



# TEST REPORT

No. I23N02005-DFS

for

**Schok LLC.**

**Smartphone**

**Model Name: SV67332**

with

**Hardware Version: Q6703\_V1.0**

**Software Version: SV67Q\_01.01.04**

**FCC ID: 2AM9L-SV67Q**

**Issued Date: 2024-01-25**

**Designation Number: CN1210**

**Note:**

The test results in this test report relate only to the devices specified in this report. This report shall not be reproduced except in full without the written approval of SAICT.

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## **REPORT HISTORY**

| <b>Report Number</b> | <b>Revision</b> | <b>Description</b> | <b>Issue Date</b> |
|----------------------|-----------------|--------------------|-------------------|
| I23N02005-DFS        | Rev.0           | 1st edition        | 2024-01-25        |

Note: the latest revision of the test report supersedes all previous versions.



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## 1. Summary of Test Report

### 1.1. Test Items

|                     |                                 |
|---------------------|---------------------------------|
| Description         | Smartphone                      |
| Model Name          | SV67332                         |
| Applicant's name    | Schok LLC.                      |
| Manufacturer's Name | Great Talent Technology Limited |

### 1.2. Test Standards

FCC Part15-2021; KDB 905462 D02-V02

### 1.3. Test Result

**Pass**

Please refer to 5.2 Test Results.

### 1.4. Testing Location

Address: Building G, Shenzhen International Innovation Center, No.1006 Shennan Road, Futian District, Shenzhen, Guangdong, P. R. China 518000

### 1.5. Project data

|                     |            |
|---------------------|------------|
| Testing Start Date: | 2023-12-11 |
| Testing End Date:   | 2023-12-25 |

### 1.6. Signature

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Lin Kanfeng  
(Prepared this test report)

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An Ran  
(Reviewed this test report)

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Zhang Bojun  
(Approved this test report)



## **2. Client Information**

### **2.1. Applicant Information**

Company Name: Schok LLC.  
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Contact Person Mike Harshbarger  
E-Mail mike.harsh@schokgear.com  
Telephone: +1847-809-3294  
Fax: /

### **2.2. Manufacturer Information**

Company Name: Great Talent Technology Limited  
Address: 35F, HBC HuiLong Center Building-II Minzhi Street, Longhua,  
Shenzhen, P.R. China  
Contact Person Chunli He  
E-Mail hchunli@unimaxcomm.com  
Telephone: 0755-86638990  
Fax: /



### 3. Equipment Under Test (EUT) and Ancillary Equipment(AE)

#### 3.1. About EUT

|                       |  |
|-----------------------|--|
| Description           | Smartphone   |
| Model name            | SV67332  |
| WLAN Frequency Range  | ISM Band: 5250MHz~5350MHz;<br>5470MHz~5725MHz  |
| WLAN Protocol         | IEEE 802.11a, 802.11n-HT20/40, 802.11ac-VHT20/40/80  |
| Type of modulation    | OFDM   |
| Antenna               | Integrated   |
| Antenna Gain          | 5150MHz~5250MHz: -0.14dBi; 5250MHz~5350MHz: 1.10dBi;<br>5470MHz~5725MHz: 1.75 dBi; 5725MHz~5850MHz: 1.13 dBi |
| Power Supply          | 3.85V DC by Battery  |
| FCC ID                | 2AM9L-SV67Q  |
| Device Type (DFS)     | Client without radar detection (only support client mode)  |
| TPC feature available | No   |

Condition of EUT as received No abnormality in appearance

Note: Components list, please refer to documents of the manufacturer; it is also included in the original test record of Shenzhen Academy of Information and Communications Technology.

#### 3.2. Internal Identification of EUT

| EUT ID* | SN or IMEI      | HW Version | SW Version     | Date of Receipt |
|---------|-----------------|------------|----------------|-----------------|
| UT03aa  | 359341730782344 | Q6703_V1.0 | SV67Q_01.01.04 | 2023-12-06      |

\*EUT ID: is used to identify the test sample in the lab internally.

