RF EXPOSURE REPORT



Report No.: 18070496-FCC-H Supersede Report No.: N/A

Applicant	INFINIX MOBILITY LIMITED			
Product Name	Mobile phone			
Model No.	X606D	X606D		
Serial No.	N/A			
Test Standard	FCC 2.109	3		
Test Date	May 11 to 22, 2018			
Issue Date	May 23, 2018			
Test Result	Pass Fail			
Equipment complied with the specification				
Equipment did not comply with the specification				
Janan Liang		David Huang		
Aaron Liang Test Engineer		David Huang Checked By		

This test report may be reproduced in full only

Test result presented in this test report is applicable to the tested sample only

Issued by:

SIEMIC (SHENZHEN-CHINA) LABORATORIES

Zone A, Floor 1, Building 2 Wan Ye Long Technology Park
South Side of Zhoushi Road, Bao' an District, Shenzhen, Guangdong China 518108
Phone: +86 0755 2601 4629801 Email: China@siemic.com.cn



Test Report	18070496-FCC-H
Page	2 of 9

Laboratories Introduction

SIEMIC, headquartered in the heart of Silicon Valley, with superior facilities in US and Asia, is one of the leading independent testing and certification facilities providing customers with one-stop shop services for Compliance Testing and Global Certifications.



In addition to testing and certification, SIEMIC provides initial design reviews and compliance management throughout a project. Our extensive experience with China, Asia Pacific, North America, European, and International compliance requirements, assures the fastest, most cost effective way to attain regulatory compliance for the global markets.

Accreditations for Conformity Assessment

Country/Region	Scope
USA	EMC, RF/Wireless, SAR, Telecom
Canada	EMC, RF/Wireless, SAR, Telecom
Taiwan	EMC, RF, Telecom, SAR, Safety
Hong Kong	RF/Wireless, SAR, Telecom
Australia	EMC, RF, Telecom, SAR, Safety
Korea	EMI, EMS, RF, SAR, Telecom, Safety
Japan	EMI, RF/Wireless, SAR, Telecom
Singapore	EMC, RF, SAR, Telecom
Europe	EMC, RF, SAR, Telecom, Safety



Test Report	18070496-FCC-H
Page	3 of 9

This page has been left blank intentionally.



Test Report	18070496-FCC-H
Page	4 of 9

CONTENTS

1.	REPORT REVISION HISTORY	5
	CUSTOMER INFORMATION	
3.	TEST SITE INFORMATION	5
4.	EQUIPMENT UNDER TEST (EUT) INFORMATION	6
5.	FCC §2.1093 - RADIOFREQUENCY RADIATION EXPOSURE EVALUATION: PORTABLE DEVICES	.8
5.1	RF EXPOSURE	8
52	TEST RESULT	Q



Test Report	18070496-FCC-H
Page	5 of 9

1. Report Revision History

Report No.	Report Version	Description	Issue Date
18070496-FCC-H	NONE	Original	May 23, 2018

2. Customer information

Applicant Name	INFINIX MOBILITY LIMITED	
Applicant Add	RMS 05-15, 13A/F SOUTH TOWER WORLD FINANCE CTR HARBOUR CITY 17	
	CANTON RD TST KLN HONG KONG	
Manufacturer	INFINIX MOBILITY LIMITED	
Manufacturer Add	RMS 05-15, 13A/F SOUTH TOWER WORLD FINANCE CTR HARBOUR CITY 17	
	CANTON RD TST KLN HONG KONG	

3. Test site information

Lab performing tests	SIEMIC (Shenzhen-China) LABORATORIES		
	Zone A, Floor 1, Building 2 Wan Ye Long Technology Park		
Lab Address	South Side of Zhoushi Road, Bao' an District, Shenzhen, Guangdong China		
	518108		
FCC Test Site No.	535293		
IC Test Site No.	4842E-1		
Test Software	Radiated Emission Program-To Shenzhen v2.0		



