

## 360-degree Hemispheric-view Camera with a 5-megapixel CMOS Sensor

- Maximum resolution of 2560 x 1920 pixels with a 5-megapixel CMOS sensor
- 360-degree hemispheric imaging technology with a panomorph lens from ImmerVision
- Advanced de-warping technology with video management software (VMS) for immersive monitoring
- Solid PTZ for easy and rapid-response camera manipulation in every hemispheric image
- A variety of view modes including 360-degree hemispheric view, 180-degree panoramic view, and multiple screen views
- Edge Storage for onboard recording with microSD/SDHC cards
- IK10-rated vandal-resistant and IP66-rated water-resistant/dust-tight features



### KEY FEATURES

- Hemispheric imaging technology with a panomorph lens from ImmerVision; this captures 360 degrees of real-time video, outperforming any conventional fisheye lenses with superb image quality and greater coverage
- Advanced dewarping technology for immersive monitoring to efficiently correct for the distortion of a hemispheric image and newly produce rectangular images with video management software (VMS); this maintains higher video quality than produced at the camera level and it is achieved without incurring the image degradation typically caused by camera processing limitations during the dewarping process
- Solid PTZ to navigate the camera's visible area in every hemispheric image by its digital pan, tilt, and zoom functionalities for easy and rapid-response manipulation
- A variety of multiple view modes capable of 360-degree immersive navigation, including the camera's original 360-degree hemispheric view, a 180-degree panoramic view and multiple simultaneous views all produced from the same hemispheric image

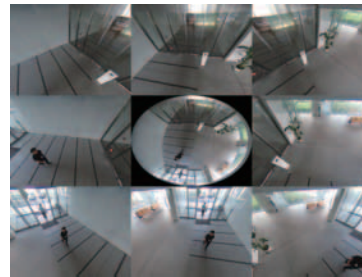


This 360-degree hemispheric view is produced with a much larger footprint on the image sensor using more pixels than the circular-shaped footprint with conventional fisheye lenses; there is better resolution uniformity over the entire image than with fisheye lenses, achieved by applying more pixels on the periphery of the image.





A 180-degree panoramic view produced from the hemispheric image.

(Actual images)



A sample of multiple view\* settings displaying one 360-degree hemispheric image at the center of the display, surrounded by the other eight regional images.  
\*Each VMS manufacturer offers different view settings.

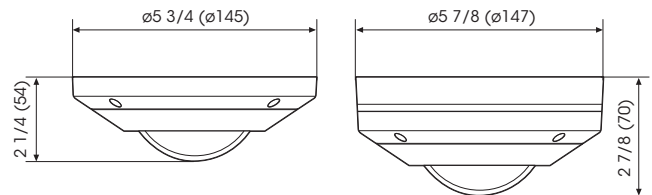
- Edge Storage function to record video and audio data with a microSD/SDHC card attached to the camera
- IK10-rated vandal-resistant feature to protect the camera from destructive behaviors
- IP66-rated water-resistant and dust-tight feature for outdoor surveillance and for indoor locations where water ingress may pose an issue
- Day/Night function to switch to Day or Night mode depending on the light level
- VBR (variable bitrate) or CBR (constant bitrate) compression mode selectable to correspond with various network conditions and G711/AAC (64 kHz to 128 kHz) audio codecs for high-quality recording
- Fully compatible dewarping with all major VMS platforms and other solutions that are certified ImmerVision Enables 
- ONVIF™ (Open Network Video Interface Forum) Profile S conformance firmware that ensures greater interoperability and more flexibility in building multiple-vendor systems 
- Built-in microphone
- Easy initial network settings by supplied SNC Easy IP Setup Guide application