#### 3.3. Internal Identification of AE

| AE No. | Description | AE ID* |
|--------|-------------|--------|
| AE1    | Battery     | /      |
| AE2    | Charger     | /      |
| AE3    | Data Cable  | /      |

\*AE ID: is used to identify the test sample in the lab internally.

#### 3.4. General Description

The Equipment under Test (EUT) is a model of Smartphone with integrated antenna and battery. It consists of normal options: Lithium Battery and Charger. Manual and specifications of the EUT were provided to fulfil the test. Samples undergoing test were selected by the client.



## **4. Reference Documents**

### **4.1. Documents supplied by applicant**

EUT feature information is supplied by the applicant or manufacturer, which is the basis of testing.

### **4.2. Reference Documents for testing**

The following documents listed in this section are referred for testing.

| <b>Reference</b> | <b>Title</b>   | <b>Version</b> |
|------------------|--|----------------|
| FCC Part15       | Title 47 of the Code of Federal Regulations; Chapter I<br>Part 15 - Radio frequency devices<br>Subpart E - UNII Devices  | 2021           |
| KDB 905462 D02   | Compliance Measurement Procedures for<br>Unlicensed-national Information Infrastructure Devices<br>Operating in the 5250-5350 MHz and 5470-5725 MHz<br>Bands Incorporating Dynamic Frequency Selection | V02            |

Note: This report is only for DFS.



## 5. Test Results

### 5.1. Testing Environment

Normal Temperature: 15~35°C

Relative Humidity: 20~75%

### 5.2. Test Results

| No | Test cases  | Sub-clause of Part15E | Verdict  |
|----|---|-----------------------|----------|
| 1  | Channel move time and channel closing transmission time | 15.407 (h)(2)(iii)    | <b>P</b> |
| 2  | Non-Occupancy Period                                    | 15.407 (h)(2) (iv)    | <b>P</b> |

Please refer to **ANNEX A** for detail.

### 5.3. Statements

SAICT has evaluated the test cases requested by the applicant/manufacturer as listed in section 5.2 of this report, for the EUT specified in section 3, according to the standards or reference documents listed in section 4.2.

This report only deals with the UNII DFS functions among the features described in section 3, and The EUT met all requirements of the reference documents.

The end user is not available to get and modify the parameters of the detected Radar Waveforms in this product.

Disclaimer:

A. After confirmation with the customer, the sample information provided by the customer may affect the validity of the measurement results in this report, and the impact and consequences arising therefrom shall be borne by the customer.

B. The samples in this report are provided by the customer, and the test results are only applicable to the samples received.



## 6. Test Equipments Utilized

### Conducted test system

| No. | Equipment              | Model      | Serial Number     | Manufacturer    | Calibration Due date | Calibration Period |
|-----|------------------------|------------|-------------------|-----------------|----------------------|--------------------|
| 1   | Vector Signal Analyzer | FSV40      | 100903            | Rohde & Schwarz | 2023-12-28           | 1 year             |
| 2   | Vector Signal General  | SMU200A    | 104096            | Rohde & Schwarz | 2023-12-28           | 1 year             |
| 3   | Shielding Room         | S81        | CT0009<br>86-1344 | ETS-Lindgren    | 2026-09-12           | 5 years            |
| No. | Equipment              | Model      | FCC ID            | Manufacturer    | Calibration Due date | Calibration Period |
| 4   | Master AP              | RT-AC9600R | MSQ-R<br>TG03H    | ASUS            | /                    | /                  |

## 7. Laboratory Environment

Measurement is performed in shielding room.

