

USER MANUAL AND QUICK START GUIDE

**Network IP Cameras
IDCMR-IP-POE-DMIP**

This device meets the CAN ICES-3 (A)/NMB-3(A) standards requirements.

Safety Instruction

These instructions are intended to ensure that the user can use the product correctly to avoid danger or property loss.

The precaution measure is divided into ‘Warnings’ and ‘Cautions’:

Warnings: Serious injury or death may be caused if any of these warnings are neglected.

Cautions: Injury or equipment damage may be caused if any of these cautions are neglected.

	
Warnings Follow these safeguards to prevent serious injury or death.	Cautions Follow these precautions to prevent potential injury or material damage.



Warnings:

- This installation should be made by a qualified service person and should conform to all the local codes.
- Please install blackouts equipment into the power supply circuit for convenient supply interruption.
- If the product does not work properly, please contact your dealer or the nearest service center. Never attempt to disassemble the camera yourself. (We shall not assume any responsibility for problems caused by unauthorized repair or maintenance.)

**Cautions:**

- Make sure the power supply voltage is correct before using the camera.
- Do not drop the camera or subject it to physical shock.
- Do not touch sensor modules with fingers. If cleaning is necessary, use a clean cloth with a bit of ethanol and wipe it gently. If the camera will not be used for an extended period of time, put on the lens cap to protect the sensor from dirt.
- Do not aim the camera lens at the strong light such as sun or incandescent lamp. The strong light can cause fatal damage to the camera.
- The sensor may be burned out by a laser beam, so when any laser equipment is being used, make sure that the surface of the sensor not be exposed to the laser beam.
- Do not place the camera in extremely hot, cold temperatures (the operating temperature should be between -30°C ~ 60°C), and do not expose it to high electromagnetic radiation.
- To avoid heat accumulation, good ventilation is required for a proper operating environment.
- Keep the camera away from water and any liquid during installation.
- While shipping, the camera should be packed in its original packing.

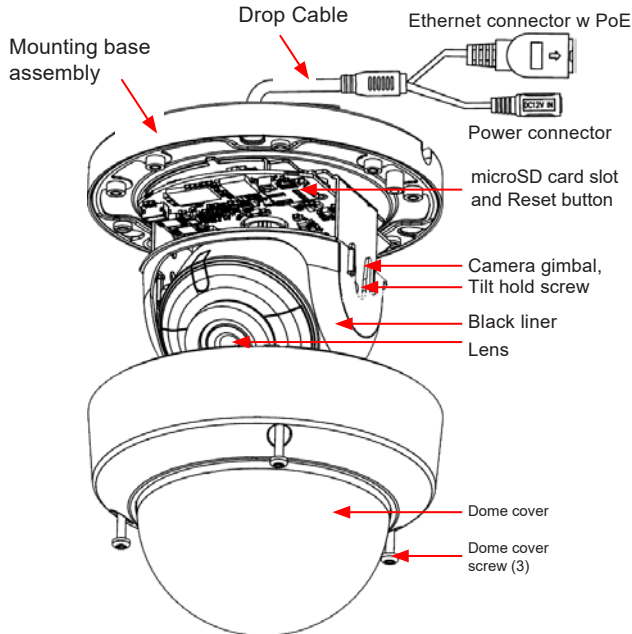
Notes:

For the camera supports IR, you are required to pay attention to the following precautions to prevent IR reflection:

- Dust or grease on the dome cover will cause IR reflection. Please do not remove the dome cover film until the installation is finished. If there is dust or grease on the dome cover, clean the dome cover with clean soft cloth and isopropyl alcohol.
- Make certain the installation location does not have reflective surfaces of objects too close to the camera. The IR light from the camera may reflect back into the lens causing reflection.
- The foam ring around the lens must be seated flush against the inner surface of the bubble to isolate the lens from the IR LEDS. Fasten the dome cover to camera body so that the foam ring and the dome cover are attached seamlessly.

This document guides you through the basic steps to install and configure the IDCMR-IP-POE-DMIP dome cameras. These cameras feature:

- 2560 × 1920 resolution at 20 fps
- H.265+ / H.265 / H.264OVC / H.264 / MJPEG compression
- 120 dB Wide Dynamic Range
- 120 ft Full Frame Illumination Smart IR array
- Supports onboard storage up to 128GB Max microSD (card not included)
- IP67, IK10 rated, -22 °F ~ 140 °F temperature range
- ONVIF Profile S & Profile G, PSIA, CGI, ISAPI



What's in the box

Your camera includes:

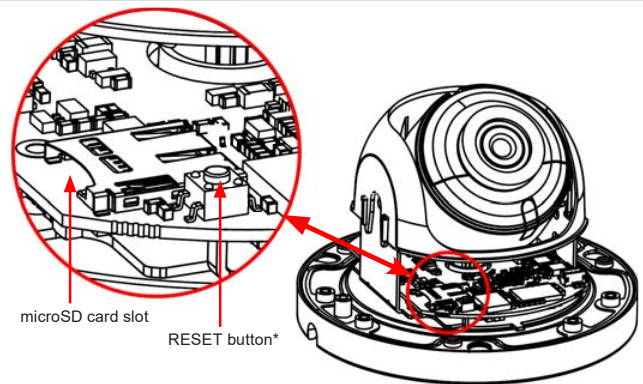
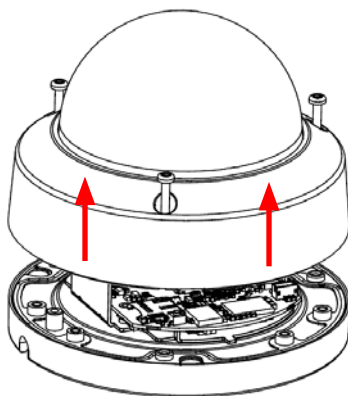
- This document
- Drill template
- Waterproof Ethernet fitting
- Mounting screws and wall inserts



Step 1. Install the camera

The camera includes hardware to install it directly to a ceiling (horizontal surface) or wall (vertical surface). The camera drop cable can be routed through the mounting surface, or through the drop cable channel in the base. To install the camera:

1. Remove the dome cover. Unscrew the three captive screws, and then lift the cover off of the mounting base assembly. A tether cable may be attached to the dome and the base assembly.



