

BL2002PID

Long range 2MP network bullet camera with PID

DESCRIPTION

The BL2002PID is an intelligent 2-megapixel IP bullet camera with built-in perimeter intrusion detection (PID). It is especially focused on perimeter surveillance applications, where traditionally the box camera would find purpose. Thanks to this model's long viewing range of up to 150m, including IR illumination. The PID function uses an AI algorithm, ensuring the highest accuracy possible. The long-range 4.7 to 71 mm (15x) motorized autofocus lens allows for a longer inter-camera distance, reducing materials cost. Intelligent video encoding ensures good image quality and low storage costs.

FEATURES

1/2.8 ultra-low light CMOS imager

2MP @ 60 fps (1920x1080)

Motorized zoom (4.7 - 71 mm)

Includes AI Smart perimeter intrusion detection

Multi-codec multi-stream: 4x H.265, H.264, MJPEG

Built-in IR illuminator (up to 150 m)

IP67, IK10

ONVIF Profile S, G, T



Description

Long range perimeter intrusion detection

The BL2002PID is equipped with light sensitive optics to look into the far distance and detect perimeter intrusions over distances more than 100 meters away. This makes this camera a very cost effective alternative to the classic box camera application for fence surveillance. The smart AI-based virtual fence algorithm is specialized in detecting humans, which over time reduces the chance of false alarms.

Multi-encoder & multi-streaming

The camera is capable of simultaneous streaming 4 different H.265, H.264 and MJPEG streams. Streaming 2-megapixel full-HD (1920 x 1080) at up to 60 fps. Multiple combinations of resolution, frame rate, and encoding can be configured to satisfy different live viewing and recording scenarios.

High-Efficiency Video Coding (HEVC)

H.265 or HEVC is a video compression standard, the successor of H.264. In comparison, H.265 offers about double the compression ratio at the same level of video quality or substantially improved video quality at the same bit rate. Thus saving bandwidth and recording space.

ONVIF

Multiple options are available to easily integrate the BL2002PID into a video management system. In support of open standards, the BL2002PID is compliant with ONVIF (Profile S, Profile G, Profile T).

Image enhancement

The BL2002PID features a set of tools to enhance the image quality, such as smart IR, Defog, BLC, and 3D noise reduction.

Ease of installation

The BL2002PID is fitted with a built-in junction box to make installation easy and dismisses the need for an external junction box.

| Camera | |
|----------------------------|---|
| Image Sensor | 1/2.8" Progressive CMOS |
| Effective pixels | 1920x1080 (2MP) |
| Minimum scene illumination | Color: 0.002lux, B/W: 0lux with IR illumination on, F1.4, AGC |
| Shutter Speed | 1 sec. to 1/30,000 sec. |
| Lens | Motorized 4.7 to 71 mm, F/1.6, DC-iris |
| Field of View | 57.7° to 3.66° horizontal, 33.2° to 2.75° vertical |
| Focus Control | Autofocus |
| Slow Shutter | Support |
| Day/Night | Automatic IR-cut Filter |

| Video | |
|--------------------------------|---|
| Video Compression | H.265 (Main Profile) / H.264 (High Profile/Main Profile/Base Profile) / MJPEG |
| Video Bitrate | 32Kbpf to 8Mbps |
| Max. Resolution | 1920x1080 30fps |
| Supported Resolution | 1920x1080, 1280x720, 704x576, 640x480 |
| Frame Rate | 25/30fps |
| Number of simultaneous streams | Four streams |
| Max. Streaming | |
| 30fps* | 1920x1080, 640x480, 1920x1080, 1280x720 |
| 30fps | 1920x1080, 640x480 |
| 60fps(Shutter WDR OFF) | 1920x1080 |
| Bitrate Control | Constant bit rate (CBR), variable bit rate (VBR), Smart bitrate(H.265i, H.264i)** |
| Number of video output streams | Up to 20(RTSP) |
| Region of interest | Support |
| | *Monitor mode enabled. 3rd and 4th streaming are limited to 10fps. |
| | **Main Stream support |

| Image | |
|--------------------------|--|
| Wide dynamic range | 120dB |
| White Balance | Auto, Fixed, Manual |
| Image Setting | Saturation, Brightness, Contrast, Sharpness, Backlight Compensation, Highlight Compensation, WDR, Exposure control, Gain |
| SNR | 52dB |
| Day/Night Switch | Auto/Scheduled/Triggered by Alarm In |
| Image Enhancement | 3DNR, Defog, Lens Distortion Correction |
| Image Stabilization | Yes |
| Image Rotation | 90°, 180°, 270° rotation |
| privacy masks | Support |
| Text and picture overlay | Date & time, Preset title, Image overlay with 128 128 24-bit BMP format |

| Analytics | |
|-----------------|--|
| Smart Analytics | Line crossing detection (or Perimeter Intrusion Detection - PID)* with classification of humans/vehicles |

