

# **TEST REPORT**

EMI Test for FCC Certification of LM-K400AM Model

APPLICANT
LG Electronics USA, Inc.

REPORT NO. HCT-EM-2003-FC007

DATE OF ISSUE March 17, 2020



HCT Co., Ltd.

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## TEST REPORT

EMI Test for FCC Certification

REPORT NO.

HCT-EM-2003-FC007

DATE OF ISSUE

March 17, 2020

FCC ID

ZNFK400AM

Applicant	LG Electronics USA, Inc. 1000 Sylvan Avenue, Englewood Cliffs NJ 07632 United States
Product Name Model Name Series Model Name	Multi-band GSM/WCDMA/LTE Phone with WLAN and Bluetooth LM-K400AM Refer to the clause 1.1 Description of EUT
Travel Adaptor Information	Model name: MCS-V01WR Manufacturer: SUNLIN
Date of Test	March 11, 2020 to March 16, 2020
Test Standard Used	FCC CFR 47 PART 15 Subpart B Class B ANSI C63.4-2014
Test Results	Refer to the present document
Manufacturer	LG Electronics Inc.
	The result shown in this test report refer only to the sample(s) tested unless otherwise stated.

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Tested by Na-Eun Song

Technical Manager Jeong-Hyun Choi

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#### **REVISION HISTORY**

The revision history for this test report is shown in table.

Revision No.	Date of Issue	Description
0	March 17, 2020	Initial Release

The device bearing the trade name and model specified above, has been shown to comply with the applicable technical standards as indicated in the measurement report and was tested in accordance with the measurement procedures specified in ANSI C63.4-2014. (See Test Report if any modifications were made for compliance)

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

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

This Test Report is not related to the accredited test result by KOLAS(Korea Laboratory Accreditation Scheme) / A2LA(American Association for Laboratory Accreditation), which signed the ILAC-MRA.

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## 1. GENERAL INFORMATION

## 1.1 Description of EUT

FCC ID	ZNFK400AM
Model Name	LM-K400AM
Series Model Name	LM-K400AKR, LMK400AM, LMK400AKR, K400AM, K400AKR
Product Name	Multi-band GSM/WCDMA/LTE Phone with WLAN and Bluetooth
	824.20 MHz to 848.80 MHz (GSM 850) 1 850.20 MHz to 1 909.80 MHz (GSM 1 900) 1 852.4 MHz to 1 907.6 MHz (WCDMA B2)
	1712.4 MHz to 1752.6 MHz (WCDMA B4)
	826.40 MHz to 846.60 MHz (WCDMA B5)
	1 850 MHz to 1 910 MHz (LTE B2)
TX Frequency	1 710 MHz to 1 755 MHz (LTE B4)
	824 MHz to 849 MHz (LTE B5)
	699 MHz to 716 MHz (LTE B12)
	788 MHz to 798 MHz (LTE B14)
	2 305 MHz to 2 315 MHz (LTE B30)
	1 710 MHz to 1 780 MHz (LTE B66)
	2 402 MHz to 2 480 MHz (Bluetooth)
	2 412 MHz to 2 462 MHz (WiFi 2.4 GHz)
	869.20 MHz to 893.80 MHz (GSM 850)
	1 930.20 MHz to 1 989.80 MHz (GSM 1 900)
	1 932.4 MHz to 1 987.6 MHz (WCDMA B2)
	2 112.4 MHz to 2 152.6 MHz (WCDMA B4)
	871.40 MHz to 891.60 MHz (WCDMA B5)
	1 930 MHz to 1 990 MHz (LTE B2)
	2 110 MHz to 2 155 MHz (LTE B4)
RX Frequency	869 MHz to 894 MHz (LTE B5)
	729 MHz to 746 MHz (LTE B12)
	758 MHz to 768 MHz (LTE B14)
	717 MHz to 728 MHz (LTE B29)
	2 350 MHz to 2 360 MHz (LTE B30)
	2 110 MHz to 2 200 MHz (LTE B66)
	2 402 MHz to 2 480 MHz (Bluetooth)
	2 412 MHz to 2 462 MHz (WiFi 2.4 GHz)

