



Model Numbers:

SBDE1-6V7-E2H-IR

SBDE1-10V7-E2H-IR

SBDE1-16V7-E2H-IR

Document number: C6754M

Publication date: 1/2025

Legal Notices

© 2025, Pelco Corporation. All rights reserved. PELCO, the PELCO logo, PELCO are trademarks of Pelco Corporation. ONVIF is a trademark of Onvif, Inc. Covered by one or more claims of the patents listed at patentlist.hevcadvance.com. Other names or logos mentioned herein may be the trademarks of their respective owners. The absence of the symbols ™ and ® in proximity to each trademark in this document or at all is not a disclaimer of ownership of the related trademark. Pelco Corporation protects its innovations with patents issued in the United States of America and other jurisdictions worldwide (see www.pelco.com). Unless stated explicitly and in writing, no license is granted with respect to any copyright, industrial design, trademark, patent or other intellectual property rights of Pelco Corporation or its licensors.

Disclaimer

This document has been compiled and published using product descriptions and specifications available at the time of publication. The contents of this document and the specifications of the products discussed herein are subject to change without notice. Pelco Corporation reserves the right to make any such changes without notice. Neither Pelco Corporation nor any of its affiliated companies: (1) guarantees the completeness or accuracy of the information contained in this document; or (2) is responsible for your use of, or reliance on, the information. Pelco Corporation shall not be responsible for any losses or damages (including consequential damages) caused by reliance on the information presented herein.

Pelco Corporation

www.pelco.com

C6754M

Revision: 1 - EN

20250225

Important Safety Information



WARNING

Failure to observe the following instructions may result in severe injury or death.

- Installation must be performed by qualified personnel only, and must conform to all local codes.
- This product is intended to be supplied by a UL Listed Power Unit marked “Class 2” or “LPS” or “Limited Power Source” with output rated Power over Ethernet (PoE), 25 W min.
- ESD to the camera when it is operating could cause a temporary loss of video. When servicing the camera appropriate ESD mitigation procedures should be followed. The operator should remove any static by grounding themselves before servicing the camera.
- Do not connect directly to mains power for any reason.



CAUTION

Failure to observe the following instructions may result in injury to persons or damage to the device.

- Do not expose the camera directly to high levels of x-ray, laser, or UV radiation. Direct exposure may cause permanent damage to the image sensor.
- Do not install near any heat sources such as radiators, heat registers, stoves, or other sources of heat.
- Do not subject the device cables to excessive stress, heavy loads or pinching.
- Do not open or disassemble the device. There are no user serviceable parts.
- Refer all device servicing to qualified personnel. Servicing may be required when the device has been damaged (such as from a liquid spill or fallen objects), has been exposed to rain or moisture, does not operate normally, or has been dropped.
- Do not use strong or abrasive detergents when cleaning the device body.
- Use only accessories recommended by Pelco.

Regulatory Notices

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.

This Class B digital apparatus complies with Canadian ICES-003 (B)/NMB-3(B).

This device complies with EN 60529 IP66, IP67 and IP68 rating.

This device complies with ISO 20653 IPX9K rating.

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

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

Changes or modifications made to this equipment not expressly approved by Pelco Corporation or parties authorized by Pelco Corporation could void the user's authority to operate this equipment.

To meet the requirements of the EN 50121-4 Railway Applications Standard, use an external power supply or POE injector that is also compliant with EN 50121-4. Please contact Pelco for assistance regarding supporting equipment.

To meet the requirements of the EN 50130-4 Alarm Systems Applications standard, use an external uninterruptible power supply (UPS).

This equipment contains a coin cell battery. Risk of fire, explosion, and burns. Do not disassemble, crush, heat above 100°C (212°F), or incinerate.

The use of EMC compliant support and auxiliary equipment with this device is required in order to fully comply with the EMC regulatory standards.

UK Product Security and Telecommunications Infrastructure (PSTI) Act: Pelco cameras comply with the PSTI requirements. For more information, see the published [PSTI Statement of Compliance](#).

For Korea

이 기기는 가정용(B급) 전자파적합기기로서 주로 가정에서 사용하는 것을 목적으로 하며, 모든 지역에서 사용할 수 있습니다.

Disposal and Recycling Information

When this product has reached the end of its useful life, please dispose of it according to your local environmental laws and guidelines.

European Union:



This symbol means that according to local laws and regulations your product should be disposed of separately from household waste. When this product reaches its end of life, take it to a collection point designated by local authorities. Some collection points accept products for free. The separate collection and recycling of your product at the time of disposal will help conserve natural resources and ensure that it is recycled in a manner that protects human health and the environment.

Table of Contents

Important Safety Information	3
Regulatory Notices	4
For Korea	4
Disposal and Recycling Information	5
Overview	3
Camera Module	3
Cover View	3
Internal View	4
Junction Box View	5
Mounting Plate View	6
Pendant Camera View	7
NPT Adapter View	8
Pendant Wall Mount View	8
Preparing for Installation	9
Pre-Deployment In-Box Configuration	9
Removing the Dual Head Cover	10
Mounting and Aiming Video Analytics Cameras	11
Inserting Cables through the Sealing Grommet	11
Surface Mount Installation	13
Surface Mount Required Tools and Materials	13
Surface Mount Package Contents	13
Installation Steps	13
Mounting the Camera to a Ceiling or Wall	13
Connecting Cables	15
Installing the Dual Head Cover	16
Junction Box Installation	18
Junction Box Required Tools and Materials	18
Junction Box Package Contents	18
Installation Steps	18
Using the Junction Box Mounting Adapter	18
Installing the Camera Base into the Junction Box	20
Connecting Cables	21
Installing the Dual Head Cover with the Junction Box	22

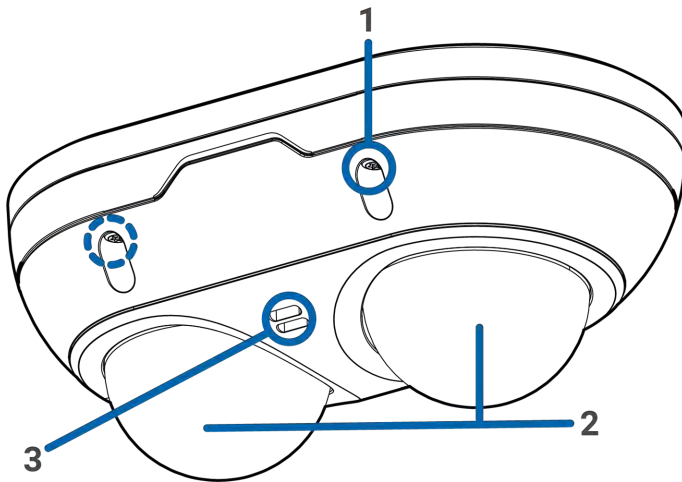
Sarix Enhanced Duo Cameras Installation Manual

Pendant Mount Installation	24
Pendant Mount Required Tools and Materials	24
Pendant Mount Package Contents	24
Installation Steps	24
Mounting the Camera to a Pipe	24
Mounting the Camera to the Pendant Wall Mount	26
Installing the Camera into the NPT Adapter	28
Connecting Cables	29
Installing the Dual Head Cover	30
Connecting a Camera to the Network	32
Initializing a Camera Username and Password	32
Assigning an IP Address	32
Accessing the Live Video Stream	33
Aiming the Dual Head Camera	33
Zooming and Focusing the Dome Camera	35
(Optional) Enabling the Microphone	35
(Optional) Configuring the Microphone	35
Configure the Microphone from the Camera Web Interface	36
(Optional) Configuring microSD Card Storage	36
Configuring the Camera	36
For More Information	36
Cable Connections	37
Connecting to External Devices	38
Connection Status LED Indicator	39
Troubleshooting Network Connections and LED Behavior	40
Resetting to Factory Default Settings	41
Cleaning	42
Dome Bubble	42
Body	42
Pelco Troubleshooting Contact Information	43

Overview

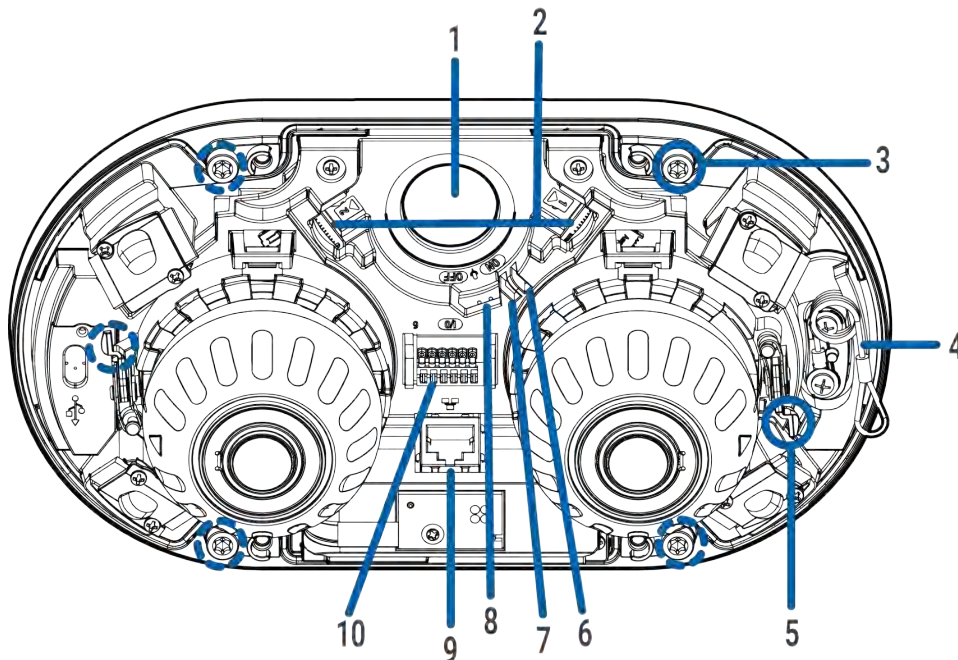
Camera Module

Cover View



1. **Tamper resistant screws**
Star-shaped captive screws to fix the dome cover to the base.
2. **Dome cover**
Vandal resistant dome cover.
3. **Microphone slots**
Allows sound to pass through the dome cover to the microphone.

