TEST REPORT

LCD Display

Model No. : LM55P4****
(* = 0-9, A-Z, a-z, +, -, /, \ or blank)

FCC ID: 2APT9DWLM55P4

Brand: MITSUBISHI

Prepared for: Mitsubishi Electric Corporation Kyoto works
1 Zusho Baba, Nagaokakyo City, Kyoto 617-8550, Japan

Prepared By: Audix Technology (Shenzhen) Co., Ltd.
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Testing Laboratory
1418

TESTING
NVLAP LAB CODE 200372-0

Report Number	:	ACS-F19147
Date of Test	:	Jun.24~27,2019
Date of Report	:	Sep.04, 2019

The test report is based on a single evaluation of one sample of the above-mentioned products. It does not imply an assessment of the whole production and does not permit the use of the test lab logo.
The report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST, TAF, or any agency of the U.S. Government.

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TEST REPORT

Applicant	: Mitsubishi Electric Corporation Kyoto works
Product	: LCD Display
Model No.	: LM55P4****(* = 0-9, A-Z, a-z, +, -, /, \ or blank)
FCC ID	: 2APT9DWLM55P4
Brand	: MITSUBISHI
Report No.	: ACS-F19147
Power Supply	: AC 100-240V, 50/60Hz
Test Voltage	: AC 120V/60Hz

Rules of Compliance and Applicable Standards:

47 CFR FCC Part 15 Subpart B, Class A Limit
ANSI C63.4:2014
ICES-003 Issue 6: 2017(Updated)

The device described above was tested by Audix Technology (Shenzhen) Co., Ltd. to determine the maximum emission levels emanating from the device. All of the tests were requested by the applicant and the results thereof based upon the information that the applicant provided to us. We, Audix Technology (Shenzhen) Co., Ltd. assume full responsibility for the accuracy and completeness of these measurements. Also, this report shows that the EUT is compliance with the requirements of 47 CFR FCC Part 2 and ISED standards.

No modifications were required during testing to bring this product into compliance.

This report applies to above tested sample only and shall not be reproduced in part without written approval of Audix Technology (Shenzhen) Co., Ltd.

Date of Test : Jun.24~27, 2019 Report of date: Sep.04, 2019

Prepared by : Monica Liu
Monica Liu / Assistant

Reviewed by : Bensun Chen
Bensun Chen / Deputy Manager

AUDIX® 信華科技（深圳）有限公司
Audix Technology (Shenzhen) Co., Ltd.
EMC 部門報告專用章
Stamp only for EMC Dept. Report
Signature: David Jin

Approved & Authorized Signer
David Jin / Manager

1. SUMMARY OF STANDARDS AND RESULTS

1.1.Description of Standards and Results

The EUT has been tested according to the applicable standards as referenced below.

EMISSION			
Description of Test Item	**Standard**	**Results**	**Remarks**
Power Line Conducted Emission Test	47 CFR FCC Part 15 Subpart B ANSI C63.4: 2014 ICES-003 Issue 6 2017(updated)	PASS	Minimum passing margin is 31.50dB at 18.232MHz
Radiated Emission Test (30-1000MHz)	47 CFR FCC Part 15 Subpart B ANSI C63.4: 2014 ICES-003 Issue 6 2017(updated)	PASS	Minimum passing margin is 9.64dB at 132.82MHz
Radiated Emission Test (Above 1GHz)	47 CFR FCC Part 15 Subpart B ANSI C63.4: 2014 ICES-003 Issue 6 2017(updated)	PASS	Minimum passing margin is 19.19dB at 4022.16MHz

2. GENERAL INFORMATION

2.1.Description of Device (EUT)

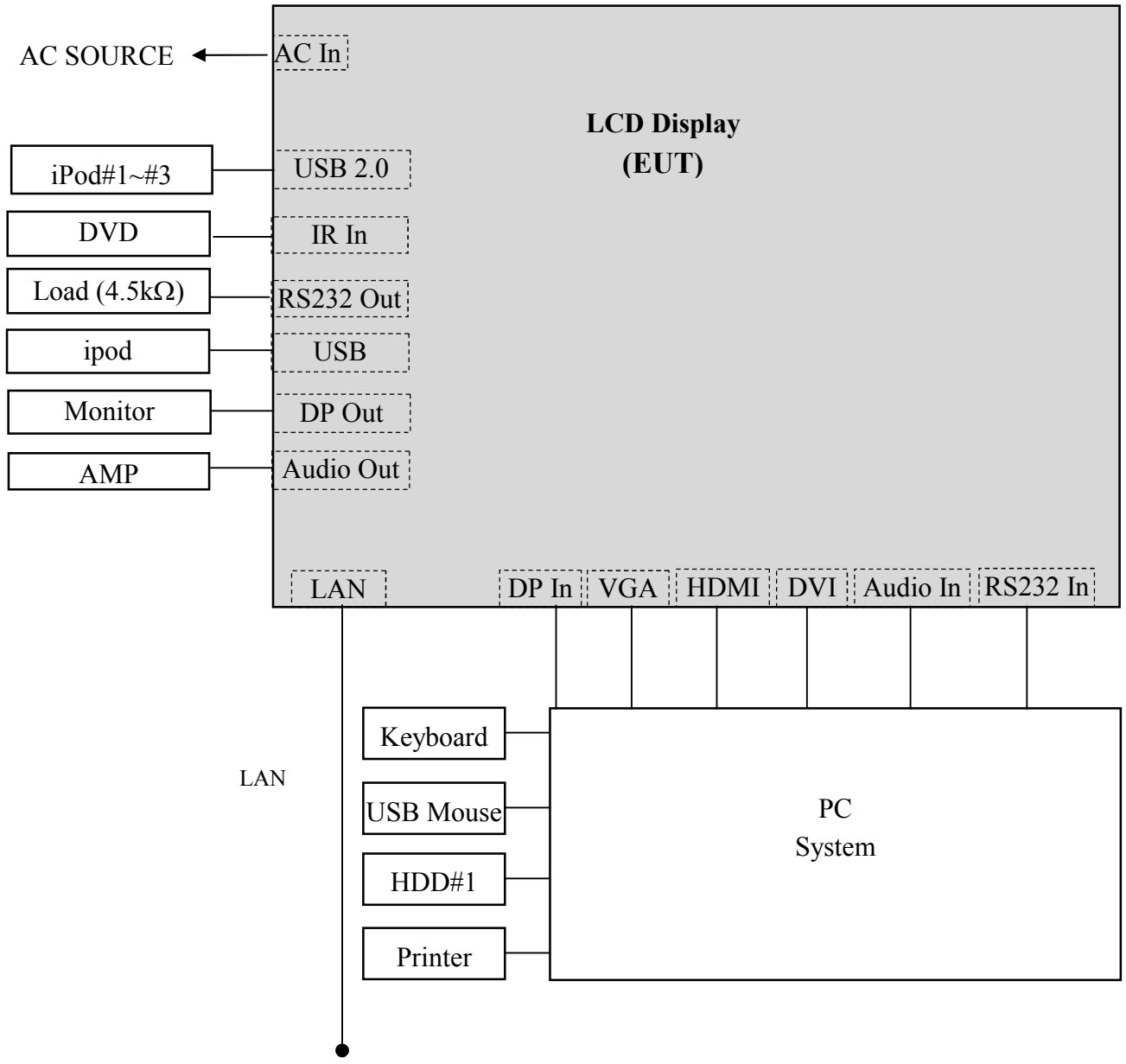
Product	:	LCD Display
Model No.	:	LM55P4****(* = 0-9, A-Z, a-z, +, -, /, \ or blank)
FCC ID	:	2APT9DWLM55P4
Brand	:	MITSUBISHI
Max. Resolution	:	3840*2160@60Hz
Max.Work Frequency	:	600MHz
I/O Port	:	(1) One AC In Port (2) One DVI Port (3) One HDMI Port (4) Two DP Ports (5) One VGA Port (6) One Audio In Port (7) One Audio out Port (8) One IR Ports (9) A Serial of RS232 Ports (10) One USB Up-Stream Port (11) One LAN Port
OPS Port	:	DS-280: (1) One Audio In Port (2) One DP Port (3) One HDMI Port (4) Three USB Ports (5) Two LAN Ports VC-LM1HD: (1) One CAT5e/6-IN Port (2) A Serial of RS232 Ports DP- 1SDI-3G: (1) One SDI IN Port (2) One SDI Out Port
Applicant	:	Mitsubishi Electric Corporation Kyoto works 1 Zusho Baba, Nagaokakyo City, Kyoto 617-8550, Japan
DVI Cable	:	Shielded, Detachable, 1.5m/1.8m(With two cores)
VGA Cable	:	Shielded, Detachable, 1.5m/1.8m (With two cores)