* To restore the camera with its default configuration (including user name, password, IP address, etc.) press and hold the **Reset** button for 30s while powering on the camera.

3. Determine the best location for mounting the camera to the mounting surface. The mounting surface should hold at least three times the weight of the camera.
4. Determine the best fasteners for mounting the camera to the mounting surface. The mounting hardware provided is adequate for many surfaces.
5. Using the template provided or the camera mounting base as a template, mark the locations of the holes for the mounting screws. Also mark the location of a hole for the camera drop cables if needed.
6. Drill holes into the mounting surface as needed. Also, drill a hole for the drop cable, if needed.
7. Route extension cables from the power source and LAN switch (or LAN with PoE) to the mounting location.
8. Connect the network LAN and power extension cables to the camera drop cables:
 - a. Connect the Ethernet LAN cable to the camera LAN drop cable. Protect the connection from moisture and other contamination, if necessary. A Weatherproof Ethernet Fitting is provided. Installation instructions for the fitting are included on the next page.



WARNING Failure of the power or Ethernet connector due to moisture or another contaminant is considered an installation error, which voids the warranty. If installing this camera in a location such as an overhang, shop, garage, kitchen, etc. where high humidity or dust is present, seal these connections adequately.

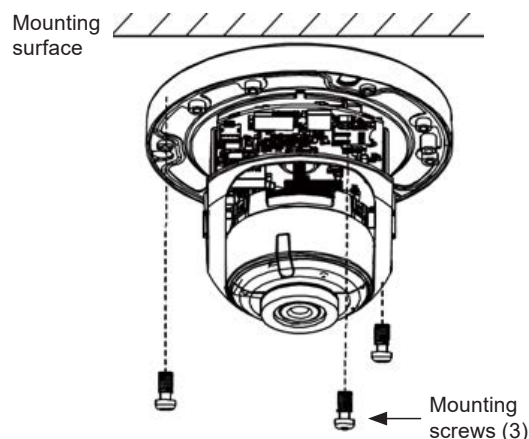
- b. If the camera is not powered using PoE (Power over Ethernet injector), connect the 12Vdc power cable to the camera drop cable. The polarity of the drop cable connector is shown below.





Do not apply power to the camera at this time. Before applying power to the camera, ensure that the polarity is correct. An incorrect connection may cause a malfunction and can damage the camera.

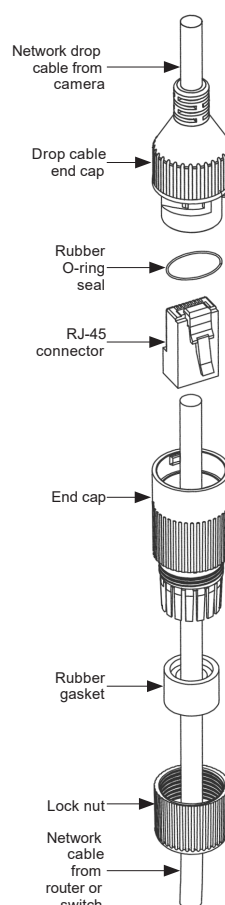
9. Route the camera drop cable through the cable channel in the base, or through the hole in the mounting surface, and then secure the camera to the mounting surface using appropriate screws.



Using the Waterproof Ethernet Fitting

Install the **Waterproof Ethernet Fitting** on the Ethernet cable end at the camera when moisture or contamination exists in the area near the camera. The fitting includes several parts that must be installed in a specific order. To install the fitting:

1. Place the rubber O-ring over the camera drop cable end cap. Push the O-ring up to the connector cap.
2. If an RJ-45 connector is installed on the network cable, from the router or switch, remove it.
3. Place the Lock Nut onto the network cable from the router or switch as shown in the drawing to the right. The inside threads must be toward the camera end.
4. Place the rubber basket onto the network cable above the lock nut as shown.
5. Place the end cap onto the network cable above the rubber gasket as shown. The fingered end must be toward the router or switch.
6. Install an RJ-45 connector onto the network cable.
7. Plug the RJ-45 connector with the network cable into the camera network drop cable.
8. Fit the end cap on the network cable onto the camera drop cable end cap. Rotate the network cable end cap to lock it in place.
9. Push the rubber gasket fully into the end of the network cable end cap.
10. Screw the lock nut onto the network cable end cap until it is fully seated.

