



TEST REPORT



Report No. : KES-EM240349

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KES Co., Ltd.

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1. Client

Applicant : Hanwha Vision Co., Ltd

Applicant Address : 6, Pangyo-ro 319Beon-gil, Bundang-gu, Seongnam-si, Gyeonggi-do, Republic of Korea

2. Sample Description

Product name : IP AUDIO BRIDGE

Model/Type No. : SPA-B1000

Variant Model : -

Manufacturer : Inter-M Corporation

Manufacturer Address : 73, Hwahap-ro 1402beon-gil, Yangju-si, Gyeonggi-do, Republic of Korea

3. Date of Receipt : Jan. 25, 2024

4. Test date : Apr. 23, 2024

5. Date of Issue : Apr. 30, 2024

6. Test Results : In Compliance

Tested by

Reviewed by

Seon Ho, Choi
EMC Test Engineer

Dong Hun, Jang
EMC Technical Manager

This test report is not related to KS Q ISO/IEC 17025 and KOLAS.

**REPORT REVISION HISTORY**

Date	Test Report No.	Revision History
Apr. 30, 2024	KES-EM240349	Issued

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1.0 General Product Description

Main Specifications of EUT are:

Product	
Type	IP Audio Bridge
Line Output	
Output Level	None
Frequency Response	None
THD + N Ratio (AES17 LPF)	None
S/N Ratio (20kHz LPF, A-WTD)	None
Line Input	
Maximum Input Level	+6dBV Max
Amplifier	
Description	None
Network	
Ethernet	10/100 Base-T
Memory	
Internal Memory	1 GBytes
External Memory (Micro SD)	SDHC upto 32GB (SANDISK)
Contact	
Contact Input. Dry contact	One channel
Contact Output. Dry contact (NO)	One channel
General	
Operating Temperature	-20 ~ +50°C (-4°F ~ +122°F)
Operating Humidity	10~95% RH (Non-Condensing)
IP code	None
Weight	0.24 Kg
Size	123(W)*80(H)*30.6(D)mm
Color	White
Certificate	EMC : KS C 9832/9835, EN 55032/55035, FCC Part 15 Subpart B, ICES-003 Safety : KC 62368-1, UL 62368-1, CAN/CSA 62368-1



Power	
PoE	PoE (IEEE 802.3 af type 1 Class 3)
PoE+	DC 8V ~ 24V
Embedded MIC	
Input Sensitivity	None
Frequency Response	None
Audio	
Supported Audio Format	File Streaming: WAV, MP3 in mono/stereo from 64 kbps to 320 kbps. Sampling rate from 16 kHz up to 48 kHz
Speaker	
Speaker Component	None
Max. Sound Pressure Level (PoE)	None
Max. Sound Pressure Level (PoE+)	None
Frequency Range (-10dB)	None
Sensitivity (1Watt)	None
Coverage Pattern	None
Network Protocol	
Security	Password protection : admin,setup,user,guest (sha-2, Digest authentication, User access log) Digest authentication, User access log
Supported Protocols	IPv4, HTTP, mDNS, DNS, NTP, TCP, UDP, DHCP, ARP, ICMP
System Integration	
API (Application Programming Interface)	SUNAPI
Multi-source Dynamic PA control	None
VoIP	None
TTS	None
Audio Monitoring	None
Event & Preset	Virtual Contact, Dry contact
Functional Monitoring	Connection verification, Built-in system logging



1.1 Test Voltage & Frequency

Unless indicated otherwise on the individual data sheet or test results, the test voltage and frequency was as indicated below.

☒ AC 240 V, 50 Hz

☒ PoE

1.2 Variant Model Differences

Not applicable

1.3 Device Modifications

Not applicable

1.4 Equipment Under Test

Description	Model Number	Serial Number	Manufacturer	Remarks
IP AUDIO BRIDGE	SPA-B1000	-	Inter-M Corporation	EUT
AC / DC Adapter	KPL-060M-VI	-	Channel Well Technology (Guangzhou) Co.,Ltd.	-

1.5 Support Equipments

Description	Model Number	Serial Number	Manufacturer	Remarks
Speaker	-	-	-	-
Notebook	LG15U590	-	LG Electronics Co., Ltd.	-
Notebook Adapter	A13-040N3A	-	CHICONY POWER TECHNOLOGY (Chongqing) CO., LTD.	-
PoE Switch	GS728TPP	3AR3595700005	NETGEAR®	-
Smart Phone	SM-G991N	-	SAMSUNG	-
switching hub	H508	-	IpTIME	-
switching hub Adapter	DWA05200K	-	Dongguan City Rongrun Industry Co.,Ltd	-
Micro SD Card	-	-	Sandisk	8 GB
Multimeter	-	-	-	-



1.6 External I/O Cabling

■ DC 24 V Mode

Start		END		Cable Spec.	
Description	I/O Port	Description	I/O Port	Length	Shield
IP AUDIO BRIDGE (EUT)	DC Jack	AC / DC Adapter (EUT)	Line out	1.5	U
	AUX IN	Notebook	3.5 mm	1.0	U
	RJ-45(LAN)	switching hub	RJ-45(LAN)	3.5	U
	1 Pin	IP AUDIO BRIDGE (EUT)	1 Pin	0.1	U
	1 Pin	Multimeter	1 Pin	0.1	U
	Micro SD Card Slot	Micro SD Card	Micro SD Card Slot	0.1	-
	GND	Earth	GND	1.2	U
Poe Switch	RJ-45(LAN)	switching hub	RJ-45(LAN)	1.5	U
	RJ-45(PoE)	Speaker	RJ-45(PoE)	1.6	U
	RJ-45(LAN)	Notebook	RJ-45(LAN)	1.2	U
Notebook	DC Jack	Notebook Adapter	DC Jack	1.4	U
switching hub	DC Jack	switching hub Adapter	DC Jack	1.2	U

* Unshielded=U, Shielded=S

■ PoE Mode

Start		END		Cable Spec.	
Description	I/O Port	Description	I/O Port	Length	Shield
IP AUDIO BRIDGE (EUT)	RJ-45(PoE)	PoE Switch	RJ-45(PoE)	3.5	U
	AUX IN	Notebook	3.5 mm	1.0	U
	1 Pin	IP AUDIO BRIDGE (EUT)	1 Pin	0.1	U
	1 Pin	Multimeter	1 Pin	0.1	U
	Micro SD Card Slot	Micro SD Card	Micro SD Card Slot	0.1	-
	GND	Earth	GND	1.2	U
Poe Switch	RJ-45(PoE)	Speaker	RJ-45(PoE)	1.6	U
	RJ-45(LAN)	Notebook	RJ-45(LAN)	1.2	U
Notebook	DC Jack	Notebook Adapter	DC Jack	1.4	U

* Unshielded=U, Shielded=S



1.7 EUT Operating Mode(s)

■ DC 24 V Mode, PoE Mode

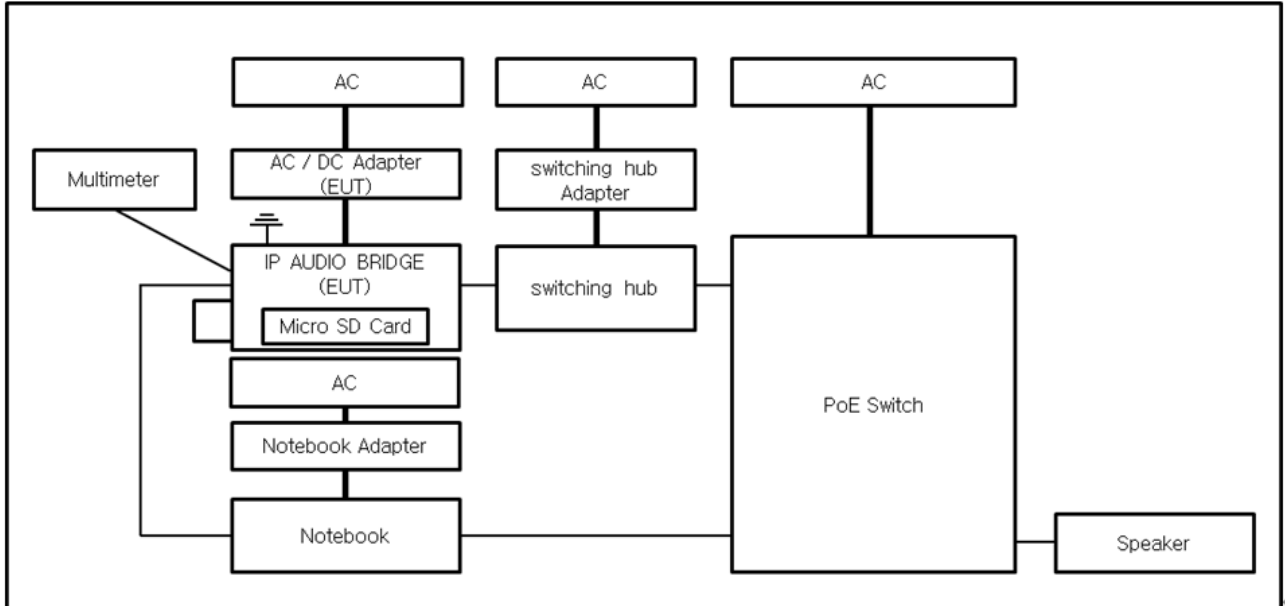
Test mode	operating
Operating	The test was performed by running Pingtest on a laptop to check whether the test equipment was connected properly and whether 1 kHz tone was output to the speaker through the test equipment.

