertical, 30MHz to 18GHz)

Plot for Channel 13



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
914.640	79.69	N/A	N/A	N/A	46.00	N/A	Horizontal	PASS
1828.267	68.89	N/A	52.39	74.00	N/A	54.00	Horizontal	PASS
2744.760	47.42	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS
6400.720	52.21	N/A	35.71	74.00	N/A	54.00	Horizontal	PASS
8227.160	50.93	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS
12375.920	47.69	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS

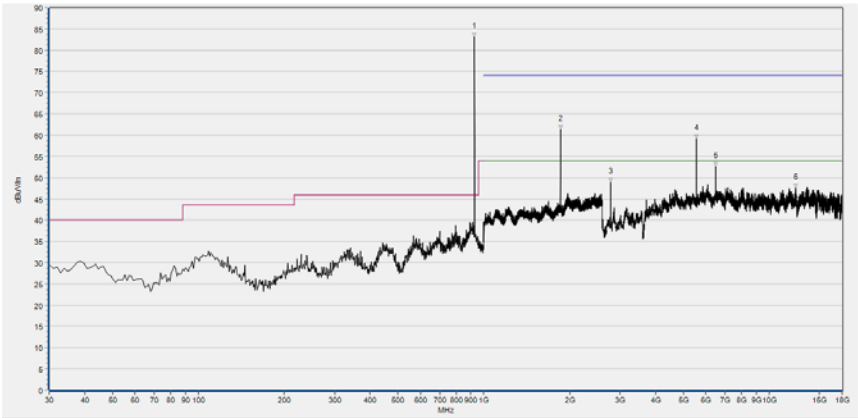
(Antenna Horizontal, 30MHz to 18GHz)



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
914.640	80.74	N/A	N/A	N/A	46.00	N/A	Vertical	PASS
1829.333	65.99	N/A	49.49	74.00	N/A	54.00	Vertical	PASS
2744.760	57.94	N/A	41.44	74.00	N/A	54.00	Vertical	PASS
4574.280	51.31	N/A	34.81	74.00	N/A	54.00	Vertical	PASS
5485.960	59.09	N/A	42.59	74.00	N/A	54.00	Vertical	PASS
6400.720	58.07	N/A	41.57	74.00	N/A	54.00	Vertical	PASS
7315.480	52.48	N/A	35.98	74.00	N/A	54.00	Vertical	PASS

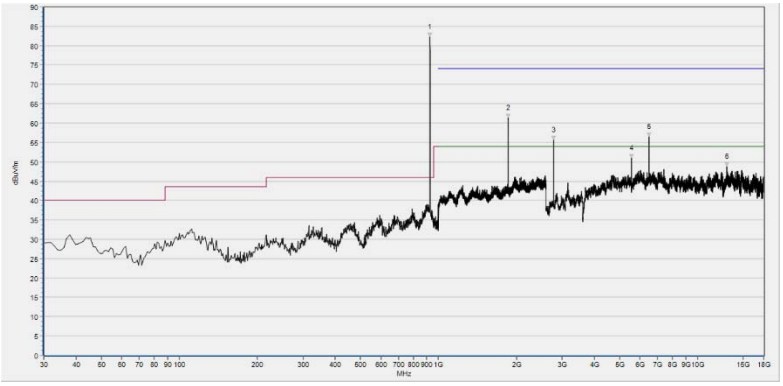
(Antenna Vertical, 30MHz to 18GHz)

Plot for Channel 26



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
927.250	83.19	N/A	N/A	N/A	46.00	N/A	Horizontal	PASS
1854.933	61.36	N/A	44.86	74.00	N/A	54.00	Horizontal	PASS
2781.720	48.93	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS
5562.960	59.14	N/A	42.64	74.00	N/A	54.00	Horizontal	PASS
6490.040	52.59	N/A	36.09	74.00	N/A	54.00	Horizontal	PASS
12348.200	47.54	N/A	N/A	74.00	N/A	54.00	Horizontal	PASS

(Antenna Horizontal, 30MHz to 18GHz)



Fre. (MHz)	PK (dBμV/m)	QP (dBμV/m)	AV (dBμV/m)	Limit-PK (dBμV/m)	Limit-QP (dBμV/m)	Limit-AV (dBμV/m)	Antenna	Verdict
927.250	82.24	N/A	N/A	N/A	46.00	N/A	Vertical	PASS
1854.400	61.34	N/A	44.84	74.00	N/A	54.00	Vertical	PASS
2781.720	55.58	N/A	39.08	74.00	N/A	54.00	Vertical	PASS
5566.040	51.00	N/A	34.50	74.00	N/A	54.00	Vertical	PASS
6493.120	56.53	N/A	40.03	74.00	N/A	54.00	Vertical	PASS
12985.760	48.78	N/A	N/A	74.00	N/A	54.00	Vertical	PASS

(Antenna Vertical, 30MHz to 18GHz)

END OF REPORT