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## 1.2 Tested System Details

All equipment descriptions used in the tested system (including inserted cards) are:

Device Type	Model Name	Serial Number	Manufacturer
EUT	LM-K400AM	-	LG
Travel Adaptor	MCS-V01WR	-	SUNLIN
Data Cable	EAD64746102	-	LUXSHARE
Earphone	EAB63728251	-	CRESYN
Micro SD Card	SAMSUNG EVO+microSDXC CLASS10 UHS-I (256 GB)	-	SAMSUNG

## 1.3 Cable Description

Product Name	Port	Power Cord Shielded (Y/N)	I/O Cable Shielded (Y/N)	Length (m)
FUT	USB Type C	Y	N/A	(P) 1.0
EUT	Earphone	N/A	N	(D) 1.2

NOTE. The marked "(D)" means the data cable and "(P)" means the power cable.

## 1.4 Noise Suppression Parts on Cable (I/O Cable)

Product Name	Port	Ferrite Bead (Y/N)	Location	Metal Hood (Y/N)	Location
FUT	USB Type C	N	N/A	Y	Both End
EUT	Earphone	N	N/A	Y	EUT End

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#### 1.5 Test Facility

Test site is located at 74, Seoicheon-ro 578beon-gil, Majang-myeon, Icheon-si, Gyeonggi-do, South Korea. Those measurement facilities are constructed in conformance with the requirements of ANSI C63.4-2014. The Normalized site attenuations (30 MHz to 1 GHz) and Site validation (1 GHz to 18 GHz) were performed in accordance with the standard in ANSI C63.4-2014

Measurement Facilities	Designation No.
Radiated Field strength measurement facility  3 m Semi Anechoic chamber	
Radiated Field strength measurement facility  10 m Semi Anechoic chamber #1	KR0032
Radiated Field strength measurement facility 10 m Semi Anechoic chamber #2	

#### 1.6 Calibration of Measuring Instrument

The measuring equipment, which was utilized in performing the tests documented herein, has been calibrated in ac cordance with the manufacturers recommendations for utilizing calibration equipment, which is traceable to recognized national standards. Espectially, all antenna for measurement is calibrated in accordance with the requirements of C63.5:2017

## 1.7 Measurement Uncertainty

The measurement uncertainties shown below were calculated in accordance with the requirements of ANSI C63.4-2014. 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
Conducted Emission (0.15 MHz to 30 MHz)	1.8 dB
3 m Radiated Emissions (30 MHz to 1 GHz)	4.8 dB
3 m Radiated Emissions (1 GHz to 18 GHz)	5.4 dB
3 m Radiated Emissions (18 GHz to 40 GHz)	5.7 dB

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#### 2. DESCRIPTION OF TEST

#### 2.1 Measurement of Conducted Emission

The test procedure was in accordance with ANSI C63.4-2014, Clause 7.3

- a. The EUT was placed 0.4 meters from the conducting wall of the shielded room with EUT being connected to the power mains through a line impedance stabilization network (LISN).
  - If the EUT is connected to the PC through USB, the AC power-line adapter of the PC is directly connected to a line impedance stabilization network (LISN).
  - Other support units were connected to the power mains through another LISN. The two LISNs provide 50 Ohm/ 50uH of coupling impedance for the measuring instrument.
- b. Both conducted lines are measured in Quasi-Peak and Average mode, including the worst-case data points for each tested configuration.
- c. The frequency range from 150 kHz to 30 MHz was searched.

#### **Conducted Emission Limits**

F	Resolution	n Class A		Class B	
Frequency (MHz)	Bandwidth (kHz)	Quasi-Peak (dBµV)	Average (dBµV)	Quasi-Peak (dBµV)	Average (dBµV)
0.15 to 0.5	9	79	66	66 to 56*	56 to 46*
0.5 to 5	9	73	60	56	46
5 to 30	9	73	60	60	50

NOTE. Decreases with the logarithm of the frequency.

