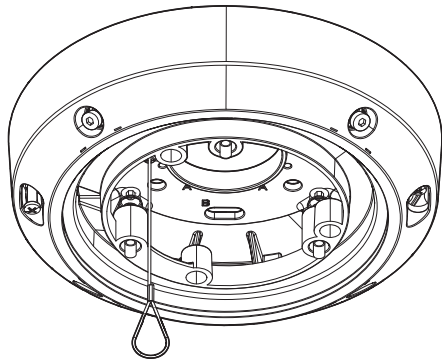# i·PRO

Operating Instructions

Included Installation Instructions

Ceiling Mount Bracket
Model No. WV-QCL500-S

- Before attempting to connect or install this product, please read these instructions carefully and save this manual for future use.
- The external appearance and other parts shown in this manual may differ from the actual product within the scope that will not interfere with normal use due to improvement of the product.

> **i-PRO Co., Ltd. assumes no responsibility for injuries or property damage resulting from failures arising out of improper installation or operation inconsistent with this documentation.**

Preface

This product is used to mount the PTZ type camera on the ceiling.
For the latest information about the supported cameras, refer to our support website (https://i-pro.com/global/en/surveillance/training_support/support/technical_information <Control No.:C0501>).

Specifications

Ambient operating temperature:	–50 °C to +60 °C {–58 °F to +140 °F}
Dimensions:	ø229 mm × 55 mm (H) {ø9-1/32 inches × 2-5/32 inches (H)}
Mass:	Approx. 1.3 kg {2.87 lbs}
Finish:	Aluminum die cast Silver

Precaution

■ **Refer installation work to the dealer.**
Installation work requires technique and experience. Failure to observe this may cause fire, electric shock, injury, or damage to the product.
Be sure to consult the dealer.

■ **Install the product securely on a ceiling in accordance with the installation instructions.**
Failure to observe this may cause injury or accidents.

■ **Do not use this bracket except with suitable cameras.**
Failure to observe this may cause a drop resulting in injury or accidents.

■ **Do not install this product on a place that is greatly influenced by wind.**
Installation on a place where the wind speed is 60 m/s {approx. 134 mph} or more may cause a fall of the product resulting in injury or accidents.

When using this product, also read the "Precautions" described in the operating instructions for the camera to be attached.

> **Caution:**
> ● Before attempting to connect or operate this product, please read these instructions carefully.
> **Notice:**
> ● This equipment is not suitable for use in locations where children are likely to be present.
> ● Do not install this product in locations where ordinary persons can easily reach.
> ● For information about screws and brackets required for installation, refer to the corresponding section of this document.

Standard accessories

Operating Instructions (this document).. 1 pc.

Other items that are needed (not included)

M8 screw .... 4 pcs.
M8 flat washer / spring washer .... 4 pcs. for each

> **IMPORTANT**
> ● The installation surface is horizontal.
> ● Minimum pullout strength: 1539 N {346 lbf} (per 1 pc.)
> ● This value indicates the minimum pull-out strength required value per screw. For information about the minimum pull-out strength, refer to our support website <Control No.: C0120>.
> ● Select screws according to the material of the location that the camera will be mounted to. In this case, wood screws and nails should not be used.
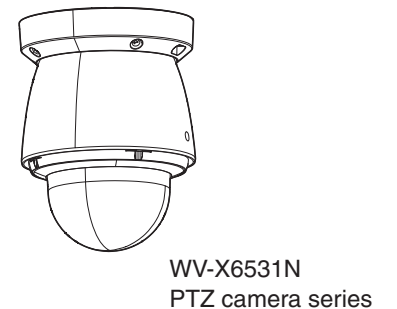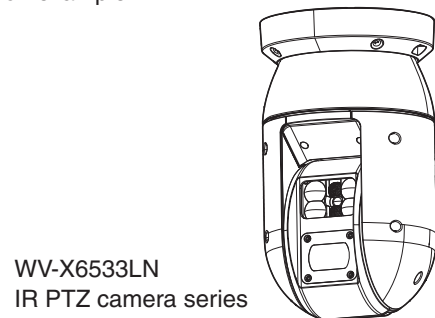
Precautions for installation

