Industrial tablet computer

NB801S User Manual

catalogue

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Chapter 1 Introduction & Appearance

1.1 Introduction

The NB801S is a versatile industrial tablet designed with multi-function integration, high performance, and high system stability at its core.

The device supports flexible modular configurations, including Barcode / UHF / LF / Fingerprint / NFC and other functional options. It is powered by a flagship-level octa-core CPU, ensuring strong computing performance and reliable system operation.

The NB801S is ideally suited for a wide range of industry applications such as warehouse logistics, intelligent manufacturing, attendance inspection, and ticketing management, helping users achieve efficient, secure, mobile, intelligent, and digital operations.

Note:

All functions are modular and optional. A single device cannot be equipped with all modules at the same time. Please consult technical staff for specific configuration details.

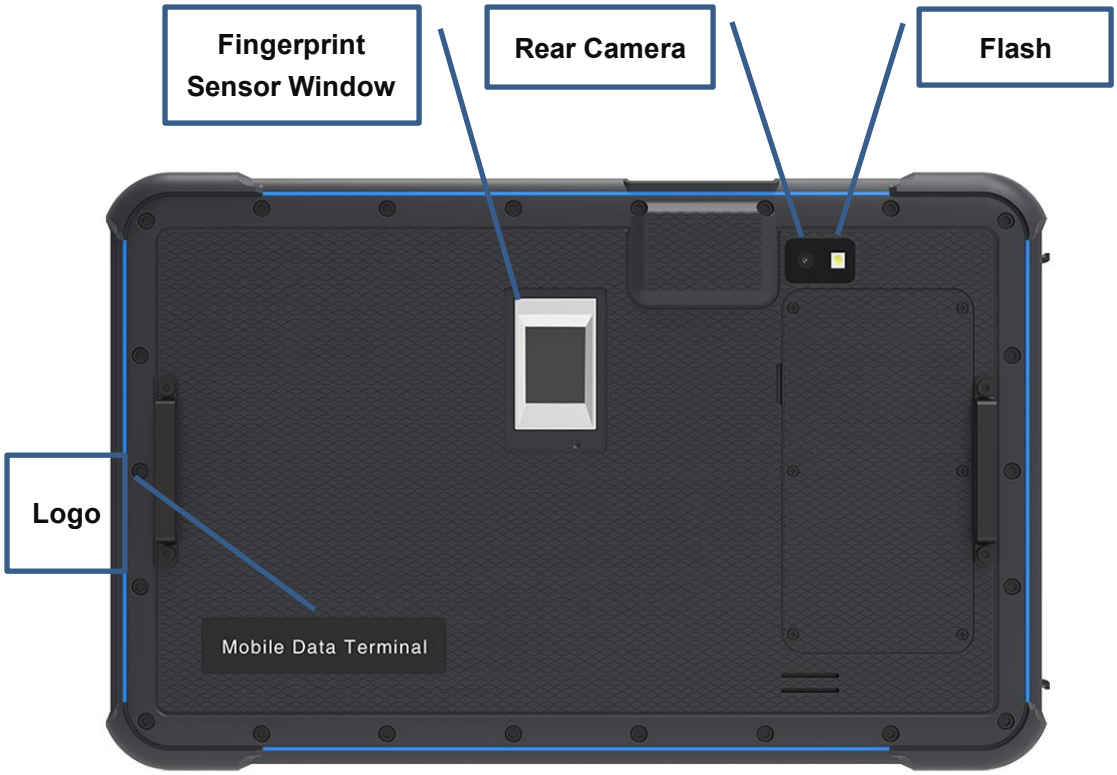
1.2 Appearance and Device Overview

The multi-function industrial tablet is equipped with various operation keys, including physical buttons and touch function keys, to meet different operating habits and application scenarios.

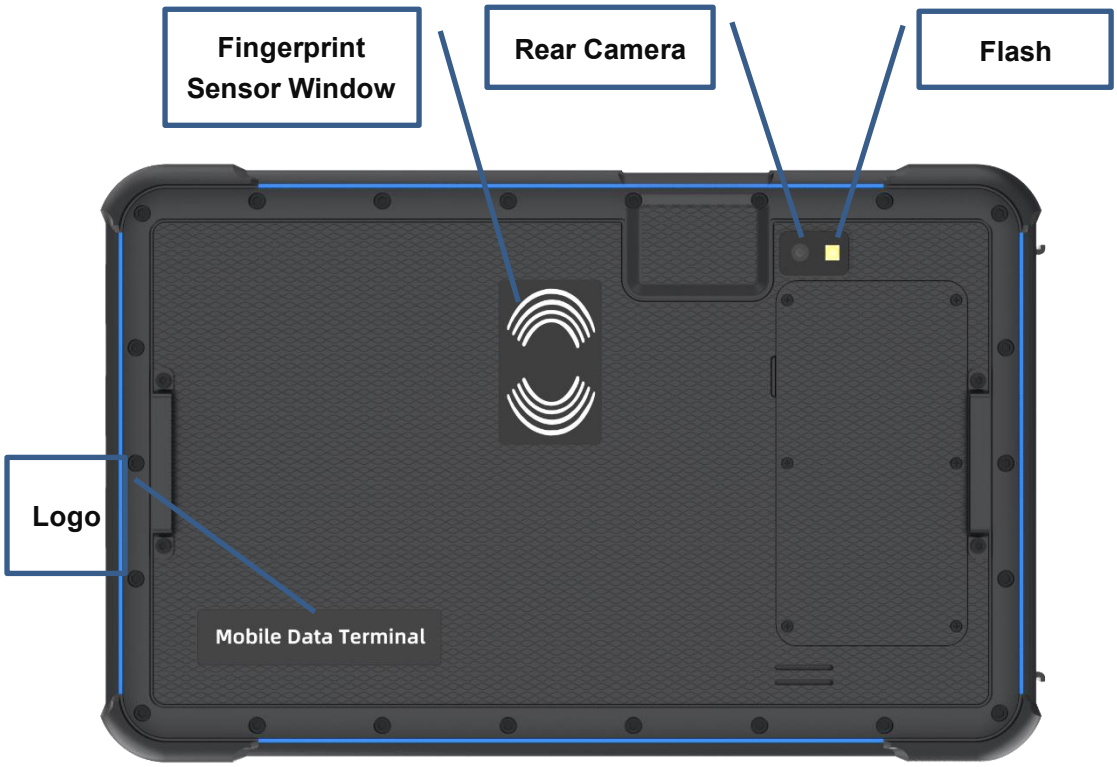
Front Panel:
Four touch function keys are provided (from right to left):
Back Key, Home Key, Menu Key, Volume Key.

Bottom Buttons:
Four buttons are configured:
Power Key, Scan / Custom Keys (F1–F3).

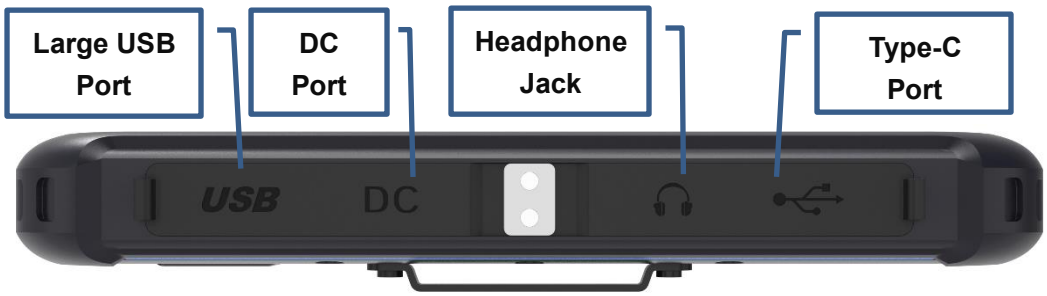
（front）



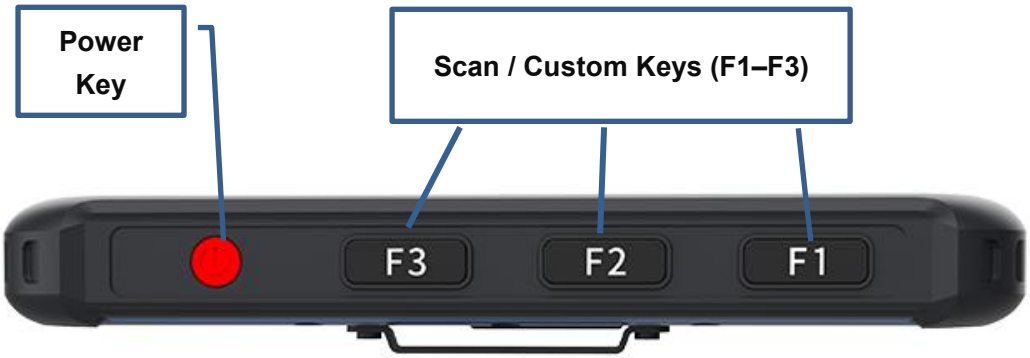
Rear Panel (Fingerprint Version)



