

RADIO PERFORMANCE TEST REPORT

Test Report No. : OT-25D-RWD-012
Reception No. : 2511003763
Applicant : OceansBio Co., Ltd
Address : 46, Changwon-daero 18beon-gil, Uichang-gu, Chang-won-si, Gyeongsangnam-do, South Korea
Manufacturer : OceansBio Co., Ltd
Address : 46, Changwon-daero 18beon-gil, Uichang-gu, Chang-won-si, Gyeongsangnam-do, South Korea
Type of Equipment : BeCozU
FCC ID. : 2BTFO-OC-NF01
Model Name : OC-NF01
Multiple Model Name : N/A
Serial number : N/A
Total page of Report : 44 pages (including this page)
Date of Incoming : November 14, 2025
Date of issue : December 11, 2025

SUMMARY

The equipment complies with the regulation; **FCC PART 15 SUBPART C Section 15.247**

This test report only contains the result of a single test of the sample supplied for the examination.

It is not a generally valid assessment of the features of the respective products of the mass-production.

This test report is not associated with the accreditation granted by the Korean Laboratory Accreditation Scheme (KOLAS).





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※ Please refer to the Annex section for All test plots

Revision History

Rev. No.	Issue Report No.	Issued Date	Revisions	Section Affected
0	OT-25D-RWD-012	December 11, 2025	Initial Release	All

1. VERIFICATION OF COMPLIANCE

Applicant : OceansBio Co., Ltd

Address : 46, Changwon-daero 18beon-gil, Uichang-gu, Chang-won-si, Gyeongsangnam-do, South Korea

Contact Person : Seungbong Lee / Principal Manager

Telephone No. : +82-2-717-2640

FCC ID : 2BTFO-OC-NF01

Model Name : OC-NF01

Brand Name : Oceansbio

Serial Number : N/A

Date : December 11, 2025

EQUIPMENT CLASS	DSS – PART 15 SPREAD SPECTRUM TRANSMITTER
E.U.T. DESCRIPTION	BeCozU
THIS REPORT CONCERNS	Original Grant
MEASUREMENT PROCEDURES	ANSI C63.10: 2020
TYPE OF EQUIPMENT TESTED	Pre-Production
KIND OF EQUIPMENT AUTHORIZATION REQUESTED	Certification
EQUIPMENT WILL BE OPERATED UNDER FCC RULES PART(S)	FCC PART 15 SUBPART C Section 15.247 KDB 558074 D01 15.247 Meas Guidance v05r02
Modifications on the Equipment to Achieve Compliance	None
Final Test was Conducted On	3 m, Semi Anechoic Chamber

-. The above equipment was tested by ONETECH Corp. for compliance with the requirement set forth in the FCC Rules and Regulations. This said equipment in the configuration described in this report, shows the maximum emission levels emanating from equipment are within the compliance requirements.

2. TEST SUMMARY

2.1 Test items and results

SECTION	TEST ITEMS	RESULTS
15.247 (a) (1)	Carrier Frequency Separation	Met the Limit / PASS
15.247 (a) (1) (iii)	Minimum Number of Hopping Channels	Met the Limit / PASS
15.247 (a) (1) (iii)	Average Time of Occupancy	Met the Limit / PASS
15.247 (b) (1)	Maximum Peak Conducted Output Power	Met the Limit / PASS
15.247 (d)	100 kHz Bandwidth Outside the Frequency Band	Met the Limit / PASS
15.247 (d)	Radiated Emission which fall in the Restricted Band	Met the Limit / PASS
15.209	Radiated Emission Limits, General Requirement	Met the Limit / PASS
15.207	Conducted Limits	N/A (See Note)
15.203	Antenna Requirement	Met requirement / PASS

Note. : This test is not performed because the EUT is operated by DC battery.

2.2 Additions, deviations, exclusions from standards

No additions, deviations or exclusions have been made from standard.

2.3 Related Submittal(s) / Grant(s)

Original submittal only

2.4 Purpose of the test

To determine whether the equipment under test fulfills the requirements of the regulation stated in FCC PART 15 SUBPART C Section 15.247.

2.5 Test Methodology

Both conducted and radiated testing was performed according to the procedures in ANSI C63.10: 2020. Radiated testing was performed at a distance of 3 m from EUT to the antenna.

2.6 Test Facility

The Onetech Corp. has been designated to perform equipment testing in compliance with ISO/IEC 17025.

The Electromagnetic compatibility measurement facilities are located at 43-14, Jinsaegol-gil, Chowol-eup, Gwangju-si, Gyeonggi-do, 12735, Korea

-. Site Filing:

VCCI (Voluntary Control Council for Interference) – Registration No. R-20122/ C-14617/ G-10666/ T-11842

-. Lab Accreditation:

KOLAS (Korea Laboratory Accreditation Scheme) - Accreditation NO. KT085

ISED (Innovation, Science and Economic Development Canada) – Registration No. Site# 3736A-3

FCC (Federal Communications Commission) - Accreditation No. KR0013

RRA (Radio Research Agency) – Designation No. KR0013

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OTC-TRF-RF-001(0)

3. GENERAL INFORMATION

3.1 Product Description

The OceansBio Co., Ltd, Model OC-NF01 (referred to as the EUT in this report) is a BeCozU. The product specification described herein was obtained from product data sheet or user's manual.

DEVICE TYPE		BeCozU		
Temperature Range		0 °C ~ 60 °C		
OPERATING FREQUENCY		Bluetooth	2 402 MHz ~ 2 480 MHz	
		Bluetooth LE	2 402 MHz ~ 2 480 MHz	
MODULATION TYPE		Bluetooth	GFSK for 1Mbps, π /4-DQPSK for 2Mbps, 8-DPSK for 3Mbps	
		Bluetooth LE	GFSK for 1 Mbps / 2 Mbps	
RF OUTPUT POWER	Left Earbud	Bluetooth	1 Mbps	2.96 dBm
			2 Mbps	2.84 dBm
			3 Mbps	3.47 dBm
		Bluetooth LE	1 Mbps	3.01 dBm
			2 Mbps	3.05 dBm
	Right Earbud	Bluetooth	1 Mbps	-3.88 dBm
			2 Mbps	-3.43 dBm
			3 Mbps	-2.55 dBm
		Bluetooth LE	1 Mbps	-3.20 dBm
			2 Mbps	-3.24 dBm
NUMBER OF CHANNEL		Bluetooth	79 Channels	
		Bluetooth LE	40 Channels	
ANTENNA TYPE	Left Earbud	Ceramic SMT Antenna		
	Right Earbud			
ANTENNA GAIN	Left Earbud	2.70 dBi		
	Right Earbud	2.70 dBi		
ANTENNA TRANSMIT TYPE	Left Earbud	Bluetooth / Bluetooth LE: 1T1R		
	Right Earbud			
List of each Osc. or crystal Freq.(Freq. >= 1 MHz)		32 MHz		

3.2 Alternative type(s)/model(s); also covered by this test report.

-. None

4. EUT MODIFICATIONS

-. None

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ONETECH Corp.: 43-14, Jinsaegol-gil, Chowol-eup, Gwangju-si, Gyeonggi-do, 12735, Korea (TEL: 82-31-799-9500, FAX: 82-31-799-9599)

5. SYSTEM TEST CONFIGURATION

5.1 Justification

This device was configured for testing in a typical way as a normal customer is supposed to be used. During the test, the following components were installed inside of the EUT.