Analytics

| | |
|------------------|---|
| Other analytics | Motion detection (with classification of humans/vehicles), video tampering alarm, out of focus detection, scene changed detection, sound volume changed detection, intrusion detection*, region entrance detection*, region exit detection* |
| Event detections | External input, external output, tampering, recording notification, network connection lost, IP address conflicted, illegal login |
| Event actions | Alarm output, record video clip to NAS/SD card, send alarm message and image by E-mail/FTP, Send HTTP notification |

*Available on Smart Event mode.

Alarm

| | |
|-------------------|--|
| Input | 2x (max. 24VDC, 1A) |
| Output | 2x (max. 24VDC, 1A) |
| Operational modes | Motion detection, Tampering alarm, Alarm I/O, Smart Analytics Events |

Network

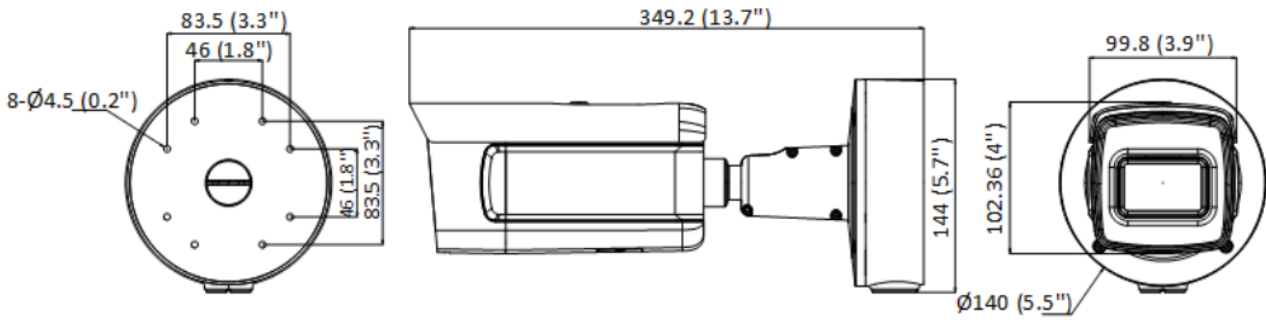
| | |
|-------------------------|--|
| Communication Interface | 10/100/1000 Mb (RJ45) |
| Network protocols | IPv4/IPv6, HTTP, HTTPS (TLS1.2), 802.1x, QoS, FTP, SMTP(SSL), UPnP, SNMP(v1/v2/v3/Traps), DNS, DDNS, NTP, RTSP, RTCP, RTP/UDP, TCP/IP, IGMP(v2/v3), DHCP, PPPoE, SSL/TLS, SRTP, ONVIF Profile S/G/T, Siquira Programming Interface (SPI API) |
| Security | User authentication, Privilege Management, Digest authentication (RTSP, HTTP), HTTPS encryption (TLS1.1/1.2); SRTP, IEEE 802.1x port-based network access control, IP filtering |
| Web Viewer | Internet Explorer 11, Microsoft Edge, Google Chrome, Mozilla Firefox |

General

| | |
|-------------------------|---|
| Protection Level | IP67, IK10 |
| Material | Die cast aluminum |
| Edge Storage | Built-in micro SD/SDHC/SDXC slot, up to 256 GB |
| Power | DC12V (terminal block), max. 10.8 W; PoE (802.3af), max. 12.9 W |
| IR illumination | 850nm IR LEDs, max. 150m IR Viewable Length |
| Operating temperature | -30°C ~ 60°C (-22°F ~ 140°F) |
| Relative Humidity | 95% or less, no condensation |
| Dimensions(camera body) | 144 mm 140 mm 349.2 mm (5.7" 5.5" 13.7") |
| Weight | 1.8kg |
| Colour | RAL 9003 (Signal white) |

Ordering information

| | |
|-----------|---|
| BL2002PID | Long range 2MP network bullet camera with PID |
| PM10 | Pole mount, for BL/FD200xM1-EI, FD200xv2M, BL2002PID |
| PM10A | Pole mount, for BL200xv2M, BL2002PID |
| WM20 | Corner mount, for 200xM/200xv2M series cameras, BL2002PID |



Unit: mm (inch)

RELATED



TKH Security PM10
Pole mount, for BL/FD200xM1-EI, FD200xv2M



TKH Security PM10A
Pole mount, for BL200xv2M



TKH Security WM20
Corner mount, for 200xM/200xv2M series cameras