EUT Test operating S/W		
Name	Version	Manufacture Company
-	-	-

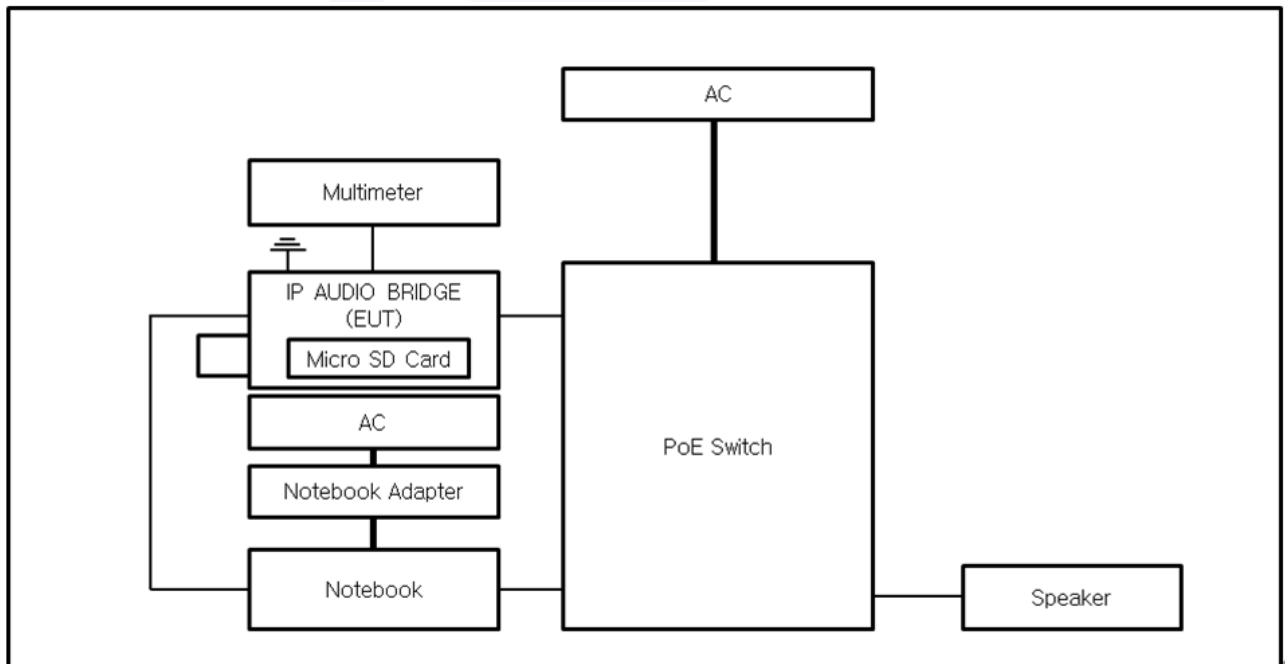


1.8 Configuration

■ DC 24 V Mode



■ PoE Mode



**1.9 Remarks when standards applied**

In PoE mode, the LAN port operates as a power-related port, so power-related tests were excluded.





1.10 Calibration Details of Equipment Used for Measurement

Test equipment and test accessories are calibrated on regular basis. The maximum time between calibrations is one year or what is recommended by the manufacturer, whichever is less.

1.11 Test Facility

The measurement facility is located at 473-21, Gayeo-ro, Yeosu-si, Gyeonggi-do, 12658, Korea, Republic of. The sites are constructed in conformance with the requirements of ANSI C63.4a-2017 and CISPR 16-1-4:2019

1.12 Laboratory Accreditations and Listings

Country	Agency	Scope of Accreditation	Logo
KOREA	RRA	EMI (3 m & 10 m Semi-Anechoic Chamber and conducted test site) EMS (ESD, RS, EFT/Burst, Surge, CS, Magnetic, Dips and interruptions)	 KR0100
International	KOLAS	EMI (3 m & 10 m Semi-Anechoic Chamber and conducted test site) EMS (ESD, RS, EFT/Burst, Surge, CS, Magnetic, Dips and interruptions)	 KT489
USA	FCC	3 m & 10 m Semi-Anechoic Chamber Conducted test site to perform FCC Part 15/18 measurements.	 KR0100
Canada	ISED	3 m & 10 m Semi-Anechoic Chamber and Conducted test site	 23298
JAPAN	VCCI	EMI (3 m & 10 m Semi-Anechoic Chamber and conducted test site)	 C-20136, T-20137, R-20181, G-20176
Europe	TÜV SÜD	EMI (3 m & 10 m Semi-Anechoic Chamber and conducted test site) EMS (ESD, RS, EFT/Burst, Surge, CS, Magnetic, Dips and interruptions)	 CARAT 001633 0004



2.0 Test Regulations

The emissions tests were performed according to following regulations:

☒ **AS/NZS CISPR 32:2015 AMD 1:2020**

☒ Class A

☐ Class B





2.1 Conducted Emissions at Mains Power Ports

Test Date

Apr. 23, 2024

Test Location

Electro wave Shieldroom #6

Test Equipment

Used	Description	Model Number	Manufacturer	Serial Number	Cal. Due
<input checked="" type="checkbox"/>	EMI Test S/W	EMC32	R & S	9.12.00	-
<input checked="" type="checkbox"/>	EMI Test S/W	EMC32	R & S	9.12.00	11, 08, 2024
<input checked="" type="checkbox"/>	EMI TEST RECEIVER	ESR3	R & S	101783	11, 08, 2024
<input checked="" type="checkbox"/>	LISN	ENV216	R & S	101787	01, 10, 2025
<input checked="" type="checkbox"/>	LISN	ENV216	R & S	101137	11, 08, 2024

Test Conditions

Temperature: (22,4 ± 0,2) °C

Relative Humidity: (46,3 ± 0,3) % R.H.

Frequency Range of Measurement

150 kHz to 30 MHz

Instrument Settings

IF Band Width: 9 kHz

Test Results

The requirements are:

- ☒ PASS
☐ NOT PASS
☐ NOT APPLICABLE

RemarksSee Appendix A for test data.



2.2 Conducted Emissions at Telecommunication Ports

Test Date

Apr. 23, 2024

Test Location

Electro wave Shieldroom #6

Test Equipment

Used	Description	Model Number	Manufacturer	Serial Number	Cal. Due
<input checked="" type="checkbox"/>	EMI Test S/W	EMC32	R & S	9.12.00	-
<input checked="" type="checkbox"/>	EMI TEST RECEIVER	ESR3	R & S	101783	11, 08, 2024
<input checked="" type="checkbox"/>	LISN	ENV216	R & S	101787	11, 08, 2024
<input checked="" type="checkbox"/>	LISN	ENV216	R & S	101137	01, 10, 2025
<input checked="" type="checkbox"/>	PULSE LIMITER	ESH3-Z2	R & S	101915	11, 08, 2024
<input checked="" type="checkbox"/>	8-WIRE ISN CAT3,5	ENY81	R & S	100174	11, 09, 2024
<input type="checkbox"/>	8-WIRE ISN CAT6	ENY81-CAT6	R & S	101666	03, 05, 2025

Test Conditions

Temperature: (22,4 ± 0,2) °C

Relative Humidity: (46,3 ± 0,2) % R.H.

Frequency Range of Measurement

150 kHz to 30 MHz

Instrument Settings

IF Band Width: 9 kHz

Test Results

The requirements are:

- ☒ PASS
☐ NOT PASS
☐ NOT APPLICABLE

RemarksSee Appendix A for test data.



2.3 Radiated Electric Field Emissions(Below 1 GHz)

Test Date

Apr. 23, 2024

Test Location☐ OPEN AREA TEST SITE #2☒ SEMI ANECHOIC CHAMBER #4(10m)**Test Equipment**

Used	Description	Model Number	Manufacturer	Serial Number	Cal. Due
<input checked="" type="checkbox"/>	EMI Test S/W	EP5/RE	TOYO Corporation	6.0.0	-
<input checked="" type="checkbox"/>	EMI TEST RECEIVER	ESU26	R & S	100551	02, 13, 2025
<input checked="" type="checkbox"/>	AMPLIFIER	SCU 01	R & S	100603	11, 08, 2024
<input checked="" type="checkbox"/>	TRILOG-BROADBAND ANTENNA	VULB9163	Schwarzbeck	715	11, 17, 2024
<input checked="" type="checkbox"/>	ATTENUATOR	8491A	HP	32173	02, 13, 2025

Test Conditions

Temperature: (22,8 ± 0,3) °C

Relative Humidity: (45,5 ± 0,4) % R.H.

