CMIP796TD-7
Thermal Bullet Camera

Key Features

The Thermal Series cameras are able to capture imaging for the application of fire-prevention purposes and perimeter defense. CMIP796TD Series offers high resolution thermal imager, AGC DDE, PoE, EIS, 3D DNR, NETD less than 40mk etc., to meet a wide variety of applications.

- VOUFPA Sensor (Vanadium Oxide Uncooled Focal Plane Arrays)
- 640 × 512 @ 50fps
- 17 μm Pixel interval
- Fixed Lens options*
- 2.42 mrad
- IP66
- F 1.0
- 8μm to 14μm Waveband
- Dynamic fire point detection,

CMIP788X42
8MP 4K 42X Network PTZ Camera

Key Features

8MP 42X Network Speed Dome adopts 1/1.2" progressive scan CMOS chip. Providing detailed rich vivid colour in 4K resolution combined with 500m IR to see extremely long distances at night. This PTZ camera can be widely used in areas such as large venues, airports, railways, forests, ports, parks, commercial property, etc

- 1/1.2" progressive scan CMOS
- 3840 x 2160 @ 25fps resolution
- 120db WDR
- 42X Optical Zoom,
- Up to 500m IR
- IK10, IP67
- 24VAC & Hi-POE
- Min. illumination:
- Color: 0.002 Lux @(F1.6, AGC ON)
- B/W: 0.0002 Lux @(F1.6, AGC ON)
- Deep-learning-based target classification algorithm for auto-tracking 2.0 and perimeter protection

Function Description

Fire Detection
- Dynamic fire point detection, up to 10 fire points detectable.
- Temerature range -20 °C to 150 °C (-4 °F to 302 °F)
- Temperature accuracy ±8 °C (14.4 °F)

Smart
- 4 VCA rule types (Line Crossing, Intrusion, Region Entrance, and Region Exiting), up to 8 VCA rules.
- 3 temperature measurement rule types, 21 rules (10 points, 10 regions, and 1 line).

Image
- 640× 512@50fps
- Fixed Lens Optional
- Support H.265+/H.265/H.264/H.264+/MJPEG video compression, multi-level video quality configuration; support Baseline Profile/Main Profile/High Profile encoding complexity.
- Multiple OSD color: Black & white self-adaptive; Custom
- AGC,DDE, 3D DNR

System
- Support ONVIF (profile S/profile G), ISAPI protocol
- Support three streams, and support 20 channels live view at the same time
- Lightning protection, surge protection, voltage transient protection, anti-static protection

Interface
- Support standard 128 G microSD/SDHC/SDXC card storage
- Support 10M/100M Ethernet port
- Support Audio I/O
- Support Alarm I/
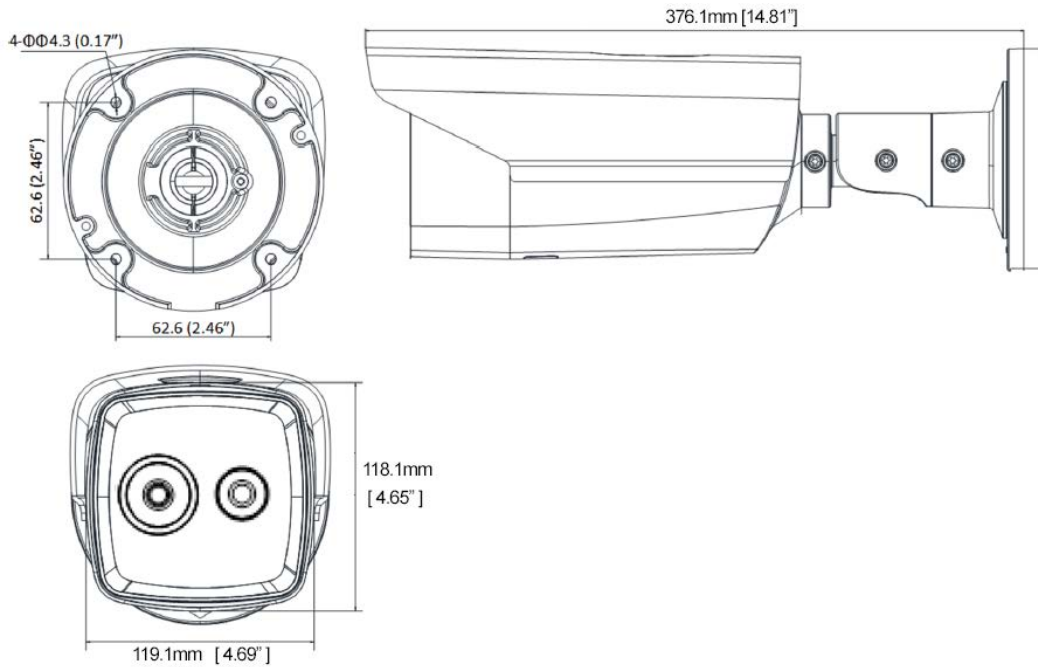- Support CVBS analog output

