RF EXPOSURE REPORT



Report No.: 15070591-FCC-H2 Supersede Report No.: N/A

Applicant	Verykool USA Inc			
Product Name	Mobile pho	Mobile phone		
Model No.	SL5009			
Serial No.	N/A			
Test Standard	FCC 2.109	3.2014		
Test Date	July 21 to J	luly 31, 2015		
Issue Date	August 10,	August 10, 2015		
Test Result	Pass Fail			
Equipment compl	Equipment complied with the specification			
Equipment did not comply with the specification				
Winnie.Z.	Winnie Zheng David Huang			
Winnie Zh	ang	David	Huang	
Test Engineer		Chec	ked 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	15070591-FCC-H2
Page	2 of 11

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	15070591-FCC-H2
Page	3 of 11

This page has been left blank intentionally.



Test Report	15070591-FCC-H2
Page	4 of 11

CONTENTS

1.	REPORT REVISION HISTORY	5
2.	CUSTOMER INFORMATION	5
3.	TEST SITE INFORMATION	5
4.	EQUIPMENT UNDER TEST (EUT) INFORMATION	6
5.	FCC §2.1093 - RADIOFREQUENCY RADIATION EXPOSURE EVALUATION: PORTABLE DEVICES	. 9
5.1	RF EXPOSURE	9
52	TEST RESULT	10



Test Report	15070591-FCC-H2
Page	5 of 11

1. Report Revision History

Report No.	Report Version	Description	Issue Date
15070591-FCC-H2	NONE	Original	August 10, 2015

2. Customer information

Applicant Name	Verykool USA Inc
Applicant Add	3636 Nobel Drive, Suite 325, San Diego, CA 92122 USA
Manufacturer	Zechin Communications Co.,Ltd.
Manufacturer Add	Unit804,8th Floor Desay Tech Building Gaoxin, Road South,
	Nanshan District Shenzhen,China

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.	718246		
IC Test Site No.	4842E-1		
Test Software	Radiated Emission Program-To Shenzhen v2.0		



Test Report	15070591-FCC-H2
Page	6 of 11

4. Equipment under Test (EUT) Information

Description of EUT: Mobile phone

Main Model: SL5009

Serial Model: N/A

Date EUT received: July 20, 2015

Test Date(s): July 21 to July 31, 2015

GSM850: 1.6 dBi PCS1900: 3.8 dBi

UMTS-FDD Band V: 1.7 dBi UMTS-FDD Band IV: 3.7 dBi UMTS-FDD Band II: 3.8 dBi

Bluetooth/BLE: 3 dBi

WIFI: 2.9 dBi

LTE Band 2: 3.8 dBi

Antenna Gain:

LTE Band 4: 3.8 dBi LTE Band 5: 3.8 dBi LTE Band 7: 3.8 dBi LTE Band 12: 3.8 dBi LTE Band 17: 3.8 dBi

GPS:1.6 dBi

GSM / GPRS: GMSK EGPRS: GMSK, 8PSK

UMTS-FDD: QPSK, 16QAM 802.11b/g/n: DSSS, OFDM

Type of Modulation:

Bluetooth: GFSK, π /4DQPSK, 8DPSK

BLE: GFSK

LTE Band: QPSK, 16QAM

GPS:BPSK

GSM850 TX: 824.2 ~ 848.8 MHz; RX: 869.2 ~ 893.8 MHz RF Operating Frequency (ies):

PCS1900 TX: 1850.2 ~ 1909.8 MHz; RX: 1930.2 ~ 1989.8 MHz



Number of Channels:

Test Report	15070591-FCC-H2
Page	7 of 11

UMTS-FDD Band V TX: 826.4 ~ 846.6 MHz; RX: 871.4 ~ 891.6 MHz

UMTS-FDD Band IV TX:1712.4 \sim 1752.6 MHz; UMTS-FDD Band II TX:1852.4 \sim 1907.6 MHz;

RX: 1932.4 ~ 1987.6 MHz

WIFI:802.11b/g/n(20M): 2412-2462 MHz WIFI:802.11n(40M): 2422-2452 MHz Bluetooth& BLE: 2402-2480 MHz