DEVICE TYPE	MANUFACTURER	MODEL/PART NUMBER	FCC ID
Main Board	OceansBio Co., Ltd	N/A	N/A

5.2 Peripheral equipment

Defined as equipment needed for correct operation of the EUT, but not considered as tested:

Model	Manufacturer	Description	Connected to
OC-NF01	OceansBio Co., Ltd	BeCozU (EUT)	
P1512CE	ASUSTeK Computer Inc.	Notebook PC	EUT
ADP-45ZE B	ASUSTeK Computer Inc.	AC Adapter	

5.3 Mode of operation during the test

For the testing, software used to control the EUT for staying in continuous transmitting is programmed.

For final testing, the EUT was set at 2 402 MHz, 2 441MHz, and 2 480 MHz to get a maximum emission levels from the EUT. The EUT was moved throughout the XY, XZ, and YZ planes and the worst case is “XY” axis, but the worst data was recorded in this report.

-. Frequency / Channel Operations

Channel	Frequency
0	2 402
39	2 441
78	2 480

-. Duty Cycle [Left Earbud]

Mode	Tx On Time [ms]	Tx Off Time [ms]	Duty Cycle [%]	Correction Factor [dB]
Bluetooth [1 Mbps]	2.891	0.859	77.10	1.13
Bluetooth [2 Mbps]	2.890	0.861	77.05	1.13
Bluetooth [3 Mbps]	2.891	0.859	77.10	1.13

Note – Duty Cycle : $(\text{Tx On Time} / (\text{Tx On Time} + \text{Tx Off Time})) * 100$

Correction Factor : $10 * \text{Log}(1 / (\text{Duty Cycle} / 100))$

-. Duty Cycle [Right Earbud]

Mode	Tx On Time [ms]	Tx Off Time [ms]	Duty Cycle [%]	Correction Factor [dB]
Bluetooth [1 Mbps]	2.860	0.850	77.08	1.13
Bluetooth [2 Mbps]	2.888	0.861	77.03	1.13
Bluetooth [3 Mbps]	2.890	0.859	77.09	1.13

Note – Duty Cycle : $(\text{Tx On Time} / (\text{Tx On Time} + \text{Tx Off Time})) * 100$

Correction Factor : $10 * \text{Log}(1 / (\text{Duty Cycle} / 100))$

5.4 Configuration of Test System

Line Conducted Test: The EUT is operated by DC battery, this test item is not requirement to be performed.

Radiated Emission Test: Preliminary radiated emissions test were conducted using the procedure in ANSI C63.10: 2020 to determine the worse operating conditions. Final radiated emission tests were conducted at 3 meter Semi Anechoic Chamber.

The turntable was rotated through 360 degrees and the EUT was tested by positioned three orthogonal planes to obtain the highest reading on the field strength meter. Once maximum reading was determined, the search antenna was raised and lowered in both vertical and horizontal polarization.

5.5 Antenna Requirement

For intentional device, according to section 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device.

Antenna Construction:

The EUT's antennas are a PIFA antenna and a patch antenna, which are permanently attached to the EUT and cannot be replaced by the user.

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 (dB)
Conducted Output Power	1.22
Conducted Spurious Emission < 26.5 GHz	1.40
Power Spectral Density	1.22
Line Conducted Disturbance (150 kHz ~ 30 MHz)	1.40
Radiated Disturbance (9 kHz ~ 30 MHz)	3.28
Radiated Disturbance (30 MHz ~ 1 GHz)	4.42
Radiated Disturbance (1 GHz ~ 18 GHz)	5.12
Radiated Disturbance (18 GHz ~ 40 GHz)	5.12

7. PRELIMINARY TEST

7.1 AC Power line Conducted Emissions Tests

During Preliminary Test, the following operating mode was investigated.

Operation Mode	The Worse operating condition (Please check one only)
This test is not performed because the EUT is wireless function does not work while charging mode.	

7.2 General Radiated Emissions Tests

During Preliminary Test, the following operating mode was investigated.

Operation Mode	The Worse operating condition (Please check one only)
Transmitting Mode	X

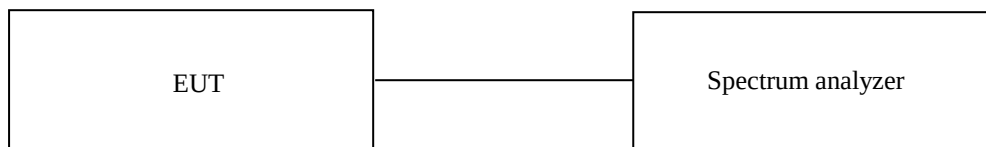
8. MINIMUM 20 dB BANDWIDTH

8.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

8.2 Test set-up

The antenna output of the EUT was connected to the spectrum analyzer. The resolution bandwidth is set to 20 kHz, and peak detection was used. The 20 dB bandwidth is defined as the total spectrum over which the power is higher than the peak power minus 20 dB.



8.3 Test Date

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8.4 Test data for 1 Mbps [Left Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	944.00
Middle	2 441.00	944.00
High	2 480.00	944.00

8.5 Test data for 2 Mbps [Left Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	1 328.70
Middle	2 441.00	1 338.70
High	2 480.00	1 333.70

8.6 Test data for 3 Mbps [Left Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	1 288.70
Middle	2 441.00	1 288.70
High	2 480.00	1 288.70

8.7 Test data for 1 Mbps [Right Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	944.00
Middle	2 441.00	944.00
High	2 480.00	944.00

8.8 Test data for 2 Mbps [Right Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	1 328.70
Middle	2 441.00	1 333.70
High	2 480.00	1 338.70

8.9 Test data for 3 Mbps [Right Earbud]

CHANNEL	FREQUENCY (MHz)	20 dB Bandwidth (kHz)
Low	2 402.00	1 293.70
Middle	2 441.00	1 293.70
High	2 480.00	1 293.70

9. HOPPING FREQUENCY SEPARATION

9.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

9.2 Test set-up

The antenna output of the EUT was connected to the spectrum analyzer. The frequency span is set to 5 MHz. The analyzer is set to peak hold then a pseudo-random hopping sequence of the transmitter is captured. The mark delta function was used to measure the frequency separation between two adjacent hopping channels.