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#### 2.2 Measurement of Radiated Emission

The test procedure was in accordance with ANSI C63.4-2014, Clause 8.3

- a. The EUT was placed on the top of a turn table 0.8 meters above the ground at a semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
- b. The EUT was set 3 m away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c. The antenna height is varied from 1 m to 4 m above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 m to 4 m and the turn table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e. The test-receiver system was set to Quasi-Peak detect function and specified bandwidth with maximum hold mode when the test frequency is below 1 GHz.
- f. The test-receiver system was set to Peak and Average detect function and specified bandwidth with maximum hold mode when the test frequency is above 1 GHz.
- g. Place the measurement antenna away from each area of the EUT determined to be a source of emissions at the specified measurement distance, while keeping the measurement antenna aimed at the source of emissions at each frequency of significant emissions, with polarization oriented for maximum response.

  (1 GHz to 40 GHz)

#### **Radiated Emission Limits**

	Class A			Class B	Class B	
Frequency (MHz)	Antenna Distance (m)	Field Strength (µV/m)	Quasi-Peak (dBµV/m)	Antenna Distance (m)	Field Strength (µV/m)	Quasi-Peak (dBµV/m)
30 to 88	10	90	39.0	3	100	40.0
88 to 216	10	150	43.5	3	150	43.5
216 to 960	10	210	46.4	3	200	46.0
Above 960	10	300	49.5	3	500	54.0
F	At	Antenna Distance (m)		s A	Cla	ss B
Frequency (MHz)				Average (dBµV/m)	Peak (dBµV/m)	Average (dBµV/m)
Above 1 000	3		80	60	74	54

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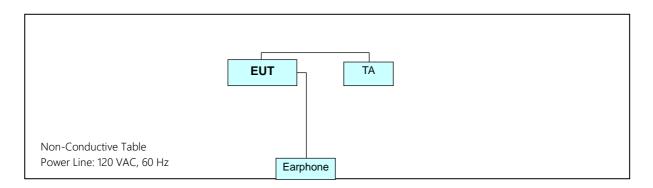


## 2.2.1 Frequency Range of Radiated Measurements

An unintentional radiator, including a digital device, the spectrum shall be investigated from the lowest radio frequency signal generated or used in the device, without going below the lowest frequency for which a Radiated Emission limit is specified, up to the frequency shown in the following table

Highest frequency generated or used in the device or on which the device operates or tunes (MHz)	Upper frequency of measurement range (MHz)		
Below 1.705	30		
1.705 to 108	1 000		
108 to 500	2 000		
500 to 1 000	5 000		
Above 1 000	5th harmonic of the highest frequency or 40 GHz, whichever is lower		

## 2.3 Configuration of Tested System



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## 3. PRELIMINARY TEST

#### 3.1 Conducted Emission

It was tested the following operating mode, after connecting all peripheral devices.

Operating Modes: FRONT CAMERA & MP3 mode

REAR CAMERA & FM RADIO mode

IDLE mode

NOTE. The worst-case emissions are reported.

#### 3.2 Radiated Emission

It was tested the following operating mode, after connecting all peripheral devices.

Operating Modes: FRONT CAMERA & MP3 mode

REAR CAMERA & FM RADIO mode

IDLE mode

NOTE. The worst-case emissions are reported.

