

P9V User Guide

Manual Revision Record

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Chapter 1 Product Introduction

The P9V is a professional smart notebook based on the Android 14 operating system, equipped with an 8-core 2.0GHz powerful processor, 4GB RAM, and 64GB of large storage. It is IP68 protected and offers excellent performance and a smooth experience even in harsh working environments. However, the device does not support voice communication. It has no earpiece/receiver, cannot make cellular voice calls, and cannot be used as a smartphone.

This chapter mainly introduces the appearance of the P9V product and its handset accessories. The product appearance covers panel definition, key definition, and connector definition.

1.1 Panel Definition

1.1.1 Front



Figure 1-1 Front of the Handheld Controller

Table 1-1 Description of Front Panel Components Functions

No.	Component	Description
①	Touch Screen	Displays the screen and responds to your touch operations.
②	Key Console	Includes 24 keys such as numeric keys and special function keys.

1.1.2 Back and Sides



Figure 1-2: Back and Side Views of the Controller

No.	Component	No.	Component
1	Camera	6	Speaker Grille
2	USB	7	Flash Light
3	Nameplate	8	SIM Card Cover

4	Side Key	9	Black Wrist Strap
5	Wrist Strap Hardware	\	\

1.2 Key and Indicator Definition



Figure 1-3 Handheld Controller Buttons

Table 1-3 Description of Handheld Controller Button Functions

No.	Key	Definition & Description	
1(Numeric Key) 2 (FN Key)	Numeric Key	Enter numbers	
	FN	Switches between numbers and letters when using the physical keyboard FN input mode, and toggles among Chinese, numbers, and letters in Chinese input mode.	
	Special function keys (functions indicated by the orange icons when	Voice function (marked with the orange icon on the "1" key)	Enables voice input and allows Surpad to execute certain voice commands.
		Camera function (marked with the orange icon on the "2" key)	Can activate the camera function.
		Screenshot function (marked with the orange icon on the "3" key)	Allows quick screenshot capture.

	Fn is locked)	F1-F5	User-defined function key
3	Survey Key	When the Surpad interface is not active, pressing this key opens or switches to the Surpad interface (the displayed interface corresponds to the software version). When on the Surpad interface, this key functions as a collection key.	
4	Directional keys	Moves up, down, left and right on the screen or in menus. In function mode, the up and down keys control the volume. In function mode, the left and right keys control the screen brightness.	
5	Back Key	Returns to the previous interface.	
6	Enter key	Confirm / Line break. When on the Surpad interface and in non-input state, it acts as the collection key.	
7	Undo key	Deletes one character backward in the character input field.	
8	Tab Key	Tab Key	
9	Shift Key	Switches between lowercase and uppercase letters when using the physical keyboard input method.	
10	Power key	Power on / off	

1.3 Accessories

1.3.1 Cables CTMM-1.5

Users can charge the P9V controller and transfer data using the CTMM-1.5 cable and adapter. The charging cable is a Type-C male to Type-C male cable with a length of 1.5 meters.

1.3.2 Adapter ZL-018GL20WCN01

The output voltage and current of the adapter are 5V/3A and 9V/2.22A



Figure 1-4 CTMM-1.5 Cable Figure 1-5 Adapter ZL-018GL20WCN01

Chapter 2 Basic Operations

This chapter mainly introduces the basic operations of the device.

2.1 Power on / off, restart, sleep

2.1.1 Power on / off

Press and hold the power key until the device vibrates once, then release it. The startup time is approximately 20 seconds.

2.1.2 restart

When the device is not in use, press and hold the power key until the dialog shown in Figure 2-1 appears on the screen, then tap Power off to shut down the device.

2.1.3 Wake up / Sleep

Briefly press the power key to wake up the controller or put it into sleep mode.

2.1.4 Restart

Press and hold the power key until the dialog box shown in Figure 2-1 appears on the screen, then tap Restart to reboot the device.

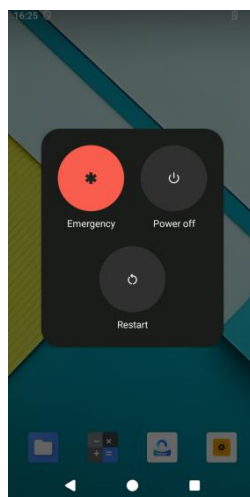


Figure 2-1

2.2 Screenshot

Press and hold the right arrow key and the Power key simultaneously to take a screenshot. Alternatively, briefly press the Fn key on the controller; when the Fn icon appears at the top of the screen, press key “3” in the white key area to activate the corresponding orange function and take a screenshot. You can also take a screenshot by swiping down the notification bar and tapping the screenshot option in the notification bar.

