

# CM70-IP

## Avonic PTZ Camera 20x Zoom IP

The Avonic CM70 is a premium-quality PTZ camera that includes a rich feature set usually found only on broadcast-grade cameras including PoE, low latency 3G-SDI and balanced audio embedding.

Optional premium features consist of SRT streaming, a Tally light and a customizable Color Matrix. The camera with IP, HDMI and 3G-SDI outputs is designed for fixed installations and works very well in low light conditions.

The Camera is equipped with high-quality components like a Panasonic High SNR CMOS sensor with digital noise reduction and a High Quality glass lens. Control the camera over IP, RS232 or RS485 with any controller with VISCA or PELCO support.



## Features

### Lens

High-quality glass lens, 20x optical zoom and 55.2° horizontal field of view.

### Low light

High SNR CMOS combined with digital noise reduction for a clear picture under very low light conditions.

### Full HD 1080p60

The camera has a Full HD resolution of 1920 x 1080p60 and achieves a pristine image quality.

### IP-features

The camera can be powered using PoE (802.3af) and can be accessed by a WebGUI, controlled by VISCA over IP / Onvif for video streaming.

### Dual low-latency IP Stream

H265, H264, optional SRT and MJPEG compression at a bitrate up to 40Mbit, enabling Full HD video stream by ultra-low latency over RTSP, RTMP, UDP, Unicast and Multicast.

### Outputs

3G-SDI, HDMI, USB 2.0 (1080p30) and IP.

### Control

Control the camera with common protocols: VISCA, Pelco-D / P via RS232, RS485, IP (VISCA), Onvif or IR. Remote control included. Supports up to 255 presets with 0.1° accuracy and High-Speed Pan Tilt function.

### Audio embedding

Balanced audio input with embedding into IP stream, SDI, HDMI outputs. Includes configurable audio offset.

### Optional Premium features

SRT streaming, Tally light, configurable Color Matrix. License AV-LC70-1 sold separately.

## Applications

- Education
- Video Conferencing
- Broadcasting
- Live Events
- Churches
- Healthcare
- Courtroom
- And more

# Specifications

## Camera

<b>Video Systems</b>	1920x1080/ 1280x720 p60/ 50/ 30/ 25/ 59.94/ 29.97
<b>Sensor</b>	1/3" CMOS, 2.12mp, 16:9
<b>Shutter</b>	Auto, Manual, 1/25 ~1/10000
<b>Scanning mode</b>	Progressive, Interlaced (not over IP)
<b>Zoom/Aperture/Focal length</b>	20x optical/ F1.8-F11/ 4.4-88.8 mm
<b>Minimal Illumination</b>	0.05 LUX
<b>White Balance</b>	Auto, Manual, OnePush, 2400K-7100K in steps of 100K
<b>Backlight Compensation</b>	supported
<b>Digital Noise Reduction</b>	2D & 3D DNR
<b>Signal Noise Ratio</b>	>55 dB
<b>Horizontal FOV wide ~ tele</b>	55.2° ~ 3.2°
<b>Vertical FOV wide ~tele</b>	42.1° ~ 2.4°
<b>Horizontal rotation</b>	-170° ~ +170°
<b>Vertical rotation</b>	-30° ~ +90°
<b>Pan speed range</b>	1.7 ~ 120°/s
<b>Tilt speed range</b>	1.7 ~ 70°/s
<b>H&amp;V image flip</b>	supported
<b>Number of presets</b>	255
<b>Preset accuracy</b>	0.1

## IP features

<b>Video coding standard</b>	H.265 / H.264 / MJPEG
<b>H.265 Profiles</b>	main
<b>H.264 Profiles</b>	main, base high
<b>Main stream resolution</b>	1920x1080 / 1280x720
<b>Main stream max frame rate</b>	60fps
<b>Main stream bitrate</b>	64 ~ 40960 Kbps
<b>Sub stream resolution</b>	320x180 / 320x240 / 640x360 / 1280x720 / 1920x1080
<b>Sub stream max frame rate</b>	30fps
<b>Sub stream bitrate</b>	64 ~ 40960 Kbps
<b>Video bitrate type</b>	Variable, Fixed
<b>Support protocols</b>	RTSP, RTMP, ONVIF, SRT, Multicast, Unicast
<b>Audio standard</b>	AAC / mp3 / G.711A
<b>Audio bitrate</b>	32, 64, 96, 128 Kbps
<b>Audio sample rate</b>	16, 32, 44.1, 48 Khz
<b>Audio line in</b>	balanced audio line in via 5-way Phoenix connector.

## Input / Output Interface

<b>HDMI output</b>	1.4
<b>SDI output</b>	3G-SDI, SMPTE 425M level A, 10-bit YCbCr 4:2:2
<b>USB Output</b>	USB 2.0 (max. 1080p30)
<b>Network interface</b>	RJ45 100 Mbit
<b>Serial communication</b>	RS232 mini DIN-8, RS485 2pin Phoenix
<b>Serial control protocol</b>	VISCA, PELCO-P PELCO-D
<b>IP control protocol</b>	VISCA OVER IP, Onvif

## General Specifications

<b>Input voltage</b>	12V
<b>PoE</b>	PoE 12W (802.3af)
<b>Power consumption</b>	12W
<b>Power supply</b>	12V2A
<b>Power connector</b>	EIAJ-4 - Philmore 255 plug
<b>Operating temperature</b>	-5°C ~ 40°C
<b>Storage temperature</b>	-20°C ~ 60°C
<b>Operating humidity</b>	20% ~ 95% non-condensing
<b>Bottom fastening screw thread</b>	1/4" 20 UNC
<b>Color</b>	Black, White
<b>Dimensions product wxhxd</b>	133 x 180 x 149 mm. excl.
<b>Weight product</b>	1.5 kg
<b>Dimensions box</b>	26 x 24 x 24 cm
<b>Weight box</b>	2.4 kg
<b>Included</b>	power adapter, remote control, RS232 cable, RS485 2-way Phoenix connector, Balanced Audio, Line-In 5-way Phoenix connector

## Versions

<b>Black</b>	CM70-IP-B
<b>White</b>	CM70-IP-W

## CE Marking



## Back of the Camera