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## 4. CONDUCTED EMISSION AND RADIATED EMISSION TEST SUMMARY

#### 4.1 Conducted Emission

## 4.1.1 Measuring instruments

	Туре	Type Manufacturer		Serial Number	Calibration Cycle	Calibration Date
$\boxtimes$	EMI Test Receiver	Rohde & Schwarz	ESCI	100584	1 year	06.18.2019
$\boxtimes$	LISN	Rohde & Schwarz	ENV216	102245	1 year	09.11.2019
$\boxtimes$	Radio communication analyzer	ANRITSU	MT8820C	6201138643	1 year	08.20.2019
$\boxtimes$	Antenna (for Communication)	Schwarzbeck	USLP9142	VSLP 9142-200	-	-
$\boxtimes$	Software	Rohde & Schwarz	EMC32	-	-	-

## 4.1.2 Operating Condition

The test results of conducted emission at mains ports provide the following information:

Test Standard Used	FCC CFR 47 PART 15 Subpart B Class B ANSI C63.4-2014
Frequency Range	150 kHz to 30 MHz
Detector	Quasi-Peak, CISPR-Average
Bandwidth	9 kHz (6 dB)
Worst Case of Operating Mode	FRONT CAMERA & MP3 mode
Kind of Test Site	EMI Shielded Room
Temperature	22.7 °C
Relative Humidity	41.8 %
Test Date	March 11, 2020

## Calculation Formula:

- 1. Conductor L1 = Hot, Conductor N = Neutral
- 2. Corr. = LISN Factor + Cable Loss
- 3. QuasiPeak or CAverage= Receiver Reading + Corr.
- 4. Margin = Limit QuasiPeak or CAverage

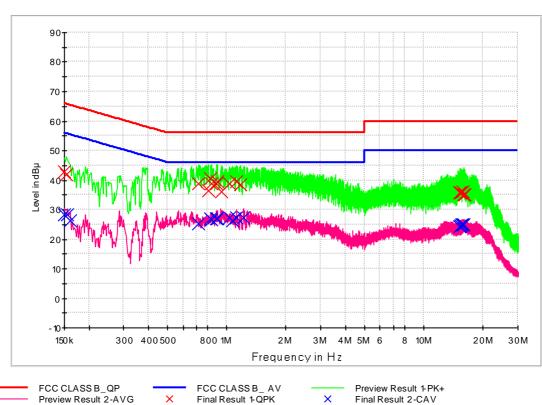
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## 4.1.3 Measuring Data

Figure 1: Conducted Emission (150 kHz to 30 MHz), Line (L1)



FCC CLASS B\_Exten Cable

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## QuasiPeak Final Result, Line (L1)

Frequency (MHz)	QuasiPeak (dBµV)	Bandwidth (kHz)	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.150000	42.9	9.000		9.8	23.1	66.0
0.154000	41.8	9.000	L1	9.8	23.9	65.8
0.722000	38.7	9.000	L1	9.8	17.3	56.0
0.810000	36.3	9.000	L1	9.8	19.7	56.0
0.830000	40.7	9.000	L1	9.8	15.3	56.0
0.838000	38.7	9.000	L1	9.8	17.3	56.0
0.888000	38.9	9.000	L1	9.8	17.1	56.0
0.898000	39.4	9.000	L1	9.8	16.6	56.0
0.946000	36.1	9.000	L1	9.8	19.9	56.0
1.028000	38.8	9.000	L1	9.8	17.2	56.0
1.116000	39.4	9.000	L1	9.8	16.6	56.0
1.182000	38.4	9.000	L1	9.8	17.6	56.0
15.226000	35.8	9.000	L1	10.4	24.2	60.0
15.284000	35.8	9.000	L1	10.4	24.2	60.0
15.478000	35.8	9.000	L1	10.4	24.2	60.0
15.798000	36.1	9.000	L1	10.4	23.9	60.0
15.982000	35.1	9.000	L1	10.4	24.9	60.0
16.084000	35.2	9.000	L1	10.4	24.8	60.0

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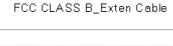
## CAverage Final Result, Line (L1)