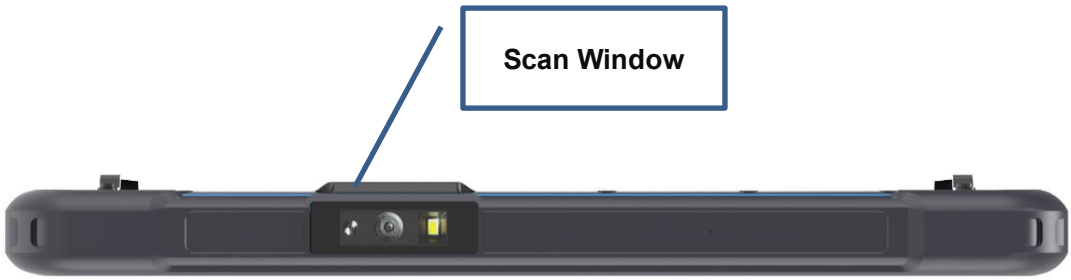
Rear Panel (Standard Version)



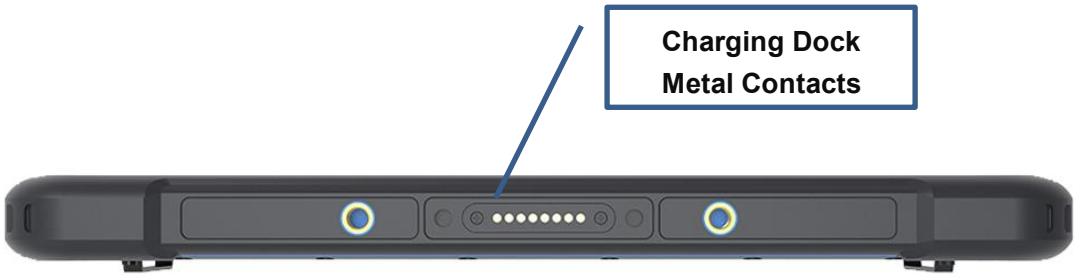
（Top view）



（Bottom view）



（Left view）



（Right view）

Chapter 2 Safety Precautions

2.1 Laser Safety

Do NOT look directly into the scanning laser beam, as it may cause eye injury.

2.2 Battery Safety

1) **Charger Usage Requirements**
   Always use the original charger provided by the manufacturer.
   Do NOT use mobile phone fast chargers, power banks, or any non-official charging devices. Mismatched voltage or current may cause battery overcharging, overheating, permanent damage, or safety hazards.

2) **Daily Charging & Battery Management**
   To extend battery life, it is recommended to keep the battery level between 30% and 80% during daily use.Disconnect the charger promptly once fully charged to avoid prolonged high-voltage saturation.

3) **Long-Term Storage**
   If the device will not be used for more than one month, power it off and store it with approximately 50% battery level.Check and recharge to 50% every two months to prevent deep discharge.

4) **Operating & Charging Temperature**
   Operate and charge the device only within suitable temperature ranges.
   Avoid extremely high or low temperatures and direct sunlight, as they may accelerate battery degradation or trigger protection mechanisms.

5) **Charging During High Load**
   Do NOT charge the device during high-load operations (such as continuous scanning, bulk card reading, large data transmission, or heavy applications). Combined heat may significantly raise battery temperature and create safety risks.

6) **Battery Abnormalities**
   If swelling, leakage, abnormal heating, noise, or charging failure is detected, stop using the device immediately and disconnect the charger.Do not disassemble the battery. Contact after-sales technical support for inspection and replacement.

7) Physical Safety & Storage

Avoid strong impact, puncture, or disassembly.
Store the device in a dry, cool place, away from flammable materials, heat sources, and moisture.

8) Warranty Disclaimer

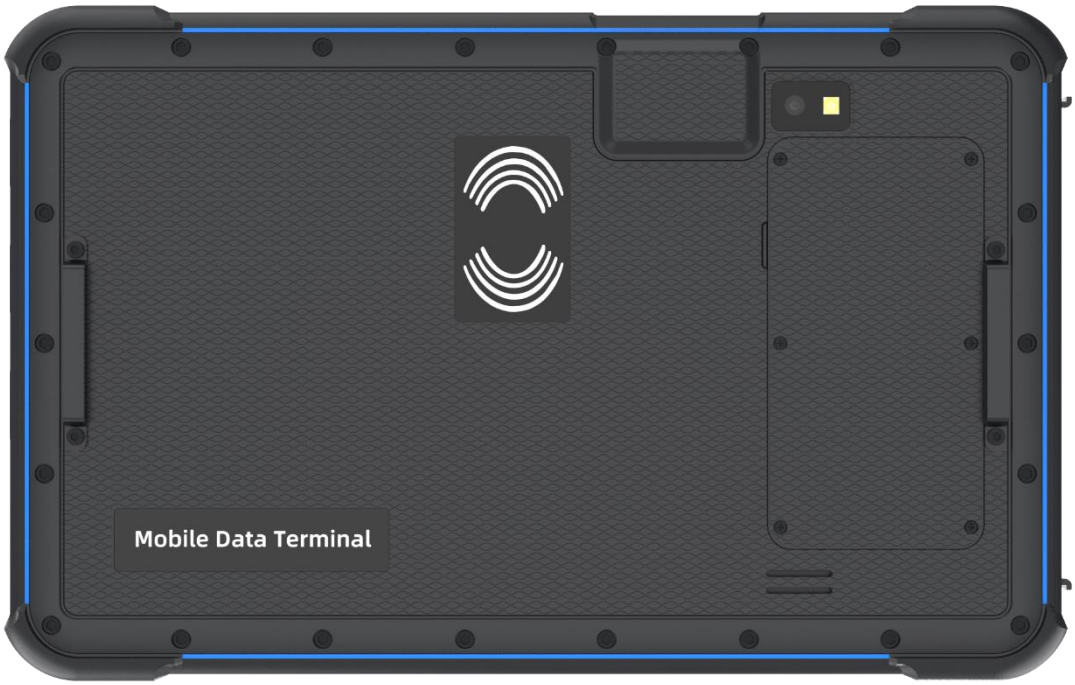
Battery degradation or device damage caused by non-standard chargers, improper environments, or failure to follow instructions may not be covered by the warranty.

Chapter 3 Quick Start

3.1 Battery Installation

Note:

◆This device features a built-in battery with an integrated design. Unauthorized disassembly may cause damage, battery leakage, safety risks, and void the warranty.



3.2 Power On / Power Off

Power On

Press and hold the Power Key, to turn on the device. In deep sleep mode, briefly press the Power Key to wake up the system.

Power Off

When the device is powered on, briefly press the Power Key until the options menu appears on the right side of the screen, then select Power Off.

3.3 Installing SIM & Micro SD / TF Card

1) Use the supplied screwdriver to remove the screw from the card slot cover on the upper rear side of the device (see Figure 3.3-1).

