

RF TEST REPORT

FCC / ISED

APPLICANT

Safetrust Inc

MODEL NAME

SA520

FCC ID

2ANI5SA520

ISED ID

23133-SA520

REPORT NUMBER

HA2507-0174-R02-01

TEST REPORT

Date of Issue

March 5, 2026

Test Site

HCT America, Inc.
840 Yosemite Way, Milpitas, CA 95035, USA

Applicant	Safetrust Inc
Applicant Address	8112 Mill Creek Rd, Fremont, CA 94539, U.S.A.
FCC ID	2ANI5SA520
ISED ID	23133-SA520
Model Name	SA520
EUT Type	IoT Sensor
Modulation Type	125 kHz (ASK/FSK)
FCC Classification	Low Power Transmitter Below 1705 kHz (DCD)
FCC Rule Part(s)	Part 15.209, Part 15.207
ISED Rule Part(s)	RSS-210 Issue 11 (June 2024) RSS-Gen Issue 5 Amd 2 (February 2021)
Test Procedure	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024, KDB 558074 D01 v05r02

The device bearing the trade name and model specified above, has been shown to comply with the applicable technical standards as indicated in the measurement report and was tested in accordance with the measurement procedures required. The results of testing in this report apply only to the product which was tested. Other similar equipment will not necessarily produce the same results due to production tolerance and measurement uncertainties.

I attest to the accuracy of data. All measurements reported herein were performed by me or were made under my supervision and are correct to the best of my knowledge and belief. I assume full responsibility for the completeness of these measurements and vouch for the qualifications of all persons taking them.

HCT America, Inc. certifies that no party to application has been denied the FCC benefits pursuant to Section 5301 of the Anti-Drug Abuse Act of 1988, 21 U.S.C 862

Tested By



John Park

Test Engineer

Reviewed By



Dan Coronía

Technical Manager

REVISION HISTORY

The revision history for this document is shown in table.

TEST REPORT NO.	REVISION	DATE	DESCRIPTION
HA2507-0174-R02	0	October 17, 2025	Initial Issue
HA2507-0174-R02-01	1	March 5, 2026	Add AC Power Line Emission

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1. GENERAL INFORMATION

EUT DESCRIPTION

Model	SA520
EUT Type	IoT Sensor
Serial Number	Radiated: SN3
Power Supply	12 V d.c.
RF Specification	WIFI 2.4GHz: 802.11b/g/n(HT20) WIFI 5 GHz (U-NII 3): 802.11a/n(HT20/40)/ ac(VHT20/40/80) Bluetooth LE MCU (1Mbps) Bluetooth LE MESH (1Mbps) RFID (LF/HF) 60GHz radar
Transmitter Chain	WIFI 2.4 GHz: SISO WIFI 5 GHz: SISO Bluetooth LE: SISO 60GHz Radar: 1 Tx, 4 Rx
Operating Environment	Indoor and outdoor
Operating Temperature	-20 °C ~ 50 °C

RF SPECIFICATION SUBJECT TO THE REPORT

RF Specification	RFID (LF)
Frequency Range	LF: 125 kHz
Max. RF Output Power	LF: 91.60 dBuV/m @3m
Modulation Type	LF: ASK, FSK
Number of Channels	LF: 1channel
Antenna Specification	Loop antenna
Firmware Version ¹⁾	1.53.477
Hardware Version ¹⁾	BRD52-8-TS-WM ANTENNA-032625
Date(s) of Tests	July 01, 2025 ~ March 05, 2026

Note(s):

1. Firmware and Hardware Version are as received by the client.

2. METHODOLOGY

The measurement procedure described in ANSI C63.10(Version: 2020) ‘the American National Standard of Procedures for Compliance Testing of Unlicensed Wireless Devices’.

EUT CONFIGURATION

The EUT configuration for testing is installed on RF field strength measurement to meet the Commissions requirement and operating in a manner that intends to maximize its emission characteristics in a continuous normal application.

EUT EXERCISE

The EUT was operated in the engineering mode to fix the Tx frequency that was for the purpose of the measurements. According to its specifications, the EUT must comply with the requirements of the Section 15.207, 15.209 and 15.225 under the FCC Rules Part 15 Subpart C and RSS-GEN issue 5, RSS-210 issue 11.

GENERAL TEST PROCEDURES

Conducted Emissions

The EUT is placed on the turntable, which is 0.8 m above ground plane. According to the requirements in Section 6.2 of ANSI C63.10. (Version :2020) Conducted emissions from the EUT measured in the frequency range between 0.15 MHz and 30MHz using CISPR Quasi-peak and average detector modes.

Radiated Emissions

The EUT is placed on a turn table, which is 0.8 m above ground plane below 1GHz. Above 1GHz with 1.5m using absorbers between the EUT and receive antenna. The turntable shall rotate 360 degrees to determine the position of maximum emission level. EUT is set 3 m away from the receiving antenna, which varied from 1 m to 4 m to find out the highest emission. Also, each emission was to be maximized by changing the polarization of receiving antenna both horizontal and vertical. To find out the maximum emission, the relative positions of this hand-held transmitter (EUT) was rotated through three orthogonal axes according to the requirements in Section 8 of ANSI C63.10. (Version: 2020)

DESCRIPTION OF TEST MODES

The EUT has been tested per test setup instruction provided by the manufacturer under continuous Tx operating condition. Testing was performed at the Tx mode using the key card provided by the manufacturer.

3. INSTRUMENT CALIBRATION

The measuring equipment, which was utilized in performing the tests documented herein, has been calibrated in accordance with the manufacturer's recommendations for utilizing calibration equipment's, which is traceable to recognized national standards. Especially, all antenna for measurement is calibrated in accordance with the requirements of C63.5 (Version: 2017).

4. FACILITIES AND ACCREDITATIONS

FACILITIES

HCT America, Inc. holds A2LA accreditation (certificate no. 4201.01) covering all testing included in the scope of this report. All tests were conducted at the facilities listed below.

	Address	ISED CABID	ISED Company Number	FCC Registration
☒	840 Yosemite Way, Milpitas, CA 95035 USA	US0198	25729	898494
☐	1177 Comstock Road, Hollister, CA 95023 USA	US0198	25729	898494



EQUIPMENT

Radiated emissions are measured with one or more of the following types of Linearly polarized antennas: tuned dipole, bi-conical, log periodic, bi-log, and/or ridged waveguide, horn. Spectrum analyzers with pre-selectors and quasi-peak detectors are used to perform radiated measurements.

Conducted emissions are measured with Line Impedance Stabilization Networks and EMI Test Receivers. Calibrated wideband preamplifiers, coaxial cables, and coaxial attenuators are also used for making measurements.

All receiving equipment conforms to CISPR Publication 16-1, "Radio Interference Measuring Apparatus and Measurement Methods."

5. ANTENNA REQUIREMENTS

According to FCC 47 CFR §15.203:

“An intentional radiator antenna shall be designed to ensure that no antenna other than that furnished by the responsible party can 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.”

- (1) The antenna of this E.U.T is permanently attached and there is no provision for connection to an external antenna.
- (2) The E.U.T Complies with the requirement of §15.203

According to RSS-Gen Issue 5 (Section 6.8) :

The applicant for equipment certification shall provide a list of all antenna types that may be used with the transmitter, where applicable (i.e. for transmitters with detachable antenna), indicating the maximum permissible antenna gain (in dBi) and the required impedance for each antenna. The test report shall demonstrate the compliance of the transmitter with the limit for maximum equivalent isotropically radiated power (e.i.r.p.) specified in the applicable RSS, when the transmitter is equipped with any antenna type, selected from this list.