9.3 Test Date

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9.4 Test data for 1 Mbps [Left Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
999.00	629.33	Separated by a minimum of 629.33 kHz

9.5 Test data for 2 Mbps [Left Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
1 318.70	892.47	Separated by a minimum of 892.47 kHz

9.6 Test data for 3 Mbps [Left Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
999.00	859.13	Separated by a minimum of 859.13 kHz

9.7 Test data for 1 Mbps [Right Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
999.00	629.33	Separated by a minimum of 629.33 kHz

9.8 Test data for 2 Mbps [Right Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
1 004.00	889.13	Separated by a minimum of 889.13 kHz

9.9 Test data for 3 Mbps [Right Earbud]

-. Test Result : Pass

MEASURED VALUE (kHz)	Two-third of 20 dB Bandwidth (kHz)	LIMIT
999.00	862.47	Separated by a minimum of 862.47 kHz

10. NUMBER OF HOPPING CHANNELS

10.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

10.2 Test set-up

The antenna output of the EUT was connected to the spectrum analyzer. The frequency span is set to 100 MHz and the resolution bandwidth is set to 100 kHz. The analyzer is set to peak hold and then complete pseudo-random hopping sequence of the transmitter is captured.



10.3 Test Date

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10.4 Test data for 1 Mbps [Left Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
1 Mbps	79	Minimum of 15	64

10.5 Test data for 2 Mbps [Left Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
2 Mbps	79	Minimum of 15	64

10.6 Test data for 3 Mbps [Left Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
3 Mbps	79	Minimum of 15	64

10.7 Test data for 1 Mbps [Right Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
1 Mbps	79	Minimum of 15	64

10.8 Test data for 2 Mbps [Right Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
2 Mbps	79	Minimum of 15	64

10.9 Test data for 3 Mbps [Right Earbud]

-. Test Result : Pass

Data Transfer Rate	Measured value (Number)	Limit (Number)	Margin (Number)
3 Mbps	79	Minimum of 15	64

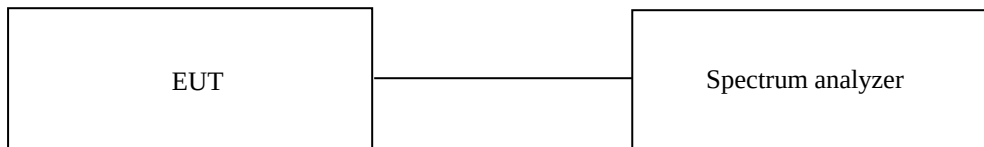
11. TIME OF OCCUPANCY

11.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

11.2 Test set-up

The antenna output of the EUT was connected to the spectrum analyzer. The transmitter is set to operate in its normal frequency hopping mode. The center frequency of the spectrum analyzer is set to one of hopping channels near the center of the operating band and span is set to zero Hz. The sweep time is set to display one complete pulse. The mark delta function is used to measure the duration of the pulses.



11.3 Test Date

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11.4 Test data for 1 Mbps [Left Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels. For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second (= 1 600/2/79) for DH1, and 5.06 times (= 1 600/4/79) for DH3, and 3.38 times (= 1 600/6/79) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.40	10.13	31.60	127.70	400.00	PASS
DH3	1.65	5.06	31.60	264.51	400.00	
DH5	2.90	3.38	31.60	309.63	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

11.5 Test data for 2 Mbps [Left Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels.

For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second ($= 1\ 600/2/79$) for DH1, and 5.06 times ($= 1\ 600/4/79$) for DH3, and 3.38 times ($= 1\ 600/6/79$) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.40	10.13	31.60	128.82	400.00	PASS
DH3	1.65	5.06	31.60	264.35	400.00	
DH5	2.90	3.38	31.60	309.71	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

11.6 Test data for 3 Mbps [Left Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels.

For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second ($= 1\ 600/2/79$) for DH1, and 5.06 times ($= 1\ 600/4/79$) for DH3, and 3.38 times ($= 1\ 600/6/79$) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.39	10.13	31.60	124.68	400.00	PASS
DH3	1.65	5.06	31.60	264.29	400.00	
DH5	2.90	3.38	31.60	309.71	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

11.7 Test data for 1 Mbps [Right Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels.

For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second ($= 1\ 600/2/79$) for DH1, and 5.06 times ($= 1\ 600/4/79$) for DH3, and 3.38 times ($= 1\ 600/6/79$) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.38	10.13	31.60	120.40	400.00	PASS
DH3	1.62	5.06	31.60	258.72	400.00	
DH5	2.89	3.38	31.60	309.03	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

11.8 Test data for 2 Mbps [Right Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels.

For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second ($= 1\ 600/2/79$) for DH1, and 5.06 times ($= 1\ 600/4/79$) for DH3, and 3.38 times ($= 1\ 600/6/79$) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.39	10.13	31.60	124.79	400.00	PASS
DH3	1.64	5.06	31.60	262.78	400.00	
DH5	2.89	3.38	31.60	308.81	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

11.9 Test data for 3 Mbps [Right Earbud]

The system makes worst case 1 600 hops per second or 1 time slot has a length of 625 μ s with 79 channels.

For DH1 packet type, the EUT needs 1 time slot for transmitting and 1 time slot for receiving and for DH3 packet type, the EUT needs 3 times slots for transmitting and 1 time slot for receiving, and DH5 packet needs 5 times slots for transmitting and 1 time slot for receiving. So The EUT has each channel for 10.13 times per second ($= 1\ 600/2/79$) for DH1, and 5.06 times ($= 1\ 600/4/79$) for DH3, and 3.38 times ($= 1\ 600/6/79$) for DH5.

Packet Type	Pulse Time (ms)	Hops per second with channels	Period Time (ms)	Total Dwell Time (ms)	Limit (ms)	Test Result
DH1	0.39	10.13	31.60	124.77	400.00	PASS
DH3	1.64	5.06	31.60	262.49	400.00	
DH5	2.89	3.38	31.60	309.18	400.00	

Total dwell time is calculated as following.

Total Dwell Time = Pulse time * Hops per second with channels * period time

12. MAXIMUM PEAK OUTPUT POWER

12.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

12.2 Test set-up

The antenna output of the EUT was connected to the spectrum analyzer.

The resolution bandwidth is set to $\geq$ DTS Bandwidth, the video bandwidth is set to 3 times the resolution bandwidth.