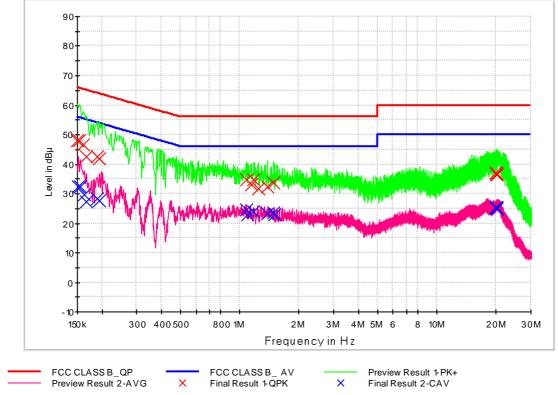
Frequency (MHz)	CAverage (dBµV)	Bandwidth (kHz)	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.150000	28.3	9.000	L1	9.8	27.7	56.0
0.156000	28.2	9.000	L1	9.8	27.5	55.7
0.160000	26.3	9.000	L1	9.8	29.2	55.5
0.722000	25.2	9.000	L1	9.8	20.8	46.0
0.830000	27.0	9.000	L1	9.8	19.0	46.0
0.838000	26.6	9.000	L1	9.8	19.4	46.0
0.888000	27.0	9.000	L1	9.8	19.0	46.0
0.898000	26.9	9.000	L1	9.8	19.1	46.0
1.028000	27.3	9.000	L1	9.8	18.7	46.0
1.068000	26.1	9.000	L1	9.8	19.9	46.0
1.122000	27.3	9.000	L1	9.8	18.7	46.0
1.216000	27.5	9.000	L1	9.8	18.5	46.0
15.226000	24.2	9.000	L1	10.4	25.8	50.0
15.284000	24.4	9.000	L1	10.4	25.6	50.0
15.478000	24.6	9.000	L1	10.4	25.4	50.0
15.618000	24.9	9.000	L1	10.4	25.1	50.0
15.798000	24.9	9.000	L1	10.4	25.1	50.0
15.982000	25.0	9.000	L1	10.4	25.0	50.0

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Figure 2: Conducted Emission (150 kHz to 30 MHz), Line (N)





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## QuasiPeak Final Result, Line (N)

Frequency (MHz)	QuasiPeak (dBµV)	Bandwidth (kHz)	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.150000	47.9	9.000	N	9.8	18.1	66.0
0.154000	47.8	9.000	N	9.8	17.9	65.8
0.160000	46.6	9.000	N	9.8	18.9	65.5
0.166000	42.4	9.000	N	9.8	22.8	65.2
0.190000	42.4	9.000	N	9.8	21.6	64.0
0.194000	41.8	9.000	N	9.8	22.1	63.9
1.078000	34.8	9.000	N	9.8	21.2	56.0
1.148000	32.9	9.000	N	9.8	23.1	56.0
1.182000	34.8	9.000	N	9.8	21.2	56.0
1.244000	31.7	9.000	N	9.8	24.3	56.0
1.384000	32.2	9.000	N	9.9	23.8	56.0
1.486000	33.8	9.000	N	9.9	22.2	56.0
19.956000	37.0	9.000	N	10.6	23.0	60.0
20.050000	36.7	9.000	N	10.6	23.3	60.0
20.106000	36.8	9.000	N	10.6	23.2	60.0
20.128000	36.4	9.000	N	10.6	23.6	60.0
20.162000	36.6	9.000	N	10.6	23.4	60.0
20.248000	36.4	9.000	N	10.6	23.6	60.0

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## CAverage Final Result, Line (N)

Frequency (MHz)	CAverage (dBµV)	Bandwidth (kHz)	Line	Corr. (dB)	Margin (dB)	Limit (dBµV)
0.152000	32.3	9.000	N	9.8	23.5	55.9
0.156000	32.3	9.000	N	9.8	23.4	55.7
0.162000	29.6	9.000	N	9.8	25.7	55.4
0.166000	27.1	9.000	N	9.8	28.0	55.2
0.190000	28.2	9.000	N	9.8	25.8	54.0
0.194000	27.7	9.000	N	9.8	26.2	53.9
1.078000	24.5	9.000	N	9.8	21.5	46.0
1.100000	23.0	9.000	N	9.8	23.0	46.0
1.182000	23.8	9.000	N	9.8	22.2	46.0
1.384000	23.3	9.000	N	9.9	22.7	46.0
1.486000	23.5	9.000	N	9.9	22.5	46.0
1.494000	22.7	9.000	N	9.9	23.3	46.0
19.956000	25.4	9.000	N	10.6	24.6	50.0
20.036000	25.3	9.000	N	10.6	24.7	50.0
20.050000	25.4	9.000	N	10.6	24.6	50.0
20.128000	25.1	9.000	N	10.6	24.9	50.0
20.162000	25.0	9.000	N	10.6	25.0	50.0
20.248000	25.0	9.000	N	10.6	25.0	50.0