For expediting the testing, measurements may be performed using only the antenna with highest gain of each combination of transmitter and antenna type, with the transmitter output power set at the maximum level. However, the transmitter shall comply with the applicable requirements under all operational conditions and when in combination with any type of antenna from the list provided in the test report (and in the notice to be included in the user manual, provided below).

When measurements at the antenna port are used to determine the RF output power, the effective gain of the device's antenna shall be stated, based on a measurement or on data from the antenna's manufacturer.

The test report shall state the RF power, output power setting and spurious emission measurements with each antenna type that is used with the transmitter being tested.

6. MEASUREMENT UNCERTAINTY

The measurement uncertainties shown below were calculated in accordance with the requirements of ANSI C63.10-2020.

All measurement uncertainty values are shown with a coverage factor of $k = 2$ to indicate a 95 % level of confidence. The measurement data shown herein meets or exceeds the U_{CISPR} measurement uncertainty values specified in CISPR 16-4-2 and, thus, can be compared directly to specified limits to determine compliance.

Parameter	Expanded Uncertainty ($\pm$ dB)
Occupied Bandwidth	± 120.66 kHz
Radiated Emissions (below 1 GHz)	± 5.29 dB

7. DESCRIPTION OF TESTS

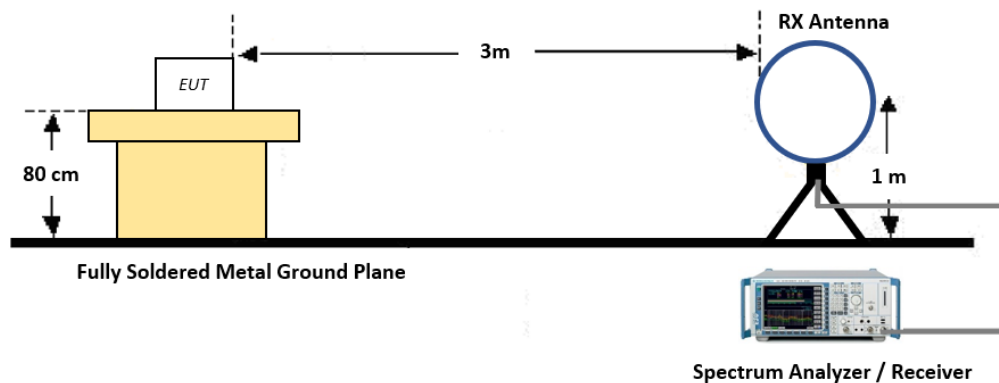
7.1. 20 dB BANDWIDTH / 99 % BANDWIDTH

Limit

20 dB bandwidth: According to §15.215(c), the bandwidth at 20 dB down from the highest in-band spectral density is measured with a spectrum analyzer connected to the receive antenna while the EUT is operating in transmission mode at the appropriate frequencies.

99% Bandwidth: Section 6.7, RSS-Gen Issue 5

Test Configuration



Test Procedure (20 dB Bandwidth)

The Spectrum Analyzer setting:

- RBW = 1 kHz
- VBW $\geq 3 \times$ RBW
- Detector = Peak
- Trace mode = max hold
- Sweep = auto couple
- Allow the trace to stabilize

Test Procedure (99 % Bandwidth)

The transmitter output is connected to the spectrum analyzer.

- RBW = 1 kHz
- VBW $\geq 3 \times$ RBW
- Detector = Peak
- Trace mode = max hold
- Sweep = auto couple
- Allow the trace to stabilize

Note(s):

Bandwidth measurement feature in the spectrum analyzer was used to measure 20 dB bandwidth (X dB bandwidth function) and 99 % bandwidth.

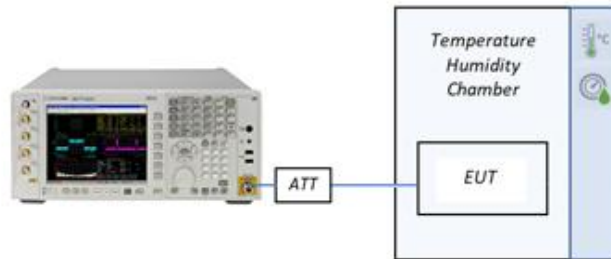
7.2. FREQUENCY STABILITY

Limit

§15.225 (e), RSS-210 Issue 11

The frequency tolerance of the carrier signal shall be maintained within $\pm 0.01\%$ of the operating frequency.

Test Configuration



Test Procedure

For battery operated equipment, the equipment tests shall be performed using a new battery.

- 1) Turn the EUT OFF and place it inside the environmental temperature chamber. For devices that have oscillator heaters, energize only the heater circuit.
- 2) Set the temperature control on the chamber to the highest specified in the regulatory requirements for the type of device and allow the oscillator heater and the chamber temperature to stabilize.
- 3) While maintaining a constant temperature inside the environmental chamber, turn the EUT ON and record the operating frequency at startup, and at 2 minutes, 5 minutes, and 10 minutes after the EUT is energized. Four measurements in total are made.
- 4) Frequency tolerance of the carrier signal shall be maintained within $\pm 0.01\%$ of the operating frequency.

Note(s):

- Temperature humidity chamber is used to adjust the temperature between -20°C and $+50^{\circ}\text{C}$
- The primary supply voltage was adjusted between 85% to 115% of the nominal value for non hand-carried battery and AC powered equipment. For hand-carried, battery-powered equipment, primary supply voltage is reduced to the battery operating end point which shall be specified by the manufacturer.

7.3. RADIATED EMISSION

RADIATION EMISSION LIMIT

FCC : 47 CFR § 15.209		
Frequency (MHz)	Field Strength (uV/m)	Measurement Distance (m)
0.009 – 0.490	2400/F(kHz)	300
0.490 – 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

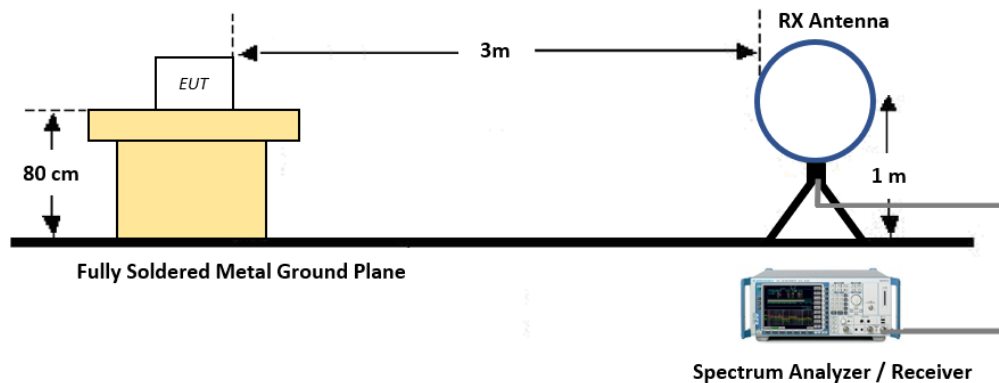
ISED : RSS-GEN Section 8.9		
Frequency (MHz)	Field Strength (uA/m)	Measurement Distance (m)
0.009 – 0.490	6.37/F(kHz)	300
0.490 – 1.705	63.7/F(kHz)	30
1.705 – 30	0.08	30
30-88	100	3
88-216	150	3
216-960	200	3
Above 960	500	3