HDMI Cable	:	Shielded, Detachable, 1.5m/1.8m
DP Cable	:	Shielded, Detachable, 1.5m/1.8m
Audio Cable	:	Shielded, Detachable, 1.5m/1.8m
Power Cable	:	Unshielded, Detachable, 1.5m/1.8m (3 pins)
RS232 Cable#1	:	Shielded, Detachable, 1.5m/1.8m
RS232 Cable#2	:	Shielded, Detachable, 4.0m
Date of Test	:	Jun.24~27,2019
Date of Receipt	:	Jun.11, 2019
Sample Type	:	Prototype production

2.2.Tested Supporting System Details

No.	Description	ACS No.	Manufacturer	Model	Serial Number
1.	Personal Computer	Test PC Q	ACER	Veriton T630	DTVMKCN00560900F629600
		Power Cord: Unshielded, Detachable, 1.8m			
2.	Monitor	---	---	B27T-7	---
		Power Cord: Unshielded, Detachable, 1.8m			
3.	USB Keyboard	ACS-EMC-K03R	DELL	SK-8115	CN-ODJ313-71616-711-04WJ
		USB Cable: Shielded, Undetachable, 2.0m			
4.	USB Mouse	ACS-EMC-M03R	DELL	M056UO	512023253
		USB Cable: Shielded, Undetachable, 1.8m			
5.	Printer	ACS-EMC-PT04	HP	C9079A	N/A
		USB Cable: Shielded, Detachable, 1.5m Power Cord: Unshielded, Detachable, 1.8m			
6.	HDD	ACS-EMC-HDD01	Terasys	F12-UF	A0100215-5390018
		USB Cable: Shielded, Detachable, 1.0m			
7.	DVD Player	ACS-EMC-DVD01	TUV	DVD-2588	N/A
		Power Cord: Unshielded, Detachable , 1.8m			
8.	AMP	ACS-EMC-AMP01	SANGU	AV-805	N/A
		Audio Out Cable: Unshielded, Detachable 1.8m Coaxial Cable: Unshielded, Detachable 1.8m			
9.	iPod#1	ACS-EMC-IPS11	APPLE	A1373	Cc4JC9VSF4VF
		Data Cable: Shielded, Detachable, 1.0m			
10.	Load (4.5kΩ)	-	-	-	-
		RS232 Cable: Unshielded, Detachabled , 4.0m			
11.	IR Cable: Unshielded, Detachabled , 1.8m				

2.3.Block diagram of connection between the EUT and simulators



(EUT: LCD Display)

2.4.Test Facility

Site Description

Name of Firm	Audix Technology (Shenzhen) Co., Ltd. No. 6, Kefeng Road, Science & Technology Park, Nanshan District, Shenzhen, Guangdong, China
EMC Lab.	Certificated by DAkkS, Germany Registration No: D-PL-12151-01-00 Valid Date: Dec.07, 2021 Accredited by NVLAP, USA NVLAP Code: 200372-0 Valid Date: Mar.31, 2020 Certificated by FCC, USA Designation No: CN5022 Valid Date: Mar.31, 2020 Certificated by TAF, Taiwan Registration No: 1418 Valid Date: Nov.08, 2020

2.5.Measurement Uncertainty

Test Item	Uncertainty
Uncertainty for Conduction emission test in No. 2 Conduction	2.4dB (150kHz to 30MHz)
Uncertainty for Radiation Emission test in 10m chamber (Distance: 10m)	3.6dB (30~200MHz, Polarization: H)
	3.8dB (30~200MHz, Polarization: V)
	4.0dB (200M~1GHz, Polarization: H)
	4.2dB (200M~1GHz, Polarization: V)
Uncertainty for Radiation Emission test in 10m chamber (1GHz-18GHz)	5.0dB (1-6GHz, Distance: 3m)
	5.4dB (6-18GHz, Distance: 3m)
Uncertainty for S_{VSWR} in 10m Chamber	2.8dB (1-6GHz,Distance: 3m)
	2.8dB (6-18GHz,Distance: 3m)
Uncertainty for test site temperature and humidity and Pressure	0.6℃
	3%
	1kPa

