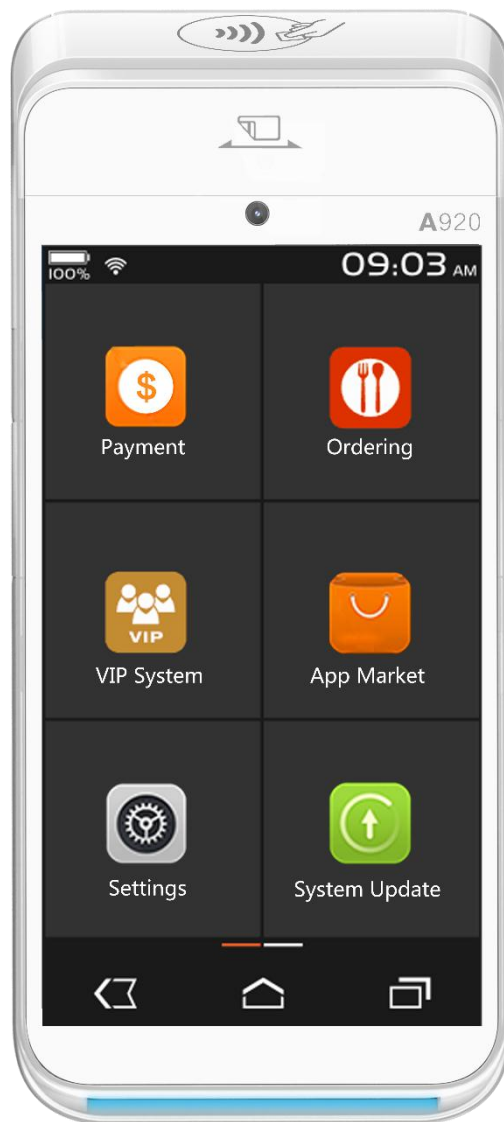




## Android Factory Testing App Operation Guide

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## Android Factory Testing App

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## I. Testing preparation

### 1.1 Purpose

Android testing app is inbuilt on Android terminal and will be updated at the same time if Android OS is updated, maintenance engineers can test hardware modules after terminals are repaired by Android testing app.

### 1.2 Hardware device preparation

Please prepare for the following hardware devices in advance when you are ready to test some different modules.

| Number | Hardware                  | Quantity     | Instruction           |
|--------|---------------------------|--------------|-----------------------|
| 1.     | PC                        | 1pcs         |                       |
| 2.     | Android America handset   | 1pcs         |                       |
| 3.     | RF card                   | 1 set        | PAX A/B/M/felica card |
| 4.     | TF card                   | 1pcs         |                       |
| 5.     | SIM card                  | 1pcs or more |                       |
| 6.     | USB mouse                 | 1pcs         |                       |
| 7.     | Wireless router           | 1pcs         |                       |
| 8.     | Visible booth device      | 1pcs         |                       |
| 9.     | USB-HOST device           | 1pcs         |                       |
| 10.    | Micro USB to Type A cable | 1pcs         | U-disking test        |
| 11.    | LAN device                | 1pcs         |                       |
| 12.    | SP20 serial cable         | 1pcs         | Test LAN              |
| 13.    | POS router                | 1pcs         |                       |
| 14.    | PAX magnetic card         | 1 pcs        |                       |
| 15.    | SP20V4                    | 1pcs         | Test LAN              |
| 16.    | S8o                       | 1pcs         | Test LAN              |

## II. Testing operation

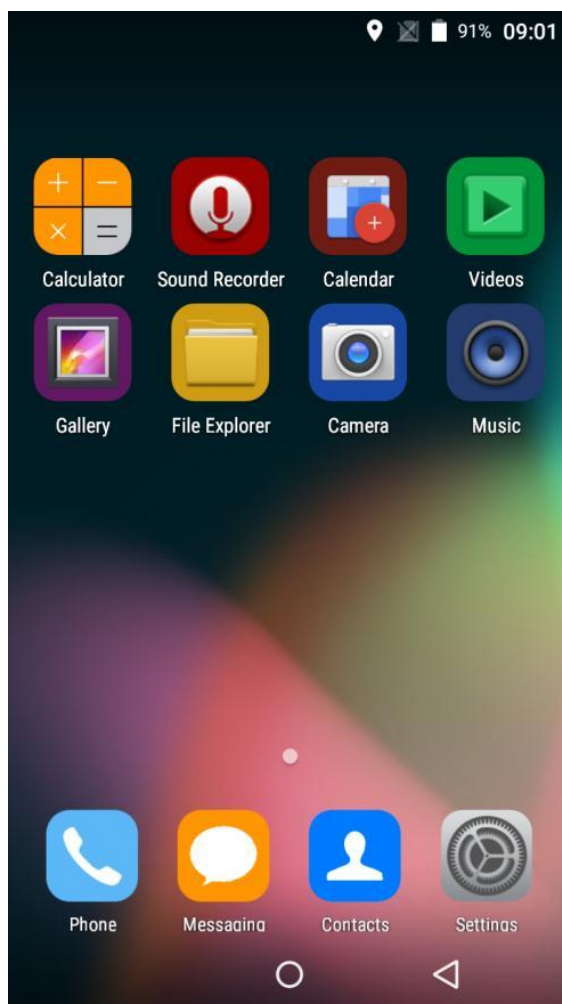
### 1. Application entry

**Step one:** Please find the calculator at first. Engineers should operate the following actions if the Android terminals has been installed merchants application.

#### Operations:

- Firstly, please press left volume key for four times
- Secondly, please press right volume key for four times.
- Then, please press left volume key for one time.
- Lastly, please press right volume key for one time.

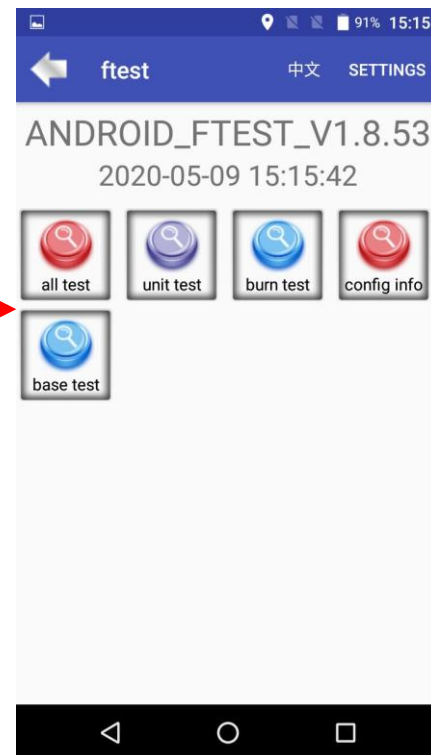
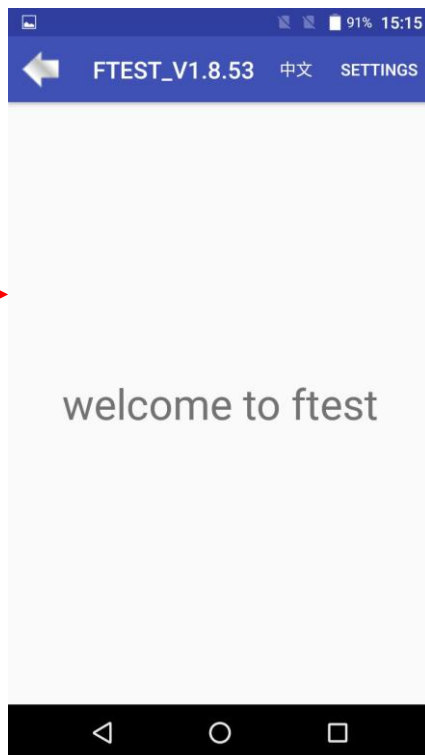
The calculator would be shown on the interface.



Picture one

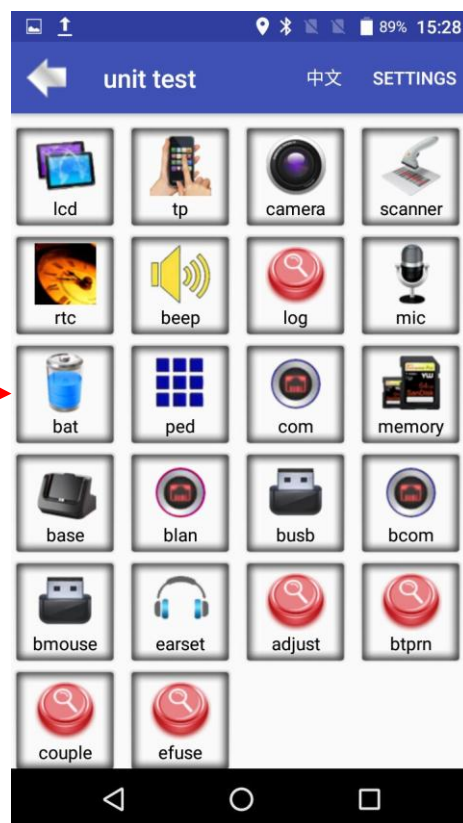
**Step two:** Please input “!4444=” from calculator and enter into Android factory testing app.

!4444



Picture two

Please enter into “Unit test” to test different hardware modules.



Picture three

Please choose “Base test” if you want to test Android terminal base.

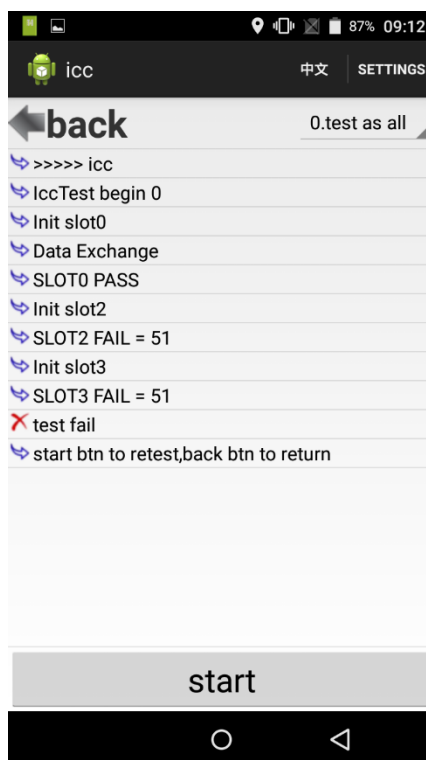


Picture four

## 2. Unit test

### 2.1 ICC card reader

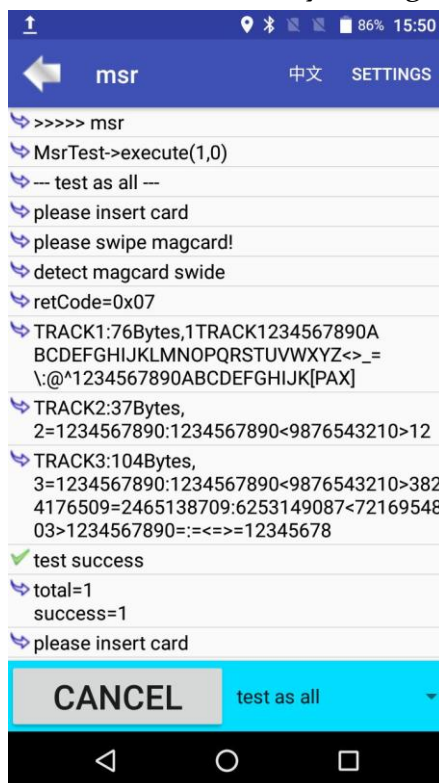
Please insert IC card and the SLOT o would be shown “PASS” which means that IC card function is well.