Operation within the band 13.110 MHz – 14.010 MHz

FCC : 47 CFR § 15.225 (a), (b), (c), (d) / ISED : RSS-211 ANNEX B.6		
Frequency (MHz)	Field Strength (uV/m)	Measurement Distance (m)
13.553 – 13.567	15,848	30
13.410 ≤ f ≤ 13.553 13.567 ≤ f ≤ 13.710	334	30
13.110 ≤ f ≤ 13.410 13.710 ≤ f ≤ 14.010	106	30

Test Configuration

Below 30 MHz



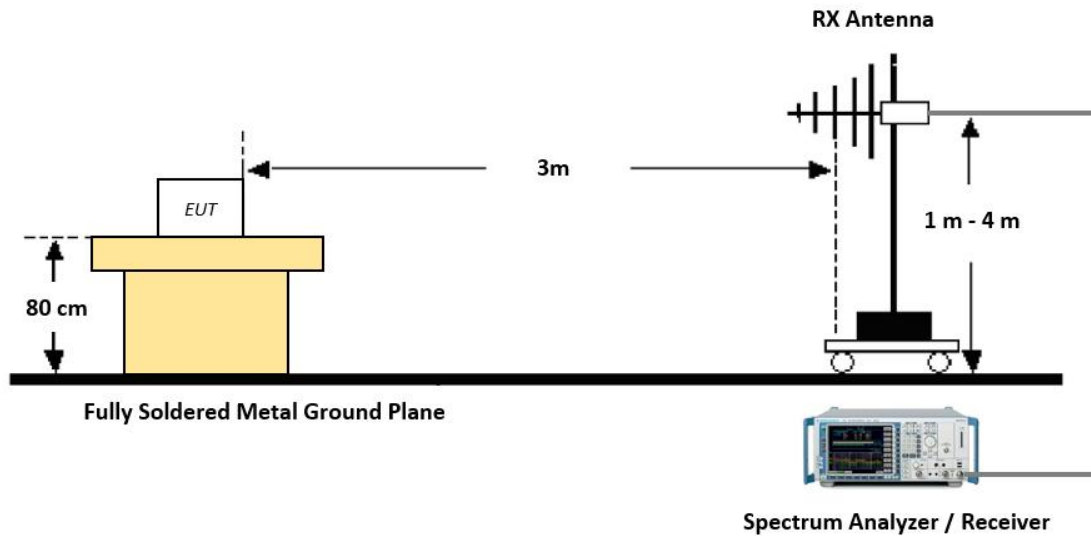
Test Procedure of Radiated spurious emissions (Below 30 MHz)

1. The EUT was placed on a non-conductive table located on semi-anechoic chamber.
2. The loop antenna was placed at a location 3m from the EUT
3. The EUT is placed on a turntable, which is 0.8m above ground plane.
4. We have done x, y, z planes in EUT and horizontal and vertical polarization in detecting antenna.
5. The turntable shall be rotated for 360 degrees to determine the position of maximum emission level.
6. Distance Correction Factor (0.009 MHz – 0.490 MHz) = $40 \cdot \log(3 \text{ m}/300 \text{ m}) = -80 \text{ dB}$
Measurement Distance: 3 m
7. Distance Correction Factor (0.490 MHz – 30 MHz) = $40 \cdot \log(3 \text{ m}/30 \text{ m}) = -40 \text{ dB}$
Measurement Distance: 3 m
8. Spectrum Setting
 - Frequency Range = 9 kHz ~ 30 MHz
 - Detector = Peak
 - Trace = Max hold
 - RBW = 9 kHz
 - VBW $\geq 3 \cdot \text{RBW}$

9. Total = Reading Value + Antenna Factor (A.F) + Cable Loss (C.L) + Distance Factor (D.F)

Adequate comparison measurements were confirmed against an open field site since the test was performed at alternative site (3m SAC) other than the open area test site. Sufficient test was made to demonstrate that the alternative site produces result that correlate with the one of test made at the open field site based on KDB 414788.

30 MHz - 1 GHz



Test Procedure of Radiated spurious emissions (Below 1GHz)

1. The EUT was placed on a non-conductive table located on semi-anechoic chamber.
2. The EUT is placed on a turntable, which is 0.8m above ground plane.
3. We have done x, y, z planes in EUT and horizontal and vertical polarization in detecting antenna.
4. The turntable shall be rotated for 360 degrees to determine the position of maximum emission level.
5. Spectrum Setting

(1) Measurement Type (Peak):

- Measured Frequency Range: 30 MHz – 1 GHz
- Detector = Peak
- Trace = Max hold
- RBW = 100 kHz
- VBW $\geq 3 \times$ RBW

(2) Measurement Type(Quasi-peak):

- Measured Frequency Range: 30 MHz – 1 GHz
- Detector = Quasi-Peak
- RBW = 120 kHz

In general, the method (1) is mainly used

6. Total = Reading Value + Antenna Factor (A.F) + Cable Loss (C.L)

7.4. AC LINE CONDUCTED EMISSIONS

LIMIT

47 CFR § 15.207, RSS-GEN Section 8.8

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 or frequencies, within the band 150 kHz to 30 MHz, shall not exceed the limits in the following table, as measured using a 50 μ H/50 ohms line impedance stabilization network (LISN).

Frequency Range (MHz)	Limits (dB μ V)	
	Quasi-peak	Average
0.15 to 0.50	66 to 56*	56 to 46*
0.50 to 5	56	46
5 to 30	60	50

*Decreases with the logarithm of the frequency.

Compliance with this provision shall be based on the measurement of the radio frequency voltage between each power line (LINE and NEUTRAL) and ground at the power terminals.

Test Configuration

See test photographs attached in Annex A for the actual connections between EUT and support equipment.

Test Procedure

1. The EUT is placed on a wooden table 80 cm above the reference ground plane.
2. The EUT is connected via LISN to a test power supply.
3. The measurement results are obtained as described below:
4. Detectors : Quasi Peak and Average Detector.

According to FCC KDB 174176 D01 Line Conducted FAQ v01r01 :

Devices Operating Above 30 MHz

For a device with a permanent or detachable antenna operating above 30 MHz, measurements must be performed with the antenna connected as specified in clause 6.2 of ANSI C63.10-2020.

Devices Operating Below 30 MHz

For a device with a permanent or detachable antenna operating at or below 30 MHz, the FCC will accept measurements performed with a suitable dummy load in lieu of the antenna under the following conditions:

- (1) Perform the AC power-line conducted tests with the antenna connected to determine compliance with Section 15.207 limits outside the transmitter's fundamental emission band;
- (2) Retest with a dummy load in lieu of the antenna to determine compliance with Section 15.207 limits within the transmitter's fundamental emission band. For a detachable antenna, remove the antenna and connect a suitable dummy load to the antenna connector. For a permanent antenna, remove the antenna and terminate the RF output with a dummy load or network which simulates the antenna in the fundamental frequency band. All measurements must be performed as specified in clause 6.2 of ANSI C63.10-2020.