2) Open the card slot cover.

3) Insert the card into the corresponding slot following the illustrated direction (see Figure 3.3-2).

4) Reinstall and tighten the card slot cover screw.

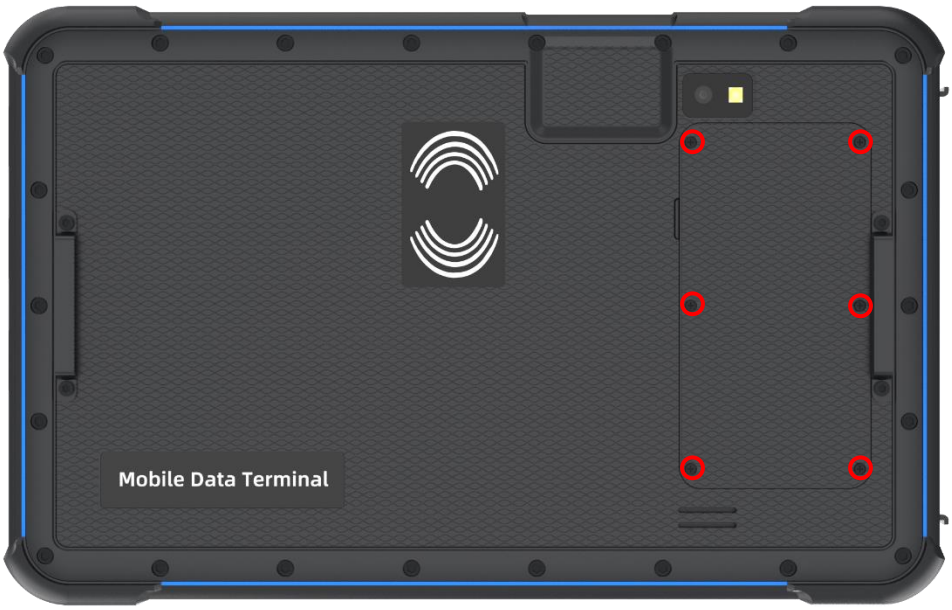


Figure 3.3-1

SIM card slot
SD card slot
Reserved_SAM_1
Reserved_SAM_2
Reserved SIM_2
Mobile Data Terminal

Figure 3.3-2

3.4 Charging Instructions

1) Always use the original power adapter and cable provided by the manufacturer.Do not use adapters from other brands to avoid damage or charging abnormalities.

2) The battery is shipped with limited charge for testing purposes. Please fully charge the device before first use.

3) Connect the charger to a power source, then insert the cable into the Type-C port to charge.

Note:

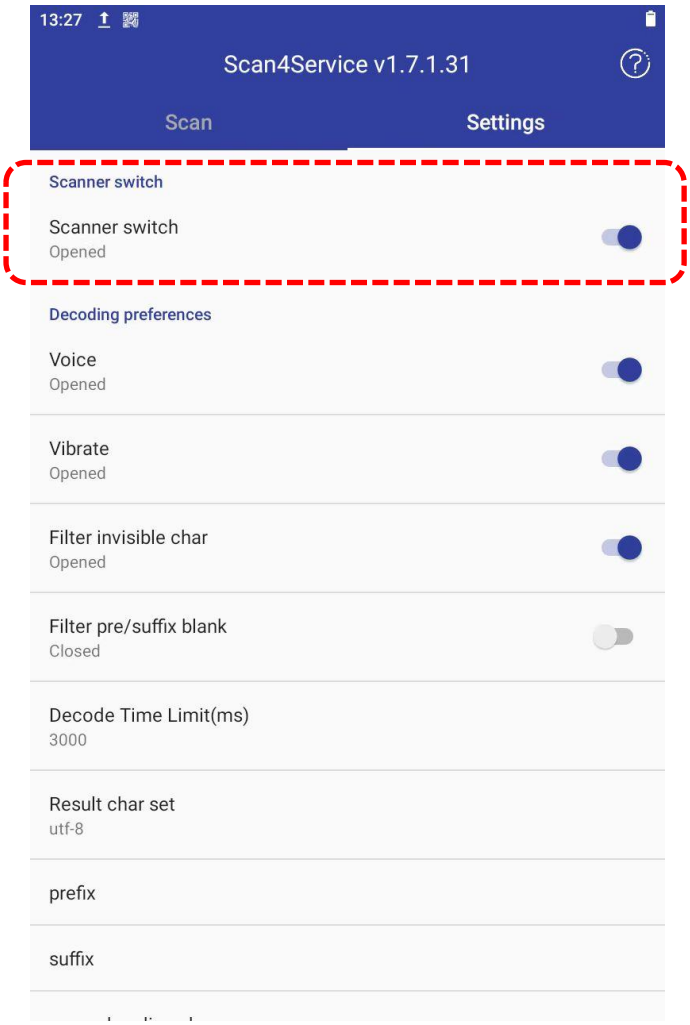
- Do not pull or forcibly remove the Type-C connector during operation to avoid damage.

- When battery power is low, a low-battery warning will appear.If battery power becomes critically low, the device will automatically shut down.

Chapter 4 Data Capture

4.1 Scanning Service

1) Locate the scanning application icon on the home screen. After entering the main interface and enabling scanning, press any **F1 / F2 / F3** key to start scanning.

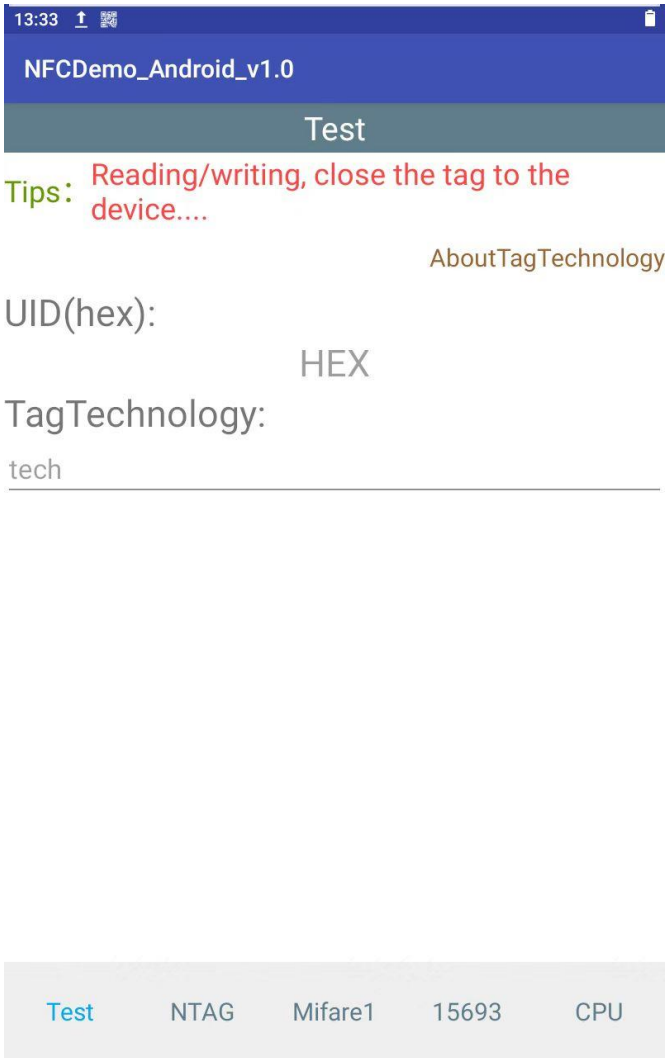


For advanced functions, please contact technical support for detailed documentation.

