



Product name: EOS-T160 series in-vehicle PTZ IP camera

Order number: EOS-T160-(384x288 - 640x512)

Application:

It can be widely used in the fields of public security, electricity, firefighting, policing, the military, maritime transport, recreational boating, rail transport, emergency services, housing, prisons and other areas requiring emergency response and mobile deployment (storage case available with tripod).

Product overview:

This is an integrated smart product used in maritime surveillance and security, recreational boating and vehicles. It is suitable for installation on vehicle roofs and works with the on-board hard disk video recorder to provide users with smooth, stable high-definition video footage. It enables high-definition image capture, PTZ control and zoom control.

Feature description:

- Integrated structural design, IP67 rating.
- Lightweight design: the total weight of the PTZ camera does not exceed 6.5 kg.
- 2 MP 1080P 30x HD camera, allowing clear viewing of vehicles and pedestrians from a distance of 300 metres.
- Fixed 640*512 thermal lens, 35mm lens (see available options)
- Continuous 360-degree rotation, supporting patrol, linear scanning, preset position, parking position, etc.
- Support for 3D positioning, precise monitoring of positioning relative to the selected screen
- Built-in TF card slot, supports up to 256 GB
- Imported high-power infrared light, IR range of 120 m
- Supports network control, supports IP/RS485, vehicle keyboard controller
- Suitable for roof mounting
- Ultra-wide voltage design, supported input voltage range 9–36 V.
- Equipped with an isolated DC power supply module with a wide input voltage range
- Network output, compatible with common Hikvision and Dahua vehicle hard disk recorders

Default video signal output:

Video output: IP or Wi-Fi (4G option available)

Thermal imaging output: IP or Wi-Fi



EOS-T160 specifications

Specifications

Model number	EOS-T160-thermal	
System	Hisilicon integrated system	
Protocol	ONVIF protocol, support for providing the lower layer and assisting with development	
Video configuration and navigation method	Configuration	Network port
	WEB	Support (video can be viewed)
	PC client	Support (the video can be viewed)
	Mobile app	Support (video available)
Input	Built-in 1CH video, audio 1CH	
PTZ	Pan range	Continuous 360° rotation
	Tilt range	-30°-90°
	Rotation speed	Pan control speed: 100°/s, tilt control speed: 60°/s
	Preset	200x
	Patrol	4x
	Line scan	Support
	Park function	Support
	IR	2x high-power infrared lamps, infrared range up to 120 metres
Camera	Sensor	1/2. High-performance low-light CMOS sensor 8 " (IMX327)
	Resolution	1080p (1920×1080, 25/30 frames per second)
	Optical zoom	33x
	Focus lens	F = 5.5–180 mm
	Digital zoom	10x
	Aperture	F1.6 ~ F4.3
	Angle of view	Wide: 65.2° × 56.9° Telephoto: 3.3° × 2.9°
	Illumination	(Condition: F1.6 (W), 50 IRE), 0.05 lx (1/30 s) IR-CUT enabled, 0.005 lx (1/4s) IR-CUT reduction
	WDR	DWDR
	Day/Night mode	ICR switch
Compression	H.264/H.265	
Bitrate	32Kbps–16Mbps	
Frame rate	1–25 fps (50 Hz) 1–30 fps (60 Hz)	
Streams	Dual-stream support, main stream (1080P; 960P; 720P), sub-stream (D1; VGA; CIF)	
Video	Format	AVI (with audio)
	Supported resolution	D1/720p/1080p (default)
	Video file length	10 minutes (default)
	Frame rate	25/30 fps
Storage	Single card, maximum support 256GB	
Snap	Supported resolution	D1/720P/1080P (default)
Audio	Audio input	Built-in high-sensitivity sensor, optional handheld microphone
	Compression standard	G711
	Sampling rate	16K, 32K, 64K, 128K