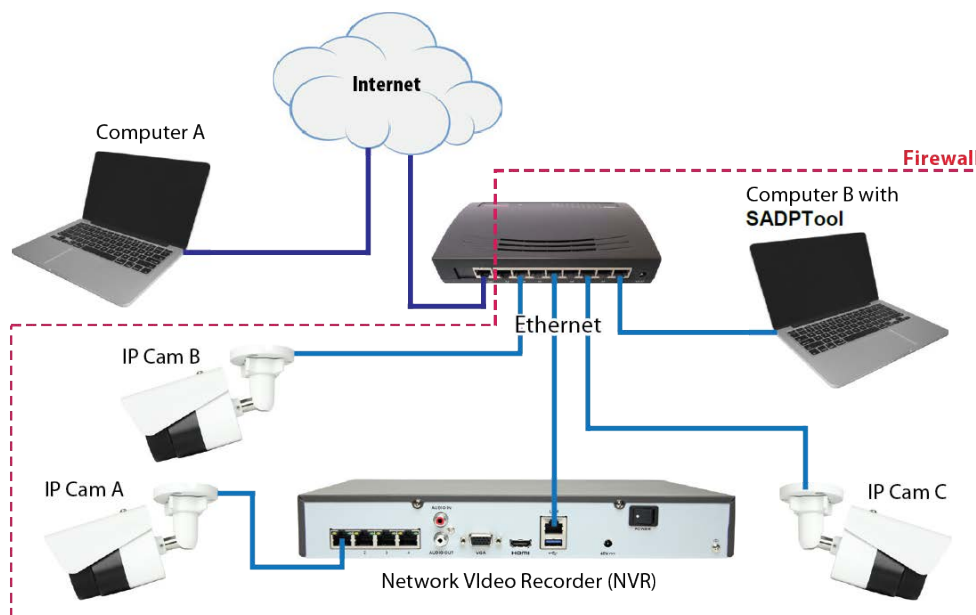


Waterproof Ethernet Fitting assembled and connected

Network IP cameras are usually installed on a network in either of two ways:

Connected to the internal switch of a network video recorder (NVR): In this configuration, Ethernet cables connect the camera directly to an NVR back panel. The NVR automatically "Activates" the camera and configures the camera's network parameters to establish a communications link between them. In the diagram below, **IP Cam A** is connected to the NVR which activates the camera and sets up its network parameters.

Connected to a PoE Network switch: In this configuration, Ethernet drop cables connect the camera to a network switch. The network utility, **SADP Tool**, is used to "Activate" the camera and configure the camera's network parameters so that the camera can communicate across the network. In the diagram below, **IP Cam B** and **IP Cam C** are connected to the router, and are activated with the **SADP Tool** on **Computer B**.



In the diagram above, **NOTE** that:

- **Computer A** cannot directly access any devices within the router firewall (with a browser) unless the device is activated and setup with network parameters compatible with the router, and the router is configured for port forwarding to the device.
- **Computer B** with **SADP Tool** is used to activate cameras connected directly to the router (**IP Cam B**, **IP Cam C**) and setup their network parameters. After devices on the router are activated and configured for the network, **Computer B** can access each device using Internet Explorer or by reloading the page in Internet Explorer mode in the Edge browser.

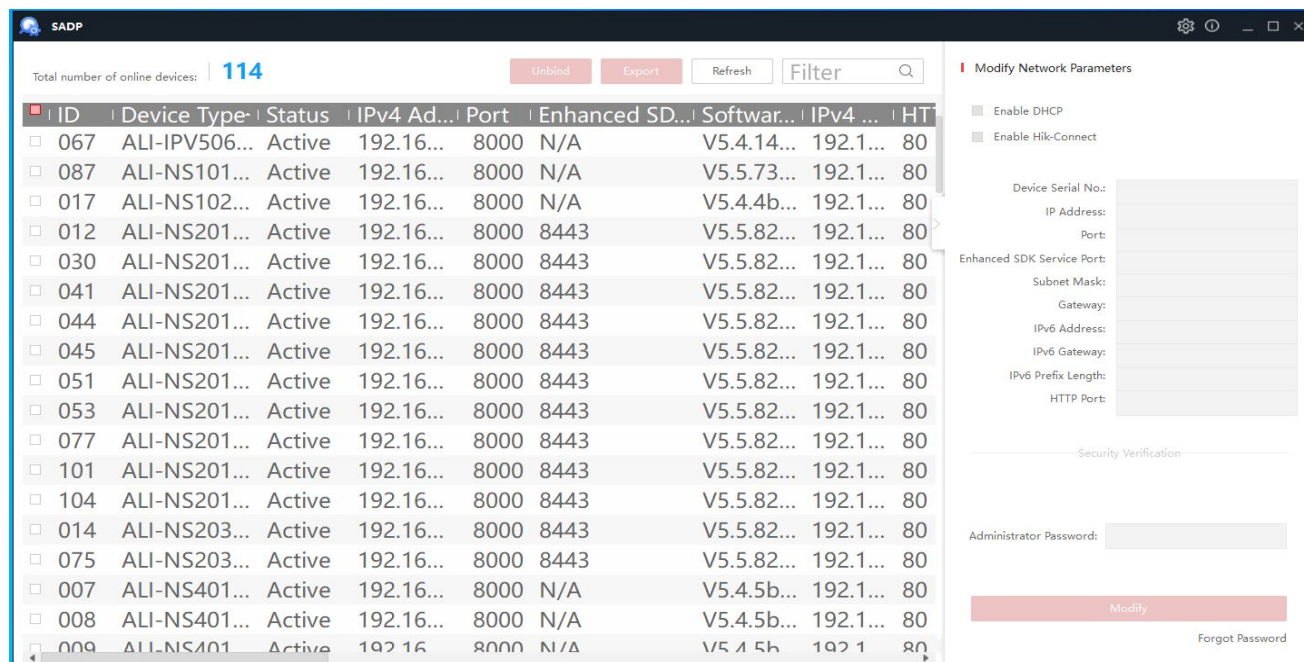
This guide provides generic instructions for activating and setting up the network parameters for new cameras **Connected to the network switch** using the **SADP Tool**. The examples shown herein activate a camera and configure its network settings. Currently, the procedure is identical for all new network attached IP cameras.

About the SADP Tool

The SADP Tool is a PC-based network utility for discovery of compatible devices on an IP network. It provides an easy way to activate devices, configure camera and record network configuration settings, and set device passwords. It can be installed on a Microsoft Windows operating system that has access to the IP network where your devices are installed.

Step 1. Install the SADP Software

1. Download the SADP Tool from the website: <https://www.larsonelectronics.com/images/upload/SADPTool.zip>. At the time this document was published, the file is named: **SADPTool.zip** and is 115 MB.
2. Un-zip the file on a computer with Microsoft Windows (Windows 7 or newer) that is connected to the LAN where your camera is connected.
3. Run the file contained in the zip file: **SADPTool.exe**. Follow the on-screen instructions to install the file.
NOTE : Be sure to allow the software administrative access or it will not work properly.
4. Open the SADPTool application. When the application opens, it automatically “discovers” and lists all compatible devices on the LAN. The discovery of devices can take several minutes. See below.