Internal View

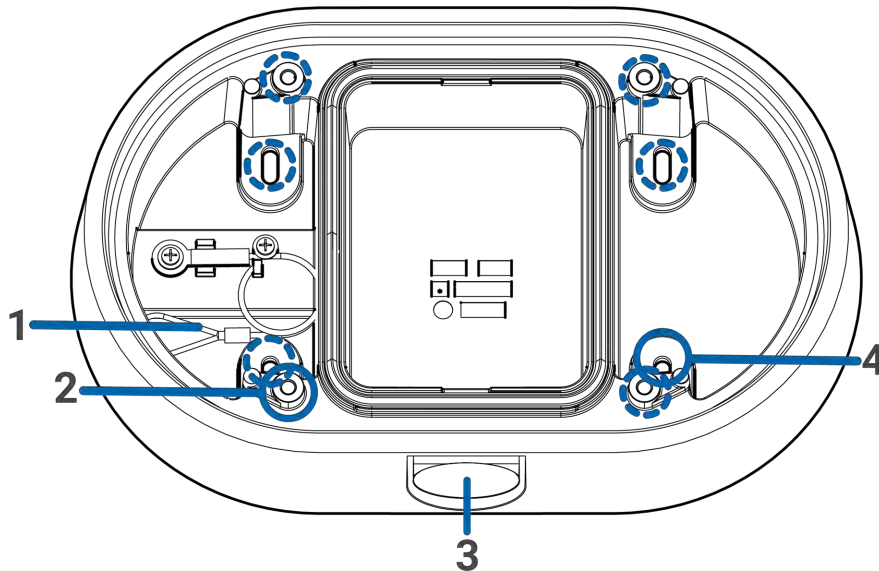


- 1. Cable entry hole**
An entry hole for the cables required for camera operation.
- 2. microSD card slots (x2)**
Accepts up to two microSD cards for onboard storage. Install microSD cards so the metal contacts are facing the base of the camera. For more information, see (Optional) Configuring Onboard Storage on page 36.
- 3. Mounting screws**
Screws for mounting the camera base to the mounting plate, junction box, or NPT adapter.
- 4. Lanyard**
Anchors the cover to the camera base.
- 5. Pan and tilt locking latch (x2)**
Locking mechanism to lock and unlock pan, tilt and azimuth adjustments for each camera head.
- 6. Link LED indicator**
Amber LED indicates if there is an active connection in the Ethernet port.
- 7. Connection status LED indicator**
Green LED provides information about device operation. For more information, see [Connection Status LED Indicator on page 39](#).
- 8. Microphone switch**
ON/OFF switch for the microphone.
- 9. Ethernet port**
Accepts an Ethernet connection to a network. Server communication and image data transmission occurs over this connection. Also receives power when it is connected to a network that provides Power over Ethernet.

10. I/O connector block

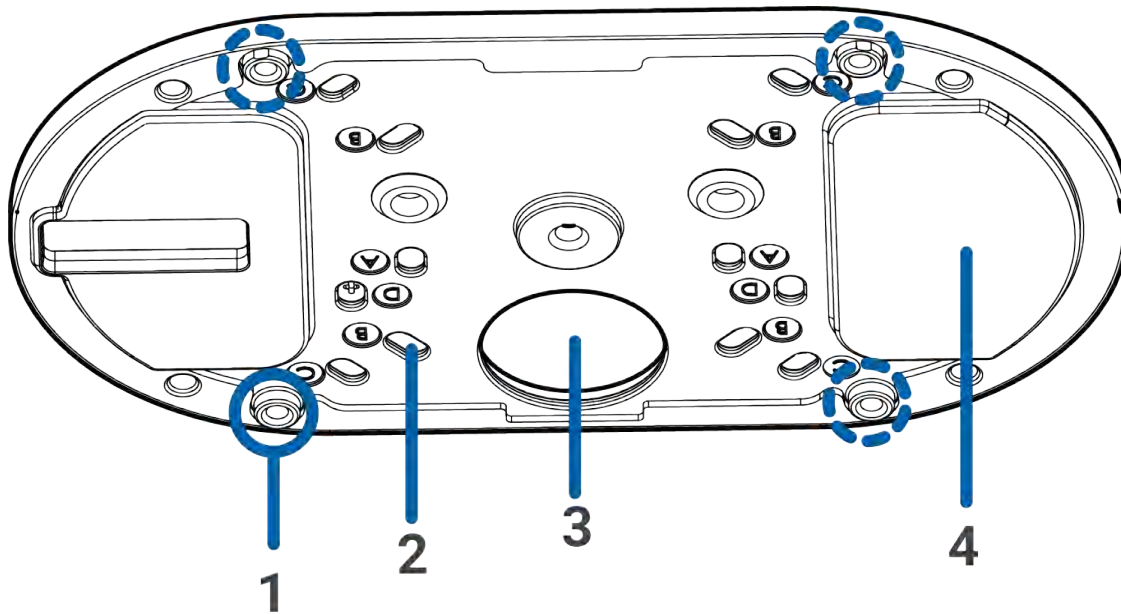
Provides connections to external input/output and audio devices. If using the optional electrical box wall plate adapter or NPT adapter, align the mounting posts with the mounting slots.

Junction Box View



1. **Lanyard**
Connects to the lanyard anchor on the camera base.
2. **Mounting holes**
Holes for mounting the junction box to the mounting surface.
3. **Side conduit entry hole**
An entry hole for the side conduit and cables required for camera operation.
4. **Mounting points**
The mounting points for securing the camera base to the junction box.

Mounting Plate View



1. Camera mounting points

Align the mounting points on the plate adapter to the mounting screws on the camera base.

2. Mounting holes

Holes for mounting the plate to the mounting surface or the following electrical boxes:

- a. UK standard single gang box
- b. Octagon gang box
- c. 4" gang box
- d. US standard single gang box

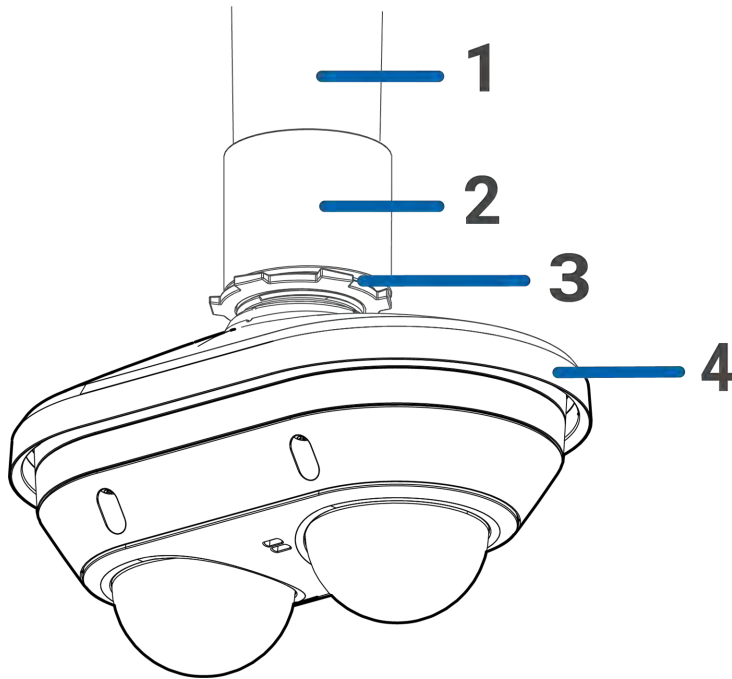
3. Cable entry hole

Entry hole for the cables required for camera operation.

4. Mounting plate

Plate for mounting the camera to a wall or ceiling.

Pendant Camera View

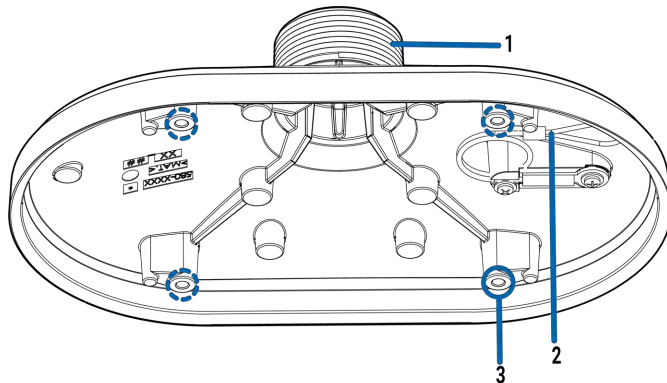


NOTE

The NPT pipe and NPT-female to NPT-female adapter are not supplied by Pelco and should be sourced separately. However, if you are using the NPT adapter (NPTA-1201), the lock nut is included.

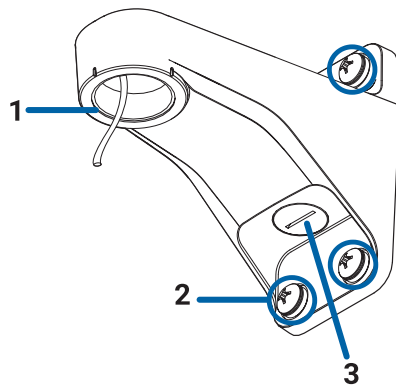
- 1. NPT pipe**
NPT pipe used for a pendant mount with the NPT adapter.
- 2. 1-1/2" NPT-female to NPT-female adapter**
An adapter for attaching the pendant NPT mount to an NPT pipe or wall arm.
- 3. Lock nut**
Lock nut for securing the pendant NPT mount to an NPT pipe or wall arm.
- 4. Pendant NPT adapter**
Camera pendant mount adapter for NPT pipes and wall arm installations.

NPT Adapter View



1. **1-1/2" NPT thread mount**
Standard female 1-1/2" NPT thread mount for mounting the camera to an NPT pipe or wall arm.
2. **Lanyard**
Connects to the lanyard anchor on the camera base..
3. **Camera mounting points**
Align the mounting points on the NPT adapter to the mounting screws on the camera base.

Pendant Wall Mount View



1. **1-1/2" NPS thread mount**
Female NPS thread mount for pendant camera installations.
2. **Pendant wall mount screws**
Screws for securing the pendant wall mount to the mounting bracket.
3. **NPT pipe entry hole**
A 3/4" NPT threaded hole for NPT pipe conduits.

Preparing for Installation

Pre-Deployment In-Box Configuration

The camera comes equipped with an RJ45 connector that is accessible from the outside of the box for users that want to configure camera settings before installing the camera. The RJ45 connector is accessible through the small flap on the side of the camera box for easy configuration before unpacking the camera.



NOTE

We recommend that you do not exceed 1 hour of leaving your camera connected during inbox configuration with ambient temperatures between 20 °C - 25 °C (68 °F - 77 °F).

1. Locate and open the flap on the side of the camera packaging. Look for the *Config* label:



2. Connect a network cable to the RJ45 plug on the configuration cable. The network cable must provide PoE power, Class 3 or Class 4, to power the camera during configuration.
3. Connect to the camera using the Camera Configuration Tool, or the camera's web browser interface to configure the camera's settings. For more information about connecting to the camera, see [Assigning an IP Address on page 32](#), and [Accessing the Live Video Stream on page 33](#).
4. Once you have finished making configuration changes, unplug the network cable.

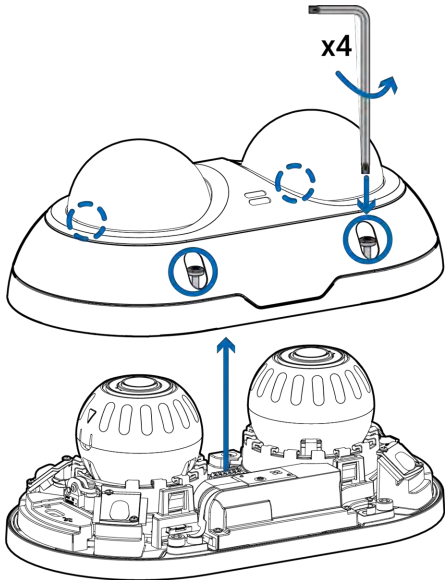


CAUTION

Be careful when handling the camera after configuring it inside the packaging. The camera may be hot when handling it or removing from the packaging immediately after in-box configuration.