### Shielded room

|                          |  |
|--------------------------|--|
| Temperature              | Min. = 15 °C, Max. = 35 °C                                 |
| Relative humidity        | Min. = 20 %, Max. = 75 %                                   |
| Shielding effectiveness  | 0.014 MHz - 1 MHz, > 60 dB;<br>1 MHz - 18000 MHz, > 90 dB. |
| Electrical insulation    | > 2 M $\Omega$   |
| Ground system resistance | < 4 $\Omega$   |

## **ANNEX A: MEASUREMENT RESULTS**

### **A.1. Parameters of DFS test signal**

1). Interference threshold values, master or client incorporation in service monitoring. For device Power less than 23 dBm (E.I.R.P.), the threshold level is -62 dBm at the antenna port after Correction for antenna gain and procedural adjustments.

Because of conducted measurement performed, the calibration power from radar signal generator to antenna port of DFS test equipment is -62 dBm.

| <b>Maximum Transmit Power</b> | <b>Value</b> |
|-------------------------------|--------------|
| > 200 mW                      | -64 dBm      |
| < 200 mW                      | -62 dBm      |

2). DFS requirement values

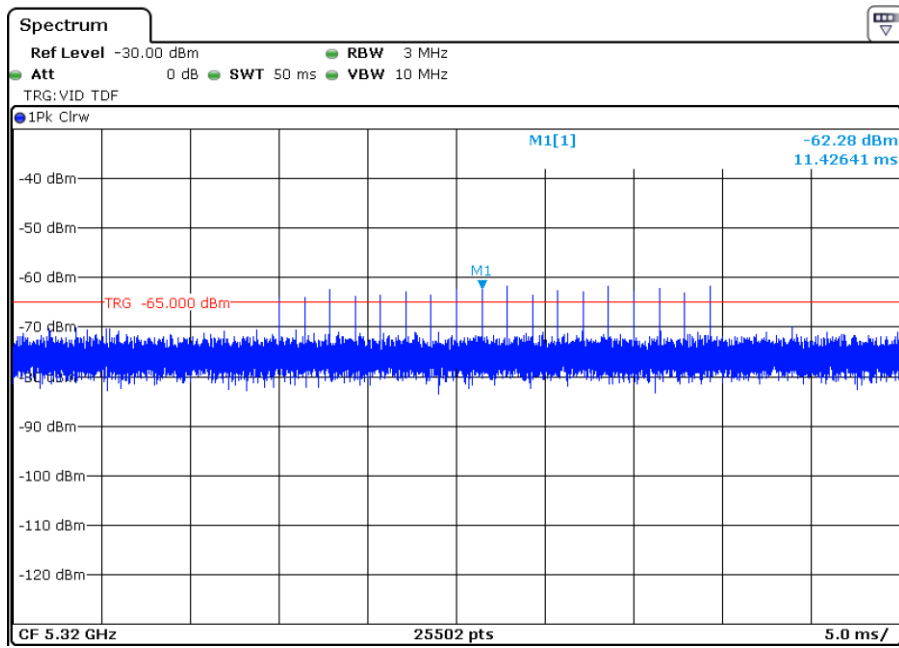
The required values are as the following table.

| <b>Parameter</b>                  | <b>Value</b>  |
|-----------------------------------|---|
| Non-occupancy                     | > 1800 s  |
| Channel Availability Check Time   | 60 s  |
| Channel Move Time                 | 10 s  |
| Channel Closing Transmission Time | 200 ms + 60 ms                                      |
| U-NII Detection Bandwidth         | Minimum 80% of the 99% transmission power bandwidth |

As the EUT is IP based system, the MPEG video file from NTIA website is used to stream to EUT via the Master device.