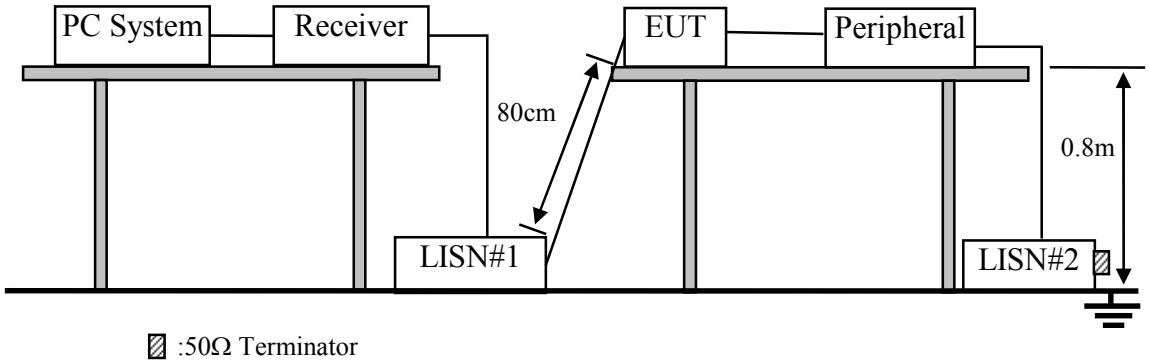
Note: EMI uncertainty is evaluated by CISPR16-4-2.
The value of measurement uncertainty of EMI is less than U_{CISPR}.
The value is not calculated in the test results.

3. POWER LINE CONDUCTED EMISSION MEASUREMENT

3.1. Test Equipments

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	2# Shielding Room	AUDIX	N/A	N/A	Apr.15,18	3 Year
2.	Test Receiver	Rohde & Schwarz	ESCI	100843	Oct.13,18	1 Year
3.	L.I.S.N.#1	Rohde & Schwarz	ENV4200	100041	Apr.18,19	1 Year
4.	L.I.S.N.#2	Kyoritsu	KNW-407	8-1636-1	Apr.18,19	1 Year
5.	Terminator	Hubersuhner	50Ω	No.4	Apr.14,19	1 Year
6.	Terminator	Hubersuhner	50Ω	No.5	Apr.14,19	1 Year
7.	RF Cable	Fujikura	RG55/U	No.3	Apr.13,19	1 Year
8.	Test Software	AUDIX	e3	6.100913a	N/A	N/A
Note: N/A means Not applicable.						

3.2. Block Diagram of Test Setup



3.3. Power Line Conducted Emission Class A Limits

(FCC §15.107 and ICES-003 §6.1)

Frequency	Maximum RF Line Voltage	
	Quasi-Peak Level dB(μV)	Average Level dB(μV)
150kHz ~ 500kHz	79	66
500kHz ~ 30MHz	73	60

Notes: 1. * Decreasing linearly with logarithm of frequency.
2. The lower limit shall apply at the transition frequencies.

3.4.EUT 's Configuration during Compliance Measurement

The following equipment are installed on Power Line Conducted Emission Test to meet the commission requirement and operating regulations in a manner which tends to maximize its emission characteristics in a normal application.

3.4.1. LCD Display (EUT)

Model No.	: LM55P4****(* = 0-9, A-Z, a-z, +, -, /, \ or blank)
3.4.2. Support Equipment	: As Tested Supporting System Detail, in Section 2.3.

3.5.Operating Condition of EUT

3.5.1. Setup the EUT and simulator as shown as Section 3.2.

3.5.2. Turn on the power of all equipments.

3.5.3. PC system sent "EMC.Test " software to LCD Display (EUT) through DP / DVI / VGA / HDMI Ports.

3.5.4. USB Mode: The USB player played ipod and sent "USB 1kHz SignalPlaying" image to the LCD Display (EUT)

3.5.5. LAN Mode: Connected the EUT and PC with LAN Cable, and transmitted data in the form of "ping" IP address

3.5.6. OPS mode (DS-280): Connect the OPS module to the OPS card slot of the object to be tested, open the OPS switch, and drive the automatic test software "EMCTest" installed in the OPS to transmit the "H" character to the test. The object causes the entire screen of the device to be tested to display an "H" character, and the action continues until the end of the test.

3.5.7. OPS mode (DP-1SDI-3G): Connect the SDI In of the DP-1SDI-3G to the SDI Box, provide the signal from the SDI Box and transmit the test image (Color Bar) to the test via the DP-1SDI-3G. The screen shows that the action is continuous until the end of the test.

3.5.8. OPS mode (VC-LM1HD): The OPS module is output to the OPS module via the HDMI port of the PC via the LAN port of the HD BaseT converter, and the automatic test software "EMC Test" installed in the OPS is transmitted to transmit "H". The character to the object to be tested causes the entire screen of the device to be tested to display an "H" character, and the action continues until the end of the test.

3.5.9. The PC system was running the program "1kHz signal playing" and sending sound to EUT

3.5.10. The other peripheral devices were driven and operated in turn during all testing.

3.6. Test Procedure

EUT was placed on a non-metallic table, 80cm above the ground plane. The EUT Power connected to the power mains through a line impedance stabilization network (L.I.S.N. #1). This provided a 50-ohm coupling impedance for the EUT (Please refer to the block diagram of the test setup and photographs). The other peripheral devices power cord connected to the power mains through a line impedance stabilization network (L.I.S.N. #2).Both sides of power line were checked for maximum conducted interference. In order to find the maximum emission, the relative positions of equipments and all of the interface cables were changed according to ANSI C63.4: 2014 on conducted Emission test.

The bandwidth of the R&S Test Receiver ESCI was set at 9kHz.

The frequency range from 150kHz to 30MHz is checked. The test results are reported on Section 3.7.

3.7. Power Line Conducted Emission Measurement Results

PASS. (All emissions not reported below are too low against the prescribed limits.)

The EUT with the following test modes were tested and read Q.P and Average values, all the test results are listed in next pages.

