COMPRO
TECHNOLOGY

Mini Dome Network Camera

Quick Installation Guide

Before attempting to set up or operate this camera, please read this installation guide and retain it for future reference.

Model No.

NC2200

V1-120619
P/N: 3GA0310812

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Contents

Table of Contents

Important Notices 2
Regulatory Notice 2
Safety Rules 2
Product Overview 3
Package contents 3
Hardware Overview 4
Installation 6
Wall / Ceiling Mount 6
Connect the Cables 10
Adjust the Lens 12
Change SD Memory Card 13
Install Camera Software 14
Operation 15
Access the Camera 15
Access the Camera over the Internet 16
Reset to the Factory Default Settings 17
Technical Specifications 18
NC2200 Technical Specifications 18
Technical Support Information 21
Contact Compro Technical Support 21

Important Notices

Regulatory Notice

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.

FCC Interference Statement

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 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.

To assure continued compliance, any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

Safety Rules

- The camera ought to be installed by a qualified technician.
- Place the camera on a steady surface whenever possible.
- Do not drop the camera body to the ground; it may cause the damage to main parts.
- Do not shake, move or disturb the camera when it is in operation, as such actions may result in the malfunction of the device.
- Power off the camera as soon as it is found smoking or smelt unusual.
- Please do not place the camera around the heat sources, such as television or microwave oven.
- Please do not remodel the camera; it may cause damage or fire.
- Please do not attempt to repair the camera on your own; contact Compro or your local distributor for repair service.

Product Overview

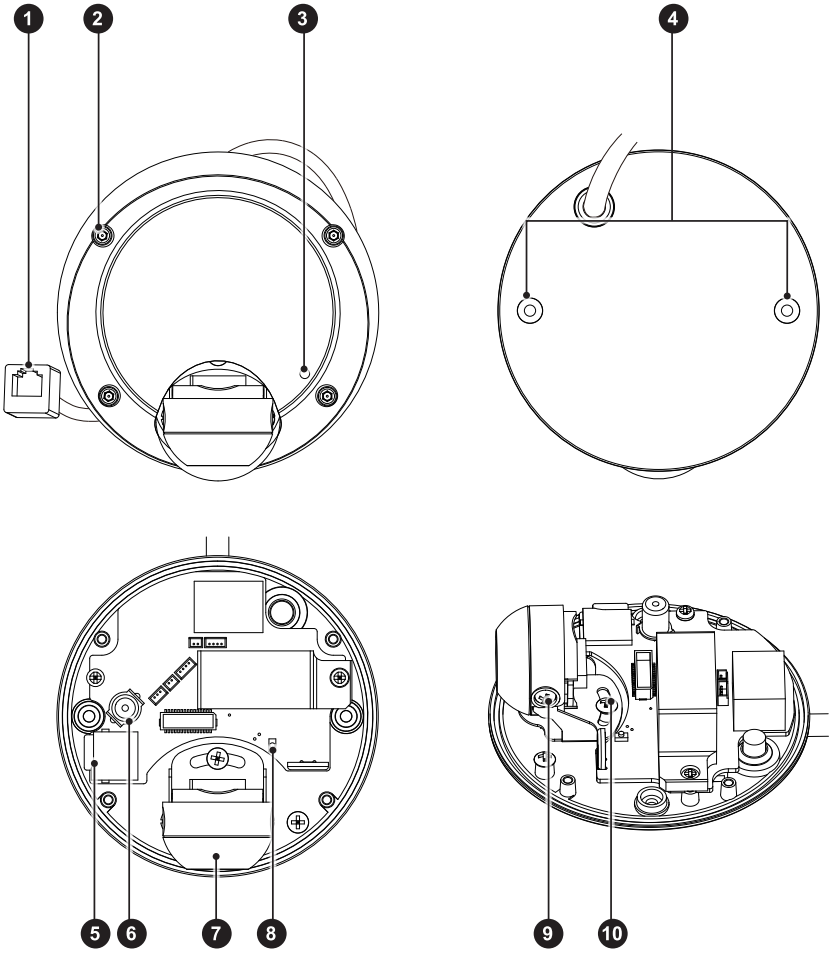
Package contents

The following is a list of items included in the package. Please check the package contents on your hand. If anything is missing, please don't hesitate to contact your local distributor.