Removing the Dual Head Cover

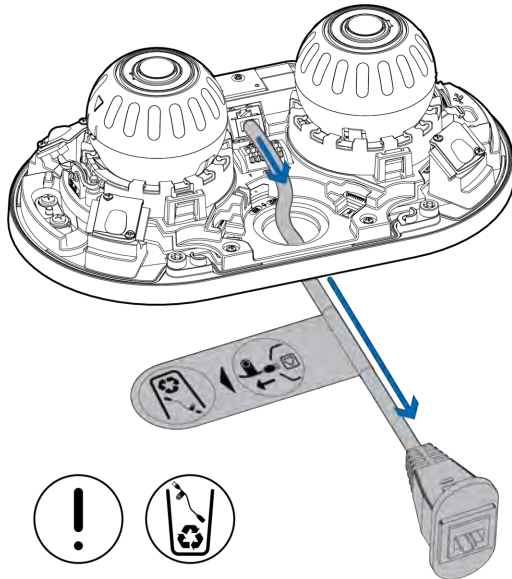
1. Remove the cover by loosening the screws that fix the cover to the base. Use the provided starshaped screwdriver to loosen the screws.



NOTE

Be careful not to scratch or touch the dome bubble. The resulting marks or fingerprints may affect the overall image quality. Keep the protective covers on the outside of the dome bubble until the installation is complete.

2. Lift the cover off the camera base and set it aside.
3. Unplug and remove the RJ-45 in-box configuration cable that comes pre-installed on the camera.



Mounting and Aiming Video Analytics Cameras

When installing a Pelco Smart analytics camera, follow the listed mounting and aiming recommendations to maximize the camera's analytics capabilities:

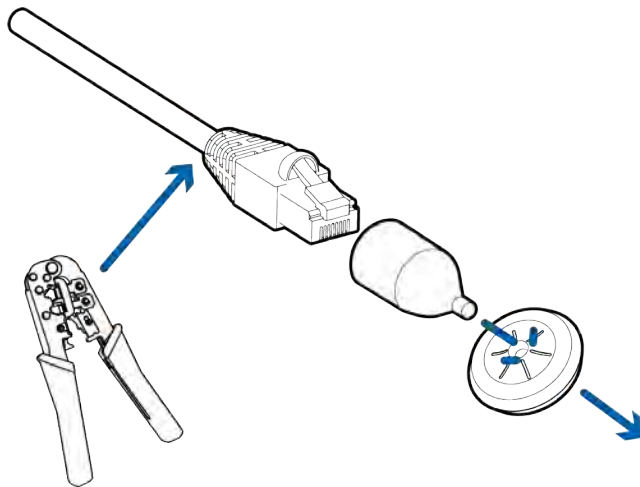
- The camera should be installed above 2.74 m (9 feet).
- The camera should tilt downwards no more than 45 degrees.
- The camera image should be level with the horizon line.
- The camera should be mounted to a stable surface to minimize the physical movement of the camera after installation.

For more details, see the *Designing a Site with Pelco Smart Analytics Guide*. This document is available on the Pelco website.

Inserting Cables through the Sealing Grommet

Unless specified otherwise, you must pull the required cables through the sealing grommet included with the camera when using a cable entry hole.

1. Remove the sealing grommet from the accessory kit.
2. Pull the tab on the grommet to open a hole for the Ethernet cable.
3. Push an Ethernet cable through the grommet by one of the following methods:
 - a. If the Ethernet cable is uncrimped, push the cable through the grommet.
 - b. If the Ethernet cable is already crimped, place the grommet piercing cap on the Ethernet connector then push the cable through the grommet.



Ensure that the orientation of the cable and grommet matches the one shown in the image.

4. Push any other required cables through the grommet.



NOTE

If you will pull multiple cables through the sealing grommet, apply silicone sealant to seal any gaps in the grommet.

Surface Mount Installation

Surface Mount Required Tools and Materials

The following tools are required to complete the installation but are not included in the package:

- Appropriate tool for cutting the cable access hole.
- Appropriate tool for drilling mounting screw holes in the mounting surface.
- Appropriate screwdriver for attaching camera to an electrical box or mounting surface.

Surface Mount Package Contents

Ensure the package contains the following:

- Pelco Sarix Enhanced Duo Camera
- Mounting plate adapter
- Star-shaped screwdriver
- 4x screws and anchors – for securing the camera to the mounting surface.
- Rubber grommet
- RJ-45 grommet piercing cap

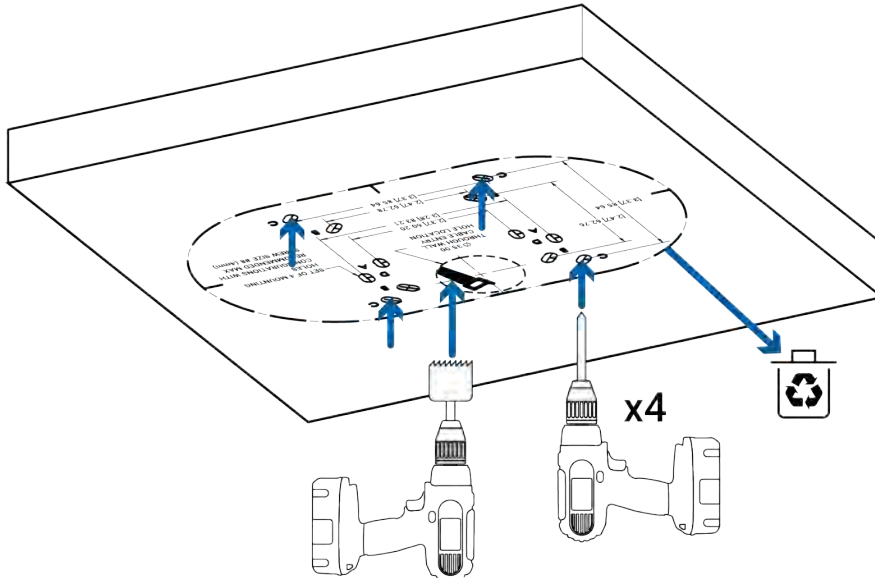
Installation Steps

Mounting the Camera to a Ceiling or Wall

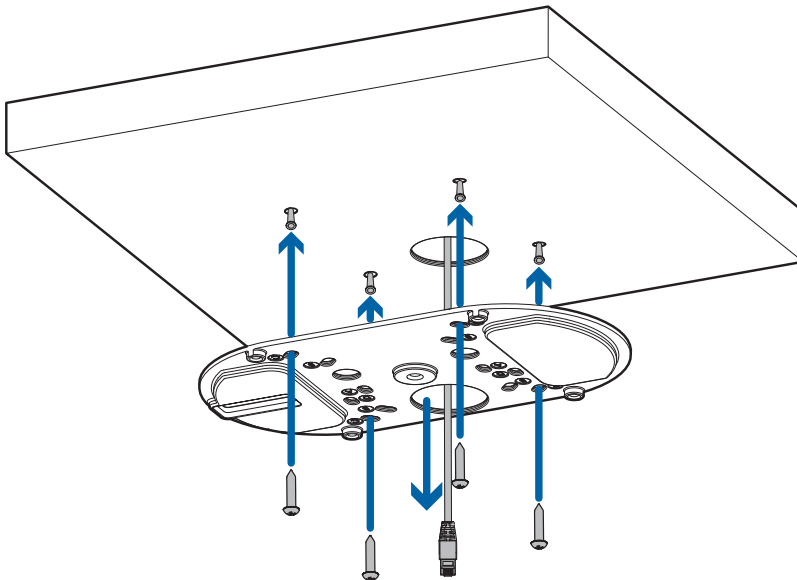
Perform the following steps if mounting the camera directly to the surface and the cables will come from inside the mounting surface. Use this procedure on surfaces that can be easily drilled into, and when the cables should be kept out of sight.

Sarix Enhanced Duo Cameras Installation Manual

1. Using the Surface Mounting Template, drill 4 pilot holes into the mounting surface for the mounting screws.



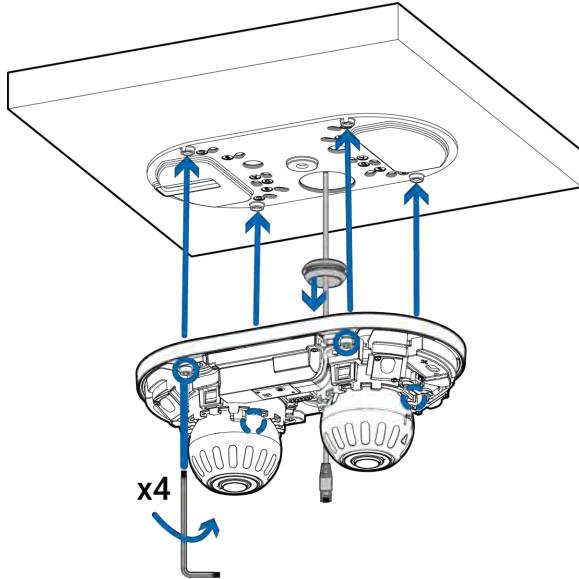
2. Hammer the supplied plastic anchors into the holes.
3. Cut the cable entry hole into the mounting surface with a drywall saw or hole saw.
4. Pull the required cables through the mounting surface and through the cable entry hole in the mounting plate adapter.
5. Align the cable entry hole and mounting holes on the mounting plate adapter with the holes drilled into the mounting surface. Hold the mounting plate adapter to the mounting surface and secure it in place using the provided self-tapping screws.



6. Pull the required cables through the rubber sealing grommet. For more information, see [Inserting Cables through the Sealing Grommet on page 11](#).

Sarix Enhanced Duo Cameras Installation Manual

7. Push the rubber sealing grommet with the required cables into the cable entry hole on the camera base. The thread around the grommet should line up with the cable entry hole. The rubber grommet should be pressed firmly into the cable entry hole to create a seal.
8. Push the camera base into the mounting plate adapter so that the 4 captive screws in the camera base align with the mounting points on the adapter.

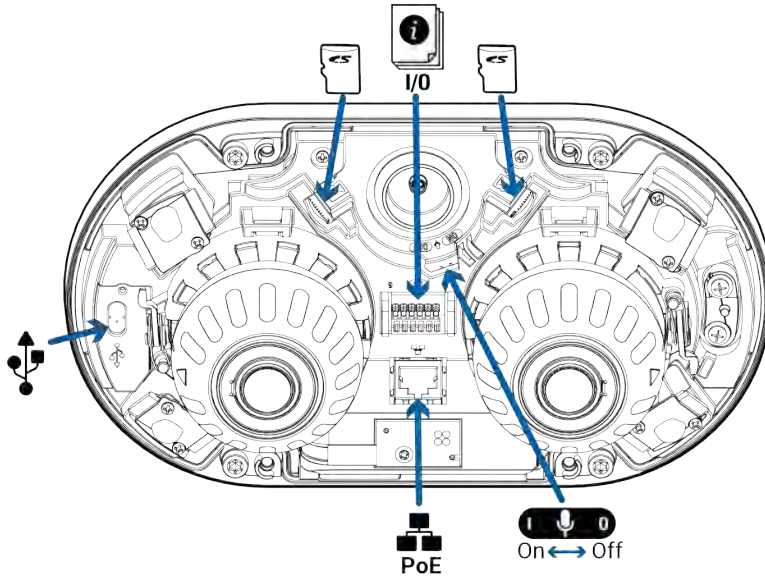


9. Use the star-shaped screwdriver to tighten the 4 captive screws and secure the camera to the mounting plate adapter.

Connecting Cables

Refer to the diagrams in [Overview on page 3](#) for the location of the different connectors.

1. If the camera is connected to any external devices, connect the I/O or audio cables to the I/O connector block. For more information, see [Connecting to External Devices on page 38](#).
2. Connect a network cable to the camera's Ethernet port (RJ-45 connector). The Link LED indicator will turn on once a network link has been established.