2.3 Installing / Removing the SIM Card / TF Card

(1) Open the card slot cover. The SIM/TF card slot is located on the left side when facing the screen.

(2) Insert the TF card or SIM card into the slot according to the arrow direction marked on the cover, then fasten the card slot cover.

2.4 Battery Charging

The lithium-ion battery must be fully charged before first use. Charging from 0% takes approximately 4 hours, and the continuous working time is more than 15 hours. The charger is equipped with overcharge protection.

Note: Please follow the instructions below to ensure optimal performance of the lithium battery:

- Please use the power adapter supplied with the product.;
- There is no need to wait until the battery is fully depleted before charging; charge it at any time as needed.;
- Do not charge the battery if the ambient temperature is too high (above 45°C) or too low (below 0°C).;
- If the device will not be used for an extended period, it is recommended to fully charge the battery every 3 months. Over-discharging may reduce the battery's full charge capacity.

2.5 Installing the Wrist Strap

Align the upper part of the wrist strap with the two mounting holes on the back of the device, then tighten the screws with a screwdriver. Fasten the other end to the strap hole at the bottom of the device. Refer to Figure 2-2 for the installed appearance.



Figure 2-2

Chapter 3 Data Transfer

3.1 Data Transfer Connection Methods

3.1.1 P9V USB File Transfer Method

- (1) Connect the P9V to the computer using a data cable.
- (2) On the P9V controller, swipe down the notification bar, tap to open USB Preferences, and select File Transfer.
- (3) On the computer, a P9V drive will appear in This PC; open it to transfer data.



Figure 3-1

3.1.2 Bluetooth Data Transfer Method

Steps for data transfer via Bluetooth between Windows 10 and the P9V controller:

- (1) On the P9V, select the file, tap the three-dot icon in the upper right corner, choose Bluetooth as the sending method, and tap Send.
- (2) On the computer, open the Bluetooth File Received dialog box.
- (3) When the target computer is found during Bluetooth device searching on the P9V, select the corresponding device.
- (4) The file transfer will start immediately. You can set the save path after the transfer is completed.

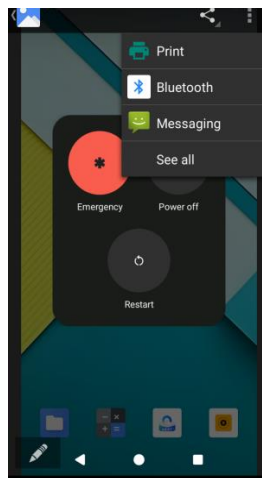


Figure3-2

Steps for data transfer via Bluetooth between Windows 7 and P9V:

- (1) Search for Bluetooth in the computer Start menu, then click Change Bluetooth settings and configure as follows:
- (2) On the P9V, select the file, tap the three-dot icon in the lower left corner, select Bluetooth as the sending method, and tap Send.
- (3) When the P9V finds the target computer via Bluetooth device search, tap the corresponding device.;

3.2 Data File Path

- a. The directory of the SurPad folder is File > SurPad.
- b. The folder for SurPad project files is File Manager > SurPad > Project.
- c. The centralized location for SurPad exported data is File Manager > SurPad > Export.

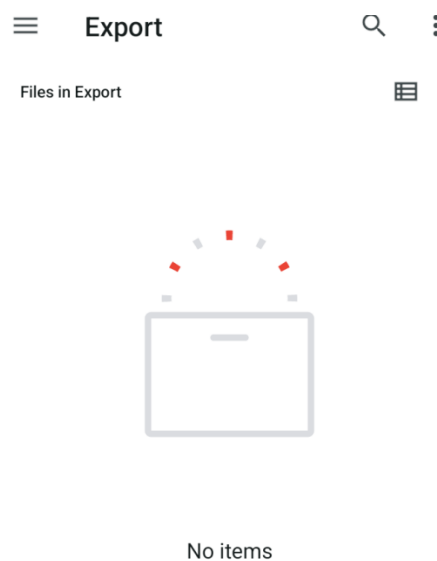


Figure3-10

3.3 File Copy and Paste

3.3.1 Copy

Open the data file directory, long press and select the file, as shown in Figure 3-11.

3.3.2 Paste

Tap "Copy to", select the target directory, and tap Copy to complete pasting, as shown in Figure 3-12.