EUT: LCD Display Model No. : LM55P4**** Test Date: Jun.24,2019

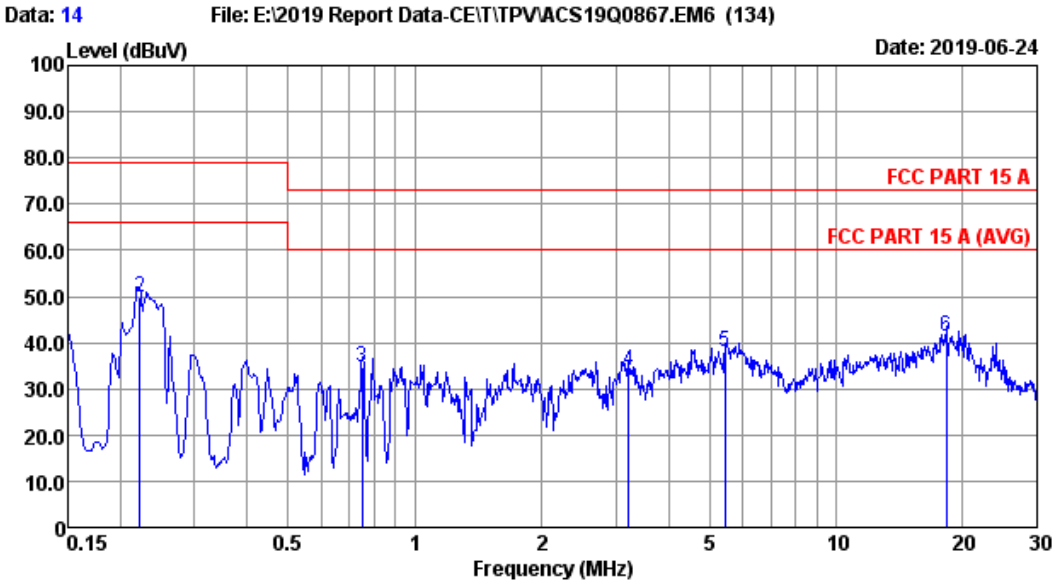
Temperature: 26.6℃ Humidity: 64% Pressure: 101.6kPa

The EUT with following test modes were pre-tested:

No.	Test Mode	Input Port	Cable Length	Resolution & Frequency
1.	PC Mode	HDMI	1.8m	640*480@60Hz
2.				1280*1024@75Hz
3.				3840*2160@60Hz
4.			1.5m	3840*2160@60Hz
5.		DP	1.8m	640*480@60Hz
6.				1280*1024@75Hz
7.				3840*2160@60Hz
8.		DVI	1.8m	640*480@60Hz
9.				1280*1024@75Hz
10.				1920*1080@60Hz
11.		VGA	1.8m	640*480@60Hz
12.				1280*1024@75Hz
13.				1920*1080@60Hz
14.	USB Reading	USB	---	Color Bar
15.	LAN Mode	---	---	---
16.	OPS Mode	DS-280	---	Color Bar
17.		VC-LM1HD		
18.		DP-1SDI-3G		

The result of worst test mode is presented in the report as below and the test data are listed in next pages.

No.	Test Mode	Cable Length	Input Port	Resolution & Frequency	Reference Test Data No.	
					Line	Neutral
1.	PC	1.8m	HDMI	3840*2160@60Hz	#14	#13

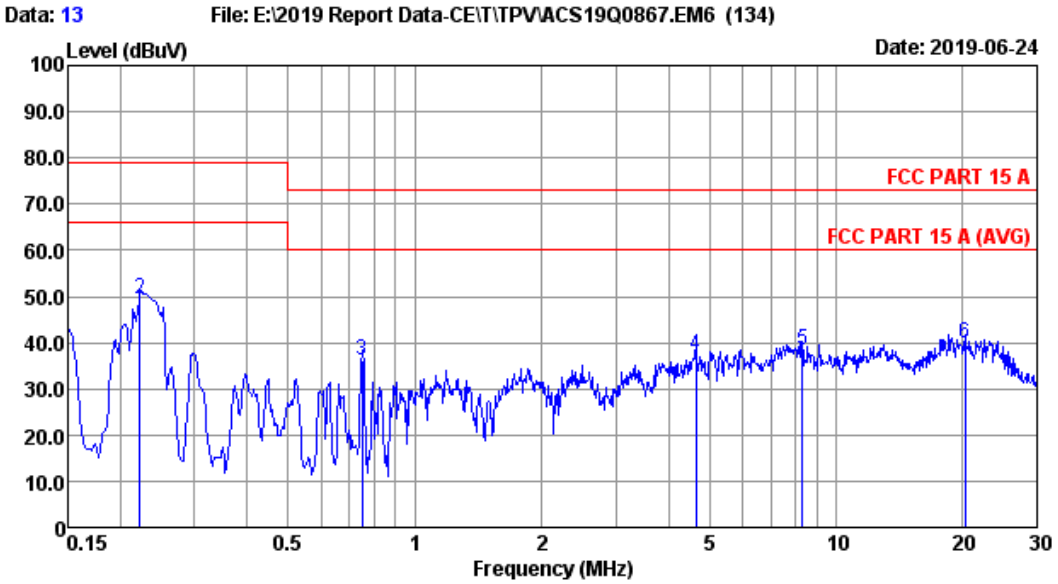


Site no :2# Conduction
Dis./Lisn :2019 ENV4200-L1
Limit :FCC PART 15 A
Env./Ins. :26.6*C/64%
EUT :LM55P4****
Power Rating :AC 120V/60Hz
Test Mode :HDMI:3840*2160@60Hz
Line:1.8m

Data No :14
LISN phase:LINE
Pressure :101.6kPa
Engineer :Gavin

No	Freq (MHz)	LISN Factor (dB)	Cable Loss (dB)	Reading (dBuV)	Emission Level (dBuV)	Limits (dBuV)	Margin limit (dB)	Remark
1	0.150	9.90	0.03	30.67	40.60	79.00	38.40	QP
2	0.222	9.90	0.03	40.02	49.95	79.00	29.05	QP
3	0.751	9.70	0.03	25.13	34.86	73.00	38.14	QP
4	3.224	9.70	0.04	24.22	33.96	73.00	39.04	QP
5	5.447	9.84	0.05	28.11	38.00	73.00	35.00	QP
6	18.232	11.62	0.09	29.79	41.50	73.00	31.50	QP

Remarks: 1.Emission Level=LISN Factor+Cable Loss+Reading.
2.If the average limit is met when using a quasi-peak detector. the EUT shall be deemed to meet both limits and measurement with average detector is unnecessary.



Site no :2# Conduction
Dis./Lisn :2019 ENV4200-N
Limit :FCC PART 15 A
Env./Ins. :26.6*C/64%
EUT :LM55P4****
Power Rating :AC 120V/60Hz
Test Mode :HDMI:3840*2160@60Hz
Line:1.8m

Data No :13
LISN phase:NEUTRAL
Pressure :101.6kPa
Engineer :Gavin

No	Freq (MHz)	LISN Factor (dB)	Cable Loss (dB)	Reading (dBuV)	Emission Level (dBuV)	Limits (dBuV)	Margin limit (dB)	Remark
1	0.150	10.00	0.03	31.27	41.30	79.00	37.70	QP
2	0.222	9.90	0.03	39.56	49.49	79.00	29.51	QP
3	0.751	9.60	0.03	26.57	36.20	73.00	36.80	QP
4	4.647	9.73	0.05	27.42	37.20	73.00	35.80	QP
5	8.323	10.33	0.06	28.01	38.40	73.00	34.60	QP
6	20.270	12.33	0.10	27.33	39.76	73.00	33.24	QP

Remarks: 1.Emission Level=LISN Factor+Cable Loss+Reading.
2.If the average limit is met when using a quasi-peak detector.
the EUT shall be deemed to meet both limits and measurement
with average detector is unnecessary.