12.3 Test Date

November 14, 2025 ~ December 10, 2025

12.4 Test data for 1 Mbps [Left Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	1.86	21.00	19.14
MIDDLE	2 441.00	2.05	21.00	18.95
HIGH	2 480.00	2.96	21.00	18.04

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

12.5 Test data for 2 Mbps [Left Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	1.38	21.00	19.62
MIDDLE	2 441.00	1.78	21.00	19.22
HIGH	2 480.00	2.84	21.00	18.16

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

12.6 Test data for 3 Mbps [Left Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	1.97	21.00	19.03
MIDDLE	2 441.00	2.42	21.00	18.58
HIGH	2 480.00	3.47	21.00	17.53

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

12.7 Test data for 1 Mbps [Right Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	-4.63	21.00	25.63
MIDDLE	2 441.00	-4.20	21.00	25.20
HIGH	2 480.00	-3.88	21.00	24.88

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

12.8 Test data for 2 Mbps [Right Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	-4.64	21.00	25.64
MIDDLE	2 441.00	-3.95	21.00	24.95
HIGH	2 480.00	-3.43	21.00	24.43

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

12.9 Test data for 3 Mbps [Right Earbud]

-. Test Result : Pass

CHANNEL	FREQUENCY (MHz)	MEASURED VALUE (dBm)	LIMIT (dBm)	MARGIN (dB)
LOW	2 402.00	-3.94	21.00	24.94
MIDDLE	2 441.00	-3.19	21.00	24.19
HIGH	2 480.00	-2.55	21.00	23.55

Remark. Margin = Limit – Measured Value (=Receiver Reading + Cable Loss)

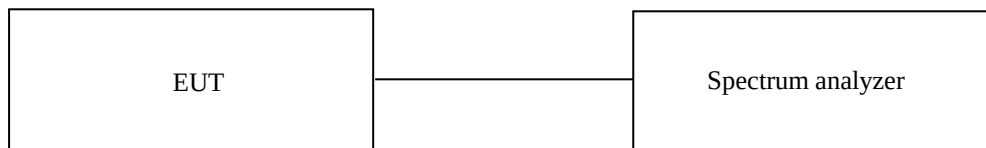
13. 100 kHz BANDWIDTH OUTSIDE THE FREQUENCY BAND

13.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

13.2 Test set-up for conducted measurement

The antenna output of the EUT was connected to the spectrum analyzer. The resolution and video bandwidth is set to 100 kHz, and peak detection was used.



13.3 Test set-up for radiated measurement

The radiated emissions measurements were performed on the 3 m semi anechoic chamber. The EUT was placed on turntable approximately 1.5 m above the ground plane.

The frequency spectrum from 30 MHz to 26.5 GHz was scanned and maximum emission levels at each frequency recorded. The system was rotated 360°, and the antenna was varied in the height between 1.0 m and 4.0 m in order to determine the maximum emission levels. This procedure was performed for horizontal and vertical polarization of the receiving antenna.

13.4 Test Date

November 14, 2025 ~ December 10, 2025

13.5 Test data for conducted emission

For Test data for conducted emission, please refer to the Annex.

13.6 Test data for Transmitting mode radiated emission [Left Earbud]

13.6.1 Radiated Emission which fall in the Restricted Band [Left Earbud]

13.6.1.1 Test data for 1 Mbps [Left Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- Video bandwidth : 3 MHz for Peak and Average Mode
- Measurement distance : 3 m
- Duty Cycle : 77.10 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 363.450	57.02	Peak	H	27.67	4.98	46.98	6.03	-	48.72	74.00	25.28
2 389.730	45.26	Average	H	27.62	4.98	46.98	6.03	1.13	38.04	54.00	15.96
2 349.660	57.23	Peak	V	27.70	4.98	46.98	6.03	-	48.96	74.00	25.04
2 389.460	45.40	Average	V	27.62	4.98	46.98	6.03	1.13	38.18	54.00	15.82
Test Data for High Channel											
2 483.650	63.82	Peak	H	27.60	4.74	46.98	6.03	-	55.21	74.00	18.79
2 484.010	46.61	Average	H	27.60	4.74	46.98	6.03	1.13	39.13	54.00	14.87
2 483.510	64.62	Peak	V	27.60	4.74	46.98	6.03	-	56.01	74.00	17.99
2 484.210	46.68	Average	V	27.60	4.74	46.98	6.03	1.13	39.20	54.00	14.80

Tabulated test data for Restricted Band

Remark: "H": Horizontal, "V": Vertical

$$\text{Margin (dB)} = \text{Limits (dB}\mu\text{V/m)} - \text{Total Level (dB}\mu\text{V/m)}$$

$$\text{Total Level} = \text{Reading} + \text{Antenna Factor} + \text{Cable Loss} - \text{AMP Gain} + \text{ATT} + \text{Duty Factor}$$

13.6.1.2 Test data for 2 Mbps [Left Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- Video bandwidth : 3 MHz for Peak and Average Mode
- Measurement distance : 3 m
- Duty Cycle : 77.05 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 360.320	57.15	Peak	H	27.68	4.98	46.98	6.03	-	48.86	74.00	25.14
2 387.890	45.41	Average	H	27.62	4.98	46.98	6.03	1.13	38.19	54.00	15.81
2 343.410	57.17	Peak	V	27.73	4.98	46.98	6.03	-	48.93	74.00	25.07
2 387.800	45.30	Average	V	27.62	4.98	46.98	6.03	1.13	38.08	54.00	15.92
Test Data for High Channel											
2 483.850	61.39	Peak	H	27.60	4.74	46.98	6.03	-	52.78	74.00	21.22
2 484.010	46.26	Average	H	27.60	4.74	46.98	6.03	1.13	38.78	54.00	15.22
2 483.750	60.82	Peak	V	27.60	4.74	46.98	6.03	-	52.21	74.00	21.79
2 483.950	45.91	Average	V	27.60	4.74	46.98	6.03	1.13	38.43	54.00	15.57

Tabulated test data for Restricted Band

Remark: “H”: Horizontal, “V”: Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + ATT + Duty Factor

13.6.1.3 Test data for 3 Mbps [Left Earbud]

- . Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- . Video bandwidth : 3 MHz for Peak and Average Mode
- . Measurement distance : 3 m
- . Duty Cycle : 77.10 %
- . Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 324.940	57.37	Peak	H	27.80	4.98	46.98	6.03	-	49.20	74.00	24.80
2 370.340	45.63	Average	H	27.66	4.98	46.98	6.03	1.13	38.45	54.00	15.55
2 349.660	57.76	Peak	V	27.70	4.98	46.98	6.03	-	49.49	74.00	24.51
2 389.270	45.33	Average	V	27.62	4.98	46.98	6.03	1.13	38.11	54.00	15.89
Test Data for High Channel											
2 483.750	60.83	Peak	H	27.60	4.74	46.98	6.03	-	52.22	74.00	21.78
2 483.510	46.74	Average	H	27.60	4.74	46.98	6.03	1.13	39.26	54.00	14.74
2 483.670	61.24	Peak	V	27.60	4.74	46.98	6.03	-	52.63	74.00	21.37
2 483.690	46.35	Average	V	27.60	4.74	46.98	6.03	1.13	38.87	54.00	15.13

Tabulated test data for Restricted Band

Remark: “H”: Horizontal, “V”: Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + ATT + Duty Factor

