

# DH-IPC-HDW2239T-AS-LED-S2

## 2MP Lite Full-color Fixed-focal Eyeball Network Camera



- 2MP, 1/2.8" CMOS image sensor, low illuminance, high image definition
- Outputs max. 2MP (1920 × 1080) @25/30 fps
- H.265 codec, high compression rate, ultra-low bit rate
- Built-in warm lights, max. illumination distance: 30 m
- ROI, SMART H.264+/H.265+, flexible coding, applicable to various bandwidth and storage environments
- Rotation mode, WDR, 3D DNR, HLC, BLC, digital watermarking, applicable to various monitoring scenes
- Intelligent detection: Intrusion, tripwire
- Abnormality detection: Motion detection, video tampering, scene changing, no SD card, SD card full, SD card error, network disconnection, IP conflict, illegal access, voltage detection
- Built-in Mic
- Supports max. 256 GB Micro SD card
- 12V DC/PoE power supply



### Series Overview

With upgraded H.265 encoding technology, Dahua Lite series network camera has efficient video encoding capacity, which saves bandwidth and storage space. This camera adopts the latest full-color technology and displays better color image in the condition of low illumination. It supports SD card storage, dust-proof function, waterproof function and vandal-proof function, complying to the standards of IP67.

### Functions

#### Smart H.265+ & Smart H.264+

With advanced scene-adaptive rate control algorithm, Dahua smart encoding technology realizes the higher encoding efficiency than H.265 and H.264, provides high-quality video, and reduces the cost of storage and transmission.

#### Full-color

With high-performance sensor and large aperture lens, Dahua Full-color technology can display clear colorful image in the environment of ultra-low illuminance. With this photosensitivity technology, the camera can capture more available light, and display more colorful image details.

#### WDR

With advanced Wide Dynamic Range (WDR) technology, Dahua network camera provides clear details in the environment of strong brightness contrast. The bright and dark area can get clear video even in high brightness environment or with backlight shadow.

#### IVS

With advanced video algorithm, Dahua IVS technology supports intelligent functions, such as tripwire and intrusion.

#### Protection (IP67, wide voltage)

IP67: The camera passes a series of strict test on dust and soak. It has dust-proof function, and the enclosure can work normal after soaking in 1 m deep water for 30 minutes.

Wide voltage: The camera allows  $\pm 30\%$  input voltage tolerance (wide voltage range), and it is widely applied to outdoor environment with instable voltage.



### Technical Specification

#### Camera

Image Sensor	1/2.8" 2Megapixel progressive CMOS
Max. Resolution	1920 (H) × 1080 (V)
ROM	128 MB
RAM	128 MB
Scanning System	Progressive
Electronic Shutter Speed	Auto/Manual 1/3 s–1/100,000 s
Minimum Illumination	0.0017 Lux@F1.0
S/N Ratio	> 56 dB
Illumination Distance	30 m (98.4 ft)
Illuminator On/Off Control	Auto/Manual
Illuminator Number	2 (Warm light)
Pan/Tilt/Rotation Range	Pan: 0°–360° Tilt: 0°–78° Rotation: 0°–360°

#### Lens

Lens Type	Fixed-focal				
Mount Type	φ14				
Focal Length	2.8 mm 3.6 mm				
Max. Aperture	2.8 mm: F1.0 3.6 mm: F1.0				
Field of View	2.8 mm: 107° (Horizontal) × 55° (Vertical) × 127° (Diagonal) 3.6 mm: 91° (Horizontal) × 47° (Vertical) × 109° (Diagonal)				
Iris Type	Fixed				
Close Focus Distance	2.8 mm: 0.9 m (3.0 ft) 3.6 mm: 1.3 m (4.3 ft)				
DORI Distance	Lens	Detect	Observe	Recognize	Identify
	2.8mm	38.6m (126.6 ft)	15.4m (50.5 ft)	7.7 m (25.3 ft)	3.9 m (12.8 ft)
	3.6mm	49.7m (163.1 ft)	65.3m (108.6 ft)	32.5m (54.5 ft)	18.0m (27.2 ft)

#### Smart event

General IVS Analytics	Tripwire; intrusion
-----------------------	---------------------