Frequency Range of Measurement

30 MHz to 1 GHz

Instrument Settings

IF Band Width: 120 kHz

Test Results

The requirements are:

- ☒ PASS
☐ NOT PASS
☐ NOT APPLICABLE

RemarksSee Appendix A for test data.



2.4 Radiated Electric Field Emissions(Above 1 GHz)

Test Date

Apr. 23, 2024

Test Location

SEMI ANECHOIC CHAMBER #3

Test Equipment

Used	Description	Model Number	Manufacturer	Serial Number	Cal. Due
<input checked="" type="checkbox"/>	EMI Test S/W	EP5/RE	TOYO Corporation	6.0.0	-
<input checked="" type="checkbox"/>	EMI TEST RECEIVER	ESR7	R & S	101190	07, 31, 2024
<input checked="" type="checkbox"/>	PREAMPLIFIER	8449B	AGILENT	3008A01967	03, 05, 2025
<input checked="" type="checkbox"/>	ATTENUATOR	8491A	HP	35496	02, 13, 2025
<input checked="" type="checkbox"/>	DOUBLE RIDGED HORN ANTENNA	SAS-571	A.H.SYSTEM,INC	781	03, 05, 2025

Test Conditions

Temperature: (22,4 ± 0,2) °C

Relative Humidity: (46,1 ± 0,2) % R.H.

Frequency Range of Measurement

1 GHz to 6 GHz

Instrument Settings

IF Band Width: 1 MHz

Test Results

The requirements are:

- ☒ PASS
☐ NOT PASS
☐ NOT APPLICABLE

RemarksSee Appendix A for test data.



APPENDIX A – TEST DATA

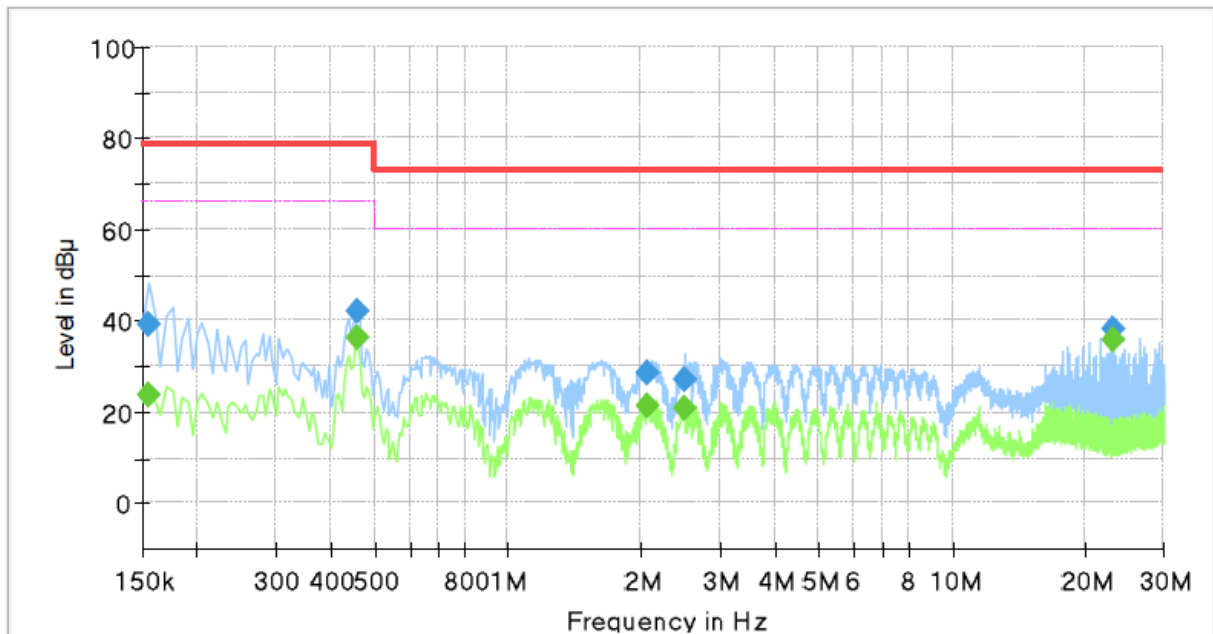
Conducted Emissions at Mains Power Ports

■ DC 24 V Mode

HOT LINE

Common Information

Test Description: Conducted Emission
Model No.: SPA-B1000
Phase: H
Mode: DC 24 V
Operator Name: KES



Final Result

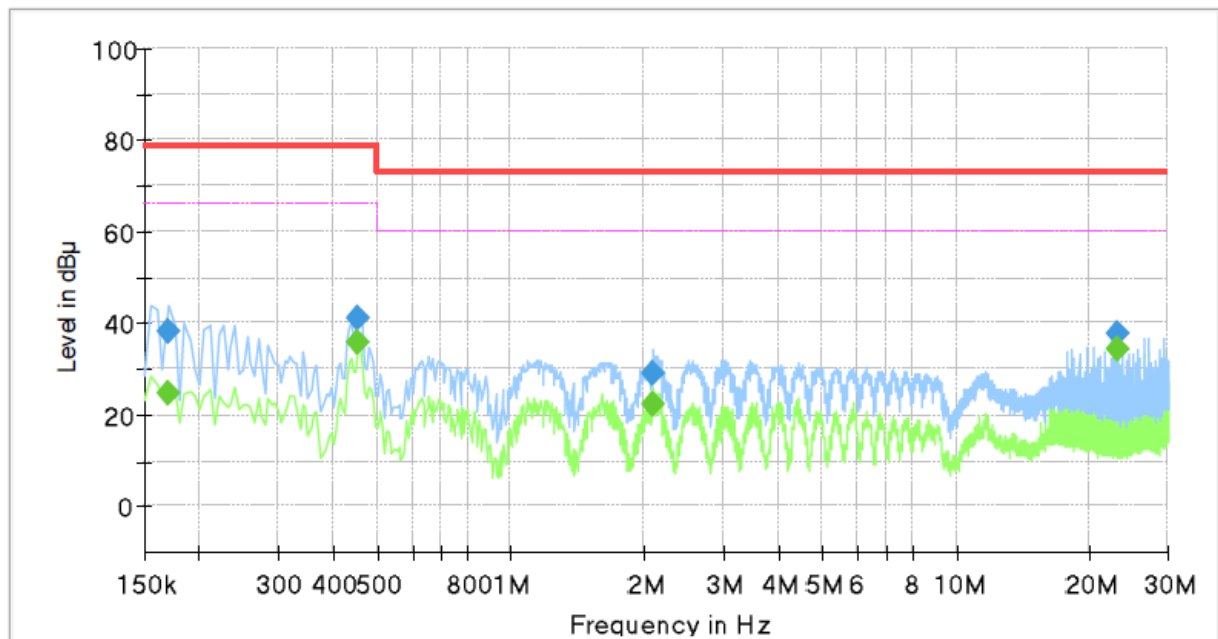
Frequency (MHz)	QuasiPeak (dBμV)	CAverage (dBμV)	Limit (dBμV)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Line	Corr. (dB)
0.155000	---	23.74	66.00	42.26	1000.0	9.000	L1	19.4
0.155000	38.99	---	79.00	40.01	1000.0	9.000	L1	19.4
0.460000	---	36.11	66.00	29.89	1000.0	9.000	L1	19.4
0.460000	41.99	---	79.00	37.01	1000.0	9.000	L1	19.4
2.055000	---	21.22	60.00	38.78	1000.0	9.000	L1	19.5
2.055000	28.40	---	73.00	44.60	1000.0	9.000	L1	19.5
2.510000	---	20.70	60.00	39.30	1000.0	9.000	L1	19.5
2.510000	27.10	---	73.00	45.90	1000.0	9.000	L1	19.5
23.130000	---	35.88	60.00	24.12	1000.0	9.000	L1	20.3
23.130000	38.19	---	73.00	34.81	1000.0	9.000	L1	20.3



NEUTRAL LINE

Common Information

Test Description: Conducted Emission
Model No.: SPA-B1000
Phase: N
Mode: DC 24 V
Operator Name: KES

**Final Result**

Frequency (MHz)	QuasiPeak (dB μ V)	CAverage (dB μ V)	Limit (dB μ V)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Line	Corr. (dB)
0.170000	---	24.61	66.00	41.39	1000.0	9.000	N	19.3
0.170000	38.40	---	79.00	40.60	1000.0	9.000	N	19.3
0.455000	---	35.98	66.00	30.02	1000.0	9.000	N	19.4
0.455000	40.95	---	79.00	38.05	1000.0	9.000	N	19.4
2.085000	---	22.48	60.00	37.52	1000.0	9.000	N	19.5
2.085000	29.10	---	73.00	43.90	1000.0	9.000	N	19.5
23.130000	---	34.61	60.00	25.39	1000.0	9.000	N	20.3
23.130000	37.69	---	73.00	35.31	1000.0	9.000	N	20.3

◆ Calculation

QuasiPeak[dBuV] / CAverage [dBuV] = Reading Value[dBuV] + Corr. [dB]

QuasiPeak / CAverage : The Final Value

Reading Value : Not shown in the table.