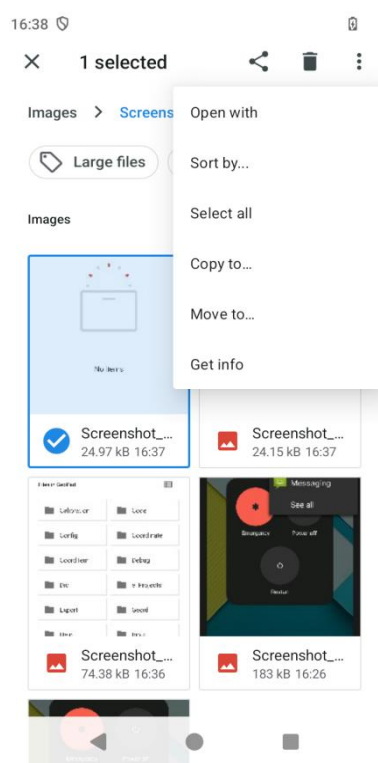


Figure 3-11

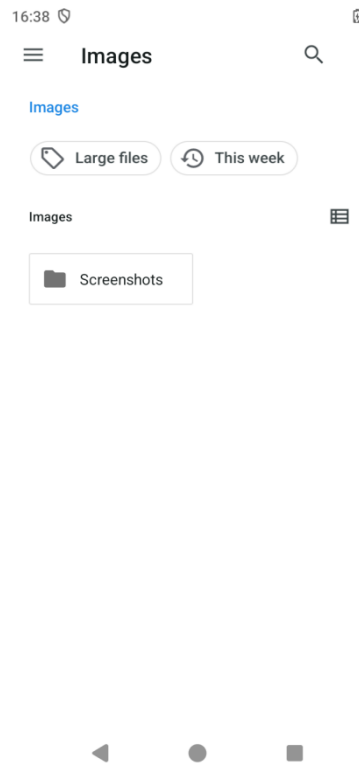


Figure 3-12

3.4 Enable Developer Debugging Options

If your P9V needs to enable developer debugging options, perform the following operations:

- (1) Enter the system Settings menu, find About Phone at the bottom, and tap to enter About Phone.
- (2) Find Build Number at the bottom and tap it 7 times consecutively to automatically enable developer options.

(3) Return to the system Settings menu, enter the System menu, tap Advanced, then tap Developer Options, where you can configure developer debugging settings.

