

CTX8C-IP-AD-TUR-S2FW

4K AI DUAL ILLUMINATION ACTIVE DETERRENT TURRET CAMERA



Functions

Siren and Light Active Deterrence

This siren and light active deterrence network camera supports light alarms and voice alarms when perimeter events occur. The camera has multiple built-in voices for selection, and supports customised voice import.

Smart Dual Illuminators

Smart Dual Illuminators adopt smart algorithms to detect targets. Usually, the IR illuminator is on at night; when the target appears in the monitoring area, the warm light will be on, and the camera will record full-colour video and information of key events. The camera links snapshots and videos with full-colour images. When the target is out of the monitoring area, the warm light turns off and the IR illuminator remains on, which reduces light pollution efficiently.

SMD

With intelligent algorithms, Smart Motion Detection technology can categorise targets that trigger motion detection and filter the motion detection alarms triggered by non-concerned targets.

- 8 MP 1/2.8" CMOS image sensor, low luminance, and high definition image.
- Outputs max. 8 MP (3840 × 2160)@25/30 fps.
- H.265 codec, high compression rate, ultra-low bit rate.
- Built-in warm light and IR LED; the max. IR illumination distance is 30 m and warm light distance is 30 m.
- ROI, SMART H.264+/H.265+, AI H.264/H.265, flexible coding, applicable to various bandwidth and storage environments.
- Rotation mode, WDR, 3D NR, HLC, BLC, digital watermarking, applicable to various monitoring scenes.
- Intelligent monitoring: Intrusion, tripwire (the two function support the classification and accurate detection of vehicle and human).
- Abnormality detection: Motion detection, privacy masking, scene changing, audio detection, no SD card, SD card full, SD card error, network disconnection, IP conflict, illegal access, and voltage detection.
- Alarm: 1 in, 1 out; audio: 1 in, 1 out; supports max. 256 G Micro SD card; built-in dual MICs; 1-ch speaker.
- 12 VDC/PoE power supply.
- IP67 protection.
- Sound and light alarm (red and blue lights).
- SMD 3.0.
- One press arming/disarming through alarm input.



One-tap Disarming

One-tap Disarming is convenient and easy for operation. Customers are able to close and recover event linkage on their phone.

Cyber Security

These cameras employ a series of security technologies, including security authentication and authorisation, 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.

Protection (IP67, wide voltage)

IP67: The camera passes a series of strict tests on dust and soaking. It is dust-proof, and the enclosure works as normal after soaking in 1m deep water for 30 minutes.

Wide voltage: The camera allows $\pm 30\%$ input voltage tolerance (wide voltage range), and it is widely applied to outdoor environment with unstable voltage.

Technical Specification

Camera

Image Sensor	1/2.8" CMOS
Max. Resolution	3840 (H) × 2160 (V)
ROM	128 MB
RAM	512 MB
Scanning System	Progressive
Electronic Shutter Speed	Auto/Manual 1/3 s–1/100,000 s
Min. Illumination	0.004 lux@F1.0 (Color, 30 IRE) 0.0004 lux@F1.0 (B/W, 30 IRE) 0 lux (illuminator on)
S/N Ratio	> 56 dB
Illumination Distance	30 m (98.43 ft) (IR) 30 m (98.43 ft) (warm light)
Illuminator On/Off Control	Auto; manual
Illuminator Number	1 (IR LED) 1 (warm light)
Pan/Tilt/Rotation Range	Pan: 0°–360° Tilt: 0°–78° Rotation: 0°–360°

Lens

Lens Type	Fixed-focal				
Mount Type	M12				
Focal Length	2.8 mm; 3.6 mm				
Field of View	2.8 mm: Horizontal: 106°× Vertical: 55°× Diagonal: 125°				
Iris Type	Fixed				
Close Focus Distance	2.8 mm: 2.0 m (6.56 ft)				
DORI Distance	Lens	Detect	Observe	Recognize	Identify
	2.8 mm	91.0 m (298.56 ft)	36.4 m (119.42 ft)	18.2 m (59.71 ft)	9.1 m (29.86 ft)

Professional, intelligent

IVS (Perimeter Protection)	Tripwire; intrusion (Support the classification and accurate detection of vehicle and human)
SMD 3.0	Less false alarm, longer detection distance
Intelligent Search	Works together with Smart NVR to perform refined intelligent search, event extraction and merging to event videos.