4.2 NFC Function

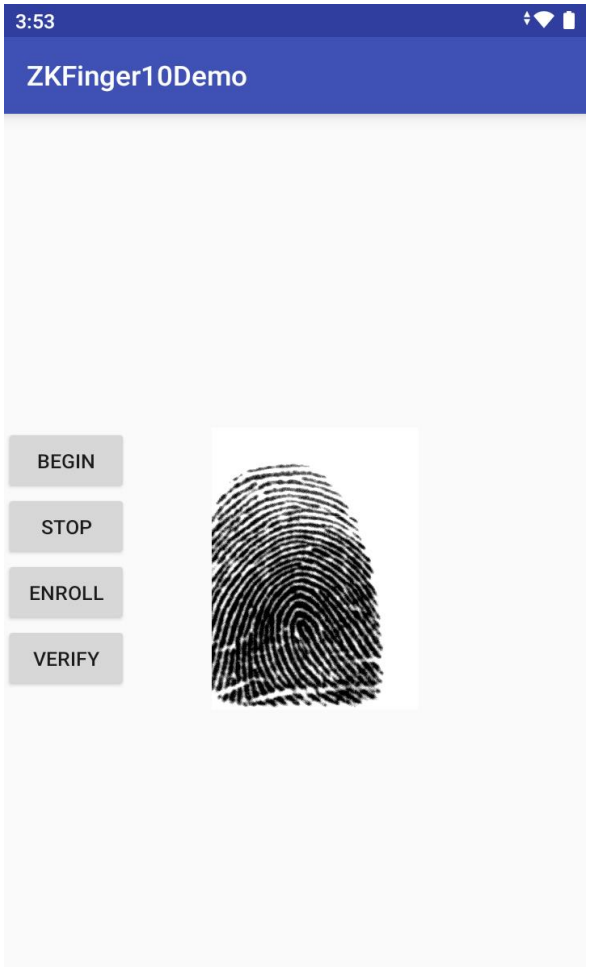
1) Locate and tap the NFC , application icon on the home screen.

2) After enabling NFC, the device supports card testing, NFC tags, Mifare, ISO15693, CPU cards, and other read/write operations.



4.3 Fingerprint

Open the Fingerprint , application from the home screen.



1) BEGIN / STOP: Start or stop fingerprint enrollment.

2) ENROLL: Follow prompts to enroll the fingerprint three times.

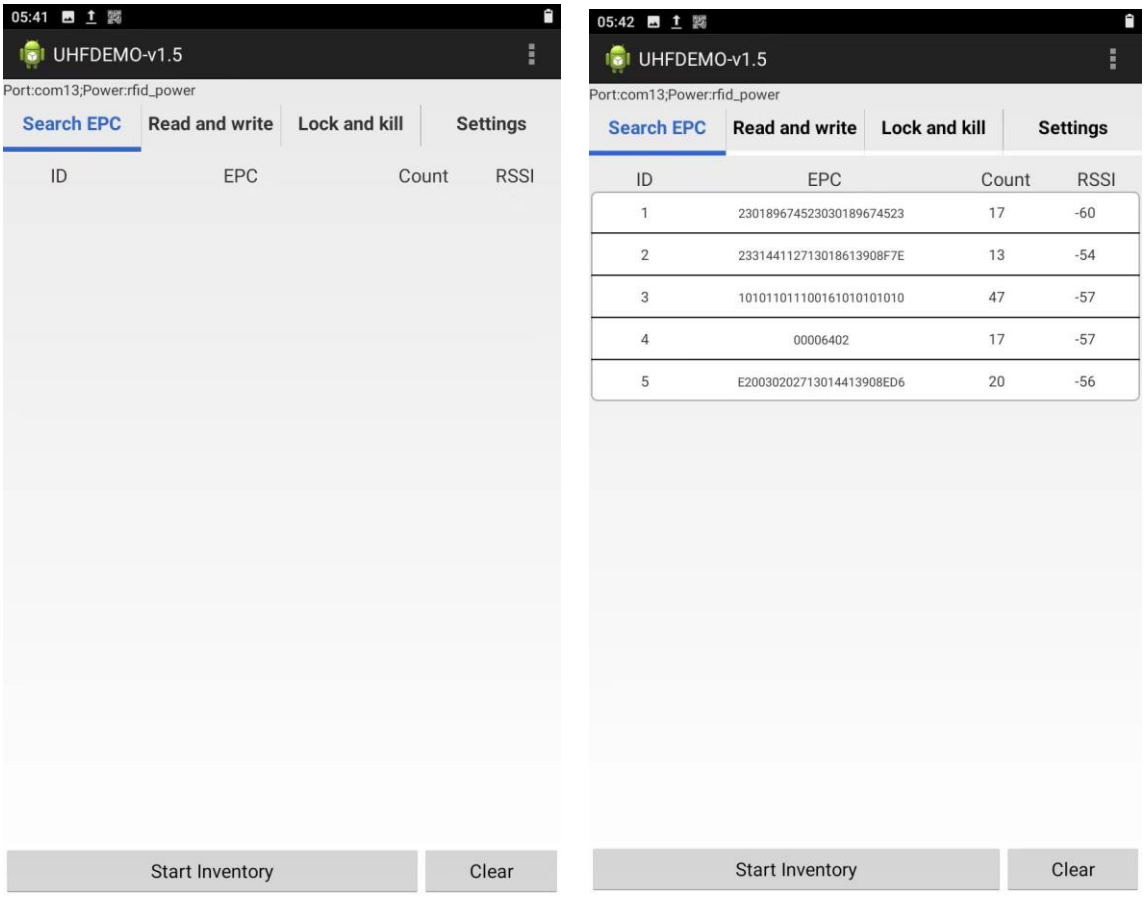
3) VERIFY: Verify against enrolled fingerprints.

For more advanced functions, please contact technical support.

4.5 UHF

4.5.1 EPC Inventory

Open the UHF application , from the home screen.



Tap Start Inventory to begin tag searching according to the configured working mode.

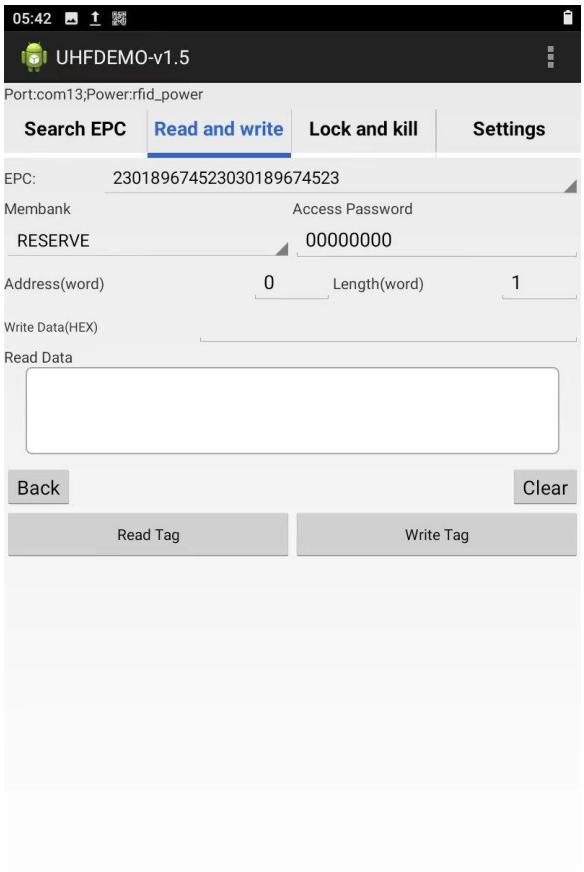
1) Start Inventory: Reads tag information (default EPC).

2) Clear: Clears current inventory data.

3) Count: Displays number of times a tag is detected.

4) RSSI: Displays signal strength when the tag is detected.

4.5.2 Read & Write



Select a detected tag, choose the memory area, set conditions, and tap Read or Write.

1) EPC: Select a detected tag.

2) Memory Area: Reserve, User, EPC, or TID.

3) Access Password: Password used for read/write operations.

4) Start Address: Starting address for read/write.

