Multi-purpose Camera Tester

User Manual

- Thank you for purchasing the multi-purpose camera tester. Please read the manual before using the multi-purpose camera tester and use properly.
- For using the multi-purpose camera tester safely, please first read the「Safety Information」carefully in the manual.
- The manual should be kept well in case of reference.
- Keep the S/N label for after-sale service within warranty period. Product without S/N label will be charged for repair service.
- If there is any question or problem while using the multi-purpose camera tester, or damages occurred on the product, please contact our technical Department.

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1. Safety information

The tester is intended to use in compliance with the local rules of the electrical usage and avoid to apply at the places which are inapplicable for the use of electrics such as hospital, gas station etc.

◆ To prevent the functional decline or failure, the product should not be sprinkled or damped.

◆ The exposed part of the tester should not be touched by the dust and liquid.

◆ During transportation and use, it is highly recommended to avoid the violent collision and vibration of the tester, lest damaging components and causing failure.

◆Don't leave the tester alone while charging and recharging. If the battery is found severely hot, the tester should be powered off from the electric source at once. The tester should not be charged over 8 hours.

◆ Don't use the tester where the humidity is high. Once the tester is damp, power off immediately and move away other connected cables.

◆ The tester should not be used in the environment with the flammable gas.

◆ Do not disassemble the instrument since no component inside can be repaired by the user. If the disassembly is necessary indeed, please contact with the technician of our company.

◆ The instrument should not be used under the environment with strong electromagnetic interference.

◆ Don't touch the tester with wet hands or waterish things.

◆ Don't use the detergent to clean and the dry cloth is suggested to use. If the dirt is not easy to remove, the soft cloth with water or neutral detergent can be used. But the cloth should be tweaked sufficiently.

2. Multi-purpose Camera Tester Introduction

2.1 General

The 4.3 inch touch screen multi-purpose camera monitor and tester is designed for maintenance and installation of IP camera and analog camera as well as other security equipments , 800x480 resolution enables it to display network HD cameras and analog cameras in high resolution. The unit supports many ONVIF PTZ and analog PTZ control. The combination of touch screen and key buttons make the IP camera tester very user- friendly.

The tester is also a great tool for Ethernet network testing. It can test PoE power voltage, PING, and IP address searching. You can use the blue cable tracer to locate individual connected cables from a bundle of cables. Test LAN cable for proper connection termination. Other functions include providing 24W PoE power to your camera, LED Flashlight, DC 12V 2A power output and much more. Its portability, user-friendly design and many other functions make the multi-purpose tester an essential tool for all installers or technicians.

2.2 Features

- ✧ 4.3inch 800×480 touch screen, easy to operate.
- ✧ IP discovery, auto-scan the IP camera address and modify tester's IP address
- ✧ Rapid ONVIF, search camera quickly, auto log in and display image from the camera, activate Hikvision camera.
- ✧ NVMS7000 app is design for activating and debugging LTS camera, can auto-identify unactivated hikvision camera, also can display image from the LTS camera.
- ✧ Hik test tool app is design for activating and debugging Hikvision camera, can auto-identify unactivated hikvision camera, also can display image from the Hikvision camera.
- ✧ DH test tool app is design for Dahua Camera test, and modify IP, user name and password parameters etc
- ✧ ONVIF IP camera video testing
- ✧ Compatible with H.264/MPEG4/MJPEG IP cameras, such as Dahua, HIKVISION, and ACTI Customized service is available.

- ✧ Built in Wi-Fi, can receive image from wireless camera, as well as ONVIF and customized IP cameras.
- ✧ HD CVI camera image display, zoom ,video record and playback ,coaxial PTZ control and call camera OSD menu
- ✧ HD TVI camera image display, zoom ,video record and playback ,coaxial PTZ control and call camera OSD menu
- ✧ AHD camera image display, zoom ,video record and playback ,coaxial PTZ control and call camera OSD menu
- ✧ HDMI signal output, support 1080P
- ✧ Analog camera image display, Auto adapt and display the video format of NTSC/PAL
- ✧ Support more than 30 protocols ,such as PELCO-P,PELCO-D,SAMSUNG etc
- ✧ Video image digital zoom to view the image in greater detail.
- ✧ Snapshot function allows you to save the current image as a JPG file in the SD card.
- ✧ LED Flashlight.
- ✧ 4GB Micro SD card included.
- ✧ LCD screen brightness/contrast/color Saturation adjustable
- ✧ Enhanced Color bar generator, PAL/NTSC multi-system color bar video generator (Eight-system switchable, transmit/receive eight-system colorful images).
- ✧ Ping test, PING is the most conventional network debugging tools; it is used for testing if the connected IP camera or other network equipment's Ethernet port is working normally and the IP address is correct.
- ✧ In digital IP surveillance applications, if the IP camera's IP address is not known; the device cannot be used. An IP address scan can quickly search for the connected IP camera or other network device's IP address.
- ✧ The PoE voltage test can test for PoE voltage when a POE switch is supplying POE power to an IP camera
- ✧ Cable test , Test LAN cable or telephone cable,UTP cable etc ,cable type and the sequence of

wires will be displayed

- ✧ Support RS232/RS485,Rate 600 ～ 115200bps adjustable
- ✧ PTZ protocol analysis, control protocol command displays to check RS485 transmission whether is normal, easy to find the fault device
- ✧ PTZ control. Pan/tilts the P/T unit, zooms in/out the lens, adjusts the focus, aperture and sets and the preset position
- ✧ DC12V 2A output power for camera
- ✧ PoE 24W power output,supply temporary power for PoE camera
- ✧ DC5V 2A power output,as a power bank
- ✧ Audio input and output, test and output the audio signal
- ✧ 7.4V 48.1Wh Battery. Remaining battery charge indicator, Lithium Ion Polymer Battery can last 16 hours for normal use after charging for 8 hours

2.3 Function

2.3.1 Touch screen and OSD menu

The multi-purpose camera tester combines touch screen control and physical buttons. This combination makes the tester very user friendly. The test meter allows you to move the function icons from the tester's main menu to the APPS folder or move them back to customize the main menu

2.3.2 IP discovery

IP discovery, it can auto-scan the whole network segment IP, and auto-modify tester's IP address

2.3.3 Rapid ONVIF

Rapid ONVIF, search camera quickly, auto log in and display image from the camera, activate Hikvision camera.

2.3.4 NVMS7000 test tool

LTS test tool app is design for LTS Camera image test, modify IP, user name and password parameters etc

2.3.5 Hik test tool

Hik test tool app is design for activating and debugging Hikvision camera, can auto-identify unactivated hikvision camera, also can display image from the Hikvision camera.

2.3.6 DH test tool

DH test tool app is design for Dahua Camera image test, modify IP, user name and password parameters etc

2.3.7 WIFI

With built in WIFI, you can view the video from a wireless camera (ONVIF or customized camera) or

connect to a Wireless network.

2.3.8 IP camera test

The device is designed for ONVIF IP camera testing. It can display the image from an 4M IP camera and change the IP address. 4.3 inch 800×480 screen display allows the user to view the image with a sufficient screen size.

With the ONVIF tool, you can display the image from an IP camera and use the PTZ functions. Currently the IP camera tester supports more than 70 brands' IP cameras, such as most, ACTi, Dahua, Hikvision, Samsung, Honeywell and many more.

OEM service is available. Users can send us the IP camera for our engineers try to add the protocols to the tester, or send us the mobile apps (Android version. APK files) to install in the tester.

2.3.9 CVI camera test

HD CVI video surveillance testing, support 720p 25,30,50,60fps / 1080p 25,30fps camera image test and video image zoom, record, snapshot, photo viewer, video playback, coaxial PTZ control and call up the camera OSD menu

2.3.10 TVI camera test

HD TVI video surveillance testing, support 720p 25,30,50,60fps / 1080p 25,30fps, 3MP/5MP TVI camera image test and video image zoom, record, snapshot, photo viewer, video playback, coaxial PTZ control and call up the camera OSD menu.

2.3.11 AHD camera test

AHD video surveillance testing, support 720p 25,30fps / 1080p 25,30fps camera image test and video image zoom, record, snapshot, photo viewer, video playback, coaxial PTZ control and call up the camera OSD menu.

2.3.12 HDMI signal output

The HDMI output port supports up to a 1080p 60Hz resolution output.

2.3.13 Analog camera test

Display analog camera image ,4.3 inch 800×480 LCD screen display , supports PAL & NTSC formats. The LCD screen's back light brightness, video image brightness, contrast and color saturation are all adjustable.

2.3.14 PTZ controller

Displays and allows for analysis of analog video and controls Pan/tilt/zoom function of PTZ analog cameras. For PTZ testing, setup the controlling parameters from the meter to match those of the camera: e.g. PTZ protocol (PELCO-D, etc.), communication port (RS-485, etc.), baud rate, PTZ camera ID and pan/tilt speed.

2.3.15 Enhanced Color bar generator

The tester sends out color bars via its BNC output to the monitor. This is used to test for a problem in the cable going from the camera back to the monitoring area

2.3.16 DC 12V 2A power output port and 5VDC 2A USB power port

The unit can power a camera with its 12V DC 2A power output. Also included is a built in 5V DC 2A power output port used to charge USB devices. NOTE: This USB port is for charging only and has no ability to transfer data.

2.3.17 PoE power supply

Supports PoE 802.3at power at 48V and up to 24W.

2.3.18 Audio testing

Test the audio from mic level input devices. Connect the tester and mic level device with the audio cable. Supports audio recording and output. to monitor and / or record audio.

2.3.19 PTZ data analysis

Search the Control protocol code from Multifunction keyboard or DVR by RS485 /RS232 interface, test the PTZ control command data whether received anomaly and RS485/RS232 data transmission.

Screen displays 16 hexadecimal codes such as

PELCO-P:A0 00（Add） xx xxxxxx AF xx

PELCO-D:FF 01（Add）xx xxxxxxxx

2.3.20 Digital Image zooms on the monitor

Set image zoom up to 4X to get a closer look at all the image detail. Supports analog and many IP cameras

2.3.21 Video screenshot

Capture the video image displayed , and save as JPEG file in the SD card.

2.3.22 Record

Capture and save the current video in the SD card.

2.3.23 Playback

The recorded files can play directly via Media player or under the function of “Playback”.

2.3.24 DHCP dynamic address assignment

Built in DHCP server: Dynamically assign IP address for the IP camera or network device.

2.3.25 Access the dynamic IP address

The Multi-purpose tester can directly access a dynamic IP address assigned from its DHCP server and use it as the tester’s IP address. No need to set a IP address manually.

2.3.26 Multi- segments IP Cameras Test

Support Multi- segment Static IP address setting, which can simultaneously test different segments IP network cameras.

2.3.27 Network bandwidth testing

The network bandwidth test needs two IP testers to test bandwidth: one as a transmitter, the other as a receiver.

2.3.28 IP address scan

The IP address scan can quickly search for connected IP cameras or another network device IP address.

2.3.29 PING Test

PING is the most conventional network debugging tools; It is used for testing if the connected IP camera or other network equipment's Ethernet port is working normally and the IP address is correct.

2.3.30 Port Finder

The tester will send signals to make the connected PoE port flicker at a set frequency. This will enable the installer to easily and quickly find the connected port for an Ethernet cable.

2.3.31 PoE Test

Test the PoE voltage from a PoE switch. The unit will clearly display the voltage for each wire in an Ethernet cable.

2.3.32 LED Flashlight

Press the LED On/Off button to use the LED flashlight.

2.3.33 Screen image rotates 180 degrees

You can manually rotate the display 180 degrees using the settings.

2.3.34 FTP Server

Start the tester's Wi-Fi or connect the tester's LAN port to the network. Once the tester is online, start its FTP Server and directly access files from the tester's SD card. This also allows for the user to upgrade the tester firmware.

2.4 Packing list

1). Tester

2). Adaptor DC12V 2A

3) Network cable tester

4) Polymer lithium ion battery (7.4V DC 5000mAh)

5). BNC cable

6). RS485 cable

9). Output Power cable

10). Audio cable

12). Safety cord

13). Tool bag

14). Manual

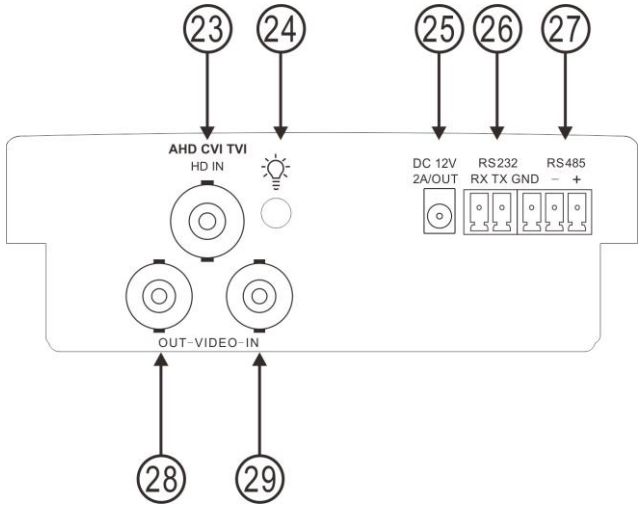
15) 8G SD card

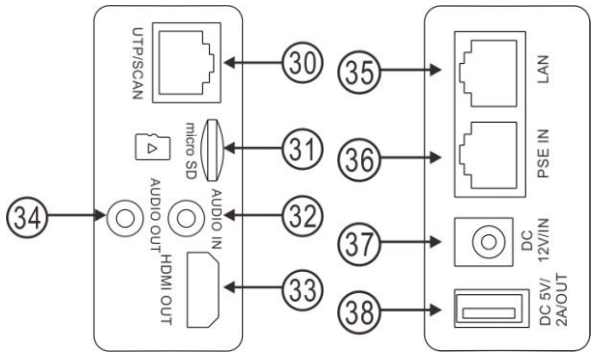
2.5 Function interface

1		Press more than 2 seconds, turn on or off the device ,short press to turn on or off the menu display
2		Set key
3		Menu key
4		Near focus: Focus the image nearby
5		Far focus: Focus the image faraway
6		TELE: zoom in the image
7		WIDE: zoom out the image
8		Open/set ,Confirm the setting of parameters, open or enlarge the aperture
9		Return/Close : Return or cancel while setting parameters of the menu, close or decrease the aperture
10		Upward, set function or add parameter. Tilt the PTZ upward
11		Rightward, select the parameter whose value will be changed. Add the value of the parameter. Pan the PTZ right
12		Confirm key
13		Leftward, select the parameter whose value will be changed
14		Downward, set function or reduce the value of the parameter. Tilt the PTZ downward
15		Snapshot
16		Video record
17		Open/set ,Confirm the setting of parameters, open or enlarge the aperture
18		Return/Close : Return or cancel while setting parameters of the menu, close or decrease the aperture
19		The power indicator: it lights green while the tester is powered on by the adapter
20		The data accepted indicator: it lights red while the data is being received

21	The RS485/RS232 data transmission indicator: it lights red while the data is being transmitted
22	The charge indicator: it lights red while the battery is being charged. As the charging is complete, the indicator turns off automatically

Top interface





Left interface Right interface

23	"HD IN" , AHD /TVI/CVI Coaxial interface
24	LED lamp
25	DC12V2A power output , for provisional DC power supply
26	RS232 Interface: RS232 communication for the PTZ
27	RS485 Interface: RS485communication for the PTZ
28	Video image signal output（BNC interface）
29	Video image signal input（BNC interface）
30	UTP cable port: UTP cable tester port
31	Micro SD card moveable, comes with 8GB, supports up to 32GB
32	Audio input
33	HDMI output interface
34	Audio and earphone output
35	PoE power supply output or LAN test port (Use to test PoE or non-PoE IP camera)
36	PSE power sourcing equipment. Tests PoE voltage

37	DC12V2A charging interface
38	5V2A USB power output , as power bank

3. Operation

3.1 Installing the Battery

The tester has built-in lithium ion polymer rechargeable battery. The battery cable inside battery cabin should be disconnected for safety during transportation!

Usually it doesn't need to disconnect the cable at the normal use

Pressing the key [⏻] continuously can power on or off the tester.

Notice:Pls use the original adaptor and connected cable of the device!

When the battery icon is full or the charge indicator turns off automatically, indicate the battery charging is completed

When the Charge Indicator [+] turns off, the battery is approximately 90% charged. The charging time can be extended for about 1 hour and the charging time within 12 hours will not damage the battery.

Notice : Press the key [⏻] several seconds to restore the default settings when the instrument works abnormally.

Multi-meter: the red and black multi-meter pen must insert the corresponding port.

Warnings:Instrument communication port is not permitted access circuit voltage over 6V, otherwise damage the tester.