Corr. : Correction values (LISN FACTOR + (Cable Loss + Pulse Limiter FACTOR))

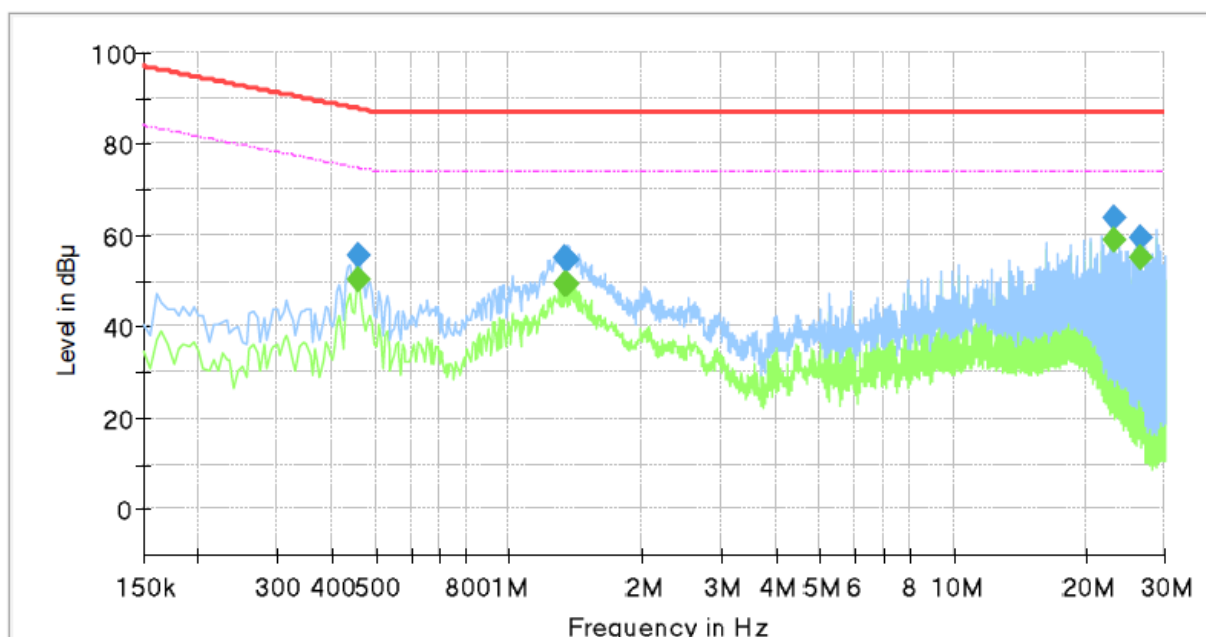
**Conducted Emissions at Telecommunication Ports**

■ DC 24 V Mode

[1 000 Mbps]

Common Information

Test Description: Telecommunication Emission
Model No.: SPA-B1000
Mode : DC 24 V
Speed : 100 Mbps
Operator Name: KES

**Final Result**

Frequency (MHz)	QuasiPeak (dBμV)	CAverage (dBμV)	Limit (dBμV)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Line	Corr. (dB)
0.460000	---	50.25	74.69	24.44	1000.0	9.000	Single Line	19.4
0.460000	55.49	---	87.69	32.20	1000.0	9.000	Single Line	19.4
1.335000	---	49.24	74.00	24.76	1000.0	9.000	Single Line	19.3
1.335000	54.90	---	87.00	32.10	1000.0	9.000	Single Line	19.3
1.360000	---	49.31	74.00	24.69	1000.0	9.000	Single Line	19.3
1.360000	54.86	---	87.00	32.14	1000.0	9.000	Single Line	19.3
23.130000	---	59.22	74.00	14.78	1000.0	9.000	Single Line	20.1
23.130000	63.65	---	87.00	23.35	1000.0	9.000	Single Line	20.1
26.490000	---	55.14	74.00	18.86	1000.0	9.000	Single Line	20.2
26.490000	59.51	---	87.00	27.49	1000.0	9.000	Single Line	20.2

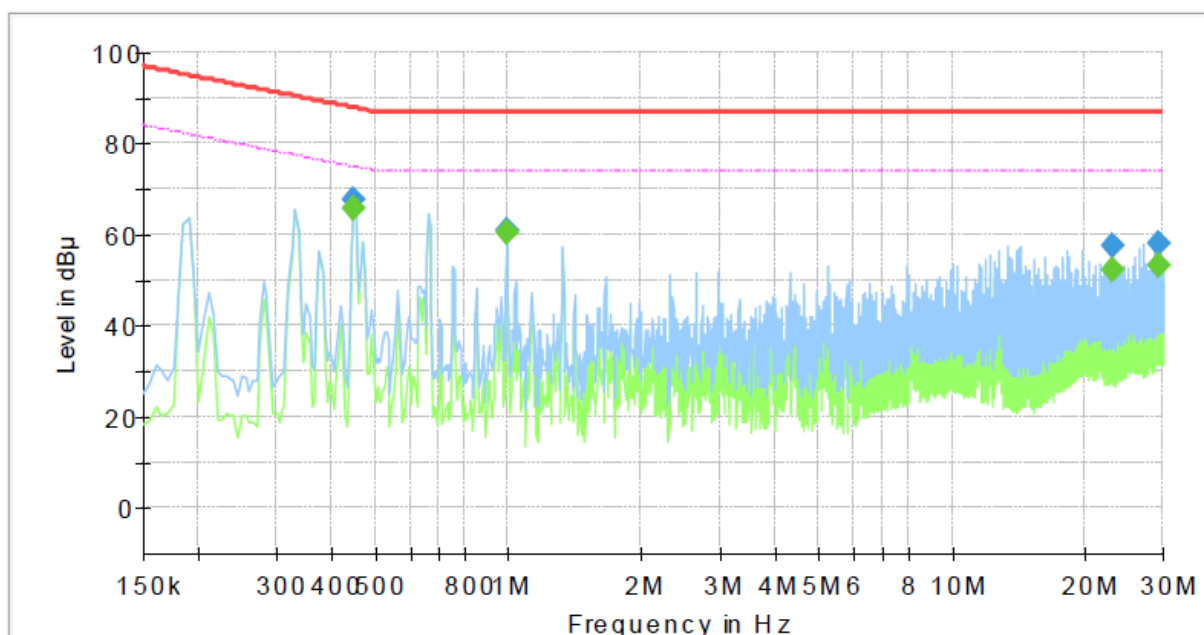


■ PoE Mode

[1 000 Mbps]

Common Information

Test Description: Telecommunication Emission
Model No.: SPA-B1000
Mode : PoE
Speed : 100 Mbps
Operator Name: KES

**Final Result**

Frequency (MHz)	QuasiPeak (dBμV)	CAverage (dBμV)	Limit (dBμV)	Margin (dB)	Meas. Time (ms)	Bandwidth (kHz)	Line	Corr. (dB)
0.450000	---	65.98	74.88	8.90	1000.0	9.000	Single Line	19.4
0.450000	67.45	---	87.88	20.43	1000.0	9.000	Single Line	19.4
0.995000	---	60.60	74.00	13.40	1000.0	9.000	Single Line	19.3
0.995000	60.72	---	87.00	26.28	1000.0	9.000	Single Line	19.3
23.130000	---	52.41	74.00	21.59	1000.0	9.000	Single Line	20.1
23.130000	57.48	---	87.00	29.52	1000.0	9.000	Single Line	20.1
29.235000	---	53.28	74.00	20.72	1000.0	9.000	Single Line	20.3
29.235000	58.04	---	87.00	28.96	1000.0	9.000	Single Line	20.3