3. Connect power using Power over Ethernet (PoE) Class 3 or Class 4 – If PoE is available, the LEDs will turn on.
4. Check that the Connection Status LED indicator indicates the correct state. For more information, see [Connection Status LED Indicator on page 39](#).

Installing the Dual Head Cover

Be careful not to touch or scratch the dome bubble when installing the dome cover.



NOTE

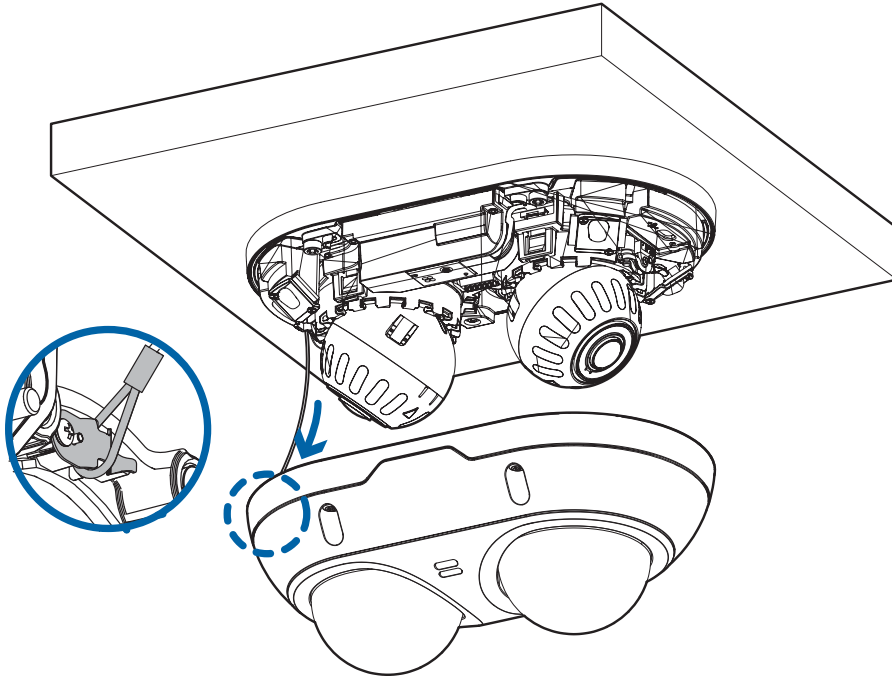
Before installing the dome cover, we recommend that you first connect to the camera and adjust the aim, zoom, and focus so that the camera covers the required field of view. For more information, see:

- [Connecting Cables on page 29](#)
- [Aiming the Dual Head Camera on page 33](#)
- [Zooming and Focusing the Dome Camera on page 35](#)

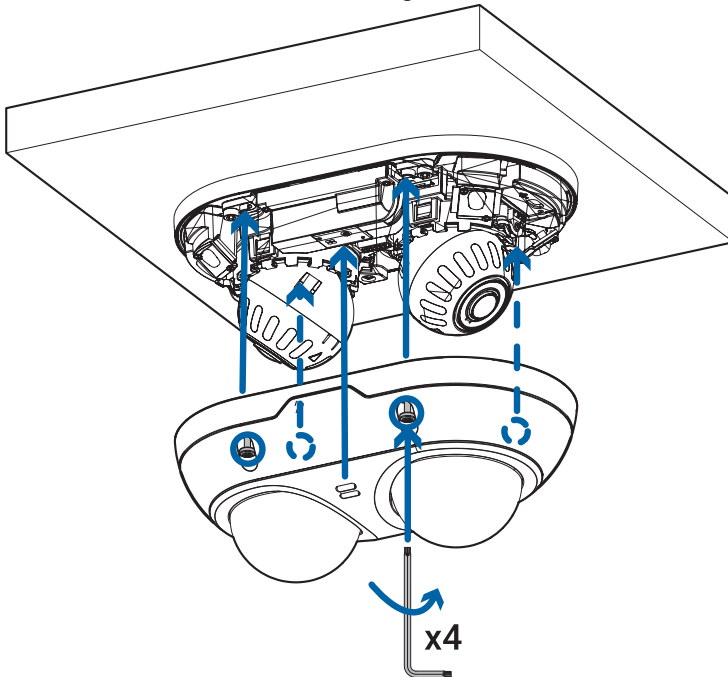
Be careful not to touch or scratch the dome bubbles. Any marks or fingerprints on the dome bubbles may cause unwanted reflections from the IR illuminators.

Sarix Enhanced Duo Cameras Installation Manual

1. Remove the plastic covers on the inside of the dome bubbles.
2. Attach the lanyard to the cover.



3. Attach the cover to the base and tighten the screws with the star-shaped screwdriver.



4. Remove the plastic covers on the outside of the dome bubbles.

Junction Box Installation

Junction Box Required Tools and Materials

The following tools are required to complete the junction box installation but are not included in the package:

- Appropriate tool for drilling mounting screw holes in the mounting surfaces.
- Appropriate screwdriver for attaching camera to the mounting surface.

Junction Box Package Contents

Ensure the package contains the following:

- Pelco Sarix Enhanced Duo Camera
- Mounting plate adapter
- Star-shaped screwdriver
- 4x screws and anchors – for securing the camera to the mounting surface.
- Rubber grommet
- RJ-45 grommet piercing cap

If you are using the optional Junction box mounting adapter (JBOX-1201), ensure the package contains the following:

- Junction box mounting adapter for the Sarix Enhanced Duo Camera.
- Lock nut for the side conduit
- Junction box mounting template sticker

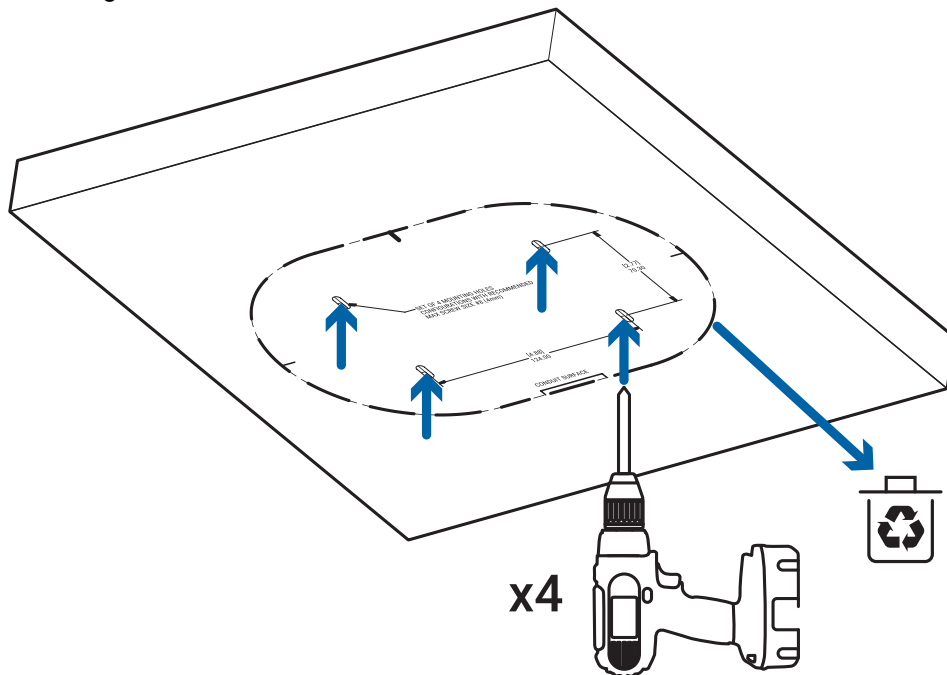
Installation Steps

Using the Junction Box Mounting Adapter

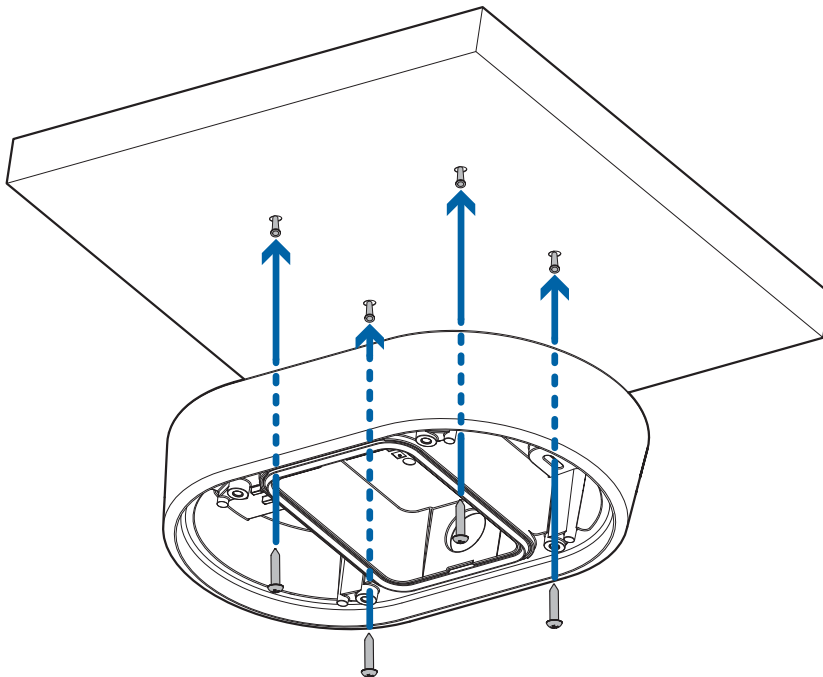
If the camera needs to be installed with the optional junction box, install the junction box mounting adapter onto the mounting surface first.

Sarix Enhanced Duo Cameras Installation Manual

1. Using the Junction Box Mounting Template, drill 4 pilot holes into the mounting surface for the mounting screws.

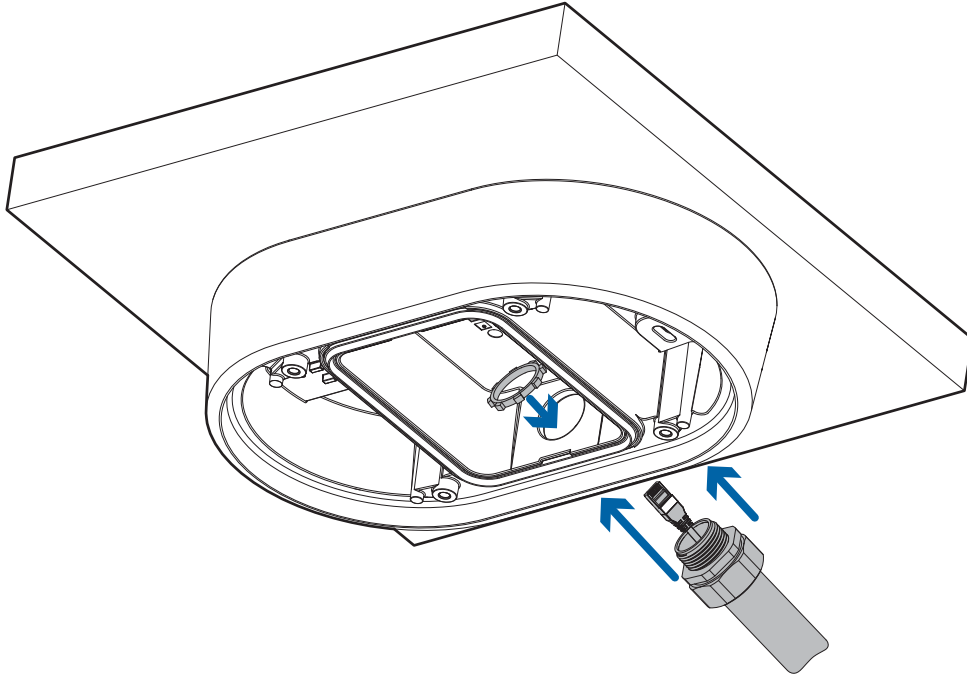


2. Align the conduit for the cables with the side conduit entry surface area on the mounting template.
3. Hammer the supplied plastic anchors into the holes.
4. Align the mounting holes junction box with the holes drilled into the mounting surface. Hold the junction box adapter to the mounting surface and secure it in place using the provided self-tapping screws.