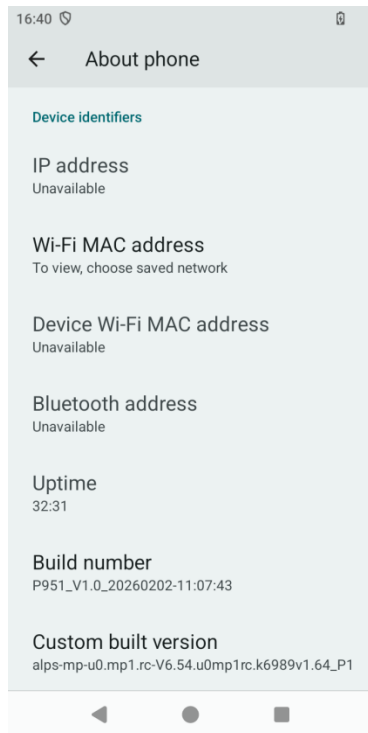


Figure 3-13

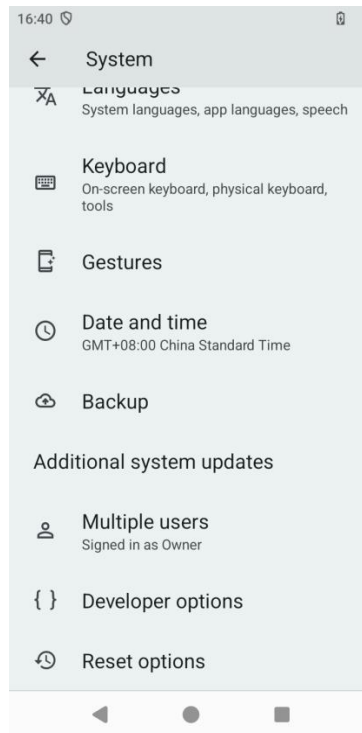


Figure 3-14

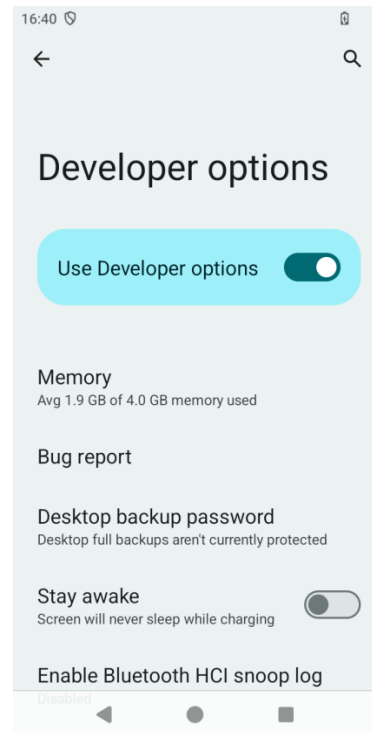


Figure 3-15

Chapter 4 Brief Description of the Operating System

4.1 System Main Interface and Start Menu

Press and hold the power button to turn on the device, and the lock screen will appear as shown in Figure 4-1. Swipe up on the screen to unlock and enter the home screen, as shown in Figure 4-2.



Figure4-1



Figure4-2

Swipe up on the home screen to enter the app interface (Figure 4-3), where you can swipe up and down to view all installed applications. Press and hold the app icon until it lifts, then drag the icon to move it to your desired position.

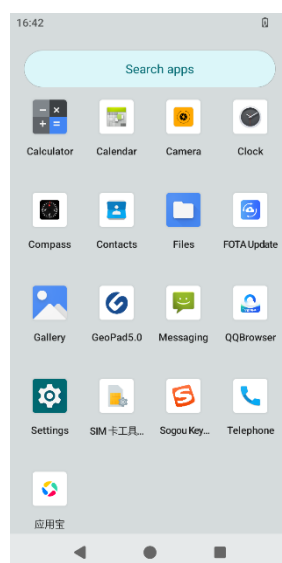


Figure4-3

4.2 Status Indicator

Status indicators appear in the title bar at the top of the screen. Users can view current device settings such as time, battery level, SIM card status, WIFI, Bluetooth, airplane mode, etc.

4.3 Pre-installed Applications

The device comes pre-installed with some basic applications, such as Email, Calendar, Sogou Input Method, etc., to ensure basic user operation.

4.4 Interact with the Device

Interact with the handheld device by tapping items on the touch screen or scrolling up and down with your finger.

4.5 Input Method

4.5.1 Physical Keyboard Input Method

Users can input information via the physical keyboard at the bottom of the device screen. Short press the Shift key to switch between Chinese and English input methods. Long press the Shift key to switch the Fn function keys in the numeric area or switch between uppercase and lowercase English letters.

The notification bar displays the current input type.

4.5.2 Other Input Methods

The device supports the installation of third-party input methods. Users may install other input methods as needed. During text input, users can freely switch input methods via the keyboard icon in the lower-left corner of the screen, as shown in Figure 4-4.

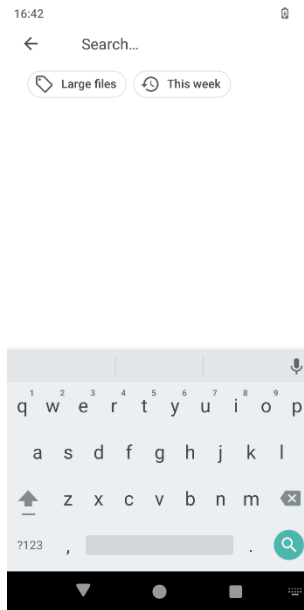


Figure4-4

4.6 Settings

After entering the Settings page, users can view and configure Network & Internet, Connected devices, Buttons, Apps & notifications, Battery, Display, Sound, Storage, Security & location, Accounts, Accessibility, System, and About phone.

4.6.1 Network & Internet

Users can view and configure WLAN, mobile network, hotspot, SIM card, airplane mode, VPN, etc. here, as shown in Figure 4-5.

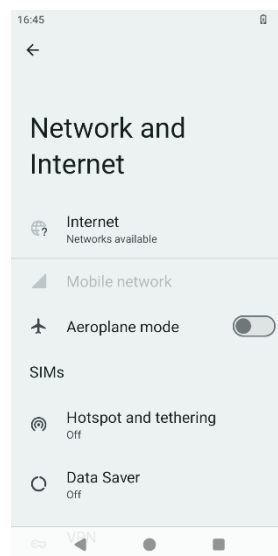


Figure 4-5

4.6.2 Connected Devices

Users can view and configure connected devices, devices to be connected, and connection preferences here, as shown in Figure 4-6.

