

#### DS-2CD3686G2-IZS

8 MP AcuSense IR Varifocal Bullet Network Camera

# **Acu**Sense







Empowered by deep learning algorithms, Hikvision AcuSense technology brings human and vehicle targets classification alarms to front- and back-end devices. The system focuses on human and vehicle targets, vastly improving alarm efficiency and effectiveness.

Hikvision has been dedicated to develop products with security since established. Hikvision always follows security by design principle and has adopted many methods of security technologies into our product development lifecycle, including terminal security, data security, application security, network security, and privacy protection. In the meantime, the security technologies used by Hikvision are all in compliance with local applicable laws and safety regulations. These security measures could enhance product's cyber security protection capability and protect your devices as well as your data from malicious cyber attacks.

- Supports Hikvision Embedded Open Platform (HEOP) and importing third party applications
- Supports 1.5 Tops computing power, 40 MB system memory, 350 MB smart RAM, and 2 GB eMMC storage for sharing resources
- High quality imaging with 8 MP resolution
- Excellent low-light performance with powered-by-DarkFighter technology
- Clear imaging against strong backlight due to 120 dB true WDR technology
- Efficient H.265+ compression technology
- Focus on human and vehicle targets classification based on deep learning
- Audio and alarm interface available
- 3D DNR technology delivers clean and sharp images
- Motorized varifocal lens for easy installation
- Water and dust resistant (IP66) and vandal-resistant (IK10)



# Specification

Camera				
Image Sensor	1/1.8" Progressive Scan CMOS			
Max. Resolution	3840 × 2160			
Min. Illumination	Color: 0.003 Lux @ (F1.6, AGC ON), B/W: 0 Lux with IR			
Shutter Time	1/3 s to 1/100,000 s			
Day & Night	IR cut filter			
Angle Adjustment	Pan: 0° to 355°, tilt: 0° to 90°, rotate: 0° to 360°			
Lens				
Lens Type	Varifocal lens, motorized lens, 2.7 to 13.5 mm and 7 to 35 mm optional			
	2.7 to 13.5 mm: horizontal FOV 108° to 46°, vertical FOV 58° to 26°, diagonal FOV 127°			
Focal Length & FOV	to 52°			
	7 to 35 mm: horizontal FOV 42° to 15°, vertical FOV 23° to 9°, diagonal FOV 49° to 17°			
Lens Mount	2.7 to 13.5 mm: Ø14; 7 to 35 mm: Integrated			
Iris Type	Auto-iris			
Focus	Auto, Semi-auto, Manual			
Aperture	F1.6			
DORI				
DORI	2.7 to 13.5 mm: D: 86 to 192 m, O: 34 to 76 m, R: 17 to 38 m, I: 8 to 19 m			
DORI	7 to 35 mm: D: 218 to 580 m, O: 86 to 230 m, R: 43 to 116 m, I: 21 to 58 m			
Illuminator				
Supplement Light Type	IR			
Supplement Light Range	2.7 to 13.5 mm: up to 60 m; 7 to 35 mm: up to 80 m			
Smart Supplement Light	Yes			
IR Wavelength	850 nm			
НЕОР				
	Memory: 40 MB,			
Open Resources	Smart RAM: 350 MB,			
	eMMC: 2 GB			
Computing Power	1.5 TOPS			
Open Capability	HEOP 2.0 OpendevSDK			
Deep Learning Structure	Caffe, PyTorch, TensorFlow, PaddlePaddle, ONNX			
Programming Language	C, C++			
Video				
	50 Hz:			
	25 fps (3840 × 2160, 3200 × 1800, 2688 × 1520, 1920 × 1080, 1280 × 720)			
Main Stream	60 Hz:			
	24 fps (3840 × 2160)			
	30 fps (3200 × 1800, 2688 × 1520, 1920 × 1080, 1280 × 720)			
Sub-Stream	50 Hz: 25 fps (1280 × 720, 640 × 480, 640 × 360)			
Jub Sticaiii	60 Hz: 30 fps (1280 × 720, 640 × 480, 640 × 360)			
Third Stream	TO U 40 5 (4000 4000 4000 TO 540 400 540 050)			
	50 Hz: 10 fps (1920 × 1080, 1280 × 720, 640 × 480, 640 × 360)			
	50 Hz: 10 fps (1920 × 1080, 1280 × 720, 640 × 480, 640 × 360) 60 Hz: 10 fps (1920 × 1080, 1280 × 720, 640 × 480, 640 × 360)			
Fourth Stream				



