

Leading the Way in Megapixel Video™

SurroundVideo®WDR

H.264 All-in-One 180° and 360° Panoramic WDR Day/Night Indoor/Outdoor Dome IP Cameras



Camera Models

| 12MP Panoramic 180° | 12MP Panoramic 360° | |
|---------------------|---------------------|--|
| AV12186DN | AV12366DN | |

The H.264 12MP SurroundVideo® WDR is the industry's first wide dynamic range panoramic camera. The new SurroundVideo® WDR is an all-in-one solution with a dynamic range of up to 100dB at full resolution, has a dual encoder (H.264 and MJPEG), an impact-resistant dome, and is 50% smaller than previous SurroundVideo® models. A SurroundVideo® camera can replace multiple fixed or PTZ cameras by recording the entire panoramic field of view with the ability to zoom into multiple regions of interest—a return on investment that's easily measured.









360° Panoramic Wide Dynamic Range

All-in-One Dome Solution with Integrated Lens



IK-10 and IP66 Rated





with IR Cut Filter

True Day/Night



Dual Encoder H.264/MJPEG

Features:

- Industry's First 12MP WDR Panoramic Megapixel Cameras
- True WDR up to 100dB at Full Resolution: See Clearly in Shaded and Bright Light Conditions Simultaneously
- Forensic Zooming Zoom Live or After the Event While Recording Full Field-of-View in HD - Replace PTZ Devices
- · Binning Mode for Strong Low Light Performance
- · Bit Rate Control and Multi-Streaming
- True Day/Night Functionality with Electro-Mechanical IR Cut Filter
- · Outdoor Rated IP66 and IK-10 Impact-Resistant Housing
- Total PoE Solution (No External Power Required)
- PoE and Auxiliary Power: 12–48V DC/24V AC
- Easily Adjustable 2-Axis Camera Gimbal with 360° Pan and 90° Tilt

- +/- 5° Electrical Vertical Alignment to Locate Each Sensor Position (180° Series)
- +/- 7° Mechanical Tilt Adjustment to Locate Each Sensor Angle (360° Series)
- Complete Mounting Options
- Dual Encoder H.264/MJPEG
- · Privacy Mask, Motion Detection, Flexible Cropping, Bit Rate Control and Multi-Streaming
- Fast Frame Rates 5.2fps @ 12MP
- · Reduced Overall System Cost
- · Made in the USA



Camera Imaging

| Model | AV12186DN | | AV12366DN | |
|------------------------------------|--------------------------------|----------------------|--------------------------------|----------------------|
| Image Sensor | 4 x 3MP CMOS WDR | | 4 x 3MP CMOS WDR | |
| Optical Format | 1/3.2" Progressive Scan | | 1/3.2" Progressive Scan | |
| Pixel Pitch | 2.2µm | | 2.2µm | |
| Minimum Illumination | Color | 0.5 Lux @ F2.0 | Color | 0.5 Lux @ F2.0 |
| | Color Binning | 0.25 Lux @ F2.0 | Color Binning | 0.25 Lux @ F2.0 |
| | Day/Night | 0 Lux, IR sensitive | Day/Night | 0 Lux, IR sensitive |
| Full Field of View (FOV)Resolution | Total | 8192 H x 1536 V | Total | 8192 H x 1536 V |
| | Per Sensor | 2048 H x 1536 V | Per Sensor | 2048 H x 1536 V |
| 1/4 Resolution | Total | 4096 H x 768 V | Total | 4096 H x 768 V |
| | Per Sensor | 1024 H x 768 V | Per Sensor | 1024 H x 768 V |
| Dynamic Range | Up to 100dB at Full Resolution | | Up to 100dB at Full Resolution | |
| Lens | 5.4mm, M12, F2.0, 1/3.2" | | 2.6mm, M12, F2.0, 1/2.5" | |
| Video Frame Rates | Max | 5.2fps (8192 x 1536) | Max | 5.2fps (8192 x 1536) |
| | | 16.7fps (4096 x 768) | | 16.7fps (4096 x 768) |