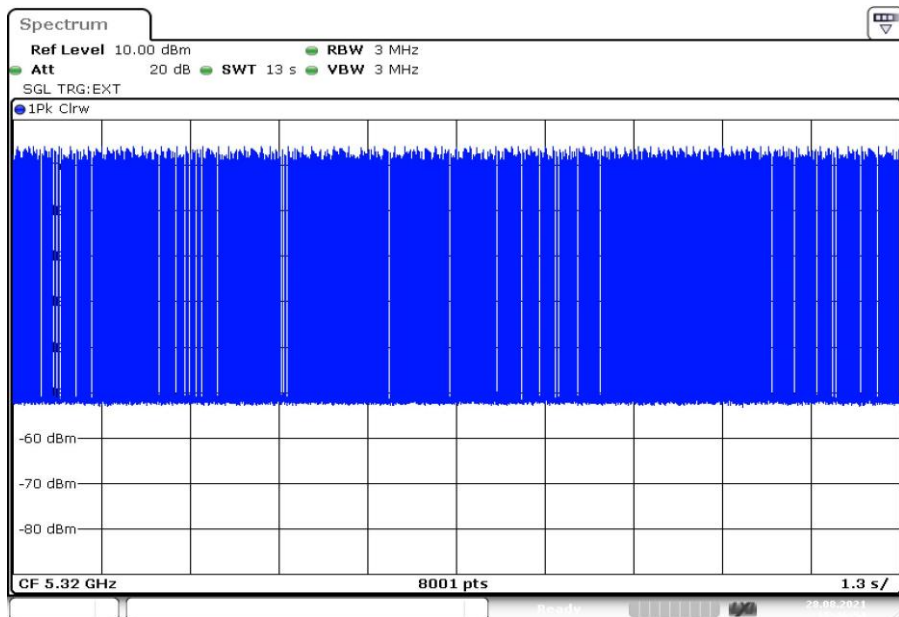
3). Radar waveform

| <b>Pulse width W (μs)</b> | <b>Pulse repetition frequency PRF (PPS)</b> | <b>Pulses per burst (PPB)</b> |
|---------------------------|---|-------------------------------|
| 1                         | 700   | 18                            |



**Radar Signal (Type 0)**

4). Channel Loading



**Channel load timing plot**

The level of traffic loading on the channel by EUT is > 17%.

5). IP Based Systems

The channel loading data file will be transferred from the Master Device to the Client Device for all test configurations.

## A.2. Channel move time and channel closing transmission time

### Measurement Limit:

| Test Items                        | Limit            |
|-----------------------------------|------------------|
| Channel closing transmission time | < 200 ms + 60 ms |
| Channel move time                 | < 10 s           |

### Measurement Results:

| Mode           | Channel         | Test Results | Conclusion |
|----------------|-----------------|--------------|------------|
| 802.11a        | 5320MHz (CH64)  | Fig.1        | P          |
| 802.11ac-VHT80 | 5530MHz (CH106) | Fig.2        | P          |

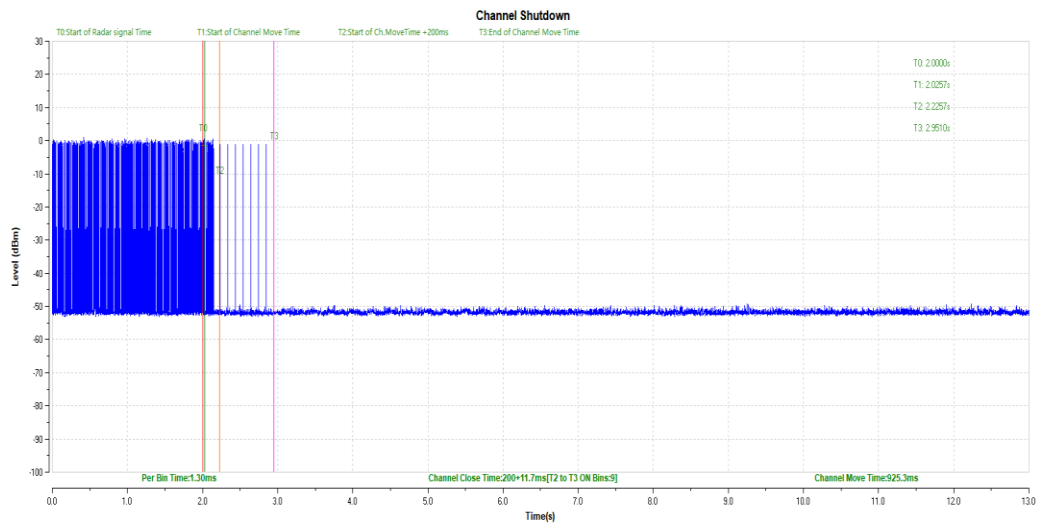


Fig.1 Channel Shutdown (HT20 Frequency Band: 5250MHz ~ 5350MHz)

