

# DS-2CD51C5G0-IZS 12 MP IR Varifocal Dome Network Camera



- 1/1.7" Progressive Scan CMOS
- 4000 × 3000 @ 20fps
- MJPEG up to 1920 × 1080 @ 30fps
- 2.8 to 12 mm motorized lens
- Color: 0.008 Lux @ (F1.2, AGC ON), 0 Lux with IR
- H.265, H.265+, H.264, H.264+
- Digital WDR
- IR range up to 30 m
- Alarm 1 input/1 output
- Audio 1 input/1 output
- 1 RS-485 interface (half duplex, HIKVISION, Pelco-P, Pelco-D, self-adaptive)
- IK10

- 5 streams and up to 5 custom streams
- 6 behavior analyses, 3 exception detection, and face detection

HIKVISION

- Built-in microSD/SDHC/SDXC card slot, up to 256 GB
- Metadata of intrusion detection, line crossing detection, region entrance detection, region exiting detection, unattended baggage detection, and object removal are supported.





## Function

#### **Smooth Streaming**

Smooth streaming offers solutions to improve the video quality in different network conditions. For example, in poor network conditions, adapting to the detected real-time network condition, streaming bit rate and resolution are automatically adjusted to avoid mosaic and lower latency in live view; in multiplayer network conditions, the camera transmits the redundant data for the self-error correcting in back-end device, so that to solve the mosaic problem because of the packet loss and error rate.

### Metadata

Metadata uses individual instances of application data or the data content. Metadata can be used for third-party application development.

### **Power Protection**

The camera supports a wide voltage range of 10 VDC to 48 VDC. If the voltage instability occurs, the camera still works properly. The camera supports reverse polarity protection which can avoid the camera malfunction caused by false operation.



# Specifications

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Camera	
Image Sensor	1/1.7" Progressive Scan CMOS
Min. Illumination	Color: 0.008 Lux @ (F1.2, AGC ON), 0 Lux with IR
Shutter Speed	1 s to 1/100,000 s
Slow Shutter	Yes
Day & Night	IR Cut Filter.
WDR	Digital WDR
Angle Adjustment	Pan: 0° to 355°, tilt: 0° to 75°, rotate: 0° to 355°
Lens	
Lens Type	Motorized lens 2.8 to 12 mm
Auto-Iris	DC drive
Aperture	F1.2 to F2.5
Focus	Auto, semi-auto, manual.
FOV	Horizontal FOV 101° to 36.1°, vertical FOV 72° to 27.2°, diagonal FOV 130° to 45.2°
Lens Mount	Integrated
Illuminator	
IR Range	Up to 30 m
Wavelength	850 nm
Video	
Max. Resolution	4000 × 3000
Video Stream	5 defined streams and up to 5 custom stream
Main Stream	50Hz: 20fps(4000 × 3000), 25fps (4096 × 2160, 3840 × 2160, 3072 × 1728, 2560 × 1440, 1920 × 1080, 1280 × 720) 60Hz: 20fps(4000 × 3000), 30fps (4096 × 2160, 3840 × 2160, 3072 × 1728, 2560 × 1440, 1920 × 1080, 1280 × 720)
Sub Stream	50Hz: 25fps (704 × 576, 640 × 480) 60Hz: 30fps (704 × 480, 640 × 480)
Third Stream	50Hz: 25fps(1920 × 1080, 1280 x 720, 704 x 576, 640 x 480) 60Hz: 30fps(1920 × 1080, 1280 ×720, 704 x 480, 640 x 480)
Fourth Stream	50Hz: 25fps (1920 × 1080, 1280 × 720, 704 × 576, 640 × 480) 60Hz: 30fps (1920 × 1080, 1280 × 720, 704 × 480, 640 × 480)
Fifth Stream	50Hz: 25fps (704 × 576, 640 × 480) 60Hz: 30fps (704 × 480, 640 × 480)
Custom Stream	50Hz: 25fps (1920 × 1080, 1280 × 720, 704 × 576, 640 × 480) 60Hz: 30fps (1920 × 1080, 1280 × 720, 704 × 480, 640 × 480)
Video Compression	Main stream: H.265/H.264/H.265+/H.264+ Sub stream/third stream/fourth stream/fifth stream/custom stream: H.265/H.264/MJPEG
Н.264 Туре	Baseline Profile/Main Profile/High Profile
H.264+	Main stream support
Н.265 Туре	Main Profile
H.265+	Main stream support
Video Bit Rate	32 Kbps to 16 Mbps
SVC	H.264 and H.265 encoding
Audio	