13.6.2 Spurious & Harmonic Radiated Emission above 1 GHz [Left Earbud]

13.6.2.1 Test data for 1 Mbps [Left Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.10 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	53.91	Peak	H	31.20	7.49	46.24	-	46.36	74.00	27.64
4 804.000	42.17	Average	H	31.20	7.49	46.24	1.13	35.75	54.00	18.25
4 804.000	56.78	Peak	V	31.20	7.49	46.24	-	49.23	74.00	24.77
4 804.000	44.78	Average	V	31.20	7.49	46.24	1.13	38.36	54.00	15.64
Test Data for Middle Channel										
4 882.000	53.78	Peak	H	31.26	7.58	46.24	-	46.38	74.00	27.62
4 882.000	41.86	Average	H	31.27	7.58	46.24	1.13	35.60	54.00	18.40
4 882.000	53.38	Peak	V	31.26	7.58	46.24	-	45.98	74.00	28.02
4 882.000	42.85	Average	V	31.27	7.58	46.24	1.13	36.59	54.00	17.41
Test Data for High Channel										
4 960.000	53.03	Peak	H	31.55	7.69	46.24	-	46.03	74.00	27.97
4 960.000	41.21	Average	H	31.55	7.69	46.24	1.13	35.34	54.00	18.66
4 960.000	54.48	Peak	V	31.53	7.69	46.24	-	47.46	74.00	26.54
4 960.000	41.41	Average	V	31.55	7.69	46.24	1.13	35.54	54.00	18.46

Remark: "H": Horizontal, "V": Vertical

$$\text{Margin (dB)} = \text{Limits (dBμV/m)} - \text{Total Level (dBμV/m)}$$

$$\text{Total Level} = \text{Reading} + \text{Antenna Factor} + \text{Cable Loss} - \text{AMP Gain} + \text{Duty Factor}$$

13.6.2.2 Test data for 2 Mbps [Left Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.05 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	54.08	Peak	H	31.20	7.49	46.24	-	46.53	74.00	27.47
4 804.000	41.84	Average	H	31.20	7.49	46.24	1.13	35.42	54.00	18.58
4 804.000	56.46	Peak	V	31.20	7.49	46.24	-	48.91	74.00	25.09
4 804.000	43.19	Average	V	31.20	7.49	46.24	1.13	36.77	54.00	17.23
Test Data for Middle Channel										
4 882.000	53.57	Peak	H	31.25	7.58	46.24	-	46.16	74.00	27.84
4 882.000	41.39	Average	H	31.26	7.58	46.24	1.13	35.12	54.00	18.88
4 882.000	53.58	Peak	V	31.26	7.58	46.24	-	46.18	74.00	27.82
4 882.000	41.39	Average	V	31.27	7.58	46.24	1.13	35.13	54.00	18.87
Test Data for High Channel										
4 960.000	53.40	Peak	H	31.55	7.69	46.24	-	46.40	74.00	27.60
4 960.000	41.22	Average	H	31.54	7.69	46.24	1.13	35.34	54.00	18.66
4 960.000	53.18	Peak	V	31.52	7.69	46.24	-	46.15	74.00	27.85
4 960.000	41.33	Average	V	31.55	7.69	46.24	1.13	35.46	54.00	18.54

Remark: "H": Horizontal, "V": Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + Duty Factor

13.6.2.3 Test data for 3 Mbps [Left Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.10 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	54.09	Peak	H	31.20	7.49	46.24	-	46.54	74.00	27.46
4 804.000	42.05	Average	H	31.20	7.49	46.24	1.13	35.63	54.00	18.37
4 804.000	55.57	Peak	V	31.20	7.49	46.24	-	48.02	74.00	25.98
4 804.000	43.09	Average	V	31.20	7.49	46.24	1.13	36.67	54.00	17.33
Test Data for Middle Channel										
4 882.000	53.29	Peak	H	31.27	7.58	46.24	-	45.90	74.00	28.10
4 882.000	41.24	Average	H	31.27	7.58	46.24	1.13	34.98	54.00	19.02
4 882.000	53.52	Peak	V	31.27	7.58	46.24	-	46.13	74.00	27.87
4 882.000	41.61	Average	V	31.27	7.58	46.24	1.13	35.35	54.00	18.65
Test Data for High Channel										
4 960.000	53.85	Peak	H	31.55	7.69	46.24	-	46.85	74.00	27.15
4 960.000	41.61	Average	H	31.53	7.69	46.24	1.13	35.72	54.00	18.28
4 960.000	53.44	Peak	V	31.55	7.69	46.24	-	46.44	74.00	27.56
4 960.000	41.30	Average	V	31.52	7.69	46.24	1.13	35.40	54.00	18.60

Remark: "H": Horizontal, "V": Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + Duty Factor

13.7 Test data for Transmitting mode radiated emission [Right Earbud]

13.7.1 Radiated Emission which fall in the Restricted Band [Right Earbud]

13.7.1.1 Test data for 1 Mbps [Right Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- Video bandwidth : 3 MHz for Peak and Average Mode
- Measurement distance : 3 m
- Duty Cycle : 77.08 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 359.130	55.57	Peak	H	27.68	4.98	46.98	6.03	-	47.28	74.00	26.72
2 324.660	43.83	Average	H	27.80	4.98	46.98	6.03	1.13	36.79	54.00	17.21
2 330.170	55.41	Peak	V	27.78	4.98	46.98	6.03	-	47.22	74.00	26.78
2 326.500	43.78	Average	V	27.79	4.98	46.98	6.03	1.13	36.73	54.00	17.27
Test Data for High Channel											
2 486.100	55.89	Peak	H	27.60	4.74	46.98	6.03	-	47.28	74.00	26.72
2 487.760	43.81	Average	H	27.60	4.74	46.98	6.03	1.13	36.33	54.00	17.67
2 498.550	55.62	Peak	V	27.60	4.74	46.98	6.03	-	47.01	74.00	26.99
2 488.460	43.78	Average	V	27.60	4.74	46.98	6.03	1.13	36.30	54.00	17.70

Tabulated test data for Restricted Band

Remark: "H": Horizontal, "V": Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + ATT + Duty Factor

13.7.1.2 Test data for 2 Mbps [Right Earbud]

- . Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- . Video bandwidth : 3 MHz for Peak and Average Mode
- . Measurement distance : 3 m
- . Duty Cycle : 77.03 %
- . Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 318.130	55.49	Peak	H	27.83	4.98	46.98	6.03	-	47.35	74.00	26.65
2 311.520	43.79	Average	H	27.85	4.98	46.98	6.03	1.13	36.80	54.00	17.20
2 317.950	55.73	Peak	V	27.83	4.98	46.98	6.03	-	47.59	74.00	26.41
2 351.310	43.73	Average	V	27.70	4.98	46.98	6.03	1.13	36.59	54.00	17.41
Test Data for High Channel											
2 496.970	55.70	Peak	H	27.60	4.74	46.98	6.03	-	47.09	74.00	26.91
2 485.290	43.93	Average	H	27.60	4.74	46.98	6.03	1.13	36.45	54.00	17.55
2 496.910	55.85	Peak	V	27.60	4.74	46.98	6.03	-	47.24	74.00	26.76
2 487.840	43.88	Average	V	27.60	4.74	46.98	6.03	1.13	36.40	54.00	17.60