Sample Calculation

Quasi-peak(Final Result) = Reading Value + Correction Factor

8. SUMMARY OF TEST RESULTS

Test Description	FCC Part Section(s)	ISED Part Section(s)	Test Limit	Test Condition	Test Result
20 dB Bandwidth	§15.215 (c)	-	N/A	Radiated	PASS
Occupied Bandwidth	-	Section 6.7 RSS-GEN	N/A		PASS
Radiated Spurious Emissions	15.209	Section 8.9 RSS-GEN	cf. Section 7.3		PASS
AC Power line Conducted Emissions	§15.207	RSS-GEN, 8.8	cf. Section 7.4	Conducted	PASS

Note(s):

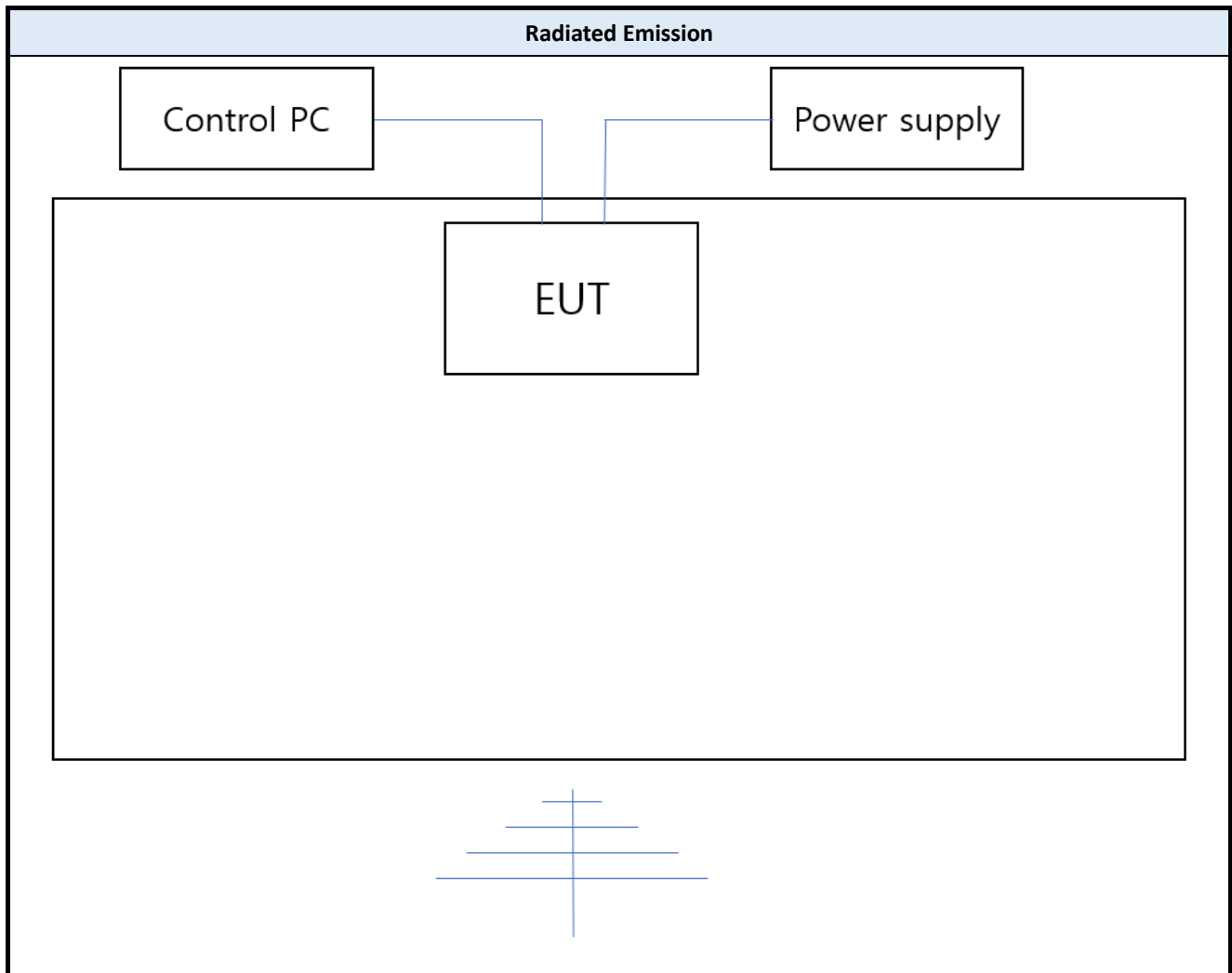
WORST CASE CONFIGURATION

RADIATED TEST

All X, Y, and Z positions for horizontal / vertical antenna polarization were investigated to find the worst-case position. Y position was selected for the final evaluation.

All the modulations below were investigated

TEST CONFIGURATION



LIST OF SUPPORT EQUIPMENT

Equipment Type	Model No.	Serial No.	Manufacturer	Qty	Note
AC/DC power supply	CPS130S	143691810000003	APS	1	Outside of chamber
Laptop	17-cn3033cl	5CG3453F4B	HP	1	Outside of chamber

9. TEST RESULT

9.1 20 dB BANDWIDTH / 99% BANDWIDTH

LF		99% Bandwidth (kHz)	20 dB Bandwidth (kHz)	Limit
Frequency (MHz)	Modulation	Result	Result	
0.125	ASK	1.455	0.601	N/A
	FSK	1.410	0.652	

Note(s):

TEST PLOTS



9.2 RADIATED SPURIOUS EMISSIONS

Radiated Spurious Emission

Test Mode	LF (ASK)
Operating Frequency	125 kHz

Frequency Range : 9 kHz – 30MHz

Frequency (MHz)	Polarization	Reading (dBuV)	Corr. ¹⁾ (dB)	Total (dBuV/m)	Limit (dBuV/m) ²⁾	Margin (dB)	Measurement Type
0.125 ³⁾	H	70.98	20.62	91.60	105.69	14.09	QP
0.125 ³⁾	V	58.18	20.62	78.80	105.69	26.86	QP
0.125 ³⁾	Bent over	69.01	20.62	89.63	105.69	37.7	QP
0.619	H	18.3	21.06	39.36	71.77	32.42	QP
13.560 ³⁾	H	48.88	20.02	68.90	69.50	0.60	QP
13.560 ³⁾	V	48.68	20.02	68.70	69.50	0.80	QP
13.560 ³⁾	Bent over	48.02	20.02	68.04	69.50	1.46	QP

Note(s):

- Correction Factor: Antenna Factor + Cable loss
- Limit = specific Limits (dBuV) + Distance extrapolation factor
 - The measurement distance is 3 meters.
 - Distance extrapolation factor = $40 \log (\text{specific distance} / \text{test distance})$ (dB)
- Fundamental frequency for 125 kHz and 13.56MHz

Frequency Range : Below 1 GHz

Frequency (MHz)	Polarization	Reading (dBuV)	Corr. ¹⁾ (dB)	Total (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Measurement Type
No major peaks found							

Note(s):

