



# FD9387-EHTV-V3

Fixed Dome Network Camera

5MP 30 fps • SNV • 50M IR • WDR Pro • IP66/67 • IK10+

## Technical Specifications

### System Information

Model	FD9387-EHTV-V3
CPU	Multimedia SoC (System-on-Chip)
Flash	eMMC 8 GB
RAM	DDR4 2 GB

### Camera Features

Image Sensor	1/2.8" Progressive CMOS
Max. Resolution	2560x1920 (5MP)
Lens Type	Motorized, Vari-focal, Remote Focus
Focal Length	f = 2.7 ~ 13.5 mm (short range) f = 7 ~ 22 mm (mid-range)
Aperture	F1.83(W) ~ F3.32(T) (Short range) F1.70(W) ~ F2.90(T) (Mid-range)
Iris Type	P-iris
Field of View	Short range 100.1° ~ 29.9° (Horizontal) 71.8° ~ 22.4° (Vertical) 135.2° ~ 37.4° (Diagonal) ----- Mid-range 39.3° ~ 15.5° (Horizontal) 28.8° ~ 11.6° (Vertical) 50.8° ~ 19.4° (Diagonal)
Shutter Time	1/5 sec. to 1/32,000 sec.
WDR Technology	WDR Pro
Day/Night	Yes
Removable IR-cut Filter	Yes
IR Illuminators	Built-in IR illuminators, effective up to 50 meters with Smart IR III, IR LED*4



Minimum Illumination	Short range 0.04 lux @ F1.8 (Color) <0.005 lux @ F1.8 (B/W) 0 lux with IR illumination on
	Mid-range 0.035 lux @ F1.7 (Color) <0.005 lux @ F1.7 (B/W) 0 lux with IR illumination on
Pan Range	±175°
Tilt Range	80°
Rotation Range	±175°
Pan/Tilt/Zoom Functionalities	ePTZ: 48x digital zoom (4x on IE plug-in, 12x built-in)
Storage	Seamless Recording to MicroSD/SDHC/SDXC card (1TB Capacity Supported) and recording to network-attached storage (NAS)
Built-in Installation Aids	Remote focus, remote zoom, Micro USB* , pixel calculator *Requires Wi-Fi dongle and Micro B converter

## Video

Video Compression	H.265, H.264, MJPEG
Maximum Frame Rate	30 fps @ 2560x1920 (WDR Pro on) 30 fps @ 2560x1440 (WDR Pro on) 60 fps @ 1920x1080 (WDR Pro off)
Maximum Streams	3 video streams (Up to 8 configurable profiles)
Main Stream	30 fps @ 2560x1920, 1600x1200, 1280x960, 640x480 (4:3); 30 fps @ 2560x1440, 1920x1080, 1600x904, 1280x720,1360x768, 640x360 (16:9) 60 fps @ 1920x1080, 1600x904, 1360x768, 1280x720, 640x360 (16:9)
2nd Stream	30 fps @ 2560x1920, 1600x1200, 1280x960, 640x480 (4:3); 30 fps @ 2560x1440, 1920x1080, 1600x904, 1280x720,1360x768, 640x360 (16:9) 60 fps @ 1920x1080, 1600x904, 1360x768, 1280x720, 640x360 (16:9)
3rd Stream	30 fps @ 1280x960, 640x480 (4:3); 30 fps @ 1280x720, 640x360 (16:9); 60 fps @ 1280x720, 640x360 (16:9)
S/N Ratio	70 dB
Dynamic Range	120 dB
Video Streaming	Adjustable resolution, quality and constant bit rate control, Smart Stream III
Image Settings	General settings: video title and time stamp overlay, video orientation (flip, mirror, rotation), day/night settings; Illuminators: illuminators, anti-overexposure, VCA-based Smart IR III; Image settings: white balance, image adjustment (brightness, contrast, saturation, sharpness, gamma curve), defog, 3DNR, EIS (built-in gyro sensor), scene mode (auto, deblur); Exposure: BLC, HLC, exposure control (exposure level, iris adjustment, exposure time, gain control, iris mode), AE speed adjustment, WDR; Focus: zoom, focus; Privacy mask; pixel calculator; Scheduled profile settings

## Audio

Audio Capability	Two-way audio (Full duplex)
Audio Compression	G.711, G.726, MPEG-2 AAC-LC
Audio Interface	Built-in microphone External microphone Input External line output
Effective Range	5 meters

## Network

Users	Live viewing for up to 10 clients
Security	Access list, Account block , Audit log, Configurable password strength protection, CSRF protection, Digest authentication, HTTPS , IEEE 802.1x, Secure boot, Session timeout, Signed firmware, Trend Micro IoT Security (Brute force attack event, Cyberattack event, Quarantine event), User access log, User account management
Protocols	802.1X, ARP, Bonjour, CIFS/SMB, DDNS, DHCP, DNS, FTP/SFTP, HTTP/HTTPS, ICMP, IGMPv3, IPv4, IPv6, NTP, PPPoE, QoS (CoS/DSCP), RTSP/RTP/RTCP, SMTP, SNMP, SSL, TCP/IP, TLS 1.2/1.3, UDP, UPnP
Interface	10 Base-T/100 Base-TX Ethernet *It is highly recommended to use standard CAT5e & CAT6 cables which are compliant with the 3P/ETL standard.
ONVIF	Profile G, S, T supported, specification available at <a href="http://www.onvif.org">www.onvif.org</a>