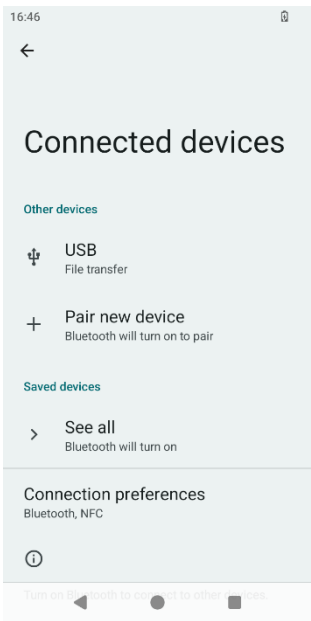


Figure 4-6

4.6.3 buttons

Users can customize the custom buttons here, as shown in Figure 4-7.

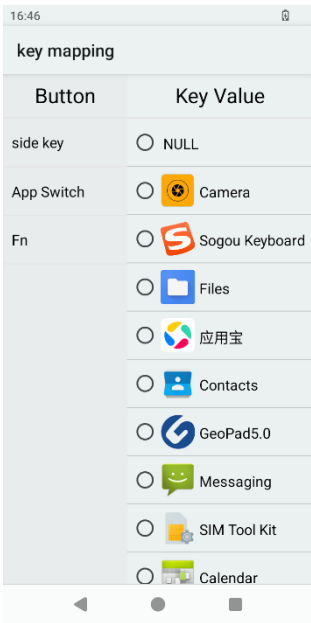


Figure 4-7



4.6.4 Apps & Notifications

Users can view and manage applications and notifications here, as shown in Figure 4-8.

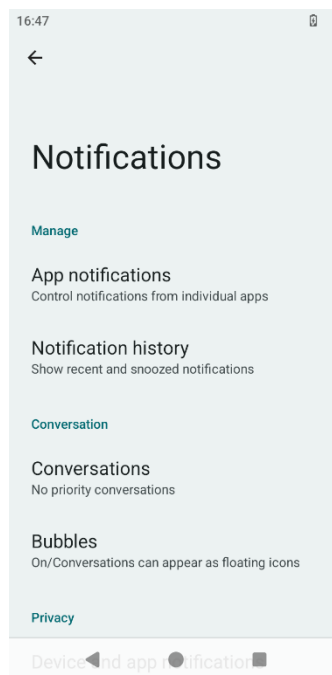


Figure 4-8

4.6.5 battery

Users can view and manage battery status, modes and display here, as shown in Figure 4-9.



Figure 4-9

4.6.6 Display

Users can view and configure screen brightness, night mode, wallpaper, sleep timeout, display size, screen saver, etc. here, as shown in Figure 4-10.

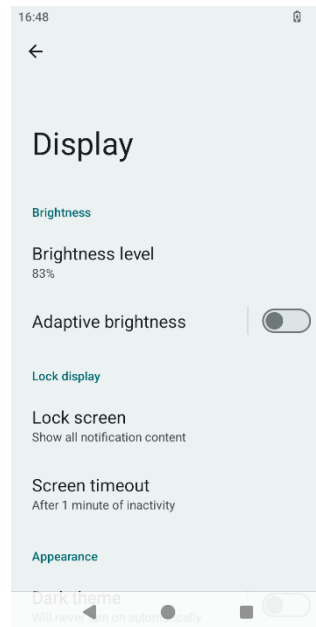


Figure 4-10

4.6.7 Sound

Users can view and configure volume, ring mode, ringtone, notification tones, vibration, etc. here, as shown in Figure 4-11.

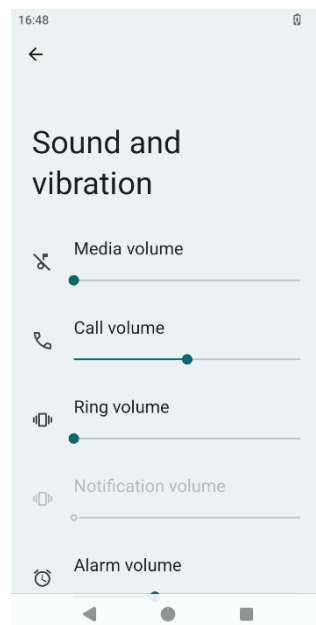


Figure 4-11

4.6.8 Storage

Users can view and manage the device storage status here, as shown in Figure 4-12.

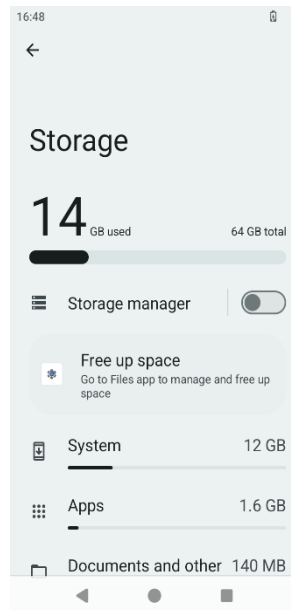


Figure 4-12

4.6.9 Security & Location

Users can view and configure location information usage and security settings of the device here, as shown in Figure 4-13.

