## Panasonic

## Installation Guide

#### Included Installation Instructions

## **Network Camera** For professional use only

# Model No. WV-U2540L Outdoor use

WV-U2530L Outdoor use WV-U2140L Indoor use WV-U2130L Indoor use WV-U2540L

## About the user manuals

Product documentation is composed of the following documents. Installation Guide (this document): Provides information about "Precautions", "Precautions for installation" and the installation method. • Basic Information (in the following website): Provides information about "Precautions for use" and "Detail specifications". • Operating Instructions (in the following website): Explains how to perform the set

#### tings and how to operate this camera. ttps://security.panasonic.com/training\_support/documentation\_database,

"<Control No.: C\*\*\*\*>" used in these documents should be used to search for information on our support website (https://security.panasonic.com/training support/support/info/) and will guide you to the right information.

- Before attempting to connect or operate this product, please read these instructions
- carefully and save this manual for future use.
- microSDXC/ microSDHC/ microSD memory card is described as microSD memory card.
- 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.

### For U.S. and Canada:

Panasonic i-PRO Sensing Solutions Corporation of America 800 Gessner Rd, Suite 700 Houston, TX 77024

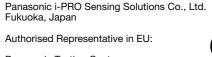
#### Panasonic Canada Inc.

https://www.security.us.panasonic.com/

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For Europe and other countries: Panasonic Corporation http://www.panasonic.com





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## **Disposal of Old Equipment and Batteries**

- Only for European Union and countries with recycling systems These symbols on the products, packaging, and/or accompanying documents mean that used electrical and electronic products and batteries must not be mixed with general household waste.
- For proper treatment, recovery and recycling of old products and used batteries, please take them to applicable collection points in accordance with your national legislation. By disposing of them correctly, you will help to save valuable resources and prevent any potential
- negative effects on human health and the environment. For more information about collection and recycling, please contact your local authority.
- Penalties may be applicable for incorrect disposal of this waste, in accordance with national legislation.

## Note for the battery symbol (bottom symbol)

This symbol might be used in combination with a chemical symbol. In this case it complies with the requirement set by the Directive for the chemical involved.

#### — For U.S.A.

NOTE: This equipment has been tested and found to FCC CAUTION: Changes or modifications not comply with the limits for a Class A digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is

likely to cause harmful interference in which case the user will be required to correct the interference at his own expense.

#### - For U.S.A.

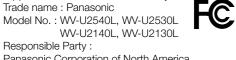
The model number and serial number of this product may be found on the surface of the unit. You should note the model number and serial num ber of this unit in the space provided and retain this book as a permanent record of your purchase to aid identification in the event of theft. Model No.

#### Serial No.

- For Canada -CAN ICES-3(A)/NMB-3(A)

| Méthode<br>d'installation  | Vis de<br>fixation<br>recom-<br>mandée | La capacité de traction mini-<br>male requise |
|--|--|---|
| Quand la caméra<br>vidéo est directement<br>installée au plafond<br>ou sur le mur. | M4/2 él.                               | 196 N {44 lbf}                                |

expressly approved by the party responsible for com pliance could void the user's authority to operate the equipment. Supplier's Declaration of conformity



Panasonic Corporation of North America Two Riverfront Plaza, Newark, New Jersey 07102-5490 Support Contact : 1-800-528-6747

For U.S.A. and Canada -This device complies with part 15 of FCC Rules and Innovation, Science and Economic Development Canada's licence-exempt RSS(s). 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.

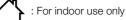
Le présent appareil est conforme à la partie 15 des règles de la FCC et aux normes des CNR d'Innovation. Sciences et Développement économique Canada applicables aux appareils radio

exempts de licence. L'exploitation est autorisée aux deux conditions suivantes : (1) l'appareil ne doit pas produire de brouillage, et (2) l'appareil doit accepter tout brouillage subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

## Caution:

XC

- The network camera is only intended for a connection to an ethernet or PoE network without routing to the outside plant.
- This product has no power switch. Be sure to install disconnect devices such as a circuit breaker to shut down the main power of power supplying equipment
- to this product. Before attempting to connect or operate this product, please read these instructions carefully.
  - \_\_\_\_



## Precautions

#### Do not insert any foreign objects.

Fire or electrical shock may be caused if water or any foreign objects, such as metal objects, enter inside the unit. Turn the power off immediately and contact qualified service personnel for service.

