

WV-S85402-V2L

2 x 4MP IR Outdoor Multi-directional Network Camera with AI Engine

Multi-directional dual sensor camera



- 2 x 4MP Multi-directional camera
- One IP address, One VMS license
- Up to 4 Edge AI analytic apps
- Built-in IR-LED (40m, 131ft)
- Wide angle of view (Horizontal 100°)
- Corridor mode (90 degrees or 270 degrees in image rotation)
- IP66, IP67, IK10 certified
- Built-in FIPS 140-2 Level 3 Certified SecureElement (EdgeLock® SE050F NXP® Semiconductors)
- NDAA Compliant

[Learn More](#)



SPECIFICATIONS

| Camera | |
|---|---|
| Image Sensor | 2x 1/2.7 type CMOS image sensor |
| Scanning Area | 5.38 mm (H) x 3.02 mm (V) {7/32 inches(H) x 1/8 inches(V)} |
| Minimum Illumination | Color : 0.21 lx (30IRE, F2.0, 1/30s, AGC:11)* 0.3 lx (50IRE, F2.0, 1/30s, AGC:11) 0.019 lx (50IRE, F2.0, 16/30s, AGC:11)* BW : 0 lx (50IRE, F2.0, 1/30s, AGC:11, IR LED: On) 0.12 lx (50IRE, F2.0, 1/30s, AGC:11) 0.0075 lx (50IRE, F2.0, 16/30s, AGC:11)* *Converted value |
| White Balance | ATW1/ ATW2/ AWC |
| Maximum shutter | 30 fps mode: Max.1/10000s to Max.16/30s 25 fps mode: Max.1/10000s to Max.16/25s |
| Intelligent Auto | On / Off |
| Super Dynamic | On / Off, The level can be set in the range of 0 to 31. |
| Dynamic Range | 108 dB max. (Super Dynamic: On, Level: 31) |
| Adaptive Black Stretch | The level can be set in the range of 0 to 255. |
| Back Light Compensation/High Light Compensation | BLC/ HLC/ Off, The level can be set in the range of 0 to 31. (only when Super Dynamic/ Intelligent Auto: Off) |
| Fog Compensation | On/ Off, The level can be set in the range of 0 to 8. (only when Intelligent Auto/ Auto contrast adjust: Off) |
| Maximum Gain (AGC) | The level can be set in the range of 0 to 11. |
| Color/BW (ICR) | Off/On(IR Light Off)/On(IR Light On)/Auto1(IR Light Off)/Auto2(IR Light On)/Auto3(SCC) |
| IR LED Light | High/Middle/Low/Off Maximum irradiation distance : 40 m {Approx. 131 ft} (30IRE)* 30 m {Approx. 99 ft} (50IRE) * Converted value |
| Digital Noise Reduction | The level can be set in the range of 0 to 255. |
| Video Motion Detection (VMD) | On / Off, 4 areas available |
| Scene Change Detection (SCD) | On / Off, 1 areas available |
| Audio Detection | On/Off |
| AI Sound Classification | Selectable from Gunshot, Yell, Vehicle horn, Glass break |

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|--------------------|---|
| AI Analytics | AI Video Motion Detection, AI Face Detection, AI People Detection, AI Vehicle Detection, AI Non mask Detection (prior to V2.70), AI Occupancy Detection, AI Scene Change Detection For details : https://i-pro.com/products_and_solutions/en/surveillance/products/analytics-software 3rd party applications are also available. https://i-pro.com/products_and_solutions/en/surveillance/solutions/edge-ai-platform/application-list |
| Privacy Zone | On/ Off (up to 8 zones available) |
| VIQS | On / Off (up to 8 zones available) |
| Image Rotation | 0° (Off) / 90° / 180° (Upside-down) / 270° |
| Camera Title (OSD) | On/ Off, Up to 40 characters, Up to 2 Lines (alphanumeric characters, marks) |
| Focus Adjustment | Auto focus |