EOS-T160 specifications

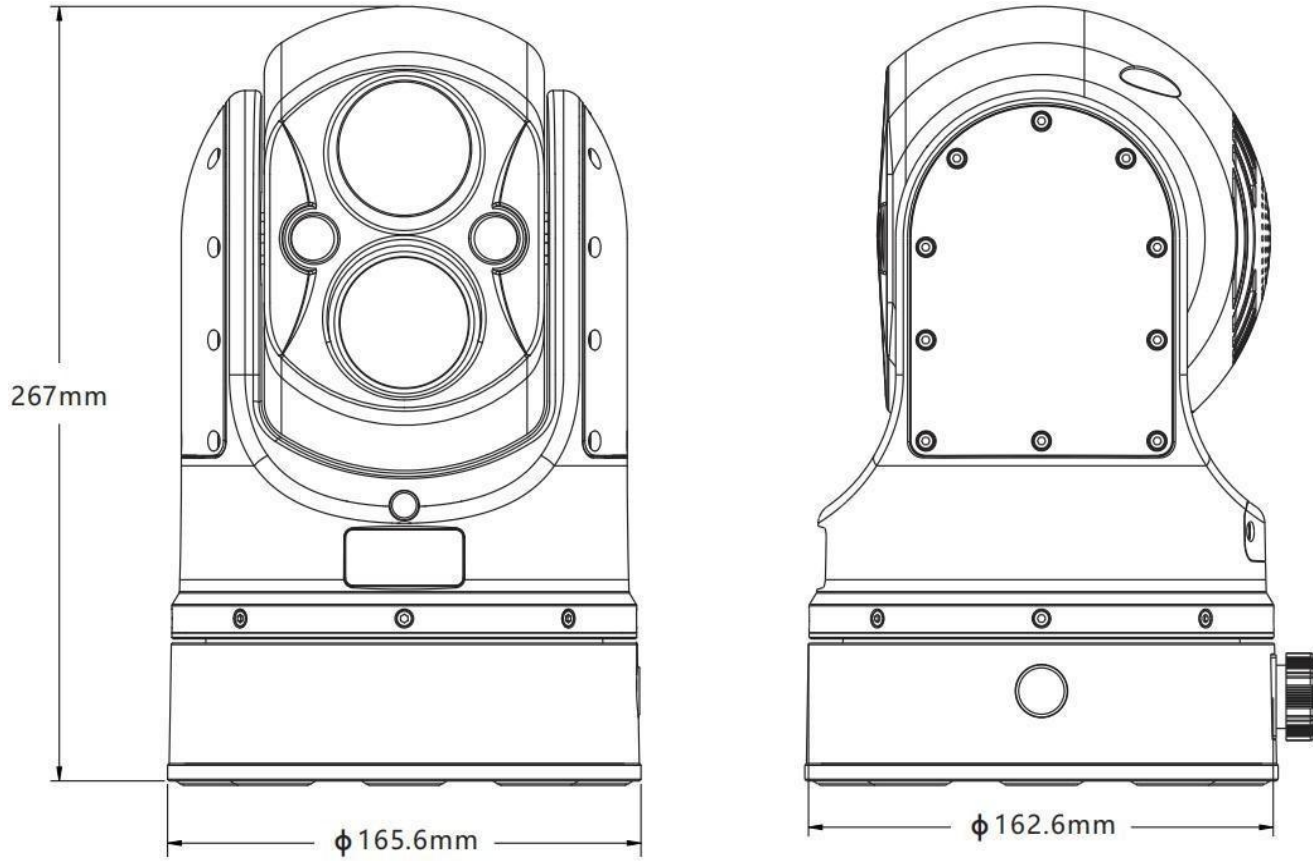
Infrared light settings	Infrared power	1 high-power infrared dot matrix
	Infrared angle	1x 15° lamp reflector, 1x 60° lamp reflector
	Infrared control method	PWM dimming
	Infrared range	Effective infrared range 120 metres
Thermal imaging	Detector type	Alarm type: uncooled
	Resolution	640×512, 384×288
	Response band	8–14 μm
	Frame rate	50 fps
	Fixed lens focal length	15mm fixed, 25mm optional, 35mm fixed lens
	Lens F-number	F1.0
	Field of view	28.7° x 23.2°, 17.5° x 13.1°
	Grey scale alarm	≤ 0.2 s
	Digital zoom	1x, 2x, 4x, 8x
	Pseudo-colour	Support, black heat, white heat, red heat, mixture
	Image processing	Image detail enhancement (DDE), automatic gain control (AGC), digital filter noise reduction
	Brightness and contrast adjustment	Manual/AUTO
	Digital video output	8-bit BT.656 / 14-bit RAW + YUV (TM36/33-LGD)
	Control interface	RS-232/RS-485/UART/RS-422
3G/4G	Wireless system	Full 4G Netcom
	Number of wireless cards	1 SIM card
	Private network	Custom
	Antenna placement	Built-in
Wi-Fi	Standard	IEEE 802.11a/b/g/n/ac 2.4GHz and 5GHz
	Range	15m
	Antenna placement	Integrated
	AP access point	Support
Support for basic Wi-Fi settings		
Satellite positioning	Positioning method	GPS/Beidou (built-in module)
	Auxiliary positioning	Supporting base station positioning
	Antenna placement	Integrated 4G antenna, integrated Wi-Fi antenna
LCD display	LED light	Backlight 1 light ring
	OLED screen	Supports OLED screen to display 4G, Wi-Fi, GPS connection status, storage status, signal strength and connection to the display platform Status
	OSD	OSD image can be viewed and displayed, device name, time, GPS, 4G network, battery status
Alarm	Input	1CH
	Output	1 group
Expand	RS232 serial port	RS232 serial port, which can be connected to various sensors, such as temperature and humidity sensors, radar and other peripherals
Buttons and controls	Physical button	1 machine switch button; press and hold for 3 seconds to switch machines
Protection rating	IP67	