Sarix Enhanced Duo Cameras Installation Manual

5. Arrange and feed the required cables through the conduit. Pull the cables through the side conduit entry hole on the junction box.
6. Screw the conduit into the side conduit entry hole on the junction box. The side conduit entry hole is compatible with 1/2" conduit pipes.
Use the provided lock nut to screw on to the end of the inserted conduit to secure it in place.



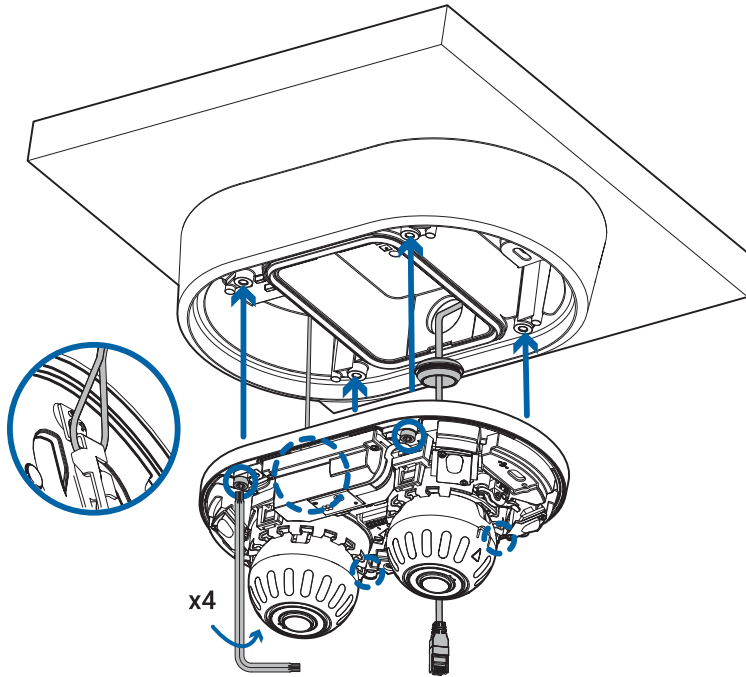
7. Pull the required cables through the rubber sealing grommet. For more information, see [Inserting Cables through the Sealing Grommet on page 11](#).

Installing the Camera Base into the Junction Box

After you install the junction box, mount the camera base into it.

Sarix Enhanced Duo Cameras Installation Manual

1. Attach the lanyard on the junction box to the anchor on the camera base.

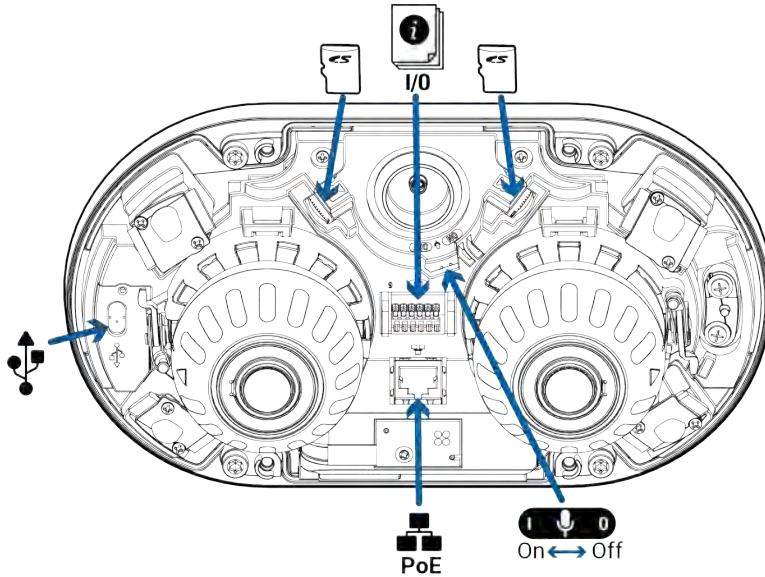


2. Pull the required cables through the cable entry hole on the camera base.
3. Push the rubber sealing grommet with the required cables into the cable entry hole on the camera base. The thread around the grommet should line up with the cable entry hole. The rubber grommet should be pressed firmly into the cable entry hole to create a seal.
4. Push the camera base into the junction box so that the 4 captive screws in the camera base align with the mounting points on the junction box.
5. Use the star-shaped screwdriver to tighten the 4 captive screws and secure the camera to the junction box.

Connecting Cables

Refer to the diagrams in [Overview on page 3](#) for the location of the different connectors.

1. If the camera is connected to any external devices, connect the I/O or audio cables to the I/O connector block. For more information, see [Connecting to External Devices on page 38](#).
2. Connect a network cable to the camera's Ethernet port (RJ-45 connector). The Link LED indicator will turn on once a network link has been established.



3. Connect power using Power over Ethernet (PoE) Class 3 or Class 4 – If PoE is available, the LEDs will turn on.
4. Check that the Connection Status LED indicator indicates the correct state. For more information, see [Connection Status LED Indicator on page 39](#).

Installing the Dual Head Cover with the Junction Box

Be careful not to touch or scratch the dome bubble when installing the dome cover.



NOTE

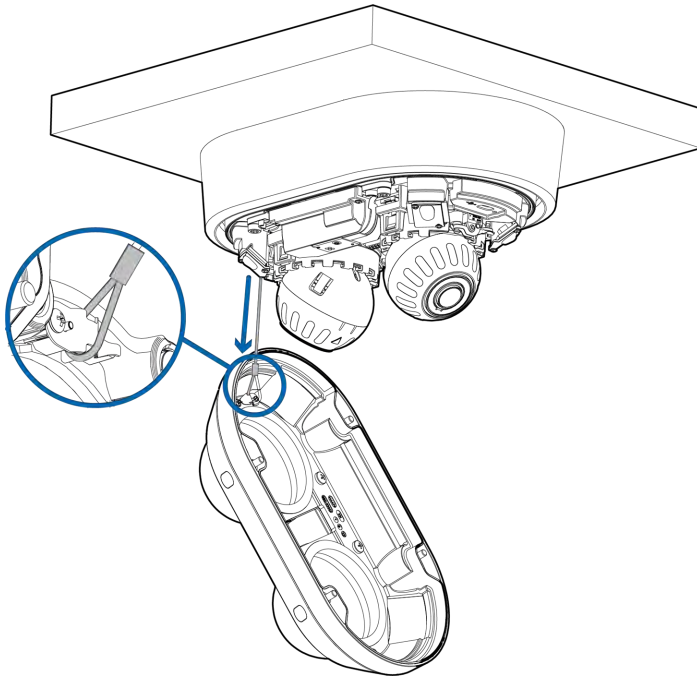
Before installing the dome cover, we recommend that you first connect to the camera and adjust the aim, zoom, and focus so that the camera covers the required field of view. For more information, see:

- [Connecting Cables on page 29](#)
- [Aiming the Dual Head Camera on page 33](#)
- [Zooming and Focusing the Dome Camera on page 35](#)

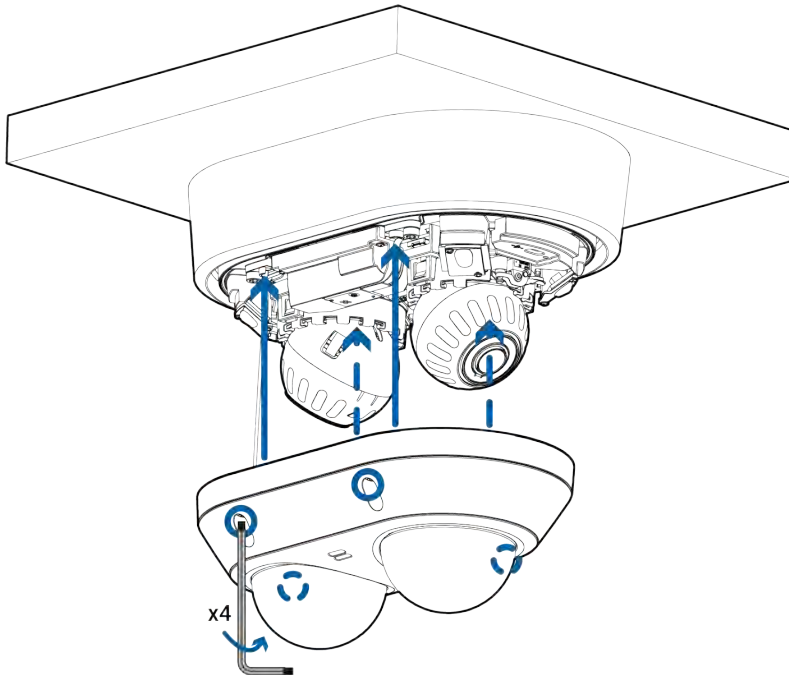
Be careful not to touch or scratch the dome bubbles. Any marks or fingerprints on the dome bubbles may cause unwanted reflections from the IR illuminators.

Sarix Enhanced Duo Cameras Installation Manual

1. Remove the plastic covers on the inside of the dome bubbles.
2. Attach the lanyard to the cover.



3. Attach the cover to the base and tighten the screws with the star-shaped screwdriver.



4. Remove the plastic covers on the outside of the dome bubbles.

Pendant Mount Installation

Pendant Mount Required Tools and Materials

The following tools are required to complete the installation but are not included in the package:

- Appropriate tool for cutting the cable access hole, if required

If you will be installing the NPT adapter (NPTA-1201), you will need:

- 1-1/2" NPT female to female adapter
- NPT pipe

Pendant Mount Package Contents

Ensure the package contains the following:

- Pelco Sarix Enhanced Duo Camera
- Mounting plate adapter
- Star-shaped screwdriver
- Rubber grommet
- RJ-45 grommet piercing cap

If you are using the optional NPT adapter (NPTA-1201), ensure the package contains the following:

- NPT adapter for the Sarix Enhanced Duo Camera
- Lock nut
- Thread seal tape

Installation Steps

Mounting the Camera to a Pipe

If the camera needs to be installed to a pipe for a pendant installation, you use the NPT adapter (NPTA-1201).

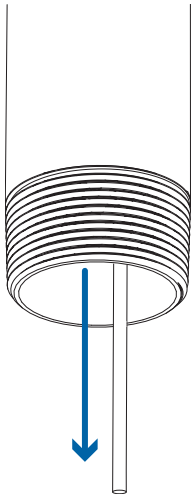


NOTE

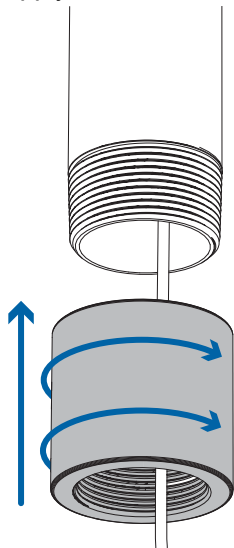
This procedure requires a 1-1/2" NPT-female to NPT-female pipe adapter and conduit pipe that are not supplied and should be sourced separately. It is recommended that the NPT adapter be mounted to a 1-1/2" conduit pipe.