Test Report	18070496-FCC-H
Page	6 of 9

4. Equipment under Test (EUT) Information

Description of EUT:	Mobile phone

Main Model: X606D

Serial Model: N/A

Date EUT received: May 10, 2018

Test Date(s): May 11 to 22, 2018

Antenna Gain: Bluetooth/BLE: 1.97dBi

Antenna Type: PIFA Antenna

 $\mbox{Bluetooth: GFSK, π /4DQPSK, 8DPSK} \label{eq:bluetooth: GFSK, π /4DQPSK, 8DPSK} Type of Modulation:$

" BLE: GFSK

RF Operating Frequency (ies): Bluetooth& BLE: 2402-2480 MHz

Bluetooth: 79CH Number of Channels:

BLE: 40CH

Port: USB Port, Earphone Port

Adapter :

Model: A88-502000

Input: AC100-240V~50/60Hz,0.35A

Output: DC 5.0V, 2.0A

Input Power: Battery :

Model: BL-39HX

Rating: 3.85V, 3900mAh/4000mAh (min/typ)

15.01Wh/15.40Wh (min/typ)

Limited charge voltage: 4.4V



Test Report	18070496-FCC-H			
Page	7 of 9			

ıiχ

FCC ID: 2AIZN-X606D



Test Report	18070496-FCC-H
Page	8 of 9

5. FCC §2.1093 - Radiofrequency radiation exposure evaluation: portable devices.

5.1 RF Exposure

Standard Requirement:

According to §15.247 (i) and §1.1307(b)(1), systems operating under the provisions of this section shall be operated in a manner that ensures that the public is not exposed to radio frequency energy level in excess of the Commission's guidelines.

The 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by:

[(max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)] $\cdot [\sqrt{f_{(GHz)}}] \le 3.0$ for 1-g SAR and ≤ 7.5 for 10-g extremity SAR, 16 where

- f_(GHz) is the RF channel transmit frequency in GHz
- Power and distance are rounded to the nearest mW and mm before calculation¹⁷
- The result is rounded to one decimal place for comparison

The test exclusions are applicable only when the minimum test separation distance is ≤ 50 mm and for transmission frequencies between 100 MHz and 6 GHz. When the minimum test separation distance is ≤ 5 mm, a distance of 5 mm is applied to determine SAR test exclusion.

Routine SAR evaluation refers to that specifically required by § 2.1093, using measurements or computer simulation. When routine SAR evaluation is not required, portable transmitters with output power greater than the applicable low threshold require SAR evaluation to qualify for TCB approval.

result = $P\sqrt{F}/D$

P= Maximum turn-up power in mW

F= Channel frequency in GHz

D= Minimum test separation distance in mm



Test Report	18070496-FCC-H			
Page	9 of 9			

5.2 Test Result

Bluetooth Mode:

Modulation	СН	Freque ncy	Conducted Power	Tune Up Power	Max Tune Up Power	Max Tune Up Power	Result	Limit
		(MHz)	(dBm)	(dBm)	(dBm)	(mW)		
GFSK	Low	2402	0.543	1±1	2	1.585	0.49	3
	Mid	2441	0.943	1±1	2	1.585	0.50	3
	High	2480	1.584	1±1	2	1.585	0.50	3
π /4 DQPSK	Low	2402	0.350	0.5±1	1.5	1.413	0.44	3
	Mid	2441	0.716	0.5±1	1.5	1.413	0.44	3
	High	2480	1.258	0.5±1	1.5	1.413	0.44	3
8-DPSK	Low	2402	0.599	1±1	2	1.585	0.49	3
	Mid	2441	1.001	1±1	2	1.585	0.50	3
	High	2480	1.526	1±1	2	1.585	0.50	3

BLE Mode:

Modulation	СН	Freq (MHz)	Conducted Power (dBm)	Tune Up Power (dBm)	Max Tune Up Power (dBm)	Max Tune Up Power (mW)	Result	Limit
GFSK	Low	2402	0.395	0.5±1	1.5	1.413	0.44	3
	Mid	2440	0.492	0.5±1	1.5	1.413	0.44	3
	High	2480	1.250	0.5±1	1.5	1.413	0.44	3

Result: Compliance

No SAR measurement is required.