■ **In order to prevent injury, the product must be securely mounted to the ceiling according to the Installation Guide of this bracket.**
■ **Mounting method for this product**
This product is designed to be used as a pendant mount camera. If the product is mounted on a desktop or at a slant, the camera may not work correctly and its lifetime may be shortened.
■ **Make sure to remove this product if it will no longer be used.**

<Installation example>

WV-X6533LN
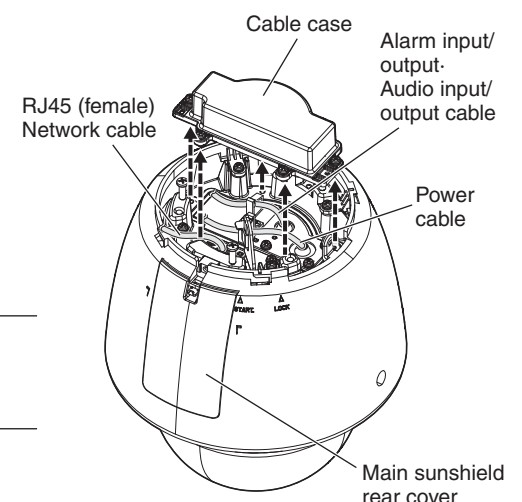IR PTZ camera series

WV-X6531N
PTZ camera series

Installation

These instructions use the PTZ type camera (WV-X6531N) to describe installation. Refer to the Installation Guide for each camera for detailed installation information and procedures.

Step 1   **Make preparations before installation.**

[1] Where necessary, remove the cable case and insert an SD memory card.

◆ When the only necessary connection to camera is an Ethernet cable
→ Do not remove the cable case.
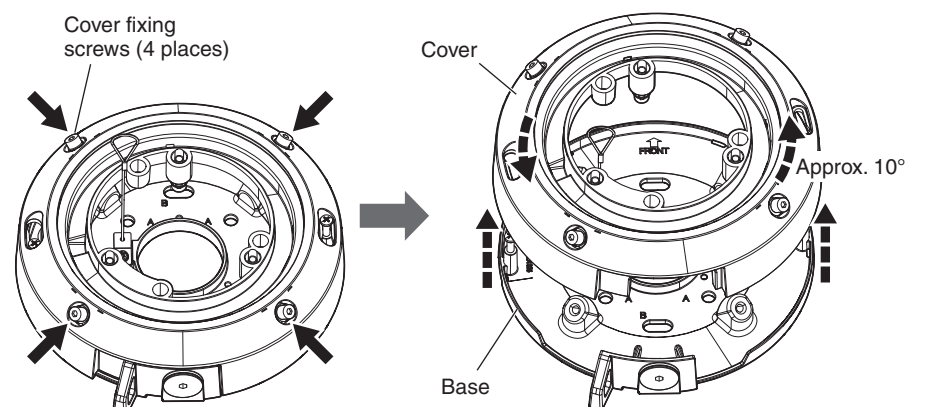◆ When using 24 V AC, EXT I/O device, or audio input / output device
→ Remove the cable case.

Cable case
Alarm input/output·Audio input/output cable
RJ45 (female) Network cable
Power cable
Main sunshield rear cover

NOTE
● Waterproof the unused cables using the waterproof tape (camera accessory).

[2] Remove the cover from the base of this product.

① Loosen the cover fixing screws (4 places) using a 4 mm {5/32 inches} hexagon wrench (locally procured).

