FCC RF Test Report

APPLICANT : Motorola Mobility LLC EQUIPMENT : Mobile Cellular Phone

BRAND NAME : Motorola

MODEL NAME : XT2013-2

FCC ID : IHDT56YD2

STANDARD : FCC Part 15 Subpart C §15.247

CLASSIFICATION : (NII) Unlicensed National Information Infrastructure

This is a data re-used report which is only valid together with the original test report. We, Sporton International (Kunshan) Inc., would like to declare that the tested sample has been evaluated in accordance with the test procedures and has been in compliance with the applicable technical standards.

The test results in this report apply exclusively to the tested model / sample. Without written approval of Sporton International (Kunshan) Inc., the test report shall not be reproduced except in full.

Reviewed by: Jason Jia / Supervisor

JasonJia

Approved by: James Huang / Manager

Sporton International (Kunshan) Inc.

No. 1098, Pengxi North Road, Kunshan Economic Development Zone Jiangsu Province 215300 People's Republic of China

Sporton International (Kunshan) Inc.

TEL: 86-512-57900158 FAX: 86-512-57900958 FCC ID: IHDT56YD2 Page Number : 1 of 6
Report Issued Date : Jun. 17, 2019
Report Version : Rev. 01

Report No.: FR932901-01F

Report Template No.: BU5-FR15EWL B4AC MA Version 2.0

TABLE OF CONTENTS

Report No. : FR932901-01F

1	GENERAL DESCRIPTION		
	1.1	Applicant	. 4
	1.2	Product Feature of Equipment Under Test	4
	1.3	Product Specification of Equipment Under Test	. 4
	1.4	Modification of EUT	4
	1.5	Re-use of Measured Data	. 5

APPENDIX A. REFERENCE REPORT

 Sporton International (Kunshan) Inc.
 Page Number
 : 2 of 6

 TEL: 86-512-57900158
 Report Issued Date
 : Jun. 17, 2019

 FAX: 86-512-57900958
 Report Version
 : Rev. 01

REVISION HISTORY

Report No. : FR932901-01F

REPORT NO.	VERSION	DESCRIPTION	ISSUED DATE
FR932901-01F	Rev. 01	Initial issue of report	Jun. 17, 2019

 Sporton International (Kunshan) Inc.
 Page Number
 : 3 of 6

 TEL: 86-512-57900158
 Report Issued Date
 : Jun. 17, 2019

 FAX: 86-512-57900958
 Report Version
 : Rev. 01

1 General Description

1.1 Applicant

Motorola Mobility LLC

222 W, Merchandise Mart Plaza, Chicago IL 60654 USA

1.2 Product Feature of Equipment Under Test

Product Feature			
Equipment	Mobile Cellular Phone		
Brand Name	Motorola		
Model Name	XT2013-2		
FCC ID	IHDT56YD2		
EUT supports Radios application	GSM/GPRS/EGPRS/WCDMA/HSPA/ DC-HSDPA/ HSPA+ (16QAM uplink is not supported)/LTE WLAN 2.4GHz 802.11b/g/n HT20 WLAN 5GHz 802.11a/n HT20/HT40 WLAN 5GHz 802.11ac VHT20/VHT40/VHT80 Bluetooth BR/EDR/LE FM Receiver/GNSS/NFC		
HW Version	DVT2		
SW Version	PSB29.21		
EUT Stage	Identical Prototype		

Report No.: FR932901-01F

Remark: The above EUT's information was declared by manufacturer. Please refer to the specifications or user's manual for more detailed description.

1.3 Product Specification of Equipment Under Test

Standards-related Product Specification			
Tx/Rx Channel Frequency Range	5745 MHz ~ 5825 MHz		
Type of Modulation	802.11a/n: OFDM (BPSK / QPSK / 16QAM / 64QAM) 802.11ac: OFDM (BPSK / QPSK / 16QAM / 64QAM / 256QAM)		
Antenna Type / Gain	Fixed Internal Monopole Antenna with gain -4.50 dBi		

1.4 Modification of EUT

No modifications are made to the EUT during all test items.

 Sporton International (Kunshan) Inc.
 Page Number
 : 4 of 6

 TEL: 86-512-57900158
 Report Issued Date
 : Jun. 17, 2019

 FAX: 86-512-57900958
 Report Version
 : Rev. 01

1.5 Re-use of Measured Data

1.6.1 Introduction Section

This application re-uses data collected on a similar device. The subject device of this application (Model: XT2013-2, FCC ID: IHDT56YD2) is electrically identical to the reference device (Model: XT2013-1, FCC ID: IHDT56YD1) for the portions of the circuitry corresponding to the data being re-used, as treated by KDB Publication 484596 D01.

Report No.: FR932901-01F

1.6.2 Difference Section

For details concerning the similarity with respect to component placement, mechanical/electrical design etc., please refer to the Product Equality Declaration.

The re-used RF data includes the following bands provided in Appendix A (Sporton RF Report No. FR932901F for the reference device Model: XT2013-1, FCC ID: IHDT56YD1).

1.6.3 Reference detail Section:

Equipment Class	Reference FCC ID	Folder Test	Report Title/Section
NII (B1~3)	IHDT56YD1	Part15C (FR932901E)	All sections applicable
NII (B4)	IHDT56YD1	Part15C (FR932901F)	All sections applicable
NII (DFS)	IHDT56YD1	Part15C (FZ932901)	All sections applicable

 Sporton International (Kunshan) Inc.
 Page Number
 : 5 of 6

 TEL: 86-512-57900158
 Report Issued Date
 : Jun. 17, 2019

 FAX: 86-512-57900958
 Report Version
 : Rev. 01

1.6.4 Spot Check Verification Data Section

In order to confirm hardware similarity of the subject device with the reference device, spot check measurements were performed on the subject device for the radiated spurious emission, the test result were consistent with FCC ID: IHDT56YD1.

Report No.: FR932901-01F

: 6 of 6

Assertions concerning the similarity of these devices are based on representations by the applicant. The applicant accepts full responsibility for the validity of the similarity claim, and for the determination that verification test data are sufficient to support it.

Test Item	Mode	IHDT56YD1 Worst Result	IHDT56YD2 Worst Result	Difference (dB)
	11a, 5.8GHz	17.78	17.17	-0.61
	11n HT20, 5.8GHz	17.92	17.14	-0.78
Average Conducted	11n HT40, 5.8GHz	17.08	16.57	-0.51
Power (dBm)	11ac VHT20, 5.8GHz	17.77	17.53	-0.24
(dBiii)	11ac VHT40, 5.8GHz	16.94	16.54	-0.40
	11ac VHT80, 5.8GHz	14.59	13.82	-0.77
Radiated Spurious Emission (dBuV/m)	802. 11ac VHT80	51.61	50.63	-0.98

Sporton International (Kunshan) Inc. Page Number TEL: 86-512-57900158 Report Issued Date: Jun. 17, 2019

FAX: 86-512-57900958 : Rev. 01 Report Version FCC ID: IHDT56YD2 Report Template No.: BU5-FR15EWL B4AC MA Version 2.0

Appendix A. Reference Report

Please refer to Sporton report number FR932901F which is issued separately.

Sporton International (Kunshan) Inc.

TEL: 86-512-57900158 FAX: 86-512-57900958 FCC ID: IHDT56YD2 Page Number : A1 of A1
Report Issued Date : Jun. 17, 2019
Report Version : Rev. 01

Report Template No.: BU5-FR15CBT Version 2.0

Report No. : FR932901-01F