

DH-IPC-HFW1230DS1-SAW

2MP IR Fixed-focal Wi-Fi Bullet Network Camera



System Overview

With features of simple installation, easy operation, and high performance-cost ratio, Dahua Entry series network camera is applicable to small and medium-sized scenes, such as homes/residences, small-sized retail stores, and other small and medium-sized enterprises.

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.

Motion Detection

When moving objects appear in the monitoring image, Dahua Motion Detection technology triggers alarm or records.

Day/Night

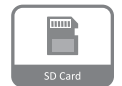
Dahua Day/Night function provides color image when illumination is adequate; when illuminance is inadequate, it switches night mode and provides white and black image. It can guarantee that the network camera can work normally when illuminance changes.

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 $\pm 30\%$ (for some power supplies) input voltage tolerance (wide voltage range), and it is widely applied to outdoor environment with instable voltage.

- 2-MP1/2.8" CMOS image sensor, low luminance, and high definition image.
- Outputs max. 2 MP (1920 × 1080)@25/30 fps.
- H.265 codec, high compression rate, ultra-low bit rate.
- Built-in IR LED.
- SMART H.264 +/-H.265+, flexible coding, applicable to various bandwidth and storage environments.
- DWDR, 3D NR, BLC, digital watermarking, applicable to various monitoring scenes.
- Abnormality detection: Motion detection, video tampering, audio detection, no SD card, SD card full, SD card error, network disconnection, IP conflict, illegal access, SMD (human).
- The antenna offers 2.4G Wi-Fi with a range of 80 m.
- Supports max. 256 G Micro SD card. Built-in MIC.
- 12 VDC power supply.
- IP67 protection.



Cyber Security

Dahua network cameras employ a series of security technologies, including security authentication and authorization, access control protocols, trusted protection, encrypted transmission and encrypted storage. These technologies improve the camera's defense against external cyber threats and prevent malicious programs from compromising the device.

Technical Specification

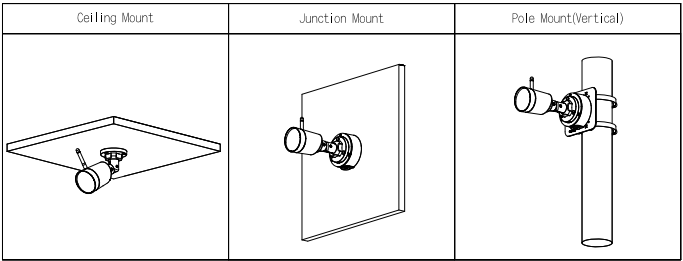
Camera

Image Sensor	1/2.8" CMOS
Max. Resolution	1920 (H) × 1080 (V)
ROM	16 MB
RAM	64 MB
Scanning System	Progressive
Electronic Shutter Speed	Auto/Manual 1/3 s–1/100,000 s
Min. Illumination	0.025 lux@F2.0 (Color, 30 IRE) 0.0025 lux@F2.0 (B/W, 30 IRE) 0 lux (Illuminator on)
S/N Ratio	>56 dB
Illumination Distance	30 m (98.43 ft) (IR LED)
Illuminator On/Off Control	Auto; Manual
Illuminator Number	1 (IR LED)

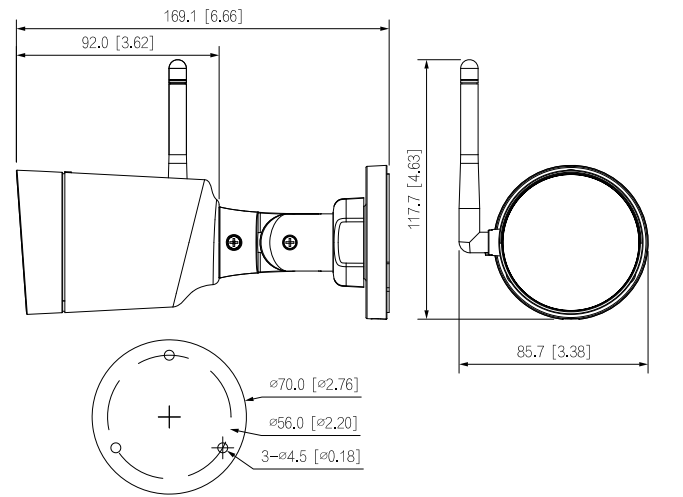
Pan/Tilt/Rotation Range		Pan: 0°–360° Tilt: 0°–90° Rotation: 0°–360°			
Lens					
Lens Type		Fixed-focal			
Lens Mount		M12			
Focal Length		2.8 mm; 3.6 mm			
Max. Aperture		F2.0			
Field of View		2.8 mm: H: 100°; V: 53°; D: 120° 3.6 mm: H: 86°; V: 43°; D: 102°			
Iris Control		Fixed			
Close Focus Distance		2.8 mm: 0.6 m (1.97 ft) 3.6 mm: 1.0 m (3.28 ft)			
DORI Distance	Lens	Detect	Observe	Recognize	Identify
	2.8 mm	46.9 m (153.87 ft)	18.8 m (61.68 ft)	9.4 m (30.84 ft)	4.7 m (15.42 ft)
	3.6 mm	58.8 m (192.91 ft)	23.5 m (77.10 ft)	11.8 m (38.71 ft)	5.9 m (19.36 ft)
Video					
Video Compression		H.264B; H.264; H.264H; H.265			
Smart Codec		Smart H.265+; Smart H.264+			
Video Frame Rate		Main stream: 1920 × 1080 (1–25/30 fps) Sub stream: 640 × 480@(1–25 fps) 640 × 480@(1–30 fps) *The values above are the max. frame rates of each stream; for multiple streams, the values will be subjected to the total encoding capacity.			
Stream Capability		2 streams			
Resolution		1080p (1920 × 1080); 960p (1280 × 960); 720p (1280 × 720)			
Bit Rate Control		CBR/VBR			
Video Bit Rate		H264: 24 kbps–4096 kbps H265: 9 kbps–4096 kbps			
Day/Night		Auto (ICR)/Color/B/W			
BLC		Yes			
WDR		DWDR			
White Balance		Auto; natural; street lamp; outdoor; manual; regional custom			
Gain Control		Auto			
Noise Reduction		3D NR			
Motion Detection		OFF/ON (4 areas, rectangular)			
Region of Interest (RoI)		Yes (4 areas)			
Smart Illumination		Yes			
Image Rotation		0°/180°			
Mirror		Yes			