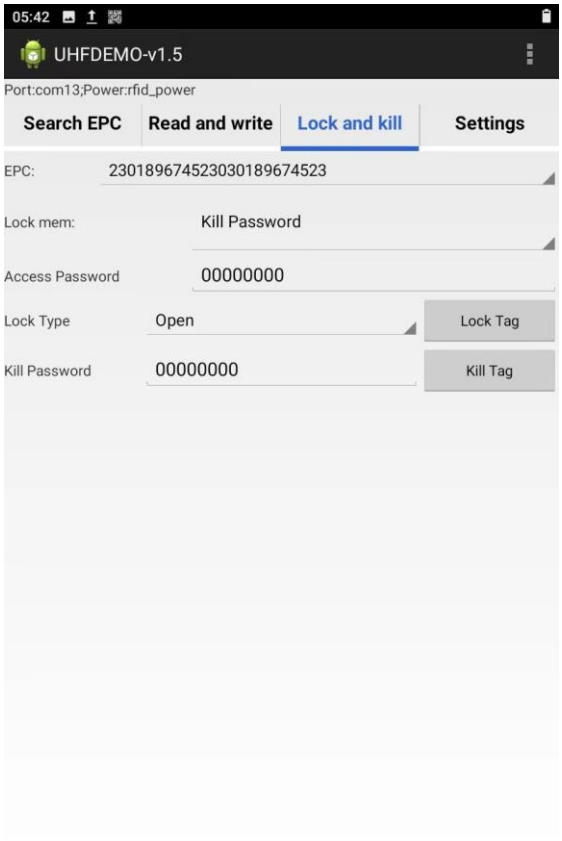
5) Length: Data length.

6) Write Data: Data to be written.

7) Read Data: Display of read data.

8) Clear: Clears displayed data.

4.5.3 Lock & Kill



After a tag is locked, writing with the default password (00000000) is not allowed.

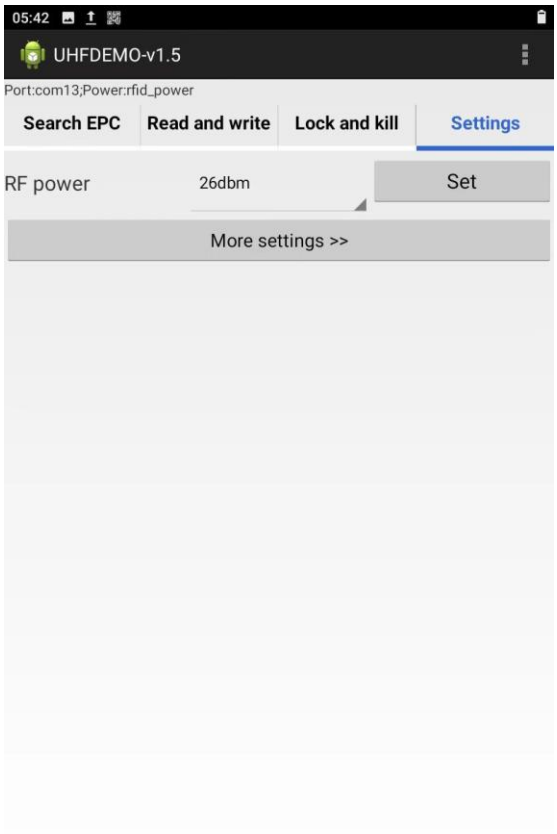
1) Lock Area: Kill Password, Access Password, EPC, TID, USER.

2) Access Password: Default is 00000000.

3) Lock Type: Open, Lock, Permanent Lock (cannot be unlocked).

4) Kill Password: Must be non-zero to take effect.

4.5.4 Settings

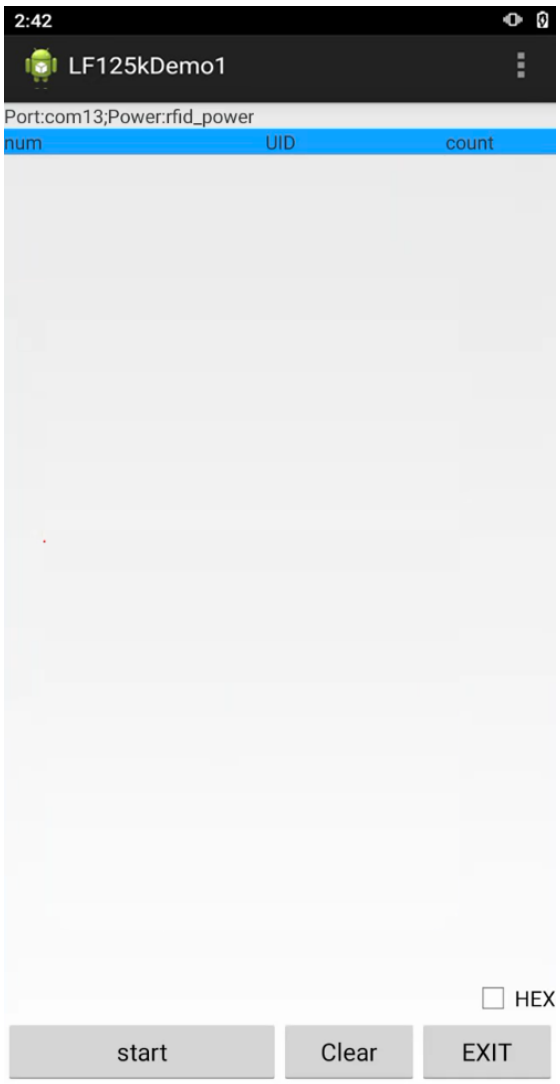


Configure working region and RF output power.

1) RF Power: Adjust antenna output power.

2) Working Region: Set regional parameters.

4.6 LF



1) Open the application from the home screen. 。
2) Tap Start and place the card near the sensing area.
3) Use Clear to reset data.
4) Tap Settings (top-right) to adjust parameters.
5) Tap Exit to close the application.