3.2 Instrument connection

3.2.1 IP camera connection

Power an IP camera with an independent power supply, then connect the IP camera to the multi-purpose tester's LAN port, if the link indicator of the tester's LAN port is green and the data indicator flickers, it means the IP camera and the multi-purpose tester are communicating. If the two indicators don't flicker, check if the IP camera is powered on or the network cable is not functioning properly

Note:1) If the IP camera requires PoE power, then connect the IP camera to the multi-purpose tester'sLAN port . The tester will supply PoE Power for the IP camera. Click on the icon labeled POE to turn the PoE Power off or on.

2)If use the tester's menu to turn off the tester's PoE power supply, the PoE switch and the power sourcing equipment are allowed to connect to the tester's PSE port, and the PoE power will be supplied to the IP camera by the tester's LAN port. On this condition, the tester cannot receive data from IP camera, but the computer connected to the PoE switch can receive the data via the the tester.

Warning: PoE switch or PSE power sourcing equipment only can be connected to tester “PSE IN” port, otherwise will damage the tester.

3.2.2 Analog camera connection

(1)) Connect the camera's video output to the multi-purpose tester’s VIDEO IN. The image will display on the tester after pushing the PTZ icon

(2) Multi-purpose Tester “VIDEO OUT” interface connect to the Video input of monitor and optical video transmitter and receiver, the image display on the tester and monitor

(3) Connect the camera or the speed dome RS485 controller cable to the tester RS485 interface ,(Note positive and negative connection of the cable).Support RS232 PTZ controller ,connect the RS232cable to RS232 interface of the tester

3.2.3 HD Coaxial camera connection

CVI, TVI, AHD camera are classified as HD coaxial cameras. Hereby the following instruction of how to connect TVI camera to the tester is also applied to CVI, TVI and AHD camera.

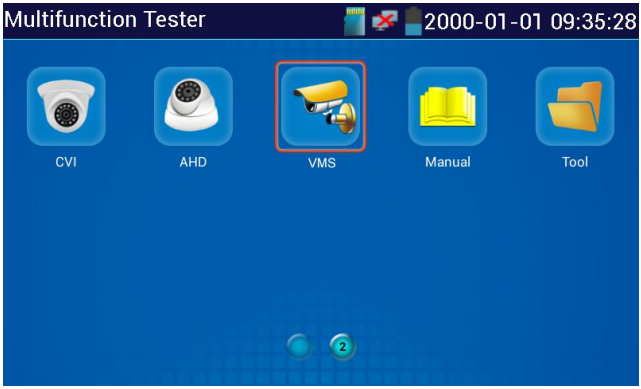
(1) Connect the TVI camera's video output to the multi-purpose tester's "TVI IN" interface, the image will display on the tester. The tester only come with TVI input interface. There is no TVI output interface.

(2) Connect the TVI camera or the speed dome RS485 controller cable to the tester RS485 interface, (Note positive and negative connection of the cable).Support RS232 PTZ controller, connect the RS232 cable to RS232 interface of the tester.

3.3 OSD menu

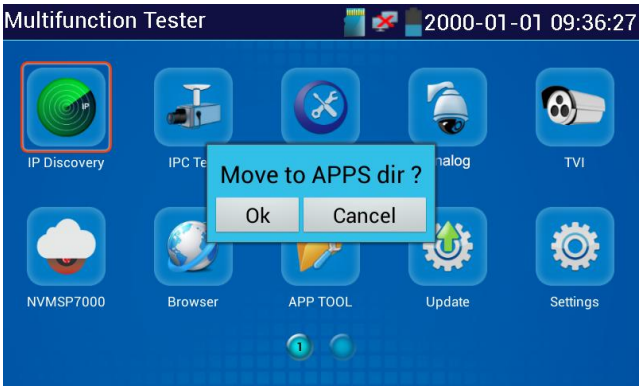
- Press the key [⏻] 2 seconds to turn on
- Press the key [⏻] 2 seconds to turn off
- short press the key [⏻] to enter sleep mode,press it again to test if tester work abnormally and cannot be turned off , Press the key [⏻] several seconds to turn off, the tester reset

Select Icons to enter, if quit, Please click



Click SD card, install or remove SD card

Press function Icons seconds, tip: whether move this icon to APPS file, if some function not be often used, can move these function icons to APPS.

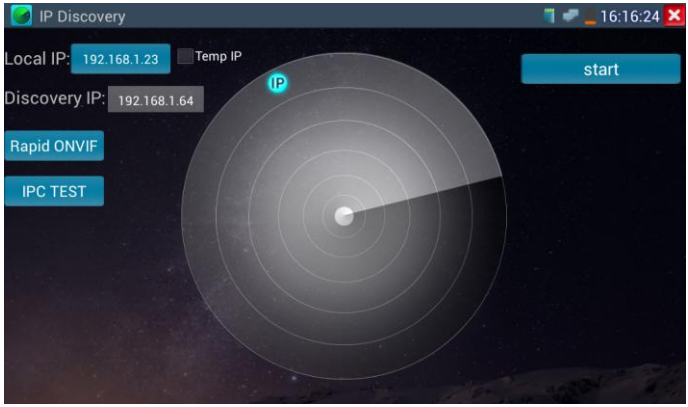


To move an app icon to the “APPS” folder, press and hold until the “move to apps directory” appears on the screen then press OK to move it or Cancel

In APPS file, Select icon and press it for seconds, tip: whether move the file to the desktop?

3.3.1 IP discovery

Press IP discovery , tester auto-scan the whole network segment IP, as well as auto-modify the tester‘s IP to the same network segment with the scanned camera's IP.



Local IP： Tester's IP address, Tester can auto-modify the tester's IP to the same network segment with the scanned camera's IP.

Discovery IP： Connected tester equipment's IP address. If the camera connected to the tester directly, tester will display the camera's IP address, if tester connects to Local Area Network, it displays the current IP address.

Temp IIP： after searching IP address, the modified tester's IP address will not be saved, if you do not select "Temp IP," the modified tester's IP address will auto-save after searching.

Start： PING function, Click "Start", can PING camera's IP,

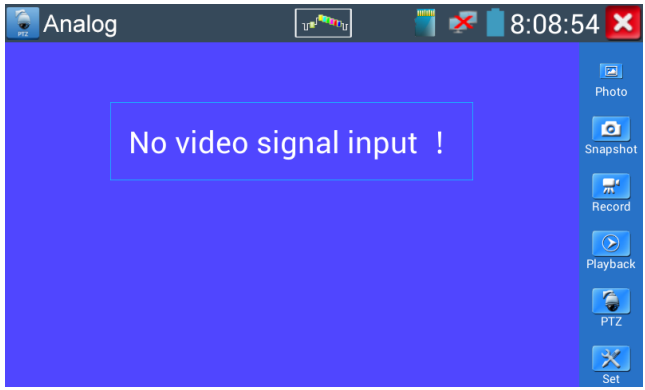
Rapid ONVIF:Rapid ONVIF Quick link

IPC TEST: IPC TEST Quick link

Applicability： Using IP discovery app ,you don't need to know the first two digits of camera's IP address , it can auto-scan the whole network segment IP, and auto-modify tester's IP address , greatly improved engineering efficiency .

3.3.2 Video monitor test (PTZ control)

Analog camera test and PTZ control, click icon to enter



Display the input video image, click the top menu bar icon to enter video level meter,

(PEAK level, SYNC level, COLOR BURST measurement)

Select relative function on the right side Toolbar to operate , functions including “Photos”, “Snapshot” ,

“Record” , “Playback” , “PTZ” , “Set” ,

Click to quit, or press back to menu.

Click the screen twice quickly, can be full zoom in on the touch screen.

(1) PTZ controller parameter setting

Select and click icon “PTZ”,to enter PTZ setting:

A. **Protocol**

Use the up and down arrow keys to move the yellow cursor to the “protocol ”, set corresponding Protocol and support more than thirty PTZ protocols. Such as Pelco-D,Samsung, Yaan, LiLin, CSR600, Panasonic, Sony-EVI etc.

B. Port

Click and move, to “port” Select the communication port for the PTZ camera controlling (RS232/485)

C. **Baud**

Move the yellow cursor to “Baud”, Select the baud rate according to baud rate of the PTZ camera.(150/300/600/1200/2400/4800/9600/19200/57600/115200)

D. Address

Set the ID according the ID of PTZ camera (0~254), the setting address data must be consistent the speed dome address.

E. Pan speed: Set the pan speed of PTZ camera (0~63)

F. Tilt speed: Set the tilt speed of PTZ camera (0~63)

G. Set preset position (Set PS)

Click and select “Set PS”, set and save preset position number(1~128),

H. Call the preset position (Go ps)

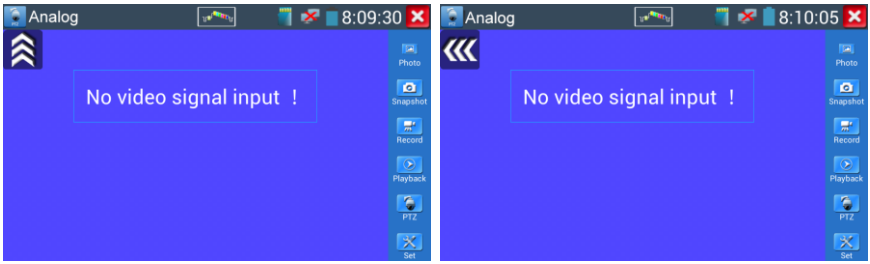
Click and select “Set PS”, set and save preset position number (1~128), click “sure” to save,

Call some special preset number, can call the dome camera menu

Check and set the protocols, address, interface and baud, all must be consistent with the dome camera, dome camera, then the IPC tester can test .After setting the parameter, the tester can control the PTZ and lens

To control PTZ by screen touch:

Tap left, right, upward and downward on the touch screen to control the PTZ rotation direction. By two fingers move outward and inward on the touch screen to zoom in and out the PTZ.

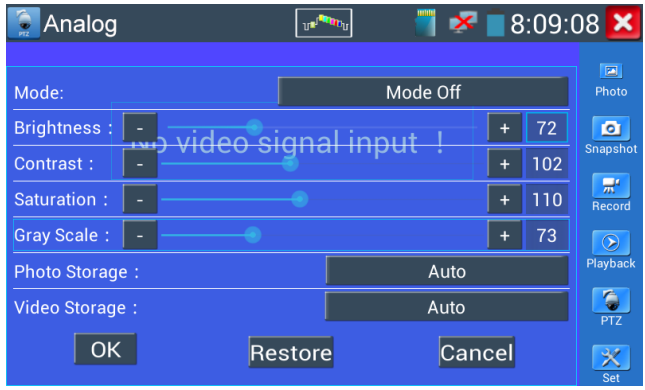


- Press the key control the PTZ direction of rotation
- Press OPEN or CLOSE to switch on or turn off the aperture.
- Press FAR+ or NEAR- adjust the focus manually
- Press TELE+ or WIDE- manually adjust the zoom

(2) Video and storage setting

Click icon “set”, to enter and set analog video image brightness, contrast, color saturation, screen snapshot, recording and storage, support Auto-storage and manual storage

When select manual storage, user can name and store the files.



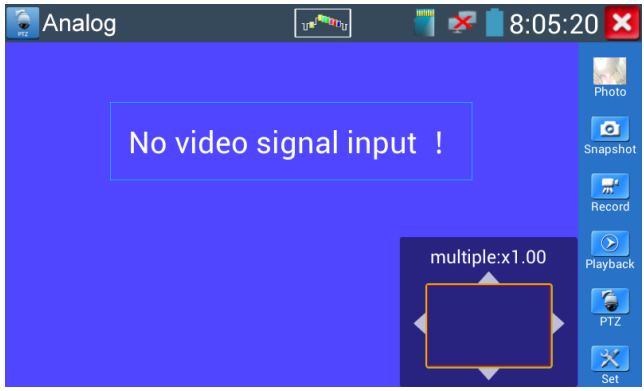
(3) 4 x zoom image display and Video out

When image input, press to enter “zoom”, press it again to quit.

Using the touch screen to control PTZ camera movement:

Tap left, right, upward or downward on the video image to move the PTZ camera in a desired direction.

Stretch two fingers outward or inward on the touch screen to zoom the image in or out.



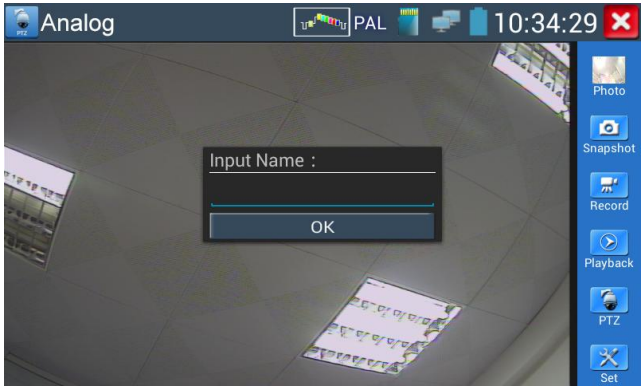
if not use touch screen to operate ,press the key TELE+ to zoom out , press the key WIDE− to zoom in, press upward and downward key to move the image

For analog video input, as the resolution is 720*480, it is normal that the zoom in image is not clear. But for network digital video input, as it supports resolution up to 1280*960, the zoom in image is still very clear. This is very helpful for IP camera installation.

(4) Snapshot

Click the icon “Snapshot “, when the video in, to snapshot and save the current video frame in the SD card as JPEG file.

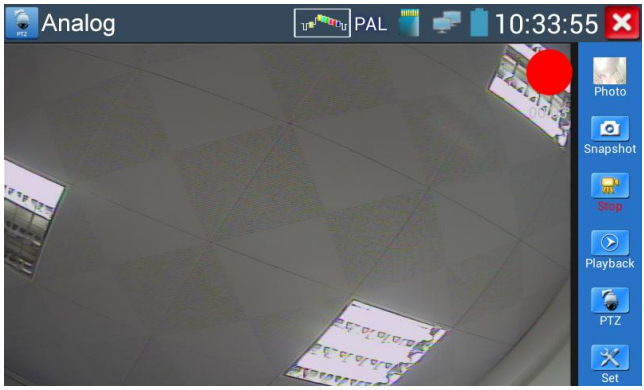
If the unit is set to the manual mode an “Input Name” pop up box will appear and you can enter a title for the snapshot. If the unit is set up to automatically set file names, this box will not pop up.



(5) Video record

When you click the “Record” icon, video starts recording. A red recording icon appears on the screen and begins to flash and a timer appears indicating the time elapsed for the video. Click on the “Record” icon again to stop recording and save the video file to the SD card.

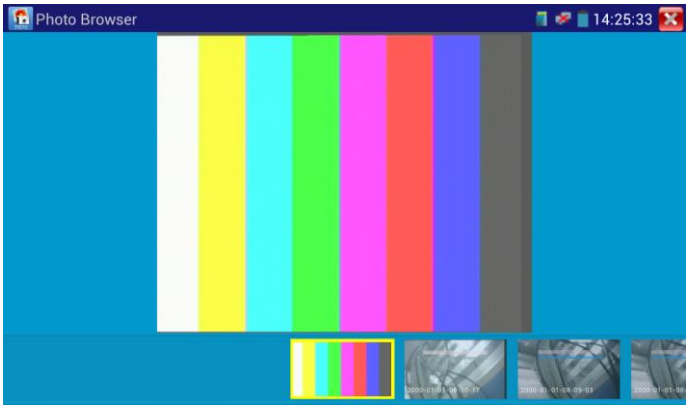
if select manual storage, before recording begins ,appears dialog box “Input Name” ,user-defined the files name(by Chinese character, English letter ,or digit) to store in SD card , tester will hereby store the files in SD card after recording ., if select “Auto-storage ”tester will auto store the files in SD card after recording .



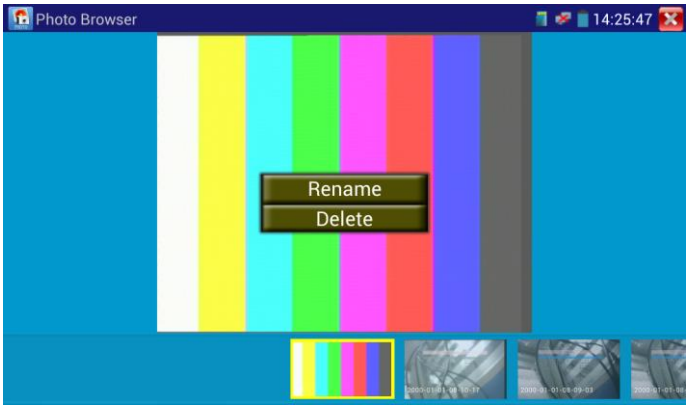
(6)Photo

Click the icon “photo” to enter, click the selected thumbnail photo to display it on the screen.