Picture five

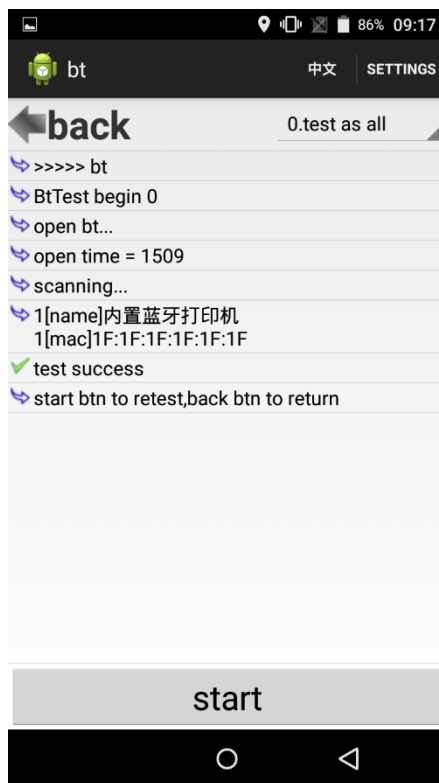
## 2.2 MSR

Please swipe magnetic head from the top head of the front housing or insert from the bottom part. Please use PAX factory testing cards to test.



Picture six

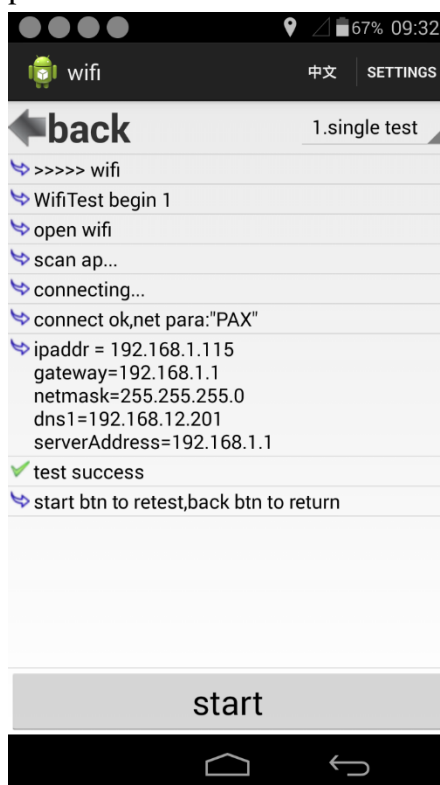
## 2.3 BT



Picture seven

## 2.4 WIFI

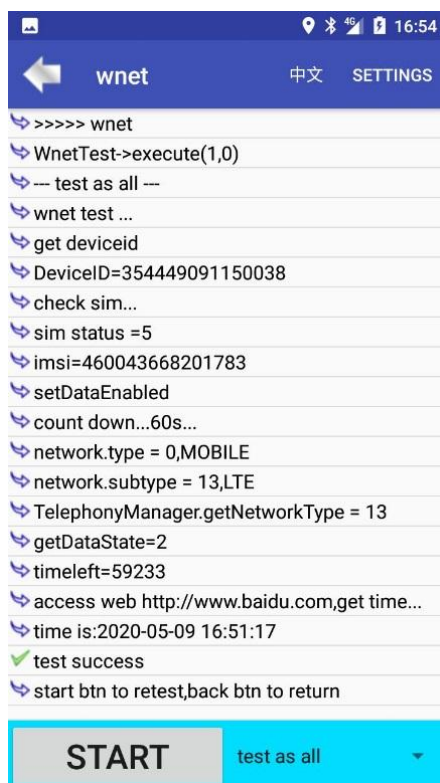
Please connect local hotspot to do the WIFI test.



Picture eight

## 2.5 WNET

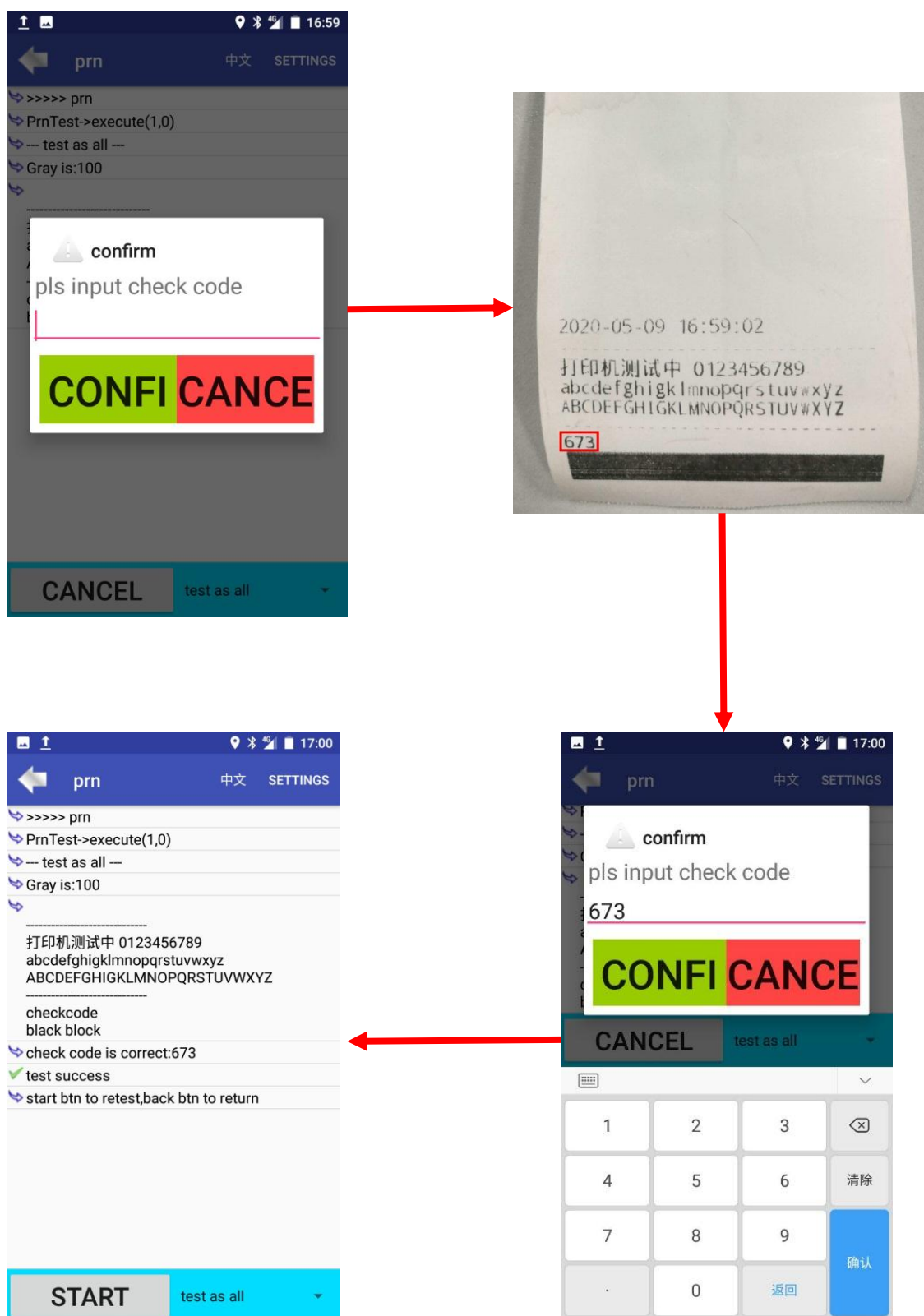
Please insert SIM card to test.



Picture nine

## 2.6 Printer

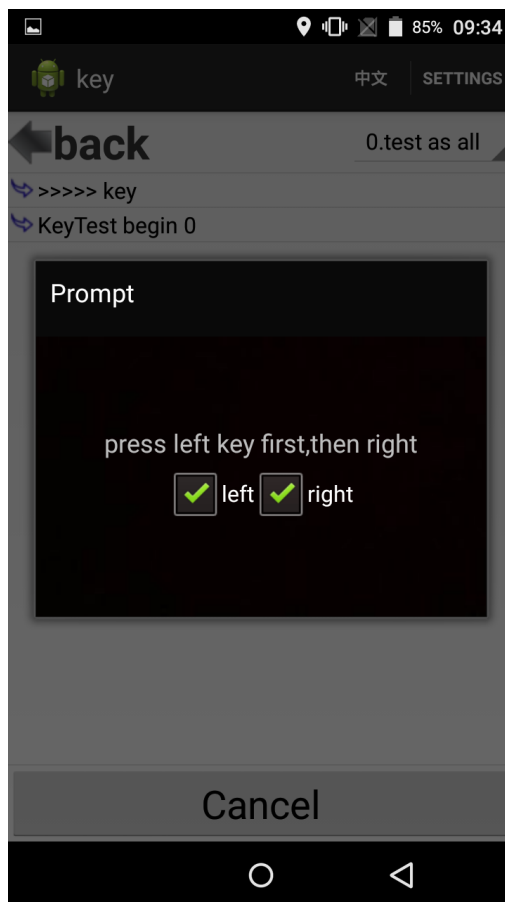
Please install thermal paper at first and check the code on the paper when it is printed out.



Picture ten

## 2.7 Key

Please click left firstly and then right secondly.