Data Transmission

| Compression Type | H.264 (MPEG-4, Part 10)/Motion JPEG |
|-------------------|--|
| | 21 levels of quality |
| Network Protocols | RTSP, RTP/TCP, RTP/UDP, HTTP, DHCP, TFTP |
| Network Interface | 100Base-T Ethernet |
| Multi-Streaming | 8 non-identical streams (2 per sensor) |

Electrical

| Input/Output | General purpose opto-coupled |
|-----------------------|--------------------------------|
| Power Over Ethernet | PoE 802.3af, Class 3 |
| Auxiliary Power | 12-48V DC and 24V AC |
| Max Power Consumption | 14 Watts Max (Auxiliary Power) |
| | |

Programmability

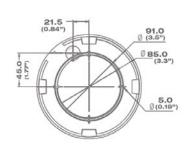
| | Auto adjustment between WDR and LDR modes |
|--|--|
| | Binning Mode |
| | Privacy mask |
| | Flexible Cropping (resolution windowing down to 1x1 pixel for JPEG and 2x2 pixels for H.264) |
| | +/-5° Digital Vertical Alignment to adjust images (AV12186DN) |
| | On-camera real-time motion detection with up to 1024 detection zones (per sensor) |
| | Auto multi-matrix white balance |
| | 50/60Hz selectable flicker control |
| | Electronic pan, tilt, zoom (PTZ) |
| | Programmable shutter speed to help control motion blur |
| | MoonLight™ Mode: extended exposure and proprietary noise cancellation |
| | Programmable resolution, brightness, saturation, gamma, sharpness, tint |
| | Simultaneous delivery of full field-of-view and zoomed images |
| | Bandwidth and storage savings by running at 1/4 resolution |
| | Bit rate and bandwidth limit control |
| | |

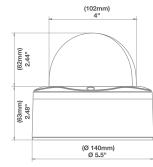
Mechanical

| Casing | Die-cast alumir bubble | num chassis with 4" polycarbonate dome | |
|------------|---|--|--|
| | IP66 weather proof standard | | |
| | Impact resistant, IK-10 rated | | |
| Gimbal | Easily adjustable, 2-axis w/360° pan and 90° tilt | | |
| Total Unit | Unit | Ø 5.5" (140mm) x 4.9" H (125mm) | |
| Dimensions | Bubble Only | Ø 4.0" (102mm) x 2.4" H (62mm) | |
| Weight | Unit | 2.8lbs (1.27kg) | |
| | Packaged | 3.4lbs (1.54kg) | |

Compliance

| Industry Standard | PSIA Conformant |
|-------------------|-------------------|
| Listings | UL (CB) |
| FCC Compliance | 47 CFR 15 Class A |
| Environmental | RoHS, REACH, WEEE |





Environmental

| Protection Ratings | IP66 water/dust protection rating |
|--------------------------|---|
| | IK-10 impact-resistant polycarbonate dome |
| Operating temperature | -40°C (-40°F) to +50°C (122°F) |
| Humidity | 0% to 90% (non-condensing) |
| Stable image temperature | 0°C (32°F) to +50°C (122°F) |
| Storage temperature | -40°C (-40°F) to +60°C (140°F) |

Accessories

| MD-WMT2 | Wall Mount w/1.5" NPT | |
|---------|------------------------------------|--|
| SV-EBA | Electrical Box Adapter for MD-WMT2 | |
| MD-CAP | Wall Mount Cap Only w/1.5" NPT | |
| MD-CMT | Pendant Mount | |
| MD-FMA | Flush Mount | |
| MD-CRMA | Corner Mount Adapter | |
| MD-PMA | Pole Mount Adapter | |
| MD-EBA | Electrical Box Adapter | |
| SV-JBA | Junction Box Adapter | |
| | | |

