dahua TECHNOLOGY

DH-IPC-HDBW3241E-Z5

2MP IR Starlight Dome Network Camera

· 1/2.8" 2Megapixel progressive scan STARVIS™ CMOS
· H.265&H.264 triple-stream encoding
· 25/30fps@1080P(1920×1080)
· WDR(120dB), Day/Night(ICR), 3DNR,AWB,AGC,BLC
· Multiple network monitoring: Web viewer, CMS(DSS/PSS) & DMSS
· 7mm ~35mm motorized lens
· Max. IR LEDs Length 100m
· Micro SD memory,IP67,IK10,PoE+

2Mp H.265+ IVS Starlight WDR

Smart Codec is the optimized implementation of standard video compression (H.265 & H.264) 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 Codec technology reduces bit rate and storage requirements by up to 70% when compared to the standard video compression.

Dahua AI series products adopt the most advanced AI technologies, including deep learning algorithms that primarily target people and vehicles, which provides higher flexibility and accuracy for end-users. This enables the Dahua AI series to offer various advanced applications such as Face Recognition, ANPR, Metadata, People Counting, traffic data statistics, etc.The complete lineup of Dahua AI includes network (PTZ) cameras, network video recorders, servers, and platform management products. Beyond seeing the world, the power of AI allows devices to perceive the environment and understand the world in a better way.

System Overview

Powered by deep-learning Artificial Intelligence algorithms, Dahua's DeepIVS significantly reduces false alarms and decreases pixel count requirements for object detection. DeepIVS features custom tripwires based on object type for automation in limited access areas such as pedestrian or vehicle-only zones. This combination of advanced AI analytics and real-time alerts to a desktop or to a mobile client reduces system requirements and resources resulting in greater surveillance system efficiency.

Functions

Starlight Technology

Featuring Dahua's Starlight Technology, this camera is ideal for applications with challenging lighting conditions. Its low-light performance delivers usable video with minimal ambient light. Even in extreme low-light conditions, Starlight Technology is capable of delivering color images in near complete darkness (0.005 lux).

Wide dynamic range (WDR)

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

Smart Codec (H.265+ & H.264+)

Onvif ✕ **PSIA**

Technical Specification

Camera

Image Sensor	1/2.8" 2Megapixel progressive scan CMOS
Effective Pixels	1920(H)x1080(V)
RAM/ROM	1024MB/128MB
Scanning System	Progressive
Electronic Shutter Speed	Auto/Manual, 1/3~1/100000s
Minimum Illumination	0.005Lux/F1.4 (Color,1/3s,30IRE) 0.05Lux/F1.4 (Color,1/30s,30IRE) 0Lux/F1.4(IR on)
S/N Ratio	More than 50dB
IR Distance	Distance up to 100m(328ft)
IR On/Off Control	Auto/ Manual
IR LEDs	3

Lens

Lens Type	Motorized
Mount Type	Board-in
Focal Length	7mm~35mm
Max. Aperture	F1.4
Angle of View	H:36 ˚~ 13 ˚ , V:20 ˚ ~7 ˚
Optical Zoom	5x
Focus Control	Motorized
Close Focus Distance	1.5m(4.9ft)

DORI Distance	Lens	Detect	Observe	Recognize	Identify
	W	131m(429ft)	52m(170ft)	26m(85ft)	13m(42ft)
	T	428m(1404ft)	171m(561ft)	86m(282ft)	43m(141ft)

Pan/Tilt/Rotation

Pan/Tilt/Rotation Range	Pan:0˚~355˚; Tilt:0˚~65˚; Rotation:0˚~355˚

Artificial Intelligence

Deep IVS	Tripwire, Intrusion(Human&Vehicle classification)

Video

Compression	H.265/H.264/H.264B/H.264H/MJPEG(Sub Stream)
Smart Codec	Support H.265+/H.264+
Streaming Capability	3 Streams
Resolution	1080P(1920×1080)/ 1.3M(1280x960)/ 720P(1280x720)/ D1(704×576/704x480) / VGA(640x480)/ CIF(352×288/342x240)
Frame Rate	Main Stream: 1080P(1~25/30fps) Sub Stream: D1 (1 ~ 25/30fps) Third Stream: 1080P(1~25/30fps)
Bit Rate Control	CBR/VBR
Bit Rate	H.264: 32~ 8192Kbps H.265: 16~ 6144Kbps