- Correction Factor: Antenna Factor + Cable loss

Test Mode LF (FSK)
 Operating Frequency 125 kHz

Frequency Range : 9 kHz – 30MHz

Frequency (MHz)	Polarization	Reading (dBuV)	Corr. ¹⁾ (dB)	Total (dBuV/m)	Limit (dBuV/m) ²⁾	Margin (dB)	Measurement Type
0.125 ³⁾	H	70.61	20.62	91.23	105.69	14.46	QP
0.125 ³⁾	V	56.60	20.62	77.22	105.69	28.47	QP
0.125 ³⁾	Bent over	66.89	20.62	87.51	105.69	18.18	QP
0.619	H	17.36	21.06	38.42	71.77	33.35	QP
13.560 ³⁾	H	48.88	20.02	68.90	69.50	0.60	QP
13.560 ³⁾	V	48.13	20.02	68.15	69.50	1.35	QP
13.560 ³⁾	Bent over	48.48	20.02	68.50	69.50	1.00	QP

Note(s):

1. Correction Factor: Antenna Factor + Cable loss
2. Limit = specific Limits (dBuV) + Distance extrapolation factor
 - The measurement distance is 3 meters.
 - Distance extrapolation factor = 40 log (specific distance / test distance) (dB)
3. Fundamental frequency for 125 kHz and 13.56MHz

Frequency Range : Below 1 GHz

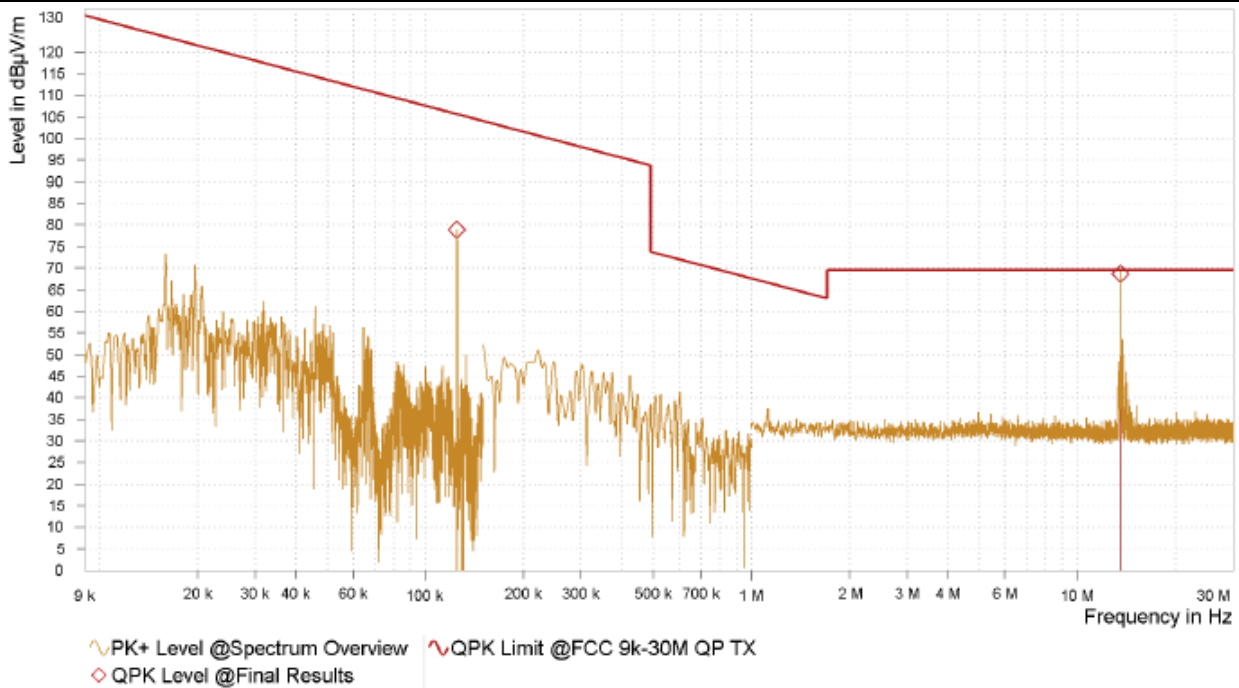
Frequency (MHz)	Polarization	Reading (dBuV)	Corr. ¹⁾ (dB)	Total (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Measurement Type
No major peaks found							

Note(s):

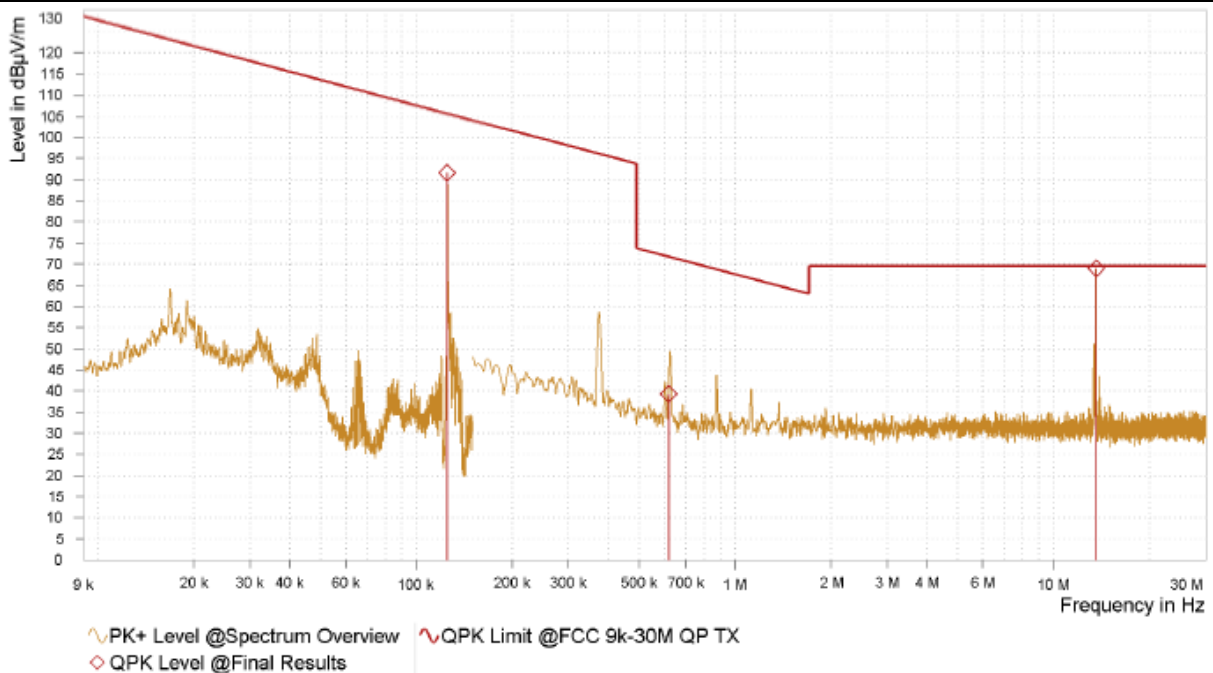
1. Correction Factor: Antenna Factor + Cable loss