Qty	Item	Description
1	Network camera	Compro NC2200 network camera
1	Wall mount base	For mounting the camera on the wall
4	Self-tapping screw	For fastening the wall mount base to the wall, or for ceiling mouting the camera without using wall mount base
4	Screw anchor	For fastening wall mount base in concrete
2	Screw for wall mount base	For fastening the camera to the wall mount base; must be used with rubber o-ring
2	Rubber O-ring	Prevents water from entering the casing
1	Hex key	For removing the camera's top cover
1	Installation Guide	Providing instructions on installation

Hardware Overview

Camera Layout

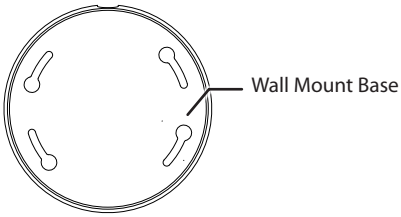


No.	Name	Description
1	Ethernet port	For connection to the network
2	Socket head screw (4 in total)	To remove the top cover, unscrew the 4 socket head screws with the supplied hex key
3	Microphone pinhole	For receiving ambient sound
4	Screw holes for wall mount base/ceiling mounting	For installing the wall mount base; for ceiling mouting the camera without the use of wall mount base
5	microSD card slot	Push the memory card in order to release it
6	Composite video jack	For connecting to a standad TV and helping you adjust camera angle during installation
7	Lens	Fixed iris, F 2.0, f 1.96mm
8	Reset button	Press and hold the button to reset the camera back to factory defaults
9	Tilt adjustment screw	2 tilt adjustment screws hold the tilting position of the camera
10	Pan adjustment screw	For holding the panning position of the camera

Installation

Wall / Ceiling Mount

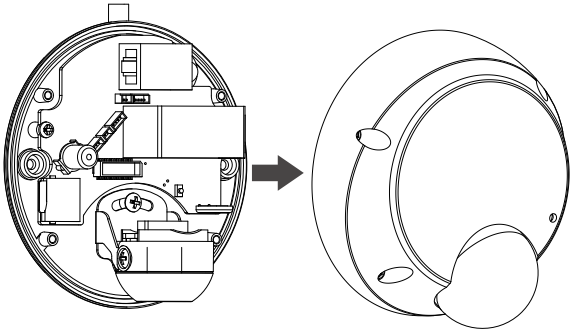
The camera can be mounted on a wall or ceiling with or without the supplied wall mount base installed. The wall mount base is generally used for wall mount applications when the camera's cable is not run through the mounting surface.



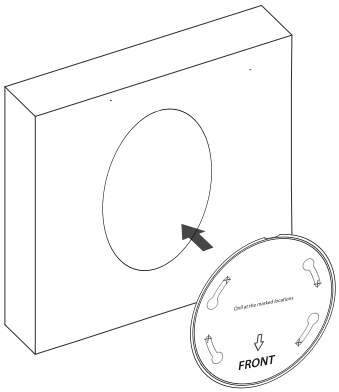
If you want to feed the camera's cable through a dropped ceiling, you can drill a cable hole on the mounting surface and then mount the camera without using the wall mount base. The following sections explain 2 different mounting options.

Using Wall Mount Base

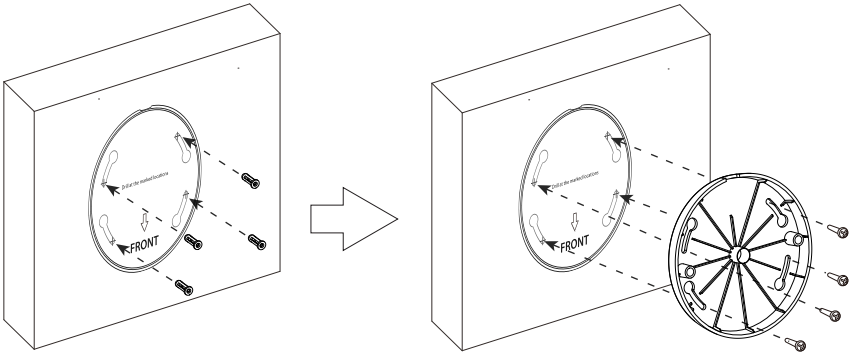
1. Use the supplied hex key to unscrew the top cover from the camera.



