

IPLPR-EL2IR30Z5X

2MP License Plate Long Range Camera



- Capture and recognize license plates traveling up to 49 mph
- H.265 and H.264 Dual Codec
- 1080p at 30 fps Maximum Resolution
- License plate recognition distance up to 98.43 ft
- IP67 Ingress Protection
- 1/1.8-in. 2 MP GS CMOS Sensor

System Overview

The IPLPR-EL2IR30Z5X is our brand new Automated License Plate Reader camera, designed specifically and solely for the purpose of license plate recognition and traffic management. The IPLPR-EL2IR30Z5X features a custom 1/1.8-in Sony GS-CMOS sensor made specifically for the task of cleanly capturing license plates. The 10-50mm motorized varifocal lens will allow you to capture plates from 26-98 feet away from where the camera is installed at speeds up to 49 MPH. When used in conjunction with one of our supported NVRs, the IPLPR-EL2IR30Z5X offers a complete traffic management and parking solution.

Features

License Plate Recognition

License Plate Recognition cameras automatically capture vehicle license plate images and recognizes license plate numbers and letters. During playback you can perform a license plate search by time and date to view thumbnail images of all plates captured during the specified time period or you can enter a license plate number to search for vehicles recorded with that plate. License plate recognition technology offers effective entrance/exit management, traffic surveillance, and parking lot monitoring.

HEVC(H.265)

High Efficiency Video Coding (HEVC) is a video compression standard which offers double the data compression ratio at the same or higher level of video quality and the same bit rate as the AVC technique. High Efficiency Video Coding supports resolutions up to 8192×4320, which includes 8K ultra-high definition.

Environmental

This camera's outstanding reliability is unsurpassed due to its rugged design. The camera is protected against water and dust with an IP67 ranking, making it suitable for indoor or outdoor environments.

Technical Specification

Camera

Image Sensor	1/1.8-in. 2 MP GS CMOS
Effective Pixels	1920(H) x 1080(V)
Scanning System	Rolling Shutter
Electronic Shutter Speed	1/50 s to 1/10000 s
IR Distance	25.0 m (82.02 ft)
IR On/Off Control	Auto, On, Off
IR LEDs	Six (6), adjustable brightness

Lens

Lens Type	Module
Focal Length	10 mm to 50 mm
Max. Aperture	F1.3
Angle of View	Horizontal: 46.60° to 10.62° Vertical:40.60° to 9.30° Diagonal: 22.70° to 5.30°
Optical Zoom	5x
Iris	Auto Iris, F1.3 to F2.3
Focus Control	Motorized, Automatic
Focus Width Range	3.50 m (11. 48 ft), approximately one (1) lane

Video

Video Encoding	H.265, H.264M, H.264H, H.264B, MJPEG
Image Encoding	JPEG
Streaming Capability	One (1) Stream
Resolution	1080p (1920 x 1080), 720p (1280 x 720)
Frame Rate	1080p at 30 fps
Bit Rate Control	CBR, VBR
Bit Rate	H.264B: 20 Kbps to 32768 Kbps H.264M: 20 Kbps to 32768 Kbps H.264H: 20 Kbps to 32768 Kbps H.265: 20 Kbps to 32768 Kbps MJPEG: 59 Kbps to 65536 Kbps
Day/Night	Auto (ICR), Color, B/W
Wide Dynamic Range	96 dB
White Balance	Auto, Outdoor, Manual, Part White Balance, Natural Street Lamp
Edge Enhancement	Supported
Exposure Mode	Full-Auto, Customized Auto, Customized
Gain Control	Automatic
Noise Reduction	3DNR

Network

Ethernet	RJ-45 (100/1000 Base-T)
Protocol	IPv4/IPv6, HTTP, TCP/IP, UDP, NTP, DHCP, DNS
Interoperability	ONVIF, CGI
Streaming Method	Unicast, Multicast
Maximum User Access	20 Users
Edge Storage	Micro SD Card Slot, 64 GB maximum
Web Viewer	IE
Management Software	DSS

Certifications

Safety	IEC 62368-1:2014 (Second Edition)
Electromagnetic Compatibility (EMC)	47 CFR FCC Part 15 SubpartB, Class B EN 55032:2015, Class B EN61000-3-2:2014 EN 61000-3-3:2013 EN 55024:2010+A1:2015 EN55035:2017 EN 50130-4:2011+A1:2014

