



7 July, 2011

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Dear Xing Chen:

Enclosed you will find your file copy of a class II Permissive Change Grant of Part 22 and Part 24 Certification report (FCC ID: UDV-1005242010007). Model: 911.

For your reference, TCB will normally take another 2 weeks for reviewing the report. Approval will then be granted when no query is sorted.

Please contact me if you have any questions regarding the enclosed material.

Sincerely,

A handwritten signature in blue ink, appearing to read "Wai Leung".

Leung Wai Leung, Tommy
Deputy General Manager

Enclosure

Intertek Testing Services Shenzhen Ltd. Kejiyuan Branch

6F, D Block, Huahan Building, Langshan Road, Nanshan District, Shenzhen, P. R. China
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List of Exhibits

Exhibit Type	File Description	Filename
Test Report	Test Report	report.pdf
RF Exposure Info	SAR Report	sar report 1 of 3.pdf sar report 2 of 3.pdf sar report 3 of 3.pdf
External Photos	External Photo	external photos.pdf
Internal Photos	Internal Photo	internal photos.pdf
ID Label/Location Info	Label Artwork and Location	label.pdf
Cover Letter	Label Location Justification	justification.pdf
User Manual	User Manual	manual.pdf
Cover Letter	Letter of Agency	letter of agency.pdf
Cover Letter	Confidentiality Request	request.pdf
Cover Letter	Change Purpose	change purpose.pdf

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TEST REPORT

Report Number: SZ11050427-1

Application
for
Class II Permissive Change Grant
of 47 CFR Part 22 and Part 24 Certification

Cell phone

FCC ID: UDV-1005242010007

Prepared and Checked by:

Approved by:



Billy Li
Team Leader
6 July, 2011



Leung Wai Leung, Tommy
Deputy General Manager
7 July, 2011

- The test results reported in this test report shall refer only to the sample actually tested and shall not refer or be deemed to refer to bulk from which such a sample may be said to have been obtained.
- This report is for the exclusive use of Intertek's Client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this report. Only the Client is authorized to copy or distribute this report. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. The observations and test results referenced from this report are relevant only to the sample tested. This report by itself does not imply that the material, product, or service is or has ever been under an Intertek certification program.
- For Terms And Conditions of the services, it can be provided upon request.
- The evaluation data of the report will be kept for 3 years from the date of issuance.

TRF No.: FCC 22H&24E_a

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GENERAL INFORMATION

Applicant Name:	Shanghai Simcom Ltd.
Applicant Address:	xing.chen@sim.com P.O. BOX 200233, Shanghai, 200233 China
FCC Specification Standard:	FCC Part 22: 2010 FCC Part 24: 2010
FCC ID:	UDV-1005242010007
FCC Model(s):	911
Type of EUT:	GSM 850/1900 Transceiver
Description of EUT:	Cell phone
Serial Number:	N/A
Sample Receipt Date:	25 May, 2011
Date of Test:	8 Jun, 2011
Report Date:	7 July, 2011
Environmental Conditions:	Temperature: 25 ± 10°C Humidity: 10 to 90%

INTERTEK TESTING SERVICES

Table of Contents

1.0 Summary of Test Results	3
1.1 Statement of Compliance	3
2.0 General Description	4
2.1 Product Description	4
2.2 Test Methodology	5
2.3 Test Facility	5
3.0 System Test Configuration	6
3.1 Justification	6
3.2 Details of EUT and Description of Accessories	7
3.3 Measurement Uncertainty	7
3.4 Equipment Modification	7
4.0 Test Results	8
4.1 Channels for Cellular Service and Broadband PCS Services (FCC Part 22.905, Part 24.229)	8
4.2 RF Power Output (FCC Part 2.1046, 22.913 & 24.232)	9
4.3 Radio Frequency Exposure Compliance	10
4.4 Power of Spurious Emissions (FCC Part 2.1053, 2.1057, 22.917, 24.238)	11
5.0 Equipment List	12

Appendix – Exhibits for Application of Certification

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1.0 Summary of Test Results

Test Items	FCC Section	Results	Details see section
RF Output Power	2.1046 22.913 24.232	Pass	4.3
RF Exposure	1.1307 2.1093	Pass	4.9

1.1 Statement of Compliance

The equipment under test is found to be complying with the applicable requirements of following standards:

FCC Part 22: 2010

FCC Part 24: 2010

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2.0 **General Description**

2.1 Product Description

The 911 is a Cell phone.