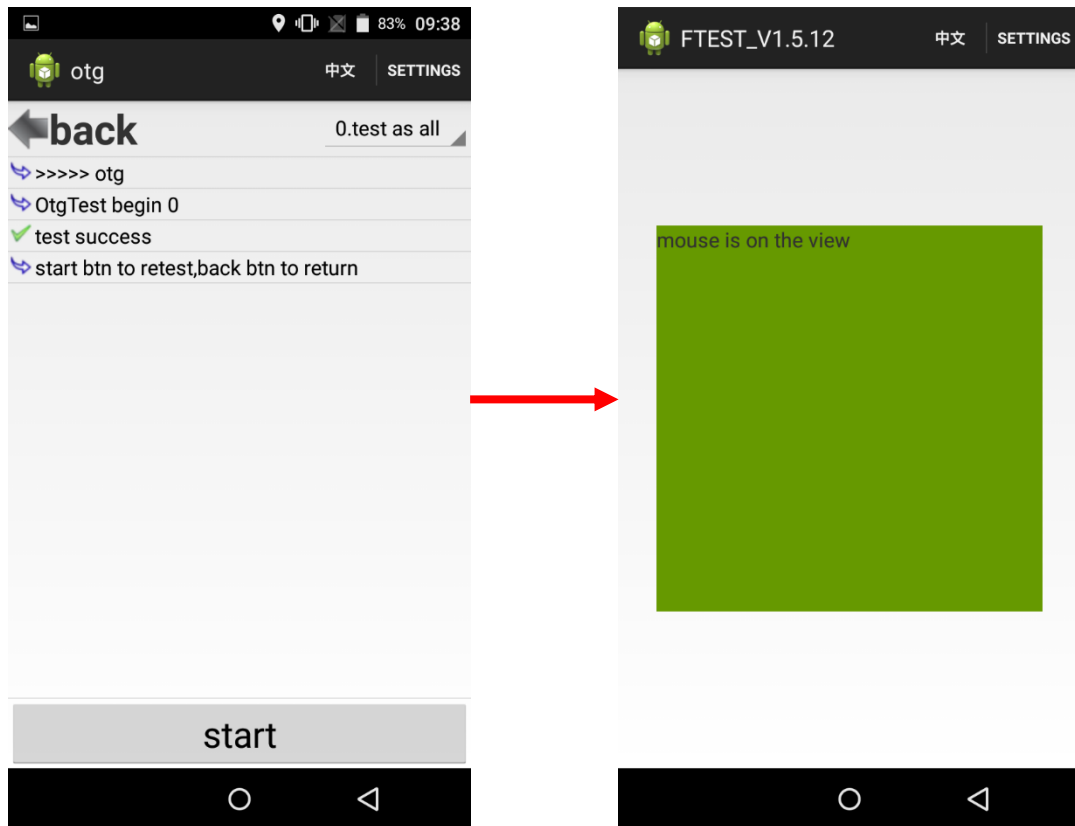
Picture eleven

## 2.8 Mouse

Please insert U-disk downloading cable to insert terminal Micro-USB port, and type A port connects mouse, Please drag arrow into the green zone after logging in Mouse test.



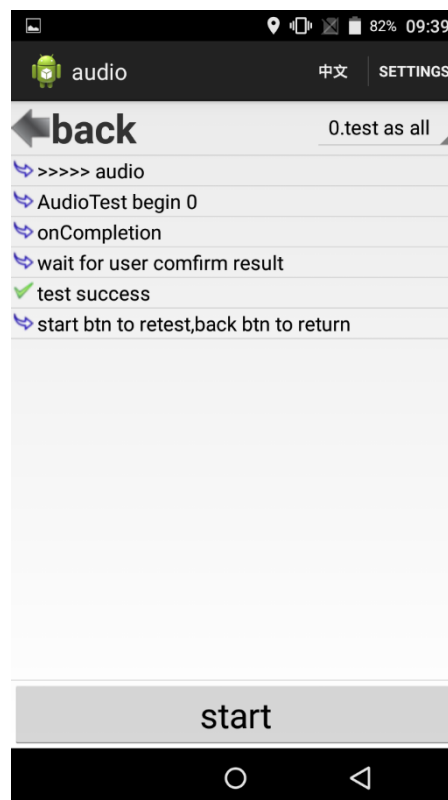
Picture twelve



Picture thirteen

## 2.9 Audio

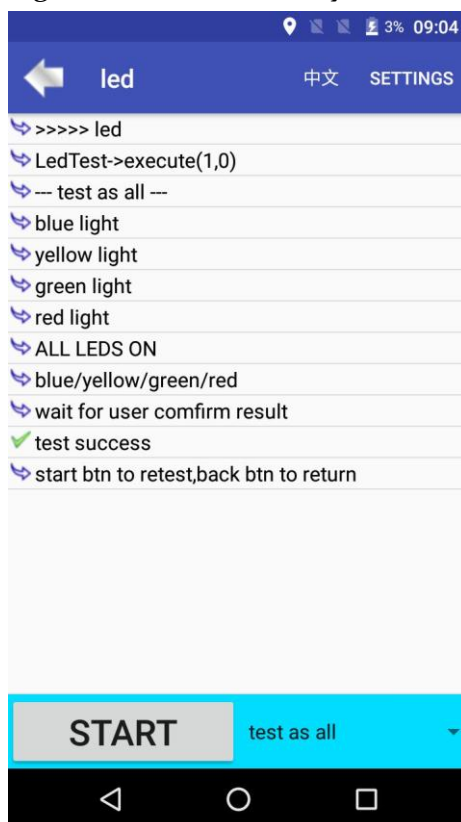
Terminals would automatically play some part audio after logging in and test the result.



Picture fourteen

## 2.10 LED

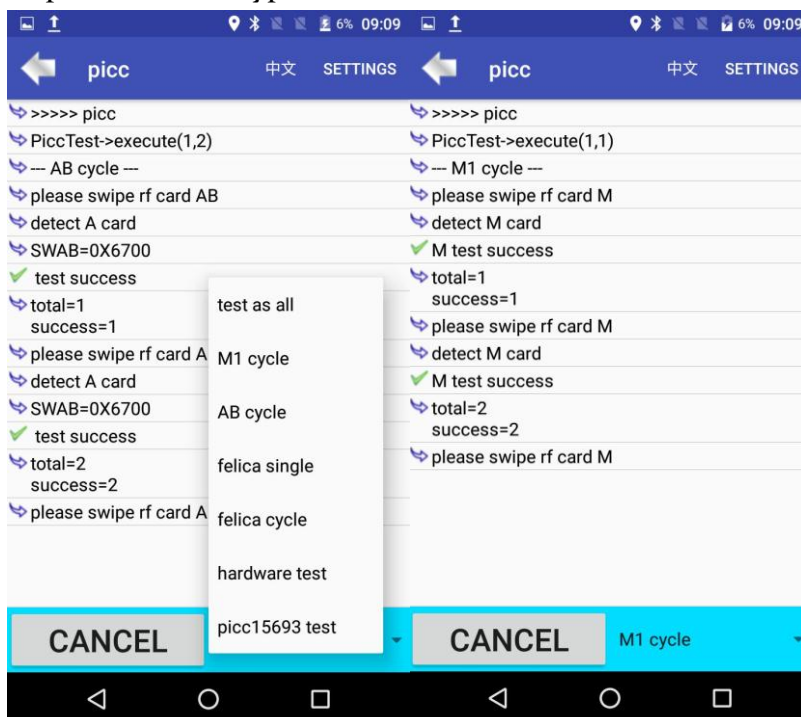
Blue/yellow/green/red light will turn on one by one.



Picture fifteen

## 2.11 Picc

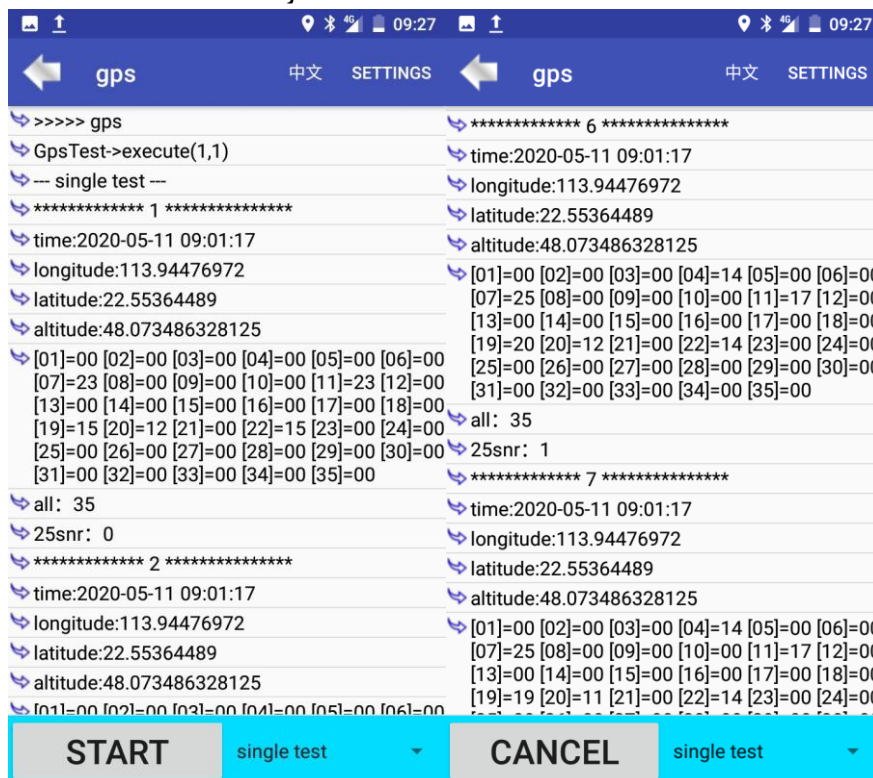
Picc can help test RF card type A/B/M/Felica card.



Picture sixteen

## 2.12 GPS

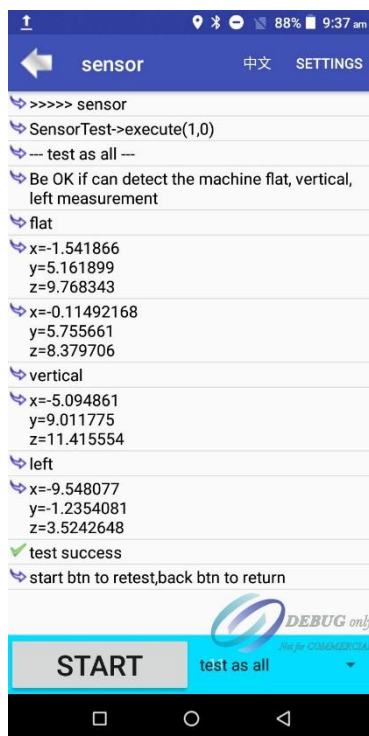
Please choose “single test” and will see the longitude, latitude, altitude messages which will be shown unlimitedly.