EOS-T160 specifications

Handle design	Support	
Operating temperature	-30–60°	
Operating humidity	0–95% (non-condensing)	
Product dimensions	165*124*229.6	
Weight	6.6kg/6kg packed in a safety box	
Fixed mounting	Magnetic suction cup, tripod mount, wall mount, ceiling mount, pole mounting	
Interface cable	Charging port	Φ5.5*2.1
	Serial port	Level 232
	Audio port	US standard headphone jack
	Alarm output port	1CH
Power and energy consumption	Battery	DC 12.6V 120Wh (9 x 18650 batteries)
		High-precision power monitoring
	Power consumption of the camera alone	Typical 10W, maximum power consumption is less than 20W (IR on)
	Continuous operating time	8 hours
	Battery location	Built-in at the bottom
	Charging standard	DC 12.6V/3A
	Charging time	Switch off for 4 hours, switch on for 8 hours (typical 12V 5A)
Standard accessories	Interface cable	Standard
	Handle	Standard
	Charger	DC 12.6V 5A
Optional accessories	Handheld microphone	DC4.2V 7.4Wh, dimensions 63*25.6*90mm (optional)
	Safety box	Optional
	Fixed disc tripod	Optional
	Tripod	Aluminium alloy, total weight 1.5kg, 4 legs, maximum load 8kg (optional)

Product dimensions (unit: mm)



Available options



Camera with 30x optical zoom



Thermal imaging mode



White light zoom mode



Dual-image panoramic mode



3D positioning function



Composite magnetic suction cup



Continuous 360° rotation, blind-spot-free surveillance



Supports mobile phones, PC cards, and CMS access



High-capacity lithium battery



TF card storage up to 256 GB



Beidou GPS positioning



Remote wireless 4G full Netcom video transmission



Patrol, linear scan, preset and parking functions



Two-way intercom



Multiple optical AI functions

Version 1 (Thermal Imaging Mode)

This is a dual-channel video mode composed of a 30x optical zoom and a fixed 35 mm thermal lens. It can detect targets under any ambient light at night, be deployed remotely, and measure industrial temperatures.

It is widely used in firefighting, electricity, public security, maritime operations, and other fields.

Version 2 (White Light Mode)

This video mode combines a 30x optical zoom with a powerful 10 W zoomable white light. Color mode can also be used in dark environments to improve license plate recognition and other applications requiring full-color imaging.

At the same time, the zoomable white light can be used as auxiliary lighting for special scenarios such as emergency search operations, maritime patrols, rescue missions, and other fields.

Version 3 (Dual-Spectrum Panoramic Mode)

One channel is equipped with a 30x optical zoom and the other with a 3.6 mm wide-angle lens. It transmits two optical images to the GB28181 platform via 4G, enabling wide-angle panoramic surveillance and detailed zoomed observation.