Security
- Support three-level user authentication management, user and password authorization, and IP address filtering
- Support security certificate as HTTPS
- Lock user IP after certain times failed login attempts

Specifications

Camera	
Image Sensor	Vanadium Oxide Uncooled Focal Plane Arrays
Apeture	F 1.0
Pixel Interval	17 μm
Lens	**7mm,**15mm,25mm,35mm
Response Waveband	8 μm to 14 μm
NETD	less than 40mk (@25°C,F#=1.0)
MRAD	2.42 mrad
Field of view	8.5° × 73.2° (H × V)

Compression Standard	
Video Compression	Main stream: H.265/H.264 /MPEG4 Sub stream: H.264/MPEG4/MJPEG Third stream: H.264/MPEG4/MJPEG
H.264 Type	Baseline Profile/Main Profile/High Profile
H.265+	Support
Video Bit Rate	32 Kbps to 16 Mbps
Audio Compression	G .711u/G.711a/G.722.1/MP2L2/G.726/PCM
Audio Bit Rate	64Kbps (G.711) /16Kbps (G.722.1) /16Kbps (G.726) /32-160Kbps (MP2L2)

Image	
Max. Resolution	640 x 512
Main Stream	50Hz: 50fps (640×512, 384×288, 352×288)
Sub Stream Max. Frame Rate	50Hz: 50fps (640×512, 384×288, 352×288)
Third Stream Max. Frame Rate	50Hz: 50fps (640×512, 384×288, 352×288)
Image Enhancement	3D DNR/AGC
Image Setting	Rotate mode, saturation, brightness, contrast, sharpness adjustable by client software or web browser
Picture Overlay	LOGO picture can be overlaid on video with 128 × 128 24bit bmp format

Road Traffic and Vehicle Detection	
Accuracy	**European and Russian-Speaking Regions:** Capture Rate > 99% Recognition Rate > 98%
Vehicle Speed	Support vehicle speed under 120 km/h (74.6 mi/h)
Line number	Up to 4 lines supported. Recommended to set 1 or 2 lines for best performance
Direction	Support capture and recognition of vehicles both approaching and leaving
Whitelist and Blacklist	Up to 2048

Network	
Network Storage	Support microSD/SDHC/SDXC card (128G), local storage and NAS (NFS,SMB/CIFS), ANR
Alarm Trigger	Fire, motion detection, video tampering alarm, network disconnected, IP address conflict, illegal login, HDD full, HDD error
Protocols	TCP/IP, ICMP, HTTP, HTTPS, FTP, DHCP, DNS, DDNS, RTP, RTSP, RTCP, PPPoE, NTP, UPnP, SMTP, SNMP, IGMP, 802.1X, QoS, IPv6
General Function	One-key reset, anti-flicker, three streams, heartbeat, password protection, privacy mask, watermark, IP address filter, mirror
Standard	ONVIF (profile S, profile G), ISAPI
Interface	
Communication Interface	1 RJ45 10M/100M Ethernet port
Audio	1 audio input(line in/mic in), 1 audio output
Alarm	1 input, 1 output
Video Output	1Vp-p composite output (75 Ω/BNC)
On-board storage	Built-in microSD/SDHC/SDXC slot, up to 128 G
Reset Button	Yes
Audio	
Environment Noise Filtering	Support
Audio I/O	Support
Audio Sampling Rate	16kHz/32kHz/44.1kHz/48 kHz
General	
Operating Conditions	-40 °C to 65 °C (-40 °F to 149 °F), 90% or less
Power Supply	24 VAC± 25%, 12 VDC± 20%, two-core terminal block PoE (802.3at, class 4)
Power Consumption and Current	4 VAC± 25%: 0.92 A, 12 VDC ± 20%: 1.9 A, max. 8W (22W with De-icing Heater On) PoE (802.3at, class 4): 42.5 V to 57 V, 0.4 A to 0.5 A,
Surge	TVS 6000V Lightning protection, surge protection, voltage transient protection
Protection	IP66
Dimensions	314mm × 104mm × 292.7mm (12.36" × 4.09" × 11.52")
Weight	Approx. 2075 g (4.57 lb.)