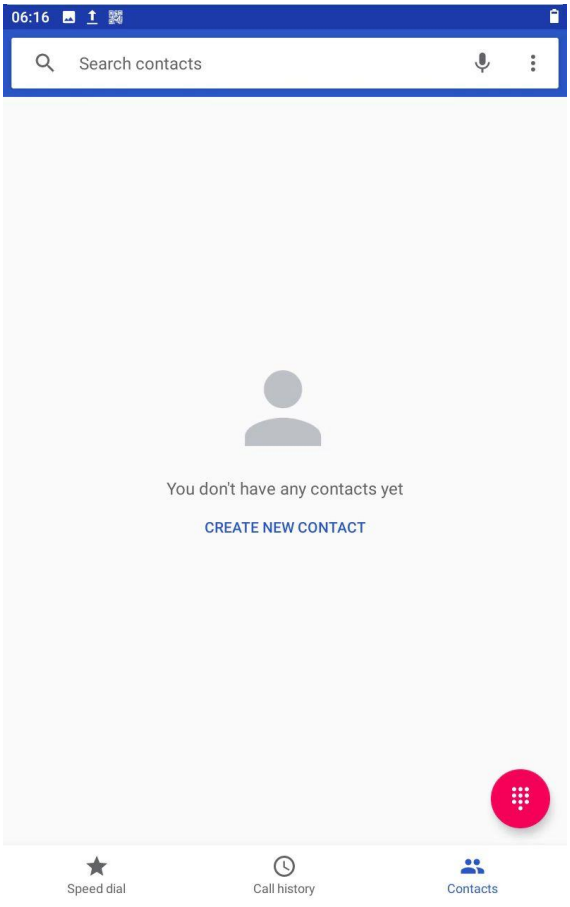
Chapter 5 Communication & GPS

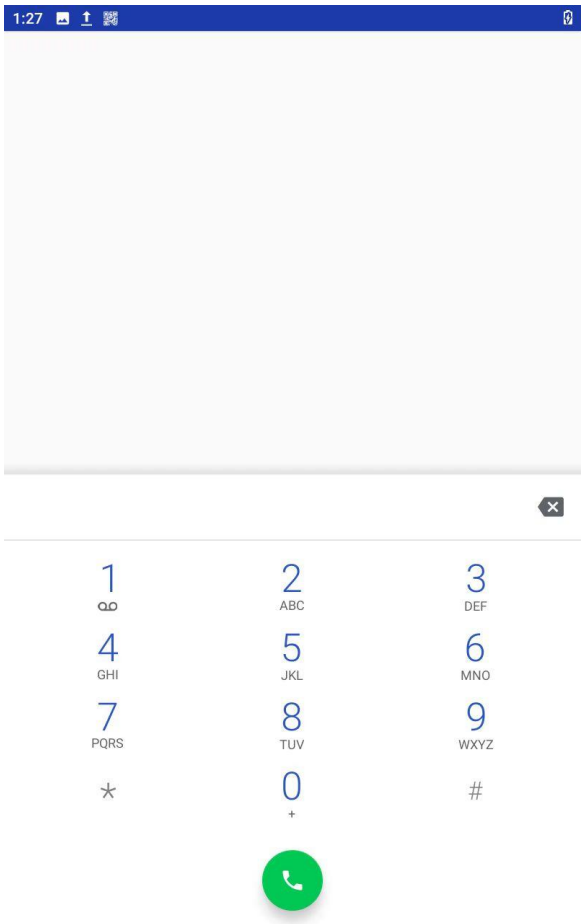
5.1 Dialing

1) Open the Dialer application

2) Enter the phone number using the keypad

3) Tap to call; , tap to end the call.





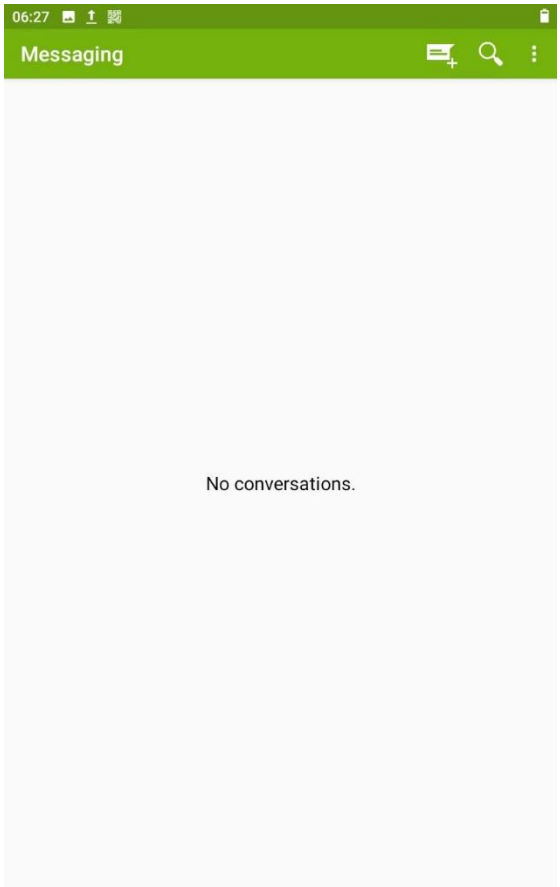
5.2 SMS

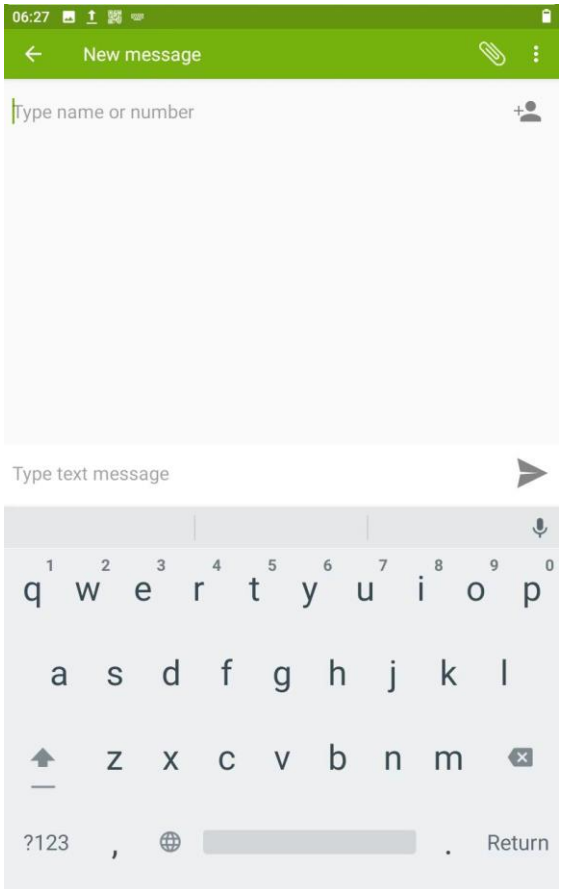
1) Open the Messages application .

2) Create a new conversation .

3) Enter recipient number or name, then input message text.

4) Add images, videos， or insert quick phrases as needed .

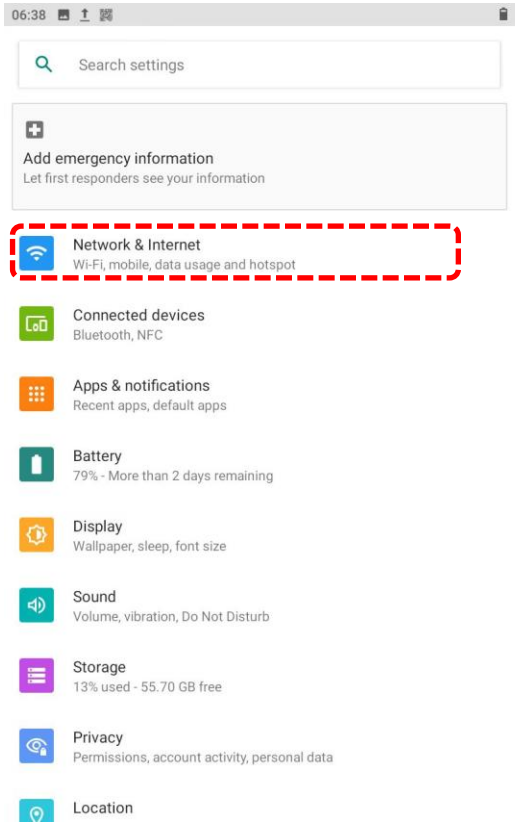


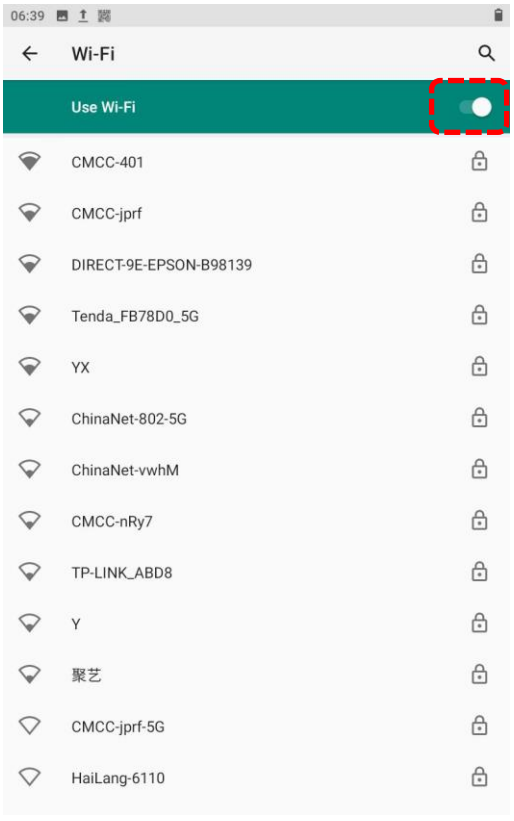


5.3 Network Connection

Go to **Settings** → Network & Internet → **Internet**.
Enable **WLAN**, select an available network, and enter the password if required.