LTE Band 2 TX: $1852.5 \sim 1907.5$ MHz; RX: $1932.5 \sim 1987.5$ MHz LTE Band 4 TX: $1712.5 \sim 1752.5$ MHz; RX: $2112.5 \sim 2152.5$ MHz LTE Band 5 TX: $826.5 \sim 846.5$ MHz; RX: $871.5 \sim 891.5$ MHz LTE Band 7 TX: $2502.5 \sim 2567.5$ MHz; RX: $2622.5 \sim 2687.5$ MHz

LTE Band 12 TX:699.7 ~ 715.3 MHz; RX : 729.7~ 745.3MHz LTE Band 17 TX: 706.5 ~ 713.5 MHz; RX : 736.5 ~ 743.5 MHz

GPS RX:1575.42 MHz

GSM 850: 124CH PCS1900: 299CH

UMTS-FDD Band V: 102CH
UMTS-FDD Band IV: 202CH
UMTS-FDD Band II: 277CH
WIFI:802.11b/g/n(20M): 11CH

WIFI:802.11n(40M):7CH

Bluetooth: 79CH

BLE: 40CH GPS:1CH

Port: Power Port, Earphone Port, USB Port

Battery:

Model:344482PV

Spec:3.8V,1900mAh,7.22Wh

Limited Charging Voltage: 4.35V

Input Power:

Adapter:

Model:SC050100-US

Input: 100-240V; 50/60Hz; 0.4A

Output: DC 5.0V,1A

Trade Name : verykool

GPRS/EGPRS Multi-slot class 8/10/12



Test Report	15070591-FCC-H2
Page	8 of 11

FCC ID:	WA6SL5009

Date EUT received: July 20, 2015



Test Report	15070591-FCC-H2
Page	9 of 11

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	15070591-FCC-H2
Page	10 of 11

5.2 Test Result

Bluetooth Mode:

Modulation	СН	Freq (MHz)	Conducted Power	Tune Up Power	Max Tune Up Power	Max Tune Up Power	Result	Limit
		(1411 12)	(dBm)	(dBm)	(dBm)	(mW)		
	Low	2402	3.445	3±1	4	2.512	0.78	3
GFSK	Mid	2441	3.960	3±1	4	2.512	0.78	3
	High	2480	3.906	3±1	4	2.512	0.79	3
	Low	2402	2.217	3±1	4	2.512	0.78	3
π /4 DQPSK	Mid	2441	2.821	3±1	4	2.512	0.78	3
	High	2480	3.045	3±1	4	2.512	0.79	3
8-DPSK	Low	2402	2.305	3±1	4	2.512	0.78	3
	Mid	2441	2.953	3±1	4	2.512	0.78	3
	High	2480	3.189	3±1	4	2.512	0.79	3

WIFI Mode:

Modulation	СН	Freq (MHz)	Conducted Power (dBm)	Tune Up Power (dBm)	Max Tune Up Power (dBm)	Max Tune Up Power (mW)	Result	Limit
	Low	2412	8.59	8.5±1	9.5	8.913	2.77	3
802.11b	Mid	2437	9.42	8.5±1	9.5	8.913	2.78	3
	High	2462	7.89	8.5±1	9.5	8.913	2.80	3
802.11g	Low	2412	9.17	8.5±1	9.5	8.913	2.77	3
	Mid	2437	9.44	8.5±1	9.5	8.913	2.78	3
	High	2462	8.99	8.5±1	9.5	8.913	1.98	3
902 11-	Low	2412	9.00	8.5±1	9.5	8.913	2.77	3
802.11n (20M)	Mid	2437	9.23	8.5±1	9.5	8.913	2.78	3
	High	2462	8.64	8.5±1	9.5	8.913	2.80	3
802.11n (40M)	Low	2422	8.39	8.5±1	9.5	8.913	2.47	3
	Mid	2437	8.46	8.5±1	9.5	8.913	2.78	3
	High	2452	8.54	8.5±1	9.5	8.913	2.79	3



Test Report	15070591-FCC-H2
Page	11 of 11

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	-4.417	-3.5±1	-2.5	0.562	0.17	3
	Mid	2440	-3.372	-3.5±1	-2.5	0.562	0.18	3
	High	2480	-3.669	-3.5±1	-2.5	0.562	0.18	3

Result: Compliance

No SAR measurement is required.