Double-click the photo to make it full display. Double-click again the photo to return.



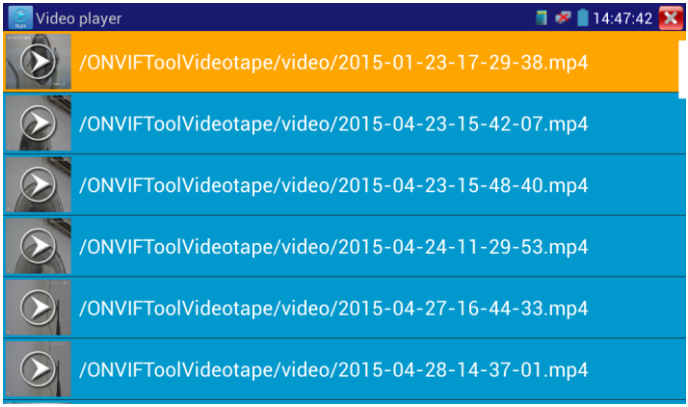
To rename or delete an image, click and hold on the file until this screen below appears



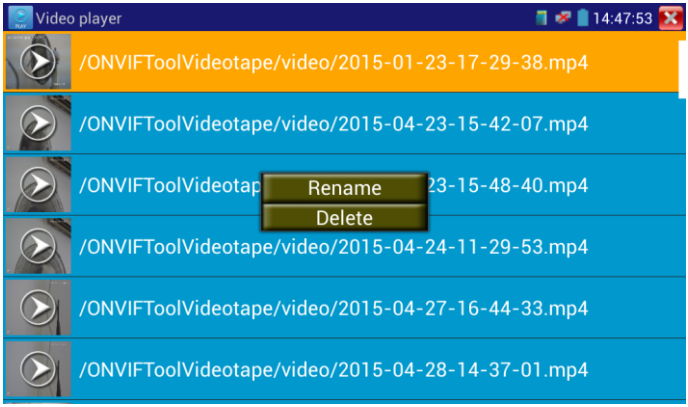
Click to close and return to PTZ controller.

(7) Recorded video playback

Click the “Playback” icon to view your recorded videos. Tap on the video file image you want to watch.



To rename or delete a video, click and hold on the file until this screen appears:



Video files also can play in the main menu “Video Player".

3.3.3 Color-bar generator (TV OUT)

Click

to enter, the tester send the color bars from the “Video out” port ,Click the icon “PAL”, select “PAL/NTSC” output formats

Click the selected color-bars, testing image or single bar (red, green, blue, white or black). Double click to full display on the screen and output, click to return main menu.

Application

A. When maintaining the dome camera, the tester sends out the color bar by its BNC output to the monitor at the monitoring center. If the monitor receive the color bar, it means the video transmit channel works normally. Meanwhile on the basis of the received color bar, the monitoring center can judge if transmission has loss or interference.

B. The tester sends out the pure color bar (such as white and black color), to test the monitor whether has bright or black dots

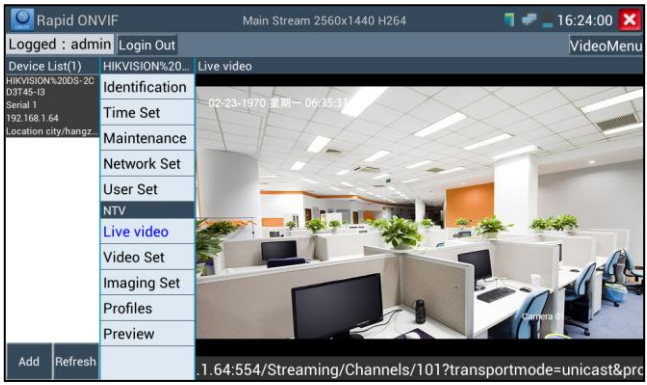
C. The tester sends out video signal image to test if the image received by the monitor has excursion.

3.3.4 ONVIF

ONVIF test with Rapid and HD mode type, while in Rapid ONVIF, tester can quickly search camera, auto log in and display image from the camera, activate Hikvision camera and modify IP . While in HD mode, the tester can fluently display the image up to 1080P.

Click icon to enter the ONVIF app. The icon of ONVIF is Rapid mode，The icon of HD ONVIF is HD mode.

If you select ONVIF Rapid mode, the meter automatically scan different network segments for ONVIF cameras. It lists the camera name and IP address on the Device List. Tester can auto login camera and display camera image.

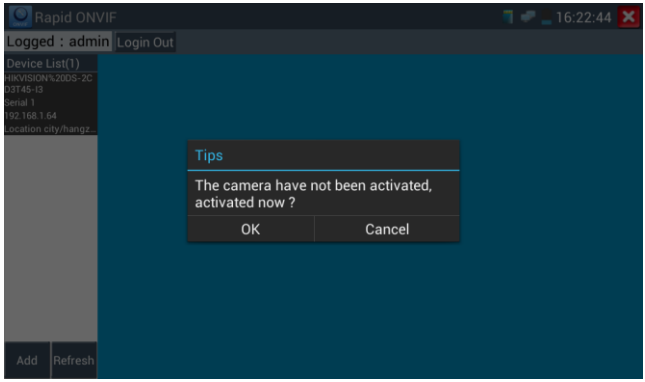


If your IP camera does not appear after scanning the network, you can manually add an IP camera by clicking on the “Add” button on the bottom left. The URL address should be identical to the ONVIF camera service address. (With your camera’s IP address entered into the URL). Click OK to add the manually entered camera and then click the “Refresh” button.

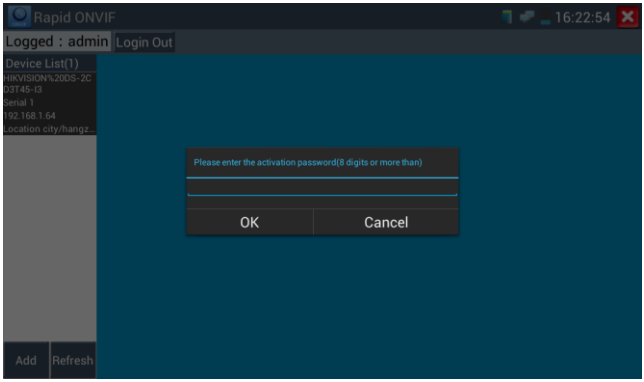
Click the button “Refresh”, tester will scan the ONVIF camera again.

Click the newly displayed ONVIF camera on the “Device List“. The tester will show the IP camera’s relative information and settings.

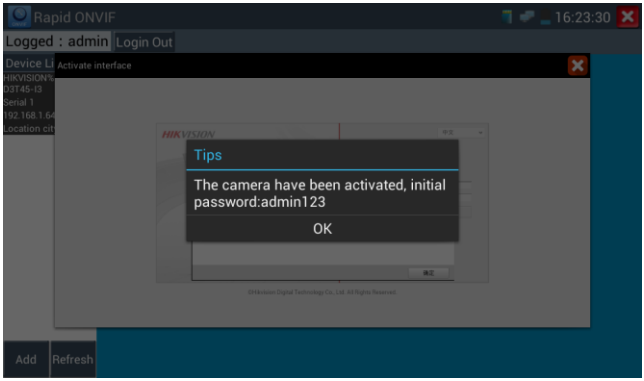
Activate HIKVISION Camera : while in Rapid mode, tester can auto recognized unactivated HIKVISION Camera, And prompt "The camera is not active, you need to activate it", click "OK" to start activate .



Enter a new password for the camera

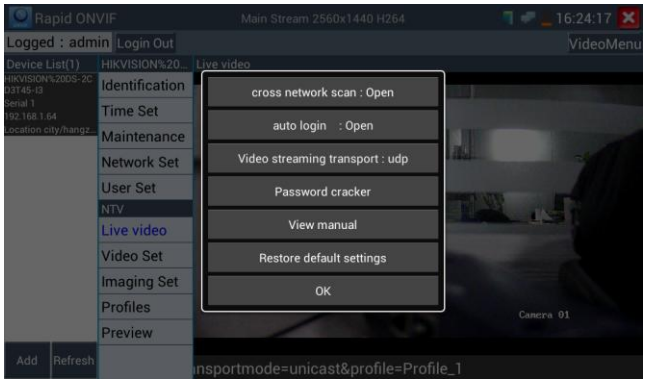


clicking “OK” after appears the Activation link, Confirm the activation password again, click “OK”to complete the activation.



Back to Rapid ONVIF function, click log in to display the camera image ,the activation of HIKVISION Camera was completed .

Pop-up settings menu when click the icon of the upper left corner



Across network segments scan: After open this function , enter “Setting”-“IP Settings”-“Advanced”to add other network segments IP, Rapid ONVIF function can across network segments to scan camera’s IP .

Auto Login : After open this function, tester can auto login camera and display camera image (The login password is the same with last time, the first time using password is the default password "admin")

Video transmission protocol: UTP and TCP protocol

Open password cracker : Cracks password of cameras

View manual : Open Manual

Restore Defaults: Revert “Rapid ONVIF” to default settings

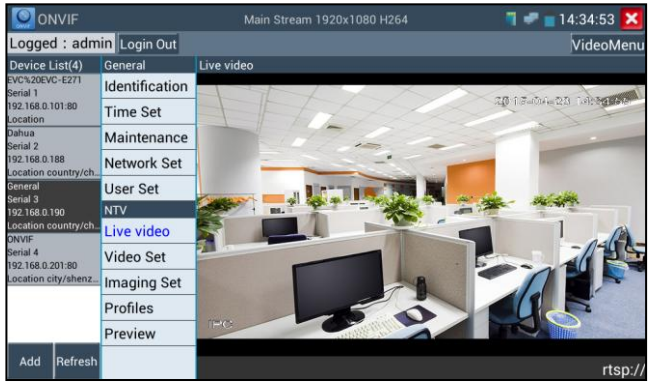
Confirm : Save the modified parameters

Functions as below , Rapid ONVIF is the same with HD ONVIF .

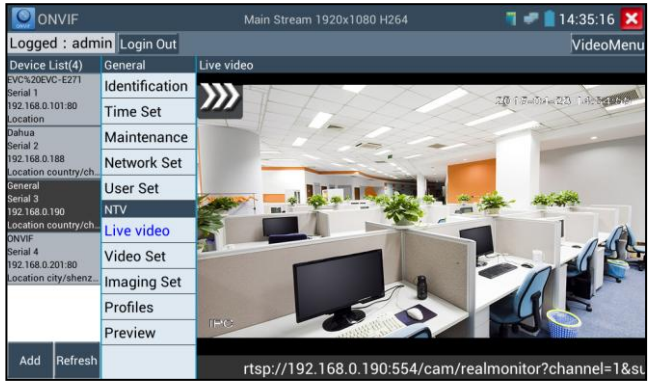
Live Video: Click “Live Video” to view the live video feed from the IP camera. To make the image full screen, double tap on the video. Stretch two fingers outward or inward on the touch screen to zoom the image in or out.

While in the “Live video” menu, click “V**ideo Menu**” at the top right of the image to access the

following tools: **Snapshot, Record, Photo, Playback, PTZ and Settings**



ONVIF PTZ control: Tap the image in the direction you want the PTZ camera to move. Tap the left side of the image to move left, right to go right, up to go up and down to go down. Compatible IP PTZ cameras will rotate accordingly. PTZ rotation direction is displayed on top left corner of the image.



IP camera video settings: Click “Video Set” to enter the IP camera’s encoder and resolution settings. Make the desired changes and click “OK “to save.

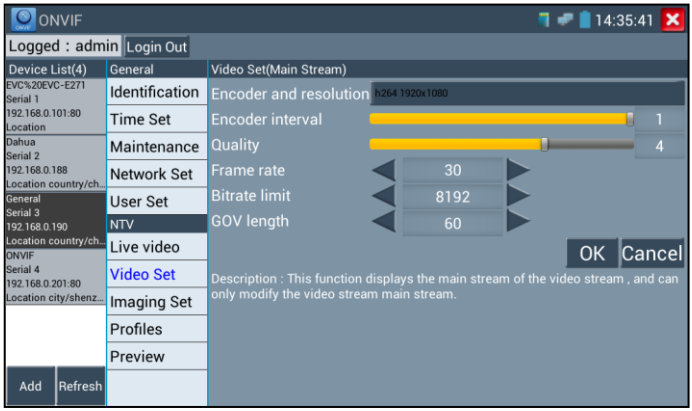
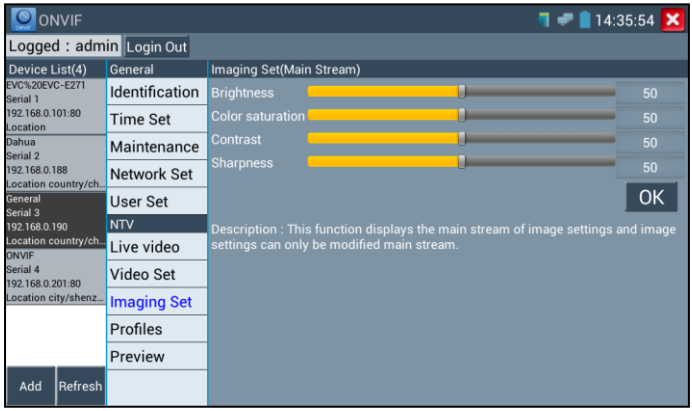
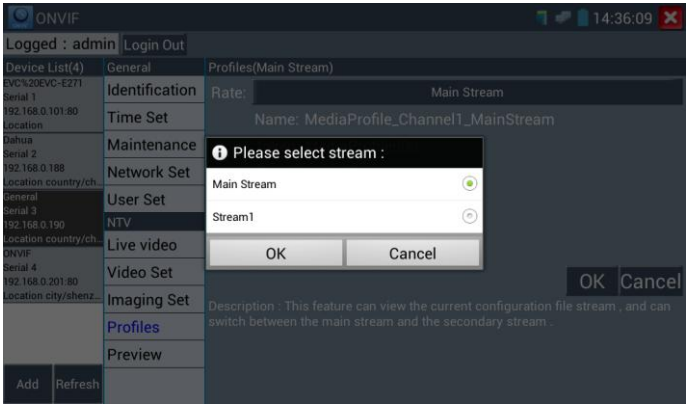


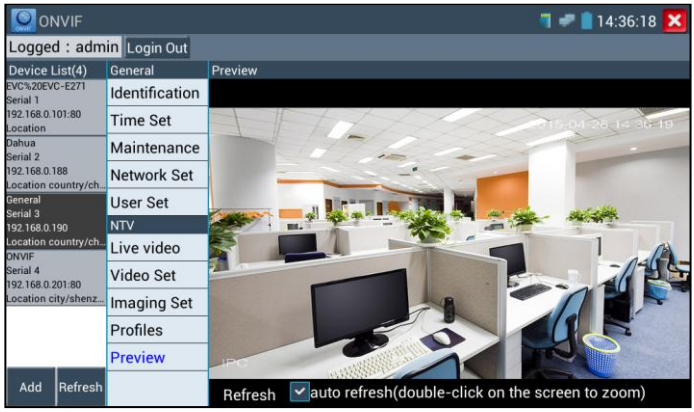
Image setting: Click “Imaging Set” to adjust image brightness, saturation, contrast, sharpness and backlight compensation mode.



Profiles: Click “profiles”, can view video streaming current configuration files, as well as switch between Major stream and minor stream

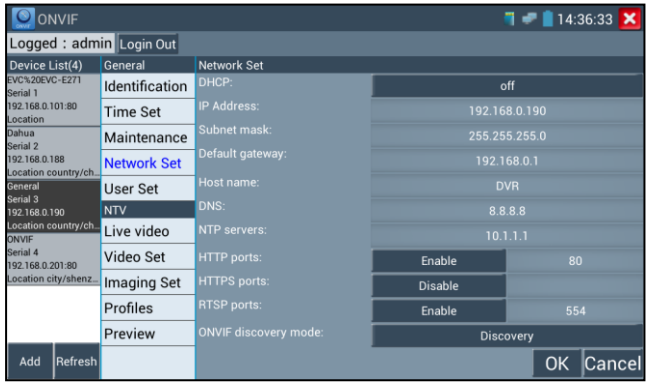


Preview pictures: Quickly preview and zoom in or out pictures, automatically and manual refresh

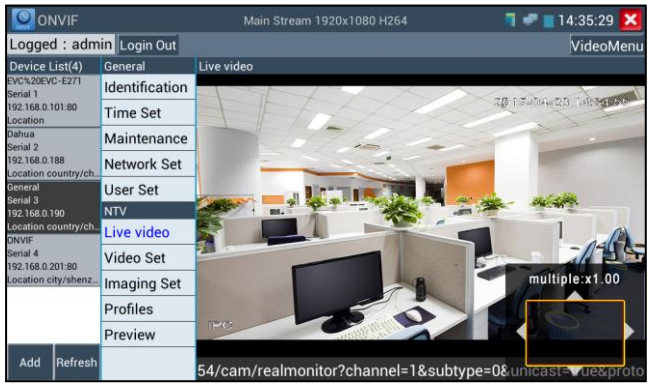


Network setting: Click “Network Set” to change the IP address settings.