Sarix Enhanced Duo Cameras Installation Manual

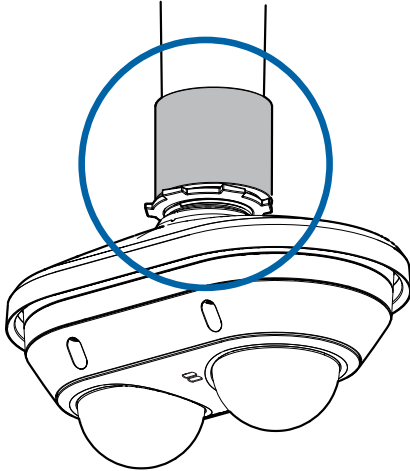
1. Pull the required cables through the NPT conduit pipe.



2. Apply thread seal tape to the pipe and screw on the 1-1/2" NPT female to NPT female pipe adapter.



3. Screw the lock nut onto the NPT adapter.
4. Apply thread seal tape to the NPT adapter and screw it into the pipe adapter.
Make sure the parts are assembled in this order from NPT conduit pipe to camera adapter:
 - a. NPT conduit pipe
 - b. 1-1/2" NPT female to female pipe adapter
 - c. Lock nut
 - d. NPT adapter

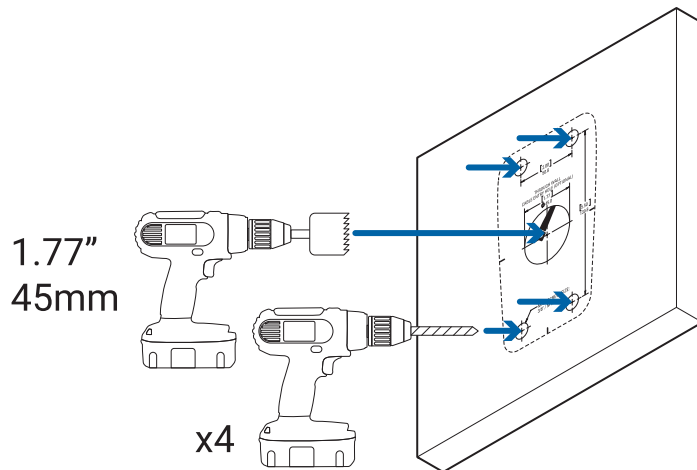


5. Carefully tighten the lock nut until the NPT adapter is secured to the conduit pipe.

Mounting the Camera to the Pendant Wall Mount

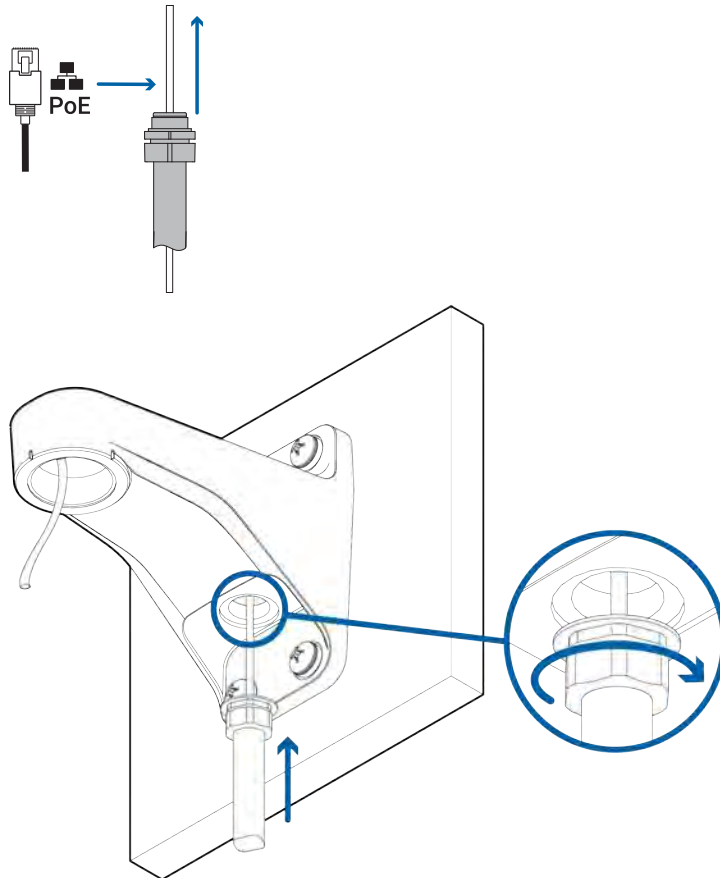
The pendant wall arm mount (WLMT-1021) is an optional accessory and must be purchased separately.

1. Determine where the cables will enter the pendant wall mount.
 - a. If the cables will be pulled from inside the mounting surface, use the cable entry hole at the rear of the pendant wall mount
 - b. If the cables will be coming out of an external conduit pipe, use the 3/4" NPT pipe entry hole on the bottom of the pendant wall mount..
2. Use the provided mounting template to drill four mounting holes into the mounting surface.
 - a. If you are using the rear cable entry hole, also drill the cable entry hole into the mounting surface.

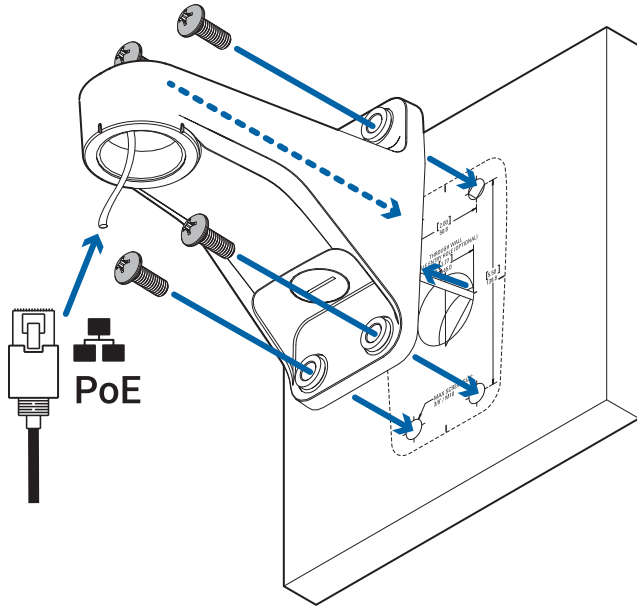


Sarix Enhanced Duo Cameras Installation Manual

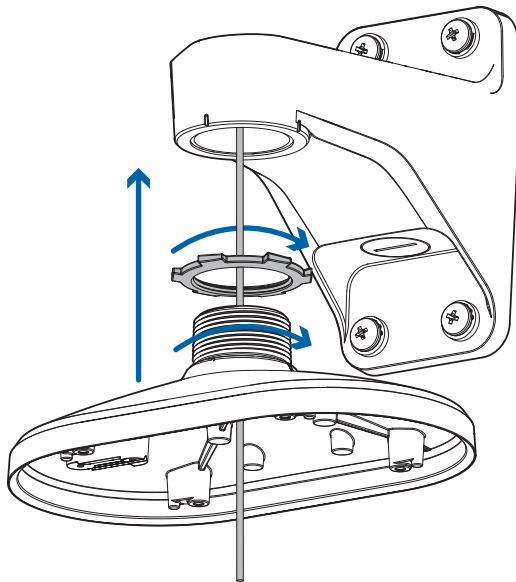
3. Pull the required cables through the preferred cable entry hole on the pendant wall mount.
 - a. If you are using the pipe entry hole, pull the cables through the pipe conduit then the wall mount. Next, apply thread seal tape to the pipe conduit and screw it into the pipe entry hole.



4. Tighten the wall mount screws to secure the wall mount. Use the T20 star-shaped key provided in the camera package.



5. Loosely thread the lock nut onto the NPT adapter, then secure the NPT adapter into the pendant wall mount.
6. Carefully tighten the lock nut until the NPT adapter is secured to the wall mount.



Installing the Camera into the NPT Adapter

Before installing the camera, you must first prepare either the wall mount or NPT pipe mount..

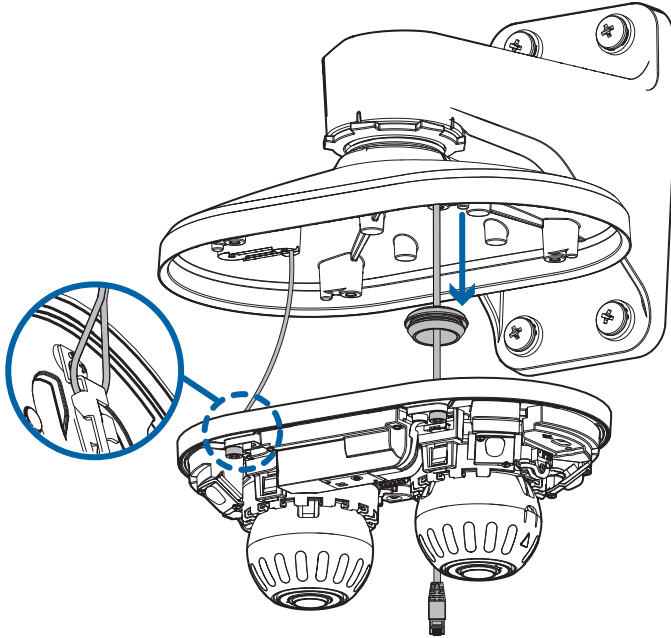


NOTE

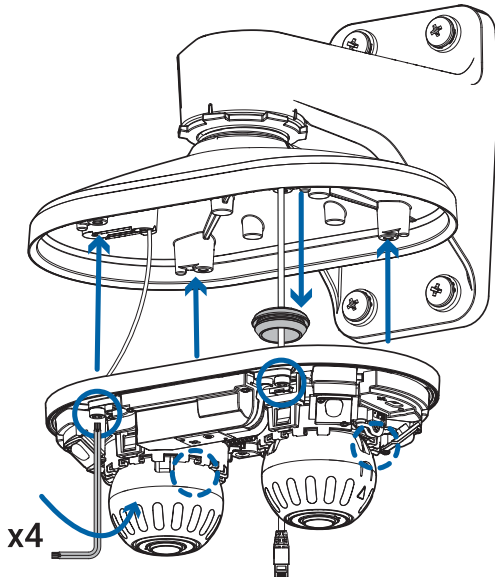
The following steps show installation of the camera into the NPT adapter installed onto a wall mount. The steps are the same for installing the camera to a pipe.

Sarix Enhanced Duo Cameras Installation Manual

1. Attach the lanyard to the camera base. Pull the required cables through the cable entry hole.



2. Pull the required cables through the rubber sealing grommet. For more information, see [Inserting Cables through the Sealing Grommet on page 11](#).
3. Push the rubber sealing grommet with the required cables into the cable entry hole on the camera base. The thread around the grommet should line up with the cable entry hole. The rubber grommet should be pressed firmly into the cable entry hole to create a seal.
4. Push the camera base into the NPT adapter so that the 4 captive screws in the camera base align with the mounting points on the NPT adapter.