Picture seventeen

## 2.13 Sensor

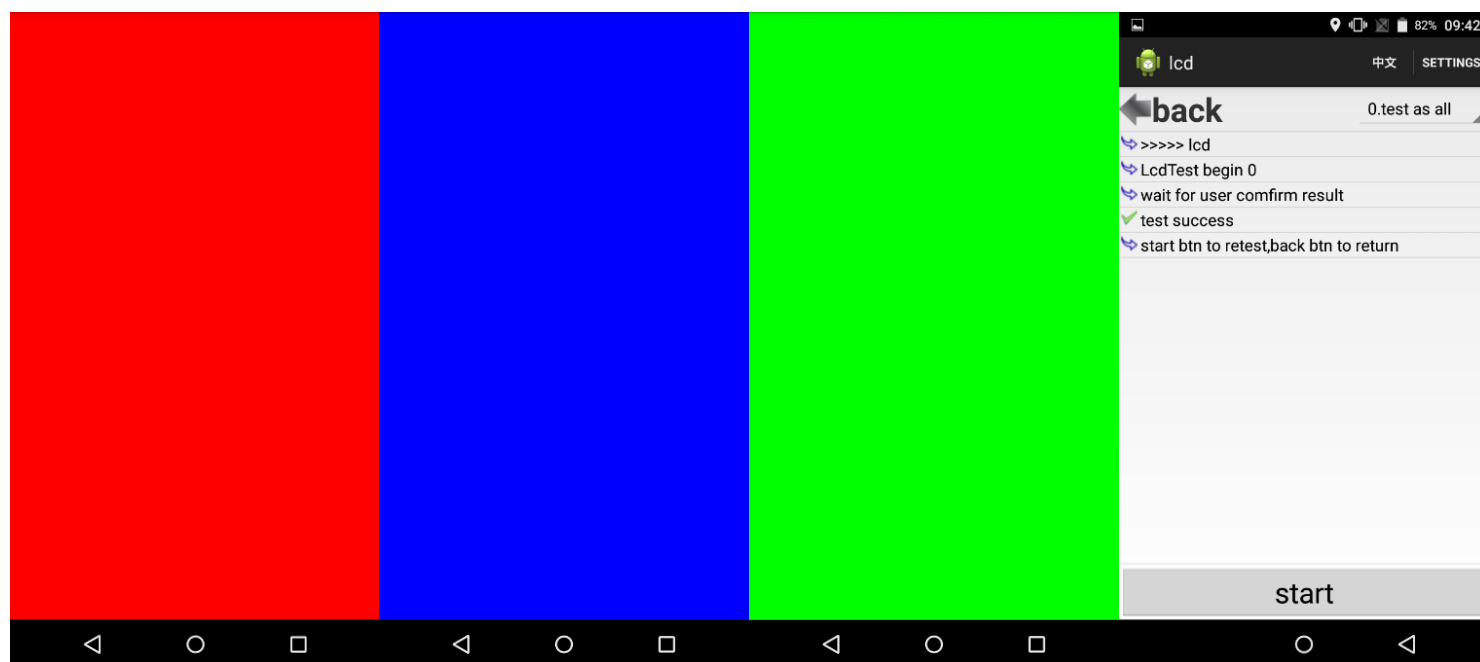
Sensor is used to test whether terminals can be put horizontally, vertically and uprightly.



Picture eighteen

## 2.14 LCD

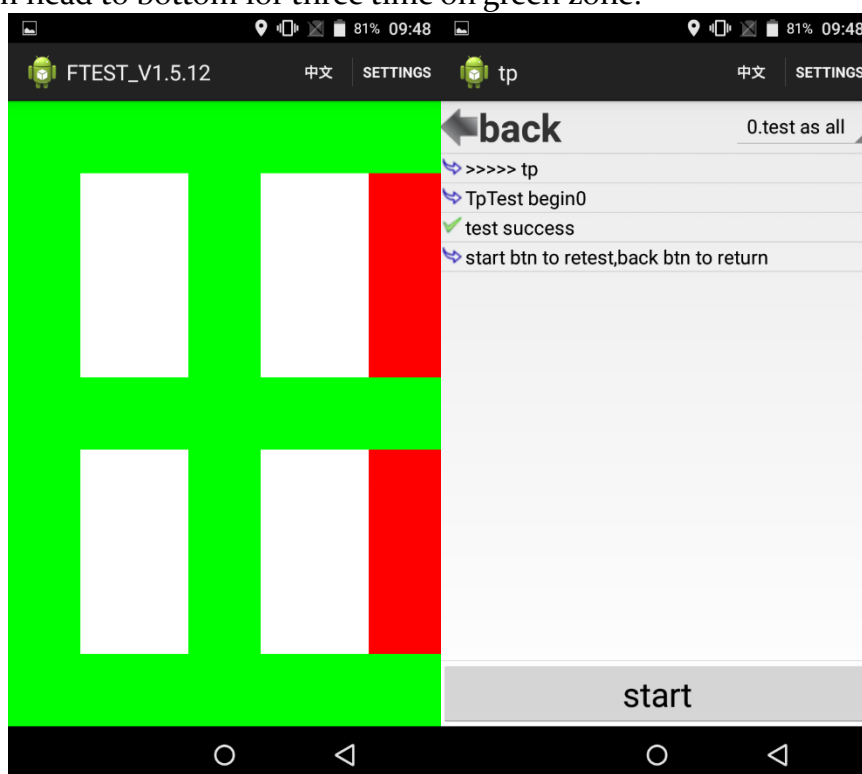
LCD function is judged whether the screen would show red, blue and green.



Picture nineteen

## 2.15 TP

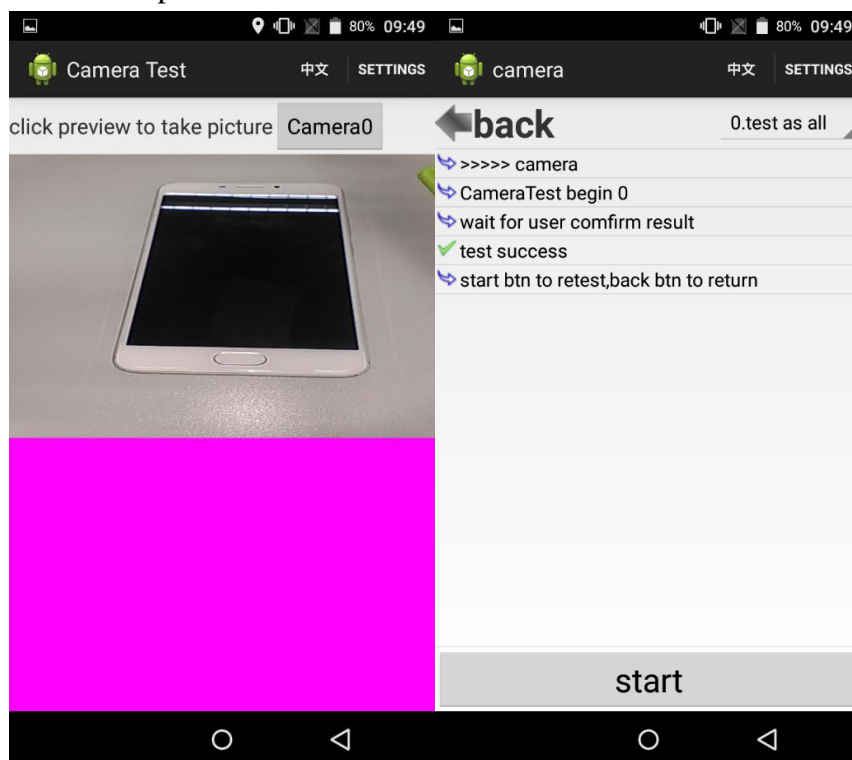
Please touch the screen from left to right on the green zone for three times and then from head to bottom for three time on green zone.



Picture twenty

### 2.16 Camera

Please click “Camera 0” and “Camera 1” to change the camera function and see if terminals can take photo.



Picture twenty-one

### 2.17 Scanner

Please use PAX special-designed code to scan.



0012345678950PAXSZ

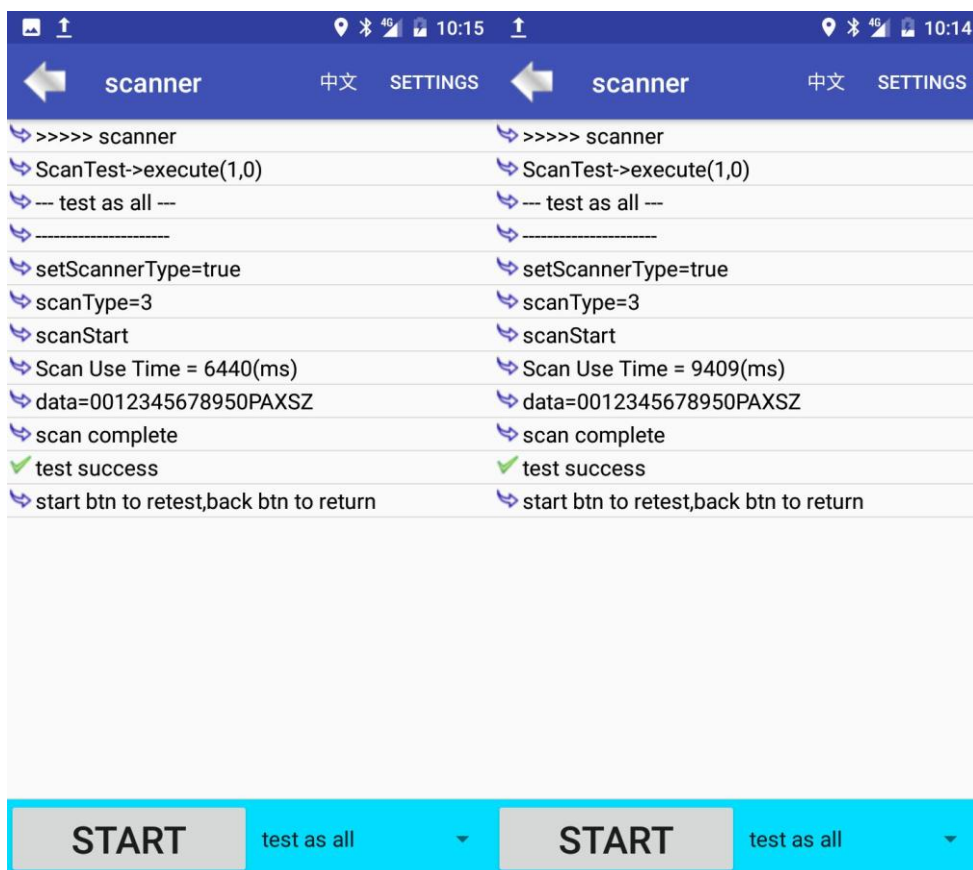
Code 128 15mil



0012345678950PAXSZ

QR Code 40mil

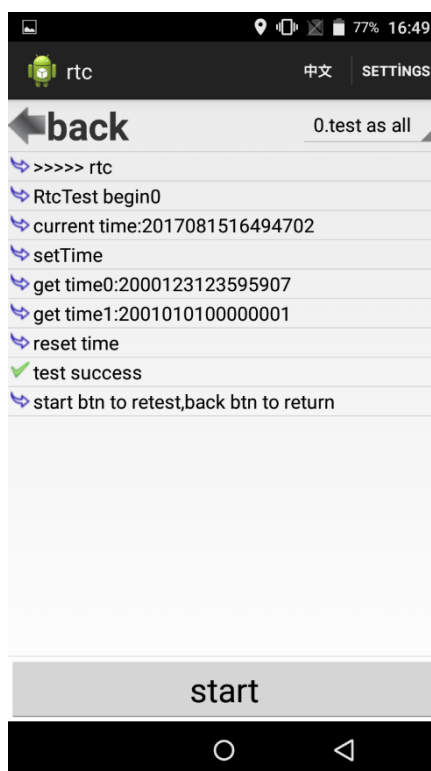
Picture twenty-two



Picture twenty-three

## 2.18 RTC

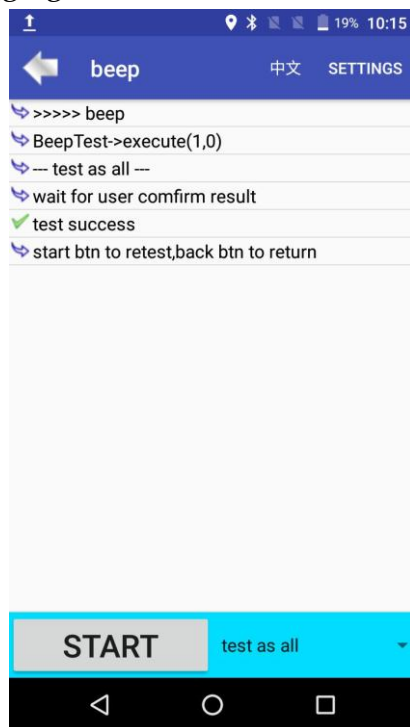
RTC is used to test whether terminals can read out time or not.