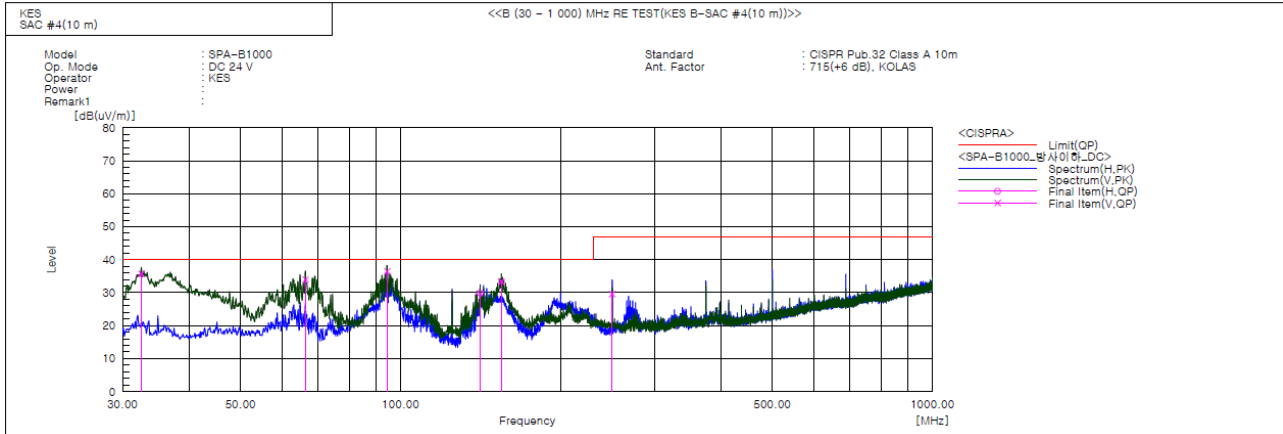
◆ Calculation

$$\text{QuasiPeak [dBuV]} / \text{CAverage [dBuV]} = \text{Reading Value [dBuV]} + \text{Corr. [dB]}$$

QuasiPeak / CAverage : The Final Value

Reading Value : Not shown in the table.

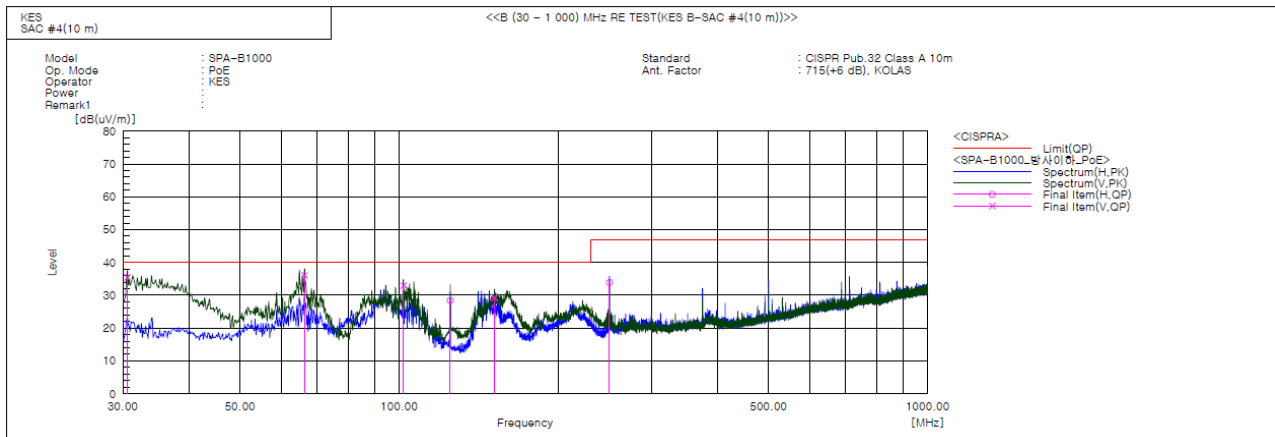
Corr. : Correction values (ISN FACTOR + (Cable Loss + Pulse Limiter FACTOR))

**Radiated Electric Field Emissions(Below 1 GHz)****■ DC 24 V Mode****Final Result**

No.	Frequency [MHz]	(P)	Reading QP [dB(uV)]	c.f [dB(1/m)]	Result QP [dB(uV/m)]	Limit QP [dB(uV/m)]	Margin QP [dB]	Height [cm]	Angle [deg]	Remark
1	32.546	V	61.0	-25.3	35.7	40.0	4.3	195.0	15.0	
2	66.254	V	57.7	-23.7	34.0	40.0	6.0	100.0	143.0	
3	94.384	V	59.4	-22.9	36.5	40.0	3.5	106.0	329.0	
4	141.186	H	55.2	-25.3	29.9	40.0	10.1	400.0	90.0	
5	154.766	V	58.4	-25.0	33.4	40.0	6.6	109.0	358.0	
6	249.948	V	48.4	-18.8	29.6	47.0	17.4	100.0	300.0	



■ PoE Mode



Final Result

No.	Frequency [MHz]	(P)	Reading QP [dB(μV)]	c.f [dB(1/m)]	Result QP [dB(μV/m)]	Limit QP [dB(μV/m)]	Margin QP [dB]	Height [cm]	Angle [deg]	Remark
1	30.606	V	61.0	-25.5	35.5	40.0	4.5	100.0	318.0	
2	66.254	V	59.8	-23.7	36.1	40.0	3.9	108.0	93.0	
3	101.901	V	55.3	-22.4	32.9	40.0	7.1	100.0	7.0	
4	124.939	H	53.0	-24.6	28.4	40.0	11.6	400.0	236.0	
5	151.493	V	54.4	-25.1	29.3	40.0	10.7	100.0	187.0	
6	249.948	H	52.7	-18.8	33.9	47.0	13.1	392.0	14.0	

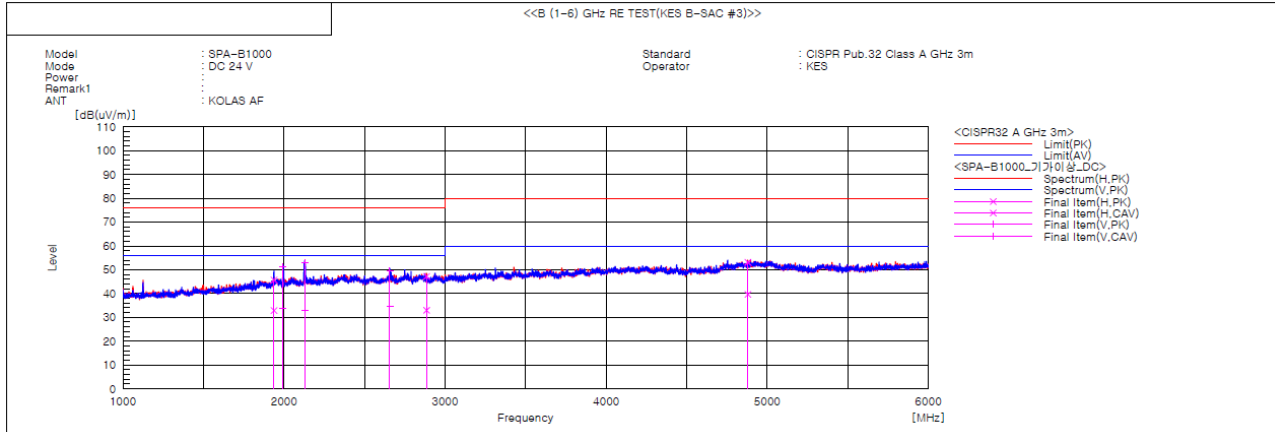
◆ Calculation

Result(QP) [dB(μV/m)] = (Reading(QP)[dB(μV)] + c.f[dB(1/m)])

Margin(QP)[dB] = Limit[dB(μV/m)] - Result(QP) [dB(μV/m)]

Reading(QP) : Reading value, Result(QP) : Reading value + Factor value

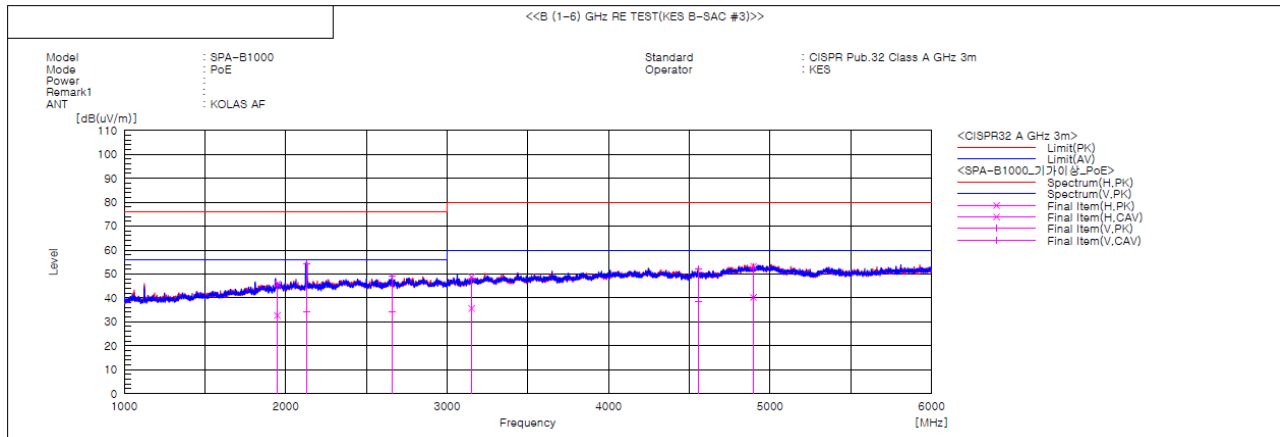
Limit(QP) : Limit value, c.f : (ANT Factor + Cable Loss - Preamp Factor), Margin: Margin value