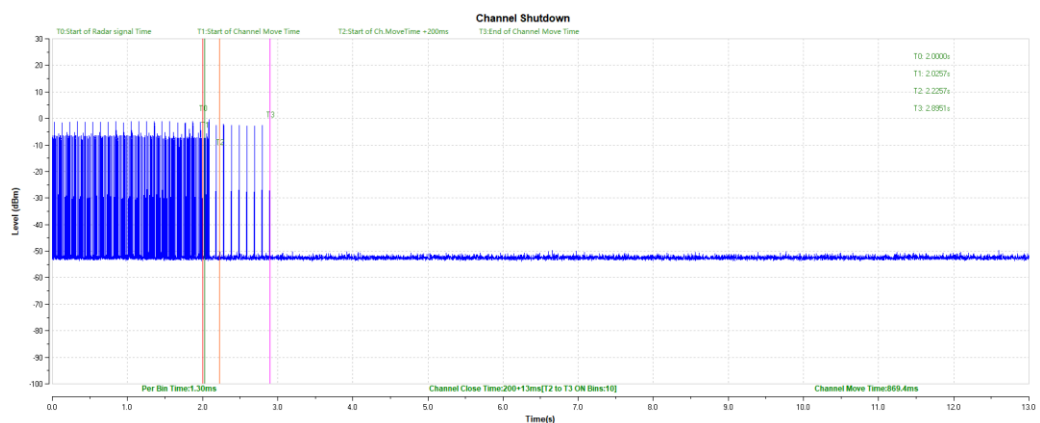


Fig.2 Channel Shutdown (VHT80 Frequency Band: 5470MHz ~ 5725MHz)