The Cellular radiotelephone service and personal communications services frequency ranges of the EUT are as below:

GSM 850MHz:

Tx: 824.20 - 848.80MHz (at intervals of 200kHz)

Rx: 869.20 - 893.80MHz (at intervals of 200kHz)

GSM 1900MHz:

Tx: 1850.20 - 1909.80MHz (at intervals of 200kHz)

Rx: 1930.20 - 1989.80MHz (at intervals of 200kHz)

The EUT is powered by 3 x 1.5V AAA batteries.

The antenna used in the EUT is integral, and the test sample is a prototype.

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2.2 Test Methodology

Preliminary radiated scans and all radiated measurements were performed in semi-anechoic chamber. All Radiated tests were performed at an antenna to EUT distance of 3 meters, unless stated otherwise in the "**Justification Section**" of this Application. All measurements were made in accordance with the procedures in 47 CFR Part 2, Part 22, Part 24 and TIA-603-C.

2.3 Test Facility

The facilities used to collect the radiated data and conducted data are in **Interterk Testing Services Shenzhen Ltd. Kejiyuan Branch** and located at 6F, D Block, Huahan Building, Langshan Road, Nanshan District, Shenzhen, P. R. China. This test facility and site measurement data have been fully placed on file with the FCC.

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3.0 **System Test Configuration**

3.1 Justification

For radiated emissions testing, the equipment under test (EUT) was controlled by communication tester to produce maximum power. Care was taken to ensure proper power supply voltages during testing. During testing, all cables (if any) were manipulated to produce worst case emissions.

The EUT was powered by 3 x 1.5V AAA batteries.

For the measurements, the EUT is attached to a plastic stand if necessary and placed on the wooden turntable. If the EUT attaches to peripherals, they are connected and operational to simulate typical use.

The signal is maximized through rotation and placement in the three orthogonal axes. The antenna polarization is varied during the search for maximum signal level. Only the worst-case polarization is reported. For each spurious, raise and lower the test antenna from 1m to 4m to obtain a maximum reading on the spectrum analyzer. Radiated emissions are taken at three meters. If necessary, a pre-amplifier is used and/or the test is conducted at a closer distance.

The power level of EUT is set by the communication tester as follows:

850MHz band: Power Control Level (PCL) = 5 (Power class 4)

1900MHz band: Power Control Level (PCL) = 0 (Power class 1)

Which are the maximum power levels emitted by the EUT.

For the 850MHz band, according to 22.917, compliance with the rule is based on the use of instrumentation employing a resolution bandwidth of 100 kHz or greater. In the 1 MHz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter is employed. The 26dB emission bandwidth taken in section 4.4 is used for calculating the resolution bandwidth.

For the 1900MHz band, according to 24.238, compliance with the rule is based on the use of instrumentation employing a resolution bandwidth of 1 MHz or greater. However, in the 1 MHz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter is employed. The 26dB emission bandwidth taken in section 4.4 is used for calculating the resolution bandwidth.

Emission that are directly caused by digital circuits in the transmit path and transmitter portion are measured, and the limit are according to FCC Part 15 Section 15.109.

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3.2 Details of EUT and Description of Accessories

Details of EUT:

One Cell phone powered by 3x1.5V AAA batteries. (Supplied by Client).

Description of Accessories:

A headset using with 1.2m unshielded cable (Supplied by Intertek).

3.3 Measurement Uncertainty

When determining of the test conclusion, the Measurement Uncertainty of test has been considered.

Uncertainty and Compliance - Unless the standard specifically states that measured values are to be extended by the measurement uncertainty in determining compliance, all compliance determinations are based on the actual measured value.

3.4 Equipment Modification

Any modifications installed previous to testing by Shanghai simcom, Ltd. will be incorporated in each production model sold/leased in the United States.

No modifications were installed by Intertek Testing Services Shenzhen Ltd. Kejiyuan Branch.

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4.0 Test Results

Data is included of the worst case configuration (the configuration which resulted in the highest emission levels). Configuration photographs and data tables of the emissions are included.

4.1 Channels for Cellular and Broadband PCS Services (FCC Part 22.905, Part 24.229)

The following frequency bands are allocated for assignment to service providers in the Cellular Radiotelephone and Broadband PCS Services by FCC:

850MHz band

(a) Channel Block A:

869 - 880 MHz paired with 824 - 835 MHz

890 - 891.5 MHz paired with 845 - 846.5 MHz

(b) Channel Block B:

880 - 890 MHz paired with 835 - 845 MHz

891.5 - 894 MHz paired with 846 - 849 MHz

1900MHz band

The following frequency blocks are available for assignment on a Major Trading Areas (MTA) basis:

Block A: 1850 - 1865 MHz paired with 1930 - 1945 MHz; and

Block B: 1870 - 1885 MHz paired with 1950 - 1965 MHz.