Audio Compression	G.711/G.722.1/G.726/MP2L2/PCM
Audio Bit Rate	64Kbps(G.711) / 16Kbps(G.722.1) / 16Kbps(G.726) / 32-160Kbps(MP2L2)
Environment No Filtering	vise Yes
Audio Sampling Rate	8 kHz/16 kHz/32 kHz/44.1 kHz/48 kHz
Smart Feature-set	
Smart Event	Line crossing detection, up to 4 lines configurable Intrusion detection, up to 4 regions configurable Region entrance detection, up to 4 regions configurable Region exiting detection, up to 4 regions configurable Unattended baggage detection, up to 4 regions configurable Object removal detection, up to 4 regions configurable Face detection: detects faces and upload images Scene change detection, audio exception detection, defocus detection
Basic Event	Motion detection, video tampering alarm, network disconnected, IP address conflict, illegal login, HDD full, HDD error
Statistics	Counting
Linkage Method	Upload to FTP/NAS/memory card, notify surveillance center, send email, trigger alarm output, trigger recording, trigger capture
Region of Interest	4 fixed regions for main stream, sub stream, third stream, fourth stream, and fifth stream, and dynamic face tracking
Image	
Image Enhancement	BLC, HLC, Defog, EIS, 3D DNR, Distortion Correction
Image Setting	Rotate mode, saturation, brightness, contrast, sharpness, AGC, and white balance are adjustable by client software or web browser
Target Cropping	Yes
Day/Night Switch	Auto/Schedule/Day/Night/Triggered by Alarm In
Picture Overlay	LOGO picture can be overlaid on video with $128 \times 128$ 24bit bmp format
Network	
Network Storage	microSD/SDHC/SDXC card (up to 256 GB), local storage and NAS (NFS,SMB/CIFS), ANR Together with high-end Hikvision memory card, memory card encryption and health detection are supported.
Protocols	TCP/IP, ICMP, HTTP, HTTPS, FTP, DHCP, DNS, DDNS, RTP, RTSP, RTCP, PPPOE, NTP, UPnP, SMTP, SNMP, IGMP, 802.1X, QoS, IPv6, UDP, Bonjour, SSL/TLS
API	ONVIF (PROFILE S, PROFILE G), ISAPI
Smooth Streaming	Yes
Security	Password protection, HTTPS encryption, 802.1X authentication (EAP-TLS 1.2, EAP-LEAP, EAP-MD5), watermark, IP address filter, basic and digest authentication for HTTP/HTTPS, WSSE and digest authentication for ONVIF, RTP/RTSP over HTTPS, control timeout settings, security audit log, complicated password, anti-crack password protection
Simultaneous Live View	Up to 20 channels
User/Host	Up to 32 users. 3 user levels: administrator, operator and user
Client	iVMS-4200, Hik-Connect, Hik-Central
Web Browser	Plug-in required live view: IE8+, Chrome 41.0-44, Mozilla Firefox30.0-51, Safari8.0-11 Plug-in free live view: Chrome 45+, Mozilla Firefox52+
Interface	
Communication Interfac	e 1 RJ45 10M/100M/1000M Ethernet port 1 RS-485 interface (half duplex, HIKVISION, Pelco-P, Pelco-D, self-adaptive)
Audio	1 input (line in, 3.5 mm), 1 output (line out, 3.5 mm), mono sound
Alarm	1 input, 1 output (24 VAC/VDC, 1 A max)