**Radiated Electric Field Emissions(Above 1 GHz)****■ DC 24 V Mode****Final Result**

No.	Frequency [MHz]	(P)	Reading PK [dB(uV)]	Reading CAV [dB(uV)]	c.f [dB(1/m)]	Result PK [dB(uV/m)]	Result CAV [dB(uV/m)]	Limit PK [dB(uV/m)]	Limit AV [dB(uV/m)]	Margin PK [dB]	Margin CAV [dB]	Height [cm]	Angle [deg]	Remark
1	1938.441	H	41.4	28.6	4.3	45.7	32.9	76.0	56.0	30.3	23.1	100.0	62.7	
2	1994.230	V	46.5	29.1	4.8	51.3	33.9	76.0	56.0	24.7	22.1	100.0	202.4	
3	2129.368	V	47.9	27.9	4.9	52.8	32.8	76.0	56.0	23.2	23.2	100.0	182.8	
4	2656.510	V	43.2	28.3	6.4	49.6	34.7	76.0	56.0	26.4	21.3	100.0	193.0	
5	2884.980	H	39.9	25.7	7.3	47.2	33.0	76.0	56.0	28.8	23.0	100.0	117.9	
6	4878.885	H	38.1	24.7	15.0	53.1	39.7	80.0	60.0	26.9	20.3	100.0	347.8	



■ PoE Mode



Final Result

No.	Frequency [MHz]	(P)	Reading PK [dB(uV)]	Reading CAV [dB(uV)]	c.f [dB(1/m)]	Result PK [dB(uV/m)]	Result CAV [dB(uV/m)]	Limit PK [dB(uV/m)]	Limit AV [dB(uV/m)]	Margin PK [dB]	Margin CAV [dB]	Height [cm]	Angle [deg]	Remark
1	1948.209	H	41.4	28.3	4.4	45.8	32.7	76.0	56.0	30.2	23.3	100.0	343.1	
2	2131.402	V	49.3	29.5	4.9	54.2	34.4	76.0	56.0	21.8	21.6	100.0	194.1	
3	2659.210	V	42.5	27.7	6.4	48.9	34.1	76.0	56.0	27.1	21.9	100.0	219.5	
4	3151.377	H	40.9	27.8	7.8	48.7	35.6	80.0	60.0	31.3	24.4	100.0	125.8	
5	4555.584	V	39.5	25.8	12.5	52.0	38.3	80.0	60.0	28.0	21.7	100.0	132.4	
6	4896.716	H	38.1	25.1	15.1	53.2	40.2	80.0	60.0	26.8	19.8	100.0	354.4	

◆ Calculation

Result(PK/CAV) [dB(μV/m)] = (Reading(PK/CAV)[dB(μV)] + c.f[dB(1/m)]

Margin(PK/CAV)[dB] = Limit[dB(μV/m)] - Result(PK/CAV) [dB(μV/m)]

Reading(PK/CAV) : Reading value, Result(PK/CAV) : Reading value + Factor value

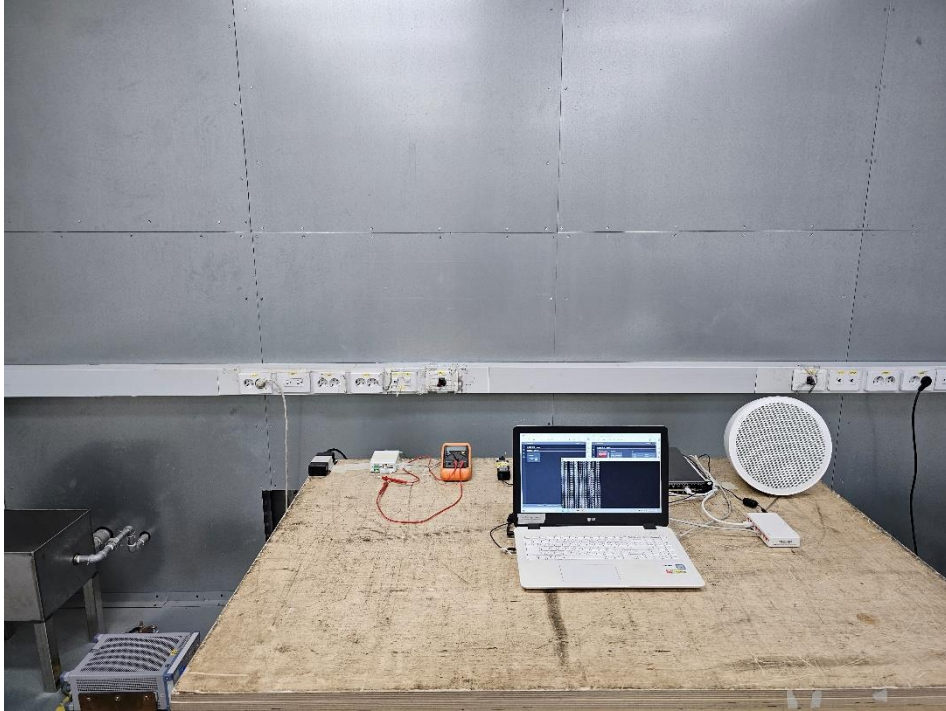
Limit(QP) : Limit value, c.f : (ANT Factor + Cable Loss - Preamp Factor), Margin: Margin value