Picture twenty-four

## 2.19 Beep

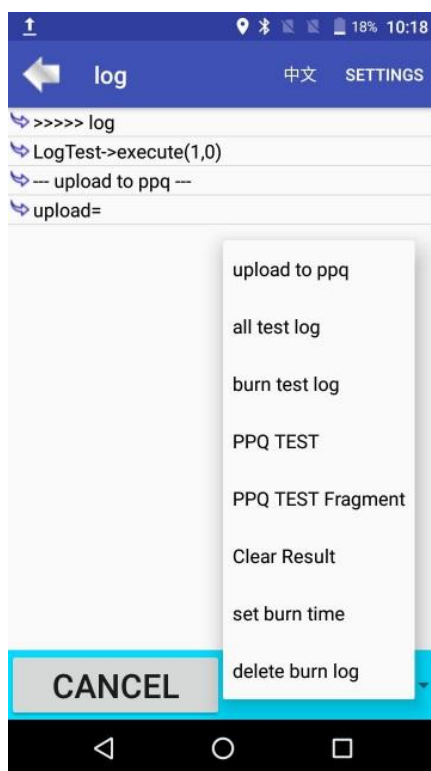
Buzzer is used to test different frequency voices and engineers would hear the different sound after logging in this item.



Picture twenty-five

## 2.20 Log

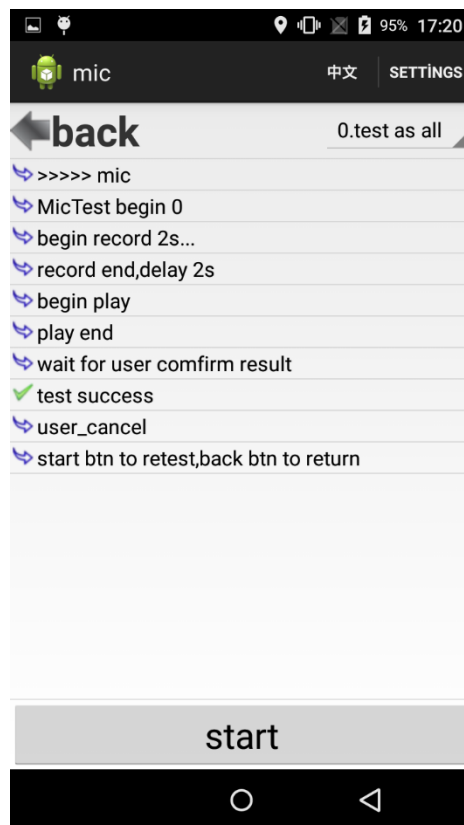
All different log files can be uploaded into terminals to refer to.



Picture twenty-six

## 2.21 MIC

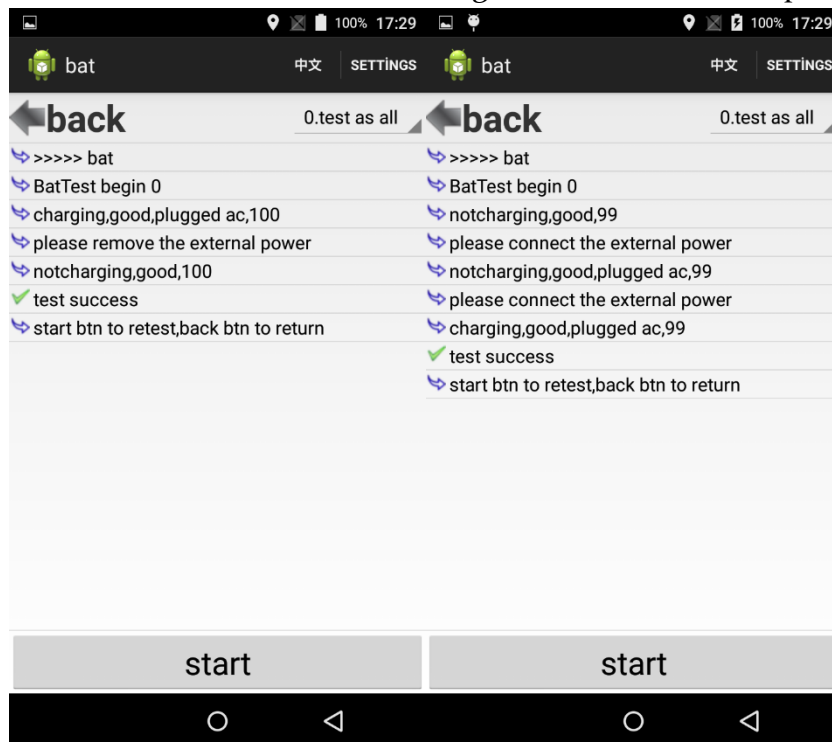
The Microphone is used to test whether terminals can record voices or not.



Picture twenty-seven

## 2.22BAT

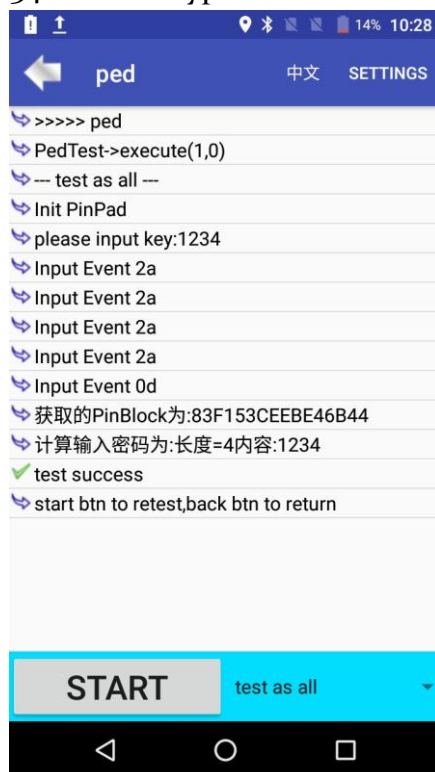
Battery is used to test whether it can be charged, removed external power.



Picture twenty-eight

## 2.23 PED

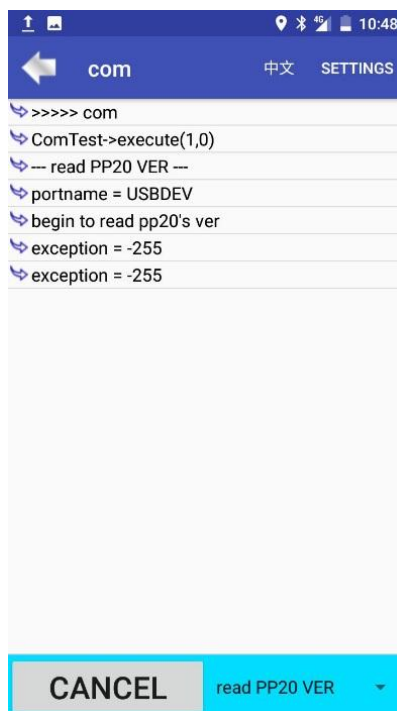
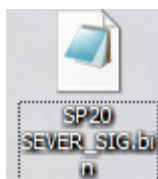
Please input password "1234" to test keypad function.



Picture twenty-nine

## 2.24 COM

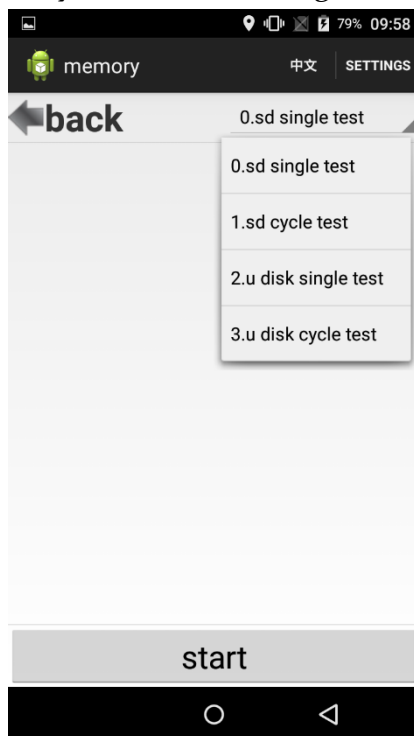
Please download the following app into SP2oV4 and test COM, then use serial cable to connect RJ45 and SP2o.



Picture thirty

## 2.25 Memory

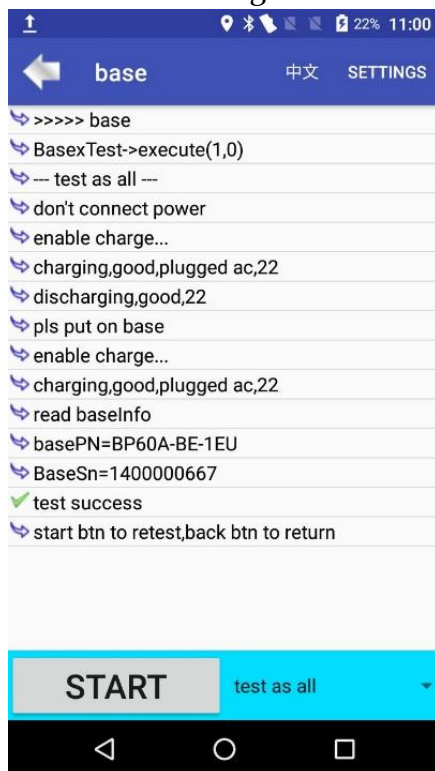
Memory is used to test memory function, engineers can select this four items including sd single test, sd cycle test, u disk single test and u disk cycle test.



Picture thirty-one

## 2.25Base

Please put terminals onto base to test charge.



Picture thirty-two

### 2.26 LAN

You can use TestSock to test LAN function if terminal has only one LAN port.



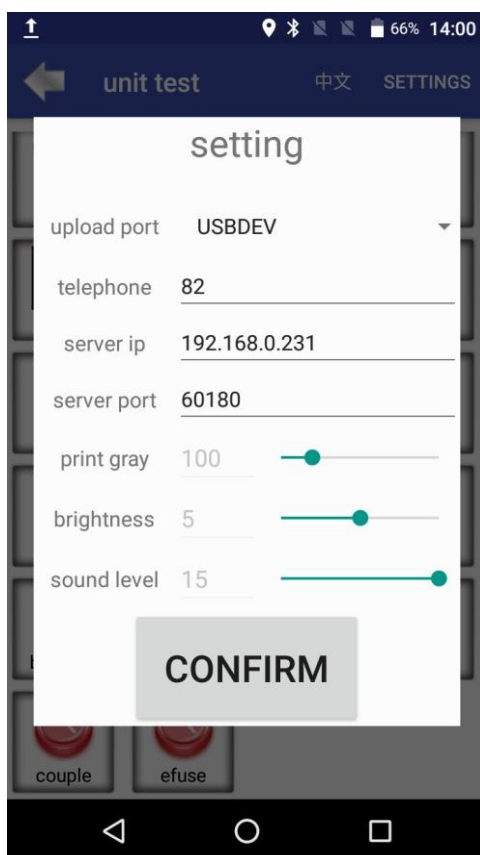
Picture thirty-three

Or please download the following app into S80 which can work as LAN server.