#### Do not use this product in an inflammable atmosphere.

Failure to observe this may cause an explosion resulting in injury. Avoid installing this product in the locations where salt damage occurs or corrosive gas is produced.

Otherwise, the mounting portions will deteriorate and injury or accidents due to a fall of the product may occur.

Do not strike or give a strong shock to this product. Failure to observe this may cause injury or fire

■ Keep microSD memory cards away from infants and children.

Otherwise, they may swallow the cards by mistake.

In this case, consult a doctor immediately.

- Do not hang down from this product or use this product as a pedestal.
- Failure to observe this may cause injury or accidents

■ Do not install this product on a place that is greatly influenced by wind. (U2540) (U2530) 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.

#### ■ Do not sprinkle more water, exceeding the performance limit of waterproof with a high pressure cleaning machine, etc. U2540 U2530

Fire or electrical shock may be caused by immersion

Do not attempt to disassemble or modify this product.

Failure to observe this may cause fire or electric shock. Consult the dealer for the repair or inspections. Do not install or clean the camera, or touch this product, the power cable or the connected cables

#### during thunder storms. Failure to observe this may cause electric shock.

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.

#### Stop the operation immediately when something is wrong with this product.

When smoke goes up from the product, the smell of smoke comes from the product, or the exterior of the product has deteriorated, continued use will cause a fire or fall of the product resulting in injury, or damage to the product. In this case, turn the power off immediately and contact qualified service personnel for service.

Select an installation area that can support the total weight.

Selecting an inappropriate installation surface may cause this product to fall down or topple over, resulting in injury or accidents. Installation work shall be started after sufficient reinforcement.

#### Periodic inspections shall be conducted.

Rust on the metal parts or screws may cause a fall of the product resulting in injury or accidents. Consult the dealer for the inspections.

## The screws and bolts must be tightened to the specified torque.

Failure to observe this may cause a drop resulting in injury or accidents.

Turn the power off when do wiring of this product.

Failure to observe this may cause electric shock. In addition, short circuit or wrong wiring may cause fire.

■ Install this product in a location high enough to avoid people and objects from bumping the product. Failure to observe this may cause injury.

Do not install this product in locations subject to vibration.

Loosening of mounting screws or bolts may cause a fall of the product resulting in injury or accidents.

■ Correctly perform all wiring. Short circuits in the wiring or incorrect wiring may cause fire or electrical shock.

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

■ Do not rub the edges of metal parts with your hand.

#### Failure to observe this may cause injury.

■ Do not touch the metal part of the bottom side of the product.

The metal part of the bottom side may become hot while the product is in use. Direct skin contact with high-temper-

ature parts of the product may cause burns. Turn the power off when cleaning this product.

Failure to observe this may cause injury.

#### • This product 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.

• This product is a professional equipment. For information about screws and brackets required for installation, refer to the corresponding section of this document.

### Direct current symbol

Notice:

#### About notations

The following notations are used when describing the functions limited for specified models The functions without the notations are supported by all models.

(U2540) The functions with this notation are available when using the model WV-U2540L (4M pixel model). (U2530) The functions with this notation are available when using the model WV-U2530L (Full HD model). U2140 The functions with this notation are available when using the model WV-U2140L (4M pixel model). U2130 The functions with this notation are available when using the model WV-U2130L (Full HD model).

#### Open Source Software

• This product contains open source software licensed under GPL (GNU General Public License), LGPL (GNU Lesser General Public License), etc.

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#### Precautions for installation

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

■ In order to prevent injury, the product must be securely mounted to a wall or ceiling according to Installation Guide.

#### Installation area for this product

Select an appropriate place for the installation area (such as a strong wall or ceiling) in your particular environment. Make sure that the installation area is strong enough to hold this product, such as a concrete ceiling. Install the camera in the foundation area of the architecture or where sufficient strength is assured.

• Do not mount the product on a plaster board or a wooden section because they are too weak. If the product is unavoidably mounted on such a section, the section shall be sufficiently reinforced.