Step 2. “Activate” Inactive Camera

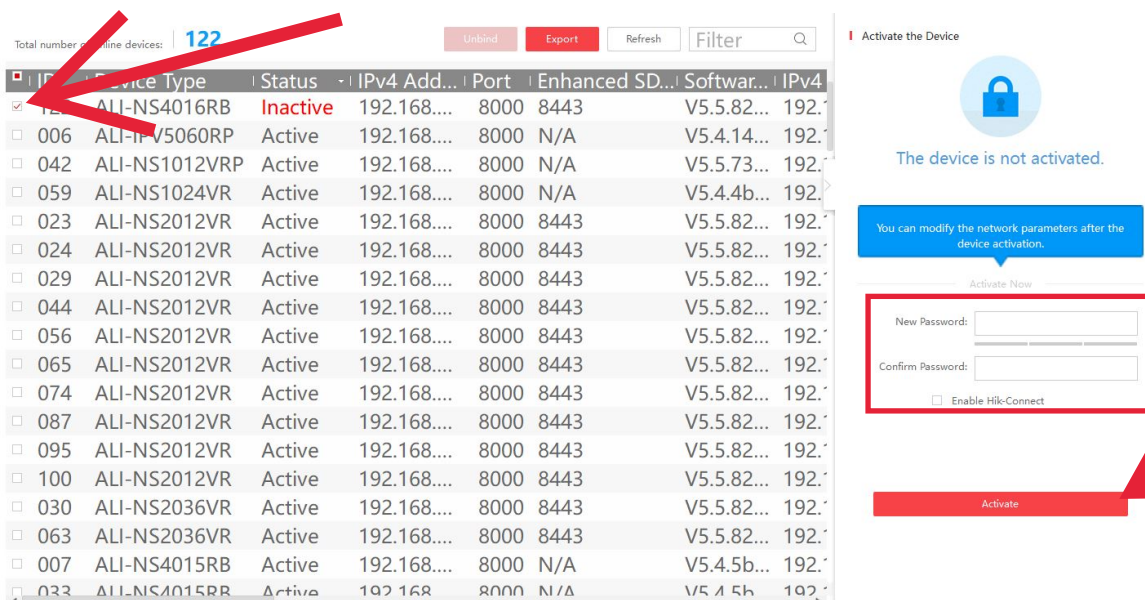
NOTE: Cameras are activated when shipped with the default IP Address of 192.168.3.xxx. The last set of numbers in your IP address will be random, but will always be in the 192.168.3.xxx subnet. Network settings may be changed in the SADP Tool. See *Step 3. Modify Network Parameters*

DEFAULTS: Username: admin Password: 12345abc!

When a camera is first installed, or reset to its factory configuration, it must be “Activated” before it can be used. In the SADP Tool, “Inactive” devices have a **Security** status of **Inactive**. A device is “Activated” when a password is assigned to the **admin** username of the device.

In the example below, a camera is activated and configured for its network.

1. Scan through the list of devices the SADP Tool discovered for the Inactive device you want to activate (see below). Click on the device in the list to highlight it, and then click the select box to check it.



The screenshot shows the SADP Tool interface. On the left, a table lists discovered devices. A red arrow points to the first device, which is highlighted. On the right, the 'Activate the Device' window is open, showing a message 'The device is not activated.' and a form to enter a new password. A red arrow points to the 'Activate' button at the bottom of the window.

ID	Device Type	Status	IPv4 Add...	Port	Enhanced SD...	Softwar...	IPv4
122	ALI-NS4016RB	Inactive	192.168...	8000	8443	V5.5.82...	192.1...
006	ALI-IPV5060RP	Active	192.168...	8000	N/A	V5.4.14...	192.1...
042	ALI-NS1012VRP	Active	192.168...	8000	N/A	V5.5.73...	192.1...
059	ALI-NS1024VR	Active	192.168...	8000	N/A	V5.4.4b...	192.1...
023	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
024	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
029	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
044	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
056	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
065	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
074	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
087	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
095	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
100	ALI-NS2012VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
030	ALI-NS2036VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
063	ALI-NS2036VR	Active	192.168...	8000	8443	V5.5.82...	192.1...
007	ALI-NS4015RB	Active	192.168...	8000	N/A	V5.4.5b...	192.1...
033	ALI-NS4015RB	Active	192.168...	8000	N/A	V5.4.5b...	192.1...

Activate the Device

The device is not activated.

You can modify the network parameters after the device activation.

Activate Now

New Password:

Confirm Password:

☐ Enable Hik-Connect

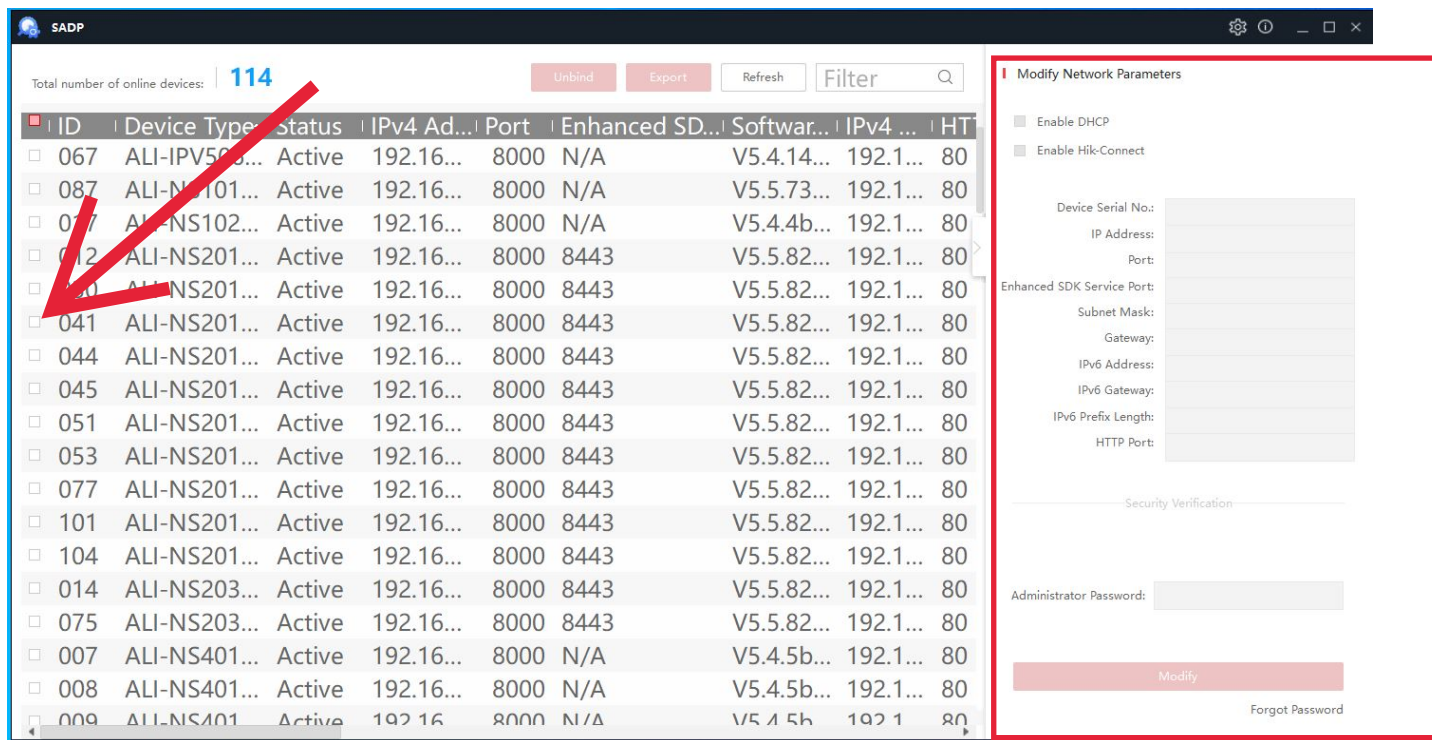
Activate

2. In the Device Activation window, create a password for the *admin* (administrator) username:
 - a. In the Device Activation window, enter a password for *admin* in the **New Password** field. Use a combination of uppercase, lowercase alphabetic characters and numbers to create a "Strong" password. The rating is shown beneath the field. See above.
 - b. Enter the *admin* password again in the **Confirm** field, and then click **Activate**.
 - c. Record your *admin* password for reference later.

CAUTION: If you lose your *admin* (administrator) password, you cannot configure the device or restore it to its factory settings. To reset your password, **call** your support organization for specific instructions.

Step 3. Modify Network Parameters

1. In the list of devices discovered, find the device you want to change the network settings for, click the select box to check it, and then see the **Modify Network Parameters** window. See below.



SADP

Total number of online devices: 114

Unbind Export Refresh Filter

ID	Device Type	Status	IPv4 Ad...	Port	Enhanced SD...	Softwar...	IPv4 ...	HT
☐ 067	ALI-IPV50...	Active	192.16...	8000	N/A	V5.4.14...	192.1...	80
☐ 087	ALI-NS101...	Active	192.16...	8000	N/A	V5.5.73...	192.1...	80
☐ 077	ALI-NS102...	Active	192.16...	8000	N/A	V5.4.4b...	192.1...	80
☐ 012	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 041	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 044	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 045	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 051	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 053	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 077	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 101	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 104	ALI-NS201...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 014	ALI-NS203...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 075	ALI-NS203...	Active	192.16...	8000	8443	V5.5.82...	192.1...	80
☐ 007	ALI-NS401...	Active	192.16...	8000	N/A	V5.4.5b...	192.1...	80
☐ 008	ALI-NS401...	Active	192.16...	8000	N/A	V5.4.5b...	192.1...	80
☐ 009	ALI-NS401...	Active	192.16...	8000	N/A	V5.4.5b...	192.1...	80

Modify Network Parameters

☐ Enable DHCP
☐ Enable Hik-Connect

Device Serial No.:
IP Address:
Port:
Enhanced SDK Service Port:
Subnet Mask:
Gateway:
IPv6 Address:
IPv6 Gateway:
IPv6 Prefix Length:
HTTP Port:

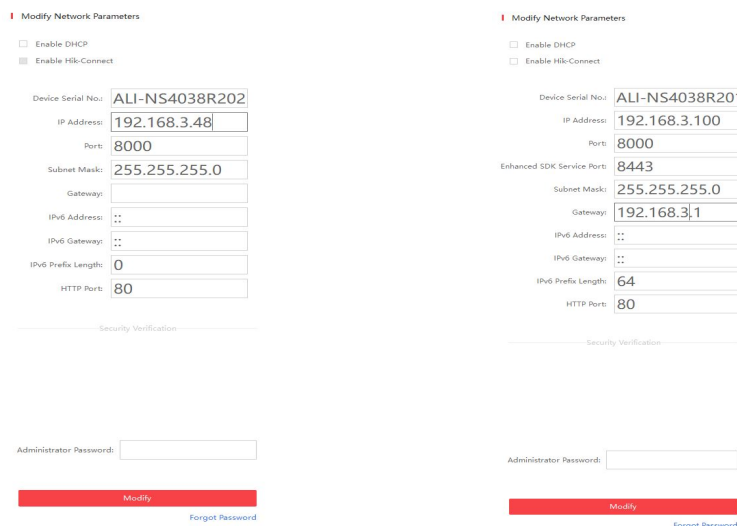
Security Verification

Administrator Password:

Modify

Forgot Password

2. In the Modify Network Parameters window, edit the correct network parameters, and then enter the *admin* user password in the field at the bottom.
 - a. **Enable DHCP:** You can select **Enable DHCP** to acquire compatible network settings from a DHCP server installed on the LAN. However, these settings can be changed by the DHCP server. Since it is recommended to use a static IP address, you can use DHCP to acquire compatible network settings, and then uncheck **Enable DHCP** and save that configuration to retain the new network parameters.
 - b. In the example below, the IPv4 address was changed to 192.168.3.100, and the IPv4 Gateway was changed to 192.168.3.1. These settings were determined to be compatible with the network switch and other devices that share the same network.