Lens

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|------------------------|---|
| Optical zoom | 2.5x (Motorized zoom / Motorized focus) |
| Extra zoom | max 10.5x (when resolution is 640x360) |
| Focal length | 2.9 mm{1/8 inches} – 7.3 mm{1/4 inches} |
| Angular Field of View | Horizontal : 43 ° (TELE)-100°(WIDE) Vertical : 24 ° (TELE) - 56°(WIDE) |
| Maximum Aperture Ratio | 1 : 2.0 (WIDE) - 1 : 3.0 (TELE) |
| Focus range | 1 m {3.28 ft} – ∞ |

DORI

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|----------------------------|---|
| Detect (25ppm / 8ppf) | Wide: 45.1 m / 148 ft, Tele: 136.5 m / 447.8 ft |
| Observe (62.5ppm / 19ppf) | Wide: 18.0 m / 59.2 ft, Tele: 54.6 m / 179.1 ft |
| Recognize (125ppm / 38ppf) | Wide: 9.0 m / 29.6 ft, Tele: 27.3 m / 89.6 ft |
| Identify (250ppm / 76ppf) | Wide: 4.5 m / 14.8 ft, Tele: 13.6 m / 44.8 ft |

System on Chip (SoC)

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|----------------------|---------------|
| System on Chip (SoC) | Ambarella CV2 |
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Adjusting Angle

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| Adjusting Angle | Camera 1, 2: Horizontal: -50° to +230° (Adjust by horizontal (PAN) angle) Vertical: +10° to +105° (Adjust by vertical (TILT) angle) Yaw: ±90° (Adjust by azimuth (YAW) angle) |
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Browser GUI

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| Camera Control | Brightness, AUX On / Off |
| Audio | Mic (Line) Input : On / Off Volume adjustment : Low / Middle / High Audio Output : On / Off Volume adjustment : Low / Middle / High |
| GUI / Setup Menu Language | English, Italian, French, German, Spanish, Portuguese, Russian, Chinese, Japanese |
| Browser | Microsoft Edge, Firefox, Google Chrome *1 |

Network

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|---------------------------------------|---|
| Network IF | 10BASE-T/100BASE-TX/1000BASE-T, RJ45 connector |
| Resolution H.265/ H.264/ JPEG (MJPEG) | [16:9 mode] 2688 x 1520 / 2560x1440 / 1920 x 1080 / 1280 x 720 / 640x360/320x180 |

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| H.265/H.264 | [Transmission Mode] Constant bit rate / VBR / Frame rate / Best effort [Transmission Type] Unicast port (AUTO) / Unicast port (MANUAL) / Multicast |
| JPEG | [Image Quality]10 steps |
| Smart Coding | GOP(Group of pictures) control : Off/ Low (Variable GOP 1s-8s) / Mid (Variable GOP 4s-16s)/Advanced (Fixed GOP 60 seconds with 1 second Key frame)/Frame rate control (Variable GOP 4s-16s with frame rate control) *Advanced and Frame rate control are only available with H.265. Smart VIQS : On(High)/On(Low)/Off Smart P-picture control : On/Off |
| Audio Compression | G.726 (ADPCM) 32 kbps/16 kbps G.711 64 kbps AAC-LC 64kbps/96kbps/128kbps *2 |
| Audio Transmission Mode | Off / Mic (Line) input / Audio output / Interactive (Half duplex) / Interactive (Full duplex) |
| Supported Protocol | IPv6: TCP/IP, UDP/IP, HTTP, HTTPS, SSL/TLS, SMTP, DNS, NTP, SNMPv1/v2/v3, DHCPv6, RTP, MLD, ICMP, ARP, IEEE 802.1X, DiffServ, LLDP, MQTT IPv4 : TCP/IP, UDP/IP, HTTP, HTTPS, SSL/TLS, RTSP, RTP, RTP/RTCP, SMTP, DHCP, DNS, DDNS, NTP, SNMPv1/v2/v3, UPnP, IGMP, ICMP, ARP, IEEE 802.1X, DiffServ, SRTP, LLDP, MQTT |
| No. of Simultaneous Users | 24 (Number of sessions that can connect to cameras at the same time) |
| Secure | FIPS 140-2 level 3 (NXP® EdgeLock® SE050F), Device Certificate GlobalSign® pre-installed, HTTPS, User authentication, Digest authentication, Host authentication, IEEE802.1X, System log, Image transmission log, Brute-force protection, Alteration detection, Signed Firmware |
| SDXC/SDHC/SD Memory Card | microSDXC memory card : 64 GB, 128 GB, 256 GB, 512 GB microSDHC memory card : 4 GB, 8 GB, 16 GB, 32 GB microSD memory card : 2 GB |
| Mobile Terminal Compatibility | iPad / iPhone (iOS 8.0 or later), Android™ terminals |
| ONVIF® Profile | G / M / S / T |