Note: Some cameras are not fully ONVIF compliant and cannot support changing their IP address, so there is no change after saving.



Zoom in image: press the key key to enter the zoom mode. Press it again to exit zoom mode. When the image is enlarged tap left, right, up or down on the image to move the whole image on the screen



When the image is enlarged, if not operate on touch screen, it can operate by the keyboard ,press the key TELE+ to zoon in , press the key WIDE− to zoom out ,press upward and downward key to move image .

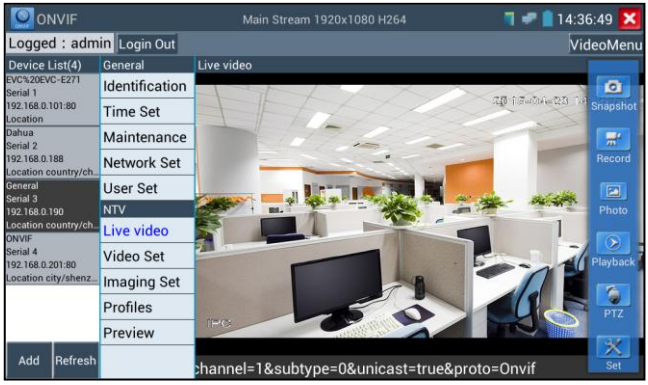
If it is network video input to the tester, as the tester supports resolution up to 1080p, the input image will be very clear after it is enlarged. This is greatly helpful for the installers to ensure the

IP camera's video coverage and decide the IP camera's install site.

Image can only be enlarged on SD mode (The icon "ONVIF"is SD mode.)

IP camera video settings: Click "Video Set" to enter the IP camera's encoder and resolution settings.

Make the desired changes and click "OK "to save.

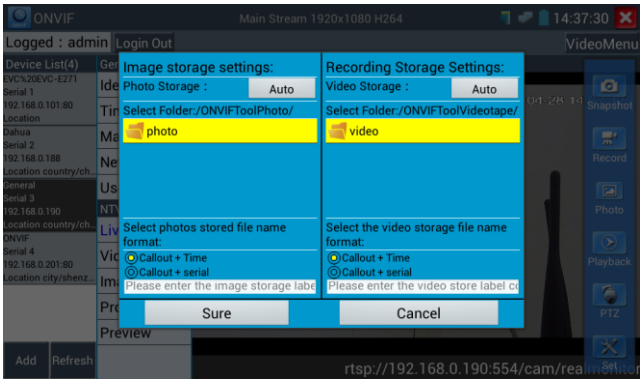


Snapshot: Click "snapshot" to save the current image as a JPEG file on the SD card

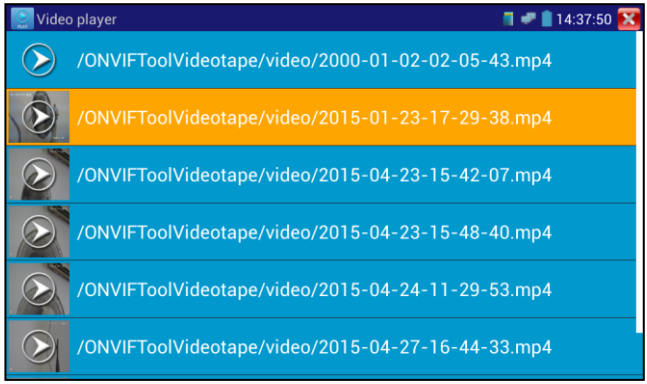
if select manual storage, appears dialog box "Input Name" , user-defined the files name(by Chinese character, English letter ,or digit) to save in SD card, if select "Auto- storage", the tester auto stores the files after snapshot.

Record: When you click the "Record" icon, video starts recording. A red recording icon appears on the screen and begins to flash and a timer appears indicating the time elapsed for the video. Click on the "Stop" icon to stop recording and save the video file to the SD card.

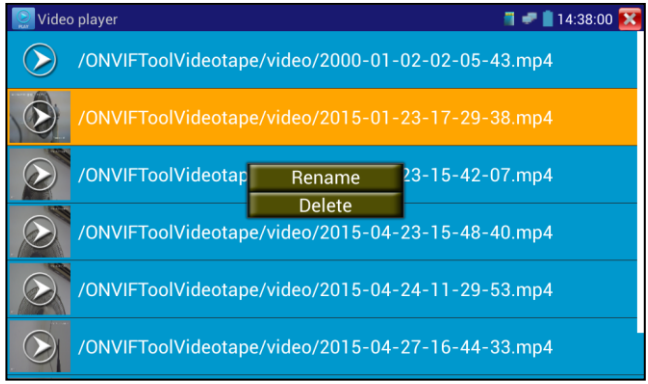
Set: Click on the “Set “icon to change Snapshot and Video recording file name settings. You can set Auto storage, which sets filenames by time or set manual storage. Click “Sure” to save file name settings.



Playback: Click the “Playback” icon to view saved videos. Double click the video you want to play. Click to return to the last menu



To rename or delete a photo, click and hold on the file until this screen appears:



Video files can play in the Video player of the main menu

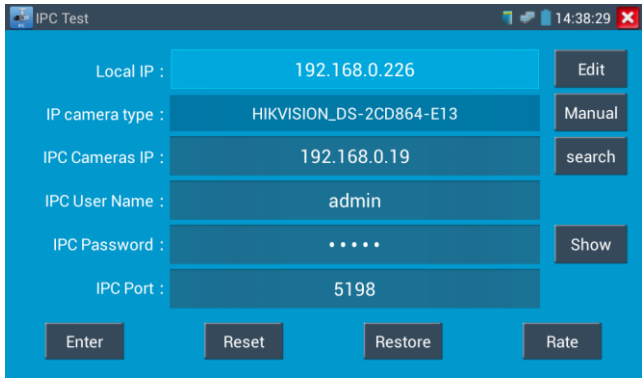
3.3.5 IP camera test

Click icon to enter IP camera test

Display high-definition images, support snapshot, video record and playback. Currently, the IPC tester only support some brands' specified IP cameras, the brands include Dahua , Hikvision, Kodak , Samsung, etc. OEM service is available. Clients can send us the IP camera for our engineers to try to add the protocols to the IPC tester, or send us the mobile apps (Android version. APK files) to install in the tester.

Note: Currently, the IPC Test App only supports some brands' specific IP cameras; these include specific models made by ACTI, AXIS, Dahua, Hikvision, Samsung, and many more. If the camera is not fully integrated, please use the ONVIF or RTSP apps.

IPC test interface



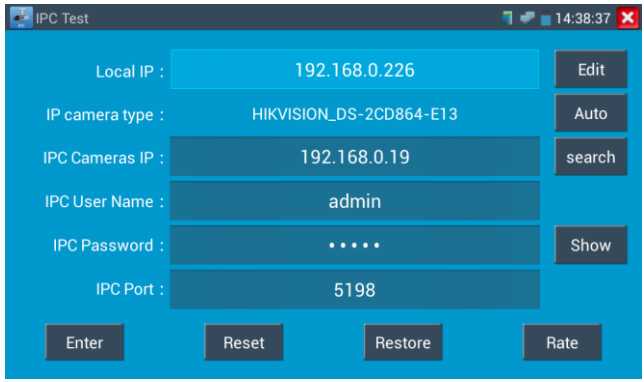
Local IP:: This is the tester's IP address. Click "Edit" to enter "IP setting" and change the tester 's IP address settings

IP camera type: Click on the IP Camera type to select the Manufacturer and model number of the integrated IP camera

1. When IP camera type is"Manual",Pls select type by manually.

Click IP camera type, list Honeywell , Kodak,Tiandy, Aipu-waton, ACTi,WoshiDA IP camera etc. If the brand has offered official original protocols, pls select camera type, input IP camera address ,user name and password ,click" official" to enter the camera image display interface(Currently, only support DAHUA official protocols)

2.when "IP camera type"is"Auto",the tester auto- match the camera type.



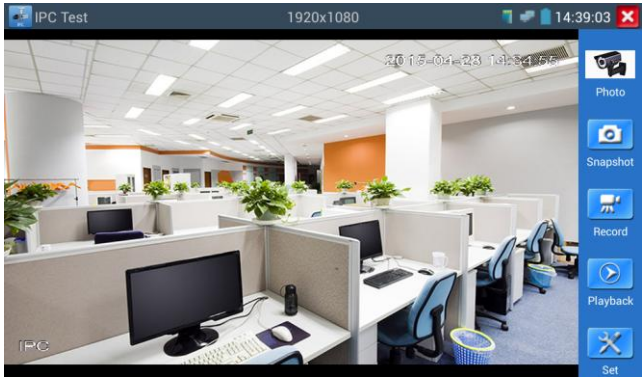
IP Camera's IP: Enter the IP camera's IP address manually or click "Search" to auto-scan for the IP camera's IP address. It is better to directly connect the IP camera to the tester so the search results will only display the camera's IP address. If the tester is connected to a PoE switch, it will find and display several IP address

IPC User Name: Enter IP camera's user name

IPC Password: Enter IP camera's password

IPC Port: When you select the IP camera type, it will default the camera's port number and doesn't need to be changed.

After all settings are completed, click "Enter" to view the live video



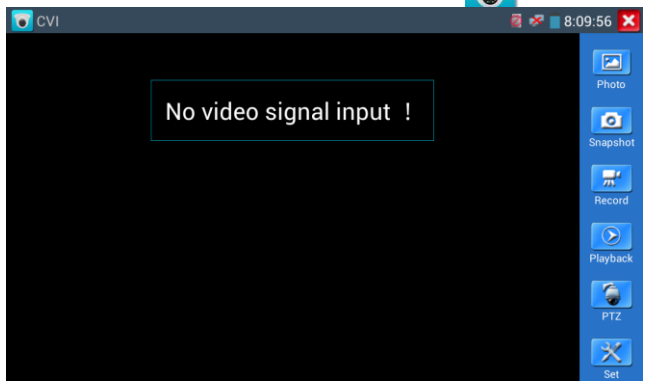
If IP address setting has error or IP camera is not connected.. The tester prompts "Network Error"

Click to quit from image display and return to IP camera test interface.

Once you are viewing video on the IPC Test app, you will see the "Video Menu" icon on the top right. This button will give you access to Snapshot, Record, Photo, Playback, PTZ, and Set. Please refer to the ONVIF section to use these functions.

3.3.6 CVI camera test

HD CVI camera, CVI dome camera test and PTZ control, Click icon o enter



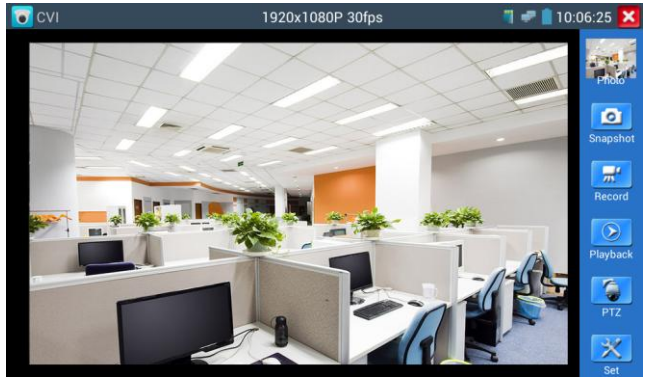
When HD CVI signal input, tester will display the image's resolution on the top bar.

Double-taps on the screen to make the image displayed full screen.

The tester supports resolution as follows:

1280x720P 25FPS / 1280x720P 30FPS / 1280x720P 50FPS / 1280x720P 60FPS

1920x1080P 25FPS / 1920x1080P 30FPS



（1）PTZ control

1.1 Coaxial PTZ control

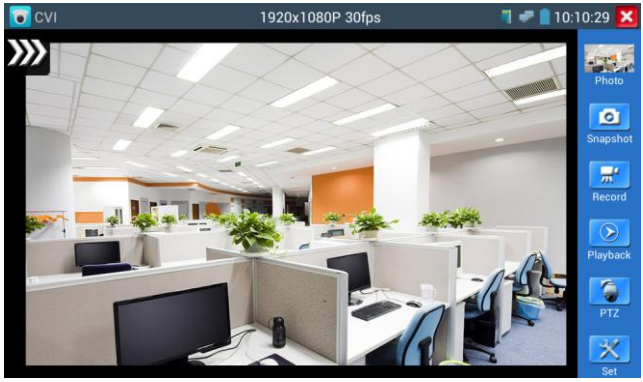
Click the icon"PTZ"on the right toolbar to do the corresponding setting.

"Port": select coaxial control

Enter PTZ address to perform parameters setting

Operation instructions please refer to “3.3.1 PTZ (1) PTZ control parameters setting”

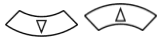
The PTZ address in the tester must be consistent with the dome camera or decoder, then the IPC tester can test .After setting the parameter, the tester can control the PTZ and lens.



To control PTZ by screen touch:

Tap left, right, upward and downward on the touch screen to control the PTZ rotation direction, PTZ cameras will rotate accordingly. By two fingers move outward and inward on the touch screen to zoom in and out the PTZ.

To control PTZ by key buttons

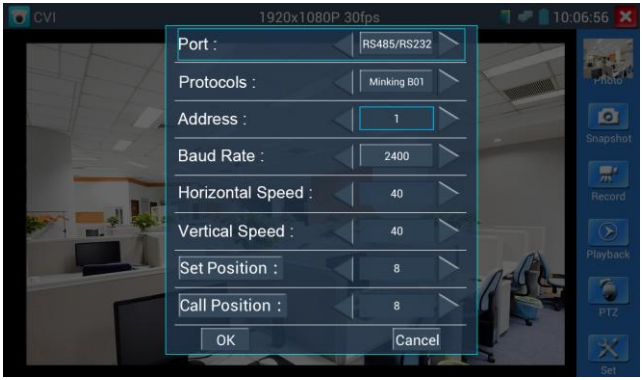
Press arrow keys  to control the PTZ direction of rotation

Press the key to switch on or turn off the aperture.

Press the key , adjust the focus manually

Press the key ,manually adjust the zoom

1.2 RS485/RS232 control



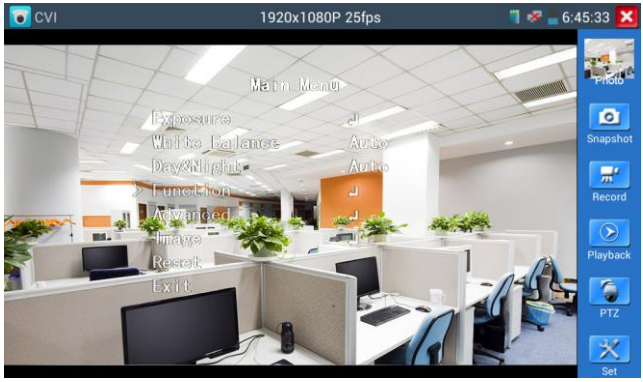
Operation instructions please refer to “3.3.1 PTZ (1) PTZ control parameters setting”

（2）Coaxial camera menu setting

Click “Coaxitron” and select “camera menu”, can open the dome menu

Input calling dome camera menu address code, click “OK”, then press key button“ENTER ”or click screen icon “ ”

Press arrow keys to set



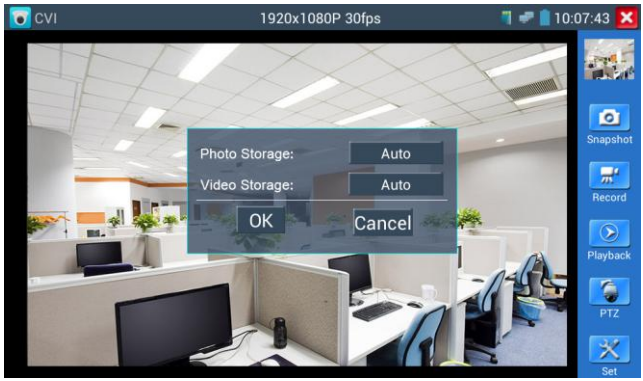
(3)Snapshot, record, photo viewer and video playback, please refer to “3.3.1 Video monitor test”

(4)Save setting

Click icon “Set” on the right toolbar to enter storage setting.