#### Video

Video Compression	H.265; H.264; H.264B; MJPEG (only supported by the sub stream)
Smart Codec	Smart H.265+ / Smart H.264+
Video Frame Rate	Main stream: 1920 × 1080 (1 fps-25/30 fps) Sub stream: 704 × 576 (1 fps-25 fps) 704 × 480 (1 fps-30 fps)
Stream 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)
Bit Rate Control	CBR/VBR
Video Bit Rate	H.264: 32 kbps–6144 kbps H.265: 12 kbps–6144 kbps
Day/Night	Color/B/W
BLC	Yes
HLC	Yes
WDR	120 dB
White Balance	Auto/natural/street lamp/outdoor/manual/regional custom
Gain Control	Auto/Manual
Noise Reduction	3D DNR
Motion Detection	OFF/ON (4 areas, rectangular)
Region of Interest(Roi)	Yes (4 areas)
Smart Illumination	Yes
Image Rotation	0°/90°/180°/270° (Supports 90°/270° with 1080p resolution and lower)
Mirror	Yes
Privacy Masking	4 areas
<b>Audio</b>	
Built-in MIC	Yes
Audio Compression	G.711A; G.711Mu; G.726; AAC
<b>Alarm</b>	
Alarm Event	No SD card; SD card full; SD card error; network disconnection; IP conflict; motion detection; video tampering; tripwire; intrusion; illegal access; voltage detection; audio detection; safety exception
<b>Network</b>	
Network	RJ-45 (10/100 Base-T)
SDK and API	Yes
Protocol	HTTP; TCP; ARP; RTSP; RTP; UDP; RTCP; SMTP; FTP; DHCP; DNS; DDNS; PPPoE; IPv4/v6; QoS; UPnP; NTP; RTMP; Multicast; HTTPS; SFTP; 802.1x; ICMP; IGMP; Bonjour
Interoperability	ONVIF (Profile S/Profile G/Profile T); CGI; P2P; Milestone; Genetec
User/Host	20 (Total bandwidth: 72 M.)
Storage	Dahua Cloud; FTP; Micro SD card (support max. 256 G); NAS; SFTP
Browser	IE Chrome Firefox
Management Software	Smart PSS; DSS; DMSS
Mobile Phone	iOS; Android

## Certification

Certifications	CE-LVD: EN62368-1 CE-EMC: Electromagnetic Compatibility Directive 2014/30/EU FCC: 47 CFR FCC Part 15, Subpart B
----------------	---

## Power

Power Supply	12V DC/PoE (802.3af)
Power Consumption	< 7.1W

## Environment

Operating Conditions	-40°C to +60°C (-40°F to +140°F)/less than ≤ 95% RH
Storage Temperature	-40°C to +60°C (-40°F to +140°F)
Protection Grade	IP67

## Structure

Casing	Inner core: metal; cover: plastic ( pedestal: plastic )
Dimensions	100.9 mm × Φ109.9 mm (4.0" × Φ4.3")
Net Weight	0.365 kg (0.8 lb)
Gross Weight	0.527 kg (1.2 lb)

## Ordering Information

Type	Part Number	Description
2MP Camera	DH-IPC-HDW2239TP-AS-LED-S2	2MP Lite Full-color Fixed-focal Eyeball Network Camera,PAL
	DH-IPC-HDW2239TN-AS-LED-S2	2MP Lite Full-color Fixed-focal Eyeball Network Camera,NTSC
Accessories (optional)	PFA130-E	Junction Box
	PFB203W	Wall Mount
	PFA152-E	Pole Mount
	PFM321D	12V DC 1A Power Adapter
	LR1002-1ET/1EC	Single-port Long Reach Ethernet over Coax Extender
	PFM900-E	Integrated Mount Tester
	PFM114	TLC SD Card

## Accessories

### Optional:



PFA130-E  
Junction Box



PFB203W  
Wall Mount



PFA152-E  
Pole Mount



PFM321D  
12V DC 1A Power Adapter



LR1002-1ET/1EC  
Single-port Long Reach Ethernet over Coax Extender



PFM900-E  
Integrated Mount Tester



PFM114  
TLC SD Card

Junction Box	Junction Box	Pole Mount
PFA130-E	PFB203W	PFA152-E+PFB203W

## Dimensions (mm[inch])