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## 4.2 Radiated Emission Below 1 GHz

## 4.2.1 Measuring instruments

	Туре	Manufacturer	Model Name	Serial Number	Calibration Cycle	Calibration Date
$\boxtimes$	EMI test receiver	Rohde & Schwarz	ESU40	100524	1 year	05.17.2019
$\boxtimes$	Trilog antenna	Schwarzbeck	VULB 9168	255	2 year	03.26.2019
$\boxtimes$	Antenna master	INNCO Systems	MA4640-XP-ET	-	N/A	-
$\boxtimes$	Antenna master controller	INNCO Systems	CO3000	CO3000/870/ 35990515/L	N/A	-
$\boxtimes$	Turn Table	INNCO Systems	1060	-	N/A	-
$\boxtimes$	Turn table controller	INNCO Systems	CO2000	CO2000/095/ 7590304/L	N/A	-
$\boxtimes$	Radio communication analyzer	ANRITSU	MT8820C	6201138643	1 year	08.20.2019
$\boxtimes$	Antenna (for Communication)	Schwarzbeck	USLP9142	VSLP 9142-200	-	-
$\boxtimes$	Software	Rohde & Schwarz	EMC32	-	-	-

## 4.2.2 Operating Condition

The test results of radiated emission provide the following information:

Test Date	March 11, 2020
Relative Humidity	41.3 %
Temperature	22.6 °C
Kind of Test Site	3 m semi anechoic chamber
Worst Case of Operating Mode	FRONT CAMERA & MP3 mode
Bandwidth	120 kHz (6 dB)
Detector	Quasi-Peak
Frequency Range	30 MHz to 1 000 MHz
Used Test Standard	FCC CFR 47 PART 15 Subpart B Class B ANSI C63.4-2014

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## 4.2.3 Measuring Data

Frequency (MHz)	Quasi Peak (dBµV/m)	Antenna Height (cm)	POL. (H/V)	Azimuth (deg)	Corr. (dB)	Margin (dB)	Limit (dBµV/m)
30.265247	24.2	100.0	V	36.0	18.3	15.8	40.0
32.774600	22.7	100.0	V	354.0	18.5	17.3	40.0
54.055600	20.6	100.0	V	0.0	19.7	19.4	40.0
88.559000	18.6	274.8	Н	125.0	14.5	24.9	43.5
249.988600	21.5	174.9	V	321.0	18.7	24.5	46.0
634.515200	27.9	274.9	Н	75.0	27.9	18.1	46.0

#### - Calculation Formula:

- 1. POL. H = Horizontal, POL. V = Vertical
- 2. QuasiPeak = Reading (Receiver Reading) + Corr.
- 3. Corr. (Correction Factor) = Antenna Factor + Cable Loss
- 4. Margin = Limit QuasiPeak

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## 4.3 Radiated Emission Above 1 GHz