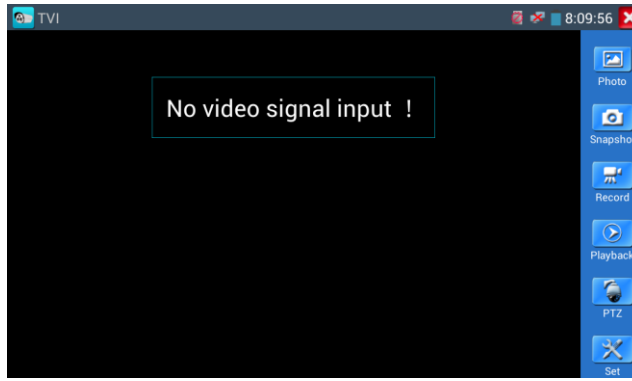
Support auto-storage and manual storage.

When select manual storage, user can name and store the files.



3.3.7 TVI camera test

HD TVI camera, TVI dome camera test and PTZ control, Click icon to enter



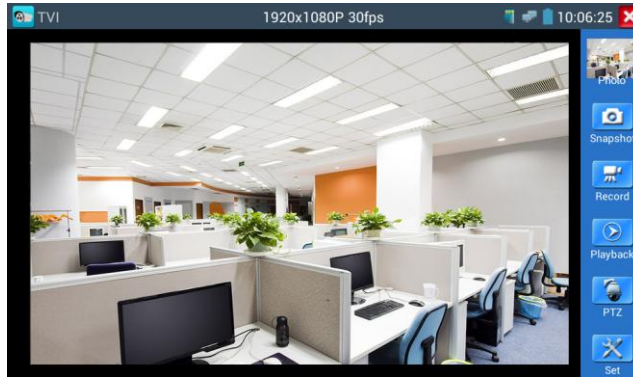
When HD TVI signals input, tester will display the image's resolution on the top bar.

Double-taps on the screen to make the image displayed full screen.

The tester supports resolution as follows:

1280x720P 25FPS / 1280x720P30FPS / 1280x720P 50FPS / 1280x720P 60FPS

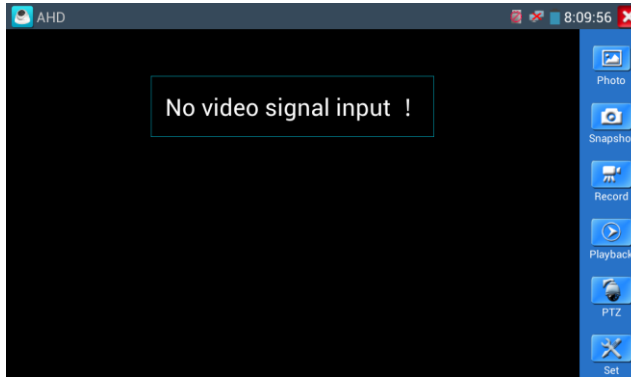
1920x1080P 25FPS / 1920x1080P 30FPS / 1920x1080P 50FPS / 1920x1080P 60FPS



More operation instructions (such as PTZ control, coaxial camera menu setting, snapshot, recording and playback etc), please refer to"3.3.6 CVI camera test"

3.3.8 AHD camera test

AHD camera, AHD dome camera test and PTZ control, Click icon to enter

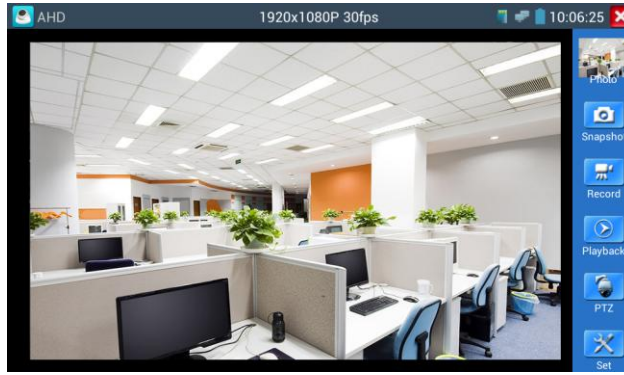


When AHD signals input, tester will display the image's resolution on the top bar.

Double-taps on the screen to make the image displayed full screen.

The tester supports resolution as follows:

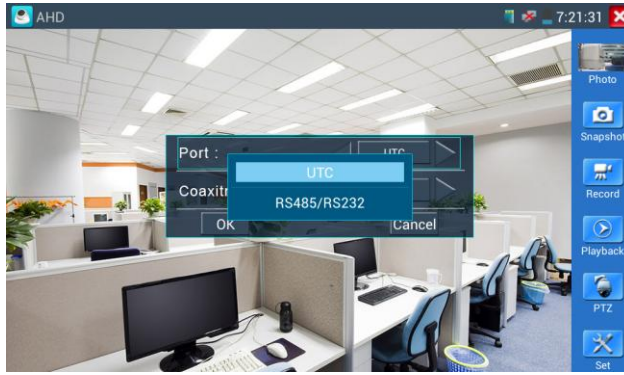
1280x720P 25FPS / 1280x720P 30FPS / 1920x1080P 25FPS / 1920x1080P 30FPS



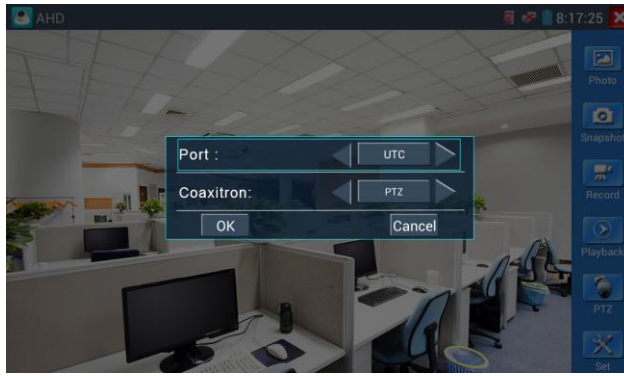
Coaxial PTZ control

Click the icon"PTZ"on the right toolbar to do the corresponding setting.

"Port": Select coaxial control



Enter PTZ address to perform parameters setting



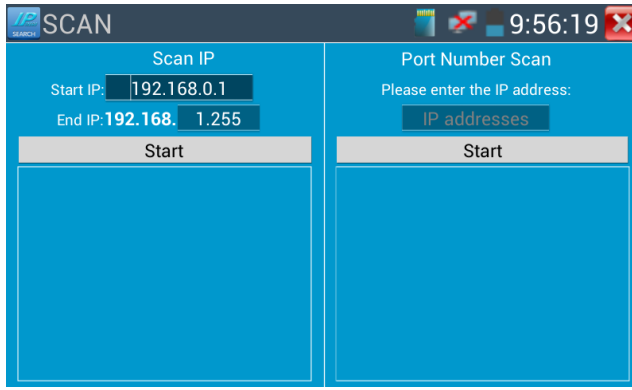
If to coaxial PTZ control the AHD camera, no parameters setting is needed.

More operation instructions, please refer to “3.3.6 CVI camera test”

3.3.9 IP address scan

Connect the cable to the LAN port, click icon

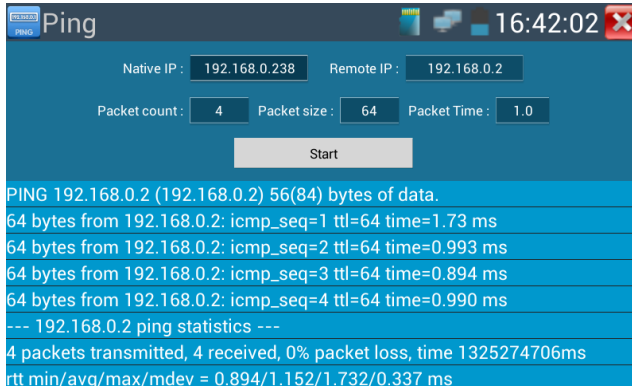
to enter, Set your IP address search range by changing the Start and End IP addresses. Click the “Start” button to scan the IP address range. You can also input an IP address in the Port Number Scan to scan for open ports.



3.3.10 PING Test

PING is the most conventional network debugging tool; it is used for testing if the connected IP camera or other network equipment's Ethernet port is working normally and the IP address is correct Connect a network cable to the LAN port and click the

icon to open the PING tool. You can set your LOCAL (native) IP address, Remote IP address (e.g. IP camera), Packet count, Packet Size, Packet time and Timeout. Press "Start" to start pinging. If the IP camera or network device is not configured properly or not plugged in, it will say "Destination host unreachable," or have 100% packet loss. If the tester connects to the device, the send and receive packets will have a 0% packet loss.



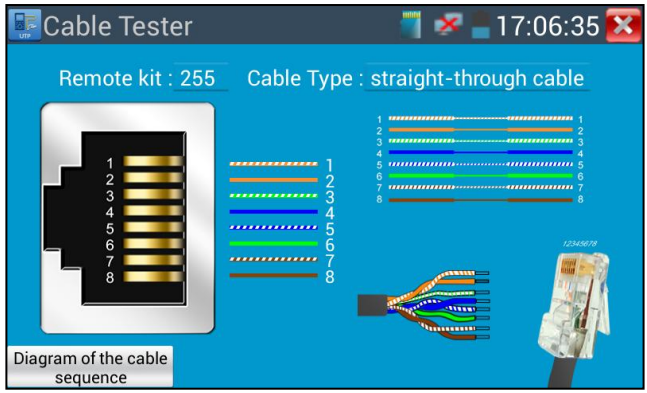
Application: PING testing is the most conventional network debugging tools. It is used for testing if the connected IP camera or other network equipment's Ethernet port is working normally and the IP address is correct.

It's normal that the first data packet will be lost when test start.

3.3.11 Cable test

Click icon

to enter



Test LAN cable or telephone cable.

Connect LAN cable or telephone cable with the CCTV tester and cable tester. And then the connecting status, cable type and the sequence of wires as well as the serial number of the cable tester kit will be displayed.

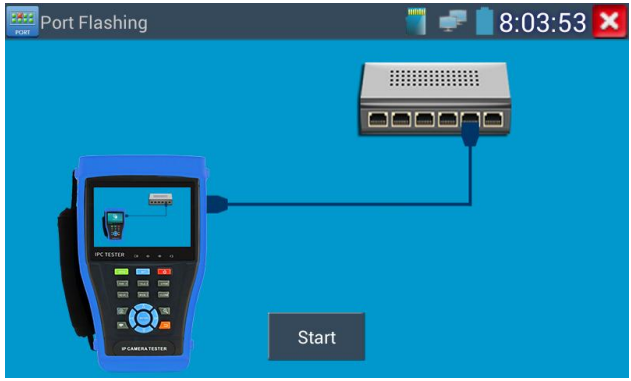
The number of the cable tester is 255

If need several different number other types cables testers, should pay the additional cost.

3.3.12 Port finder

Connect a network cable to the meter's "LAN" port, click the icon

to open the Port Flashing app. Click "Start". The IP tester sends a unique signal to make the connected LAN port of the switch flash.



If the tester and PoE switch are connected well, the LAN port of POE switch flash at special frequency, If not, no any changes on the LAN port

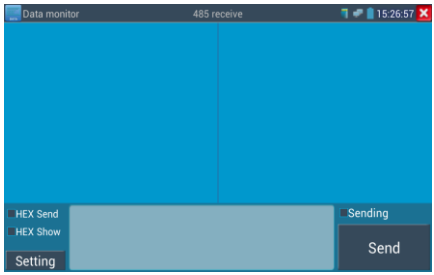
Application:

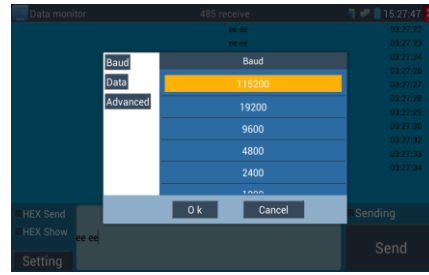
The tester will send special signals to make the connected LAN port flicker at special frequency, which will enable the installers to easily and quickly find the connected Ethernet cable. This function can prevent mistakenly insertion or disconnection non-corresponding cable to artificially interrupt network connection.

3.3.13 Data monitor

Pls click icon

to enter





Click “Setting” to choose the baud rate of RS485/RS232; it must be the same as the DVR or the Control keyboard **.**The DVR or Control keyboard send the code to the tester, if it can be read, the protocol will shown on the upper right, like Pelco D, if not, like P:---

While the tester receives the code, press the

key to empty.

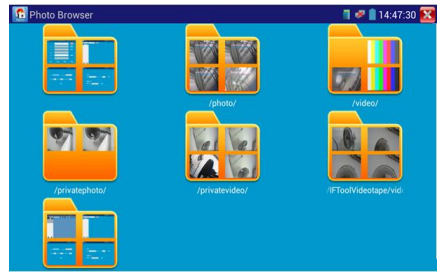
Though the RS485 port, display the PTZ control code of the multifunctional keyboard or the DVR. Controller can check the status of the RS485 transmission through the code on the display. (The RS485 communication rate must be the same.)

Application: Check the RS485 communication states of the video optical transmitter whether normal. Engineer can analyze the protocol and check the data through the displayed code.

3.3.14 Media Player

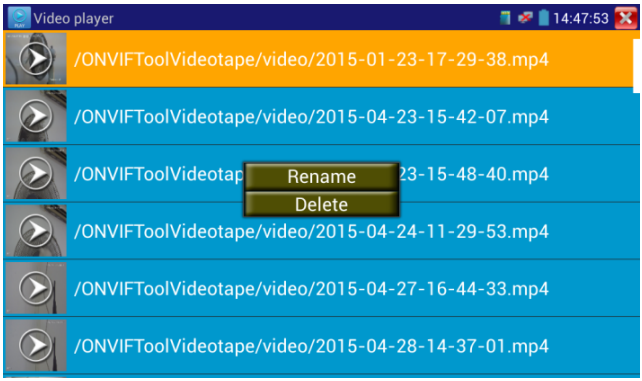
Click the icon

to enter



The Media player can browse video and image files. It supports the video formats of MP4, H.264, MPEG4, and MKV. The IP tester recorded files can play directly via the Media player. The Media player will automatically display the video files from the SD card. Click on the desired file to play. Click RETURN to exit.

To rename or delete an existing file, press the file name for a few seconds until the screen below appears. You can then rename or delete the file by pressing the desired option.



3.3.15 Audio player

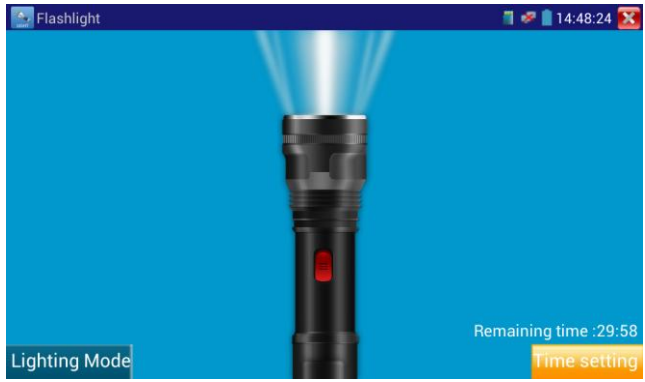
Click the icon

to enter , the audio player only supports MP3 format Audio files .

3.3.16 LED Flashlight

It is convenient for the installation or maintenance in the evening or in the dark. Click icon

to enter

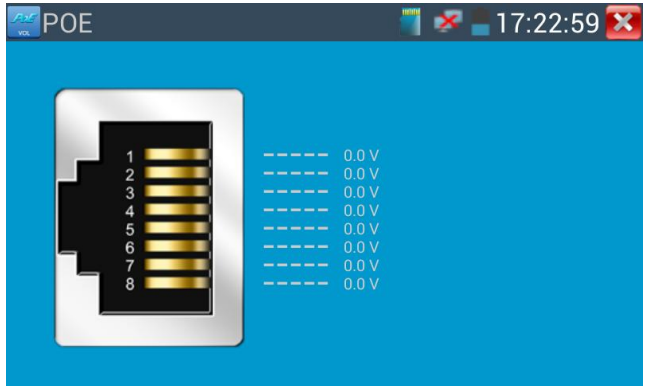


While in the flashlight app, click the red button to turn on the LED lamp. Press it again to turn it off. If you don't press the red button to shut off the lamp and press the button to exit the app, the lamp will stay on. Click the Time Setting button to set a timer that will shut off the lamp.

3.3.17 PoE/PSE Voltage test

Click icon

to enter PoE voltage measurement



Connect a network cable from a PoE switch to the IP tester ‘s PSE IN port. Connect an IP camera or other PoE using node to IP tester’s LAN port, the PoE voltage and the cable’s pin connection status show on the screen.