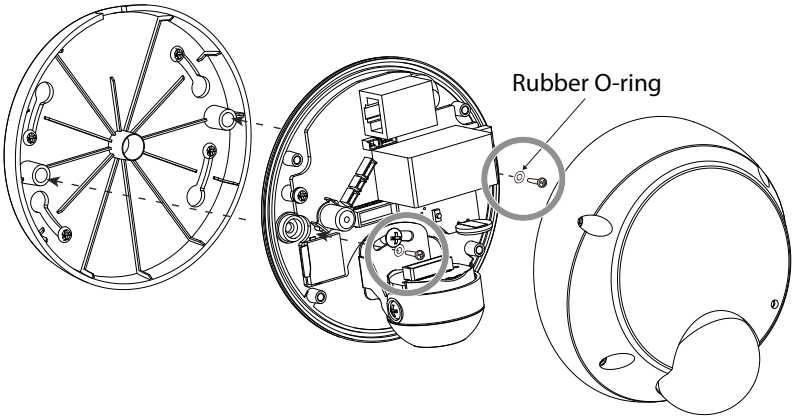
2. Stick the supplied drill template A to the wall (or place the wall mount base against the wall to mark the screw hole locations). Then drill 4 mounting holes on the wall.



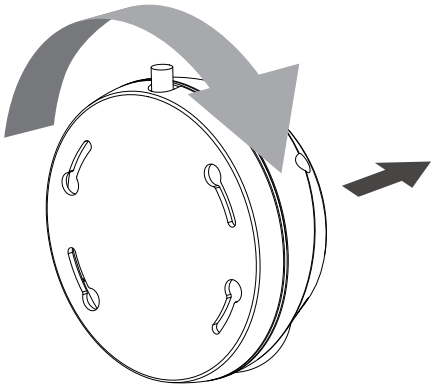
3. Then, if you're mounting on a concrete wall, insert a screw anchor into each of the mounting holes. After that, secure the wall mount base to the wall with the supplied self-tapping screws.



4. Fasten the camera to the wall mount base on the wall. Make sure you use a supplied rubber O-ring in between the screws and the screw holes (as circled) to avoid moisture entering the casing. Finally, re-attach the camera's top cover and secure the screws tightly with the supplied hex key.

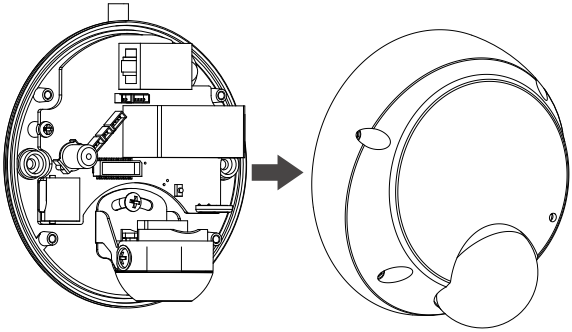


Note: Should you ever need to detach the mounted camera from the wall in the future, simply twist the camera in counter-clockwise direction and then pull it off the wall.