Dimensions

376.1mm [14.81"]

4-Φ4.3 (0.17")

62.6 (2.46")

62.6 (2.46")

118.1mm [4.65"]

119.1mm [4.69"]

Thermal Detection (Range)

*   *This table is only for reference, performance may vary according to installation*

Smart functions Range

Different targets trigger VCA events within different range limits.

VCA Range (Vehicles: 1.4×4.0m)	VCA Range (Humans: 1.8×0.5m)	Temperature Measurement (Object:2×2 m)	Temperature measurement (Object:1×1 m)	Fire Detection (Object:2×2 m)	Fire Detection (Object:1×1 m)
210 m	70 m	164 m	83 m	412 m	206 m

Wide Range Coverage

There is range limit for detecting, recognizing, and identifying human/vehicle targets.

Detection Range (Vehicles: 1.4×4.0m)	Detection Range (Humans: 1.8×0.5m)	Recognition Range (Vehicles: 1.4×4.0m)	Recognition Range (Humans: 1.8×0.5m)	Identification Range (Vehicles: 1.4×4.0m)	Identification Range (Humans: 1.8×0.5m)
631 m	206 m	158 m	51 m	79 m	26 m

LTB378

Vertical Pole Mount

LTB379

Corner Mount

Camera Module	
Image Sensor	1/1.2" progressive scan CMOS
Min. Illumination	Color: 0.002 Lux @(F1.6, AGC ON), B/W: 0.0002 Lux @(F1.6, AGC ON), 0 Lux with IR
Shutter Speed	1/1 s to 1/30,000 s
Slow Shutter	yes
Focus	semi-auto, manual, auto
Day & Night	ICR
Day/Night Switch	day, night, auto, scheduled-switch
BLC	yes
WDR	120 dB WDR
HLC	yes
3D DNR	yes
Defog	yes
EIS	Yes. Built-in gyroscope to improve EIS performance.
Regional Exposure	yes
Regional Focus	yes
Image Settings	saturation, brightness, contrast, sharpness
White Balance	auto, ATW, sodium lamp, fluorescent lamp, indoor, outdoor, MWB
Digital Zoom	16 ×
Optical Zoom	42 ×
Privacy Mask	up to 24 masks, polygon region, mosaic mask, mask color configurable
SNR	≥ 55 dB
General Function	mirror, password protection, video tampering alarm, watermark, IP address filter
Optical Defog	yes
Lens	
Focal Length	7.5mm to 315mm, 42 × Optical
Zoom Speed	approx. 7.5 s
FOV	Horizontal field of view: 60.4° to 1.7° (wide-tele), Vertical field of view: 36.2° to 0.9° (wide-tele), Diagonal field of view: 67.8° to 2.2° (wide-tele)
Aperture	F1.6
PTZ	
Movement Range (Pan)	360°
Movement Range (Tilt)	-20° to 90° (auto flip)
Pan Speed	pan speed: configurable from 0.1° to 210°/s; preset speed: 280°/s
Tilt Speed	tilt speed: configurable from 0.1° to 150°/s, preset speed 250°/s
Proportional Zoom	yes
Presets	300
Patrol Scan	8 patrols, up to 32 presets for each patrol
Pattern Scan	4 pattern scans, record time over 10 minutes for each scan
Power-off Memory	yes
Park Action	preset, pattern scan, patrol scan, auto scan, tilt scan, random scan, frame scan, panorama scan
3D Positioning	yes
PTZ Status Display	yes
Preset Freezing	yes
Scheduled Task	preset, pattern scan, patrol scan, auto scan, tilt scan, random scan, frame scan, panorama scan, dome reboot, dome adjust, aux output