Note:This test if for measuring the voltage being drawn by the PoE node and the IP tester must be between the PoE switch and the PoE node for this test to work.

Note: The PoE switch must be connected to the PSE IN port. The powered device such as IP camera or other PoE node must be connected to the LAN port.

Note: Do not connect PoE power supply equipment (such as a PoE switch) to the tester’s UTP/SCAN port; otherwise it will damage the tester.

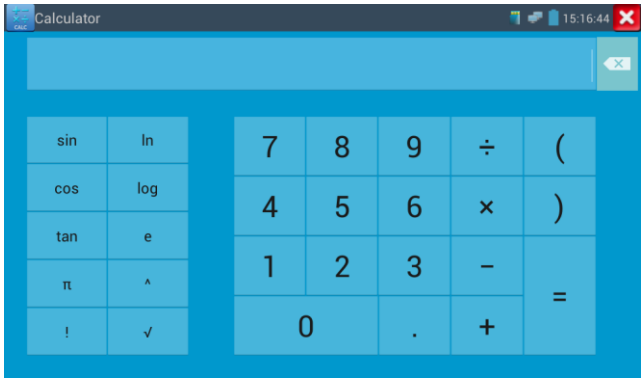
PSE transmission

When PoE / PSE voltage testing, PoE/PSE conntect to the tester's PSE "IN" port , the camera connetct to tester's Lan port , tester not only can transmit voltage to supply power for camera ,but also transmit data at the same time. as well as the computer connect to the PoE/PSE, it can log in connected tester's PoE camera.

3.3.18 Calculator

Click icon

to enter

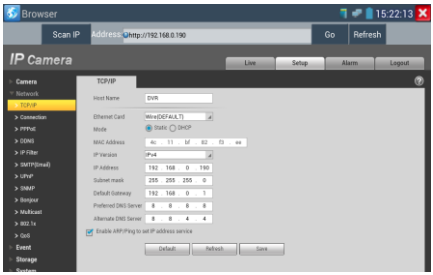


3.3.19 Browser

Click icon to enter

Type in the camera’s IP address and press “Go” to access the IP camera’s interface.

NOTE: You will not be able to view live video in the web browser. For viewing video, use the IP tester's live camera view Apps



The IP camera and IP tester be on the same network segment for the browser to interface with the camera.If they are not in the same segment, click the button or press "RETRUN" to exit. Open the "Settings" app from the main menu to change the IP tester's network settings to match those of the IP camera.

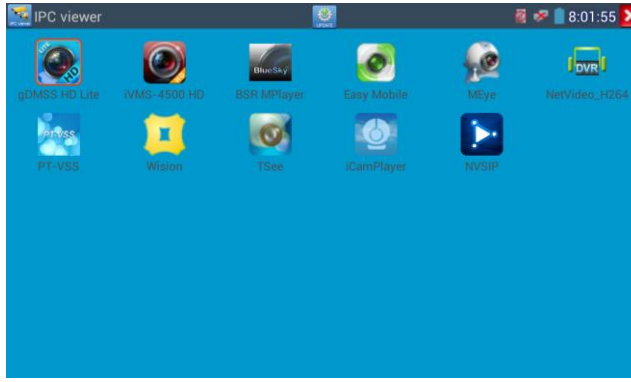
3.3.20 VMS

In addition to the ONVIF app or the IPC Test app, you can use one of the mobile apps in the IPC Viewer folder to view IP camera video. If you cannot find your desired mobile apps, you can send us the mobile apps (Android version. APK files) for our engineers to install in the tester, if successfully installed, the tester will allow you to see the IP camera image by IP camera viewer.

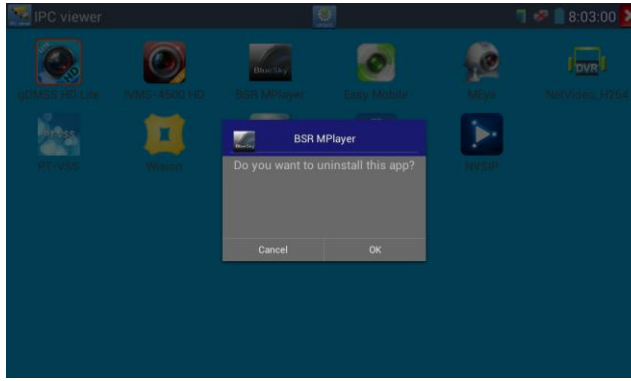
Click icon "IP camera viewer" to enter, run and set the mobile apps parameter to see the corresponding IP camera's image.

Mobile apps displays IP camera's image by software decompression, hereby the image may be not clear or fluent.

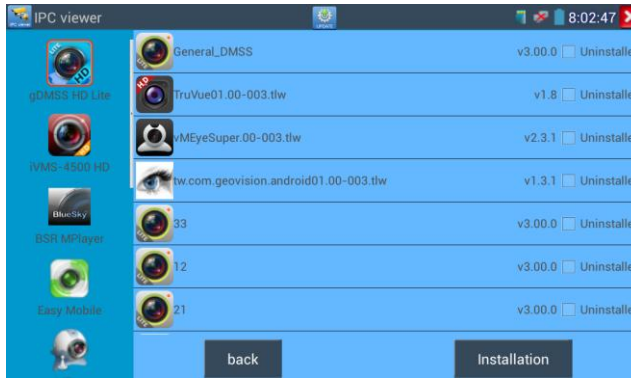
Note: The mobile apps are third party applications. We do not support these apps or make any usage claims. We do not assume any legal liability.



Click desktop icon several seconds, to uninstall this application



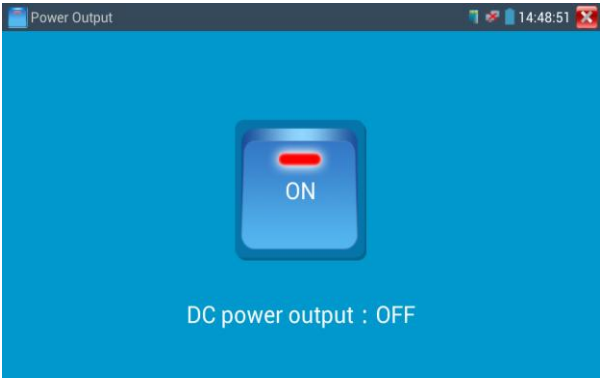
Click icon “update “ in the IPC viewer interface, to update mobile apps.



3.3.21 PoE power / DC12V 2A and DC 5V 2A USB power output

When the tester is turned on, the 12VDC and 5VDC power output functions are automatically turned on. If the IP tester is turned off, the 5VDC USB can still be used to power an external USB device.

To use the PoE Power Output function, click on the icon and change the switch “ON” or “OFF”. The IP camera needs to be connected to the LAN port before you turn PoE Power on. If the IP camera supports PoE, the PoE power is delivered via pins 1, 2, 3, and 6 on the LAN port. The IP tester will display “48V ON” at the top of the screen when the POE power is still on.



Note:

1. Don't input power into the "DC12/2A OUTPUT" port.

2. Don't output this DC12V/2A power to the DC12V/IN port of the IP camera tester to avoid destroy

3. The IPC tester power output is close to 2A, if the IP camera's power is over 2V, the tester will auto enter protection mode. Disconnect all the connections of the tester and then connect the tester with power adaptor to resume the tester.

4. Before turning on the PoE power output, please make sure the IP camera supports PoE power. Otherwise it may damage the IP camera.

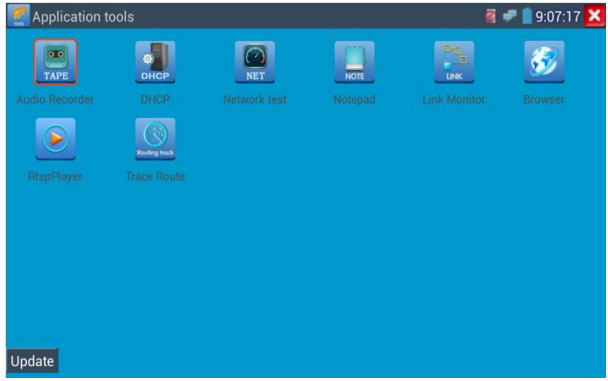
5 Make sure you plug in your IP camera to the LAN port prior to turning on PoE power

6. Make sure the tester is full charged or more than 80% charged, otherwise the tester will shows "low power", "not able to supply power" .

3.3.22 Application tools

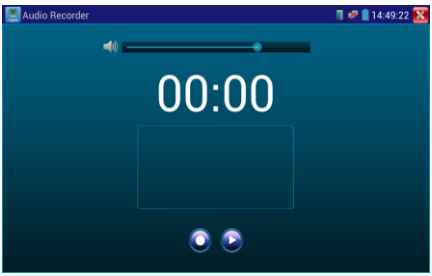
Click the icon

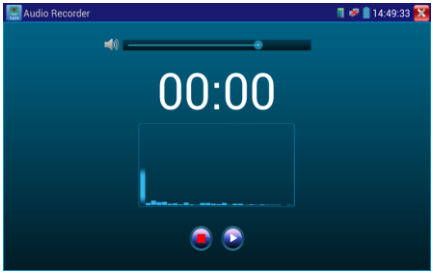
to open the Application Tools folder. This folder contains useful apps such as Audio Recording, DHCP Server, Network test, Notepad, Link monitor and RTSP Player.



Audio Record: Connect an audio device to the IP tester's audio input port. Click the

icon to enter the Audio Recorder app. Click the red button to stop, and the unit will prompt you to save the recording

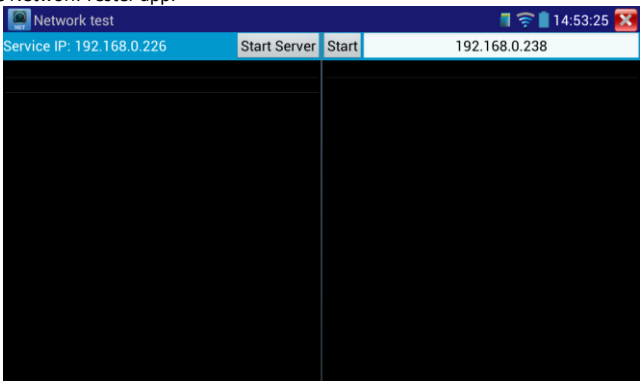




Net work test (Ethernet bandwidth test)

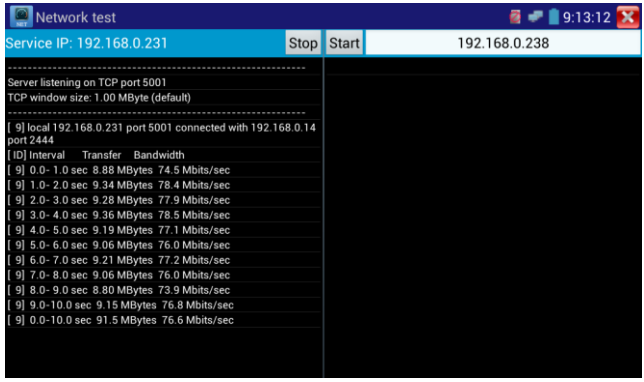
To use the Network tester, you will need two IP testers. One is used as a Server and the other as a Client. Both devices must be on the same network segment in order to communicate. Click icon

to open the Network Tester app.

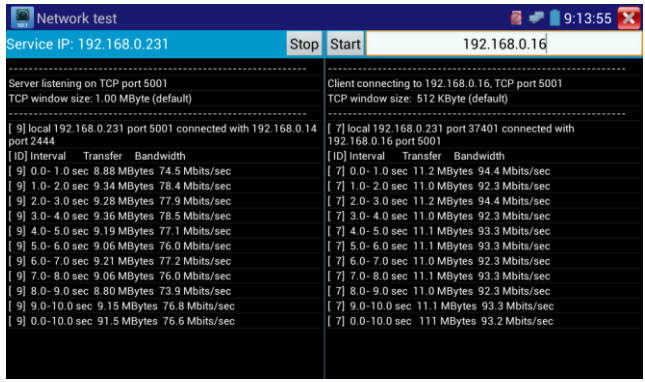


When test , need a tester or a computer installed Network Test Software as the Server, the other tester sends packet test. The two testers must be in the same network segment.

a).Start the server: Click "Start Server" button to use the tester as a Server. It will display its IP address at the top of the screen.

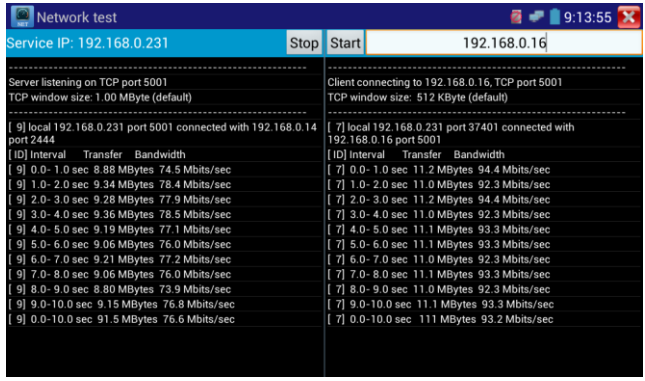


b).Start send packet test: Using the other IP tester, and type in the Server's IP address at the top right corner of the screen. This app is used to send packets for network speed testing. Click the “Start” button to send the packets and start testing.

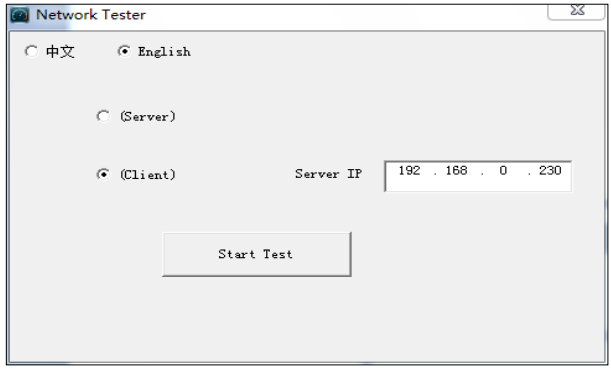


Network bandwidth testing can also be tested with a computer using compatible network bandwidth testing software. Install network bandwidth testing software on a computer, as a test Client or Server, to do the mutual testing with the tester. If use computer as the server, the computer IP address is: 192.168.0.89

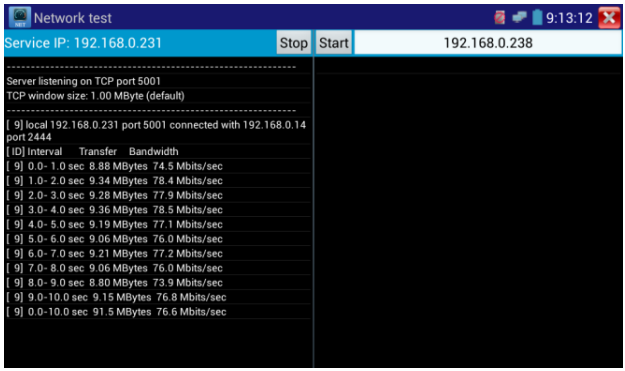
Tester as Client, tester's IP address is:192.168.0.230. The Server and the Client are at the same network segment, but with different IP address. Input Server's IP address 192.168.0.89 in the tester and click "Start" to test network bandwidth.



Or tester as a Server, computer as test Client（select Client,input tester's IP address to test）

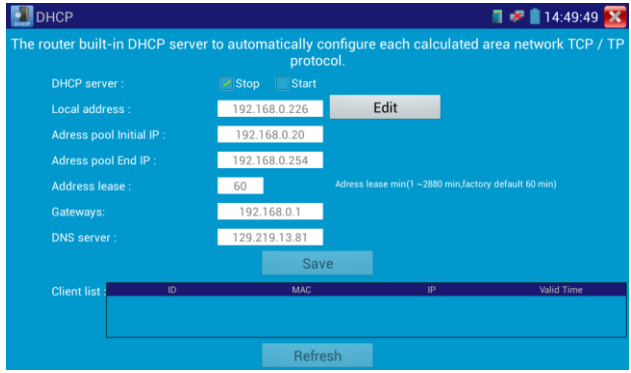


When tester as server, shows results:



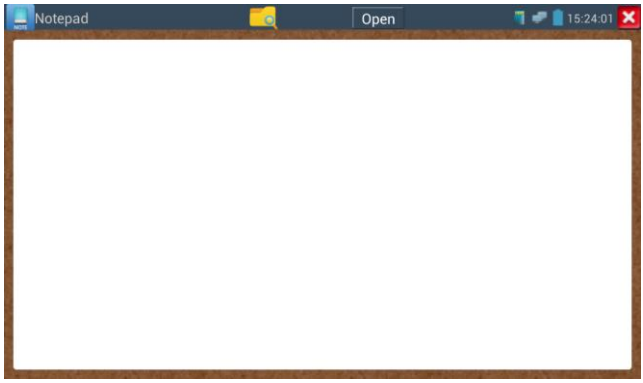
DHCP server:

Click on the DHCP icon to open the DHCP server app. Select the “Start” check box at the top and make any desired changes to the network settings. Click “Save” to start assigning dynamic IP addresses for IP cameras and other networked devices. Click the “Refresh” button to check your Client list.