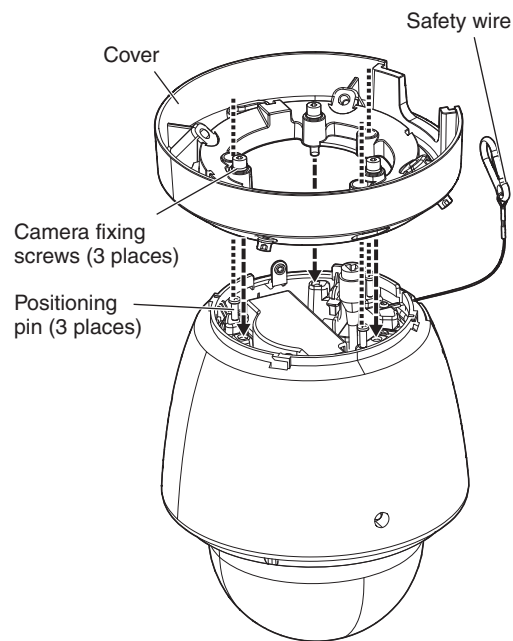② Rotate the cover approximately 10° counterclockwise and remove.

Cover fixing screws (4 places)

Cover

Approx. 10°

Base

Step 2 — Attach the cover of this product to the top of the camera.
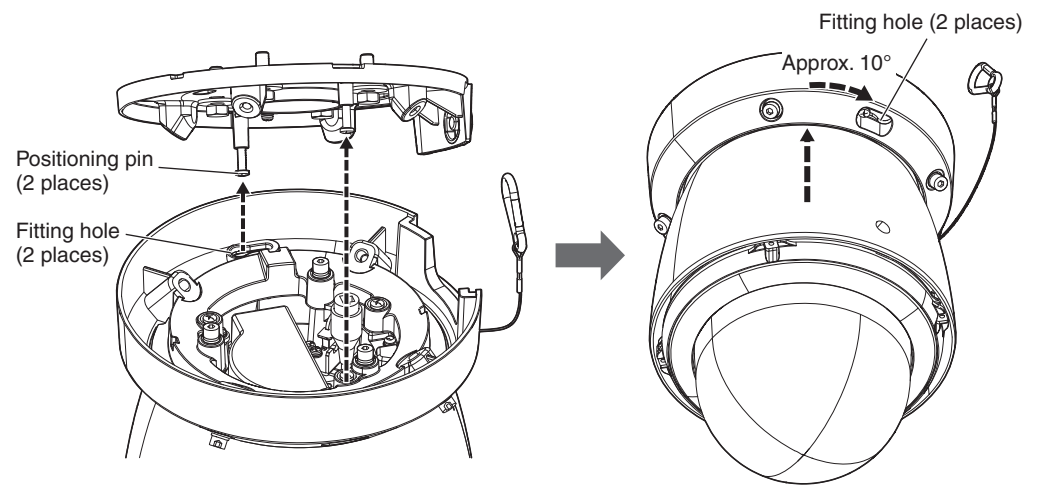
Recommended tightening torque
: 2.45 N·m {1.81 lbf·ft}

NOTE
- Do not use the "cable cover" included with the camera.
- Use a 4 mm {5/32 inches} hexagon wrench (locally procured) to tighten the camera fixing screws (3 places).
- As shown in the illustration at right, put the safety wire on the outside of the cover of this product.

Cover
Safety wire
Camera fixing screws (3 places)
Positioning pin (3 places)

Step 3 — Get the ceiling ready and attach the base of this product to the ceiling.

Fixing screws: M8 screws
(flat washer / spring washer)
Minimum pullout strength: 1539 N {346 lbf} (per 1 pc.)

① Make screw holes or anchor holes in the ceiling, and also wiring holes if necessary.
<Possible installation dimensions>
A: 71.8 mm × 71.8 mm {2-3/16 inches × 2-3/16 inches}
B: 120.5 mm × 120.5 mm {4-3/4 inches × 4-3/4 inches}
② When wiring through the ceiling, make a ø30 mm {ø1-3/16 inches} hole in the center.