## 4.3.1 Measuring instruments

	Туре	Manufacturer	Model Name	Serial Number	Calibration Cycle	Calibration Date
$\boxtimes$	EMI test receiver	Rohde & Schwarz	ESU40	100524	1 year	05.17.2019
$\boxtimes$	Antenna master	INNCO Systems	MA4640-XP-ET	-	N/A	-
$\boxtimes$	Antenna master controller	INNCO Systems	CO3000	CO3000/870/ 35990515/L	N/A	-
$\boxtimes$	Turn table	INNCO Systems	1060	-	N/A	-
$\boxtimes$	Turn table controller	INNCO Systems	CO2000	CO2000/095/ 7590304/L	N/A	-
$\boxtimes$	Low Noise amplifier	TESTEK	TK-PA18H	170034-L	1 year	03.03.2020
	Low Noise amplifier	TESTEK	TK-PA1840H	170030-L	1 year	02.13.2020
$\boxtimes$	Horn antenna	Schwarzbeck	BBHA 9120D	01836	1 year	07.19.2019
	Horn Antenna	Schwarzbeck	BBHA 9170	BBHA 9170#786	1 year	12.03.2019
$\boxtimes$	Radio communication analyzer	ANRITSU	MT8820C	6201138643	1 year	08.20.2019
	Antenna (for Communication)	Schwarzbeck	USLP9142	VSLP 9142-200	-	-
$\boxtimes$	Software	Rohde & Schwarz	EMC32	_	-	-

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## 4.3.2 Operating Condition

The test results of radiated emission provide the following information:

Used Test Standard	FCC CFR 47 PART 15 Subpart B Class B ANSI C63.4-2014
Detector	Peak mode: Peak (RBW: 1 MHz, VBW: 3 MHz) CISPR-Average mode: Peak (RBW: 1 MHz, VBW: 10 Hz)
Highest Frequency	2 480 MHz
Tested Frequency Range	1 GHz to 18 GHz
Worst Case of Operating Mode	FRONT CAMERA & MP3 mode
Kind of Test Site	3 m semi anechoic chamber
Temperature	21.5 °C
Relative Humidity	40.3 %
Test Date	March 16, 2020

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## 4.3.3 Measuring Data

Frequency (MHz)	Peak (dBµV/m)	Antenna Height (cm)	POL. (H/V)	Azimuth (deg)	Corr. (dB)	Margin (dB)	Limit (dBµV/m)
2254.710000	31.9	350.0	Н	309.0	-25.4	42.1	74.0
4026.140000	36.5	100.0	Н	201.0	-20.4	37.5	74.0
4967.240000	38.0	111.4	V	226.0	-17.9	36.0	74.0
7319.030000	41.6	150.0	V	3.0	-12.5	32.4	74.0
9916.015000	44.5	350.0	٧	136.0	-9.0	29.5	74.0
14466.845000	47.4	100.0	V	291.0	-1.1	26.6	74.0

Frequency (MHz)	CAverage (dBµV/m)	Antenna Height (cm)	POL. (H/V)	Azimuth (deg)	Corr. (dB)	Margin (dB)	Limit (dBµV/m)
2254.710000	19.1	350.0	Н	309.0	-25.4	34.9	54.0
4026.140000	22.5	100.0	Н	201.0	-20.4	31.5	54.0
4967.240000	24.5	111.4	V	226.0	-17.9	29.5	54.0
7319.030000	28.6	150.0	V	3.0	-12.5	25.4	54.0
9916.015000	31.4	350.0	V	136.0	-9.0	22.6	54.0
14466.845000	34.8	100.0	V	291.0	-1.1	19.2	54.0

## - Calculation Formula:

- 1. POL. H = Horizontal, POL. V = Vertical
- 2. Peak or CAverage = Reading (Receiver Reading) + Corr.
- 3. Corr. (Correction Factor) = Antenna Factor+ Cable Loss –Amplifier Gain
- 4. Margin = Limit Peak or CAverage

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## 5. CONCLUSION

The data collected shows that the **Product Name: Multi-band GSM/WCDMA/LTE Phone with WLAN and Bluetooth,** 

Model Name: LM-K400AM complies with §15.107 and §15.109 of the FCC rules.

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## 6. APPENDIX A. TEST SETUP PHOTO

Please refer to Appendix. A and test setup photo file no. as follows;

File No.	Date of Issue	Description		
HCT-EM-2003-FC007-P	March 17, 2020	Initial Release		

End of report

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