■ TEST PLOTS

Radiated Spurious Emission 9 kHz – 30 MHz (Antenna Position 90°) : LF ASK



Radiated Spurious Emission 9 kHz – 30 MHz (Antenna Position 180°) : LF ASK

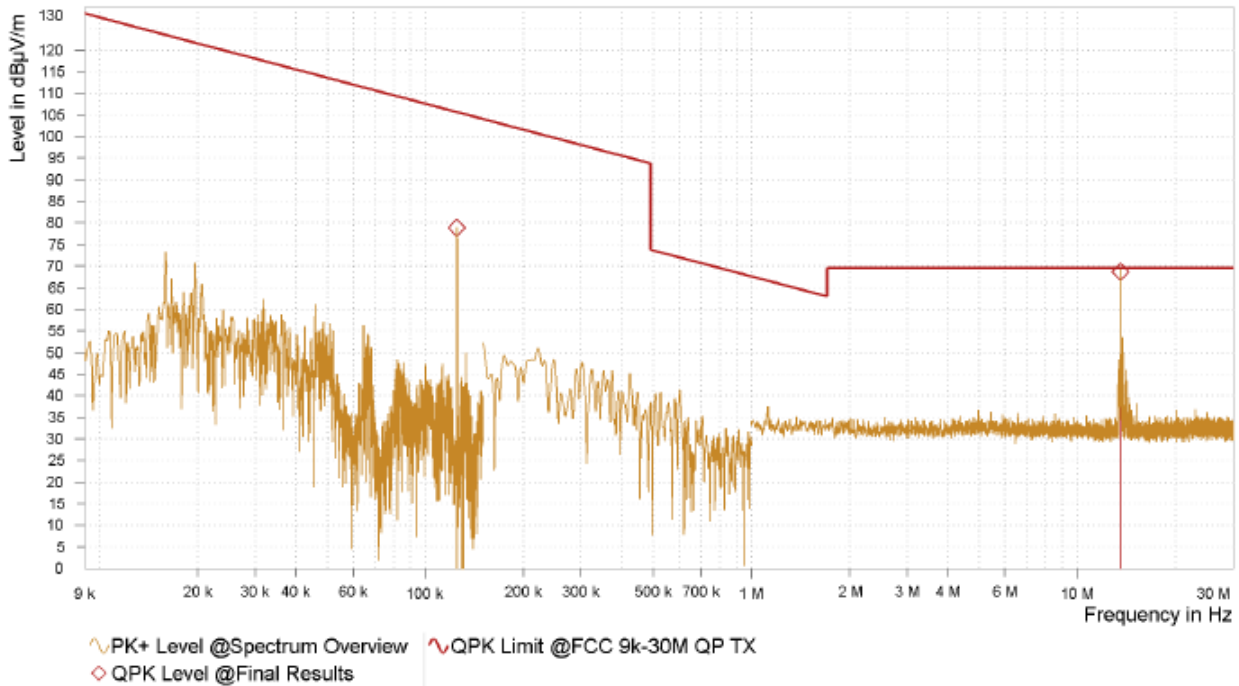


Note(s):

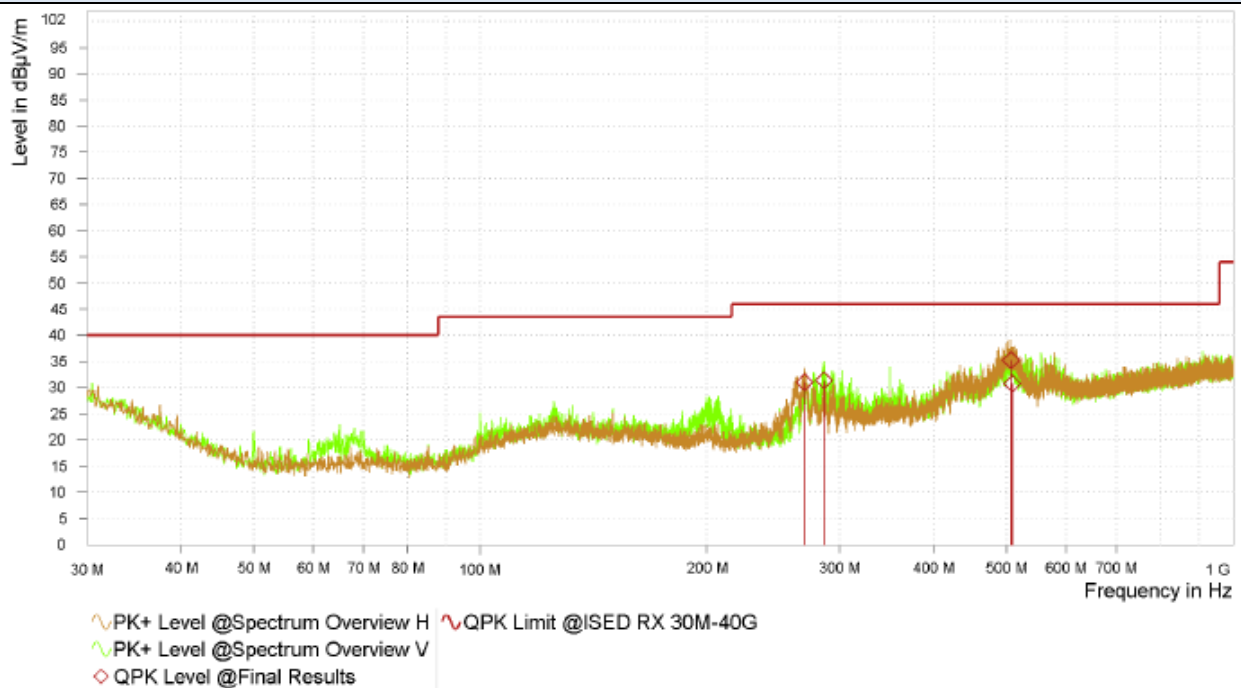
1. The worst-case plots are included in this report.
2. Under 1GHz was tested in co-location transmit.

■ TEST PLOTS

Radiated Spurious Emission 9 kHz – 30 MHz (Antenna Position Bent over) : LF ASK



Radiated Spurious Emission 30 MHz – 1 GHz : LF ASK



Note(s):

1. The worst-case plots are included in this report.
2. Under 1GHz was tested in co-location transmit.

9.3 AC POWER LINE CONDUCTED EMISSION

Loop antenna connected

Frequency (MHz)	Line	Reading (dBμV)		Corr. ¹⁾ (dB)	Level (dBμV)		Limit (dBμV)		Margin (dB)	
		QP	CAV		QP	CAV	QP	CAV	QP	CAV
0.152	L1	19.4	0.9	9.6	29.0	10.5	65.9	55.9	36.9	45.4
0.162	L1	19.9	7.1	9.6	29.5	16.7	65.4	55.4	35.9	38.7
0.469	L1	13.0	8.6	9.6	22.6	18.2	56.5	46.5	33.9	28.3
0.886	L1	4.0	0.9	9.7	13.7	10.6	56	46	42.3	35.4
1.246	L1	2.3	-1.9	9.7	12.0	7.8	56	46	44.0	38.2
4.641	L1	-2.7	-4.6	9.8	7.1	5.2	56	46	48.9	40.8
13.560	L1	36.8	34.2	10.1	46.9	44.3	60	50	13.1	5.7
27.120	L1	17.1	14.2	10.4	27.5	24.6	60	50	32.5	25.4
29.376	L1	12.8	10.2	10.5	23.3	20.7	60	50	36.7	29.3
0.167	N	17.8	7.6	9.6	27.4	17.2	65.1	55.1	37.7	37.9
0.245	N	9.0	-3.3	9.6	18.6	6.3	61.9	51.9	43.3	45.6
0.482	N	14.0	8.6	9.6	23.6	18.2	56.3	46.3	32.7	28.1
0.501	N	3.5	-1.7	9.6	13.1	7.9	56	46	42.9	38.1
0.888	N	3.5	-0.1	9.7	13.2	9.6	56	46	42.8	36.4
4.839	N	-1.3	-3.8	9.8	8.5	6.0	56	46	47.5	40.0
13.560	N	40.7	36.9	10.2	50.9	47.1	60	50	9.1	2.9
13.560	N	40.7	37.1	10.2	50.9	47.3	60	50	9.1	2.7
13.878	N	15.6	11.1	10.2	25.8	21.3	60	50	34.2	28.7

