

FD980

4K Fixed dome camera, 4-8mm motorized, H.265/H.264/MJPEG

DESCRIPTION

The FD980 is an 8MP HD fixed dome camera with built-in IR illumination providing razor sharp 4K images even under difficult lighting conditions. Its unique cable-managed bracket, built-in IR, weather and vandal resistance, makes it the ideal camera for almost any outdoor application. As underlined by its ONVIF Profile S, G, T conformance, installation is fast and easy.

FEATURES

4K resolution, 8 MP @ 30 fps

4-8 mm motorized varifocal lens

Quad-stream H.265, H.264 and MJPEG video

120 dB High Dynamic Range

Lens Distortion Correction

Built-in IR illuminator

IP66 ingress protection

IK10 impact rating

24 Vac, 12 Vdc, PoE

ONVIF Profile S, G and T



Description

Multi-stream multi-codec

The camera has quad-stream capability for simultaneous streaming of H.265, H.264 and MJPEG. Multiple combinations of resolution, frame rate, and encoding can be configured to fit all possible live viewing and recording scenarios. The 4K or 8 Mpixel resolution is available at 25/30 fps still offering multiple exposure WDR (or HDR, in short) with the possibility to add a second stream.

Built-in IR illuminator

With a working distance of up to 40 m the camera has its own IR illumination built-in. The intelligent lighting control make sure that under every condition the exposure on the subjects and surroundings is nicely balanced

Open standards

Multiple options are available to easily integrate the FD980 to a video management system. In support of open standards, the camera is compliant with the ONVIF Profile Q for out of the box installation, profile G for local recording and profile S for streaming and VMS compatibility.

Image enhancement

The FD980 utilizes advanced image processing technology. Crisp and detailed 4K images with an extremely high dynamic range in real time due to multiple exposure HDR within one frame. Back-light and High-light compensation enhances image-visibility in difficult lighting situations. In addition the camera provides for 3D motion compensated noise reduction for the best images.

Power source choices

The FD980 can be powered by 12 Vdc, 24 Vac, or over the network with PoE.

Camera	
Image sensor	1/1.8" CMOS
Effective pixels	3864(H) x 2180(V)
Minimum scene illumination	0.04 Lux color, 0.002 Lux B/W, f/1.6 0 lux with IR
Shutter speed	1 to 1/100,000 sec
IR illumination	850 nm, up to 40 m
IR function	Auto, Night, Day, Light sensor, Light On, Light Off, Smart
Lens	Motorized varifocal
Focal length	4 to 8 mm, f/1.6
Horizontal field of view	113° (Wide) to 59° (Tele)
Lens material	High-grade optical glass

Image control	
Dynamic range	120 dB (HDR)
Exposure control	P-Iris
White balance	Auto, ATW, One push, Manual
Image settings	Sharpness, Brightness, Contrast, Color, EV, Backlight Compensation, Highlight Compensation, WDR
SNR	Better than 54dBw
Noise reduction	2DNR, 3DNR, motion compensated noise reduction
Image rotation	90°, 180°, 270° rotation
Digital zoom	10x

Functions	
Privacy masks	8 colors, 5 masks
Text and picture overlay	Date, time, date & time, subtitle, image
Video motion detection	On / off / by schedule
Video motion detection alarm	Alarm output, record video clip, send alarm message, upload image
Network failure detection	On / off / by schedule
Network failure detection alarm	Alarm output, record video clip, send alarm message, upload image
Tamper detection	On / off / by schedule
Tamper detection alarm	Alarm output, record video clip, send alarm message, upload image
Behavior Analytics*	Abandoned Object, Intrusion Detection, Camera Sabotage Wrong Direction, Loitering Detection, Object Counting Object Removal, Stopped Vehicle

*Offer by request

Video	
Compression algorithm(s)	H.265, H.264, MJPEG
Number streams	4x, individually configurable H.265/H.264/MJPEG streams in resolution, frame rate and bandwidth.
Supported resolutions	3840x2160, 3200x1800, 1920x1080, 1280x1024, 1280x720, 1024x768, 800x600, 720x480, 640x480, 352x240

Specs



Video				
Max streaming (H264/H265/MJPEG)				
60fps	1920x1080	1920x1080	352x240	
30fps (HDR)	3840x2160	800x600		
30fps (HDR)	3200x1800	1920x1080	800x600	
30fps (HDR)	1920x1080	1920x1080	1920x1080	1920x1080
Compression bit rate control	Constant bit rate (CBR), variable bit rate (VBR), Low bit rate (LBR)			
Max frame rate MJPEG	1080p (1920x1080) @ 30 fps			
Compression bit rate control	Low bit rate (LBR), constant bit rate (CBR), variable bit rate (VBR)			
Output bit rate (per stream)	Up to 10240 kbit/s			
Number of clients	Up to 20 (RTSP)			
Total output data rate (max)	50000 kbit/s			

Audio	
Two-way audio	Line in, Line out
Compression	G.711 (μ-law, a-law) / G.726 / AAC / LPCM
Input level, Output level	Adjustable gain
Connector type	Female phone jacks, 3.5 mm

Alarm inputs/output	
Input	2x 0 - 5V 10k pull-up, 0.5A as limit
Output	1x Photo relay output 300 Vdc/ac, 0.13A as limit
Connector type	Terminal block on breakout cable