Tabulated test data for Restricted Band

Remark: “H”: Horizontal, “V”: Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + ATT + Duty Factor

13.7.1.3 Test data for 3 Mbps [Right Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- Video bandwidth : 3 MHz for Peak and Average Mode
- Measurement distance : 3 m
- Duty Cycle : 77.09 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	ATT (dB)	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel											
2 368.590	55.63	Peak	H	27.66	4.98	46.98	6.03	-	47.32	74.00	26.68
2 349.570	43.82	Average	H	27.70	4.98	46.98	6.03	1.13	36.68	54.00	17.32
2 314.270	55.29	Peak	V	27.84	4.98	46.98	6.03	-	47.16	74.00	26.84
2 335.140	43.76	Average	V	27.76	4.98	46.98	6.03	1.13	36.68	54.00	17.32
Test Data for High Channel											
2 494.020	55.91	Peak	H	27.60	4.74	46.98	6.03	-	47.30	74.00	26.70
2 484.390	43.99	Average	H	27.60	4.74	46.98	6.03	1.13	36.51	54.00	17.49
2 483.850	55.70	Peak	V	27.60	4.74	46.98	6.03	-	47.09	74.00	26.91
2 483.790	43.73	Average	V	27.60	4.74	46.98	6.03	1.13	36.25	54.00	17.75

Tabulated test data for Restricted Band

Remark: “H”: Horizontal, “V”: Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + ATT + Duty Factor

13.7.2 Spurious & Harmonic Radiated Emission above 1 GHz [Right Earbud]

13.7.2.1 Test data for 1 Mbps [Right Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.08 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	51.43	Peak	H	31.50	7.49	46.24	-	44.18	74.00	29.82
4 804.000	39.26	Average	H	31.50	7.49	46.24	1.13	33.14	54.00	20.86
4 804.000	51.74	Peak	V	31.50	7.49	46.24	-	44.49	74.00	29.51
4 804.000	39.41	Average	V	31.50	7.49	46.24	1.13	33.29	54.00	20.71
Test Data for Middle Channel										
4 882.000	50.03	Peak	H	31.50	7.58	46.24	-	42.87	74.00	31.13
4 882.000	37.92	Average	H	31.50	7.58	46.24	1.13	31.89	54.00	22.11
4 882.000	49.91	Peak	V	31.50	7.58	46.24	-	42.75	74.00	31.25
4 882.000	37.97	Average	V	31.50	7.58	46.24	1.13	31.94	54.00	22.06
Test Data for High Channel										
4 960.000	50.45	Peak	H	31.63	7.69	46.24	-	43.53	74.00	30.47
4 960.000	37.88	Average	H	31.64	7.69	46.24	1.13	32.10	54.00	21.90
4 960.000	50.16	Peak	V	31.66	7.69	46.24	-	43.27	74.00	30.73
4 960.000	38.01	Average	V	31.64	7.69	46.24	1.13	32.23	54.00	21.77

Remark: "H": Horizontal, "V": Vertical

$$\text{Margin (dB)} = \text{Limits (dBμV/m)} - \text{Total Level (dBμV/m)}$$

$$\text{Total Level} = \text{Reading} + \text{Antenna Factor} + \text{Cable Loss} - \text{AMP Gain} + \text{Duty Factor}$$

13.7.2.2 Test data for 2 Mbps [Right Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.03 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	51.43	Peak	H	31.50	7.49	46.24	-	44.18	74.00	29.82
4 804.000	39.51	Average	H	31.50	7.49	46.24	1.13	33.39	54.00	20.61
4 804.000	51.70	Peak	V	31.50	7.49	46.24	-	44.45	74.00	29.55
4 804.000	39.22	Average	V	31.50	7.49	46.24	1.13	33.10	54.00	20.90
Test Data for Middle Channel										
4 882.000	50.18	Peak	H	31.50	7.58	46.24	-	43.02	74.00	30.98
4 882.000	38.00	Average	H	31.50	7.58	46.24	1.13	31.97	54.00	22.03
4 882.000	50.19	Peak	V	31.50	7.58	46.24	-	43.03	74.00	30.97
4 882.000	38.00	Average	V	31.50	7.58	46.24	1.13	31.97	54.00	22.03
Test Data for High Channel										
4 960.000	49.94	Peak	H	31.66	7.69	46.24	-	43.05	74.00	30.95
4 960.000	37.92	Average	H	31.63	7.69	46.24	1.13	32.13	54.00	21.87
4 960.000	50.13	Peak	V	31.62	7.69	46.24	-	43.20	74.00	30.80
4 960.000	38.08	Average	V	31.65	7.69	46.24	1.13	32.31	54.00	21.69

Remark: "H": Horizontal, "V": Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + Duty Factor

13.7.2.3 Test data for 3 Mbps [Right Earbud]

- Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode for the emissions fall in restricted band,
1 MHz and RMS Detector for Average Mode for the emissions fall in restricted band
100 kHz for Peak Mode for the emissions outside restricted band
- Video bandwidth : 3 MHz for Peak and Average Mode
- Frequency range : 1 GHz ~ 26.5 GHz
- Measurement distance : 3 m
- Duty Cycle : 77.09 %
- Result : PASSED

Frequency (MHz)	Reading (dBμV)	Detector Mode	Ant. Pol. (H/V)	Ant. Factor	Cable Loss	AMP Gain	Duty Factor (dB)	Total (dBμV/m)	Limits (dBμV/m)	Margin (dB)
Test Data for Low Channel										
4 804.000	51.24	Peak	H	31.50	7.49	46.24	-	43.99	74.00	30.01
4 804.000	39.38	Average	H	31.50	7.49	46.24	1.13	33.26	54.00	20.74
4 804.000	51.34	Peak	V	31.50	7.49	46.24	-	44.09	74.00	29.91
4 804.000	39.18	Average	V	31.50	7.49	46.24	1.13	33.06	54.00	20.94
Test Data for Middle Channel										
4 882.000	49.94	Peak	H	31.50	7.58	46.24	-	42.78	74.00	31.22
4 882.000	38.10	Average	H	31.50	7.58	46.24	1.13	32.07	54.00	21.93
4 882.000	50.12	Peak	V	31.50	7.58	46.24	-	42.96	74.00	31.04
4 882.000	37.89	Average	V	31.50	7.58	46.24	1.13	31.86	54.00	22.14
Test Data for High Channel										
4 960.000	49.96	Peak	H	31.64	7.69	46.24	-	43.05	74.00	30.95
4 960.000	37.94	Average	H	31.66	7.69	46.24	1.13	32.18	54.00	21.82
4 960.000	49.61	Peak	V	31.64	7.69	46.24	-	42.70	74.00	31.30
4 960.000	37.80	Average	V	31.66	7.69	46.24	1.13	32.04	54.00	21.96

Remark: "H": Horizontal, "V": Vertical

Margin (dB) = Limits (dBμV/m) - Total Level (dBμV/m)

Total Level = Reading + Antenna Factor + Cable Loss – AMP Gain + Duty Factor

14. RADIATED EMISSION TEST

14.1 Operating environment

Temperature : 25 °C
Relative humidity : 45 % R.H.