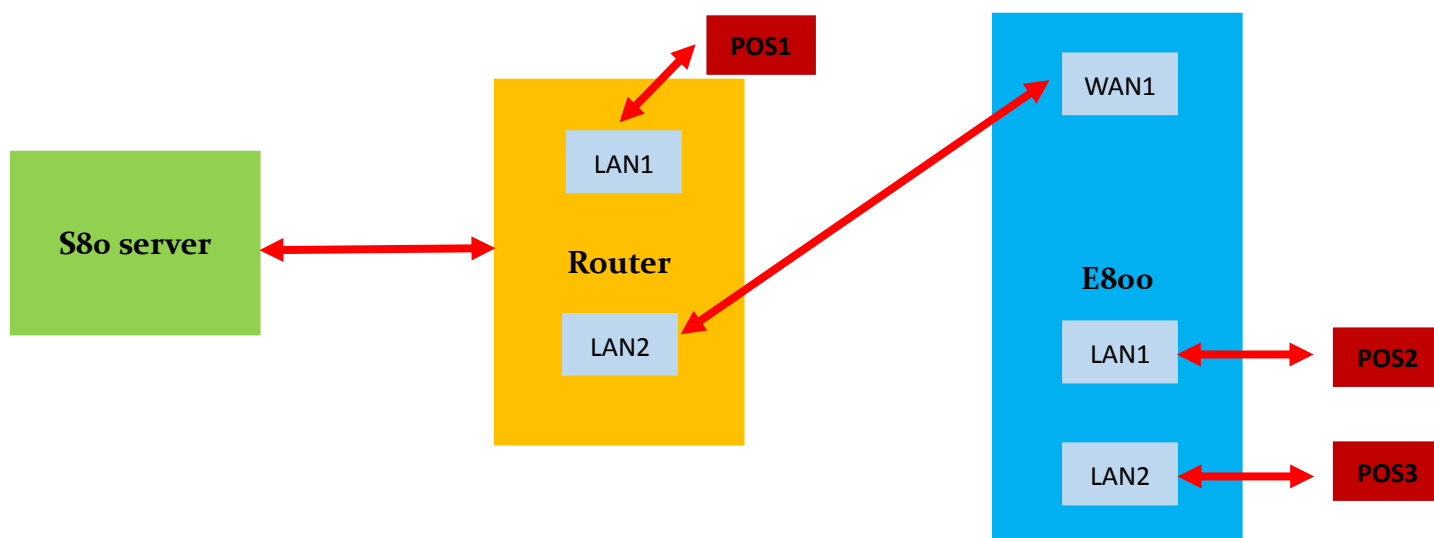
Picture thirty-four

By the way, please note that IP server is in default on setting and you can change it based on your own needs.



Picture thirty-five

E800 LAN testing diagram:



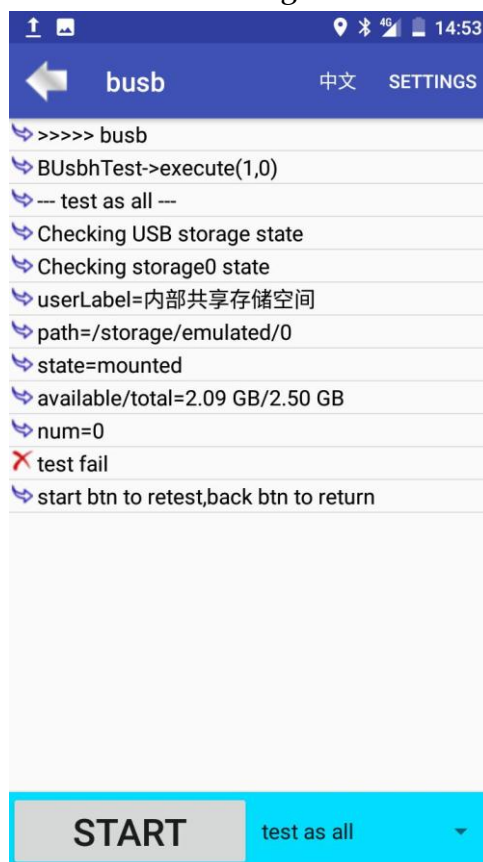
Picture thirteen-six

## 2.27 blan

BLAN testing is used to base LAN function after it is put together with terminals and testing methods are the same as LAN.

## 2.28 busb

Busb testing method is used to test USB storage state.



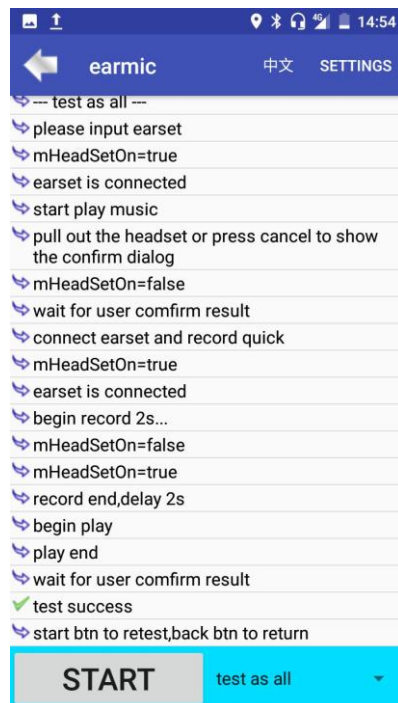
Picture thirteen-seven

## 2.29 bcom

Bcom testing method is the same as COM testing method.

## 2.30 Earmic

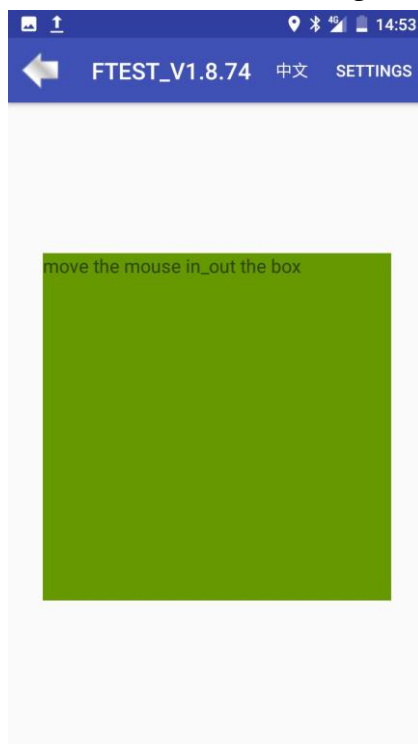
Earmic is used to test earset function.



Picture thirteen-eight

## 2.31 bmouse

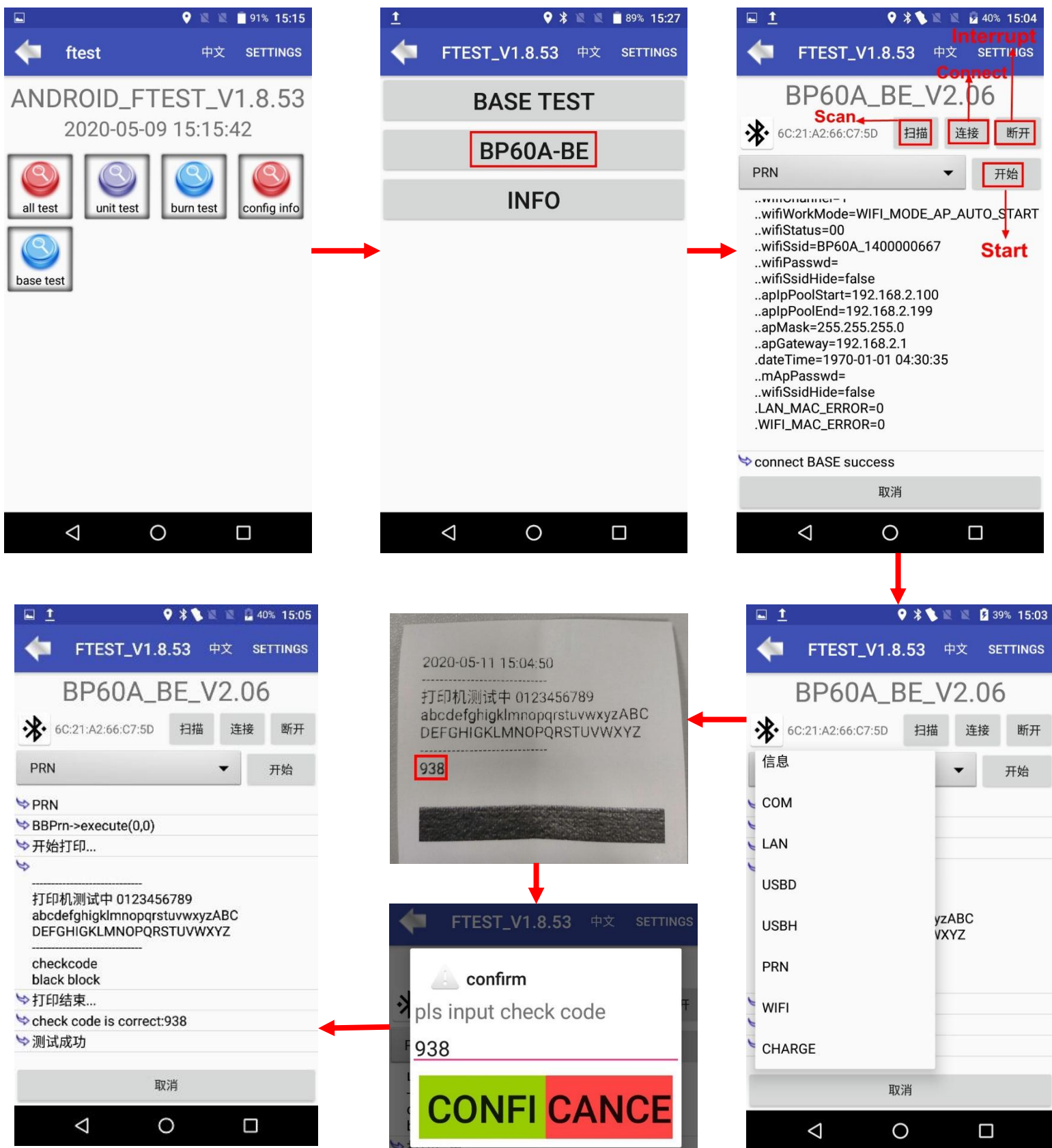
Bmouse testing method is the same as Mouse testing method.