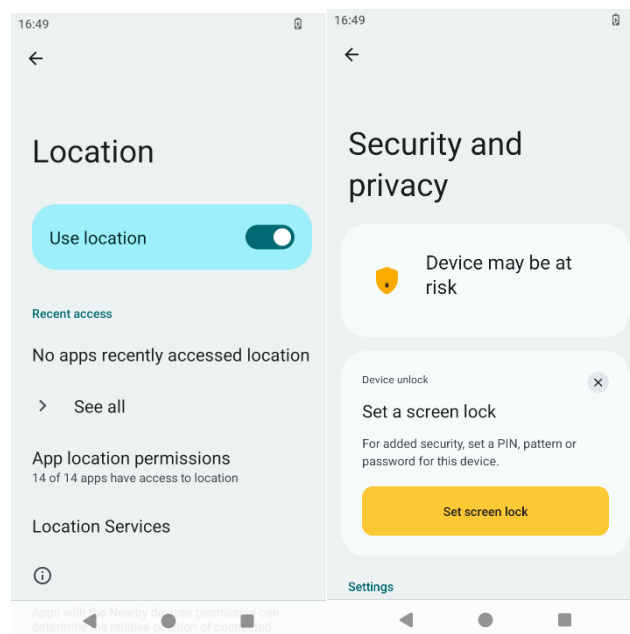


Figure 4-13

4.6.10 Accounts

Users can view and manage account information for various applications here, as shown in Figure 4-14.

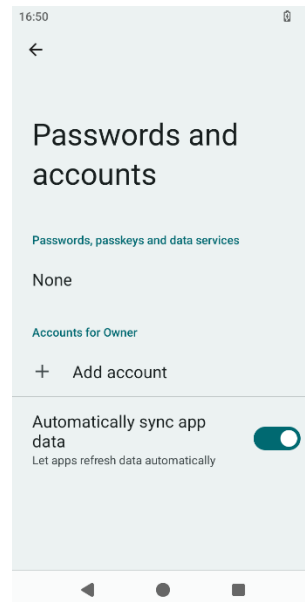


Figure 4-14

4.6.11 Accessibility

Users can view and configure accessibility features here, as shown in Figure 4-15.

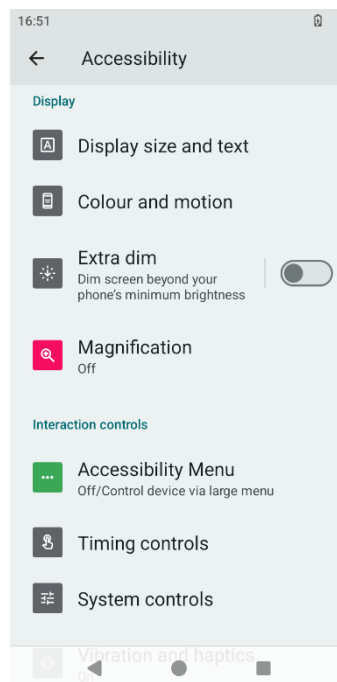


Figure 4-15

4.6.12 System

Users can view and manage system language & input method, gestures, date & time, backup, reset, multiple users and other settings here, as shown in Figure 4-16.

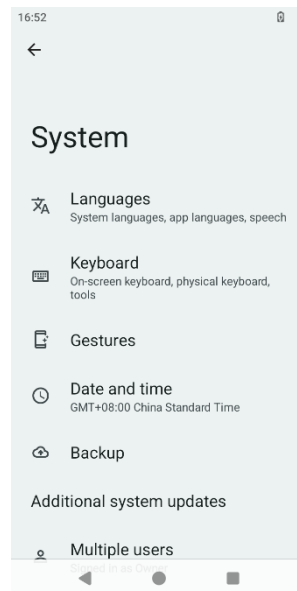


Figure 4-16

4.6.13 About Phone

Users can view the device status here, as shown in Figure 4-17.