Storage	
Storage options	Supports up to 512 GB capacity of SD/SDHC/SDXC memory (vFAT/EXT4)
Network storage	NAS

Network	
Interface(s)	100/1000 Mb Ethernet
Connector type	RJ-45
Protocols	IPv4/IPv6 (ICMP), HTTP, HTTPS (TLS1.2), 802.1x, QoS, FTP, SMTP(SSL), UPnP, SNMP(v1/v2/v3/Traps), DNS, DDNS, NTP, RTSP, RTCP, RTP/UDP, TCP/IP, IGMP(v2/v3), DHCP, PPPoE
Security	User authentication, Digest authentication (RTSP, HTTP), HTTPS encryption (TLS1.2); IEEE 802.1x port-based network access control, IP filtering
Standard	ONVIF (Profile S, Profile G, Profile T), Siqua API
Supported browsers	Internet Explorer 11, Edge, Chrome, Firefox, Safari
Password levels	User and Administrator
User accounts	20

Powering	
Power consumption	Max. 13.68 W, including heater
Power	24 VAC +/- 10%; 12 VDC +/- 10%; PoE (IEEE 802.3af class 0, max 12.95W)

Specs



Powering

Connector type	1x 4 Pin terminal block
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Environmental

Operating temperature	-55°C to 60°C (-67°F to 140°F)
Relative humidity	10% to 100%, with condensation

Mechanical

Dimensions	diameter133.8 x 117.4 mm
Weight	760 g
Color	RAL 9003 (Signal white)
Ingress protection	IP66
Impact rating	IK10

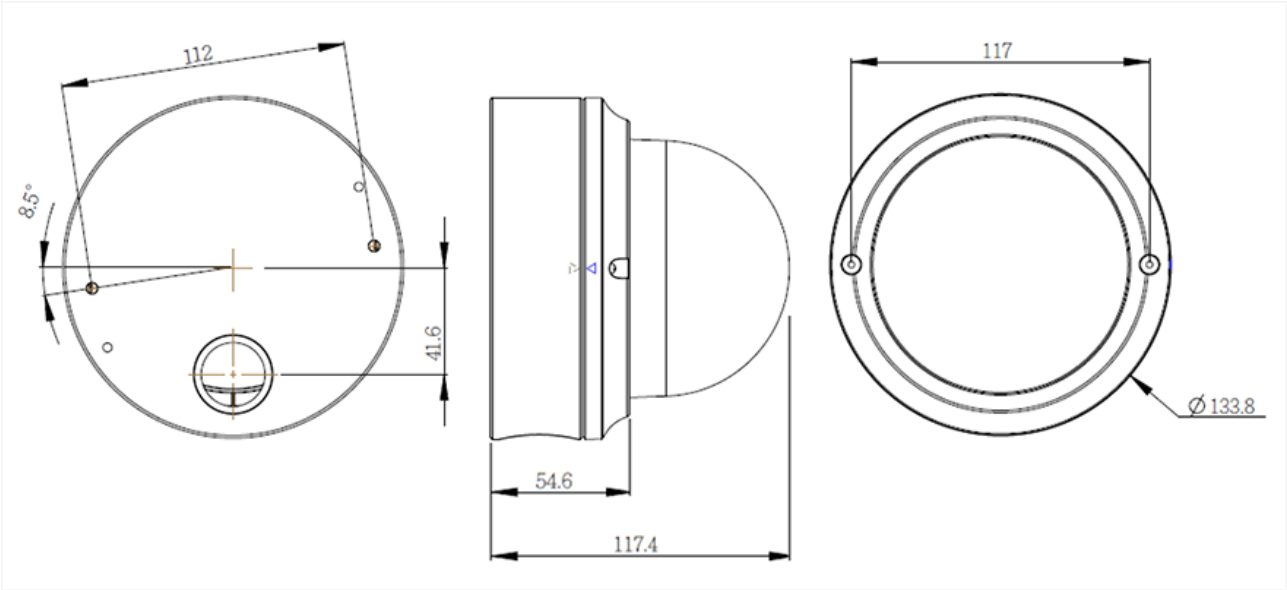
Ordering information

FD980	4K fixed domecamera, 4-8mm motorized, H.265/H.264/MJPEG
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Accessories

CM13/FD	Flush mount kit for FD800, FD910 and FD980 series
TA01/FD	Tube adapter/pendant mount for FD800, FD910 and FD980 series
WM19/FD	Wall mount for FD800, FD910 and FD980 series
DC21	Dome cover, transparent, vandal proof, for FD910, FD950, FD980
DC21S	Dome cover, smoked, vandal proof, for FD910, FD950, FD980

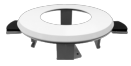
DIMENSION IN MM



RELATED



TKH Security WM19/FD
Wall mount for FD820v2, FD910, FD950, FD980 (Obsolete)



TKH Security CM13/FD
Flush mount kit for FD800, FD910, FD950, FD980 series



TKH Security TA27
Tube adapter/pendant mount for FD810, FD820v2, FD910, FD950, FD980, FD360



TKH Security DC21
Dome cover, transparent, vandal proof, for FD910, FD950, FD980



TKH Security DC21S
Dome cover, smoked, vandal proof, for FD910, FD950, FD980