You may also pull down the notification panel and tap the WLAN icon for quick access.





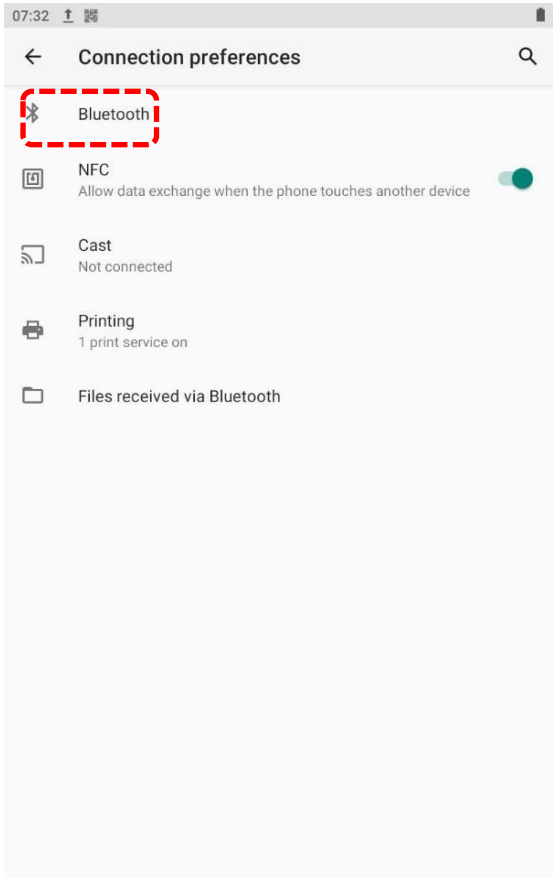
5.4 Bluetooth Connection

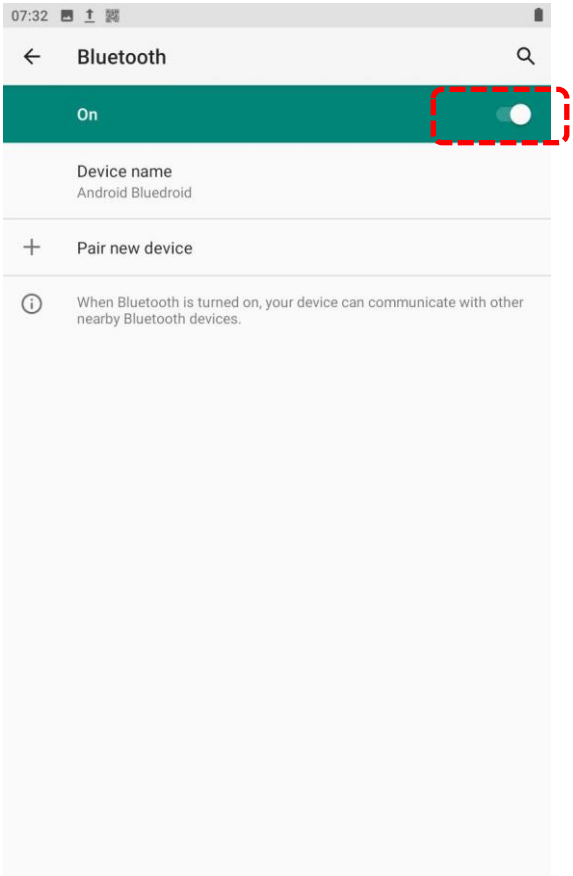
1) Go to Settings → Connected Devices →Connection Preferences→ Bluetooth.

2) Enable Bluetooth and select a device to pair.

3) Enter the PIN if prompted.

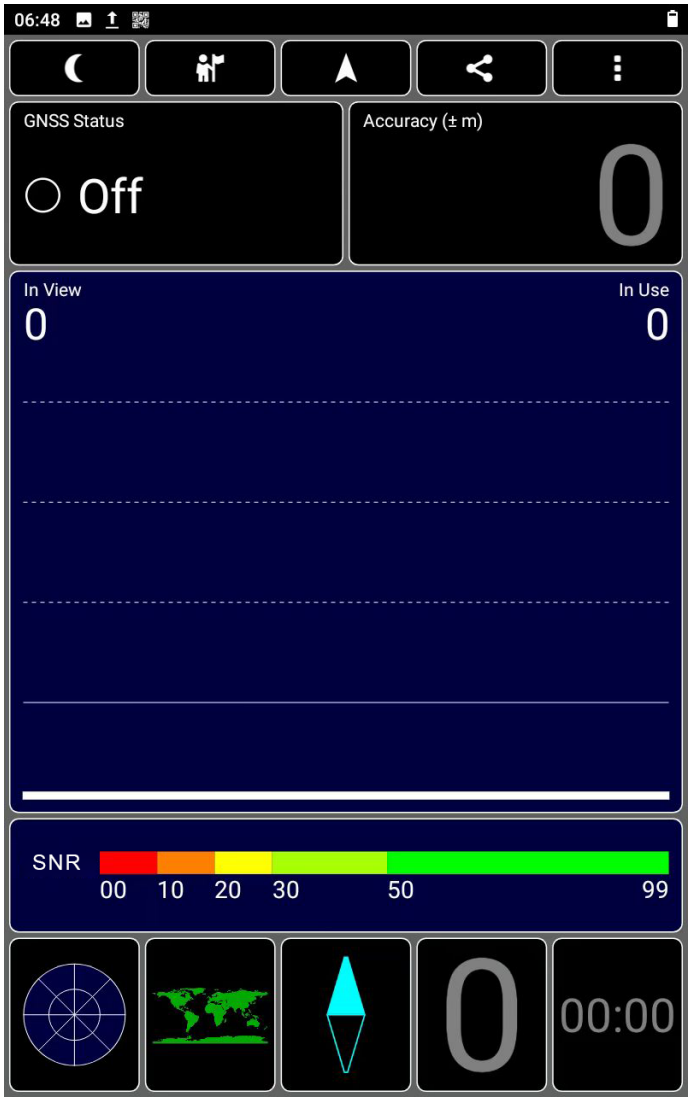
4) Paired devices can be renamed or unpaired via settings.





5.5 GPS

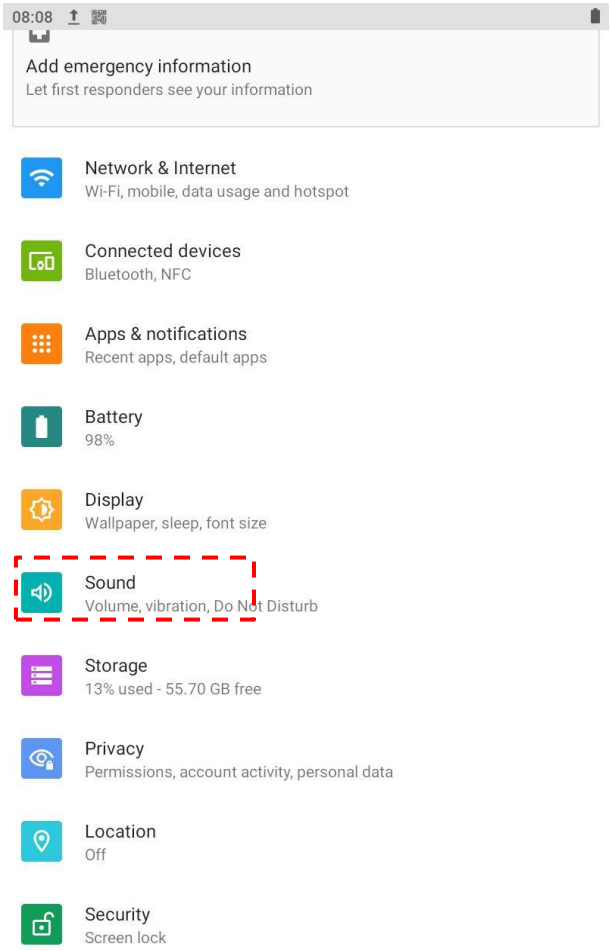
1) Tap the GPS test application icon
2) Configure parameters and obtain GPS data