## AI Analytics

Compute Capability	SoC with built-in hardware deep learning accelerator
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Vision Object Analytics	Object Detection: People, Vehicle (4-wheeled, 2-wheeled); Attribute Extraction: People (gender, clothing color, bag, hat), Vehicle (bike, bus, car, motorcycle, truck, color); Research Extraction; Path Extraction
Application	Deep Learning VCA (Smart Motion Detection, Smart VCA) Smart Motion Detection (Five-window video motion detection, People detection, Vehicle detection, Time filter), Smart VCA (Intrusion detection, Loitering detection, Line crossing detection, Unattended object detection, Missing object detection, Face detection, Crowd detection)
Application available with license	Running detection, Parking Violation Detection, Restricted Zone Detection Support for more analytic applications and free trial, please visit <a href="http://vivotek.com/video-analytics">vivotek.com/video-analytics</a>
AI-powered Image Enhancement	Smart IR III

## Solution Integration

Applications	Stratocast, Trend Micro IoT Security (3-year free trial)
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## Alarm and Event

Event Trigger	Audio detection, camera tampering detection, cybersecurity events (brute force attack event, cyberattack event, quarantine event), digital input, manual trigger, motion detection, periodical trigger, recording notification, SD card life expectancy, shock detection, system boot
Event Action	Event notification via audio clip, camera link, digital output, email, HTTP, FTP/SFTP, NAS server, SD card File upload via email, HTTP, FTP/SFTP, NAS server, SD card

## General

Connectors	Default IO RJ-45 cable connector for 10/100 Mbps PoE network connection Built-in Microphone Audio line input Audio line output DC 12V power input Digital input*1 Digital output*1 (DO+: 12V, 50mA; DO-: 30V, Open Drain, 1A) Micro USB  Module I/O (AO-011)* Digital input *1 Digital output *1 (DO+: 12V, 50mA; DO-: 30V, Open Drain, 1A) AC 24V power input *Requires extension I/O module kit (AO-011 I/O Kit for dome cameras)
LED Indicator	System power and status indicator
Power Input	AC 24V*, DC 12V, IEEE 802.3af PoE Class 0 (Power Redundancy) *Requires extension I/O module kit (AO-011)
Power Consumption	12.95 W
Dimensions	ø 173.6 x 122.6 mm
Weight	1.30 kg
Certifications	EMC: CE (EN 55032/EN 55035 Class B, EN 50121-4), FCC (FCC Part 15 Subpart B Class B), UKCA (BS EN 55032/BS EN 55035 Class B), RCM (AS/NZS CISPR 32 Class B), VCCI (VCCI-CISPR 32 Class B), IC (ICES-003 Issue 7); Safety: UL (UL 62368-1), CB (IEC/EN 62368-1, IEC/EN 60950-22, IEC/EN 62471), LVD, (EN 62368-1), UKCA (BS EN IEC 62368-1); Environment: IK10+ (IEC 62262), IP66/67 (IEC 60529), NEMA (NEMA 250 Type 4X), IEC 60068-2-11, IP6K9K (ISO 20653); IA: BIS (IS 13252), BSMI (EMC: CNS 13438, Safety: CNS 14336-1)
Operating Temperature	Starting Temperature: -30°C ~ 60°C (-22°F ~ 140°F) Working Temperature: -40°C ~ 60°C (-40°F ~ 140°F) (IR off) -40°C ~ 50°C (-40°F ~ 122°F) (IR on)
Humidity	98% RH (non-condensing)

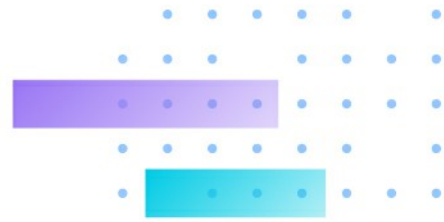
## System Requirements

Operating System	Microsoft Windows 10/8/7 Mac 10.12 (Chrome only)
Web Browser	Chrome 58.0 or above Internet Explorer 11
Other Players	VLC: 1.1.11 or above

## Included Accessories

Packing Contents	Quick installation guide, product labels, alignment sticker, L-shaped wrench, screw pack, waterproof accessory pack, sunshield, conduit bracket, I/O cable
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## DORI (EN 62676-4 Standard)



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Detect (25PPW/ 8PPF)	Short range Wide: 64.4 m (211.2 ft) Tele: 196.6 m (645.2 ft)
	Middle range Wide: 157.3 m (516.0 ft) Tele: 378.2 m (1240.6 ft)

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Observe (63PPM/ 19PPF)	Short range Wide: 25.7 m (84.4 ft) Tele: 78.7 m (258.1 ft)
	Middle range Wide: 62.7 m (205.6 ft) Tele: 151.3 m (496.2 ft)

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Recognize (125PPM/ 38PPF)	Short range Wide: 12.8 m (42.1 ft) Tele: 39.3 m (129.0 ft)
	Middle range Wide: 31.4 m (103.2 ft) Tele: 75.9 m (249.1 ft)

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Identify (250PPM/ 76PPF)	Short range Wide: 6.4 m (20.9 ft) Tele: 19.6 m (64.5 ft)
	Middle range Wide: 15.7 m (51.4 ft) Tele: 37.9 m (124.3 ft)

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