

## AXIS 210/210A Network Cameras

Superior video quality for professional indoor applications

The AXIS 210 and AXIS 210A Network Cameras from the market leader in network video, are ideal for indoor surveillance and remote monitoring.

The network cameras provide the best image quality in their class, using a progressive scan CCD sensor and powerful real-time image processing hardware to guarantee full frame rate, even at VGA resolution. Connecting directly to IP networks, the built-in Web server, open application interface, and sophisticated networking functions based on open industry standards greatly simplify systems integration.

The AXIS 210A, with built-in Power over Ethernet – which enables power to be delivered to the camera via the network – reduces cabling requirements and installation costs, and consolidates power for higher reliability. Its additional integrated audio support including built-in microphone, enables remote users to not only view, but also listen in on an area and communicate orders or requests to visitors or intruders via two-way audio communication.

The AXIS 210 and AXIS 210A provide the perfect solution for securing offices, shops, schools and other facilities over the local area network or across the Internet.





- Superior image quality using progressive scan CCD and advanced video processing
- Simultaneous Motion JPEG and MPEG-4 streams optimize for quality and bandwidth
- Up to 30 frames per second in VGA 640 x 480 resolution
- Built-in motion detection with pre- and post-alarm image buffering
- Power over Ethernet support (IEEE 802.3af) simplifies installation (AXIS 210A)
- Integrated two-way audio support (AXIS 210A)



## AXIS 210/210A Network Cameras



AXIS 210A Network Camera

Specifications			
Models Image Sensor Lens	AXIS 210 AXIS 210A: Built-in Power over Ethernet and two-way audio 1/4" Sony Wfine progressive scan RGB CCD 4.0 mm, F2.0, fixed iris, horizontal viewing angle: 48°,	Installation, management and maintenance	Installation tool on CD and web-based configuration Configuration backup and restore SNMP support (AXIS 210A) Firmware upgrades over HTTP or FTP, firmware available at www.axis.com
Minimum	focus range: 0 mm to infinity, CS mount 3.0 lux, F2.0	Video access from Web browser	Camera live view, sequence tour capability for up to 20 Axis cameras, customizable HTML pages
illumination Video compression	Motion JPEG MPEG-4 Part 2 (ISO/IEC 14496-2), Profiles: ASP and SP	Minimum Web browsing requirements	Pentium III CPU 500 MHz or higher, or equivalent AMD 128 MB RAM AGP graphic card, Direct Draw, 32 MB RAM Windows XP, 2000, NT4.0*, ME* or 98*, DirectX 9.0 or later Internet Explorer 5.x or later For other operating systems and browsers see www.axis.com/techsup * Motion JPEG only
Resolutions	16 resolutions from 640 x 480 to 160 x 120 via API, 5 selections via configuration web page		
Frame rate	Up to 30 frames per second in all resolutions		
Video streaming	Simultaneous Motion JPEG and MPEG-4 Controllable frame rate and bandwidth Constant and variable bit rate (MPEG-4)	System integration support	Powerful API for software integration available at www.axis.com, including HTTP API, AXIS Media Control SDK, event trigger data in video stream, embedded scripting
Image settings	Compression levels: 11 (Motion JPEG)/23 (MPEG-4) Rotation: 90°, 180°, 270° Configurable color level, brightness, contrast, exposure, white		Watchdog secures continuous operation, can be monitored by other systems via event notification Embedded operating system: Linux 2.4
	balance, fine tuning of behavior at low light  Overlay capabilities: time, date, privacy mask, text or image	Supported protocols	IP, HTTP, TCP, ICMP, RTSP, RTP, UDP, IGMP, RTCP, SMTP, FTP, DHCP, UPnP, ARP, DNS, DynDNS, SOCKS, NTP etc. In addition for AXIS 210A: HTTPS, SSL/TLS*, SNMPv1/v2c/v3 (MIB-II). More information on protocol usage available at www.axis.com  *This product includes software developed by the Open SSL Project for
Audio (AXIS 210A)	Configurable for built-in or external microphone G.711 PCM 64 kbit/s, G.726 ADPCM 32 or 24 kbit/s, full duplex, half duplex, simplex or audio off		
Shutter time	2 sec to 1/12500 sec		use in the Open SSL Toolkit.
Security	Multiple user access levels with password protection IP address filtering, HTTPS encryption (AXIS 210A)	Applications (not incl.)	AXIS Camera Station - Surveillance application for viewing, recording and archiving up to 25 cameras
Users	20 simultaneous users Unlimited users using multicast (MPEG-4)		AXIS Camera Recorder - Surveillance application for viewing and recording up to 16 cameras
Alarm and event management	Events triggered by built-in motion detection, external input or according to a schedule	Included Accessories	AXIS Camera Explorer – Basic software for viewing and manual recording
	Image upload over FTP, email and HTTP  Notification over TCP, email, HTTP and external output		See www.axis.com/partner/adp_partners.htm for more software applications via partners
	Pre- and post alarm buffer: AXIS 210: 1.2 MB (up to 40 sec of 320x240 video at 4 frames per sec) AXIS 210A: 9 MB (up to 5 min of 320x240 video at 4 frames per sec)		Power supply 9 V DC, stand, connector kit, Installation Guide, CD with installation tool, software and User's Manual, MPEG-4 licenses (1 encoder, 1 decoder), MPEG-4 decoder (Windows)
Connectors	Ethernet 10BaseT/100BaseTX, RJ-45 Terminal block for I/O (1 alarm input, 1 output) and alternative power connection AXIS 210A: 3.5 mm jack for Mic in (max 270 mVpp) or Line mono input (max 3.2 Vpp), 3.5 mm jack for Line mono output (max 3.0 Vpp) to active speaker	Accessories (not incl.)	AXIS 292 Network Video Decoder AXIS MPEG-4 Decoder 10 user license pack Power over Ethernet midspans
Processors, memory and clock	CPU: ETRAX 100LX 32bit Video processing and compression: ARTPEC-2 RAM: 32 MB (AXIS 210A), 16 MB (AXIS 210) Flash: 8 MB (AXIS 210A), 4 MB (AXIS 210) Battery backed up real-time clock	Approvals	EMC: EN55024: 1998+A1 +A2, EN55022: 1998+A1 Class B, EN61000-3-2:2000, EN61000-3-3: 1995+A1 FCC Part 15 Subpart B Class B, VCCI: 2003 Class B ITE, C-tick AS/NZS 3548 and ICES-003 B by compliance with EN55022:1998 Class B
Power	7-20 V DC max 5 W, or (AXIS 210A) Power over Ethernet (IEEE 802.3af) with power classification: Class 2 (max 6.49 W)	Dimensions	Safety: UL and CSA (power supply), EN60950 38 x 88 x 146 mm (11/2" x 37/16" x 53/4")
Operating conditions	5 - 45 °C (41 – 113 °F) Humidity 20 - 80% RH (non-condensing)	(HxWxD) and weight	AXIS 210: 305 g (10 <sup>3</sup> / <sub>4</sub> oz) excl. power supply AXIS 210A: 325 g (11 <sup>1</sup> / <sub>2</sub> oz) excl. power supply



Interlaced, 20 ms difference between odd and even lines



Progressive Scan, all lines are captured at the same time

Progressive scan is used instead of the interlaced method found in analog CCTV (PAL/NTSC) cameras. With progressive scan all pixels (lines) are captured at the same time, enabling moving images to be presented without distortion.



Cabling requirements and installation costs are reduced by the built-in support for Power over Ethernet and audio, enabling power to the cameras and two-way audio for the AXIS 210A to be delivered over the network.