Day/Night

Day/Night	Auto(ICR) / Color / B/W
BLC Mode	BLC / HLC / WDR(120dB)
White Balance	Auto/Manual
Gain Control	Auto/Manual
Noise Reduction	3D DNR
Motion Detetion	Off / On (4 Zone, Rectangle)
Region of Interest	Off / On (4 Zone)
Electronic Image Stabilization(EIS)	NA
Smart IR	Support
Defog	N/A
Digital Zoom	16x
Flip	0°/90°/180°/270°
Mirror	Off / On
Privacy Masking	Off / On (4 Area, Rectangle)

Audio

Compression	G.711a/G.711Mu/AAC/ G.726

Network

Ethernet	RJ-45 (10/100/1000Base-T)
Protocol	HTTP;HTTPs;TCP;ARP;RTSP;RTP;UDP;RTCP;SMTP;FTP;DHCP;DNS;DDNS;PPPOE;IPv4/v6;QoS;UPnP;NTP;Bonjour;IEEE 802.1x;Multicast;ICMP;IGMP;SNMP;TLS
Interoperability	ONVIF Profile S&G, API
Streaming Method	Unicast / Multicast
Max. User Access	10 Users/20 Users
Edge Storage	NAS Local PC for instant recording Mirco SD card 128GB
Web Viewer	IE, Chrome, Firefox, Safari
Management Software	Smart PSS, DSS, DMSS
Smart Phone	IOS, Android

Certifications

Certifications	CE (EN 60950:2000) UL:UL60950-1 FCC: FCC Part 15 Subpart B

Interface

Video Interface	1 Port(For adjustment only)
Audio Interface	1/1 channel In/Out
RS485	N/A
Alarm	1 channel In: 5mA 5VDC 1 channel Out: 300mA 12VDC

Electrical

Power Supply	DC12V(±25%),AC24V(±30%), PoE+ (802.3at)
Power Consumption	DC 12V: 6.9W 14.4W(IR on) AC 24V: 6.9W 13.5W(IR on) PoE: 6.4W 13.2W(IR on)

Environmental

Operating Conditions	-30° C ~ +60° C (-22° F ~ +140° F) / Less than 95% RH
Strorage Conditions	-30° C ~ +60° C (-22° F ~ +140° F) / Less than 95% RH
Ingress Protection	IP67
Vandal Resistance	IK10

Construction

Casing	Metal
Dimensions	Φ159.1mm×117.9mm(Φ6.26"×4.64")
Net Weight	0.93kg(2.05lb)
Gross Weight	1.16 kg(2.56lb)

Ordering Information

Type	Part Number	Description
2MP camera	DH-IPC-HDBW3241EP-Z-0735	2MP IR Starlight Dome Network Camera,PAL
	DH-IPC-HDBW3241EN-Z-0735	2MP IR Starlight Dome Network Camera,NTSC
	IPC-HDBW3241EP-Z-0735	2MP IR Starlight Dome Network Camera,PAL
	IPC-HDBW3241EN-Z-0735	2MP IR Starlight Dome Network Camera,NTSC
Accessories (included)	PFA138	Junction Box
Accessories (optional)	PFB302S	Wall mount
	PFB201C	In-ceiling mount
	PFB300C	Ceiling mount
	PFA152-E	Pole mount
	PFA101	Mount adapter

Accessories

Optional:

PFA138
Junction box

PFB210W
Wall mount

PFA152-E
Pole mount

PFA101
Mount adapter

PFB300C
Ceiling mount

PFB201C
In-ceiling mount

In-ceiling Mount	Junction Mount	Pole Mount
PFB201C	PFA138	PFB210W+PFA152-E

Ceiling Mount	Wall Mount	
PFA101+PFB300C	PFB210W (Indoor)	PFB210W (Outdoor)

Dimensions (mm/inch)

117.9 [4.64"]

⌀140.0 [⌀5.51"]

3-⌀4.7 [⌀0.19"]