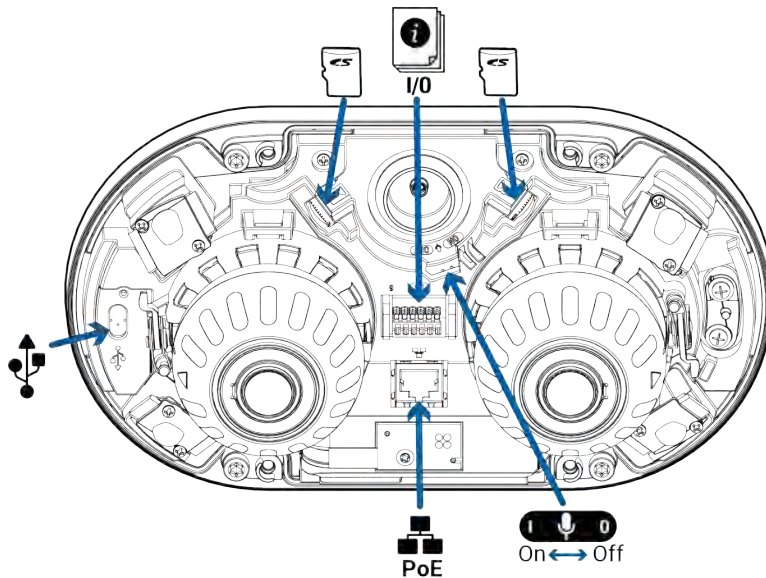
5. Tighten the bolts to secure the camera to the adapter.

Connecting Cables

Refer to the diagrams in [Overview on page 3](#) for the location of the different connectors.

Sarix Enhanced Duo Cameras Installation Manual

1. If the camera is connected to any external devices, connect the I/O or audio cables to the I/O connector block. For more information, see [Connecting to External Devices on page 38](#).
2. Connect a network cable to the camera's Ethernet port (RJ-45 connector). The Link LED indicator will turn on once a network link has been established.



3. Connect power using Power over Ethernet (PoE) Class 3 or Class 4 – If PoE is available, the LEDs will turn on.
4. Check that the Connection Status LED indicator indicates the correct state. For more information, see [Connection Status LED Indicator on page 39](#).

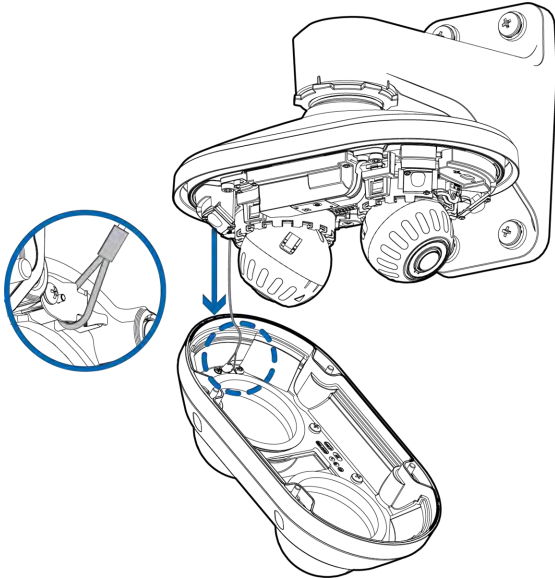
Installing the Dual Head Cover

Be careful not to touch or scratch the dome bubble when installing the dome cover.

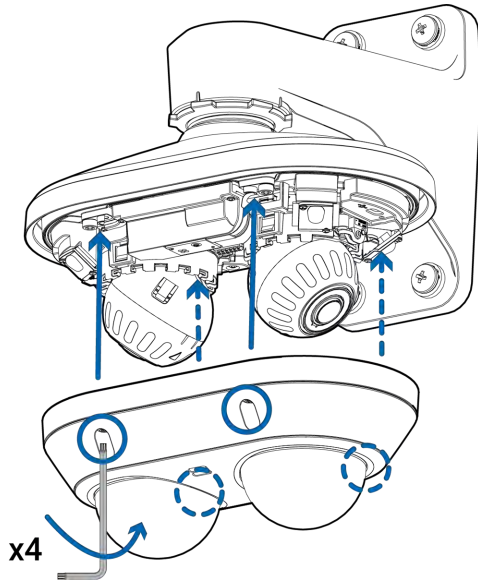
Be careful not to touch or scratch the dome bubbles. Any marks or fingerprints on the dome bubbles may cause unwanted reflections from the IR illuminators.

Sarix Enhanced Duo Cameras Installation Manual

1. Remove the plastic covers on the inside of the dome bubbles.
2. Attach the lanyard to the cover.



3. Attach the cover to the base and tighten the screws with the star-shaped screwdriver.



4. Remove the plastic covers on the outside of the dome bubbles.

Connecting a Camera to the Network


Initializing a Camera Username and Password



IMPORTANT

You must create a user with *administrator* privileges before the camera is operational.

The new user can be created using the following methods:

- Camera's web interface. Enter the camera's IP address in a web browser to access the web interface. For more information, see the *Pelco Sarix Enhanced Duo Operations Manual*. If the camera is in the factory default state, you will be redirected to the New User page to create an administrator user:
 1. Enter a new User Name or keep the default administrator name.
 2. Enter a new Password for the user. It is recommended to use a secure and complex password.
 3. Confirm the new password.
 4. For the first user, Administrator must be selected in the Security Group drop-down menu.
 5. Click Apply. After creating the user, you will be asked to login.
- Camera Configuration Tool: discovered cameras that are identified by  will require a first user to be set. Select the **Admin Users** tab to create the first user. For more information, see the *Camera Configuration Tool User Guide*.

Set up the first user through the camera's Web Interface or Camera Configuration Tool before you connect the camera to a VMS.

Assigning an IP Address

The device automatically obtains an IP address when it is connected to a network.



NOTE

If the device cannot obtain an IP address from a DHCP server, it will use Zero Configuration Networking (Zeroconf) to choose an IP address. When set using Zeroconf, the IP address is in the 169.254.0.0/16 subnet.

The IP address settings can be changed using one of the following methods:

- Device's web browser interface: `http://<camera IP address>/`.
- Network Video Management software application.



NOTE

When you log in the first time, the camera will be in a factory default state and no password is required. You must create a user with **administrator** privileges before the device is operational. For more information, see [Initializing a Camera Username and Password on the previous page](#).

Accessing the Live Video Stream

Live video stream can be viewed using one of the following methods:

- Web browser interface: `http://< camera IP address>/`.
- Network Video Management software application.



NOTE

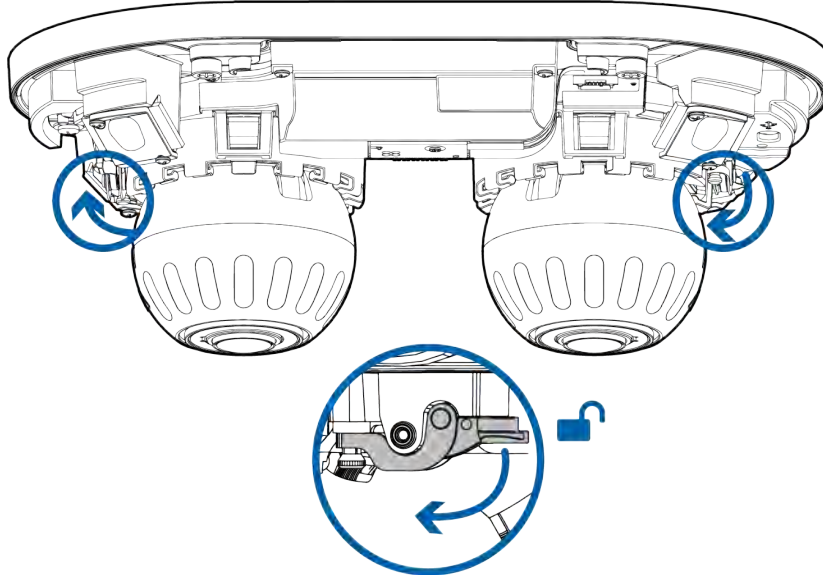
When you log in the first time, the camera will be in a factory default state and no password is required. You must create a user with **administrator** privileges before the device is operational. For more information, see [Initializing a Camera Username and Password on the previous page](#).

Aiming the Dual Head Camera

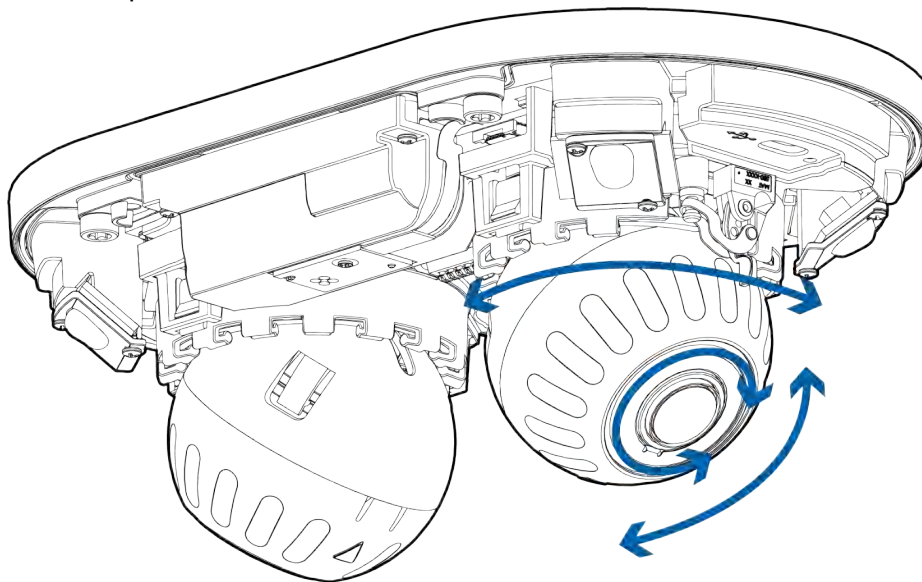
Reference the camera's live stream as you aim the camera.

Sarix Enhanced Duo Cameras Installation Manual

1. To aim the camera, adjust each of the camera heads as required.
 - a. Release the latch to unlock the camera head for panning, tilting and azimuth rotation.



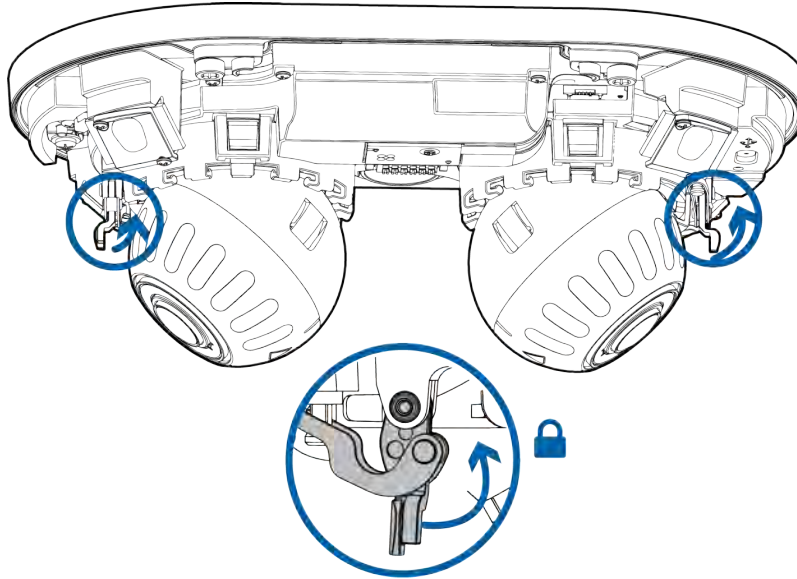
- b. Rotate the azimuth control ring to set the image in the correct rotation. Pan and tilt the camera head to capture the desired field of view.



