# **IPEG-E20F-IRW5**

## 2MP Eyeball Network Camera





- 2MP, 1/2.7" CMOS image sensor
- H.265 & H.264 dual-stream encoding
- Outputs 2MP (1920 × 1080)@25/30 fps
- Intelligent Motion Detect, Perimeter Protection
- 2.8 mm fixed lens, Max. IR LEDs Length 98ft
- IP67, PoE,256GB Micro SD support

# **System Overview**

The IPEG-E20F-IRW5 is a Eyeball Turret style camera in IC Realtime's cost-effective Edge lineup. The camera comes equipped with high end features including H.265 encoding and Starlight support with DWDR for a more colorful image in daylight as well as low illumination environments and Smart IR support with up to 98ft of illumination.

This Edge camera has also been updated with the addition of IVS (Intelligent Video System), Perimeter Protection and Intelligent Motion Detect. This allows the camera to utilize Smart Search and event extraction with other IC Realtime AI NVRs.

## **Functions**

#### iMD (Intelligent Motion Detect)

This is an upgraded version of motion detection currently known as Intelligent Motion Detection (iMD). The upgraded Plus version greatly improves alarm accuracy by pre-loading a deep learning algorithm that recognizes people and vehicles. Motion detection alerts containing a human and/or vehicle intrusion event are now possible with up to 95% accuracy. Eliminate false alarms, save time and keep stress levels low knowing you're protected.

### Smart H.265+

Deliver high quality video without straining the network, Smart H.265+ is the optimized implementation of H.265. The Smart H.265+ encoding technology includes a scene adaptive encoding strategy, dynamic GOP, dynamic ROI, flexible multi-frame reference structure and intelligent noise reduction, providing saving of up to 70% of bandwidth and storage when compared with standard H.265.

#### **Perimeter Protection**

IC Realtime's Perimeter Protection features significantly improve detection accuracy. The benefits of Perimeter Protection include up to a 90% reduction in false alarms. Other advantages include a decrease in pixel count requirement for object detection, which translates into more efficiency with less strain on the system. Perimeter Protection options let you customize tripwires based on the object type and allow intelligent automation within a limited area of access such as pedestrian or vehicle-only zones. The combination of advanced AI analytics and real-time alerts maximizes efficiency & balance of the total systems capacity and resources resulting in greater surveillance system efficiency.

#### **Protection**

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

#### Smart IR Technology

With IR illumination, detailed images can be captured in low light or total darkness. The camera's Smart IR technology adjusts the intensity of camera's infrared LEDs to compensate the distance of an object. Smart IR technology prevents IR LEDs from whitening out images as they come closer to the camera. The camera's integrated infrared illumination provides high performance in extreme low-light environments up to 98ft (30m).

#### Interoperability

The camera conforms to the ONVIF (Open Network Video Interface Forum) specifications, ensuring interoperability between network video products regardless of manufactur





# **Technical Specification**

Camera	
Image Sensor	1/2.7"2 Megapixel progressive CMOS
Effective Pixels	1920 (H) × 1080 (V)
RAM/ROM	64MB /16 MB
Scanning System	Progressive
Electronic Shutter Speed	Auto/Manual 1/3 s-1/100000 s
Minimum Illumination	0.01 lux@F2.0 (Color,30 IRE) 0.001 lux@F2.0 (B/W,30 IRE) 0 lux (Illuminator on
S/N Ratio	>56 dB
IR Distance	98.43 ft (30 m)
IR On/Off Control	Auto / Manual
IR LEDs	1

#### Lens

20110					
Lens Type		Fixed			
Mount Type		M12			
Focal Length		2.8mm			
Max. Aperture		F2.0			
Angle of View		Horizontal: 102°, Vertical: 54°			
Optical Zoom		N/A			
Focus Control		Fixed			
Close Focus Distance		1.6 ft (0.5 m)			
DORI Distance	Lens	Detect	Observe	Recognize	Identify
	2.8 mm	126ft	50ft	25ft	12ft