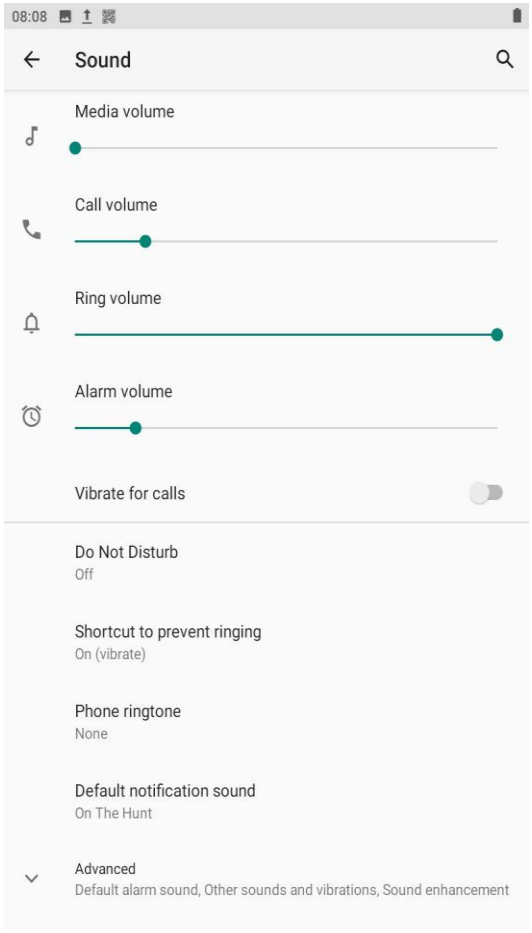


Chapter 6 Settings & Management

6.1 Volume Adjustment

1) In Settings adjust media, call, ringtone, and alarm volume, and configure related options.

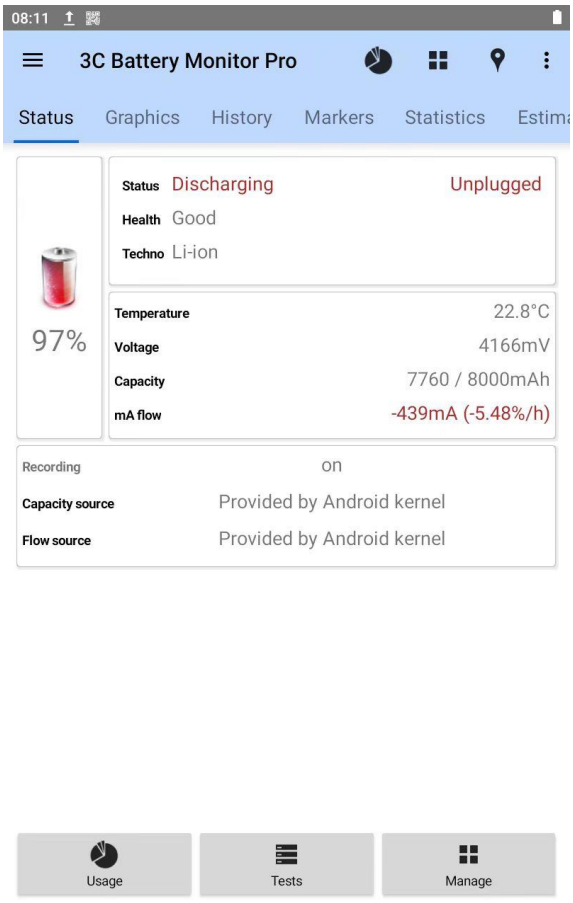




6.2 Power & Battery Management

1) The battery is partially charged at shipment. Please charge fully before use.
2) Initial charging takes approximately 4 hours.Red LED indicates charging; blue LED indicates full charge.
3) Optimal operating temperature: 18–25°C.Charging is disabled below -10°C or above 50°C.
4) Wireless networks and data capture applications significantly increase power consumption. Disable unused functions to conserve battery.
5) Use 3C Battery Monitor Pro to check battery status.

Tip:
If unused for long periods, charge the device at least once every two months.



Chapter 7 Device Maintenance

7.1 Troubleshooting

I. Common Issues and Troubleshooting Steps

1) Issue 1: Device Will Not Power On

Description: The device shows no response and fails to start after pressing the power button.

Troubleshooting Steps:

● Check if the device has sufficient battery. Charge it or replace the batteries if needed.

● If the issue persists, it is recommended to back up your data and perform a factory reset.

2) Issue 2: Device is Slow or Unresponsive

Description: The device experiences lag, freezing, or becomes unresponsive during use.

Troubleshooting Steps:

● Check the device's memory usage. Ensure it is not overloaded by clearing the cache or closing unnecessary applications.

● Check the available storage space. If storage is low, delete unnecessary files or applications.

● Check for viruses or malware. Run a security scan if needed.

● If the issue persists, it is recommended to back up your data and perform a factory reset.

3) Issue 3: Device Cannot Connect to a Network

Description: The device is unable to connect to a Wi-Fi network or mobile data network.

Troubleshooting Steps:

● Verify that the Wi-Fi or mobile data switch is turned on.

● Check if you are within signal range. Try moving closer to the signal source.

● For Wi-Fi issues: Try restarting your Wi-Fi router or re-entering the Wi-Fi password.

● For mobile network issues: Try replacing the SIM card or contact your service provider.

● If the issue persists, it is recommended to back up your data and perform a factory reset.

4) Issue 4: Abnormal Screen Display

Description: The device screen shows abnormalities such as discoloration, distortion, or flickering.

Troubleshooting Steps:

● Check for physical damage to the device. Seek professional repair service if necessary.

● Try restarting the device to see if it resolves the display issue.

● Check if system or application updates are available and install them if needed.

● If the issue persists, it is recommended to back up your data and perform a factory reset.

5) Issue 5: Device Will Not Charge

Description: When connected to a power adapter, the charging indicator does not light up and the screen shows no response.

Troubleshooting Steps:

● Try a different power adapter and cable to rule out adapter/cable issues.

● If you have a compatible charging dock, try using it to charge the device. A completely drained battery may enter sleep mode and require activation via a charging dock.

● When using a network-enabled charging dock, please ensure the dock's network switch is turned off.

● If the issue persists, it is recommended to back up your data and perform a factory reset.

● If none of the above steps resolve the issue, please contact customer support for further assistance.

7.2 Notes

1) During the troubleshooting process, always follow the steps in the prescribed order. Incorrect handling may cause further damage.
2) If you are unable to resolve the issue successfully, please contact customer support or seek assistance from a qualified technician. Do not attempt to disassemble the device or use improper repair methods on your own.
3) While performing troubleshooting, prioritize your personal safety. Avoid any actions that could lead to injury.
4) This troubleshooting guide is intended for common issues only. More complex problems require diagnosis and repair by a professional technician.

7.3 Preventive Measures

1) **Regular Cleaning and Maintenance**
   Regularly clean the product's exterior surfaces and vents. Prevent the buildup of dust and debris, which can negatively impact performance.

2) **Using the Correct Power Adapter**
   Always use the power adapter that meets the manufacturer's specifications. Avoid overloading the power source to ensure a stable power supply.

3) **Keep the Product Dry**
   Avoid prolonged exposure of the product to humid environments, such as kitchens or bathrooms. This helps prevent electrical short circuits and corrosion of internal components.

4) **Protect from Physical Impact**
   Prevent the product from being subjected to strong impacts or drops, as this may cause loosening or damage to internal parts.

5) **Back Up Data Regularly**
Make it a habit to back up your important data periodically. This safeguards against potential data loss or an inability to recover files.

Chapter 8 Secondary Development Notes

For SDKs, secondary development support, or other technical assistance, please contact your assigned sales manager or technical engineer.