Test Setup Photos and Configuration

Conducted Emissions at Mains Power Ports

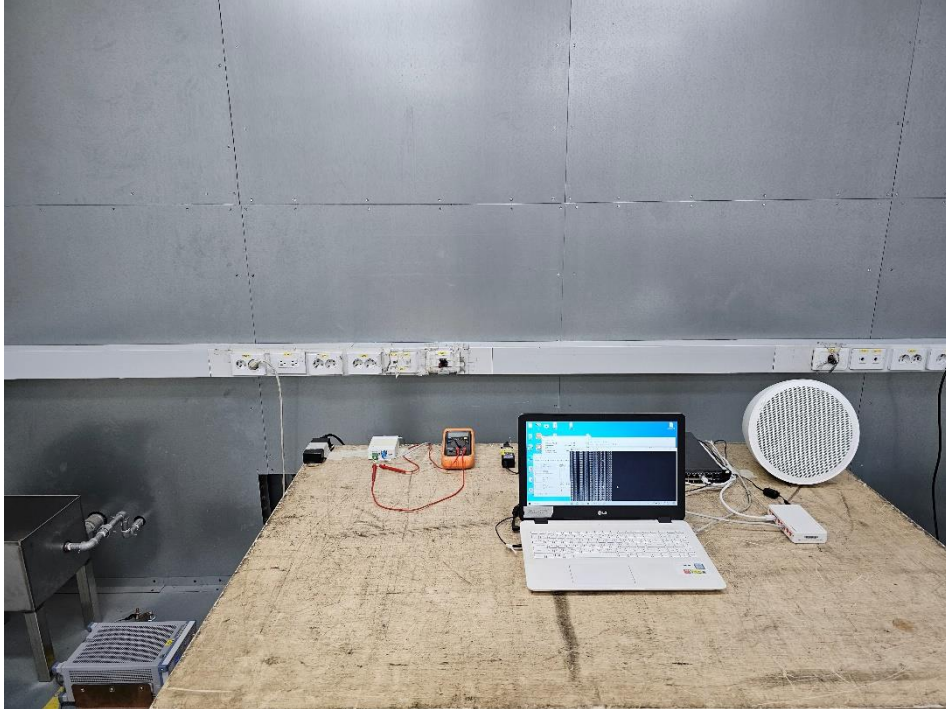
■ DC 24 V Mode





Conducted Emissions at Telecommunication Ports

■ DC 24 V Mode





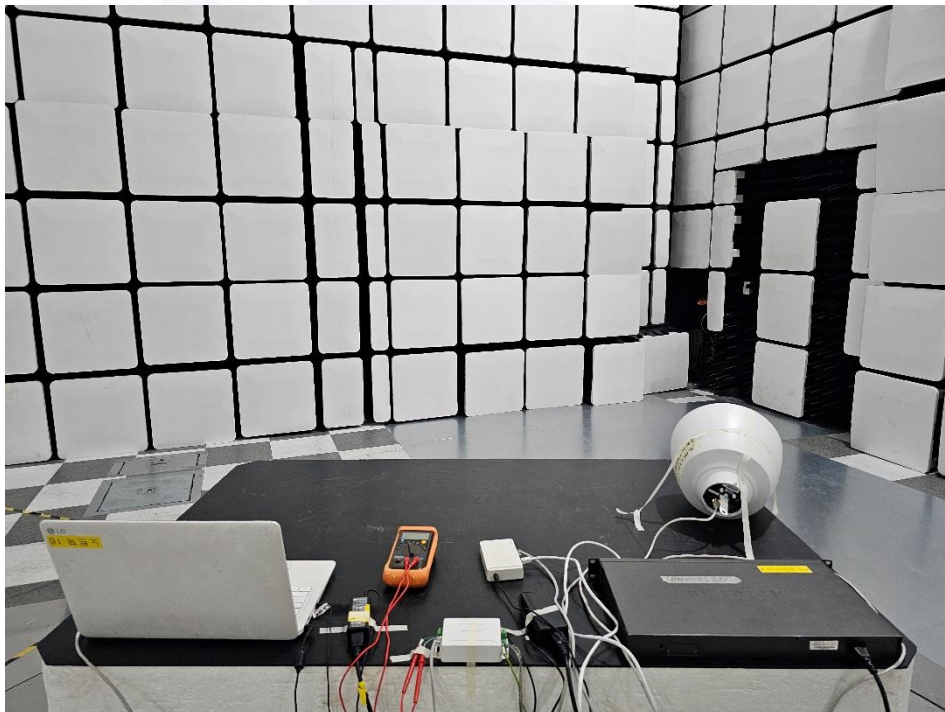
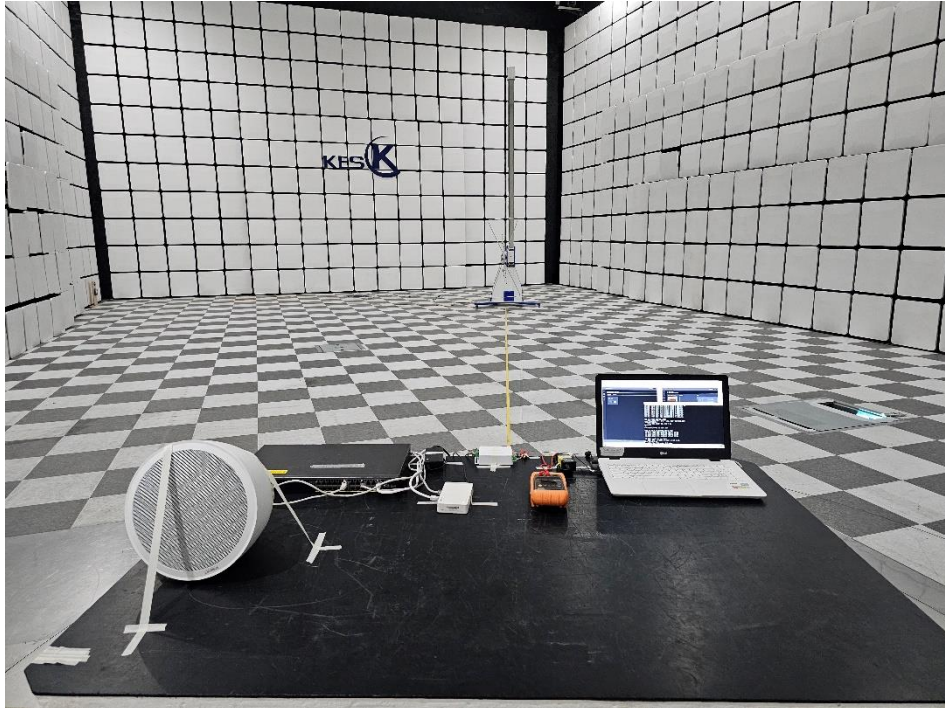
■ PoE Mode





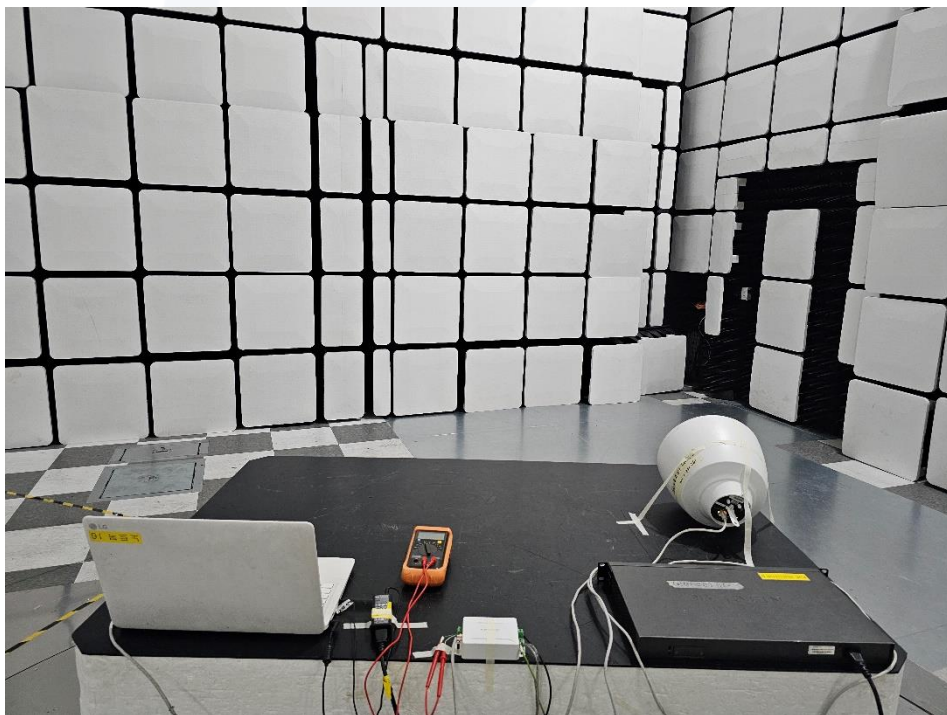
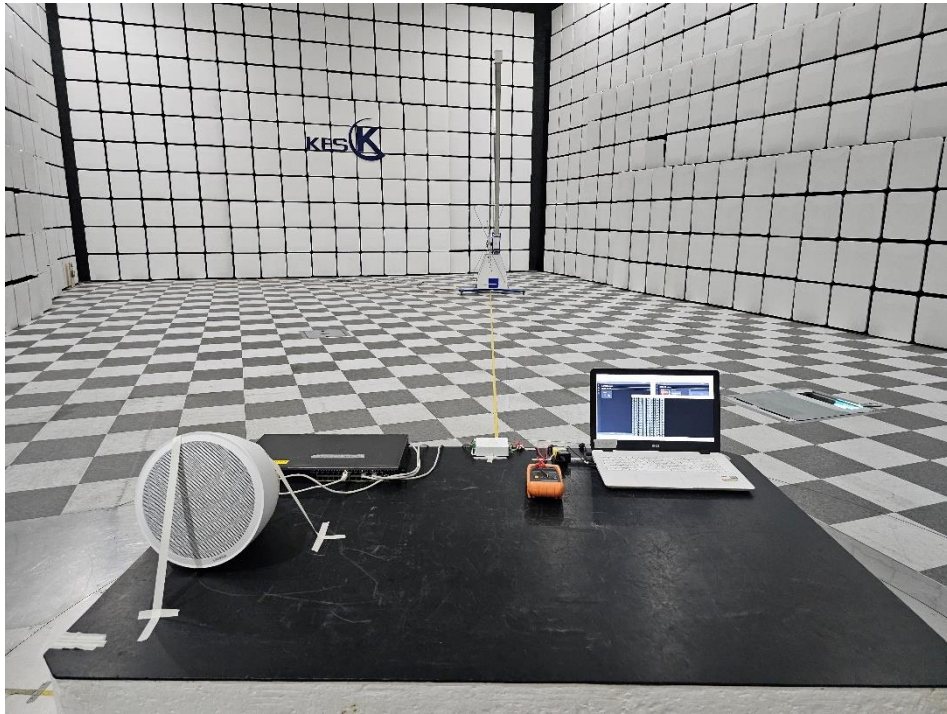
Radiated Electric Field Emissions(Below 1 GHz)

