

DH-SD6AL245U-HNI-IR

2MP 45x Starlight IR PTZ Network Camera



- · 1/2.8" 2Megapixel STARVIS™ CMOS
- · Powerful 45x optical zoom
- · Max. 50/60fps@1080P
- · Auto tracking and IVS
- · Support Hi-PoE
- · IR distance up to 300m
- · IP67













System Overview

Featuring powerful optical zoom and accurate pan/tilt/zoom performance, this camera provides an all-in-one solution for capturing long distance video surveillance for outdoor applications. Together with infrared illumination and Starlight Technology, the camera is the perfect solution for dark, lowlight applications. The series combines a day/night mechanical IR cut filter for the highest image quality in variable lighting conditions during the day, and True WDR for applications with direct sunlight or glare.

Functions

Starlight Technology

For challenging low-light applications, Dahua's Starlight Ultra-low Light Technology offers best-in-class light sensitivity, capturing color details in low light down to 0.005 lux. The camera uses a set of optical features to balance light throughout the scene, resulting in clear images in dark environments.

Wide Dynamic Range

The camera achieves vivid images, even in the most intense contrast lighting conditions, using industry-leading wide dynamic range (WDR) technology. For applications with both bright and low lighting conditions that change quickly, True WDR (120 dB) optimizes both the bright and dark areas of a scene at the same time to provide usable video.

Auto-tracking

This feature controls the pan/tilt/zoom actions of the camera to automatically track an object in motion and to keep it in the scene. The tracking action can be triggered manually or automatically by defined rules. Once a rule is triggered, the camera can zoom in and track the defined target automatically.

Smart H.265+

Smart H.265+ is the optimized implementation of the H.265 codec that uses a scene-adaptive encoding strategy, dynamic GOP, dynamic ROI, flexible multi-frame reference structure and intelligent noise reduction to deliver high-quality video without straining the network. Smart H.265+ technology reduces bit rate and storage requirements by up to 70% when compared to standard H.265 video compression.

PFA Technology

PFA technology has innovatively introduced new methods of judgment to ensure the accuracy and predictability of the direction of subject distance adjustment. The result is a set of advanced focusing algorithms. PFA ensures clarity of the image throughout the process of zooming and shortens focus time. The realization of PFA technology substantially improves user experience and increases product value.

Environmental

Dahua cameras operate in extreme temperature environments, rated for use in temperatures from -40 °C to +60 °C (-40 °F to +140 °F) with 95% humidity. Subjected to rigorous dust and water immersion tests and certified to the IP67 Ingress Protection rating makes it suitable for demanding outdoor applications.

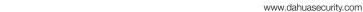
Protection

The camera allows for ±25% input voltage tolerance, suitable for the most unstable conditions for outdoor applications. Its 8KV lightning rating provides effective protection for both the camera and its structure against lightning.