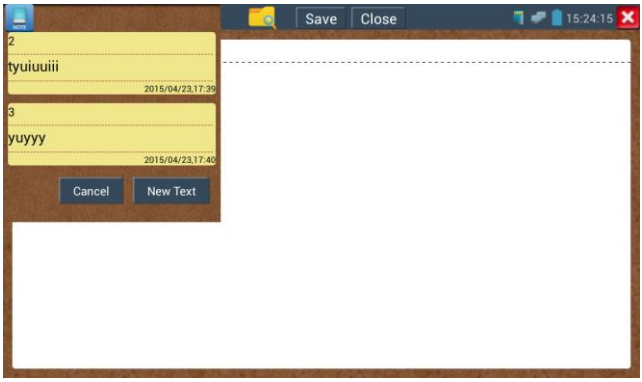
Notepad:

Notepad can be used to record the important testing results, click the key “Save” to save the contents. Notepad can auto record the storage date and time.



Please click

to view the notepad , all saving contents display. Click each record bar to show the details. Press the record bar for several seconds, prompt whether delete it



Link monitor :

Click the

icon to open the Link Monitor app. This app is used to see if an IP address is occupied by other network devices. This will avoid new address conflicts

Click “Add” and enter the desired IP address. To test different network segments, click the “Settings” icon on the main menu and go to IP Settings and make the desired changes. Once the desired IP addresses are added to the Link Monitor list, click “Start”. If the IP address status shows a check mark the IP address is occupied. If the IP address status shows an X the IP address is available. Click “Stop” to stop the testing

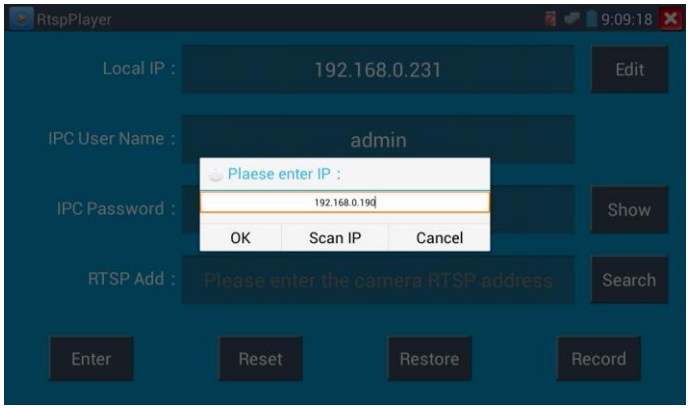
Application:

Add an IP camera or other network device to the current network group, the new IP address must not be occupied, otherwise it will cause IP conflicts and stop the equipment normal working. Link monitor can check if the new setting IP address is occupied.

RTSP Player :

The RTSP Player app will allow you to view the RTSP video stream from an IP camera. If you were unable to view your camera via the ONVIF or IPC Test apps, it is possible your camera will have an RTSP stream and you can view live video.

From the main menu, select the “APP Tool” folder and then select the “RTSP Player” to open the app. If the IP camera uses MJPEG, select the RTSP icon. If the IP camera uses H.264, select the “RTSP HD” icon.



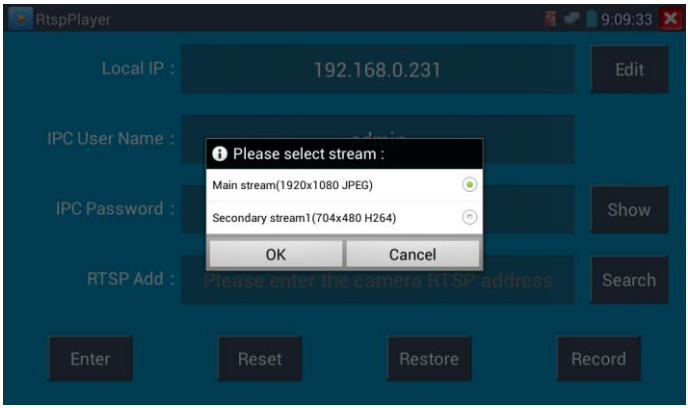
Local IP: This is the IP testers IP address.

RTSP Add: This is where you can manually enter the IP camera's RTSP URL or click on Search to search the network for cameras that use an RTSP stream.

IPC Username: Enter the IP camera's user name.

IPC Password: Enter the IP camera's password.

Once you have entered all the necessary information, select Enter at the bottom left to view the RTSP stream.



Note: in the event the ip tester does not auto detect the rtsp stream, refer to the specific camera manufacturer for the specific rtsp stream url. you may find this on line with a search of the camera model number and the word rtsp

Trace route

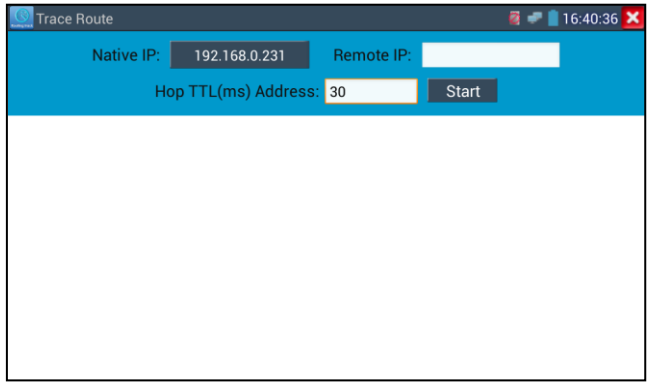
Trace route is used to determine path of the IP packet access target.

Note: Trace route testing results only for reference, for accurate test route tracking, Please use professional Ethernet tester.

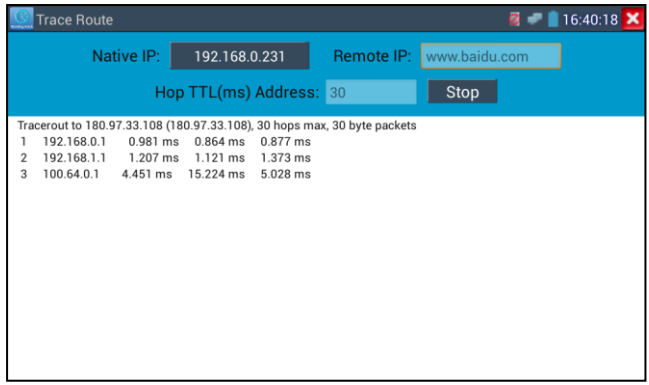
Click

to enter Trace Route

Input tracking IP address or domain name in the Remote Host IP. Set maximum hop count, normally default is 30

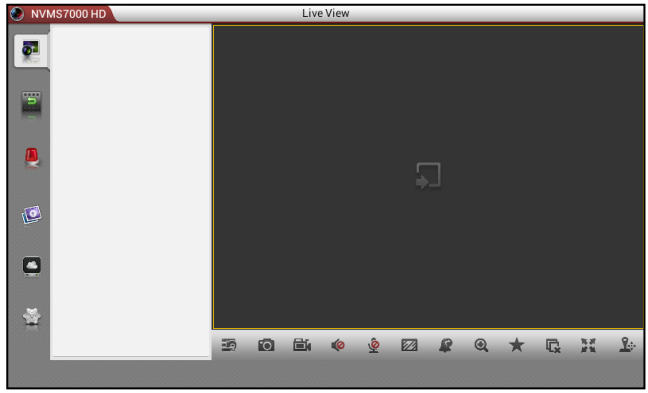


Click “start” to trace the goal address

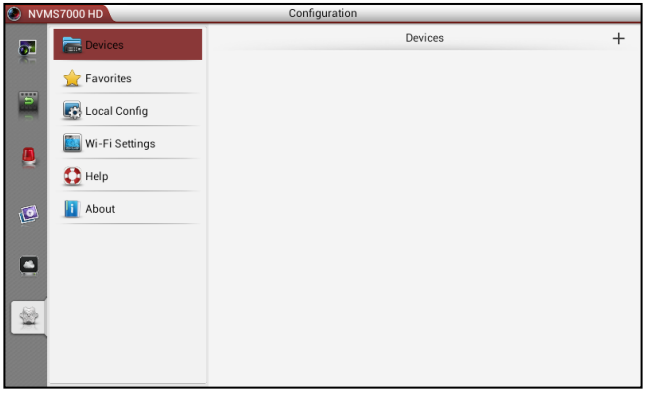


NVMSP7000

Activate LTS camera, display image from the camera, modify IP, user name and password parameters etc



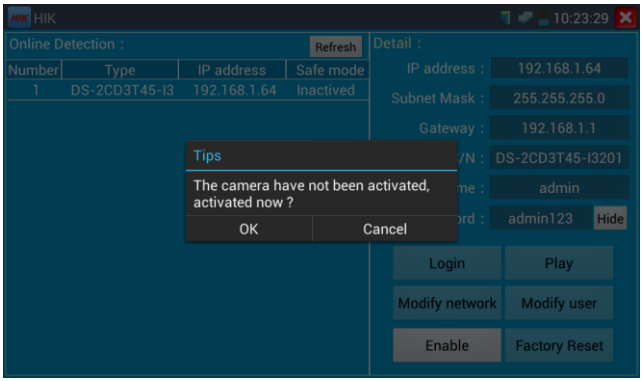
The detail you can refer to the Help icon.



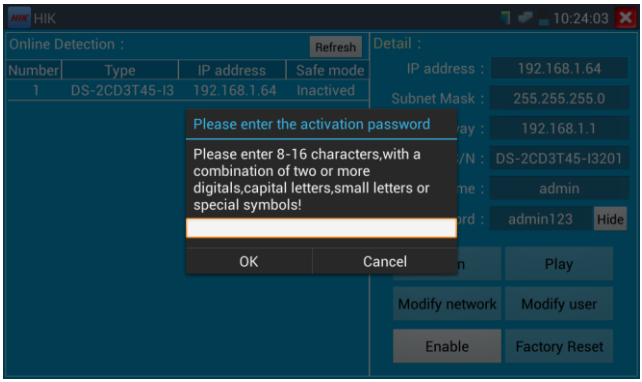
Hik test tool

Hik test tool app is design for activating and debugging Hikvision camera, can auto-identify unactivated hikvision camera, also can display image from the Hikvision camera.

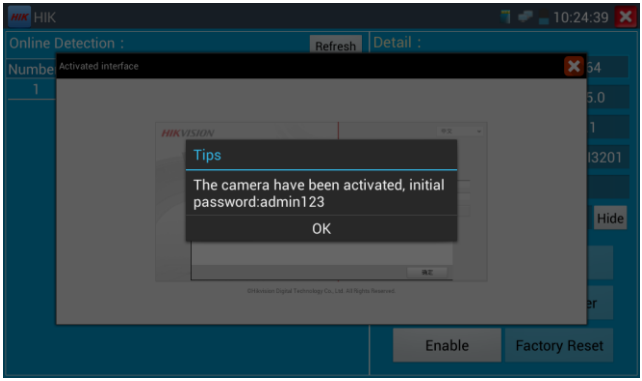
Tap icon to enter



1. Hikvision activation：When connect the unactivated Hikvison camera to the tester, it will auto identify and display “Unactivate” at safety mode. Select needed activate the camera, click bottom right corner button “Enable”, pop-up “the camera is not activate, activate now”?

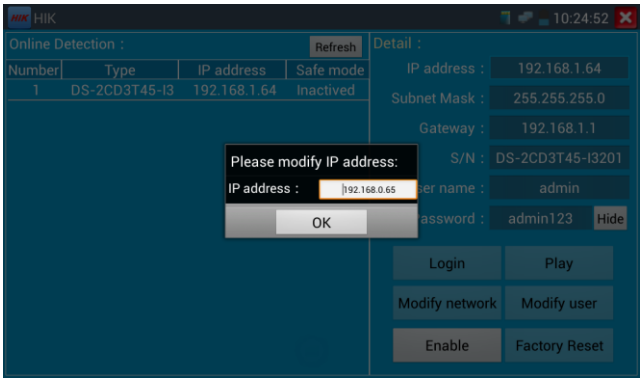


2.Input password：Input new password, tap “ok” to activate



3. Confirm activation

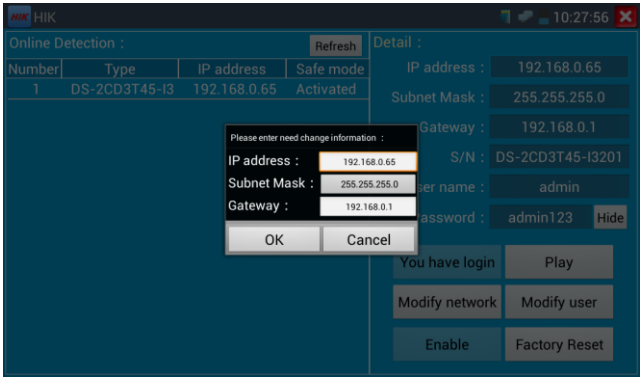
After activating the camera, the program default modifies the camera IP. Activated multiple cameras in the local area Network, and pop-up menu to modify IP, improve project efficiency.



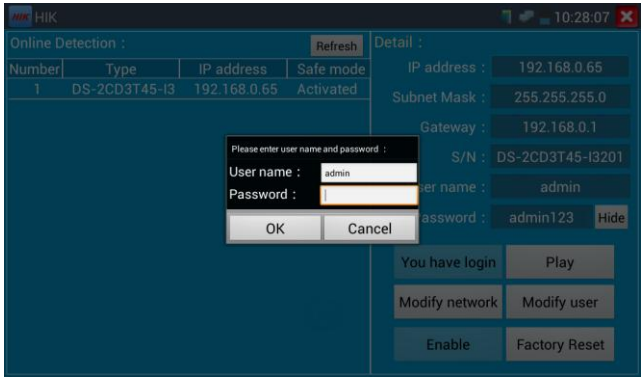
For other operations need login activated camera, when login, select the camera at the left “online detection”, and input username and password to login.

Play: display image from the camera

Modify network information: Change the camera IP address, subnet mask and gateway etc.



Modify user information: Modify the camera's user name and password



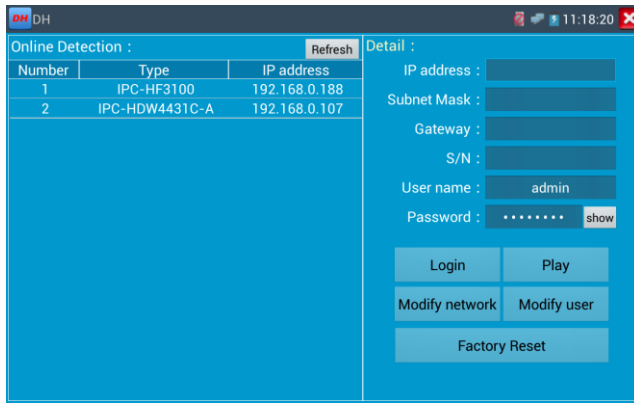
Factory Reset：Camera factory reset

Dahua test tool

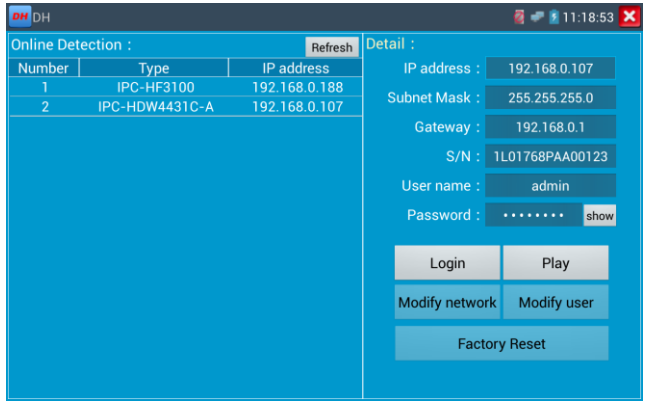
Dahua test tool is developed for installation and debugging of the Dahua IP camera, it can display image, and modify IP, user name and password etc. Making Dahua camera test more convenient and quickly.