4. RADIATED EMISSION MEASUREMENT

4.1. Test Equipments

4.1.1.For frequency range 30MHz~1000MHz (In 10m Anechoic Chamber)

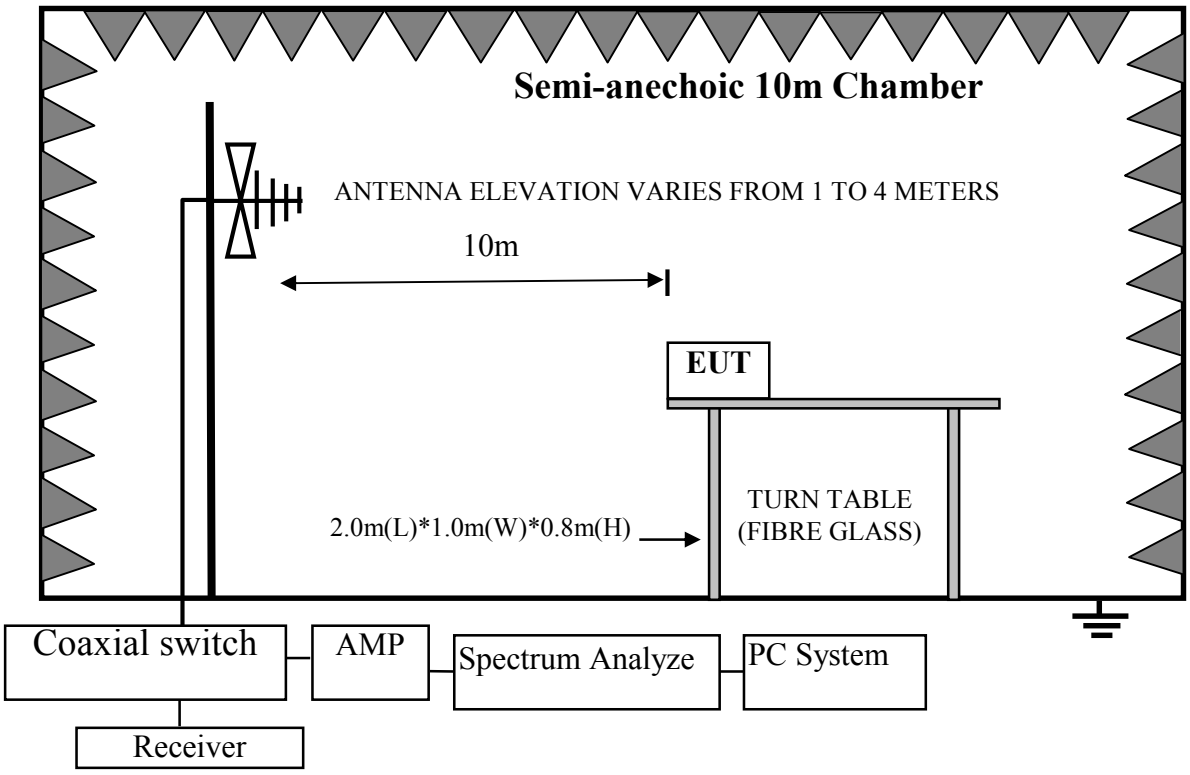
Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	10m Chamber	AUDIX	N/A	N/A	Apr.15,19	1 Year
2.	Signal Analyzer	Rohde & Schwarz	FSV30	103669	Oct.14,18	1 Year
3.	Signal Analyzer	Rohde & Schwarz	FSV30	103670	Oct.14,18	1 Year
4.	EMI Test Receiver	Rohde & Schwarz	ESR3	101931	Apr.14,19	1 Year
5.	Amplifier	EMCI	EMC9135	980347	Sep.08,18	1 Year
6.	Amplifier	EMCI	EMC9135	980348	Mar.07,19	1 Year
7.	Tri-log-Broadband Antenna	SCHWARZBECK	VULB 9168	710	Aug.22,18	1 Year
8.	Tri-log-Broadband Antenna	SCHWARZBECK	VULB 9168	429	May.08,19	1 Year
9.	RF Cable	SPUMA	CFD400NL-LW	No.4	Sep.08,18	1 Year
10.	RF Cable	SPUMA	CFD400-NM-NM	160727+160728	Sep.08,18	1 Year
11.	Coaxial Switch	Anritsu	MP59B	6201397220	Apr.14,19	1 Year
12.	Coaxial Switch	Anritsu	MP59B	6201397221	Apr.14,19	1 Year
13.	Coaxial Switch	Anritsu	MP59B	6201397224	Apr.14,19	1 Year
14.	Test Software	AUDIX	e3	6.100913a	N/A	N/A
Note: N/A means Not applicable.						

4.1.2.For frequency range 1GHz~6GHz (At In 10m Anechoic Chamber)