Modify Network Parameters

☐ Enable DHCP
☒ Enable Hik-Connect

Device Serial No.: ALI-NS4038R202

IP Address: 192.168.3.48

Port: 8000

Subnet Mask: 255.255.255.0

Gateway:

IPv6 Address:

IPv6 Gateway:

IPv6 Prefix Length: 0

HTTP Port: 80

Security Verification

Administrator Password:

Modify

Forgot Password

Modify Network Parameters

☐ Enable DHCP
☐ Enable Hik-Connect

Device Serial No.: ALI-NS4038R201

IP Address: 192.168.3.100

Port: 8000

Enhanced SDK Service Port: 8443

Subnet Mask: 255.255.255.0

Gateway: 192.168.3.1

IPv6 Address:

IPv6 Gateway:

IPv6 Prefix Length: 64

HTTP Port: 80

Security Verification

Administrator Password:

Modify

Forgot Password

3. Click **Modify** to save your settings.

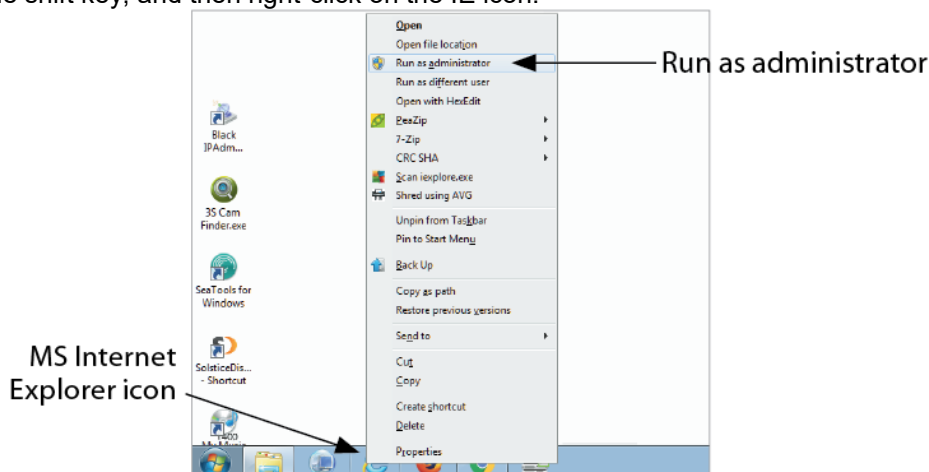
Step 4. Login to the camera

Microsoft Internet Explorer is used to access your camera remotely. Internet Explorer must run as an Administrator to use all features available through a remote login to the camera.

Setting MS Internet Explorer to run as an Administrator

Windows 7: To run Internet Explorer as an Administrator:

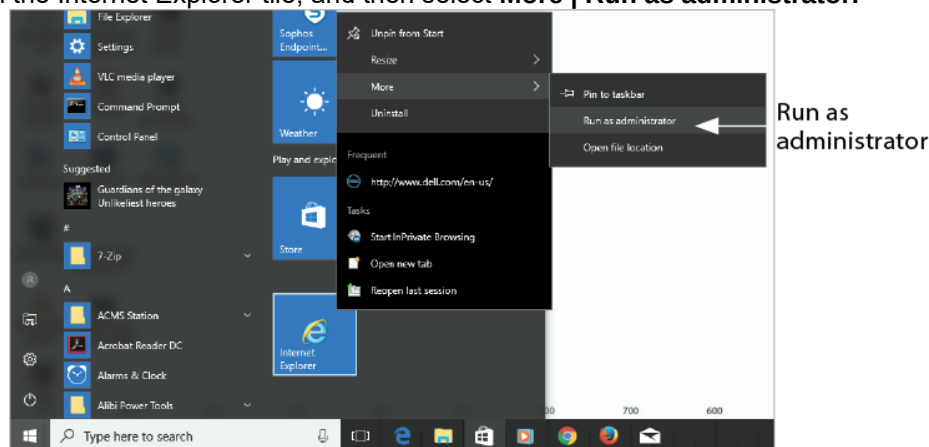
1. Find or create an IE icon on your computer desktop.
2. Hold down the shift key, and then right-click on the IE icon.



3. Click **Run as Administrator** in the pop-up menu.

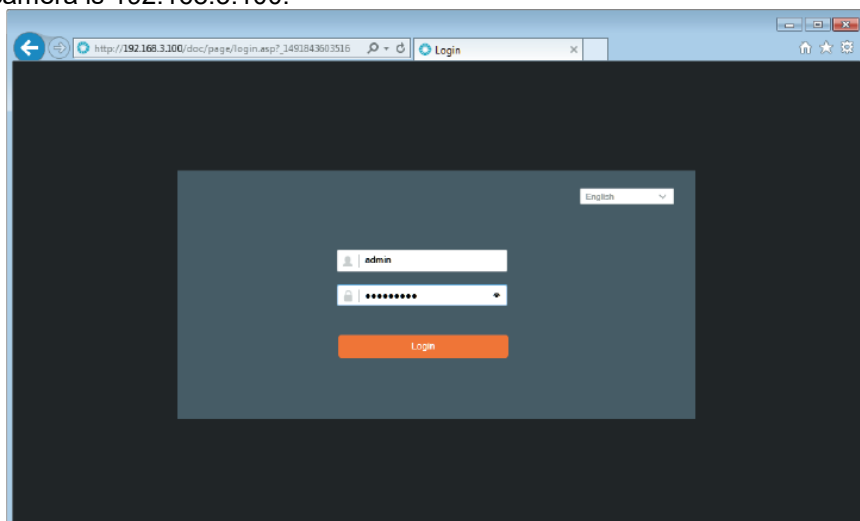
Windows 10: To run IE as an Administrator:

1. Find IE in the start menu. Usually this is found in the **Windows Accessories** group.
2. Pin the entry to **Start**.
3. Right click on the Internet Explorer tile, and then select **More | Run as administrator**.

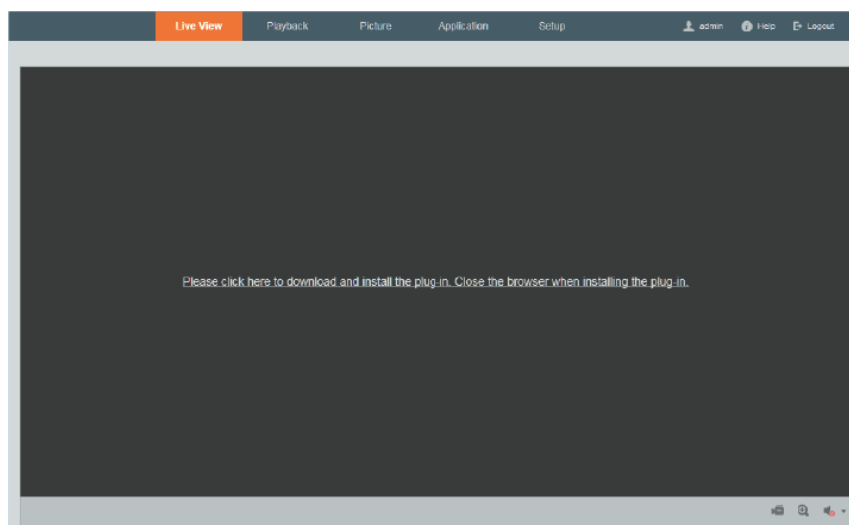


To login to the camera from a computer on the same LAN:

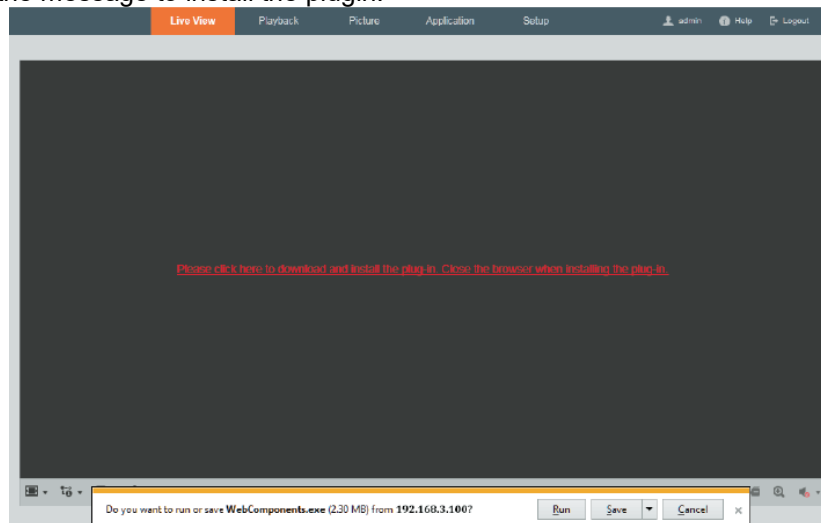
1. Open your IE browser and enter the IP address of the camera in the URL field. In the example below, the IP address of the camera is 192.168.3.100.



2. In the login window, enter **admin** for the **User Name** and password you created in the **Password** field, then click **Login**.
3. If this is the first time you are logging into a camera, you may see the message in the following screen. If this appears, follow the sub-steps below.



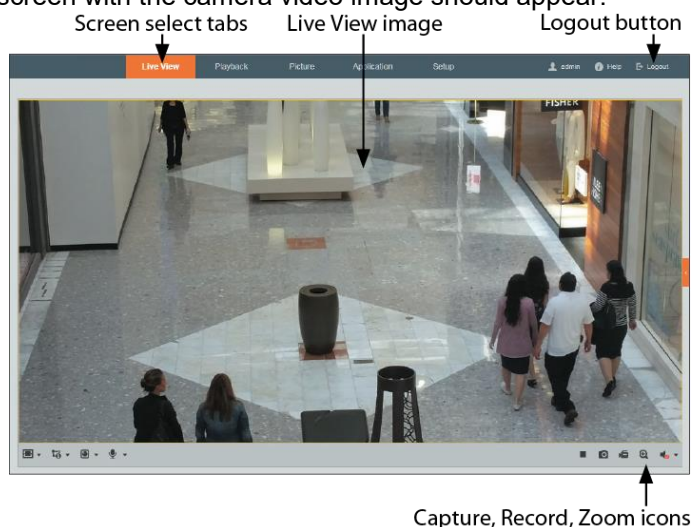
- a. Click on the message to install the plugin.



- b. In the message bar at the bottom of the screen, click **Run**. Follow the on-screen instructions to install **WebComponents**. When the following screen opens, click **Finish**.