Video

Max. Resolution	3840 × 2160
Main Stream	50 Hz: 25 fps (3840 × 2160, 2560 × 1440, 1920 × 1080, 1280 × 960, 1280 × 720); 60 Hz: 30 fps (3840 × 2160, 2560 × 1440, 1920 × 1080, 1280 × 960, 1280 × 720),
Sub-Stream	50 Hz: 25 fps (704 × 576, 640 × 480, 352 × 288) 60 Hz: 30 fps (704 × 480, 640 × 480, 352 × 240)
Third Stream	50 Hz: 25 fps (1920 × 1080, 1280 × 960, 1280 × 720, 704 × 576, 640 × 480, 352 × 288) 60 Hz: 30 fps (1920 × 1080, 1280 × 960, 1280 × 720, 704 × 480, 640 × 480, 352 × 240)
Video Compression	H.265, H.264, MJPEG
Video Bit Rate	32 Kbps to 16384 Kbps
H.264 Type	baseline profile, main profile, high profile
H.265 Type	main profile
H.264+	yes
H.265+	yes
SVC	yes
ROI	dynamic face tracking, fixed region, dynamic license plate tracking

Audio

Audio Compression	G.711alaw, G.711ulaw, G.722.1, G.726, MP2L2, PCM
Audio Bit rate	64 Kbps (G.711)/16 Kbps (G.722.1)/16 Kbps (G.726)/32 Kbps to 192 Kbps(MP2L2)

Smart Features

Face Capture	Support detecting up to 30 faces at the same time. Support detecting, tracking, capturing, grading, selecting of face in motion, and output the best face picture of the face.
Face Comparison	yes
Road Traffic	Support vehicle detection (license plate number, vehicle model, and vehicle color recognition)
Basic Event	motion detection, video tampering alarm, alarm input and output, exception
Smart Event	unattended baggage detection, object removal detection, intrusion detection, line crossing detection, region entrance detection, region exiting detection, audio exception detection, vandal-proof alarm
Smart Tracking	manual tracking, panorama tracking, event tracking, support patrol tracking among multiple detection scenes
Smart Record	ANR, Dual-VCA
Alarm Linkage	preset, patrol scan, pattern scan, memory card video recording, alarm output, sending email, notify surveillance center, upload to FTP, NAS video recording

Network

Network Storage	NAS (NFS, SMB/ CIFS)
Protocols	IPv4/IPv6, HTTP, HTTPS, 802.1x, Qos, FTP, SMTP, UPnP, SNMP, DNS, DDNS, NTP, RTSP, RTCP, RTP, TCP/IP, DHCP, PPPoE, UDP, IGMP, ICMP, Bonjour
API	Open-ended API, ONVIF (Profile S, Profile G), ISAPI, Hikvision SDK, Third-party management platform, ISUP
Simultaneous Live View	Up to 20 channels
User/Host	Up to 32 users. 3 levels: Administrator, Operator and User
Smooth Streaming	yes
Security Measures	Authenticated username and password, MAC address binding, HTTPS encryption, 802.1X authenticated access, IP address filter
Client	LTS Connect, NVMS V3
Web Browser	IE 10+, Chrome 57+, Firefox 52+, Safari 12+