#### Pan/Tilt/Rotation

Pan: 0°–355°, Tilt: 0°–78°, Rotation: 0°–360° Pan/Tilt/Rotation Range

#### Video

viueo	
Compression	H.265; H.264; H.264B; MJPEG (Sub Stream Only)
Streaming Capability	2 Streams
Resolution	1080P(1920×1080)/1.3M(1280×960)/ 720P(1280×720)/D1(704×576/704×480)/ VGA(640×480)/CIF(352×288/352×240)
	Main Stream: 1920 × 1080 (1 fps-25/30 fps)
Frame Rate	Sub Stream: 704 × 576 (1 fps-25fps) 704 × 480 (1 fps-30fps)
Bit Rate Control	CBR/VBR
Bit Rate	H.264: 32 kbps-6144 kbps H.265: 12 kbps-6144 kbps
Day/Night	Auto(ICR) / Color / B/W
BLC Mode	BLC/HLC/DWDR
White Balance	Auto/natural/street lamp/outdoor/manual/regional custom
Gain Control	Auto / Manual
Noise Reduction	3D DNR
Motion Detection	Off / On (4 Zone, Rectangle)
Region of Interest	Off / On (4 Zone)

Smart IR	Support
Starlight	Support
Digital Zoom	16x
Flip	0%90%180%270° (Supports 90%270° with 1080p resolution or lower)
Mirror	Off / On
Privacy Masking	Off / On (4 Area, Rectangle)

## Network

Ethernet	RJ-45 (10/100Base-T)
Protocol	IPv4; IPv6; HTTP; TCP; UDP; ARP; RTP; RTSP; RTCP; SMTP; FTP; DHCP; DNS; DDNS; NTP; Multicast
Interoperability	ONVIF(Profile S); CGI; P2P
Cyber Security	Video encryption; Configuration encryption; Digest; WSSE; Account lockout; Security logs; Generation and importing of X.509 certification; Trusted boot; Trusted upgrade
Streaming Method	Unicast / Multicast
Max. User Access	6 (Total bandwidth: 36 M)
Edge Storage	FTP
Web Viewer	IE, Chrome, Firefox, Safari
Management Software	SmartICRSS, DSS
Smart Phone	IOS, Android

#### Certifications

FCC Part 15, Subpart B Certifications

### Interface

Video Interface	N/A
Audio Interface	Built-in Mic
RS485	N/A
Alarm	N/A

### **Electrical**

Power Supply	DC12V, PoE
Power Consumption	Basic: 1.4W (12 VDC); 2.2 W (PoE) Max. (ICR + H.265+IR intensity): 3.5 W (12 VDC); 4.6W(PoE)

## **Environmental**

Operating Conditions	-40°F to +140°F (-40°C to +60°C)/less than $\leq 95\%$ RH
Storage Conditions	-40°F to +140°F (-40°C to +60°C)
Ingress Protection	IP67

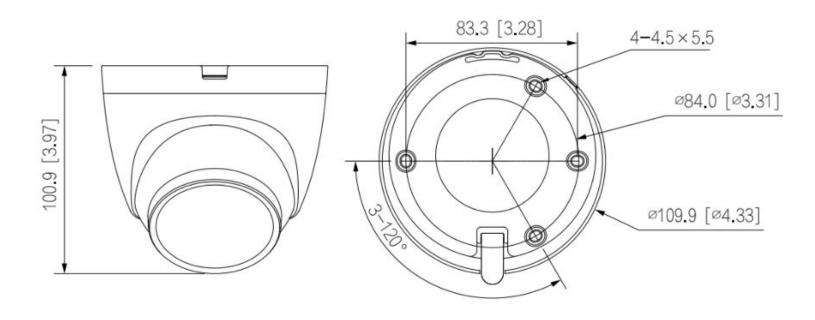
## Construction

Casing	Cover: Plastic Decoration ring: Plastic Base: Plastic
Dimensions	3.4" × 4.3" (85.5 mm × 109 mm)
Net Weight	0.5 lb (0.24 kg)
Gross Weight	0.8 lb (0.37 kg)



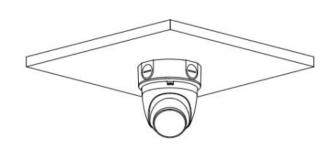


# Dimensions (mm/in)



# Accessories

# MNT-JUNCTIONBOX-3



# MNT-IPMINIDOME-WALL