## SPECIFICATIONS

SNC-HM662	
<b>Camera</b>	
Image Sensor	1/2.5-type progressive scan CMOS sensor
Number of Total Pixels	Approx. 5 Megapixels
Minimum Illumination (50 IRE)	Color: 0.7 lx (F2.0, AGC ON, 1/30 s, 10 fps) B/W: 0.3 lx (F2.0, AGC ON, 1/30 s, 10 fps)
Minimum Illumination (30 IRE)	Color: 0.4 lx (F2.0, AGC ON, 1/30 s, 10 fps) B/W: 0.1 lx (F2.0, AGC ON, 1/30 s, 10 fps)
Dynamic Range	More than 60 dB
Gain	Auto
Shutter Speed	1/5 s to 1/32,000 s
Exposure Control	Exposure compensation, AGC, Shutter speed
White Balance	ATW, Manual
Lens	Fixed lens
Zoom Ratio	Digital 12x
Horizontal Viewing Angle	182°
Vertical Viewing Angle	182°
Focal Length	f = 0.98 mm to 1.12 mm
F-Number	F2.0
Minimum Object Distance	500 mm
Number of Preset Positions	20
Number of Tour Programs	20
<b>Camera Features</b>	
Day/Night	Yes
360° Hemispheric/ 180° Panoramic View Modes	Yes
Number of View Modes	11
Auto-rotation Mode	Yes
e-Flip	Yes
Wide-D	Yes
Tone Correction	Yes
Privacy Masking (number)	5
Privacy Masking (shape)	Quadrangle formed by any four corner points
Privacy Masking (color/effect)	Black
Edge Storage	Yes
Vandal Resistant	IK10
Ingress Protection	IP66
Menu Language	English, Japanese, Chinese (simplified), Chinese (traditional), French, Spanish, German, Italian, Korean, Portuguese, Russian, Arabic, Hindi, Vietnamese, Thai
<b>Video</b>	
Resolution	2560 x 1920, 2048 x 1536, 1600 x 1200, 800 x 600, 640 x 480 (Hemispheric mode: H.264, JPEG) 1920 x 1080, 1600 x 904, 1360 x 768, 1280 x 720, 640 x 360 (1080p mode: H.264, JPEG)
Compression Format	H.264 (High/Main/Baseline Profile), JPEG
Maximum Frame Rate	H.264: 10 fps (2560 x 1920) JPEG: 13 fps (2560 x 1920)
Bitrate Compression Mode	CBR/VBR (selectable)
Range of Bitrate Setting	20 Kbps to 16 Mbps
Image Cropping	1920 x 1080
Solid PTZ	Yes
Bandwidth Control	Yes
Multi Streaming Capability	Triple streaming
Number of Clients	10
<b>Intelligent Video Analytics</b>	
Intelligent Motion Detection	Yes
Tamper Alarm	Yes
<b>Audio</b>	
Compression Format	G.711/AAC (64 kHz to 128 kHz)
<b>System Requirements</b>	
Operating System	Windows® XP (32 bit) Professional Edition Windows Vista® (32 bit) Ultimate, Business Edition Windows 7 (32/64 bit) Ultimate, Professional Edition Windows 8 Pro (32/64 bit)
Processor	Intel Core™ 2.8 GHz or higher
Memory	2 GB or more
Web Browser	Microsoft Internet Explorer® Ver. 8.0, Ver. 9.0, Ver 10.0 (32 bit)

SNC-HM662	
<b>Network</b>	
Protocols	IPv4, TCP, UDP, ARP, ICMP, IGMP, HTTP, DHCP, DNS, NTP, RTP/RTCP, RTSP over TCP, RTSP over HTTP, SMTP, IPv6, HTTPS, SNMP (v1, v2c, v3), SSL
QoS	DSCP
Multicast Streaming Support	Yes
ONVIF Conformance	Profile S
Authentication	IEEE 802.1X
<b>Interface</b>	
Microphone Input	Built-in Microphone/External MIC-IN
Line Output	Yes
Network Port	10BASE-T/100BASE-TX (RJ-45)
Alarm Input (Sensor Input)	Yes
Alarm Output	Yes
Card Slots	microSD
Confirmed SD Card Type	microSDHC (no support for microSDXC)
<b>General</b>	
Power Requirements	IEEE 802.3af compliant (PoE system)
Power Consumption	6.0 W max.
Operating Temperature	-22°F to +122°F (-30°C to +50°C) (tentative)
Cold Start Temperature	-4°F to +122°F (-20°C to +50°C)
Storage Temperature	-13°F to +140°F (-25°C to +60°C)
Operating Humidity	20% to 90%
Storage Humidity	20% to 95%
Dimensions (W x H x D)	Approx. ø5 3/4 inches x 2 1/4 inches (ø145 mm x 54 mm) without a mounting plate
Weight	Approx. 1 lb 7 oz (640 g) without a mounting plate
External Material	Aluminium and polycarbonate
External Color	Black and white
Fire Retardant	UL94HB
Safety Regulations	UL2044, IEC60950-1, IEC60950-22, FCC Class B, IC Class B, EN 55022 Class B, EN55024 Class B, EN50130-4, EN61000-4-2, EN61000-4-3, EN61000-4-4, EN61000-4-5, EN61000-4-6, EN61000-4-8, EN61000-4-11, Clause 7 of EN50130-4, AS/NZS EN55022 Class B, VCCI Class B, Korea EMC (K00022 + K00024), Russia EAC, EN50155, EN50121-3-2, IEC61373
Supplied Accessories	Mounting plate (1) I/O cable (1) Alignment sticker for camera base (1) Alignment sticker for mounting plate (1) Screw driver (1) Desiccant bag (1) Double-sided tape (1) Rubber seal plug (1) Rubber washer (1) Screw (for mounting plate) (1) Installation manual (1) Warranty card (1) Safety regulations for network camera (1) CD-ROM (supplied program) (1)

## DIMENSIONS



A supplied mounting plate is attached.

Unit: inches (mm)