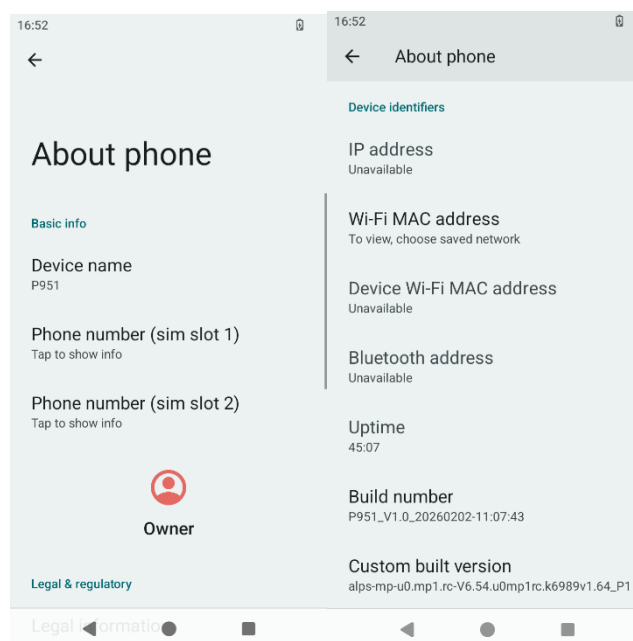


Figure4-17

Chapter 5 Software Operations

In addition to the programs pre-installed on the device, you can also install the software you need on it.

5.1 Software Installation

5.1.1 Local Installation

- (1) Download the required software or save it to the local device via other transfer methods.
- (2) Locate the installation package in the device file manager, tap it to start installation, and follow the on-screen instructions. The installation path is system default.

5.1.2 Installation via App Market

Install the desired software directly using an app market (such as 360 Mobile Assistant).

Note: If the system prompts you to restart the device after successful installation, follow the instructions accordingly.

Tap Settings → Device → Apps. On the Downloaded tab, select the software to be uninstalled and tap Uninstall to complete the operation.

Alternatively, drag the app icon directly on the app interface to the Uninstall label in the upper-right corner to uninstall it.

5.2 System Firmware Upgrade

When connected to the network, the controller will automatically send an update notification if a new system firmware version is available.

To perform a system firmware upgrade, tap the System Update icon on the app interface. Two methods are available for users to choose from.

5.2.1 Online Upgrade

When connected to the network, tap Check for Updates. If a new update is available, follow the prompts to perform the system upgrade.

5.2.2 SD Card Upgrade

Insert the SD card containing the upgrade package into the controller, tap Upgrade from SD Card, locate the required upgrade package in File Manager, and follow the prompts to perform the system upgrade, as shown in Figure 5-1.

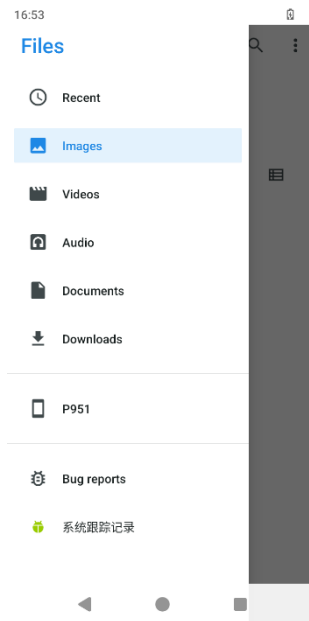


Figure 5-1

Chapter 6 Troubleshooting and Product Maintenance

This chapter provides solutions to common problems encountered during product use and introduces some maintenance rules. Please contact relevant technical personnel if you have any questions.

6.1 Troubleshooting

Problem	Solution
Cannot Power On	The remaining battery power may be too low to start up and operate. Please charge the battery. If the battery is extremely low, a pre-charge of approximately 30 minutes is required before the indicator lights up.
Slow Screen Response	Please ensure the battery is not low. If the problem persists, reset the device.
Screen Completely Unresponsive	Please reset the device.
Cannot connect to a computer via USB	Before establishing a connection, ensure both the device and the desktop computer are powered on.
	Check that the cable is securely connected to the desktop computer and the TYPE-C port of the device.
	Restart both devices and reconnect the cable. Unplug the cable before restarting.
Insufficient memory warning message appears	Delete unnecessary files.
	Uninstall unnecessary applications.
	Stop unused programs. To view running programs, long press the Home key to display active applications.
	Please reset the device.

6.2 Product Maintenance

Proper maintenance of this product ensures normal operation and reduces the risk of product damage:

- Do not place the product in high-temperature or high-humidity environments;
- Avoid prolonged exposure to strong light or ultraviolet radiation;
- Do not drop the product or subject it to severe impact;
- Do not disassemble, repair or modify the product without authorization;
- Do not store or carry the product with flammable, explosive or corrosive substances;

Note: For the P9V Controller, if any performance failure occurs within the warranty period, the consumer may contact the local dealer for after-sales service.