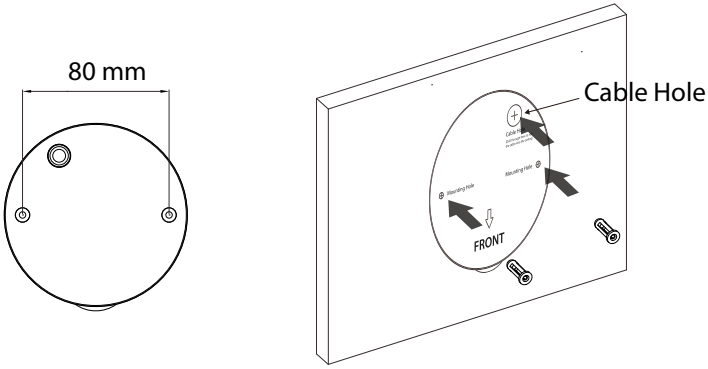


Without Using Wall Mount Base

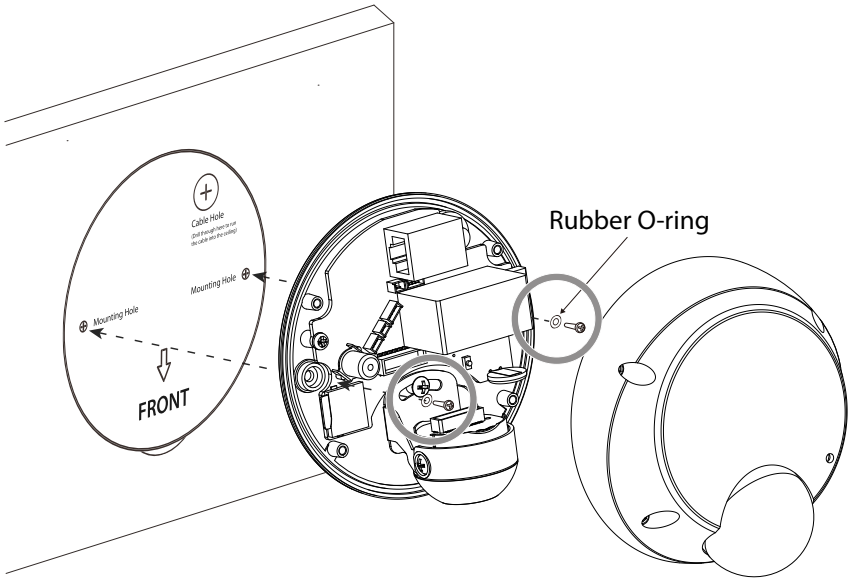
1. Use the supplied hex key to remove the top cover.



2. Drill 2 mounting holes on the mounting surface. The 2 screw holes should be spaced exactly 80 mm (3.15 inch) apart to correspond to the position of mounting holes on the camera. (Or use the supplied drill template B to drill the mounting holes.) Then drill a cable hole if you need to run the cable through the mounting surface.



3. Fix the camera to the mounting surface with the supplied self-tapping screws. Make sure you use a supplied rubber O-ring in between the screws and the screw holes (as circled) to avoid moisture entering the casing. Feed the camera's cable through the cable hole. Lastly, re-attach the camera's top cover and secure the screws tightly with the supplied hex key.

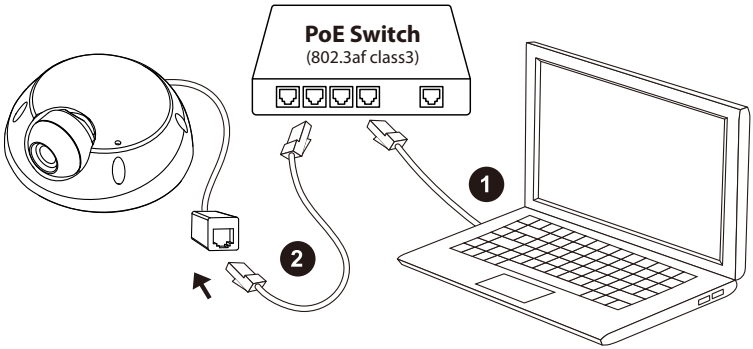


Connect the Cables

This camera can only be powered using PoE (Power-over-Ethernet), which allows electrical power and IP data to be both delivered on a single Ethernet cable. The following instructions explain ways to connect this PoE-enabeld network camera.

Using a PoE Switch

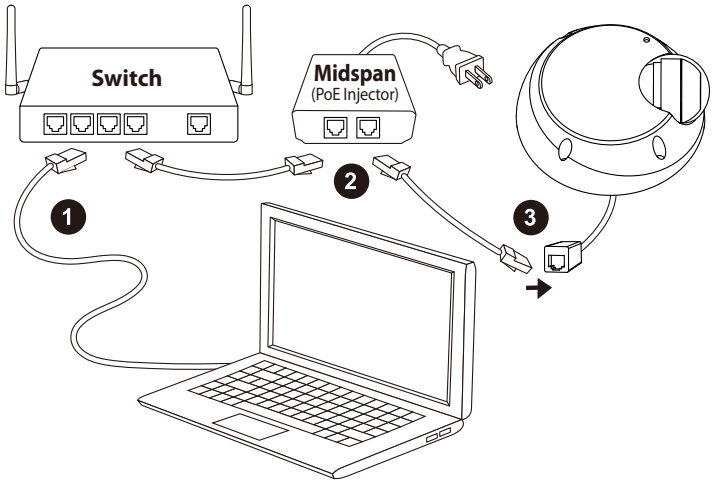
If the Ethernet ports on your network switch/router support PoE, connect your camera in the following way:



1. Ethernet cable from PC to PoE switch/router: If your Ethernet cable from PC has been connected to your Cable/ADSL modem, please re-connect it to the non-PoE Ethernet port of your network switch/router.
2. Ethernet port of the camera: Use the bundled RJ-45 Ethernet cable to connect the Ethernet port of the network camera to the PoE port of your network switch/router.

