

DH-HAC-HFW1800T/T-A

4K Real-time HDCVI IR Bullet Camera



- Max. 4K resolution, real-time video transmission
- CVI/CVBS/AHD/TVI switchable
- Built-in mic (-A)
- Fixed lens (2.8mm; 3.6mm; 6mm optional)
- Max. IR length 30m, Smart IR
- IP67, 12V±30%DC



System Overview

Experience 4K video surveillance with the simplicity of reusing existing coaxial infrastructure. The 4K HDCVI camera adopts a powerful Dahua ISP and advanced 1/2.7" CMOS sensor, which provides superior high quality images. In addition, the camera features broadcastquality audio to provide enhanced supplementary evidence collection. Ultra-high definition and a complete set of features makes the 4K HDCVI camera an ideal choice for mid to large-size businesses and projects where both highly reliable surveillance and construction flexibility are demanded.

Functions

4 Signals over 1 Coaxial Cable

HDCVI technology supports 4 signals to be transmitted over 1 coaxial cable simultaneously, i.e. video, audio*, data and power. Dual-way data transmission allows the HDCVI camera to interact with the HCVR, such as sending control signal or triggering alarm. Moreover, HDCVI technology supports PoC for construction flexibility.

* Audio input is available for some models of HDCVI cameras.

Long Distance Transmission

HDCVI technology guarantees real-time transmission at long distance without any loss. It supports up to 700m transmission for 4K and 4MP HD video via coaxial cable, and up to 300m via UTP cable. *

*Actual results verified by real-scene testing in Dahua's test laboratory.

Simplicity

HDCVI technology inherits the born feature of simplicity from traditional analog surveillance system, making itself a best choice for investment protection. HDCVI system can seamlessly upgrade the traditional analog system without replacing existing coaxial cabling. The plug and play approach enables full HD video surveillance without the hassle of configuring a network.

Broadcast-quality Audio

Audio information is used as supplementary evidence in video surveillance applications. The HDCVI camera supports audio signal transmis-

sion over coaxial cable. In addition, it adopts unique audio processing and transmission technology that best restores source audio and eliminates noise, guaranteeing the quality and effectiveness of collected audio information.

Multiple-formats

The camera supports multiple video formats including HDCVI, CVBS, and other two common HD analog formats in the market. This feature makes the camera compatible with not only XVRs, but also most existing HD/SD DVRs. *

*Use OSD menu to switch HDCVI to other video formats. Use PFM820 UTC Controller to switch CVBS to HDCVI video format.

Protection

The camera's outstanding reliability is unsurpassed due to its rugged design. The camera is protected against water and dust with IP67 ranking, making it suitable for indoor or outdoor environments. Supporting ±30% input voltage tolerance, this camera suits even the most unstable power supply conditions. Its 4KV lightning rating provides protection against the camera and its structure from the effects of lightning.

Smart IR

The camera is designed with microcrystalline LED IR illumination for best lowlight performance. Smart IR is a technology to ensure brightness uniformity in B/W image under low illumination. Dahua's unique Smart IR adjusts to the intensity of camera's infrared LEDs to compensate for the distance of an object, and prevents IR LEDs from overexposing images as the object come closer to the camera.

4K Real-time Image Display

Used together with 4K Real-time XVR, the camera can output 4K real-time video stream with clear details and no lag or smear.