Appendix 1 P9V Product Specifications

1 Product Rendering



产品尺寸: 231*85-21

Figure1 P9V Product Rendering

2 Product Technical Specifications

2.1 General Technical Specifications Overview

Product Type	Chinese Version	Global Version
Bluetooth	BT5.0 BLE	BT5.0 BLE
WiFi	802.11 a/b/g/n/ac	802.11 a/b/g/n/ac
Network	4G Full Netcom, supporting China Mobile, China Unicom and China Telecom	4G Full Netcom, supporting China Mobile, China Unicom and China Telecom
SIM Card Slot	Nano SIM	Nano SIM



TF Card Slot	Supports MicroSD expansion, maximum up to 512GB	Supports MicroSD expansion, maximum up to 512GB
RAM	4GB	4GB
ROM	64GB	64GB
NFC	Support	Support
Indicator Light	One tri-color indicator for charging status	One tri-color indicator for charging status
Buttons	T9 numeric keypad (numeric keys and function keys) and side keys	T9 numeric keypad (numeric keys and function keys) and side keys
3D Accelerometer	Support	Support
Geomagnetic Sensor	Support	Support
Gyroscope	Support	Support
Camera	Rear 13MP camera with flash	Rear 13MP camera with flash
GNSS	GPS/A-GPS, GLONASS, BDS, Galileo	GPS/A-GPS, GLONASS, BDS, Galileo
	Single-point positioning, no raw data output	Single-point positioning, no raw data output

2.2 Detailed Technical Specifications

2.2.1 Physical Characteristics

Dimensions	231*85*21
Weight	To be determined
Operating Temperature	-25 °C to +65 °C
Storage Temperature	-30°C to +70°C
Waterproof and dustproof rating	IP68
Humidity	5% – 95%, non-condensing
Drop resistance	1.5 m drop resistance

2.2.2 System Platform

Operating System	Chinese version: Android 14, 8-core 2.0 GHz	Global version: Android 14, 8-core 2.0 GHz
RAM	4GB	
Storage	64GB	
External Storage	Up to 512 GB supported	

2.2.3 Interface & Communication

Display	6.0-inch HD touch screen、1440*720、550nit	
Connector	Standard Type-C for charging and data transfer, supports OTG upgrade	
Communication	Bluetooth: 5.0 BLE WiFi: 2.4G/5G, 802.11 ac/a/b/g/n	
Network	Chinese version: GSM: 850/900/1800/1900 WCDMA: B1/B5/B4/B8 LTE-TDD: B34/B38/B39/B40/B41 LTE- FDD:B1/B3//B4/B5/B7/B8/B20/B28/B66	Global version: GSM: 850/900/1800/1900 WCDMA: B1/B2/B4/B5/B8 LTE-TDD: B34/B38/39/B40/B41 LTE-FDD:B1/B2/B3/B4/B5/B7/B8/B12 /B13/B17/B20/B25/B26/B28/B66
Other Interfaces	External memory card slot External SIM card slot	

2.2.4 Power Specifications

Built-in battery	8000mAh
Input Voltage	To be determined
Adapter	Type-C PD 适配器
Working time	12hours

2.2.5 Function Key Definition



No.	Key	Definition & Description	
1(Numeric Key) 2 (FN Key)	Numeric Key	Enter numbers	
	FN	Switches between numbers and letters when using the physical keyboard FN input mode, and toggles among Chinese, numbers, and letters in Chinese input mode.	
	Special function keys (functions indicated by the orange icons when Fn is locked)	Voice function (marked with the orange icon on the "1" key)	Enables voice input and allows Surpad to execute certain voice commands.
		Camera function (marked with the orange icon on the "2" key)	Can activate the camera function.
		Screenshot function (marked with the orange icon on the "3" key)	Allows quick screenshot capture.
		F1-F5	User-defined function key
3	Survey Key	When the Surpad interface is not active, pressing this key opens or switches to the Surpad interface (the displayed interface corresponds to the software version). When on the Surpad interface, this key functions as a collection key.	
4	Directional	Moves up, down, left and right on the screen or in menus. In function mode, the up and down keys control the volume.	

	keys	In function mode, the left and right keys control the screen brightness.
5	Back Key	Returns to the previous interface.
6	Enter key	Confirm / Line break. When on the Surpad interface and in non-input state, it acts as the collection key.
7	Undo key	Deletes one character backward in the character input field.
8	Tab Key	Tab Key
9	Shift Key	Switches between lowercase and uppercase letters when using the physical keyboard input method.
10	Power key	Power on / off

FCC warning statements:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Caution: Any changes or modifications to this device not explicitly approved by manufacturer could void your authority to operate this equipment.

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

The device has been evaluated to meet general RF exposure requirement.