AXIS 2460 Network DVR

Digital video. Recorded locally. Viewed globally.

Sophisticated, flexible yet brilliant in its simplicity, the awardwinning AXIS 2460 Network DVR takes digital video recording to a completely new level of advancement. Connect it directly to a TCP/IP network and remotely access digital video and system administration tools, using a standard web browser. Accommodating up to four analog cameras with or without Pan/Tilt/Zoom, it has its own built-in web server and is completely self-maintained. No need for tapes, tangles or expensive maintenance!

Retaining important video sequences for longer than any other DVR solution, the AXIS 2460 offers an almost inexhaustible local recording resource for security video —using revolutionary APViS™ (Axis Prioritized Video Storage) technology*.

Used as a single stand-alone system for a small business, or as an autonomous component within a globally distributed video surveillance system, the AXIS 2460 is perfect for use within large retail chains, franchise operations, or any business that requires convenient network access to live or recorded surveillance video.

*Patented

- Stores important video for longer using revolutionary APViS Technology

- Fault tolerant system with data base mirroring and distributed video storage

- Self-contained and self-maintained system

- Simultaneous viewing, recording, playback, and administration via web browser

- Support for Pan/Tilt/Zoom units

AXIS ®
COMMUNICATIONS

Innovative APViS™

Stores important video for longer

Older video recordings can contain vital visual evidence. But when the hard disk in any conventional DVR is full, it is simply the oldest recordings that are indiscriminately erased in order to make room for new ones. It's standard FIFO logic: the First image In is the First one Out. But, is this really the smartest way of managing modern surveillance video?
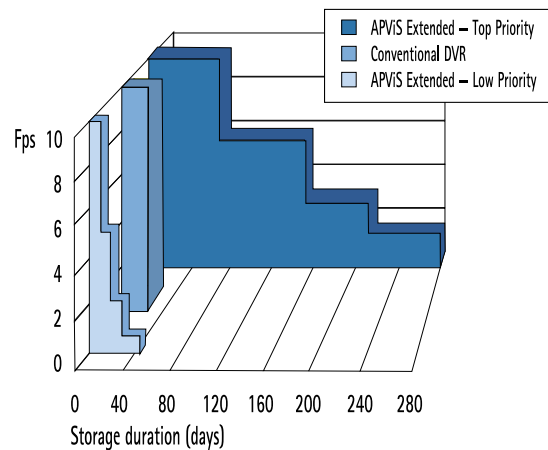
Using innovative APViS technology, the AXIS 2460 Network DVR makes more efficient use of valuable disk space to preserve video recordings for longer. Flexible event management makes it possible to define up to 100 separate events, combine scheduling with alarm inputs, and by intelligently using event and alarm data, it cleverly differentiate between 'important' and 'less important' video.

Using these criteria, the AXIS 2460 is able to store top priority video sequences at their original recording rate up to four times longer than any conventional FIFO storage solution — and up to sixteen times longer using an incrementally reducing framerate. In practical terms, this can be the dramatic difference between having the evidence — and not having it!

Example

The graph below displays typical storage times for APViS 'Extended' recording mode versus conventional 'FIFO' storage, based on the following configuration:

- Original recording frame rate = 10 fps
- Average image size = 8kB
- 1 x camera
- 4 x 40GB IDE HD
- Continuous low priority recording, and a single top priority alarm recording with 30 minute duration

Legend:
- APViS Extended — Top Priority
- Conventional DVR
- APViS Extended — Low Priority

Fps axis: 0, 2, 4, 6, 8, 10
Storage duration (days): 0, 40, 80, 120, 160, 200, 240, 280

Secure Storage. Secure Video.

In security applications, consistent quality of the recorded image is vital. With three different resolutions available per connected camera, the AXIS 2460 records in Motion JPEG format and guarantees consistent high-quality on each and every image.

The unique use of database mirroring and distributed video storage on all available hard disks allows the AXIS 2460 to tolerate hard disk failure without losing vital parts of video recordings. The practical implication of hard disk failure is a relative reduction in the frame rate of the recordings.

AXIS 2460 has three levels of user/password protection, with built-in firewall functionality based on IP filtering for secure remote system access over TCP/IP networks.

Flexible Network Configuration

Stand-alone or components within globally distributed systems

With over 90% of archived video recordings often never even looked at, decentralized video recording avoids unnecessary network utilization and makes sense when network bandwidth is limited.

An AXIS 2460 Network DVR has its own built-in web server and is securely accessed from any remote geographical location using Microsoft Internet Explorer.