Note(s):

1. Quasi-peak(Final Result) = Reading Value + Correction Factor

Antenna disconnected to the EUT with the output terminated

Frequency (MHz)	Line	Reading (dBμV)		Corr. ¹⁾ (dB)	Level (dBμV)		Limit (dBμV)		Margin (dB)	
		QP	CAV		QP	CAV	QP	CAV	QP	CAV
0.165	N	21.3	6.0	9.6	30.9	15.6	65.2	55.2	34.3	39.6
0.481	N	13.9	8.8	9.6	23.5	18.4	56.3	46.3	32.8	27.9
0.383	N	4.7	-2.7	9.6	14.3	6.9	58.2	48.2	43.9	41.3
0.888	N	5.0	2.9	9.7	14.7	12.6	56	46	41.3	33.4
0.500	N	4.7	-0.8	9.6	14.3	8.8	56	46	41.7	37.2
1.309	N	3.2	-0.2	9.7	12.9	9.5	56	46	43.1	36.5
13.560	N	35.6	32.1	10.2	45.8	42.3	60	50	14.2	7.7
24.100	N	4.7	1.3	10.5	15.2	11.8	60	50	44.8	38.2
5.822	N	-0.7	-3.3	9.8	9.1	6.5	60	50	50.9	43.5
0.154	L1	19.7	2.8	9.6	29.3	12.4	65.8	55.8	36.5	43.4
0.472	L1	13.2	8.2	9.6	22.8	17.8	56.5	46.5	33.7	28.7
0.262	L1	9.8	-3.2	9.6	19.4	6.4	61.4	51.4	42.0	45.0
0.500	L1	3.6	-1.4	9.6	13.2	8.2	56	46	42.8	37.8
0.889	L1	5.2	3.1	9.7	14.9	12.8	56	46	41.1	33.2
4.193	L1	-3.2	-5.0	9.8	6.6	4.8	56	46	49.4	41.2
13.560	L1	33.8	30.3	10.1	43.9	40.4	60	50	16.1	9.6
29.820	L1	4.3	1.2	10.5	14.8	11.7	60	50	45.2	38.3
26.273	L1	1.0	-2.0	10.4	11.4	8.4	60	50	48.6	41.6

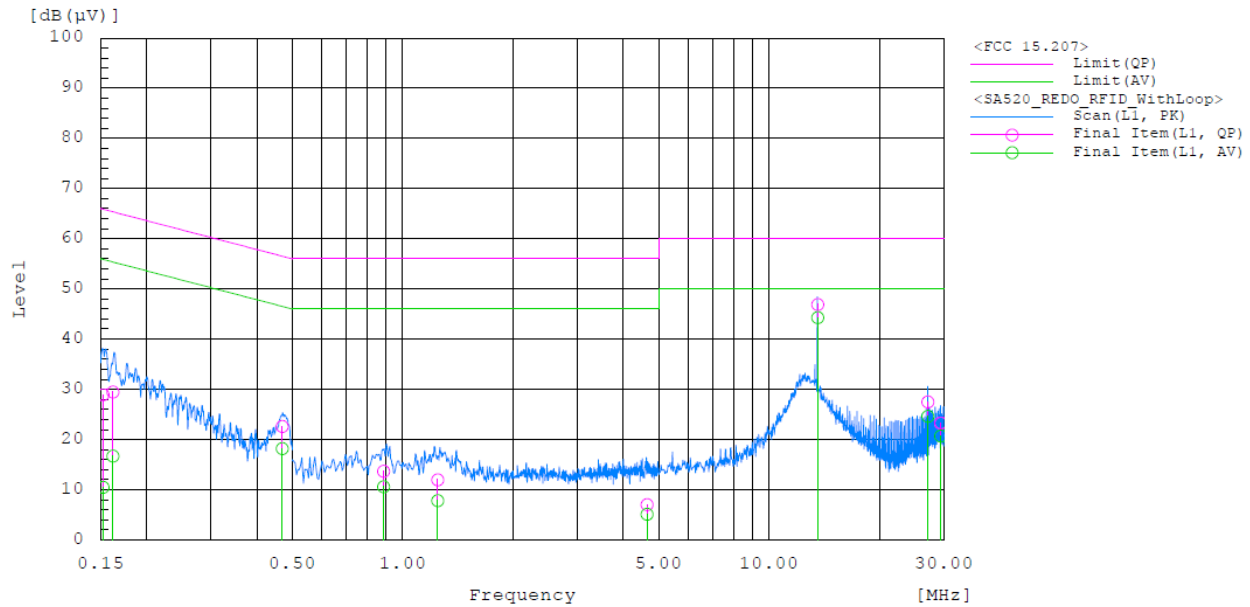
Note(s):

1. Quasi-peak(Final Result) = Reading Value + Correction Factor

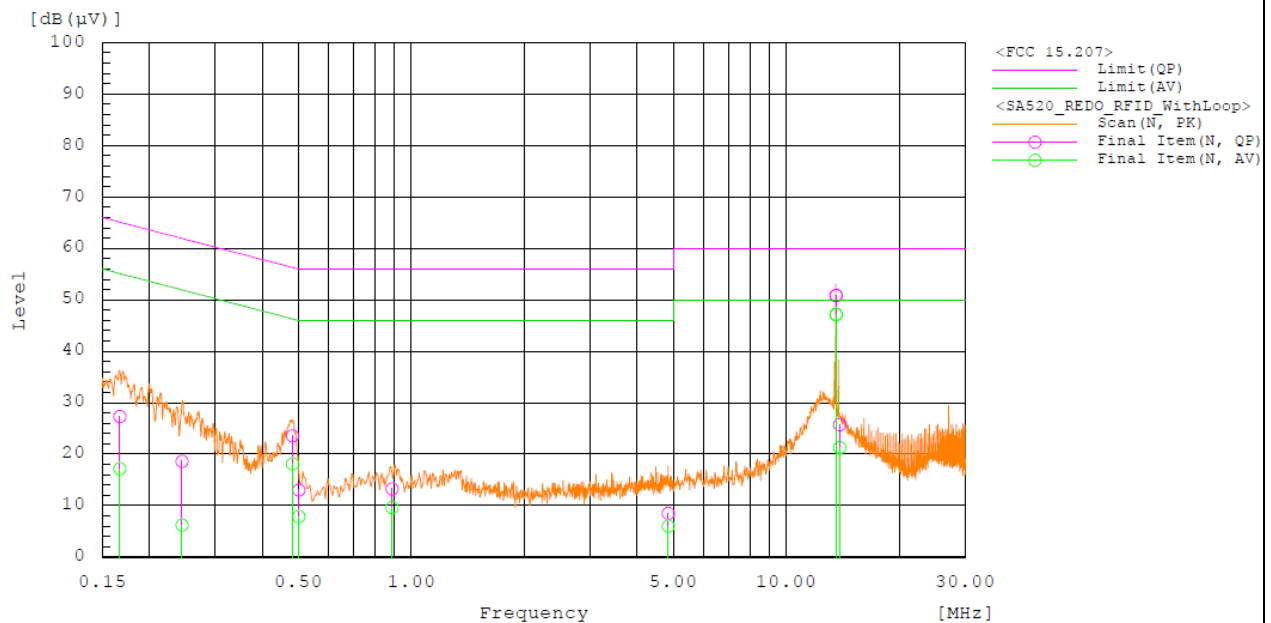
TEST PLOTS

Loop antenna connected

AC Line Conducted Emission (L1)