Using a Non-PoE Switch

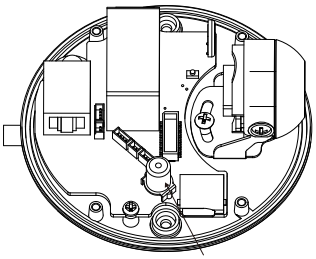
If you are using the camera with a non PoE capable network switch/router, please prepare a PoE injector (midspan, not supplied) first in order to power the camera. Then connect your camera in the following way:



1. Ethernet cable from PC to switch/router: If your Ethernet cable from PC has been connected to your Cable/ADSL modem, please re-connect it to the Ethernet port of your network switch/router.
2. Ethernet port on PoE injector: Use a RJ-45 Ethernet cable to connect the Ethernet port of the network switch/router to the RJ-45 connector on PoE injector marked "IN". Then connect the power of your PoE injector.
3. Ethernet port on camera: Attach a RJ-45 Ethernet cable from the "OUT" RJ-45 connector on PoE injector to the Ethernet port of the network camera.

Adjust the Lens

To adjust the direction of the lens, you need to remove the camera's top cover first. You can connect the camera's composite video jack to the video input jack of your TV to aid you in lens adjustment.

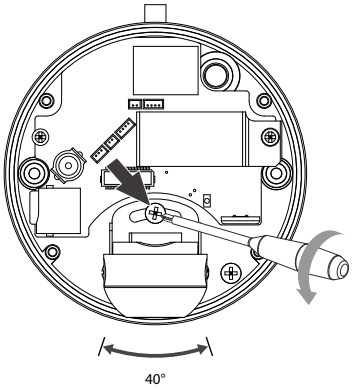


Composite Video Output

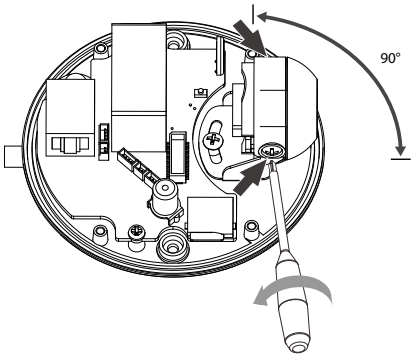
Adjust Pan/Tilt

To adjust the camera's panning or tilting position:

1. Loosen the pan adjustment screw and then gently twist the lens holder left or right to adjust the camera's panning position. The camera allows for 40 degrees of pan adjustment, as shown in below figure.



2. Tighten the pan adjustment screw and then, if necessary, go on to adjust the tilting position.
3. Loosen the tilt adjustment screw on both sides of the lens holder, as shown in below figure, and then gently tilt the lens holder up or down to adjust the camera's tilting position. The camera allows for 90 degrees of tilt adjustment.

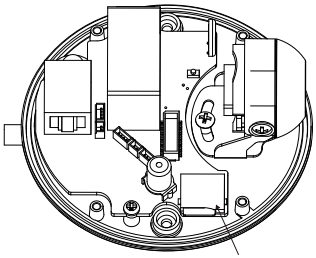


4. Having obtained the optimal result, tighten the tilt adjustment screws and re-attach the top cover to complete the operation.

Change SD Memory Card

The camera comes with a 4GB microSD card pre-installed inside the housing. The SD memory card is user-upgradeable. The following explains how to change the SD memory card.

1. Power off the camera. Then loosen the fixing screws on the top cover with the supplied hex key and remove the top cover.
2. Locate the microSD card slot. Then push the pre-installed SD card gently to release it.