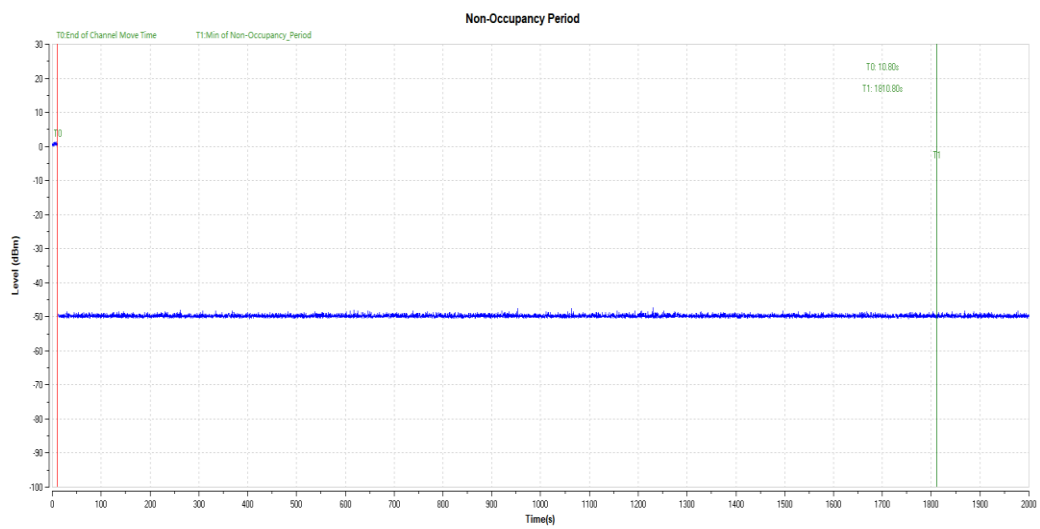
### A.3. Non-Occupancy Period

**Measurement Limit:**

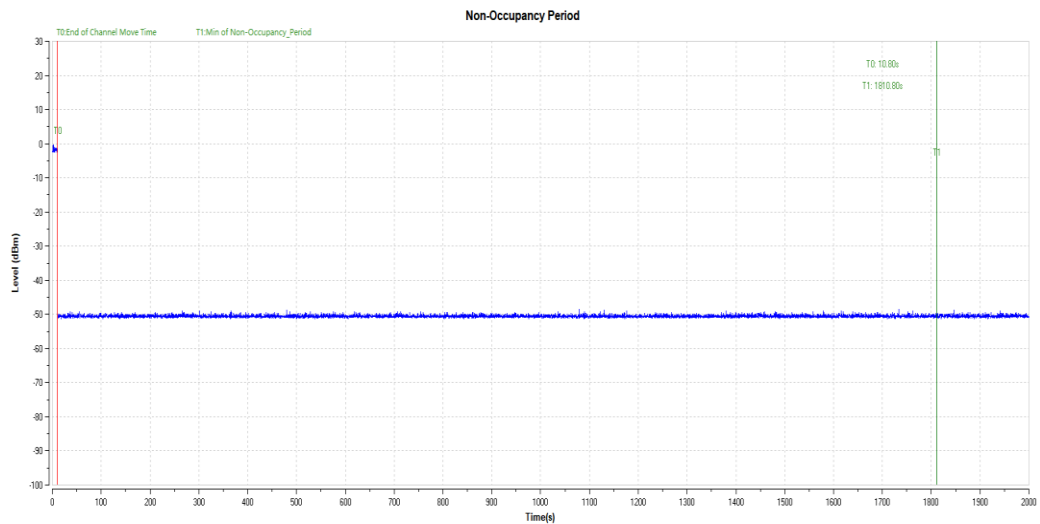
| Test Items           | Limit    |
|----------------------|----------|
| Non-Occupancy Period | > 1800 s |

**Measurement Results:**

| Mode           | Channel         | Test Results | Conclusion |
|----------------|-----------------|--------------|------------|
| 802.11a        | 5320MHz (CH64)  | Fig.3        | P          |
| 802.11ac-VHT80 | 5530MHz (CH106) | Fig.4        | P          |



**Fig.3 Non-Occupancy Period (HT20 Frequency Band: 5250MHz ~ 5350MHz)**

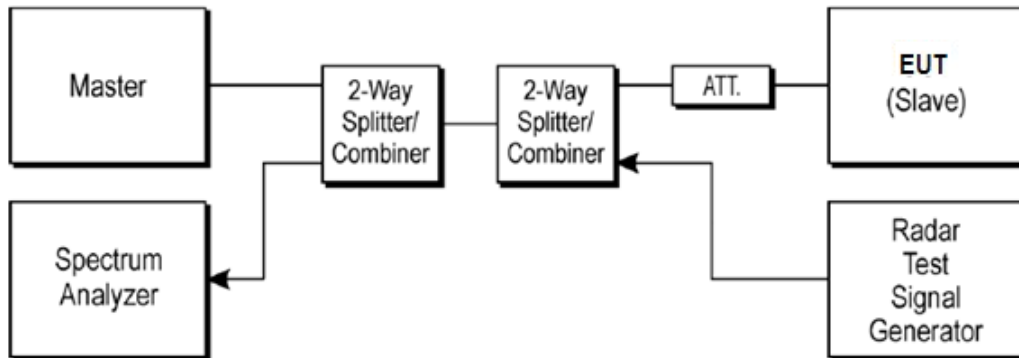


**Fig.4 Non-Occupancy Period (VHT80 Frequency Band: 5470MHz ~ 5725MHz)**

## **ANNEX B: DFS TEST SET-UP**

### **Measurement Method**

The below figure shows the DFS setup, where the EUT is a WLAN device operating in slave mode, without Radar Interference Detection function. This setup also contains a device operating in master mode. The radar test signals are injected into the master device. The EUT (slave device) is associated with the master device. WLAN traffic is generated by streaming the mpeg file from the master to the slave in full monitor video mode using the media player.



\*\*\* END OF REPORT \*\*\*