	Main stream: H.265/H.264/H.264+/H.265+,		
Video Compression	Sub-stream: H.265/H.264/MJPEG,		
	Third stream: H.265/H.264,		
Video Bit Rate	Fourth stream: H.265/H.264/MJPEG  32 Kbps to 16 Mbps		
H.264 Type	·		
H.265 Type	Baseline Profile, Main Profile, High Profile		
Bit Rate Control	Main Profile		
	CBR, VBR		
Scalable Video Coding (SVC)	H.264 and H.265 encoding		
Region of Interest (ROI)	5 fixed regions for main stream and sub-stream		
Target Cropping	Yes		
Audio			
Audio Type	Mono sound		
Audio Compression	G.711/G.722.1/G.726/MP2L2/PCM/MP3/AAC-LC		
Audio Bit Rate	64 Kbps (G.711ulaw/G.711alaw)/16 Kbps (G.722.1)/16 Kbps (G.726)/32 to 192 Kbps		
	(MP2L2)/8 to 320 Kbps (MP3)/16 to 64 Kbps (AAC-LC)		
Audio Sampling Rate	8 kHz/16 kHz/32 kHz/44.1 kHz/48 kHz		
Environment Noise Filtering	Yes		
Network			
	TCP/IP, ICMP, HTTP, HTTPS, FTP, DHCP, DNS, DDNS, RTP, RTSP, NTP, UPnP, SMTP,		
Protocols	IGMP, 802.1X, QoS, IPv4, IPv6, UDP, Bonjour, SSL/TLS, PPPoE, SFTP, ARP, SNMP,		
	WebSocket, WebSockets, SRTP		
Simultaneous Live View	Up to 6 channels		
API	ONVIF (Profile S, Profile G, Profile T), ISAPI, SDK, ISUP		
User/Host	Up to 32 users		
OSEI/HOST	3 user levels: administrator, operator, and user		
	Password protection, complicated password, HTTPS encryption, 802.1X authentication		
	(EAP-TLS, EAP-LEAP, EAP-MD5), watermark, IP address filter, basic and digest		
Security	authentication for HTTP/HTTPS, WSSE and digest authentication for Open Network		
	Video Interface, RTP/RTSP over HTTPS, control timeout settings, security audit log, TLS		
	1.1/1.2/1.3, host authentication (MAC address)		
	NAS (NFS, SMB/CIFS), Auto Network Replenishment (ANR),		
Network Storage	Together with high-end Hikvision memory card, memory card encryption and health		
	detection are supported.		
Client	iVMS-4200, Hik-Connect, Hik-Central		
	Plug-in required live view: IE 10, IE 11,		
Web Browser	Plug-in free live view: Chrome 57.0+, Firefox 52.0+, Edge 89+,		
	Local service: Chrome 57.0+, Firefox 52.0+, Edge 89+		
Image			
Image Parameters Switch	Yes		
Image Settings	Rotate mode, saturation, brightness, contrast, sharpness, gain, white balance,		
	adjustable by client software or web browser		
Day/Night Switch	Day, Night, Auto, Schedule		
Wide Dynamic Range (WDR)	120 dB		
Image Enhancement	BLC, HLC, 3D DNR, Defog		
SNR	≥ 52 dB		