14.2 Test set-up

The radiated emissions measurements were on the 3 m semi anechoic chamber. The EUT and other support equipment were placed on a non-conductive turntable above the ground plane. The interconnecting cables from outside test site were inserted into ferrite clamps at the point where the cables reach the turntable.

The frequency spectrum from 30 MHz to 26.5 GHz was scanned and emission levels maximized at each frequency recorded. The system was rotated 360°, and the antenna was varied in height between 1.0 m and 4.0 m in order to determine the maximum emission levels. This procedure was performed for both horizontal and vertical polarization of the receiving antenna.

14.3 Test Date

November 14, 2025 ~ December 10, 2025

14.4 Test data for 30 MHz ~ 1 000 MHz [Left Earbud]

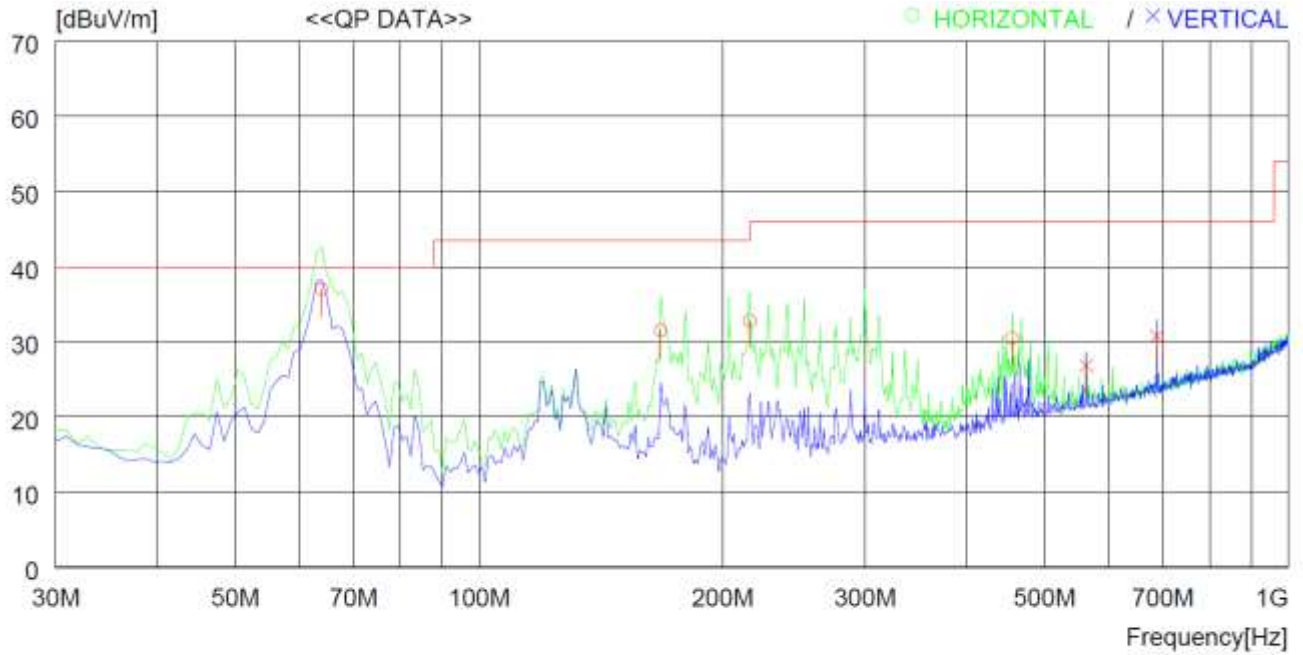
14.4.1 Test data for Bluetooth Mode [Left Earbud]

Limits apply to : FCC CFR 47, PART 15, SUBPART C, SECTION 15.247

Result : PASSED

EUT : BeCozU

Detector : CISPR Quasi-Peak (6 dB Bandwidth: 120 kHz)



No.	FREQ	READING	ANT	LOSS	GAIN	RESULT	LIMIT	MARGIN	ANTENNA	TABLE
	[MHz]	QP	FACTOR	[dB]	[dB]	[dBuV/m]	[dBuV/m]	[dB]	[cm]	[DEG]
----- Horizontal -----										
1	63.950	55.3	12.6	1.1	32.0	37.0	40.0	3.0	300	359
2	167.740	44.2	17.4	1.9	32.0	31.5	43.5	12.0	200	98
3	216.240	46.3	16.3	2.2	32.0	32.8	46.0	13.2	100	359
4	455.831	37.5	22.1	3.1	32.2	30.5	46.0	15.5	200	0
----- Vertical -----										
5	562.529	31.8	23.8	3.5	32.3	26.8	46.0	19.2	100	351
6	687.655	33.6	25.4	4.0	32.3	30.7	46.0	15.3	200	359

14.5 Test data for Below 30 MHz [Left Earbud]

- . Resolution bandwidth : 200 Hz (from 9 kHz to 0.15 MHz), 9 kHz (from 0.15 MHz to 30 MHz)
- . Frequency range : 9 kHz ~ 30 MHz
- . Measurement distance : 3 m

Frequency (MHz)	Reading (dBμV)	Ant. Pol. (H/V)	Ant. Factor (dB/m)	Cable Loss	Amp Gain	Emission Level(dBμV/m)	Limits (dBμV/m)	Margin (dB)
Emission from the EUT more than 20 dB below the limit in each frequency range.								

14.6 Test data for Above 1 GHz [Left Earbud]

- . Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- . Video bandwidth : 3 MHz for Peak and Average Mode
- . Frequency range : 1 GHz ~ 26.5 GHz
- . Measurement distance : 3 m

Frequency (MHz)	Reading (dBμV)	Ant. Pol. (H/V)	Ant. Factor (dB/m)	Cable Loss	Amp Gain	Emission Level(dBμV/m)	Limits (dBμV/m)	Margin (dB)
Emission from the EUT more than 20 dB below the limit in each frequency range.								