■ DC 24 V Mode





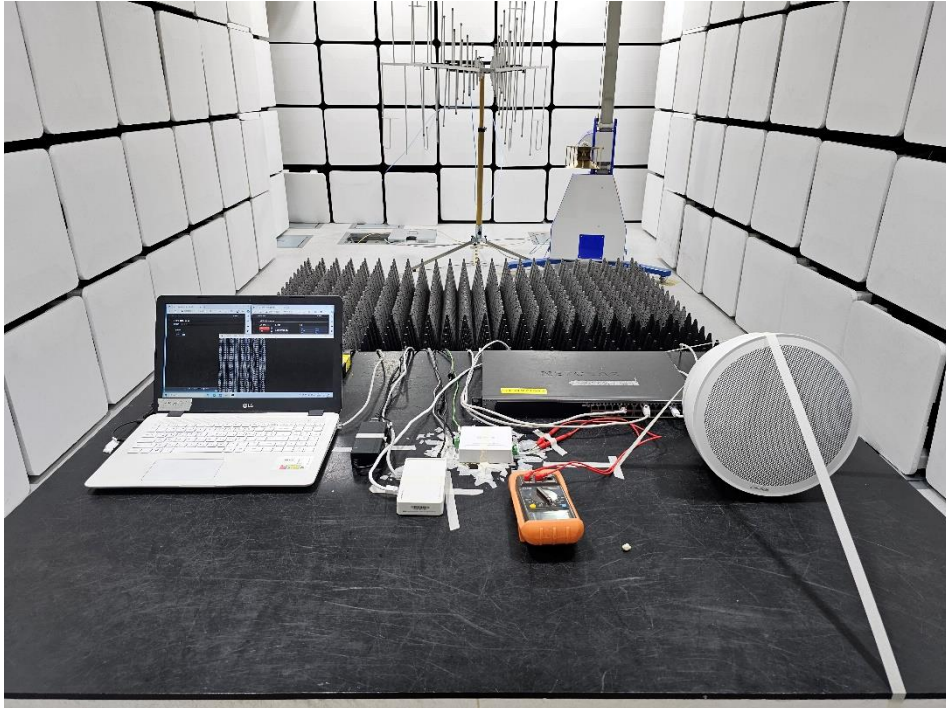
■ PoE Mode





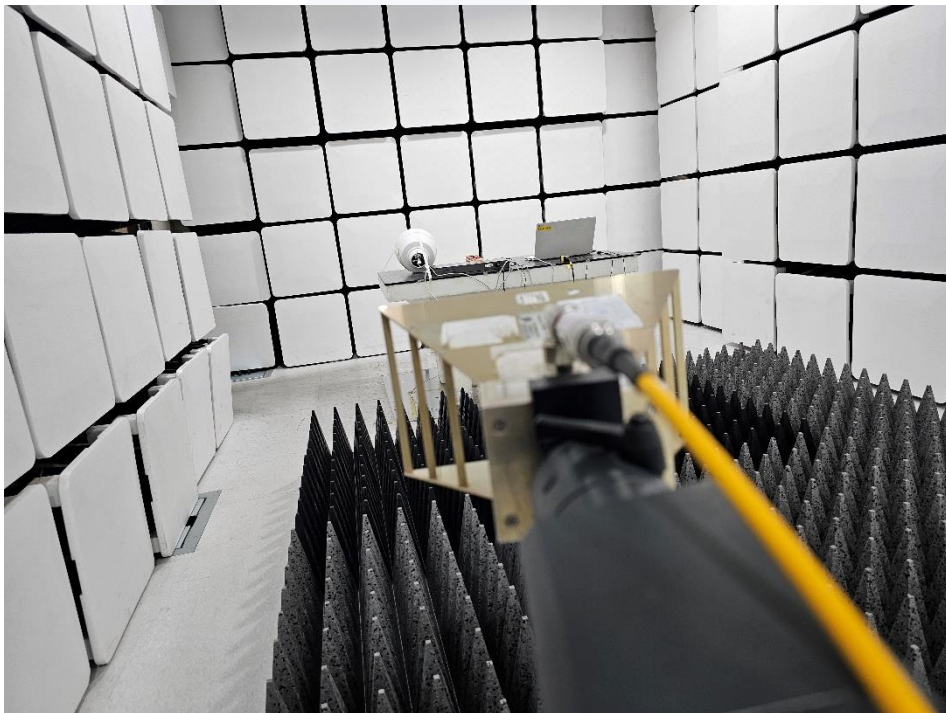
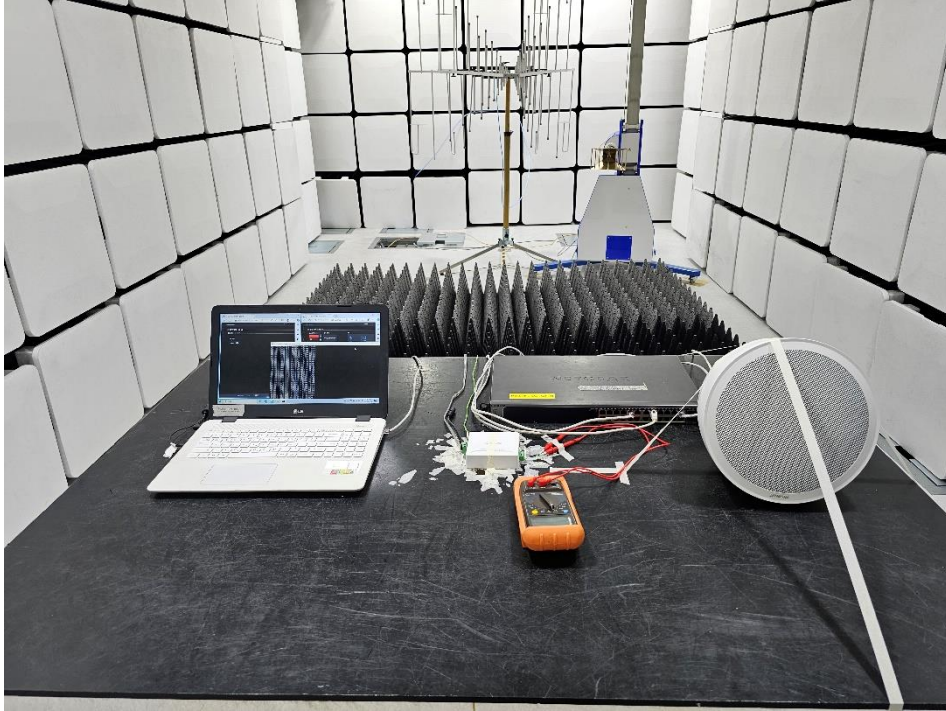
Radiated Electric Field Emissions(Above 1 GHz)

■ DC 24 V Mode





■ PoE Mode





EUT External Photographs

(Top)



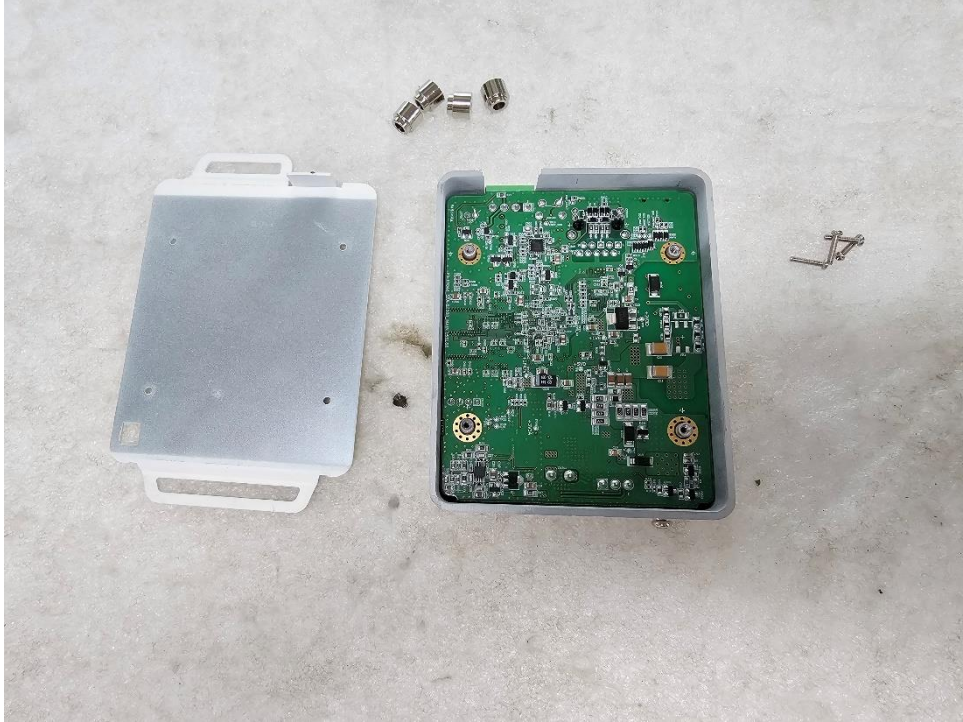
(Bottom)





EUT Internal Photographs

(Internal View)





EUT Internal View – Board

(Top)



(Bottom)