Picture thirteen-nine

## 2.32 BTprint(Take A60 as an example)

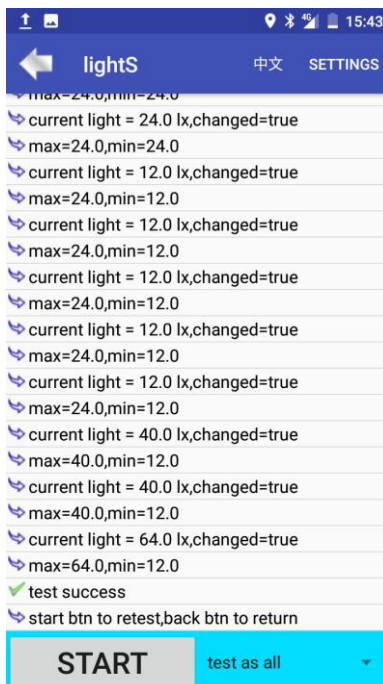
**Step one:** Please enter into **base test** and connect **BT**.



Picture fortieth

## 2.33 lightS

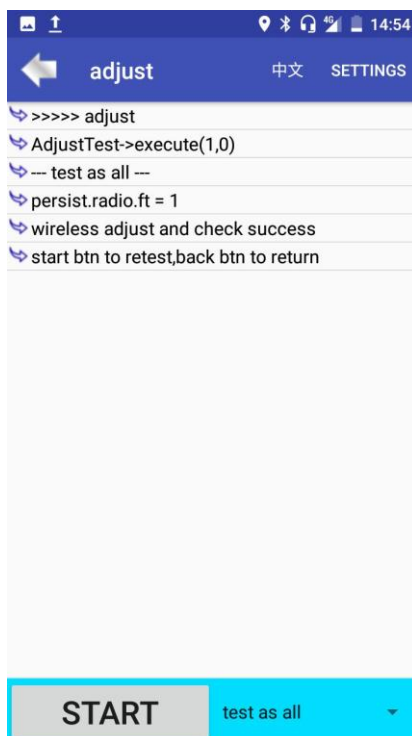
Terminals will test its own light sensing and only need to detect dark and bright light, then it will pass successfully.



Picture fortieth-one

## 2.34 Adjust

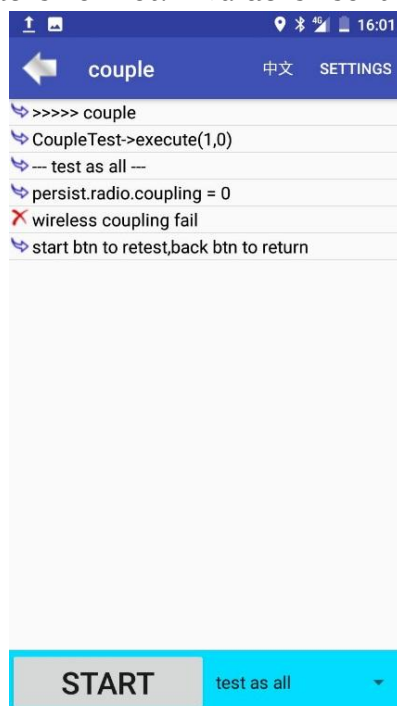
This item is used to check whether wireless module has been adjusted successfully and just need to see **persist.radio.ft** value whether it is 1 or not, if the value is 1, it means that wireless module has been adjusted successfully.



Picture fortieth-two

## 2.35 Couple

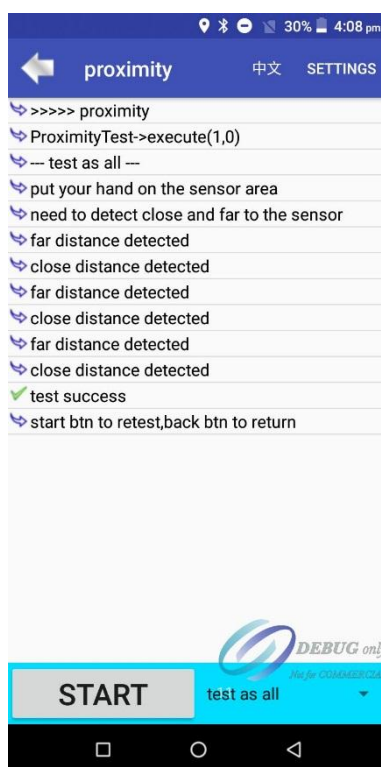
This testing item is only tested in PAX factory to test whether the wireless module has been coupled successfully or not and just need to see persist.radio.coupling value is 1 or not. If value is 1 so it has been coupled well.



Picture fortieth-three

## 2.36 Proximity

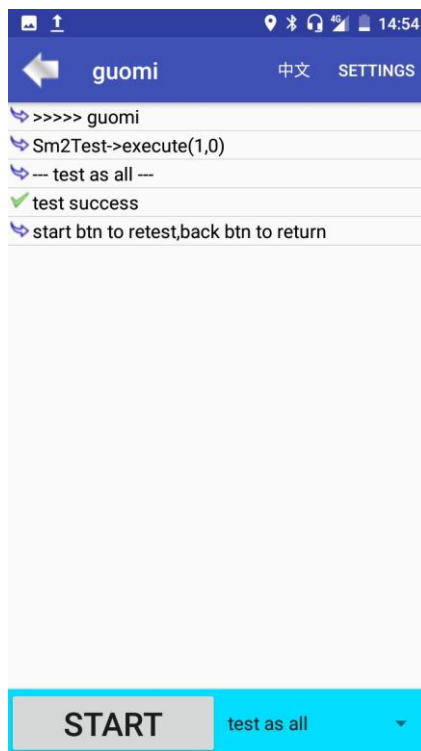
This item is used to whether terminals can test near and far states.



Picture fortieth-four

## 2.37 GUOMI

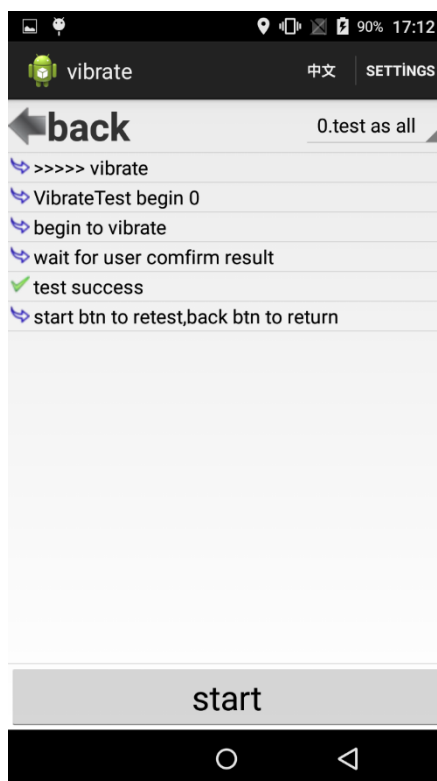
This item is only tested for Chinese market.



Picture fortieth-five

## 2.38 Vibrate

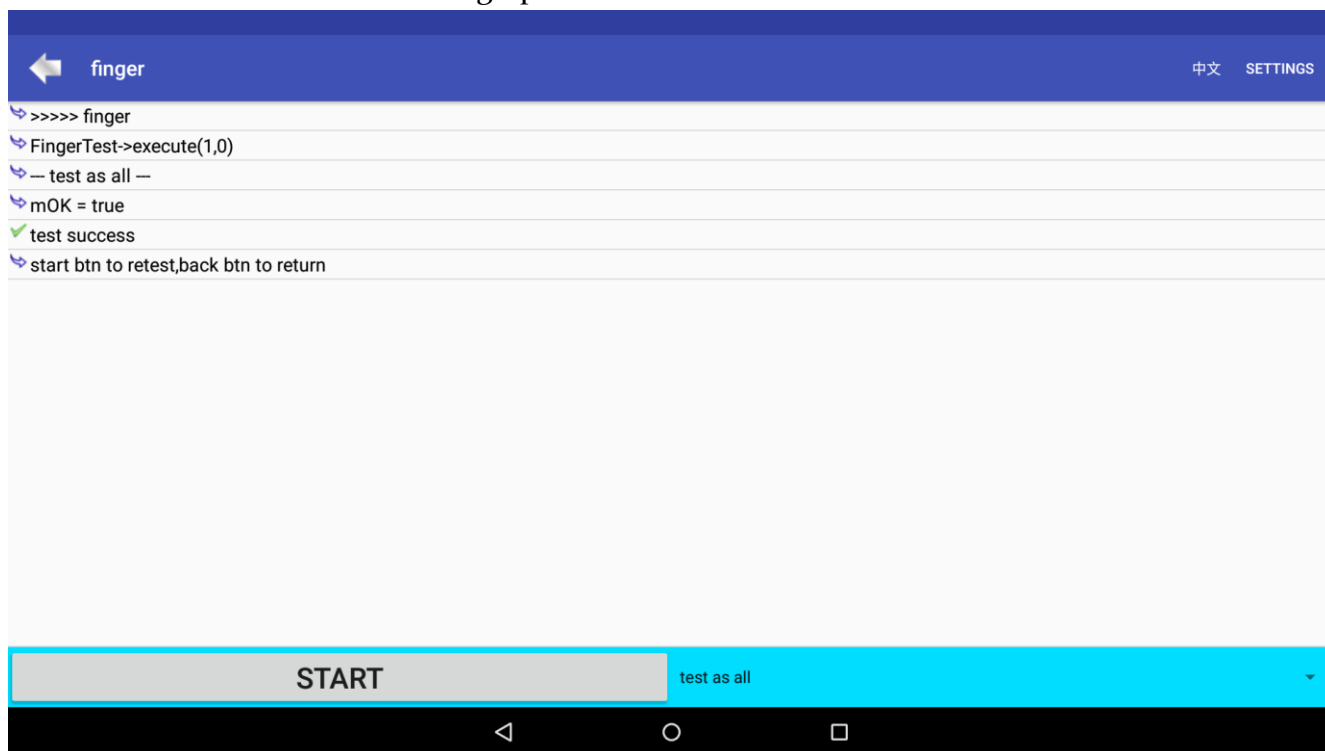
Vibration is used to test whether terminals can vibrate normally.