Privacy Mask	4 programmable polygon privacy masks		
Interface			
Ethernet Interface	1 RJ45 10 M/100 M self-adaptive Ethernet port		
On-Board Storage	Built-in memory card slot, support microSD/microSDHC/microSDXC card, up to 512 GB		
Audio	1 input (line in), 3.5 mm connector, max. input amplitude: 3.3 Vpp, input impedance: 4.7 KΩ, interface type: non-equilibrium 1 output (line out), 3.5 mm connector, max. output amplitude: 3.3 Vpp, output impedance: 100 Ω, interface type: non-equilibrium		
Alarm	1 input, 1 output (max. 24 VDC/24 VAC, 1 A)		
Reset Key	Yes		
Event			
Basic Event	Motion detection (support alarm triggering by specified target types (human and vehicle)), video tampering alarm, exception		
Smart Event	scene change detection, audio exception detection, defocus detection, unattended baggage detection, object removal detection		
Linkage	Upload to FTP/NAS/memory card, notify surveillance center, send email, trigger recording, trigger capture, trigger alarm output, audible warning		
Deep Learning Function			
Perimeter Protection	Line crossing, intrusion, region entrance, region exiting Support alarm triggering by specified target types (human and vehicle)		
Face Capture	Yes		
People Counting	Yes		
General			
Power	12 VDC ± 25%, 1.08 A, max. 13 W, two-core terminal block, reverse polarity protection, PoE: IEEE 802.3at, Class 4, max. 15 W		
Material	Aluminum alloy body		
Dimension	Ø144 mm × 332.1 mm (Ø5.7" × 13.1")		
Package Dimension	385 mm × 190 mm × 180 mm (15.2" × 7.5" × 7.1")		
Weight	Approx. 1550 g (3.4 lb.)		
With Package Weight	Approx. 2596 g (5.7 lb.)		
Storage Conditions	-30 °C to 60 °C (-22 °F to 140 °F). Humidity 95% or less (non-condensing)		
Startup and Operating Conditions	-30 °C to 60 °C (-22 °F to 140 °F). Humidity 95% or less (non-condensing)		
General Function	Heartbeat, anti-banding, mirror, flash log, password reset via email, pixel counter		
Language	33 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), Ukrainian		
Approval			
EMC	CE-EMC: EN 55032: 2015, EN 61000-3-2:2019, EN 61000-3-3: 2013+A1:2019, EN 50130-4: 2011 +A1: 2014, IC: ICES-003: Issue 7, KC: KN32: 2015, KN35: 2015		



Safety	UL: UL 62368-1, CB: IEC 62368-1: 2014+A11, CE-LVD: EN 62368-1: 2014/A11: 2017, BIS: IS 13252 (Part 1): 2010/IEC 60950-1: 2005
Environment	CE-RoHS: 2011/65/EU, Reach: Regulation (EC) No 1907/2006
Protection	IP66: IEC 60529-2013, IK10: IEC 62262:2002

## Typical Application

Hikvision products are classified into three levels according to their anti-corrosion performance. Refer to the following description to choose for your using environment.

This model has NO SPECIFIC PROTECTION.

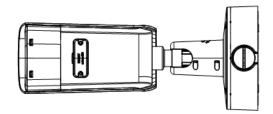
Level	Description	
Top-level protection	Hikvision products at this level are equipped for use in areas where professional	
	anti-corrosion protection is a must. Typical application scenarios include coastlines,	
	docks, chemical plants, and more.	
Moderate protection	Hikvision products at this level are equipped for use in areas with moderate	
	anti-corrosion demands. Typical application scenarios include coastal areas about 2	
	kilometers (1.24 miles) away from coastlines, as well as areas affected by acid rain.	
No specific protection	Hikvision products at this level are equipped for use in areas where no specific	
	anti-corrosion protection is needed.	

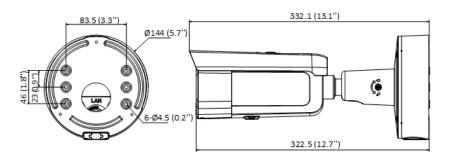
### Available Model

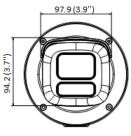
DS-2CD3686G2-IZS(2.7-13.5mm)(H) DS-2CD3686G2-IZS(7-35mm)(H)



### imension







## Accessory

### Optional

DS-1475ZJ-SUS	DS-1476ZJ-SUS	DS-1275ZJ-S-SUS
Vertical pole mount	Corner mount	Vertical pole mount
		IB.

#### Headquarters

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