NOTE

When using the built-in IR illuminators, Avigilon recommends that the tilt angle is not set to be shallower than 30° above the horizon. This will reduce IR reflection off surfaces near the camera, such as walls or ceilings.

- c. Lock the latch back into position when the camera head is in the desired position.



2. In the camera web browser interface, adjust the camera’s Image and Display settings to achieve the desired image parameters and position.

Zooming and Focusing the Dome Camera

Ensure this procedure is performed after the dome cover is installed, so you can accommodate for the focus shift caused by the dome bubble.

- In the camera web browser interface, use the camera’s Image and Display settings to zoom and focus the camera.
 - a. Use the zoom buttons to zoom the camera in or out.
 - b. Click **Auto Focus** to focus the lens.
 - c. Use the focus near and far buttons to manually adjust the focus.

(Optional) Enabling the Microphone

The Sarix Enhanced Duo camera models feature an internal microphone, and include a switch to physically enable or disable the microphone. The microphone switch is set to OFF by default.

We recommend that you enable the microphone before installing the camera in its final location.

1. Locate the microphone switch on the camera assembly.
2. Slide the switch from the default OFF position to ON to enable the microphone. For more information, see the [Overview section](#).

(Optional) Configuring the Microphone

You can configure the microphone or line-level audio input from the camera web interface.

Configure the Microphone from the Camera Web Interface

- In the camera web interface, the microphones are configured from the *Audio* page. You can adjust the microphone volume by changing the gain.
 - Gain for microphone Internal Mic – configures the gain for the microphone that is built into the camera.
 - Gain for microphone External Input – configures the gain for any line level audio input that is connected to the audio input connector on the I/O terminal block.

For instructions on how to configure the microphone from your camera's web interface, refer to [Pelco > Product documentation](#) and search for the relevant Operations Manual for the camera type.

(Optional) Configuring microSD Card Storage

To use the camera's onboard storage feature, you must insert 1 microSD card into a microSD card slot. While there are two microSD slots, currently the camera only supports a single microSD card in either slot for onboard storage.

It is recommended that the microSD card have a write speed of class 10 or better. If the microSD card does not meet the recommended write speed, the recording performance may suffer and result in the loss of frames or footage.

1. Insert a microSD card into the camera.



CAUTION

Do not force the microSD card into the camera or you may damage the card and the camera. The microSD card can only be inserted in one direction.

2. Access the camera's web interface to enable the onboard storage feature. For more information, see the *Pelco Sarix Enhanced Duo Operations Manual*.

Configuring the Camera

After the camera is installed, configure it using the instructions in the current version of the *Pelco Sarix Enhanced Duo Operations Manual*.

For More Information

Additional information about setting up and using the device is available in the following guides:

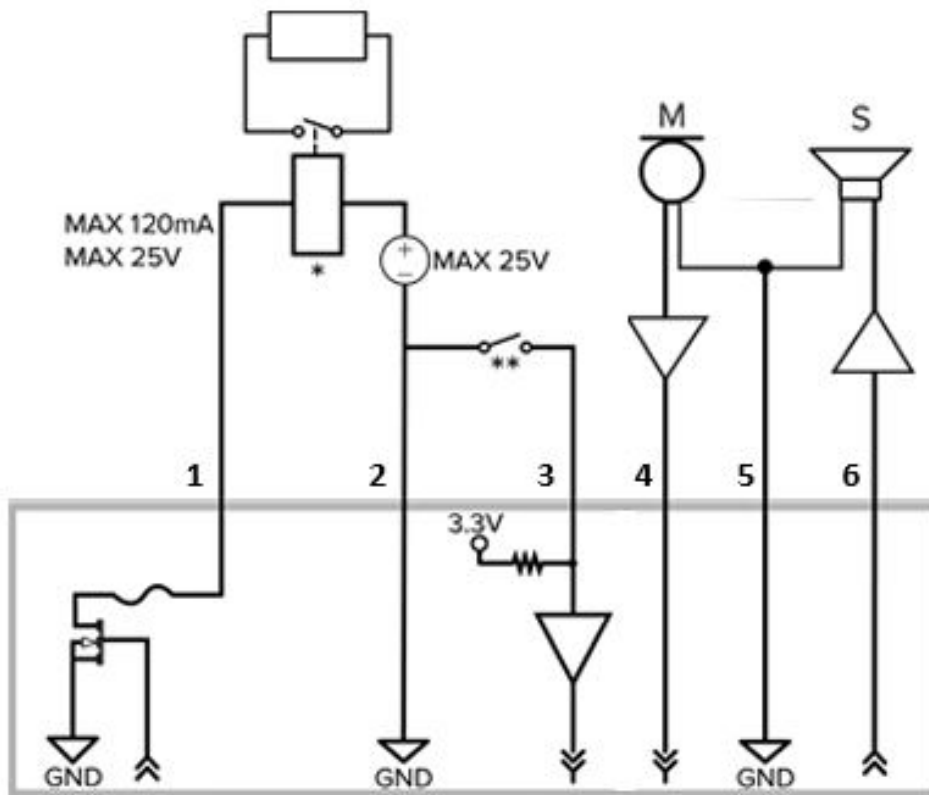
- *Pelco Sarix Enhanced Duo Operations Manual* available on the Pelco website: www.pelco.com.
- *Camera Configuration Tool User Guide*

Cable Connections

Connecting to External Devices

External devices are connected to the camera through pluggable terminal blocks. For the locations of the terminals, see [Camera Module on page 1](#).

The pinout for the I/O terminal block is shown in the following diagram:



1. Pin1 = Digital Output
2. Pin2 = Ground
3. Pin3 = Digital Input
4. Pin4 = Audio Input (Line Level)
5. Pin5 = Audio Ground
6. Pin6 = Audio Output (Line Level)

* – Relay

** – Switch

M – Microphone

S – Speaker

Connection Status LED Indicator

Once connected to the network, the green Connection Status LED indicator will display the progress in connecting to the Network Video Management software.

The following table describes what the LED indicator shows:

Connection State	Connection Status LED Indicator	Description
Obtaining IP Address	One short flash every second	Attempting to obtain an IP address.
Discoverable	Two short flashes every second	Obtained an IP address but not connected to the Network Video Management software.
Upgrading Firmware	Two short flashes and one long flash every second	Updating the firmware.
Connected	On	Connected to the Network Video Management software. The default connected setting can be changed to Off using the camera's web user interface. For more information, see the <i>Pelco Sarix Enhanced Duo Operations Manual</i> .

Troubleshooting Network Connections and LED Behavior



NOTE

For any of the below LED behaviors, ensure that the camera is getting power and is using a good network cable before trying another solution.

LED Behavior	Suggested Solution
Green LED is off and amber is on	Perform a factory reset of the camera using the physical firmware revert button. Resetting through the camera's web interface will not produce the desired result.
Both LEDs are off and the camera is not connected or streaming video	If the LEDs are not disabled, perform a factory reset of the camera using the physical firmware revert button. Resetting through the camera's web interface will not produce the desired result.
Both LEDs are blinking several times at the same time, then pause and repeat the blinking	Perform a factory reset of the camera using the physical firmware revert button. Resetting through the camera's web interface will not produce the desired result.
A different LED blinking pattern than those described above	Perform a factory reset of the camera using the physical firmware revert button. Resetting through the camera's web interface will not produce the desired result.

Resetting to Factory Default Settings

If the device no longer functions as expected, you can choose to reset the device to its factory default settings.

Use the firmware revert button to reset the device. The firmware revert button is shown in the following diagram:

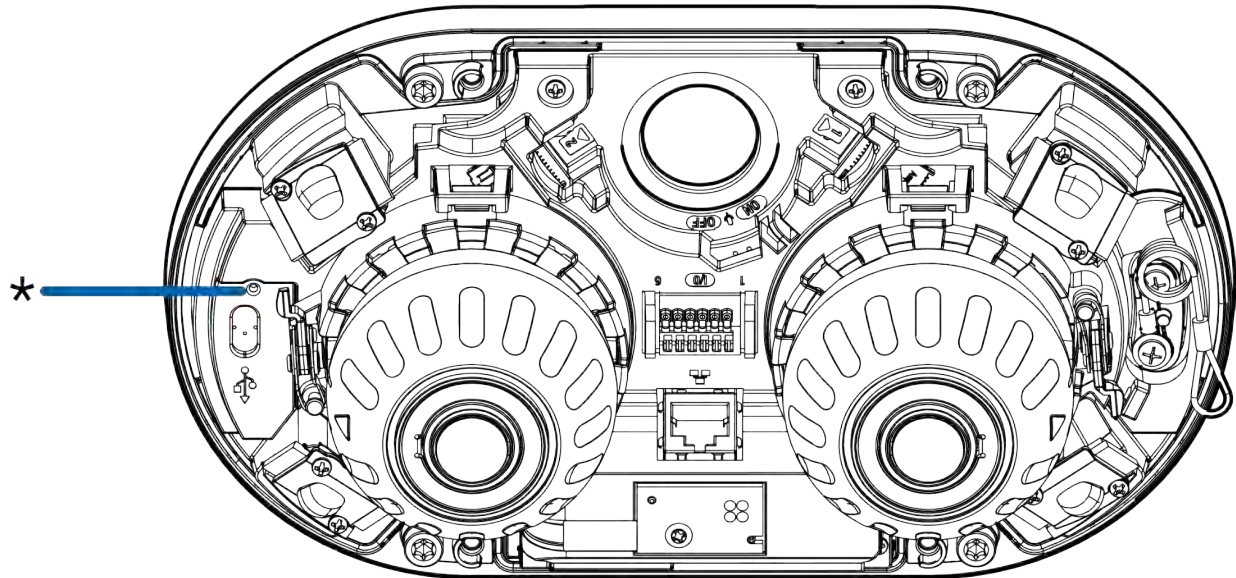


Figure 1: The firmware revert button on the camera.

1. Ensure the device is powered on.
2. Using a straightened paperclip or similar tool, gently press and hold the firmware revert button.
3. Release the button after three seconds.



CAUTION

Do not apply excessive force. Inserting the tool too far may damage the camera.

Cleaning

Dome Bubble

If the video image becomes blurry or smudged in areas, it may be because the dome bubble requires cleaning.

To clean the dome bubble:

- Use hand soap or a non-abrasive detergent to wash off dirt or fingerprints.
- Use a microfiber cloth or non-abrasive fabric to dry the dome bubble.



IMPORTANT

Failure to use the recommended cleaning materials may result in a damaged or scratched dome bubble. A damaged dome bubble may negatively impact image quality and cause unwanted IR light reflecting into the lens.

Body

- Use a dry or lightly dampened cloth to clean the camera body.
- Do not use strong or abrasive detergents.

Pelco Troubleshooting Contact Information

For further assistance, contact Pelco Product Support at 1-800-289-9100 (USA and Canada) or +1-559-292-1981 (international).

Do not try to repair the unit yourself. Leave maintenance and repairs to qualified technical personnel only.