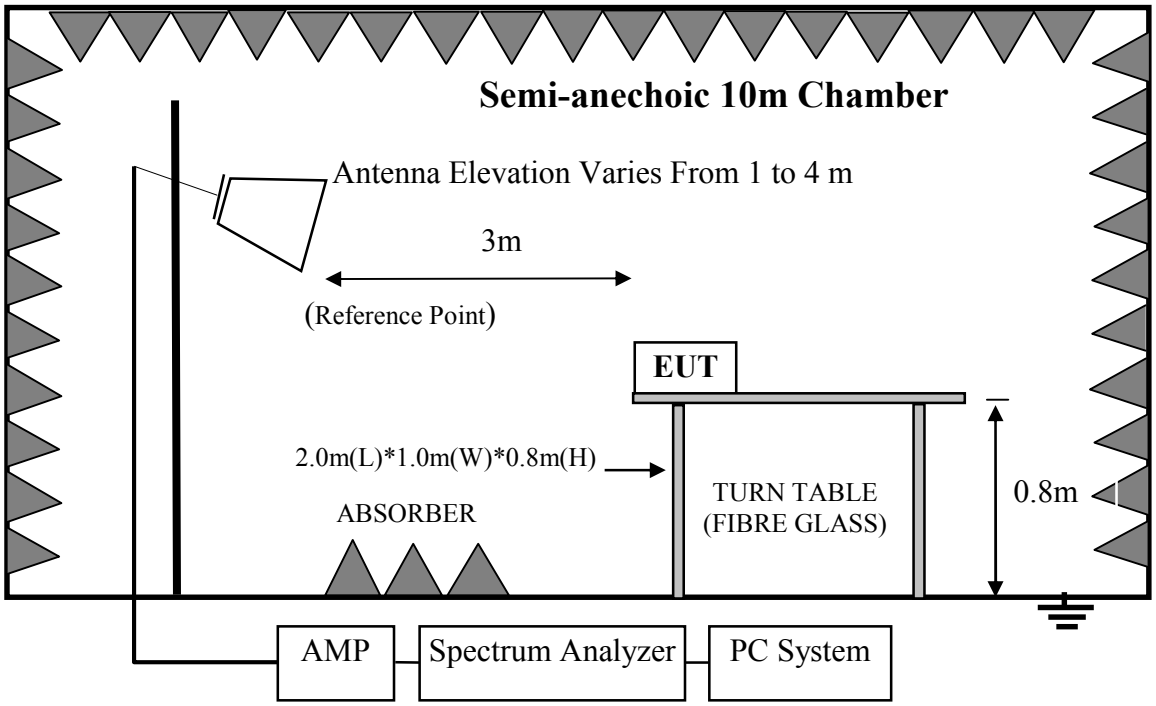
Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	10m Chamber	AUDIX	N/A	N/A	Apr.15,19	1 Year
2.	Signal Analyzer	Rohde & Schwarz	FSV30	103670	Oct.14,18	1 Year
3.	Horn Antenna	ETS	3117	00218552	Dec.13,18	1 Year
4.	Amplifier	KEYSIGHT	83017A	39500711	Aug.18,18	1 Year
5.	RF Cable	ETS	SMS-100-SMS-350IN	NO.1	May.13,19	1 Year
6.	Test Software	AUDIX	e3	6.100913a	N/A	N/A
Note: N/A means Not applicable.						

4.2. Block Diagram of Test Setup

4.2.1.In 10m Anechoic Chamber Test Setup Diagram for 30~1000MHz



4.2.2.In 10m Anechoic Chamber Test Setup Diagram for 1-6GHz



4.3.Radiated Emission Class A Limit

All emanations from a devices or system, including any network of conductors and apparatus connected thereto, shall not exceed the level of field strengths specified below: (FCC §15.109(a)(g)/CISPR 22 and ICES-003 §6.2)

FREQUENCY (MHz)	DISTANCE (Meters)	FIELD STRENGTHS LIMITS (dBμV/m)
30 ~ 88	10	39
88 ~ 216	10	43.5
216~960	10	46.4
960~1000	10	49.5
Above 1000	3	80(Peak) 60(Average)

Notes**:** (1) Emission level = Antenna Factor + Cable Loss + Reading
Emission level = Antenna Factor-Amp Factor + Cable Loss + Reading (above 1000MHz)
(2) The tighter limit shall apply at the edge between two frequency bands.

4.4.EUT's Configuration during Compliance Measurement

The configurations of EUT are listed in Section 3.4.

4.5.Operating Condition of EUT

Same as Conducted Emission test that is listed in Section 3.5. except the test set up replaced by Section 4.2.

4.6.Test Procedure

The EUT was placed on a non-metallic table, 80 cm above the ground plane inside a semi-anechoic chamber. An antenna was located 10m from the EUT on an adjustable mast. A pre-scan was first performed in order to find prominent radiated emissions. For final emissions measurements at each frequency of interest, the EUT were rotated and the antenna height was varied between 1m and 4m in order to maximize the emission. Measurements in both horizontal and vertical polarities were made and the data was recorded. In order to find the maximum emission, the relative positions of equipments and all of the interface cables were changed according to ANSI C63.4-2014 on Radiated Emission test.

The bandwidth of the R&S Test Receiver ESR3 was set at 120kHz. (For 30MHz to 1000MHz)

The resolution bandwidth of the PXA Signal Analyzer FSV30 was set at 1MHz. (For above 1GHz)

The frequency range from 30MHz to 1000MHz was pre-scanned with a peak detector and all final readings of measurement from Test Receiver are Quasi-Peak values.

The frequency range from 1GHz to 6GHz was checked with peak and average detector, measurement distance is 3m in 10m chamber.

Finally, selected operating situations at Anechoic Chamber measurement, all the test results are listed in section 4.7.

4.7.Radiated Emission Measurement Result

PASS. (All emissions not reported below are too low against the prescribed limits.)

The EUT with the following test modes were tested and read Q.P values, all the test results are listed in next pages.

EUT: LCD Display Model No. : LM55P4****

For frequency range 30MHz~1000MHz

Test Date: Jun.27,2019 Temperature: 23.6℃ Humidity: 53% Pressure: 101.5kPa

The EUT with following test modes were pre-tested:

No.	Test Mode	Input Port	Cable Length	Resolution & Frequency
1.	PC Mode	HDMI	1.8m	640*480@60Hz
2.				1280*1024@75Hz
3.				3840*2160@60Hz
4.			1.5m	3840*2160@60Hz
5.		DP	1.8m	640*480@60Hz
6.				1280*1024@75Hz
7.				3840*2160@60Hz
8.		DVI	1.8m	640*480@60Hz
9.				1280*1024@75Hz
10.				1920*1080@60Hz
11.		VGA	1.8m	640*480@60Hz
12.				1280*1024@75Hz
13.				1920*1080@60Hz
14.	USB Reading	USB	---	Color Bar
15.	LAN Mode	---	---	---
16.	OPS Mode	DS-280	---	Color Bar
17.		VC-LM1HD	---	
18.		DP-1SDI-3G	---	

The result of worst test mode is presented in the report as below and the test data are listed in next pages.