Alarm

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|---------------|--|
| Alarm Source | 3 terminals input, VMD alarm, SCD alarm, Command alarm, Audio detection alarm |
| Alarm Actions | SDXC/SDHC/SD memory recording, E-mail notification, HTTP alarm notification Indication on browser, TCP alarm notification output |

Input/Output

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|---------------------------|--|
| Audio input *3 | ø3.5 mm stereo mini jack For microphone input : Recommended applicable microphone : Plug-in power type (Sensitivity of microphone : -48 dB±3 dB (0 dB=1 V/Pa, 1 kHz)) Input impedance : Approx. 2 kΩ (unbalanced) Supply voltage : 2.4 V ±0.5 V For line input : Input level: Approx. -10 dBV |
| Audio Output *3 | ø3.5 mm stereo mini jack (Audio output is monaural.) Output impedance: Approx. 600 Ω (unbalanced) Output level: -20 dBV |
| External I/O Terminals *3 | ALARM IN 1 (Alarm input 1/ Black & white input/ Auto time adjustment input) (x1) ALARM IN 2 (Alarm input 2/ ALARM OUT) (x1) ALARM IN 3 (Alarm input 3/ ALARM OUT /AUX OUT) (x1) |
| Monitor Output | - |
| Wi-Fi USB Adapter | Yes (for adjustment) |

General

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|--------|---|
| Safety | UL (UL62368-1), c-UL (CSA C22.2 No.62368-1), CE, IEC62368-1 |
| EMC | FCC (Part15 ClassA), ICES-003 ClassA, EN55032 ClassA, EN55035 |

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|------------------------------------|---|
| Power Source and Power Consumption | PoE+ (IEEE802.3at compliant) : DC 54 V : 410 mA/Approx. 22.2 W (Class 4 device) |
| Ambient Operating Temperature | -40 °C to +60 °C* {-40 °F to 140 °F} (Power On range: -20 °C to +60 °C {-4 °F to 140 °F}) Maximum temperature according to NEMA TS 2 (2.2.7) : 74°C (165°F) *When using with the IR LED light constantly lit, the upper limit of the operating temperature range is +50 °C {+122 °F}. |
| Ambient Operating Humidity | 10 % to 100 % (no condensation) |
| Anti-Condensation System | Temish element |
| Water and Dust Resistance | IP67/IP66 (IEC 60529), Type 4X (UL50E), NEMA 4X compliant |
| Shock Resistance | IK10 (IEC 62262) |
| Wind Resistance | Up to 40 m/s {approx. 89 mph} |
| Other standard support | NEMA TS 2 (2.2.7-2.2.9) |
| Dimensions | When using the attachment plate only: 250 mm(D) × 150 mm (W) × 105 mm (H) {9-27/32" inches (D) × 5-29/32 inches (W) × 4-1/8 inches (H)} |
| Mass (approx.) | Approx. 1.8 kg |
| Finish | Main body: Aluminum die cast, i-PRO white Outer fixing screws: Stainless steel (Corrosion-resistant treatment) Dome cover: PC resin, Clear |

NOTES

*1 For information on the operation verification of the web browsers, refer to our support website <Control No.: C0132>.

*2 When recording audio on an SD memory card, only use AAC-LC (Advanced Audio Coding - Low Complexity) .