FRONT

<When wiring through the ceiling>

Base
Flat washer (4 pcs.) (M8: locally procured)
Spring washer (4 pcs.) (M8: locally procured)
Fixing screws (4 pcs.) (M8: locally procured)
Cap for the female thread for the conduit

<When wiring through the side hole>

Conduit

◆ **When using the conduit on the ceiling for wiring, remove the cap for the female thread for the conduit by using a hexagon wrench (ISO 2936, width across flats S=5 mm {3/16 inches}).**
The female thread for conduit is compliant with ANSI NPSM (parallel pipe threads) 3/4 or ISO 228-1 (parallel pipe threads) G3/4.

Step 4 — Hang the camera from the base of this product with the installed auxiliary wire and connect the cables.

Ceiling
Surface of the base installed on the ceiling
Installed auxiliary wire
Installed auxiliary wire
Wire hook
Wire stopper
Wire hook

NOTE
- There are some cables to be connected that need to be waterproofed. Refer to the Installation Guide for the camera for information on which cables need waterproofing and how to waterproof them.

Step 5 — Put the cover of this product which has been attached to the top of the camera so the fitting holes (2 places) fit over the positioning pins on the base that has been fixed to the ceiling, the turn clockwise approximately 10° to temporarily fix in place.
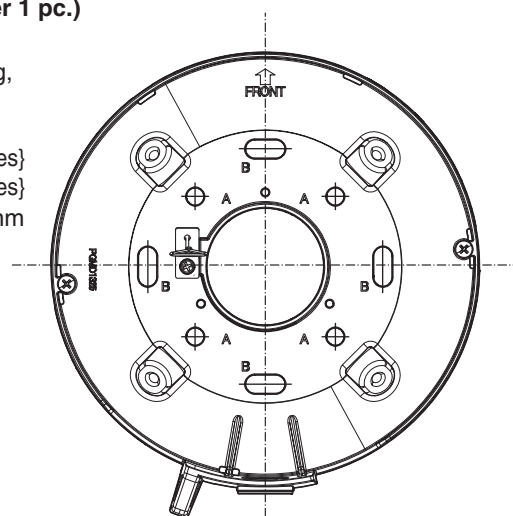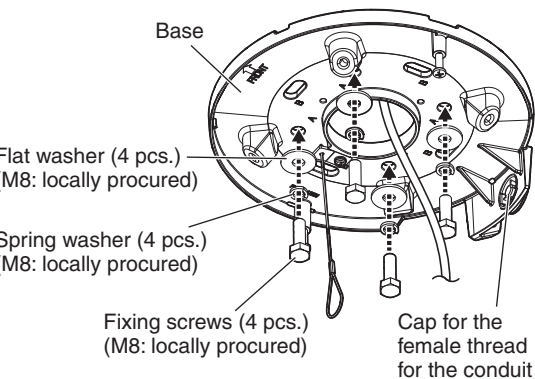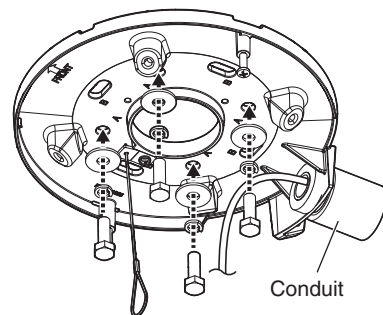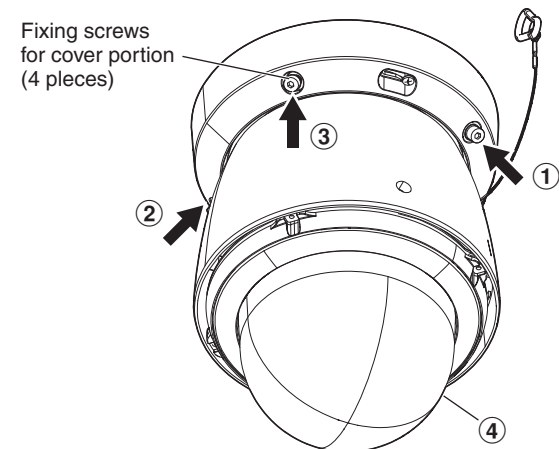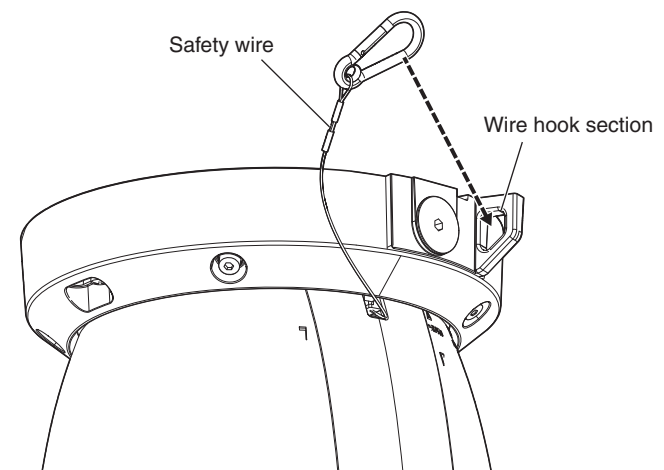
Fitting hole (2 places)
Approx. 10°
Positioning pin (2 places)
Fitting hole (2 places)