Audio	
Built-in MIC	Yes
Alarm	
Alarm Event	No SD card; SD card full; SD card error; network disconnection; IP conflict; illegal access; motion detection; video tampering; SMD (human)
Network	
Network Port	RJ-45 (10/100 Base-T)
Wi-Fi	IEEE802.11b/g/n 2.4–2.4835 GHz
Wireless Range	Up to 80 m (The performance varies based on actual environment)
SDK and API	Yes
Cyber Security	Video encryption; Configuration encryption; Digest; WSSE; Account lockout; Security logs; Generation and importing of X.509 certification; HTTPS; Trusted boot; Trusted execution; Trusted upgrade
Network Protocol	IPv4; HTTP; TCP; UDP; ARP; RTP; RTSP; RTCP; DHCP; DNS; NTP; Multicast;RTMP
Interoperability	ONVIF (Profile S/Profile G); CGI; P2P
User/Host	6 (Total bandwidth: 36 M)
Storage	Micro SD card (support max. 256 GB, sold separately)
Browser	IE Chrome Firefox
Management Software	Smart PSS; DSS; DMSS
Mobile Client	iOS; Android
Certification	
Certifications	CE-LVD:EN62368-1; CE-EMC:Electromagnetic Compatibility Directive 2014/30/EU; CE-RED:Radio Equipment Directive 2014/53/EU; FCC:47 CFR FCC Part 15, Subpart B; FCC ID:FCC PART 15C
Power	
Power Supply	12 VDC
Power Consumption	Basic: 1.9 W (12 VDC) Max. (H.265 + IR intensity): 4.2 W (12 VDC)
Environment	
Operating Temperature	–30 °C to +55 °C (–22 °F to +131 °F)
Operating Humidity	≤95%
Storage Temperature	–30 °C to +60 °C (–22 °F to +140 °F)
Protection	IP67
Structure	
Casing	Front cover: Metal Rear: Plastic Bracket: Plastic
Product Dimensions	169.1 mm × 85.7 mm × 117.7 mm (6.66" × 3.37" × 4.63")
Net Weight	240.5 g (0.53 lb)
Gross Weight	362.0 g (0.80 lb)

Ordering Information		
Type	Model	Description
2MP Camera	DH-IPC-HFW1230DS1P-SAW-0280B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	DH-IPC-HFW1230DS1N-SAW-0280B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	DH-IPC-HFW1230DS1P-SAW-0360B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	DH-IPC-HFW1230DS1N-SAW-0360B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	IPC-HFW1230DS1P-SAW-0280B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	IPC-HFW1230DS1P-SAW-0360B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	IPC-HFW1430DS1P-SAW-0280B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
	IPC-HFW1430DS1P-SAW-0360B	2MP IR Fixed-focal Wi-Fi Bullet Network Camera
Accessories (Optional)	PFA134	Junction Box
	PFA152-E	Pole Mount
	NBS05C120050VE	12V DC/0.5A Power Adapter
	PFM900-E	Integrated Mount Tester
	TF-P100	MicroSD Memory Card



Dimensions (mm[inch])



Accessories

Optional:



PFA134
Junction
Box



PFA152-E
Pole
Mount



NBS05C120050VE
12V DC/0.5A
Power Adapter



PFM900-E
Integrated
Mount Tester



TF-P100
MicroSD
Memory Card