3. Pull the SD card out and insert a new one into the slot. Finally, re-install the top cover to complete the upgrade.

Install Camera Software

After the camera is powered on and is connected to the same home/office network that your viewing PC connects to, you can then begin software installation by inserting the installation CD included in the package into the CD-ROM drive of your viewing PC. Then the Compro iWizard setup utility will start automatically to guide you through the installation process. If the iWizard doesn't start on its own, browse the contents of the installation CD and double-click on the "iWizard.exe" file to run the setup wizard.

After the Compro iWizard is launched, select the displayed language first. Then click [IP Camera Setup] and select the camera model you wish to install, and follow the on-screen instructions to complete the software installation. Note if you see the Windows Security Alert dialog box during wizard setup, please choose [Unblock]. (If your PC is running Windows 7/ Vista, you need to run iWizard tool with system administrator rights. Simply right click on the iWizard icon on your desktop, and select "Run as administrator.")

Access the Camera

Find Out the Camera's IP Address

Using the iWizard setup utility to search for your Compro IP camera on the LAN network is the easiest way to find out your camera's IP address, as the IP address of your camera will be revealed in the search result.

To start searching for your camera using iWizard, double-click on the iWizard icon (or insert the installation CD into the CD-ROM drive of your viewing PC) to launch the iWizard setup utility. Then select your language and a camera model, and go ahead to scan for all the available Compro IP surveillance products installed on your LAN network. The scanning generally takes around 1 minute to complete, and once the scanning completes, you shall see your Compro IP camera and its IP address on the list. Then you can double-click your camera on the list to view live camera video right away on the Internet Explorer.

If your camera does not turn up on the list, try performing another search. Or try connecting your IP camera directly to your viewing PC, and run iWizard again to manually configure the camera's IP address.

View Live Camera Video

After you have determined the camera's IP address, you may now:

1. Open the Internet Explorer on your viewing PC.
2. Enter the camera's IP address in the address bar. (e.g. 192.168.0.100)
3. A dialog box that requests the user name and password appears; enter a valid user name and password, and then press OK. The default user name and password are both "admin".
4. After valid user name and password are entered, Internet Explorer will prompt the installation of camera software from "Compro Technology, Inc."
5. Click on the warning message and choose to install the ActiveX. (Compro ActiveX

components only support 32-bit Internet Explorer. Hence, if the viewing computer system is running 64-bit version of Windows, the 32-bit version of Internet Explorer must still be used to access the camera.)

6. And then the reconfirmation dialog box will come up. Please press [Install] twice to install both the "USActiveX.cab" and "ComproClientActivex.cab" on your system.
7. Meanwhile, the Windows Security Alert dialog may appear. Please click [Unblock] to unblock it from firewall.
8. Now you can start using WebVUer on Internet Explorer to watch live video and manage IP camera.

Access the Camera over the Internet

To view camera video remotely over the Internet, one will need to:

1. Ensure that the camera's image quality setting stays within the bandwidth limit. Check the camera's image quality setting in [Setup] > [Video]. If the quality setting exceeds the upstream bandwidth limit, stuttering video or even blank screen may occur.
2. Check the network ports used by the camera by going to [Setup] > [Network] and note down the HTTP and RTSP port number, which are 80 and 554 respectively by default.
3. Set up port forwarding on the router that the camera connects to, and allow traffic on ports the IP camera is using. Consult the user manual of your router for port forwarding setup instructions. (When configuring port forwarding/mapping on your

router, note that the public RTSP port must be equal to the internal RTSP port used by the IP camera.)

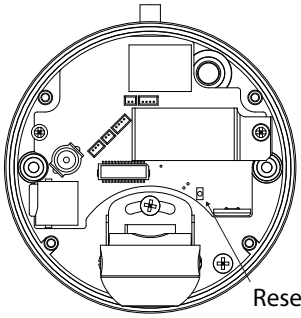
After configuring port forwarding successfully, you can now log on to the IP camera from a remote location by entering the camera's IP address plus its HTTP port number in the location field of Internet Explorer. For example, enter "http://61.220.20.16:80".

If you have multiple Compro IP cameras installed, you will need to change the HTTP and RTSP port on them manually so each one of them will use a different port. For instance, let the second camera use HTTP port 81 and RTSP port 555 and log on to "http://61.220.20.16:81" to access the second camera.