The following frequency blocks are available for assignment on a Basic Trading Areas (BTA) basis:

Block C: 1895 - 1910 MHz paired with 1975 - 1990 MHz

Block D: 1865 - 1870 MHz paired with 1945 - 1950 MHz

Block E: 1885 - 1890 MHz paired with 1965 - 1970 MHz

Block F: 1890 - 1895 MHz paired with 1970 - 1975 MHz

The frequency range of the EUT is as below:

GSM 850MHz:

Tx: 824.20 - 848.80MHz (at intervals of 200kHz)

Rx: 869.20 - 893.80MHz (at intervals of 200kHz)

GSM 1900MHz:

Tx: 1850.20 - 1909.80MHz (at intervals of 200kHz)

Rx: 1930.20 - 1989.80MHz (at intervals of 200kHz)

As a result, the frequency range of the EUT fits into the allocated frequency blocks.

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4.2 RF Power Output (FCC Part 2.1046, 22.913 & 24.232)

The RF power output is measured at the RF output terminal. The limit is as follows:

Part 22.913 (for 850MHz band):

[] \leq 500W ERP (57dBm) for base stations and cellular repeaters

[✓] \leq 7W ERP (38.5dBm) for mobile and auxiliary test transmitters

Part 24.232 (for 1900MHz band):

[] \leq 1640W e.i.r.p. (62.1dBm) for base stations up to 300m HAAT;

[✓] \leq 2W e.i.r.p. (33dBm) peak output power for portable mobile

Test results:

Band	ARFCN	Frequency (MHz)	Antenna Gain (dBi)	Measured output power (dBm)	*ERP (dBm)	Limit (dBm)	Verdict
GSM 850MHz	190	836.6	0.5	33.25	31.6	38.5	PASS

Band	ARFCN	Frequency (MHz)	Antenna Gain (dBi)	Measured output power (dBm)	#EIRP (dBm)	Limit (dBm)	Verdict
GSM 1900MHz	661	1880.0	0.5	29.59	30.09	33.0	PASS

*ERP (dBm) = Conducted Power (dBm) + Antenna Gain (dBi) - 2.15dB

#EIRP (dBm) = Conducted Power (dBm) + Antenna Gain (dBi)

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4.3 Radio Frequency Exposure Compliance

EUT is subject to the radio frequency exposure requirements specified in FCC Rule § 1.1307(b), 2.1093. It shall be considered to operate in a “general population / uncontrolled” environment.

- [x] Portable unit: EUT was evaluated for Specific Absorption Rate (SAR) evaluation compliance according to OET Bulletin 65, Supplement C (Edition 01-01). It is in compliance with the SAR evaluation requirements. The caution statement is saved as filename: RF exposure info.pdf. A SAR test report was submitted at same time and saved as SAR Report.pdf.
- [] Mobile unit: EUT was evaluated for Maximum Permissible Exposure (MPE) evaluation compliance according to OET Bulletin 65(Edition 97-01). The evaluation calculation results are saved as filename: RF exposure info.pdf.

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4.4 Power of Spurious Emissions (FCC Part 2.1053, 2.1057, 22.917, 24.238)

The radiated spurious emissions are measured from 30MHz up to the 10th harmonic of fundamental emission.

According to 22.917, the power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least $43 + 10\log(P)$ dB, i.e. at or below -13dBm.

Test results:

GSM 850MHz (ARFCN = 190, Channel frequency = 836.6MHz):

Polarization	Frequency (MHz)	Measured ERP (dBm)	Limit ERP (dBm)	Margin (dB)
V	\	\	\	\
H	\	\	\	\

GSM 1900MHz (ARFCN = 661, Channel frequency = 1880.0MHz):

Polarization	Frequency (MHz)	*Measured ERP (dBm)	*Calculated EIRP (dBm)	Limit EIRP (dBm)	Margin (dB)
H	\	\	\	\	\
V	\	\	\	\	\

*EIRP = ERP+2.15dB

Remarks: the magnitudes of spurious emission which are attenuated more than 20 dB below the permissible value are not reported.

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5.0 Equipment List

Equipment	EMI Test Receiver	Spectrum Analyzer	Universal Radio Communication Tester
Registration No.	SZ185-01	SZ056-03	SZ065-1
Manufacturer	R&S	R&S	R&S
Model No.	ESCI	FSP30	CMU200
Calibration Date	Mar 08, 2011	Mar. 08, 2011	13-May-2011
Calibration Due Date	Mar 08, 2012	Mar. 08, 2012	13-May-2012

END OF TEST REPORT

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APPENDIX EXHIBITS OF APPLICATION FOR CERTIFICATION