Click “DH” icon

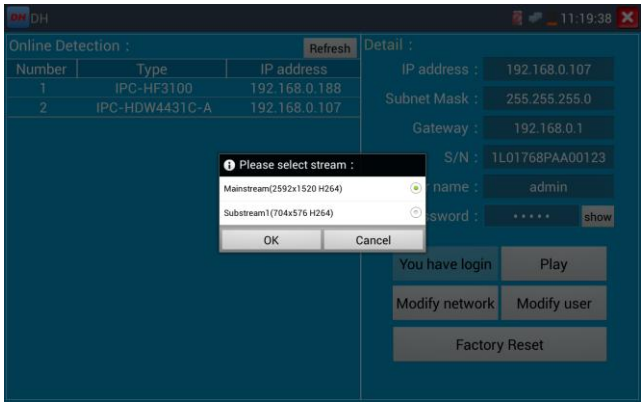
, to enter Dahua test tool.



Select the camera of the online detection menu, if the camera support non-verification login, you can click “play” directly, and view the image.

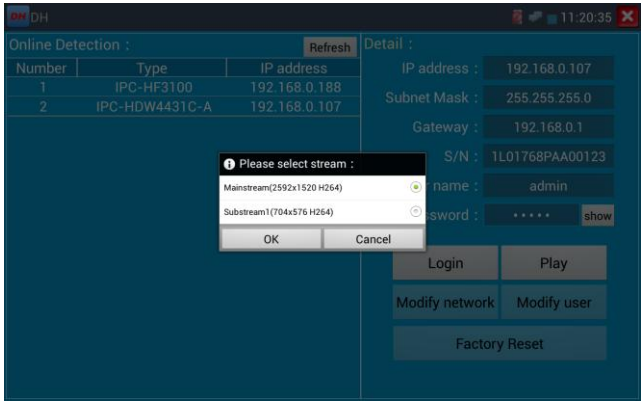


Pop up stream menu, select mainstream or second stream to test

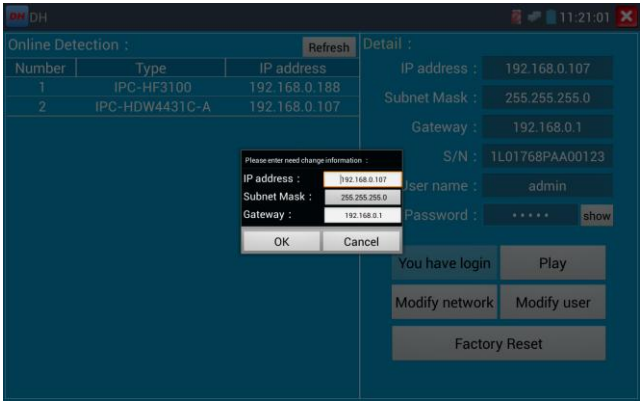


If the camera not supports non-verification login, pls select “camera” of online detection menu, and input correct user name and password, then click “log in”. After logging successful, you can test it.

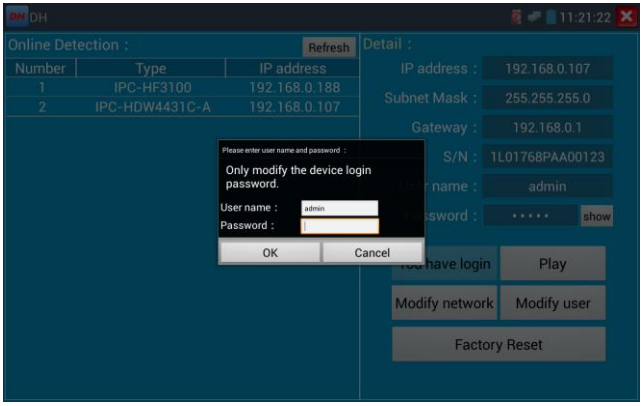
Play: select mainstream or seconded stream, IP camera live video display



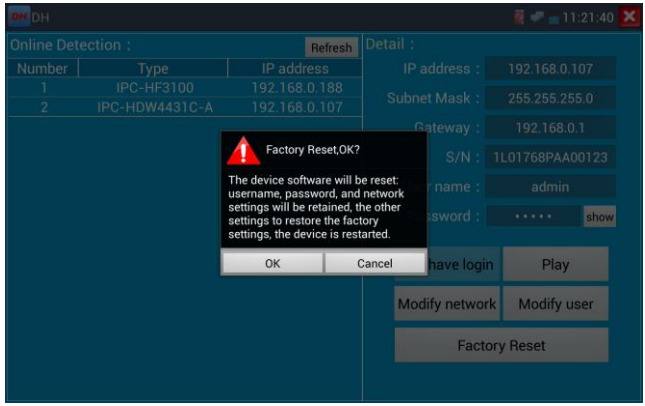
Modify network information: modify camera parameter, such as ip address, subnet mask, gateway etc.



Modify user information: modify camera user name and password, which is onvif, Dahua test tool, IPC TESTE user name and password, not web user name and password.



Factory reset setting: camera will be soft reset, and the device's user name, password and network set be saved. Other settings information is factory reset.

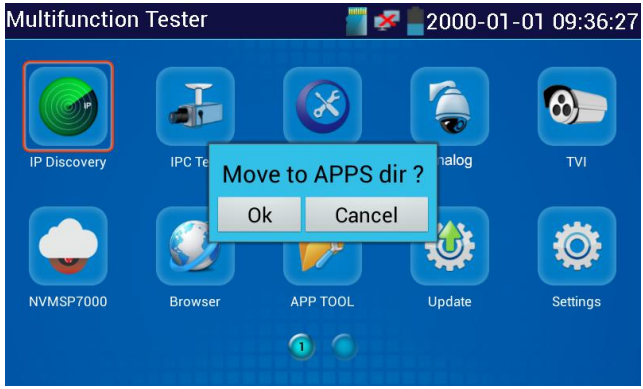


3.3.23 APPS Tools Folder

Click icon

to enter

You can move desktop icons into the Tools Folder by pressing on the icon for a few seconds until the screen below appears:



You can also move an icon back to the desktop by pressing on the icon for a few seconds until it asks you if you want to move the icon back to the desktop

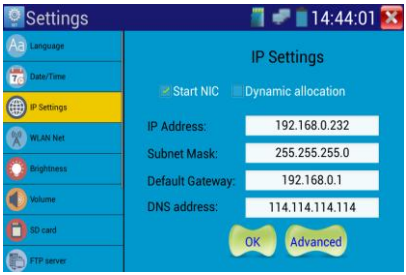
3.3.24 System Setting

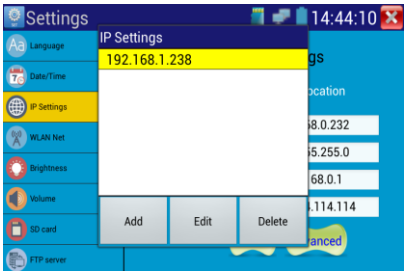
Click icon to enter

Language: Select your desired language: English, Chinese, Korean, Russian, Italian or Polish.

Date/Time: Set the Date/time of the IP tester

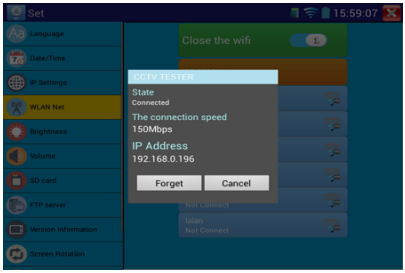
IP setting: Manually set the IP address, Subnet Mask, Default Gateway and DNS address or select "Dynamic allocation" to use DHCP. To test multiple network segments, click "Advanced" and then click "Add" to enter another IP address for the IP tester





After setting an advanced IP address (refer to above photos), the tester can test two network segments (192.168.0.0) and (192.168.1.0).

WLAN Net: Turn WiFi off or on by pressing the “Open the wifi” button. Once WiFi is turned on, it will scan for wireless networks in your area. Select the desired wireless network SSID and enter your password to connect.

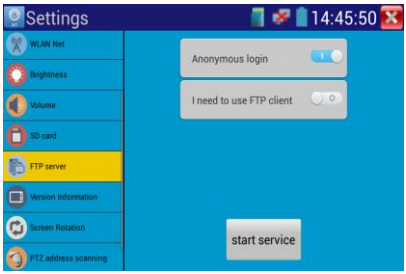


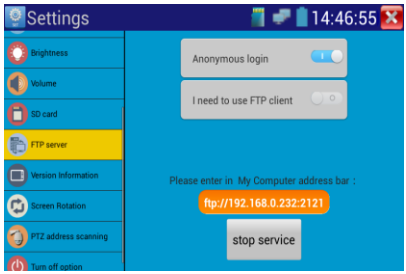
Brightness: Set the desired brightness of the IP tester and adjust the sleep time settings.

Volume: Set volume level

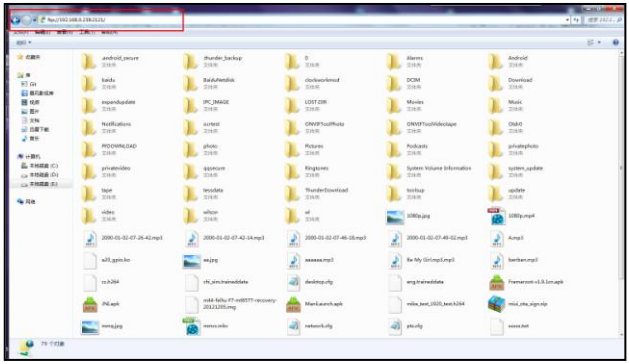
SD Card: Displays SD Card Capacity. You can also format the SD card or unmount it before removing it.

FTP server: Once the IP tester connects to a network, a computer can be used to read the SD card files via FTP





Start the FTP server and then input the tester's FTP address in the PC's address bar. This will enable the PC to read, copy and edit the files from the SD card without the use of SD card reader.



Power display: Display the battery level information

Version information: This displays the version information for each application

Screen display rotation: Click on "Screen Rotation" to flip the IP tester's display 180 degrees. This function is very convenient for the user to connect the LAN cable on the bottom of the unit without having to flip the unit itself.

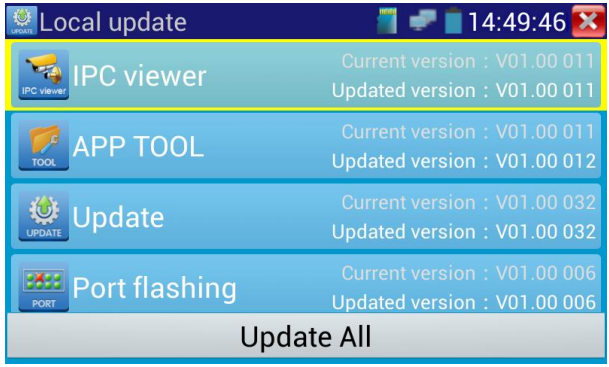
PTZ address scan : You can toggle the PTZ Address scan off or on before entering the "PTZ controller" app. This needs to be turned on in order to use the PTZ Scan feature of the PTZ app.

Turn off option: If you select "Fast turn off", the tester will shut down faster but data will not save. To avoid unnecessary problems, it is recommended not to use the "Fast turn off" option.

3.3.25 Update

Click the

icon to open the Update menu. Select “Local Update” to update via the SD card or select “Online Update” to check for updates on the internet. If there are applications that need updating, the applications will be displayed on the screen. Click the relevant applications to update them to the latest version.



3.4 HDMI output

The built in HDMI output port can output live video from an analog or IP camera, recorded files, media files and images to HDTV monitors. Connect an HDMI cable from the IP tester to an HDTV monitor at any time. It supports up to 1080P resolution.

3.5 PoE power output

The IP tester supports PoE (Power over Ethernet) output to an IP camera via the LAN port. Data transmission and 48VDC use the network cable's 1, 2, 3, and 6 pins to deliver power. If the IP camera supports PoE, you can directly connect to the camera without the use of an external power supply.

Notice

a. Please make sure the cable connected to the tester's Lan port is straight-line cable and has no short circuit, otherwise will damage the tester

b. Before using PoE power output, pls check the IP camera whether supports POE powered. Otherwise it will damage the IP camera.

c.The instrument's PoE maximum power output is 24W. If Ultra- high-power load happens, the tester will enter protection mode .

3.6 DC12V 2A power output

When the IP tester is turned on, the 12VDC power output ON by default. The smaller end of the supplied converter cable connects to the tester's DC12V/2A OUTPUT and the other end connects to the camera's power input.

Application

Power output function is mainly used in the camera field demonstration and testing, meanwhile, for some camera installation sites, if there is no power outlet for the adapter to power the camera, the tester can offer temporary power for it. But we do not suggest tester supply power for a long time.

Notice:

a. Don't input any power into the "DC12/2A OUTPUT" port of the tester

b. Man-made damage is not within our company's warranty

c. The IP tester's power output capacity is 2A. If the IP camera uses more than 2A, the tester will automatically enter a protection mode

d. . Disconnect all cables from the tester and reboot it to resume using the tester.

The IPC tester power output is close to 2A, if the IP camera's power is over 2V, the tester will auto enter protection mode. Disconnect all the connections of the tester and then connect the tester with power adaptor to resume the tester.

e. Make sure the tester has a sufficient charge otherwise the tester will not able to provide enough output power

3.7 USB 5V 2A power output

When the tester is turned on, the 12V DC and 5V DC power output functions are automatically turned on. If the IP tester is turned off, the 5VDC USB can still be used to power an external USB device.

NOTE: The USB port is for power only and not data.

3.8 Audio test

You can test the audio input from audio pickup devices by connecting the audio pickup device to the IP tester with the supplied audio cable.

4. Specifications

4.1 General Specifications

Model	LTA-X43M
Display	4.3 inch capacitive touch screen , resolution 800（RGB）x 480
Network port	10/100M auto adapt,RJ45
WIFI	Built in WIFI,speeds150M, allows you to connect to a wireless network and view IP cameras
IP discovery	auto-scan IP camera address
Rapid ONVIF	search camera quickly, auto log in and display image from the camera, activate Hikvision camera
NVMS7000	Activate LTS camera, display image from the camera, modify IP, user name and password parameters etc
Hik test tool	Activate Hikvision camera, display image from the camera, modify IP, user name and password parameters etc
DH test tool	Dahua camera test, modify IP, user name and password parameters etc
IP camera type	ONVIF,ONVIF PTZ, Dahua IPC-HFW2100P, Hikvision DS-2CD864-E13, Samsung SNZ-5200, Tiandy TD-NC9200S2, Kodak IPC120L, Honeywell HICC-2300T, RTSP Viewer
CVI video Signal Test	1 channel CVI input（BNC interface）, support resolution:720p 25,30,50,60fps/ 1080p 25,30fps
TVI video Signal Test	1 channel TVI input（BNC interface）, support resolution:720p 25,30,50,60fps/ 1080p 25,30fps， 3M/5M TVI@
AHD video Signal Test	1 channel AHD input（BNC interface）, support resolution:720p 25,30fps / 1080p 25,30fps
Analog Video test	1 channel BNC Input & 1 channel BNC Output , NTSC/PAL (Auto adapt)
Zoom Image	Supports Analog and IP camera image zooming & movement
Snapshot,Video	Capture still images and record live video. Media player will view photos and

record and playback	playback video
HDMI output	1 channel HDMI output, supports up to 1080p
PoE power output	48V PoE power output, Max power 24W
12V/2Apower output	Output DC12V/2A power for camera
USB 5V power output	5V 2A power output only ,no data
Audio test	1 channel audio signal input and 1 channel audio signal output to connect headphones
PTZ control	Support RS232/RS485 control, Baud 600-115200bps, Compatible with more than 30 protocols such as PELCO-D/P, Samsung, Panasonic, Lilin, Yaan, etc
color bar generator	Output one channel PAL/NTSC color bar video signal for testing monitor or video cable.(red, green ,blue, white and black color)
UTP Cable tester	Test UTP cable connection status and display on the screen. Read the number on the screen
Data monitor	Captures and analyzes the command data from controlling device, also can send hexadecimal
Network test	IP address scan, link scan, and Ping test. Quickly search the for IP camera's IP address on your network
PoE /PSE voltage test	Measures PoE switch voltage and displays pin configuration
POWER	
External power supply	DC 12V（2A）
Battery	Built-in 7.4V Lithium polymer battery , 5000mAh
Rechargeable	After charging 7~8 hours, normal working time 16 hours
Parameter	
Operation setting	Capacitive touch screen, OSD menu, select your desired language: English, Chinese, Korean, Russian, Italian or Polish, etc
Auto off	5-30 (mins)
General	

Working Temperature	-10℃---+50℃
Working Humidity	30%-90%
Dimension/Weight	215mm x 127mm x 53mm / 0.82kg

The data above is only for reference and any change of them will not be informed in advance. For more detailed technical inquiries, please feel free to call the Technical Department of our company.