Video Output	1Vp-p composite output (75 $\Omega$ /CVBS), only for adjustment
Power Output	12 VDC, max. 200mA
Interface Style	Socket style interface
On-board storage	Built-in micro SD/SDHC/SDXC slot, up to 256 GB
General	
Firmware Version	5.5.90
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)
General Function	Anti-flicker, 5 streams and up to 5 custom streams, heartbeat, mirror, password protection, regions of privacy mask, flash log, password reset via e-mail, pixel counter
Reset	Reset via reset button on camera body, web browser and client software
Startup and Operating Conditions	-30 °C to 60 °C (-22 °F to 140 °F), humidity 95% or less (non-condensing)
Storage Conditions	-30 °C to 60 °C (-22 °F to 140 °F), humidity 95% or less (non-condensing)
Power Supply	12 VDC is recommended, 10 to 48 VDC, two-core terminal block PoE (802.3af, class 3) Reverse polarity protection
Power Consumption and Current	With extra load: 12 VDC, 0.8 A, max. 10.5 W; PoE (802.3af, 36 V to 57 V), 0.2 A to 0.3 A, class 3 Without extra load: 12 VDC, 0.6 A, max. 8.0 W; PoE (802.3af, 36 V to 57 V), 0.2 A to 0.3 A, class 3 "with extra load" means that an extra device is connected to and powered by the camera.
Material	Metal
Dimensions	Camera: Φ141× 122mm (Φ5.5" × 4.8") With package: 244 × 174 × 173 mm (9.6" × 6.9" × 6.8")
Weight	Camera: 900 g (1.98 lb.) With package: 1250 g (2.76 lb.)
Approval	
EMC	47 CFR Part 15, Subpart B; EN 55032: 2015, EN 61000-3-2: 2014, EN 61000-3-3: 2013, EN 50130-4: 2011 +A1: 2014; AS/NZS CISPR 32: 2015; ICES-003: Issue 6, 2016; KN 32: 2015, KN 35: 2015
Safety	UL 60950-1, IEC 60950-1:2005 + Am 1:2009 + Am 2:2013, EN 60950-1:2005 + Am 1:2009 + Am 2:2013, IS 13252(Part 1):2010+A1:2013+A2:2015
Chemistry	2011/65/EU, 2012/19/EU, Regulation (EC) No 1907/2006
Protection	Ingress protection: IK10 (IEC 62262:2002)

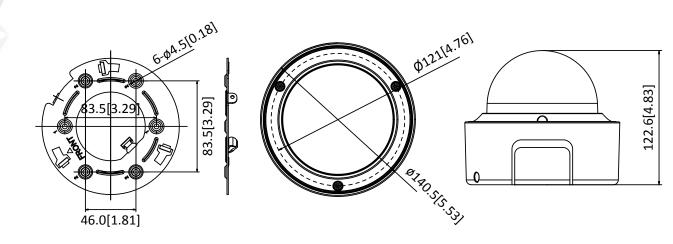
Note: Listed resolutions are only selectable options. It does not mean that all streams can work at their maximum resolution at the same time.

## Available Model

DS-2CD51C5G0-IZS (2.8 to 12mm)

## Dimension





Unit: mm[inch]



## Accessory



DS-1273ZJ-130



1275ZJ-SUS Vertical Pole Mount





DS-1273ZJ-130B Wall Mount



DS-1276ZJ-SUS Corner Mount



DS-1271ZJ-130 Pendent Mount



DS-1227ZJ In-ceiling Mount



DS-1279ZJ Pole



DS-1281ZJ-DM23 Inclined Ceiling Count

DS-1280ZJ-DM21

Junction box

Distributed by



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