*3 When using with them, WV-QCA501A cable is required.

Important

- Safety Precautions : Carefully read the Basic Information, Installation Guide and Operating Instructions before using this product.
- i-PRO Co., Ltd. cannot be held responsible for the performance of the network and/or other manufacturers' products used on the network.
- Masses and dimensions are approximate.
- Specifications are subject to change without notice.

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OPTIONAL ACCESSORIES

Select a compatible accessory

[Accessory Selector \(i-pro.com\)](http://i-pro.com)



WV-QWL501-W
Mount Bracket



WV-QSR507M1-W
Mount Bracket



WV-QSR507M-W
Mount Bracket



WV-QSR507F1-W
Mount Bracket



WV-QSR507F-W
Mount Bracket



WV-QSR507-W
Mount Bracket



WV-QPL500-W
Mount Bracket



WV-QCN500-W
Mount Bracket



WV-QCL501-W
Mount Bracket



WV-QCL101-W
Mount Bracket



WV-QCL100-W
Mount Bracket



PWM25W
Gooseneck Wall Mount



PPRM35AW
Parapet Mount Bracket



WV-SDB256G
i-PRO SD Memory Card



WV-SDB128G
i-PRO SD Memory Card



WV-SDB064G
i-PRO SD Memory Card



WV-SDB032G
i-PRO SD Memory Card



WV-QDC504C
Dome Cover



WV-QDC200C
Dome Cover



WV-QCA501A
I/O Cable

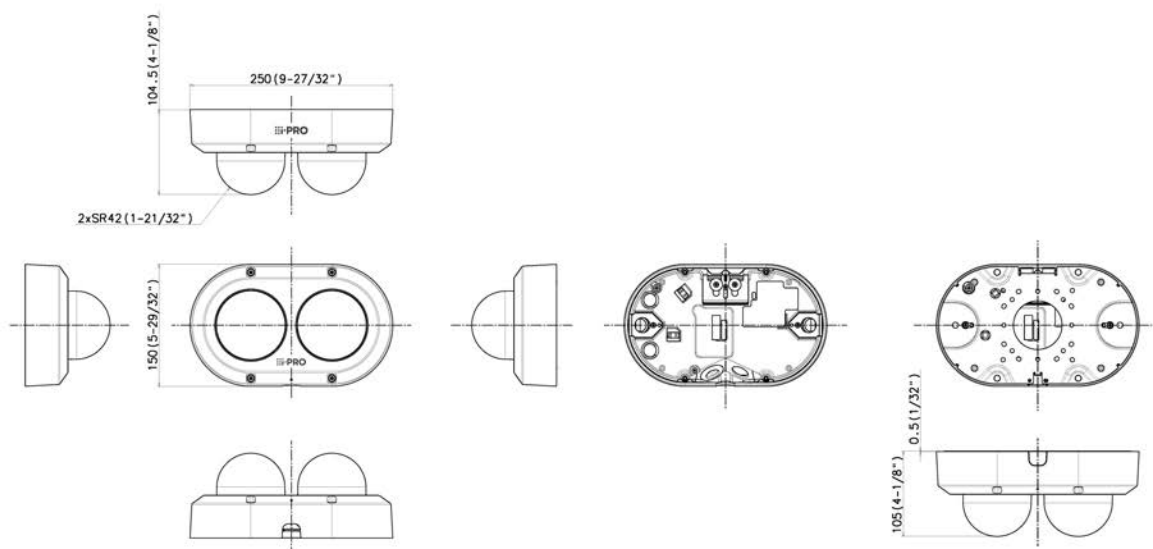


WV-PM500
Compact microphone
unit for surveillance
cameras



WV-CW7CN
Dome cover

APPEARANCE



With attachment plate

| 投影面積/Projected area | |
|---|-------------------------|
| 平面図/Top-view | 0.020 (m ²) |
| 側面図/Side-view | 0.011 (m ²) |
| Mass : Approx. 1.6 kg [3.53 lbs] (When using the attachment plate) | |

Unit:mm