Technical Specification						Noise Reduction	2D NR
Camera						Smart IR	Yes
Image Sensor		1/2.7 inch CMOS				Mirror	Off/On
Effective Pixels		3840 (H)× 2160 (V), 4K				Privacy Masking	Off/On (8 area, rectangle)
Scanning System		Progressive				Certifications	
Electronic Shutter Speed		PAL: 1/25s–1/100000s NTSC: 1/30s–1/100000s				Certifications	CE (EN55032, EN55024, EN50130-4,EN60950-1) FCC (CFR 47 FCC Part 15 subpartB, ANSI C63.4-2014) UL (UL60950-1+CAN/CSA C22.2 No.60950-1)
S/N Ratio		>65dB				Port	
Minimum Illumination		0.03Lux/F2.0, 30IRE, 0Lux IR on				Video Output	Video output choices of CVI/TVI/AHD/CVBS by one BNC port
Fill Light Working Distance		30 m (98.4 ft)				Audio Input	One channel, built-in mic (-A)
IR On/Off Control		Auto; manual				Power	
IR LED Number		1				Power Supply	12V ±30% DC
Pan/Tilt/Rotation Range		Pan: 0°–360° Tilt: 0°–90° Rotation: 0°–360°				Power Consumption	Max 4.3W (12V DC, IR on)
Lens						Environment	
Lens Type		Fixed-focal				Operating Temperature	-40°C to +60°C (-40°F to 140°F);<95% (non-condensation)
Mount Type		M12				Storage Temperature	-40°C to +60°C (-40°F to 140°F);<95% (non-condensation)
Focal Length		2.8mm; 3.6mm;6mm				Protection Grade	IP67
Max. Aperture		F2.0				Structure	
Angle of View		2.8mm: 125° x 105° x 56° (diagonal x horizontal x vertical) 3.6mm: 104° x 87° x 47° (diagonal x horizontal x vertical) 6mm:62.4° x54.7° x31.3°(diagonal x horizontal x vertical)				Casing	Metal throughout the whole casing
Iris Type		Fixed iris				Camera Dimensions	174.5mm×70.6mm×72.3mm (6.87″×2.78″×2.85″)
Close Focus Distance		2.8mm: 1.0 m (3.3 ft) 3.6mm: 1.9 m (6.2 ft) 6mm:3.6m(11.8ft)				Net Weight	0.35Kg (0.77lb)
DORI Distance	Lens	Detect	Observe	Recognize	Identify	Gross Weight	0.45Kg (0.99lb)
	2.8mm	74.7 m (245.1 ft)	29.9 m (98.1 ft)	14.9 m (48.9ft)	7.5 m (24.6 ft)		
	3.6mm	106.7 m (350.1 ft)	42.7 m (140.1 ft)	21.3 m (69.9 ft)	10.7 m (35.1 ft)		
	6mm	160m (524.9 ft)	64 m (210.0ft)	32 m (105.0ft)	16 m (52.5ft)		
Video							
Frame Rate		CVI: 4K@25/30fps; 4K@15fps; 5M@20fps; 4M@25fps/30fps; AHD: 4K@15fps; TVI: 4K@15fps; CVBS: 960H					
Resolution		4K (3840 × 2160); 5M (2592 × 1944); 4M (2560 × 1440); 960H (960 × 576/960 × 480)					
Day/Night		Auto switch by ICR					
BLC		BLC/HLC/WDR					
WDR		DWDR					
White Balance		Auto; manual					
Gain Control		Auto; manual					

Ordering Information

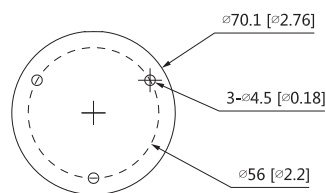
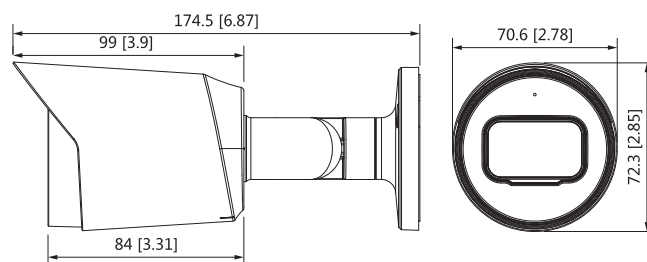
Type	Part Number	Description
4K Camera	DH-HAC-HFW1800TP 2.8mm	4K HDCVI IR Bullet Camera
	DH-HAC-HFW1800TP 3.6mm	
	DH-HAC-HFW1800TP 6mm	
	DH-HAC-HFW1800TN 2.8mm	
	DH-HAC-HFW1800TN 3.6mm	
	DH-HAC-HFW1800TN 6mm	
	DH-HAC-HFW1800TP-A 2.8mm	
	DH-HAC-HFW1800TP-A 3.6mm	
	DH-HAC-HFW1800TP-A 6mm	
	DH-HAC-HFW1800TN-A 2.8mm	
	DH-HAC-HFW1800TN-A 3.6mm	
	DH-HAC-HFW1800TN-A 6mm	
Accessories	PFA134	Water-proof Junction Box
	PFB134+PFA152-E	Water-proof Junction Box+Pole Mount Bracket
	PFM800-4K	Passive Video Balun
	PFM800B-4K	Passive Video Balun
	PFM320D Series	12V 2A Power Adapter
	PFM321D Series	12V 1A Power Adapter
	PFM320D-015	DC12V1.5A Power Adapter



PFM320D-015
DC12V1.5A Power Adapter

Junction Mount	Junction Mount PFA134	Pole Mount PFA134+PFA152-E

Dimensions (mm[inch])



Accessories

Optional:



PFA134
Water-proof Junction Box



PFB134+PFA152-E
Water-proof Junction
Box+Pole Mount Bracket



PFM800-4K
Passive Video Balun



PFM800B-4K
Passive Video Balun



PFM320D Series
12V 2A Power Adapter



PFM321D Series
12V 1A Power Adapter