Video

Video Compression	H.265; H.264; H.264H; H.264B; MJPEG (Only supported by the sub stream)
Smart Codec	Smart H.265+; Smart H.264+
AI Coding	AI H.265; AI H.264

Video Frame Rate	Main stream: 3840 × 2160@(1 fps–30 fps) Sub stream: 704 × 576@(1 fps–25 fps)/704 × 480@ (1 fps–30 fps) Third stream: 1920 × 1080@(1 fps–30 fps)
Stream Capability	3 streams
Resolution	8M (3840 × 2160); 6M (3072 × 2048); 5M (3072 × 1728/2592 × 1944); 4M (2688 × 1520); 3M (2048 × 1536/2304 × 1296); 1080p (1920 × 1080); 1.3M (1280 × 960); 720p (1280 × 720); D1 (704 × 576/704 × 480); VGA (640 × 480); CIF (352 × 288/352 × 240)
Bit Rate Control	CBR/VBR
Video Bit Rate	H.264: 3 kbps–20480 kbps H.265: 3 kbps–20480 kbps
Day/Night	Auto (ICR)/Colour/B/W
BLC	Yes
HLC	Yes
WDR	120 dB
Scene Self-adaptation	Yes
White Balance	Auto; natural; street lamp; outdoor; manual; regional custom
Gain Control	Auto; manual
Noise Reduction	3D NR
Motion Detection	OFF/ON (4 areas)
Region of Interest (RoI)	Yes (4 areas)
Smart Illumination	Yes
Defog	Yes
Image Rotation	0°/90°/180°/270° (Supports 90°/270° with 2688 × 1520 resolution and lower)
Mirror	Yes
Privacy Masking	8 areas

Audio

Built-in MIC	Yes
Audio Compression	PCM; G.711a; G.711Mu; G.726; G.723

Alarm

Alarm Event	No SD card; SD card full; SD card error; network disconnection; IP conflict; illegal access; motion detection; video tampering; tripwire; intrusion; scene changing; audio detection; voltage detection; external alarm; SMD; security exception
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Network

Network	RJ-45 (10/100 Base-T)
SDK and API	Yes
Cyber Security	Video encryption; firmware encryption; configuration encryption; Digest; WSSE; account lockout; security logs; IP/MAC filtering; generation and importing of X.509 certification; syslog; HTTPS; 802.1x; trusted boot; trusted execution; trusted upgrade

Protocol	IPv4; IPv6; HTTP; TCP; UDP; ARP; RTP ; RTSP; RTCP; RTMP; SMTP; FTP; SFTP; DHCP; DNS; DDNS; QoS; UPnP; NTP; Multicast; ICMP; IGMP; NFS; SAMBA; PPPoE; SNMP
Interoperability	ONVIF (Profile S/Profile G/Profile T); CGI; P2P; Milestone
User/Host	20 (Total bandwidth: 72 M)
Storage	FTP; SFTP; Micro SD card (Support max. 256 G); NAS
Browser	IE: IE8/9/11 Chrome Firefox
Management Software	Smart PSS; DSS; DMSS
Mobile Phone	iOS; Android

Certification

Certification	CE-LVD: EN 62368-1; CE-EMC: Electromagnetic Compatibility Directive 2014/30/EU; FCC: 47 CFR FCC Part 15, Subpart B; UL/CUL:UL62368-1 & CAN/CSA C22.2 No. 62368-1-14
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Port

Audio Input	1 channel (RCA port)
Audio Output	1 channel (RCA port)
Alarm Input	1 channel in: 5 mA 3V–5 VDC
Alarm Output	1 channel out: 300 mA 12 VDC

Power

Power Supply	12 VDC/PoE (802.3af)
Power Consumption	Basic: 2.9 W (12 VDC); 5.0 W (PoE) Max. (H.265+main stream/IR intensity+warm light on): 7.8 W (12 VDC) 9.6 W (PoE)

Environment

Operating Conditions	−40 °C to +60 °C (−40 °F to +140 °F)/Less than 95% RH
Storage Conditions	−40 °C to +60 °C (−40 °F to +140 °F)
Protection Grade	IP67

Structure

Casing	Metal
Dimensions	110.9 mm × Φ122.0 mm (4.4" × Φ4.8")
Net Weight	745 g (163.1 lb)
Gross Weight	915 g (200.6 lb)

Dimensions (mm[inch])