Interoperability

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





Technical Specification				Auto Tracking	Support
Camera				IVS	Tripwire, Intrusion, Abandoned/Missing
Image Sensor	nage Sensor 1/2.8" STARVIS™ CMOS		Advanced Intelligent Functions	Face Detection, Heat Map	
Effective Pixels 1920(H) x 1080(V), 2 Megapixels		rels	Video		
RAM/ROM 1		1024M/128M		Compression	H.265+/H.265/H.264+/H.264
Scanning System Progressive		rogressive		Streaming Capability	3 Streams
Electronic Shutter Speed 1/		1/1s~1/30,000s		Resolution	1080P(1920×1080)/1.3M(1280×960)/720P(1280×720)/D1(704×576/704×480)/CIF(352×288/352×240)
Minimum Illumination Color: 0.005Lux@F1.6; 0Lux@F1.6 (IR on)		olor: 0.005Lux@F1.6; B/W: (.ux@F1.6 (IR on)	0.0005Lux@F1.6;		Main stream: 1080P/1.3M/720P(1~50/60fps)
S/N Ratio		More than 56dB		Frame Rate	Sub stream1: D1/CIF(1 ~ 25/30fps)
IR Distance	Dis	Distance up to 300m (984ft)		Traine Nate	Sub stream2: 1080P/1.3M/720P/D1/CIF
IR On/Off Control	Au	Auto/Manual			(1~25/30fps)
IR LEDs	1			Bit Rate Control	CBR/VBR
Wiper	Su	upport		Bit Rate	H.265/H.264: 448K ~ 8192Kbps
Lens				Day/Night	Auto(ICR) / Color / B/W
		3.95mm~177.7mm		Backlight Compensation	BLC / HLC / WDR(120dB)
-		1.6~ F4.95		White Balance	Auto, ATW, Indoor, Outdoor, Manual
Angle of View		H: 70.3° ~ 1.8°		Gain Control	Auto / Manual
		45x		Noise Reduction	Ultra DNR (2D/3D)
Focus Control		Auto/Manual		Motion Detection	Support
Close Focus Distance		100mm~ 1000mm		Region of Interest	Support
DORI Distance	. 10	100mm 1000mm		Electronic Image Stabilization (EIS)	Support
		proximity" of distance which		Defog	Support
sensor specification	and lab test result	ds. The DORI distance is calc according to EN 62676-4 w and Identify respectively.		Digital Zoom	16x
Detect Observe		Recognize	Identify	Flip	180°
2345m(7694ft)	938m(3077ft)	469m(1539ft)	234m(768ft)	Privacy Masking	Up to 24 areas
PTZ				Audio	
Pan/Tilt Range	Pa	an: 0° ~ 360° endless; Tilt: -2	0° ~ 90°,auto flip 180°	Compression	G.711a/G.711Mu/AAC/G.722/G.726/G.729/ MPEG2-L2
Manual Control Spe	ed Pa	Pan: 0.1° ~200° /s; Tilt: 0.1° ~120° /s		Network	
Preset Speed		Pan: 240° /s; Tilt: 200° /s		Ethernet	RJ-45 (10Base-T/100Base-TX)
Presets		300		Protocol	IPv4/IPv6, HTTP, HTTPS, SSL, TCP/IP, UDP, UPnP, ICMP, IGMP, SNMP, RTSP, RTP, SMTP, NTP, DHCP,
PTZ Mode		5 Pattern, 8 Tour, Auto Pan ,Auto Scan			DNS,PPPOE,DDNS,FTP, IP Filter,QoS,Bonjour,802.1x
Speed Setup		Human-oriented focal Length/ speed adaptation		Interoperability	ONVIF Profile S&G, API
Power up Action		Auto restore to previous PTZ and lens status after power failure		Streaming Method	Unicast / Multicast
Idle Motion		Activate Preset/ Scan/ Tour/ Pattern if there is no command in the specified period		Max. User Access	20 users
Protocol		DH-SD, Pelco-P/D (Auto recognition)		Edge Storage	NAS (Network Attached Storage), Local PC for instant recording, Micro SD card 256GB
Intelligence				Web Viewer	IE, Chrome, Firefox, Safari
Event Trigger		Motion detection, Video tampering, Scene		Management Software	Smart PSS, DSS, DMSS
Event Trigger changing, Network disconnection, IP address conflict, Illegal Access, Storage anomaly		Smart Phone	IOS, Android		



Certifications

Certifications	E: EN55032/EN55024/EN50130-4 CC: Part15 subpartB,ANSI C63.4- 2014
Interface	

Video Interface	1 port(BNC, 1.0V[p-p], 75 Ω)
RS485	1,
Audio I/O	1/1
Alarm I/O	7/2

Electrical

Power Supply	AC24V/3A(±25%), Hi-PoE
Power Consumption	24W, 38W (IR on)

Environmental

Operating Conditions	-40°C ~ 60°C (-40°F ~ +140°F) / Less than 95% RH
Ingress Protection	IP67
Vandal Resistance	N/A

Construction

Casing	Metal
Dimensions	Ф240(mm) x 357(mm)
Net Weight	6.75kg(14.88lb)
Gross Weight	10.5kg(23.15lb)

Ordering Information			
Туре	Part Number	Description	
	DH-SD6AL245U-HNI-IR	2MP 45x Starlight IR PTZ Network Camera, WDR, PAL	
2MP PT7	DH-SD6AL245UN-HNI-IR	2MP 45x Starlight IR PTZ Network Camera, WDR, NTSC	
Camera	SD6AL245U-HNI-IR	2MP 45x Starlight IR PTZ Network Camera, WDR, PAL	
	SD6AL245UN-HNI-IR	2MP 45x Starlight IR PTZ Network Camera, WDR, NTSC	
	PFB303W	Wall Mount	
	PFA111	Mount Adapter	
	AC24V/3A	Power Adapter	
	PFA140	Power Box	
Accessories	PFB300C	Ceiling Mount	
	PFA120	Junction Box	
	PFA150	Pole Mount	
	PFA151	Corner Mount	
	PFB303S	Parapet Mount	

Accessories

Included:



PFB303W Wall Mount



PFA111 Mount Adapter



AC24V/3A Power Adapter

Optional:



PFA140 Power Box



PFB300C Ceiling Mount



PFA120 Junction Box



PFA150 Pole Mount



PFA151 Corner Mount



PFB303S Parapet Mount

Ceiling Mount	Junction Mount
PFA111 + PFB300C	PFA111 + PFB303W + PFA120
Power Box Mount	Pole Mount
PFA111 + PFB303W + PFA140	PFA111 + PFB303W + PFA150
Corner Mount	Parapet Mount
PFA111 + PFB303W + PFA151	PFA111+ PFB303S



Dimensions (mm)