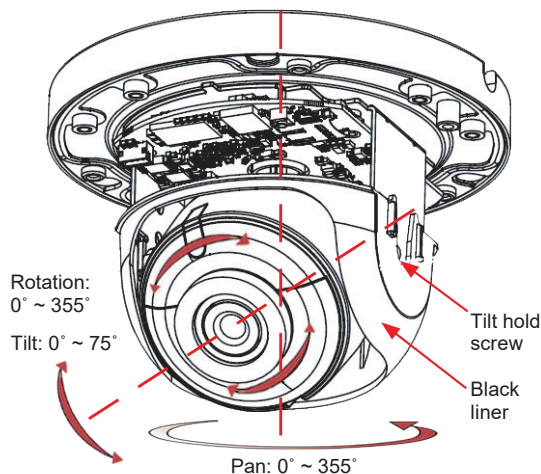


The Live View screen with the camera video image should appear.

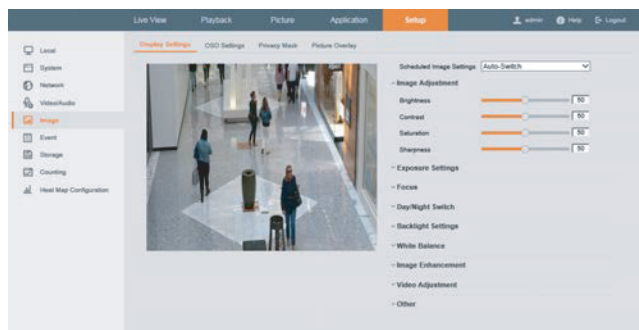


Step 5. Adjust the camera for your surveillance target

1. While observing live video from your camera in the Live View tab (see above), loosen the tilt hold screw (see below), and then adjust the pan, tilt and rotation to point at your surveillance target. It may be necessary to remove the black liner while adjusting the tilt or rotation. Tighten the tilt hold screw to hold the tilt position in place.



2. After adjusting the camera for the preferred field of view, click the **Setup** tab, and then click the Image link in the left frame.



Adjust the Brightness Contrast, Saturation and Sharpness of the image as follows.

- **Image Adjustment** submenu (see above): Adjust the Saturation, Hue, Brightness, Contrast and Sharpness of the video image. Each parameter can be set to a level of 0 ~ 100 either by moving the slider or entering the value in the box on the right. The effect of the adjustment will appear in the Live View image in the menu.

3. Open the other submenus on this screen. Adjust the following as needed. Refer to the Camera Firmware User Manual for your camera for additional information about parameter settings.

- **Exposure Settings** submenu: In this submenu, set the following for the best performance.

Iris Mode: Select Auto or Manual. Some cameras may not offer both options.

Exposure Time: Value ranges from 1/3 to 1/100,000 s. The nominal value is 1/150. Adjust it according to the lightening condition.

Gain: Set the gain to show the optimal brightness level.

- **Switch Day and Night:** Select either **Auto-Switch**, **Scheduled-Switch**, or **Triggered by Alarm Input**.

If using **Auto-Switch**, open the **Day/Night Switch** submenu to select the Sensitivity, Filtering Time, and Smart IR feature ON or OFF.

If using **Scheduled Switch**, set the **Start Time** and **End Time** of the switch, then open the **Day/Night Switch** submenu to select the **Smart IR** feature ON or OFF.

Also, click the **Common**, **Day** and **Night** tabs to set the Saturation, Hue, Brightness, Contrast and Sharpness for Day and for Night modes.

- **Day/Night Switch** submenu: You can set the Day/Night switch to Day, Night, Auto, or Schedule. The option you select determines the submenu options.

Day or Night: These options both have one parameter: Smart IR.

Auto: If you select Auto switch, you can set the sensitivity (0-7), filtering time and Smart IR.

Schedule: Use Schedule to set that **Start Time** and **End Time** for the switch. Smart IR is also selectable.

- **Backlight Settings:** Backlight settings include BLC Area (Off, UP, Down, Left, Right, Center), the area to control, and **WDR** (Wide Dynamic Range) ON or OFF.

- **White Balance:** White Balance selection is used to correct colors in the image depending on the lighting source. You can also set the white balance manually (MWB), using Automatic White Balance (AWB1), and lock the white balance setting (Locked WB).

- **Image Enhancement:** Options in this submenu include Digital Noise Reduction (DNR) ON or OFF. If ON, you can also adjust the level of noise reduction.

Video Adjustment: Video Adjustment includes:

Mirror: Mirror adjustment enables you to flip the image (Up/Down), flip Left/Right (reflect or Center).

Rotate: Rotate rotates the image +90 degrees. Rotate and Mirror can be used to adjust the image in any orientation.

Video Standard: Select 60 Hz for NTSC format.

Capture Mode: To make a complete use of the 16:9 aspect ratio, you can enable the capture mode when you use the camera in a narrow view scene.

- **Other:** Options in this menu depend on the features of the camera.

For more information about the IE browser interface to your camera, go to LarsonElectronics.com for the latest **IP Camera User Manual** for your camera.

NOTE: Most IP cameras have a **Reset** button for returning the camera configuration to its factory settings. The reset button needs to be pressed with the camera disconnected from power. Continue holding the reset button down and plug the camera back into power and continue to hold the reset button for an additional 30 - 45 seconds.

NOTE: For more details on using the functions of this camera, refer to the instruction manual for the Camera Management Software (CMS) you are using.

THESE INSTRUCTIONS MAY NOT COVER ALL DETAILS OR VARIATIONS OF THIS PRODUCT FOR YOUR EQUIPMENT OR INSTALLATION REQUIREMENTS. SHOULD FURTHER INFORMATION NOT COVERED BY THESE INSTRUCTIONS BE REQUIRED, PLEASE CONTACT LARSON ELECTRONICS BY EMAIL AT SALES@LARSONELECTRONICS.COM OR BY PHONE AT 1- 877-348-9680 FOR FURTHER ASSISTANCE.

PLEASE VISIT LARSONELECTRONICS.COM FOR **WARRANTY** AND **RETURN** INFORMATION.