No.	Test Mode	Cable Length	Input Port	Resolution & Frequency	Reference Test Data No.	
					Horizontal	Vertical
1.	PC	1.8m	HDMI	3840*2160@60Hz	#14	#13

For frequency range 1GHz~6GHz

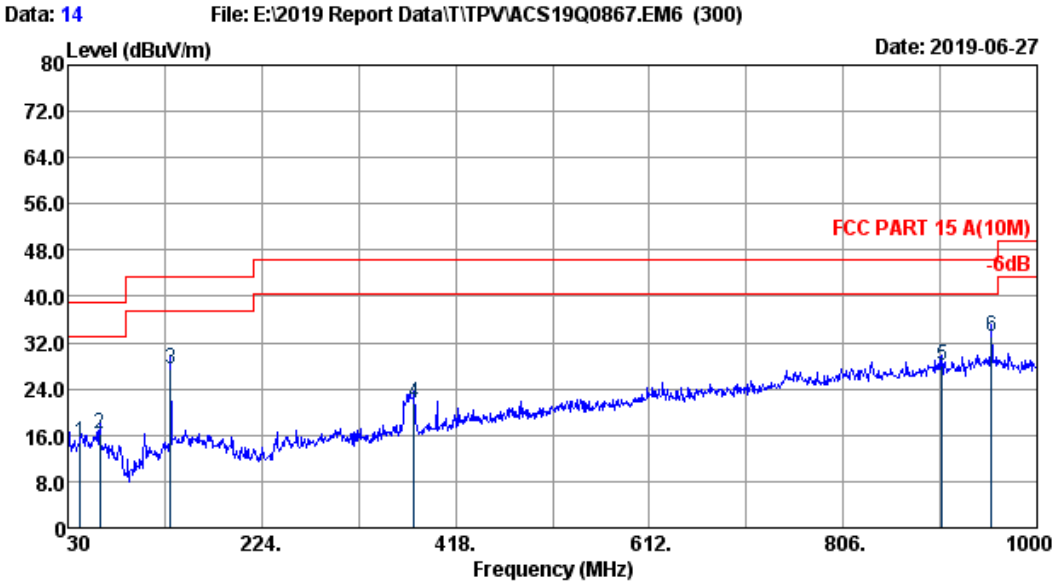
Test Date: Jun.27,2019 Temperature: 23.6℃ Humidity: 53% Pressure: 101.5kPa

The EUT with following test modes were pre-tested:

No.	Test Mode	Input Port	Cable Length	Resolution & Frequency
1.	PC Mode	HDMI	1.8m	1280*1024@75Hz
2.				3840*2160@60Hz
3.			1.5m	3840*2160@60Hz
4.		DP	1.8m	1280*1024@75Hz
5.				3840*2160@60Hz
6.		DVI	1.8m	1280*1024@75Hz
7.				1920*1080@60Hz
8.		VGA		1280*1024@75Hz
9.				1920*1080@60Hz
10.	USB Reading	USB	---	Color Bar
11.	LAN Mode	---	---	---
12.	OPS Mode	DS-280	---	Color Bar
13.		VC-LM1HD	---	
14.		DP-1SDI-3G	---	

The result of worst test mode is presented in the report as below and the test data are listed in next pages.

No.	Test Mode	Cable Length	Input Port	Resolution & Frequency	Reference Test Data No.	
					Horizontal	Vertical
1.	PC	1.8m	HDMI	3840*2160@60Hz	#58	#57

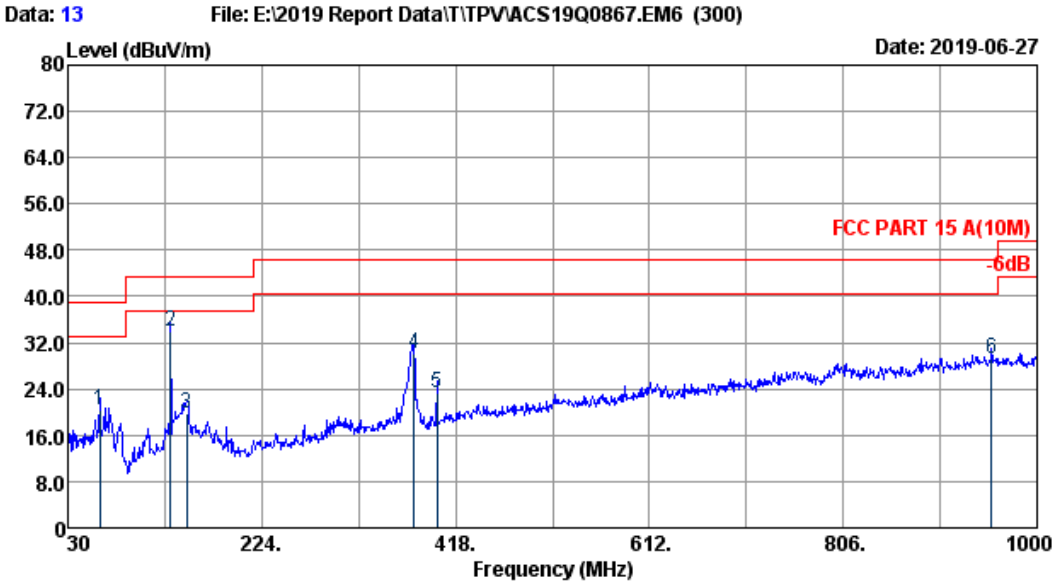


Site no. : 10m Chamber
Dis. / Ant. : 10m 2019 VULB9168-429
Limit : FCC PART 15 A(10M)
Env. / Ins. : 23.6*C/53%
EUT : LM55P4****
Power rating : AC 120V/60Hz
Test Mode : HDMI:3840*2160@60Hz
Line 1.8m

Data no. : 14
Ant. pol. : HORIZONTAL
Pressure : 101.5kPa
Engineer : Johnny

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	42.61	19.50	0.54	-5.33	14.71	39.00	24.29	QP
2	62.01	18.90	0.58	-3.30	16.18	39.00	22.82	QP
3	132.82	18.34	0.70	8.45	27.49	43.50	16.01	QP
4	376.29	21.08	1.22	-0.71	21.59	46.40	24.81	QP
5	904.94	29.40	2.83	-4.31	27.92	46.40	18.48	QP
6	954.41	29.93	2.87	0.22	33.02	46.40	13.38	QP*

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
2. The emission levels that are 20dB below the official limit are not reported.
3. The worst emission was detected at954.41MHz with corrected signal level of 33.02dBμV/m (Antenna height 3.0m; Turntable degree 240°)
4. 0° was the table front facing the antenna. Degree is calculated from 0° clockwise facing the antenna.