Interface

BNC		1 BNC
I/O		Two Inputs, Optocoupler (switch quantity)
RS485		One (1) Port
Audio	Input	x1 RCA
	Output	x1 RCA
Alarm	Input	One (1) Channel, Optocoupler
	Output	Two (2) Relay Channels

Electrical

Power Supply	12 VDC, 24 VAC, or PoE (IEEE802.3af Class 0)
Power Consumption	< 20 W
Power Output	12 VDC ± 10%, ≤ 1 A

Environmental

Operating Temperature	−30° C to +65° C (−22° F to +149° F) 10% to 90% RH (non-condensing)
Storage Temperature	−30° C to +65° C (−22° F to +149° F)
Ingress Protection	IP67

Construction

Casing		Metal and Plastic
Dimensions	Camera	370.46 mm x 124.73 mm x 105.73 mm (14.58 in. x 4.91 in. x 4.16 in.)
	Camera with Bracket	515.21 mm x 124.73 mm x 105.73 mm (20.28 in. x 4.91 in. x 4.16 in.)
Net Weight		1.70 kg (3.75 lb)
Gross Weight		2.50 kg (5.51 lb)
Installation		Wall or Ceiling with Included Bracket

Technical Specification

Performance

Trigger Mode	Video Detection I/O Coil Video Detection and I/O Coil
Shutter	Single
Image Tampering	Video/Picture Watermark
Alarm Event	No Storage Card Inadequate Storage Space Storage Card Error Network Disconnect IP Address Conflict Illegal Access
Security Mode	Authorized Username and Password MAC Address Binding HTTPS Encryption IEEE 802.1x Network Access Control
On-screen Display Overlay	Time Plate (number and color)
Automatic Network Replenishment (ANR)	Support

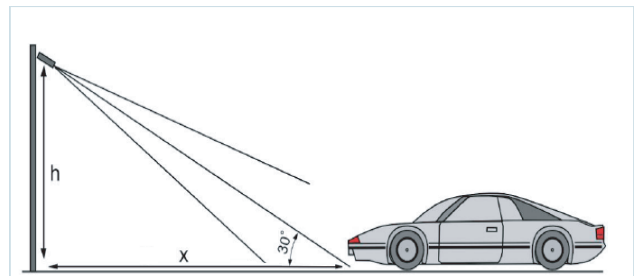
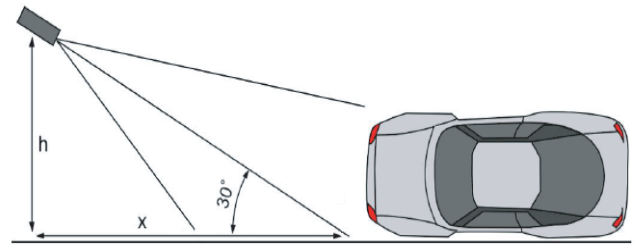
Intelligence

Vehicle Registration	Captures license plate images and extracts the numbers and letters
Intelligent Tracking	Displays vehicle plate and vehicle path

Installation Distances

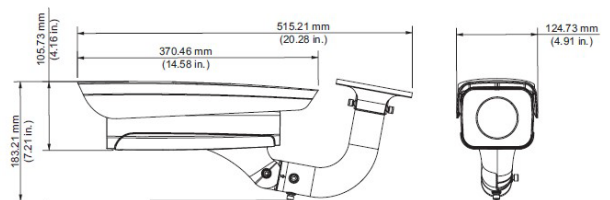
Camera Height (h)	Snapshot Distance (x)	Lane Width	Vehicle Speed, max
Side Installation			
1.2 m (6.56 ft)	4 m to 6 m (13.12 ft ± 19.69 ft)	3.5 m (11.48 ft)	80 kph (49 mph)
Distance to License Plate	Minimum/Maximum: 8 m to 30 m (26.25 ft to 98.43 ft) Optimal: 4 m to 6 m (13.12 ft to 19.69 ft)		
Horizontal/Vertical Angles	< 30°		
Inclination Angle	< 5°		

Camera Placement



In both the vertical and the horizontal placement, the angle between the camera lens and the farther lane border must be less than 30°. Ensure the snapshot distance (x) of the camera is greater than 1.7 times the height (h) of the camera ($x > 1.7 \times h$) for optimal license plate images.

Dimensions



Camera Only