14.7 Test data for 30 MHz ~ 1 000 MHz [Right Earbud]

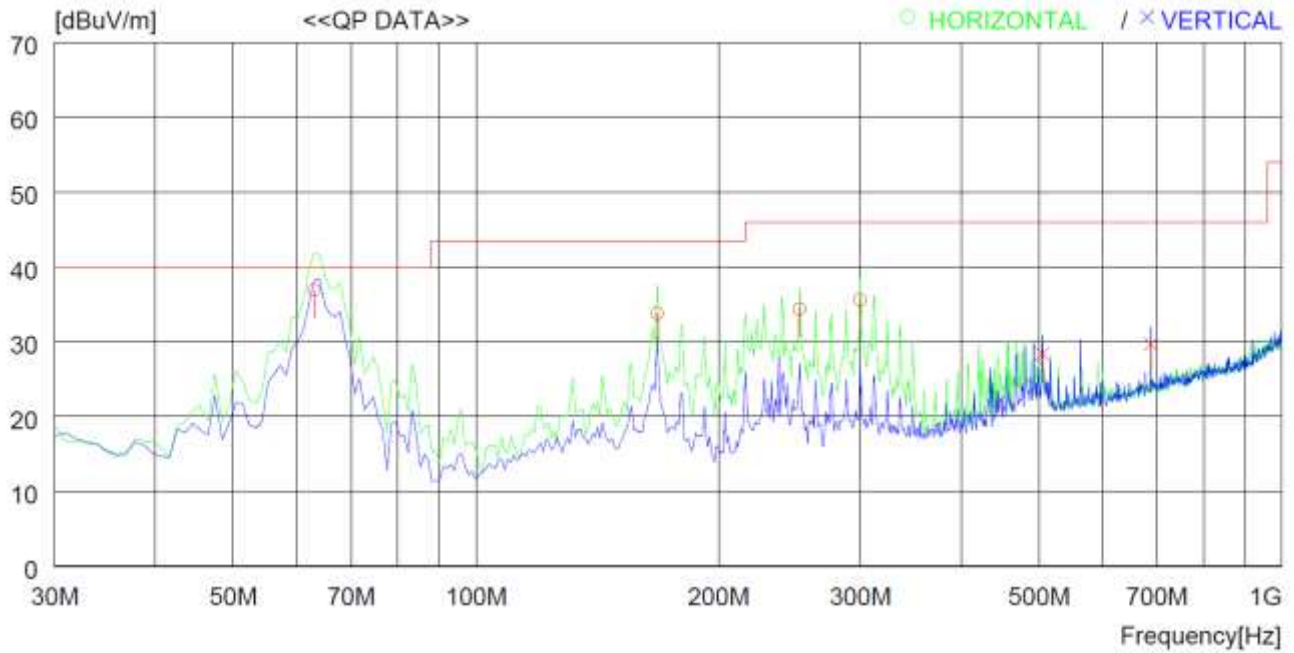
14.7.1 Test data for Bluetooth Mode [Right Earbud]

Limits apply to : FCC CFR 47, PART 15, SUBPART C, SECTION 15.247

Result : PASSED

EUT : BeCozU

Detector : CISPR Quasi-Peak (6 dB Bandwidth: 120 kHz)



No.	FREQ	READING	ANT	LOSS	GAIN	RESULT	LIMIT	MARGIN	ANTENNA	TABLE
	[MHz]	QP	FACTOR	[dB]	[dB]	[dBuV/m]	[dBuV/m]	[dB]	[cm]	[DEG]
----- Horizontal -----										
1	62.980	55.3	12.5	1.1	32.0	36.9	40.0	3.1	300	196
2	167.740	46.5	17.4	1.9	32.0	33.8	43.5	9.7	200	359
3	252.130	46.2	17.9	2.3	32.0	34.4	46.0	11.6	100	172
4	299.660	45.7	19.4	2.5	32.0	35.6	46.0	10.4	100	172
----- Vertical -----										
5	504.331	34.3	23.2	3.2	32.3	28.4	46.0	17.6	100	359
6	687.655	32.6	25.4	4.0	32.3	29.7	46.0	16.3	200	0

14.8 Test data for Below 30 MHz [Right Earbud]

- . Resolution bandwidth : 200 Hz (from 9 kHz to 0.15 MHz), 9 kHz (from 0.15 MHz to 30 MHz)
- . Frequency range : 9 kHz ~ 30 MHz
- . Measurement distance : 3 m

Frequency (MHz)	Reading (dBμV)	Ant. Pol. (H/V)	Ant. Factor (dB/m)	Cable Loss	Amp Gain	Emission Level(dBμV/m)	Limits (dBμV/m)	Margin (dB)
Emission from the EUT more than 20 dB below the limit in each frequency range.								

14.9 Test data for Above 1 GHz [Right Earbud]

- . Resolution bandwidth : 1 MHz and Peak Detector for Peak Mode
1 MHz and RMS Detector for Average Mode
- . Video bandwidth : 3 MHz for Peak and Average Mode
- . Frequency range : 1 GHz ~ 26.5 GHz
- . Measurement distance : 3 m

Frequency (MHz)	Reading (dBμV)	Ant. Pol. (H/V)	Ant. Factor (dB/m)	Cable Loss	Amp Gain	Emission Level(dBμV/m)	Limits (dBμV/m)	Margin (dB)
Emission from the EUT more than 20 dB below the limit in each frequency range.								

15. LIST OF TEST EQUIPMENT

Model Number	Manufacturer	Description	Serial Number	Last Cal.(Interval)
FSV30	Rohde & Schwarz	Signal Analyzer	101757	Jul. 02, 2025 (1Y)
SMBV100A	Rohde & Schwarz	VECTOR SIGNAL GENERATOR	260423	Jan 14, 2025 (1Y)
SMB100A	Rohde & Schwarz	SiGNAL GENERATOR	177648	Jan 13, 2025 (1Y)
NRP33S	Rohde & Schwarz	3-Path Diode Power Sensor	103230	Jan 06, 2025 (1Y)
ESU	Rohde & Schwarz	EMI Test Receiver	100261	Mar. 05, 2025 (1Y)
310N	Sonoma Instrument	Pre-Amplifier	392756	Oct. 16, 2025 (1Y)
SCU18	Rohde & Schwarz	Pre-Amplifier	102209	Oct. 02, 2025 (1Y)
SCU40A	Rohde & Schwarz	Pre-Amplifier	100436	Jan. 15, 2025 (1Y)
DT2000-2t	Innco System	Turn Table	N/A	N/A
MA-4640-XPET	Innco System	Antenna Master	MA4640/652/43100318/P	N/A
CO3000	Innco System	Controller	1026/40960617/P	N/A
HLP-2008	TDK RF Solutions	Hybrid Antenna	131316	Mar. 09, 2024 (2Y)
BBHA9120D	Schwarzbeck	Horn Antenna	9120D-1366	Jun. 19, 2025 (1Y)
BBHA9170	Schwarzbeck	Horn Antenna	BBHA9170178	Jan. 04, 2025 (1Y)
HPF 3GHz	Rohde & Schwarz	High Pass Filter	N/A	Jan. 13, 2025 (1Y)
8493C	HP	6 dB Attenuator	06134	Jul. 04, 2025 (1Y)