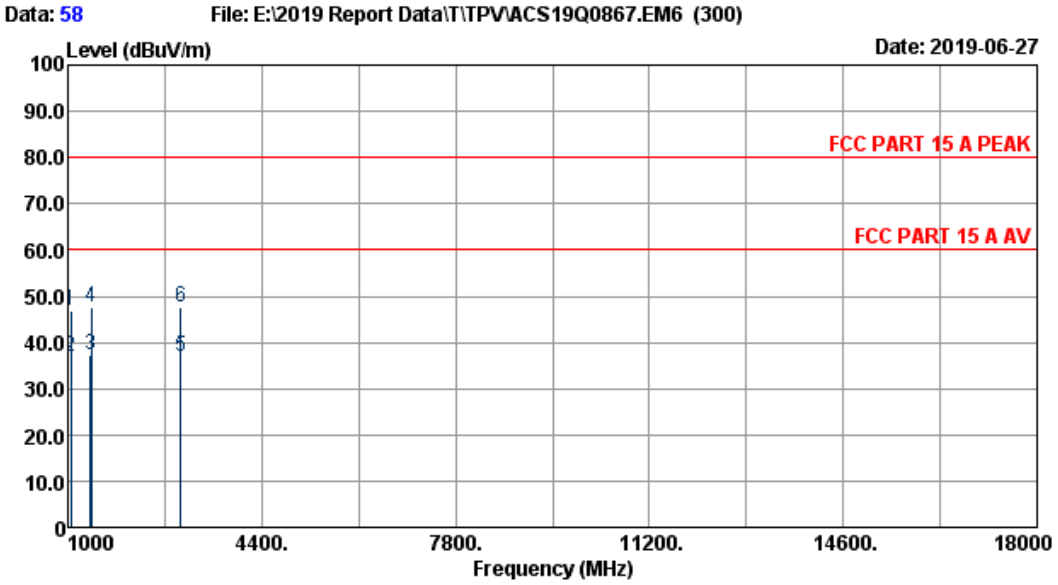


Site no. : 10m Chamber
Dis. / Ant. : 10m 2018 VULB9168-710
Limit : FCC PART 15 A(10M)
Env. / Ins. : 23.6*C/53%
EUT : LM55P4****
Power rating : AC 120V/60Hz
Test Mode : HDMI:3840*2160@60Hz
Line 1.8m

Data no. : 13
Ant. pol. : VERTICAL
Pressure : 101.5kPa
Engineer : Johnny

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	62.01	18.70	1.22	0.56	20.48	39.00	18.52	QP
2	132.82	18.00	1.64	14.22	33.86	43.50	9.64	QP*
3	149.31	19.20	1.73	-1.06	19.87	43.50	23.63	QP
4	376.29	20.92	2.74	6.31	29.97	46.40	16.43	QP
5	399.57	21.20	2.83	-0.63	23.40	46.40	23.00	QP
6	954.41	29.52	4.70	-5.14	29.08	46.40	17.32	QP

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading.
2. The emission levels that are 20dB below the official limit are not reported.
3. The worst emission was detected at 132.82MHz with corrected signal level of 33.86dBμV/m (Antenna height 1.5m; Turntable degree 40°)
4. 0° was the table front facing the antenna. Degree is calculated from 0° clockwise facing the antenna.

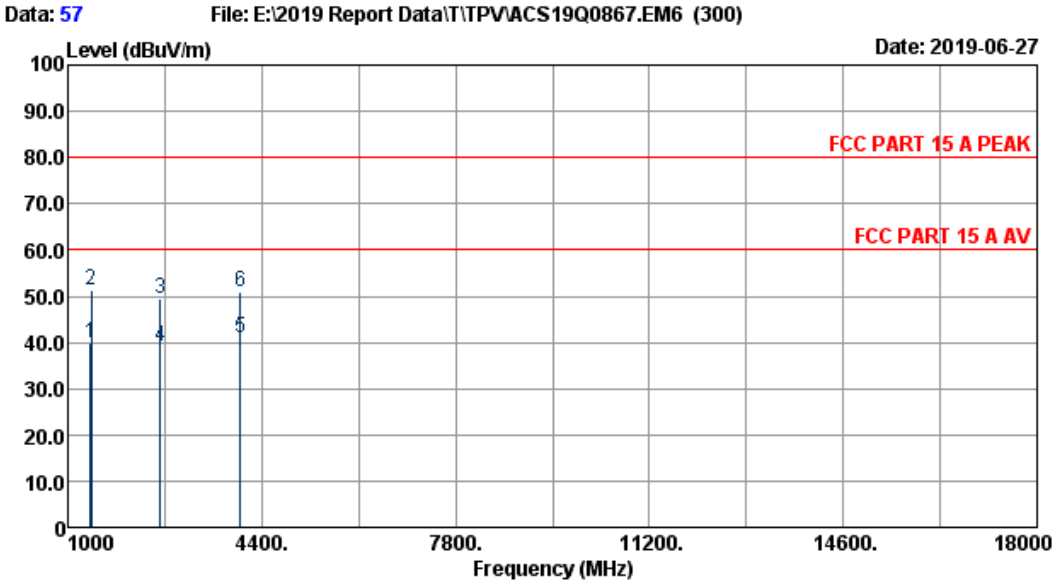


Site no. : 10m Chamber
Dis. / Ant. : 3m 2018 3117
Limit : FCC PART 15 A PEAK
Env. / Ins. : 23.6*C/53%
EUT : LM55P4****
Power rating : AC 120V/60Hz
Test Mode : HDMI:3840*2160@60Hz
Line:1.8m

Data no. : 58
Ant. pol. : HORIZONTAL
Pressure : 101.5kPa
Engineer : Johnny

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	1051.72	27.26	2.39	34.95	52.25	46.95	80.00	33.05	Peak
2	1052.19	27.26	2.39	34.95	42.13	36.83	60.00	23.17	Average
3	1402.84	28.45	2.74	33.88	40.05	37.36	60.00	22.64	Average
4	1408.63	28.45	2.74	33.88	50.21	47.52	80.00	32.48	Peak
5	2972.16	32.10	4.06	31.52	32.26	36.90	60.00	23.10	Average
6	2972.37	32.10	4.06	31.52	42.98	47.62	80.00	32.38	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor
2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 10m Chamber
Dis. / Ant. : 3m 2018 3117
Limit : FCC PART 15 A PEAK
Env. / Ins. : 23.6*C/53%
EUT : LM55P4****
Power rating : AC 120V/60Hz
Test Mode : HDMI:3840*2160@60Hz
Line:1.8m

Data no. : 57
Ant. pol. : VERTICAL
Pressure : 101.5kPa
Engineer : Johnny

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	1402.18	28.45	2.74	33.88	42.62	39.93	60.00	20.07	Average
2	1408.42	28.45	2.74	33.88	53.97	51.28	80.00	28.72	Peak
3	2615.37	31.96	3.79	31.73	45.37	49.39	80.00	30.61	Peak
4	2616.24	31.96	3.79	31.73	35.25	39.27	60.00	20.73	Average
5	4022.16	32.64	4.77	30.88	34.28	40.81	60.00	19.19	Average
6	4026.72	32.64	4.77	30.88	44.24	50.77	80.00	29.23	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor
2. The emission levels that are 20dB below the official limit are not reported.

5. DEVIATION TO TEST SPECIFICATIONS

[NONE]