Reset to the Factory Default Settings

If you forget your system password or if you feel your IP camera has been acting weird, you can follow the steps below to reset the camera to its default state in which it will be obtaining IP address from the available local DHCP server. To reset the camera:

1. Detach the camera's top cover. Locate the reset button as shown in below figure.



2. Press and hold the reset button for about 10 seconds.
3. After the camera is reset, it will take 1 minute to reboot. Please wait patiently and start the Compro iWizard later again to scan for and re-configure the camera.

Technical Specifications

NC2200 Technical Specifications

CAMERA	Sensor	1/3" CMOS 2-Megapixel sensor
	Lens	Fixed iris, F 2.0, f 1.96mm
	Zoom	10x digital
	Angle of View	105°
	Min Illumination	1.0 lux
	Shutter Time	1/5 ~ 1/16000 Sec.
	Camera Angle Adjustment	40° pan, 90° tilt
VIDEO	Video Format	M-JPEG, MPEG-4, H.264
	Resolutions	160x120, 320 x 240, 640 x 480, 1280 x 1024, 1600 x 1200
	Frame Rate	Turbo picture mode:1600 x1200 up to 15 FPS Motion adaptive mode: HDTV 720P (1280 x 720) up to 30 FPS; VGA or below up to 30 FPS
	Video Streaming	Dual video stream supported
	Dynamic Control	Active bandwidth management, activity adaptive streaming
	Image Settings	Adjustable image size and quality AGC, AWB, AES Configurable brightness, saturation and sharpness
AUDIO	Compression Format	G.711 PCM 64 Kbit/sec
	Audio Input / Output	Built-in microphone
System Integration System Integration	Intelligent Analytics	Motion detection, tampering detection, loitering detection, audio detection, multi-zone/sensitivity
	Triggering Event	Analytics, schedule, network failure
	Triggering Reaction	SMS, snapshot, local/remote recording, e-mail, FTP, alarm output, ComproView® notification
	SDK	Yes

Local Storage	Local Storage	Built-in microSD memory slot (with a pre-installed 4GB memory card)
	Format	AVI (audio incl.), by events or schedule; JPEG, file name format customizable
Network	Protocols	3GPP, ARP, DDNS, DHCP, DNS, FTP, HTTP, ICMP/IPv4, IGP, NTP, PPPoE, QoS, RSP, RTSP, SMTP, TCP/IP, UDP, UPnP
	Ethernet	10/100 Base-T, autosensing, RJ-45
	User Group	2 levels, unlimited users, ID/password protected, max 10 simultaneous users
	Diagnostics	Auto connectivity diagnosis, auto bandwidth detection, iWizard
Remote Surveillance	Mobile Surveillance	M-JPEG, 3GPP over Android, BlackBerry, iPhone, Windows Mobile (features vary)
	Web Surveillance	16-CH WebVUer over Internet Explorer, Chrome, Firefox, Safari (features vary)
	Advanced Surveillance	ComproView® 32-CH surveillance system
General	Unit Configuration	Rebooting, factory default, date/time synchronization, user profile management, firmware upgrade, OSD, multilingual UI
	User Authentication	ID, password
	Firmware	HTTP mode
	OSD	Text or image overlay, 4 locations
	Language	Chinese Traditional, Chinese Simplified, German, Spanish, English, Japanese, Portuguese, Russian, Turkish, Ukrainian, Bulgarian
	Regulatory	CE, FCC
Mechanical	Weather Resistance	IP66
	Dimensions	103mm x Ø100 x 56 mm (L x W x H)
	Weight (Net)	270g
Electrical	Input Voltage	PoE (Power-over-Ethernet) only
	PoE	IEEE 802.3af Class 3

Environ-mental	Operating Temperature	-20~ 55 °C / -4 ~ 131 °F
	Humidity	20~80% RH non-condensing
Browsing Requirement	OS	Microsoft Windows XP SP3, Vista SP1, 7 (x86/x64)
	Processor	Intel 2.8 GHz, 2GB RAM
	Web Browser	Microsoft Internet Explorer 8.0 or above, non-IE browsers require 3rd-party VLC plugin

* Specifications are subject to change without prior notice.

Technical Support Information

Contact Compro Technical Support

If you need any technical support, fill out the online form (http://comprousa.com/en/form.htm) or directly email to support@comprousa.com.

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