

# DH-HAC-T1A51-U-IL

5MP Smart Dual Light HDCVI Fixed-focal Eyeball Camera



## Series Overview

The Cooper Series offers simple and highly cost-effective HDCVI solutions. It provides 24/7 reliable monitoring with high-quality image performance, saving cost on both material and labor force. It is also designed and built to the specific standards of Dahua.

## Functions

### Smart Dual Light

With its smart dual light mechanism, the camera automatically turns on the white light when Perimeter Protection/SMD Plus function of AI XVR detects a target in the rule area to capture clear, vivid images. When the target leaves the rule area, the camera automatically switches over from the white light to the IR light to significantly reduce light pollution.

### Easy Installation

HDCVI eyeball comes with a quick-to-install pedestal, which makes it easier to install than conventional eyeballs and reduces cost on time and labor.

### 4 Signals over 1 Coaxial Cable

HDCVI technology supports 4 signals (video, audio\*, data and power) which are simultaneously transmitted over a coaxial cable. Dual-way data transmission allows the HDCVI camera to interact with the XVR to perform various actions such as sending control signals and triggering alarms. HDCVI technology also supports PoC, which makes the camera easy and quick to install.

\* Audio input is available for select HDCVI camera models.

\* The parameters and datasheets below can only be applied to A51-U-IL-S2 series.

\* In order to use the 5MP 16:9 and the Smart Dual Light HDCVI camera, the firmware of XVR must be upgraded to V4.001.0000004.1.R.220323 or later version.

- Max 25 fps@5MP (16:9 video output).
- Smart Dual Light.
- 25 m illumination distance.
- Quick-to-install eyeball saves installation time.
- 3.6 mm fixed lens (2.8 mm optional).
- CVI/CVBS/AHD/TVI switchable.



## Long Distance Transmission

HDCVI technology provides long distance transmission in real time without transmission loss. It supports transmission distances up to 700 m for 2-MP/5-MP/8-MP HD videos through coaxial cables, and up to 300 m through UTP cables. The results were obtained and verified through rigorous testing in Dahua's test laboratory.

## Simplicity

HDCVI technology inherits the simplicity of traditional analog surveillance systems, making it a great mechanism for protecting your valuables. HDCVI can be upgraded from the traditional analog system without replacing the existing coaxial cabling. Its plug and play design enables it to produce high-definition videos during surveillance without the hassle of configuring a network.

## Multiple Formats

The camera supports videos in HDCVI, CVBS, TVI and AHD formats. The DIP switch on the cable allows you to quickly change formats through simple installation and debugging procedures. This feature makes the camera compatible with both XVRs and HD/SD XVRs.

\* The DIP Switch is available for select HDCVI camera models.

Technical Specification						White Balance		Auto;Area white balance	
Camera						Gain Control		Auto	
Image Sensor		5 MP CMOS				Noise Reduction		2D NR	
Max. Resolution		2880 (H) × 1620 (V)				Illumination Mode		Smart IR&WL; WL Mode; IR Mode	
Scanning System		Progressive				Mirror		Yes	
Electronic Shutter Speed		PAL: 1/25 s–1/100,000 s; NTSC: 1/30 s–1/100,000 s				Privacy Masking		Off/On (8 areas, rectangle)	
Min. Illumination		0.02 lux@F2.0 (Color, 30 IRE) 0.002 lux@F2.0 (B/W, 30 IRE) 0 lux (Illuminator on)				Certification			
S/N Ratio		>65 dB				Certifications		CE-LVD: EN 62368-1; CE-EMC: EN 55032; EN 55035	
Illumination Distance		IR: 25 m (82.02 ft); Warm Light: 20 m (65.62 ft)				Port			
Illuminator On/Off Control		Auto/Manual				Video Output			
Illuminator Number		2 (Warm light);2 (IR light)				Video output choices of CVI/TVI/AHD/CVBS by one BNC port			
Angle Adjustment		Pan: 0°–360° Tilt: 0°–78° Rotation: 0°–360°				Power			
						Power Supply		12 VDC ± 30%	
						Power Consumption		Max 2.6 W (12V DC, WLED on)	
Lens						Environment			
Lens Type		Fixed-focal				Operating Temperature		–40 °C to +55 °C (–40 °F to +131 °F)	
Auto Focus		No				Operating Humidity		<95% (RH), non-condensing	
Lens Mount		M12				Storage Temperature		–40 °C to +55 °C (–40 °F to +131 °F)	
Focal Length		2.8 mm;3.6 mm				Storage Humidity		<95% (RH), non-condensing	
Max. Aperture		F2.0				Anti-corrosion Level		Basic Protection	
Field of View		2.8 mm: H: 106°; V: 56°; D: 125° 3.6 mm: H: 92°; V: 48°; D: 109°				Structure			
Iris Control		Fixed				Casing Material		Plastic	
Close Focus Distance		2.8 mm: 1.0 m (3.28 ft) 3.6 mm: 1.3 m (4.27 ft)				Product Dimensions		Φ85.0 mm × 77.1 mm (Φ3.35" × 3.04")	
DORI Distance	Lens	Detect	Observe	Recognize	Identify	Net Weight		0.11 kg (0.24 lb)	
	2.8 mm	66.0 m (216.54 ft)	26.4 m (86.61 ft)	13.2 m (43.31 ft)	6.6 m (21.65 ft)	Gross Weight		0.12 kg (0.26 lb)	
	3.6 mm	76.0 m (249.34 ft)	30.4 m (99.74 ft)	15.2 m (49.87 ft)	7.6 m (24.93 ft)	Installation		Wall mount; ceiling mount;	
Video									
Video Frame Rate		CVI: PAL: 5M@25 fps; 4M@25 fps; 1080p@25 fps; NTSC: 5M@25 fps; 4M@30 fps; 1080p@30 fps AHD: PAL: 4M@25 fps; NTSC: 4M@30 fps TVI: PAL: 4M@25 fps; NTSC: 4M@30 fps CVBS: PAL: 960H; NTSC: 960H							
Resolution		5M (2880 × 1620); 4M (2560 × 1440); 1080p (1920 × 1080); 960H (960 × 576/960 × 480)							
Day/Night		Auto(ICR)/Color/B/W							
BLC		BLC; HLC; DWDR;							
WDR		DWDR							