#### This camera is designed to be used indoors U2140 U2130

This product is not operable outdoors. Do not expose this camera to direct sunlight for hours and do not install the product near a heater or an air conditioner. Otherwise, it may cause deformation, discoloration and malfunction. Keep this camera away from water and moisture.

■ This product is designed to be installed under eaves. U2540 U2530 Install the product in areas that do not receive direct sunlight.

#### Do not place this product in the following places

• Locations where a chemical agent is used such as a swimming pool

Locations subject to moisture or oil smoke such as a kitchen

• Locations that have a specific environment that is subject to an inflammable atmosphere or solvents

• Locations where a radiation, an X-ray, a strong radio wave or a strong magnetic field is generated · Locations near coasts directly subjected to sea breezes, or locations subject to corrosive gases such as from hot springs, volcanic regions, etc.

• Locations where the temperature is not within the specified range

· Locations subject to vibrations, such as on vehicles, marine vessels, or above product lines (This product is not designed for on-vehicle use.)

 Locations where it may get directly wet from rain or water splash (including under the eaves, etc.) U2140 U2130 Locations subject to moisture or dust U2140 U2130

 Locations subject to sudden changes in temperature such as near air discharge vents of air conditioners or air circulation inlet doors U2140 U2130

• Locations subject to condensation as the result of severe changes in temperature (In case of installing the product in such locations, the dome cover may become foggy or condensation may be caused on the cover.) U2540 U2530 Locations near rubber products (packing, rubber feet, etc.)

#### Screw tightening

Do not use an impact driver. Use of an impact driver may damage the screws or cause tightening excessively. About reflection of light from outside or IR light

A ghost may appear on the screen depending on the incident angle of external light.

In the case of using the IR light, installation of a camera near a wall may cause reflection of infrared rays resulting in a part of the screen or the entire screen turning whitish

• Refer to our support website <Control No.: C0109> for image examples and measures to take.

Take notice of humidity Install this product when the humidity is low. If installation is performed when it is raining or in very humid conditions, the inside may be affected by humidity, causing mist-over inside the dome cover.

#### Protection from lightning

When the cables brought from outdoors are used, there is a chance that they may be affected by lightning. In such a case, install a lightning arrestor close to the camera, and make the length of the network cable between the camera and lightning arrestor as short as possible to prevent the camera from being affected by lightning

#### When noise disturbance may happen

Noise may appear in video or audio near a strong electric field from a TV or radio antenna, motors and transformers, or a strong electric field/magnetic field from a power line (lamp line) of AC100 V or more. Conduct the power distribution work to keep 1 m {3-15/16 inches} away from them or conduct the electric conduit work using metal pipes. (Be sure to make ground connection of the metal pipes.)

#### ■ Make sure to remove this product if it will no longer be used.

This product has no power switch.

When turning off the power, disconnect the power supply from the PoE device.

#### About the battery

information.

the trouble.

A battery is installed inside the camera. Do not leave the battery exposed in environments of excessive heat as a result of sunlight or fire.

#### Equipment classification and power source indication label

Refer to the indication label on the bottom side of this unit for the equipment classification, power source, and other

## Troubleshooting

Before requesting service, refer to "Troubleshooting" of Basic Information and Operating Instructions. Then, confirm