Picture fortieth-six

## 2.39 Finger

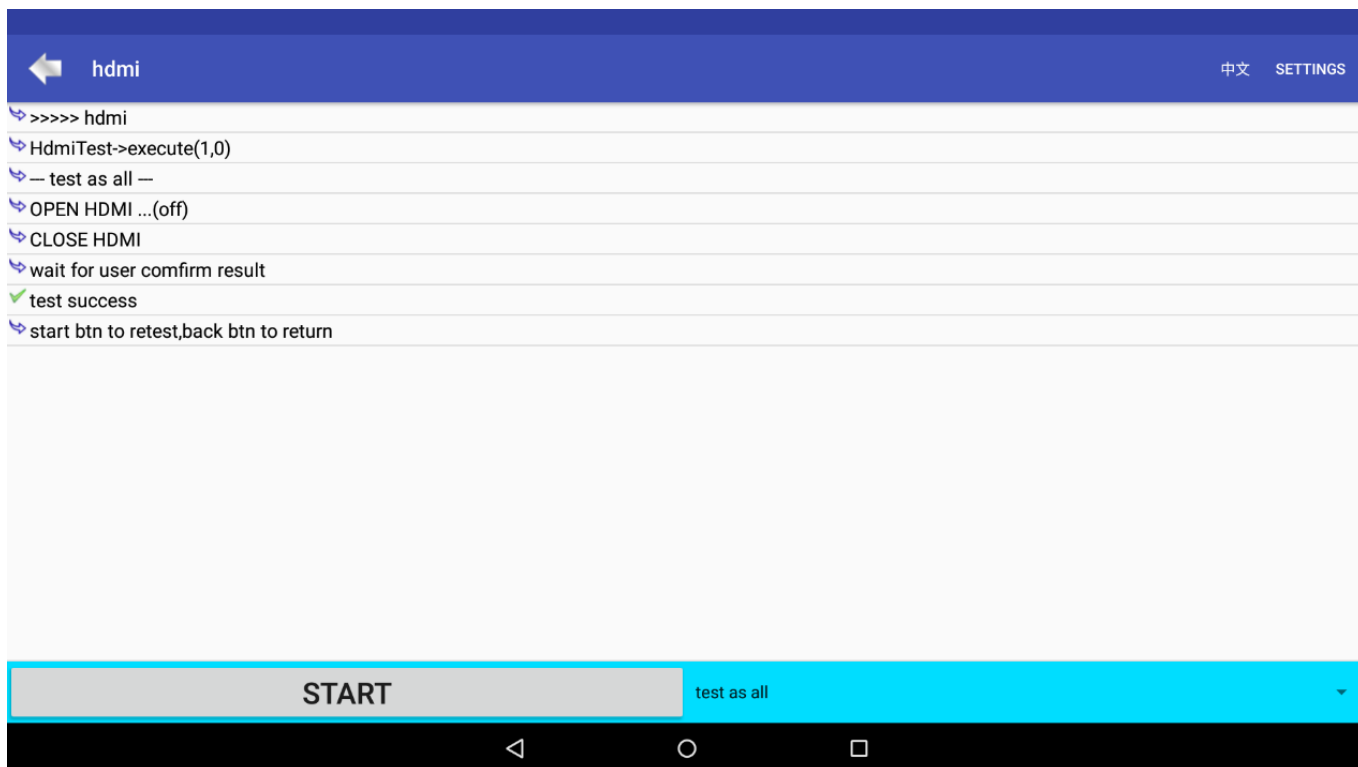
This item is used to test fingerprint function.



Picture fortieth-seven

## 2.40 HDMI

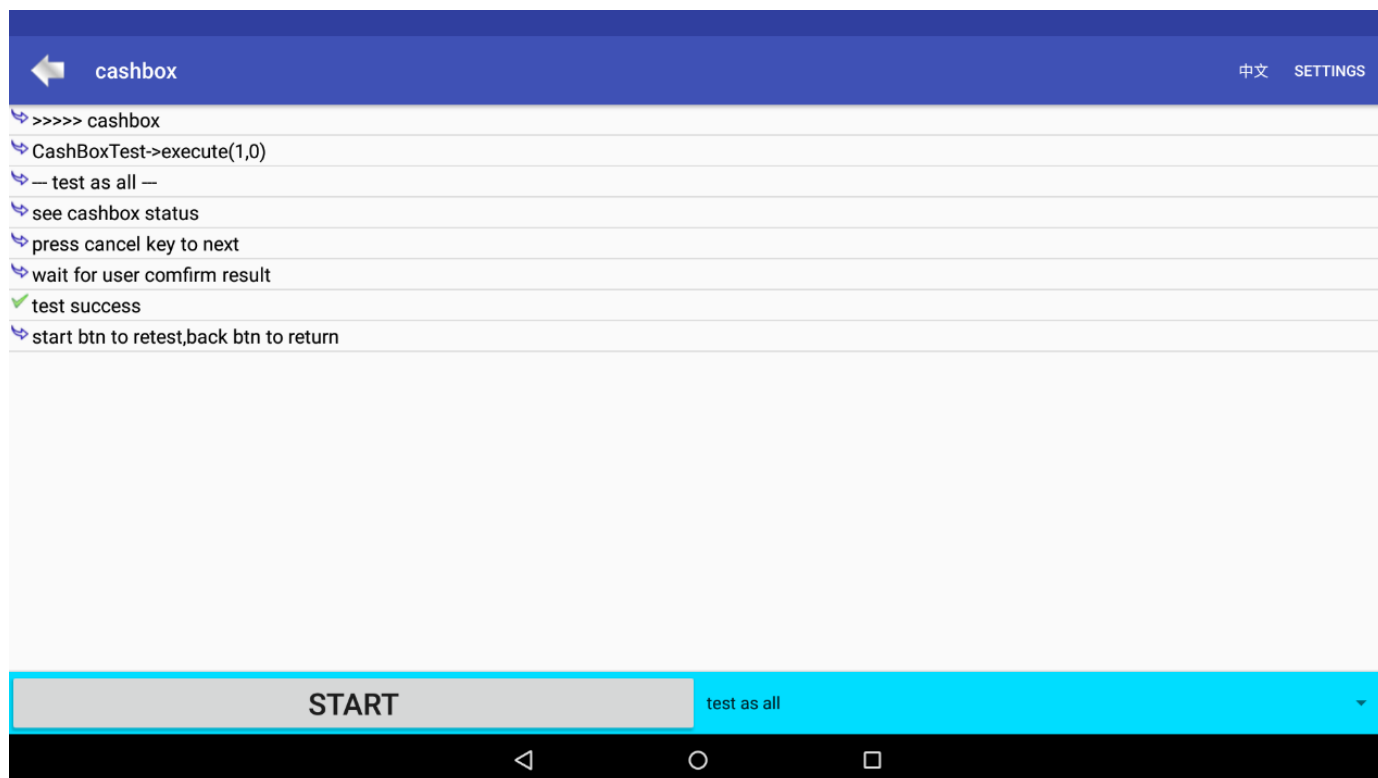
Exxx terminals will display one small video to test HDMI function.



Picture fortieth-eight

### 2.41 Cashbox

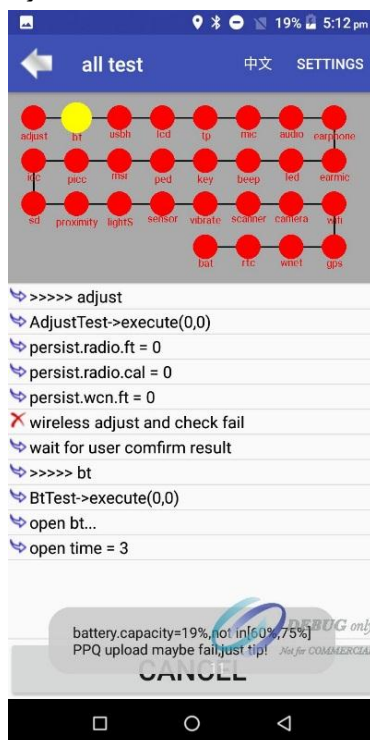
Please insert 24V power adapter and thermal paper in paper house in advance, it will pass if you can hear buzzer sound.



Picture fortieth-nine

## 3. ALL test

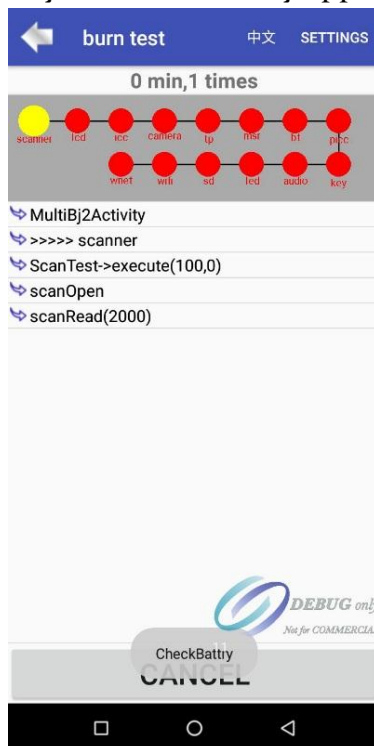
This item is used to test all different modules on terminals one by one and is only applicable in PAX factory.



Picture fifty

## 4. Burn test

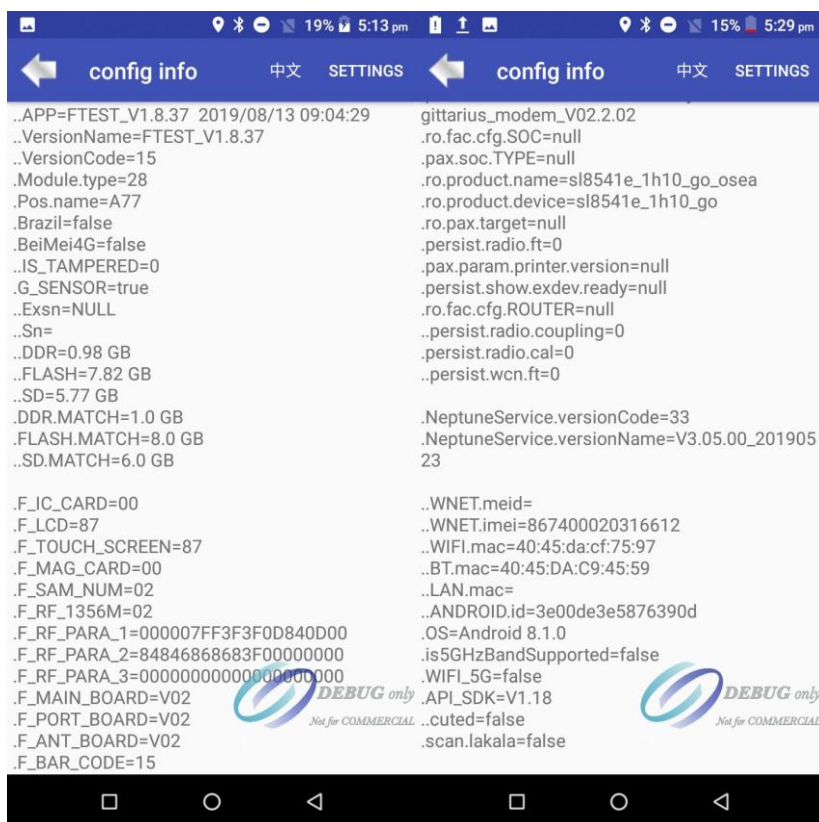
Burn test is the pressure test for terminals in factory in order to find out terminals problems very quickly, this item is only applicable in PAX factory.



Picture fifty-one

## 5. Config info

Configuration information is an option that you can get all information that factory testing apps have received accordingly mainly including hardware information.



Picture fifty-two

## III. Revision history

| Date     | Version | Author | Remark          |
|----------|---------|--------|-----------------|
| 20200515 | V01     | Ethan  | Updated version |