



## Feature:

1. Full HD image: using 1/2.8-inch 2.07 million pixel high-quality image sensor, the maximum resolution can reach 1920x1080, and the output frame rate is up to 60 frames/second
2. Optical zoom lens: with 12X optical zoom lens
3. Leading autofocus technology: advanced autofocus algorithm enables the lens to complete autofocus quickly, accurately and stably
4. Low noise and high signal-to-noise ratio: low noise CMOS effectively guarantees the ultra-high signal-to-noise ratio of the camera video. Using advanced 2D and 3D noise reduction technology, the noise is further reduced while ensuring image clarity
5. Multiple video output interfaces: support HDMI, SDI, USB, wired LAN (POE function optional); SDI supports 100 meters transmission in 1080P60 format
6. Multiple audio and video compression standards: support H.265/H.264 video compression, support AAC, MP3, G.711A audio compression; support up to 1920x1080 resolution 60 frames/second compression
7. Audio input interface: support AAC, MP3, G.711A audio encoding, AAC, MP3 encoding support 16000, 32000, 44100, 48000 sampling frequencies, G.711A encoding only supports 8000 sampling frequencies
8. Multiple network protocols: support ONVIF, GB/T28181, RTSP, RTMP protocols; support RTMP push mode, easily connect to streaming media servers (Wowza, FMS); support RTP multicast mode, support network full command VISCA control protocol
9. Control interface: RS485, RS232; RS232 supports cascading, which is convenient for engineering installation and use
10. Multiple control protocols: Support VISCA, PELCO-D, PELCO-P protocols, and support automatic identification protocols
11. Super silent PTZ: Adopt high-precision stepper motor and precision motor drive controller to ensure that the PTZ runs smoothly at low speed and without noise
12. Low-power sleep function: Support low-power sleep/wake-up, and the power consumption is less than 400mW when in sleep
13. Multiple preset positions: Support up to 255 preset positions (the remote control setting is 10)
14. Multiple remote controls: Users can choose infrared remote control or wireless remote control according to the environmental conditions used. 2.4G wireless remote control is not affected by angle, distance, and infrared interference. Support remote control signal transparent transmission function, which is convenient for back-end equipment to use
15. Many application places: distance education, teaching recording and broadcasting, conference system, remote training, telemedicine, trial system, emergency command system, etc

### ► Specification:

Image sensor	1/2.8 inch high-quality CMOS sensor
Effective pixels	2.07 million, 16:9
Video signal	HDMI/SDI/
Interface video format	1080P60/50/30/25/59.94/29.97; 1080i60/50/59.94; 720P60/50/59.94
U2 interface video format	320x240/352x288/640x360/640x480/704x576/704x480/720x576/800x448/800x600/960x540/1024x576/1024x768/1280x720/1920x1080P30/25/20/15/10/5
Lens optical zoom	12x optical zoom
f=3.9 ~ 46.8mm	
Viewing angle	6.6° (narrow angle) 70.4° (wide angle)
Aperture coefficient	F1.8 – F2.4
Digital zoom	X10
Minimum illumination	0.5Lux (F1.8, AGC ON)
Digital noise reduction	2D & 3D digital noise reduction
White balance	Auto/Manual/One-touch white balance/ 3000K/3500K/4000K/4500K/5000K/5500K/6000K/6500K/7000K
Focus	Auto/Manual/One-touch focus
Aperture	Auto/Manual
Electronic shutter	Auto/Manual
Backlight compensation	On/Off
Dynamic range	Off/Dynamic level adjustment
Video adjustment	Brightness, contrast, sharpness, horizontal flip, vertical flip (displayed when auto flip is off), black and white mode, gamma curve, electronic zoom, DCI, lens distortion correction
Signal-to-noise ratio	>55dB
Interface function performance	
Product interface	HDMI, SDI, LAN (support POE), USB2.0, A-IN, RS232-IN,
RS232-OUT,	RS 485, rotary dial, DC12V power supply
Video output interface	HDMI, SDI, LAN, USB2.0
Video compression format	LAN interface supports: H.264, H.265
USB 2.0 interface supports	MJPEG, H264, H.265, YUY2, NV12
Audio input interface	dual-channel 3.5mm linear input
Audio output interface	HDMI, LAN, USB2.0
Audio compression format	AAC, MP3, G.711A
Network interface	100M network port, POE power supply optional, support audio and video output
Network protocol	RTSP, RTMP, ONVIF, GB/T28181; support network VISCA control protocol
Support	remote upgrade , remote restart, remote reset
Control interface	RS232-IN, RS232-OUT, RS485
Serial communication protocol	VISCA/Pelco-D/Pelco-P; support baud rate 115200/38400/9600/4800/2400
USB communication protocol	UVC (video communication protocol), UAC (audio communication protocol)

Power interface	HEC3800 power socket (DC12V)
Power adapter	input AC110V~AC220V ; Output DC12V/1.5A
Input voltage	DC12V±10%
Input current	<1A
Power consumption of the whole machine	<12W
PTZ parameters	
Horizontal rotation	-170° ~ +170°
Pitch rotation	-30° ~ +90°
Horizontal control speed	0.1°/s ~ 100°/s
Pitch control speed	0.1°/s ~ 30°/s
Preset speed	horizontal: 60°/s, pitch: 30°/s
Number of preset positions	Users can set up to 255 preset positions (10 for remote control)
Other parameters	
Storage temperature	-10°C ~ +60°C
Storage humidity	20% ~ 95%
Operating temperature	-10°C ~ +50°C
Operating humidity	20% ~ 80%
Dimensions	258 (length) mm×172 mm (width)×169 mm (height)
Weight (approx.)	about 1.54 kg
Usage environment	indoor