NOTE
- When temporarily fixing the camera to the base of this product, make sure you are holding the cover of this product.

Step 6 — Tighten the cover fixing screws (4 places) alternating diagonally with a 4 mm {5/32 inches} hexagon wrench (locally procured) to fix the cover attached to the camera to this product. (① to ④)
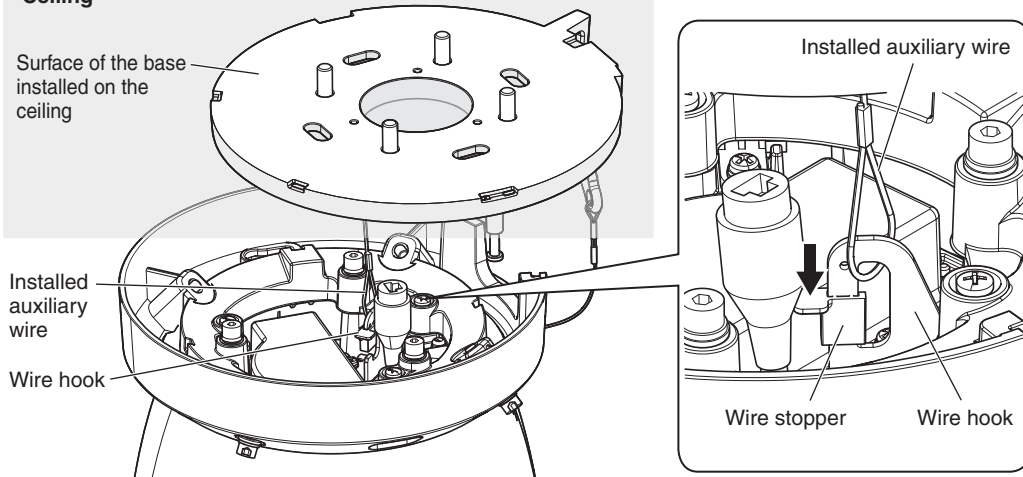
Recommended tightening torque
: 2.45 N·m {1.81 lbf·ft}

Fixing screws for cover portion (4 pieces)
③ ② ① ④

Step 7 — Attach the safety wire of the camera to the wire hook section on the base of this product.

Safety wire
Wire hook section

Refer to the Operating Instructions for the camera for information about further adjustments (connecting power to the camera, adjusting the angular field of view).