|                                | WV-U2540L/WV-U2530L   | WV-U2140L/WV-U2130L                |  |
|--------------------------------|---|------------------------------------|--|
| Power source*1:                | PoE (IEEE802.3af compliant)                                       | 1                                  |  |
| Power consumption*1:           | PoE DC 48 V: 110 mA/Approx. 5.3W (Class 2 device) (U2540) (U2140) |                                    |  |
|                                | PoE DC 48 V: 100 mA/Approx. 4.8 W (Class 2 device) U2530 U213     |                                    |  |
| Operating environment          |   |                                    |  |
| Ambient operating temperature: | -30 °C to +50 °C {-22 °F to +122 °F}                              | -10 °C to +50 °C {14 °F to 122 °F} |  |
|                                | (Power On range: -20 °C to +50 °C                                 | (Power On range: 0 °C to 50 °C     |  |
|                                | {-4 °F to +122 °F})   | {32 °F to 122 °F})                 |  |
| Ambient operating humidity:    | 10 % to 100 % (no condensation)                                   | 10 % to 90 % (no condensation)     |  |
| Storage environment            |   |                                    |  |
| Storage temperature:           | -30 °C to +60 °C {-22 °F to +140 °F}                              |                                    |  |
| Storage humidity:              | 10 % to 95 % (no condensation)                                    |                                    |  |
| Waterproof*2:                  | IP66 (IEC 60529), Type 4X (UL50E)                                 | Not support                        |  |
|                                | NEMA 4X compliant   |                                    |  |
| Shock resistance:              | IK10 (IEC 62262)  | Not support                        |  |
| Wind resistance:               | Up to 40 m/s {approx. 89 mph}                                     | Not support                        |  |
| Dimensions:                    | ø109 mm × 62 mm (H) {ø4-9/32 inches × 2-7/16 inches (H)}          |                                    |  |
|                                | Dome radius 30.5 mm {1-3/16 inches}                               |                                    |  |
| Mass:                          | Approx. 270 g {0.60 lbs}  | Approx. 250 g {0.55 lbs}           |  |
| Finish:                        | Main body:  | Main body:                         |  |
|                                | Aluminum die cast, i-PRO white                                    | Aluminum die cast, i-PRO white     |  |
|                                | Polycarbonate resin, i-PRO white                                  | Polycarbonate resin, i-PRO white   |  |
|                                | Outer fixing screws:  | Dome cover:                        |  |
|                                | Stainless steel   | Polycarbonate resin, Clear         |  |
|                                | (Corrosion-resistant treatment)                                   |                                    |  |
|                                | Dome cover:   |                                    |  |
|                                | Polycarbonate resin, Clear  |                                    |  |
| Others:                        | Tamper-resistant enclosure*3                                      | Not support                        |  |

\*1 Refer to our support website <Control No.: C0106> for further information about Power source and Power consumption information

\*2 Only when installation work is properly performed according to the Installation Guide and appropriate waterproof treatment is performed. \*3 Component that has a structure on which the screws that are accessible after installation cannot be

screwed or unscrewed using an ordinary screwdriver.

#### Optional accessories<sup>\*1</sup>

| Wall mount bracket:    | WV-QWL500-W (i-PRO white) / WV-QWL500-G (Light gray)                                  |
|------------------------|---|
| Ceiling mount bracket: | WV-QCL100-W (ISO standard screw thread) /<br>WV-QCL101-W (ANSI standard screw thread) |
| Dome cover (smoke):    | WV-QDC500S  |

\*1 Refer to our support website <Control No.: C0501> for further information about optional accessories.

| Standard accessories  |   |
|---|---|
| Installation Guide (this document)1 pc.<br>IMPORTANT SAFETY INSTRUCTIONS1 pc. | Warranty card1 pc<br>Code label*11 pc   |
| *1 This label may be required for network managemer                           | nt. Use caution not to lose this label. |

The following parts are used during installation procedures.

| emplate1 pc.                  |                   |
|-------------------------------|-------------------|
| U2140 U2130                   | U2540 U25         |
| Cable for easy kitting*21 pc. | RJ45 waterproof c |
|                               | RJ45 waterproof c |
|                               | Dit /Llow wrongh  |

2530) f connector cover .. .1 pc. f connector cap .. .1 pc. Bit (Hex wrench, screw size 6.35 mm {1/4 inches} T10).. 1 pc.

\*2 The cable for easy kitting is attached to the camera.

## Other items that are needed (not included)

Eixing screet

| Installation method   | Recommended<br>screw <sup>*1</sup>                   | Minimum pull-<br>out strength*2 |  |  |
|---|--|---------------------------------|--|--|
| Directly mount the camera onto the ceiling or wall.               | M4/2 pcs.  | 196 N {44 lbf}                  |  |  |
| I Mount the comerci light the evolutionally decided mount bracket | Refer to the operating instructions of each bracket. |                                 |  |  |

\*1 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.

2 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>.

• RJ45plug, Ethernet cable (category 5e or better, straight, 4 pairs (8 pins))

Tools