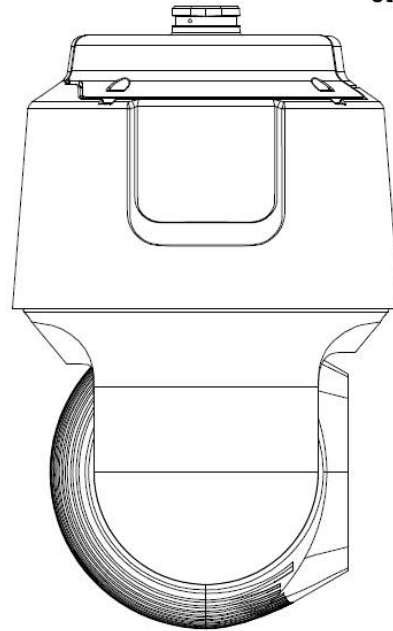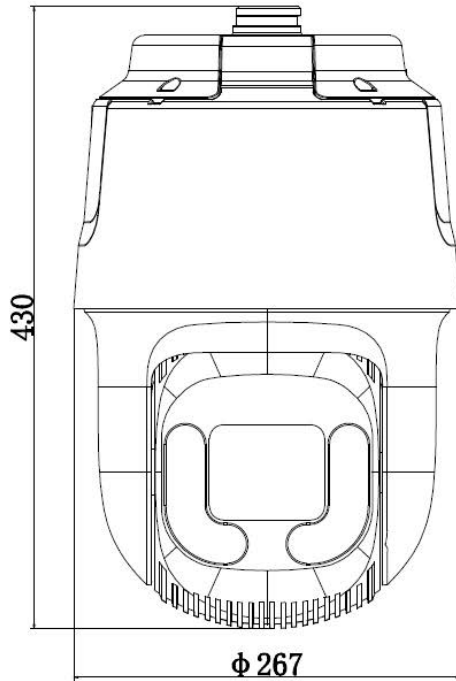| Interface	
Communication Interface	RJ45,Self-adaptive 10M/100M Ethernet port
On-board Storage	Built-in memory card slot, support Micro SD/Micro SDHC/Micro SDXC, up to 256 GB; NAS (NFS, SMB/ CIFS), ANR
Alarm Input	7 alarm inputs
Alarm Output	2 alarm outputs
Audio Input	1 audio input, 2.0 to 2.4Vp-p, 1k Ohm±10%
Audio Output	1 audio output, line level, impedance: 600 Ω
Video Output	1.0V[p-p]/75Ω,PAL,NTSC,BNC connector
RS-485	HIKVISION, Pelco-P, Pelco-D, self-adaptive
Supplement Light	
IR Distance	500 m
Smart IR	yes
General	
Power	24 VAC (Max. 60 W, including max. 15 W for IR and max. 8 W for heater), PoE 802.3 bt (Max. 51 W, including max. 15 W for IR and max. 8 W for heater)
Operating Conditions	Temperature: -40°C to 70°C (-40°F to 158°F), Humidity: ≤ 95%
Wiper	Yes. Rain-sensing auto control
Material	ADC12
Dimensions	Φ 267 mm × 430 mm (Φ 10.51" × 16.93")
Weight	Approx. 9.6 kg (21.16 lb.)
Web Client Language	32 languages: English, Russian, Estonian, Bulgarian, Hungarian, Greek, German, Italian, Czech, Slovak, French, Polish, Dutch, Portuguese, Spanish, Romanian, Danish, Swedish, Norwegian, Finnish, Croatian, Slovenian, Serbian, Turkish, Korean, Traditional Chinese, Thai, Vietnamese, Japanese, Latvian, Lithuanian, Portuguese (Brazil)
Approval	
Protection	Lightning Protection, Surge Protection and Voltage Transient Protection, ±6kV Line to Gnd, ±3kV Line to Line, IEC61000-4-5, IP67 Standard, IK10 (excluding glass window)

DORI

The DORI (detect, observe, recognize, identify) distance gives the general idea of the camera ability to distinguish persons or objects within its field of view.

It is calculated based on the camera sensor specification and the criteria given by EN 62676-4: 2015.

DORI	Detect	Observe	Recognize	Identify
Definition	25 px/m	63 px/m	125 px/m	250 px/m
Distance (Tele)	4137.9 m (13575.8 ft)	1642 m (5387.1 ft)	827.6 m (2715.2 ft)	413.8 m (1357.6 ft)

Dimensions:

Unit: mm

430

φ 267