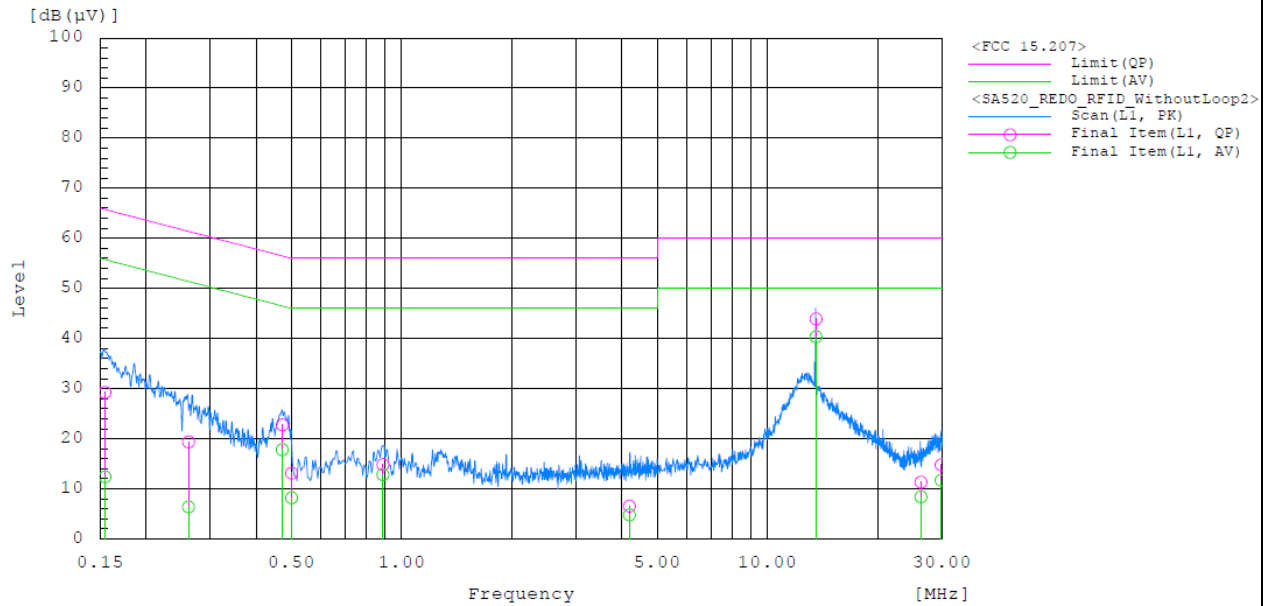


AC Line Conducted Emission (N)

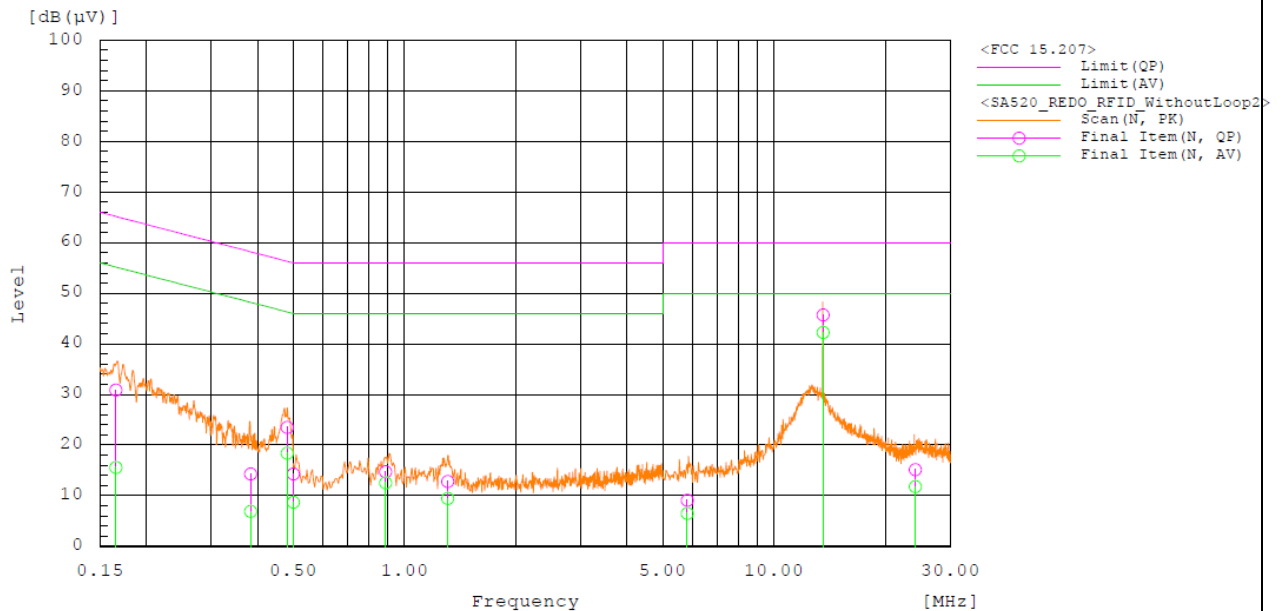


Antenna disconnected to the EUT with the output terminated

AC Line Conducted Emission (L1)



AC Line Conducted Emission (N)



10. LIST OF TEST EQUIPMENT

No.	Instrument	Model No.	Calibration Due (mm/dd/yy)	Manufacture	Serial No.
☒	Signal Analyzer (1 Hz ~ 40.0 GHz)	ESW44	03/18/2026	Rohde & Schwarz	103176
☒	Signal Analyzer (10 Hz ~ 26.5 GHz)	N9020B	05/29/2026	Keysight	MY57431494
☒	Attenuator (20 dB, DC ~ 26.5 GHz)	8493C 20 dB	01/07/2027	Keysight	89401
☒	Loop Antenna (0.009 MHz ~ 30 MHz)	HLA 6121	03/03/2027	TESEQ	43964
☒	BI-LOG Antenna (30 MHz ~ 6 GHz)	JB6	10/22/2026	Sunol	A071116
☒	LISN	ENV216	08/28/2026	Rhode & Schwarz	101550
☒	CE Test Software	EP9CE	-	TOYO Corporation	-
☒	Test Software	R&S®ELEKTRA	-	Rhode & Schwarz	-

Note(s):

1. Equipment listed above that calibrated during the testing period was set for test after the calibration.
2. Equipment listed above that has a calibration due date during the testing period, the testing is completed before equipment expiration date

APPENDIX A. TEST SETUP PHOTOS

The setup photos are provided as a separate document

APPENDIX B. PHOTOGRAPHS OF EUT

B.1. EXTERNAL PHOTOS

The external photos are provided as a separate document

B.2. INTERNAL PHOTOS

The internal photos are provided as a separate document

END OF TEST REPORT