By deploying a single AXIS 2460 in each remote site, organizations now have the opportunity to build large globally distributed video storage systems, whereby users can view video and control Pan/Tilt/Zoom as well as managing recorded material from anywhere over TCP/IP networks.
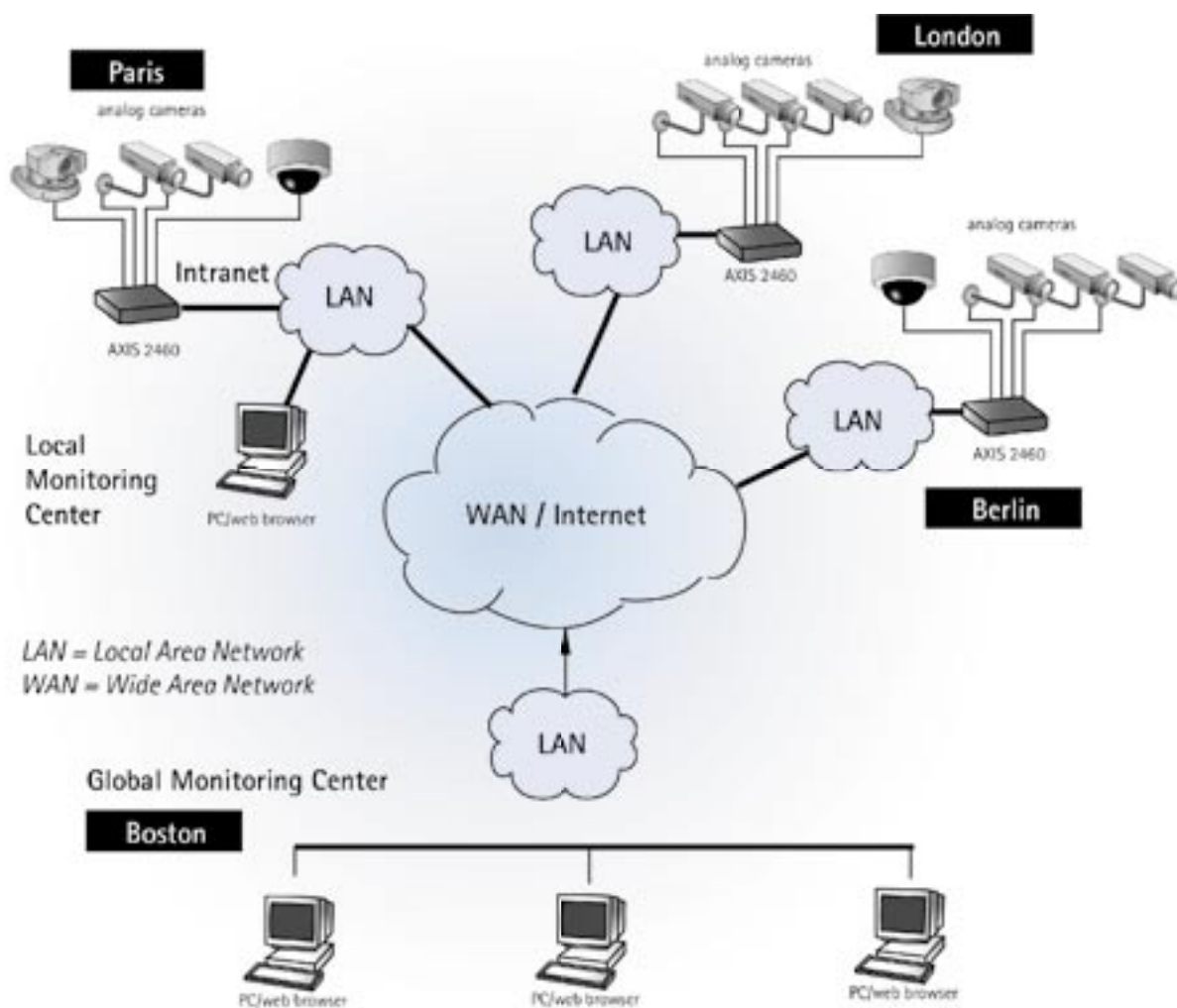
A globally distributed system comprising several AXIS 2460 Network DVRs

General Features

- Simultaneous live remote viewing, recording, playback and administration via a web browser
- Consistent high-quality digital images that do not deteriorate with age
- Continuous, event/alarm, manual and scheduled recording modes
- Snapshots and AVI extraction to PC hard disk or any preferred digital media
- Self-maintained system requires no physical intervention during normal operation
- Self-contained system requires no additional software components
- Support for Pan/Tilt/Zoom units, see www.axis.com for more information
- Quad view display
- User-selectable settings for frame rate, compression and resolution
- Event notification via e-mail
- Pre-alarm buffer and recording duration settings

System Requirements

- Ethernet network or supported v.90 compatible modem
- Internet Explorer 5.x or higher
- Supports standard Internet TCP/IP protocols and can be used with: Windows NT/2000, Me, and XP

System

- 100baseTX Fast Ethernet or 10baseT Ethernet
- CPU: AXIS ETRAX 100 LX 32 bit RISC processor
- Flash memory: 4 MB
- RAM: 32 MB
- Based on Linux version 2.4 operating system
- Shipped with optional 0, 2 or 4 IDE hard disks

Installation

- Physical network connection using RJ-45 twisted pair cable
- Installs directly to NTSC or PAL video cameras using BNC connectors

Software Updates

- Flash memory allows central and remote software updates over the network using FTP over TCP/IP. Software upgrades available from Axis' web site at: www.axis.com

Front Panel Control And Indicators

LED Indicators

- 4 x video indicators, 4 x alarm active indicators, 1 x power indicator, 1 x status indicator, 1 x disk activity indicator and 1 x network activity indicator

Push-button Controls

- 1 soft power on/off button

Resolution

- QCIF: 176 x 120 (NTSC), 176 x 144 (PAL)
- CIF: 352 x 240 (NTSC), 352 x 288 (PAL)
- 4CIF: 704 x 480 (NTSC), 704 x 576 (PAL)

Recording Frame Rate

- 1 camera: CIF, normal compression: 30/25 fps (NTSC/PAL)
- 4 cameras: CIF, normal compression: 30/25 fps (NTSC/PAL)*

  *Total number of frames with connecting cameras synchronized

Security

- User level password protection
- Built-in firewall functionality based on IP filtering protects against illicit use from unauthorised computers

Storage Capacity

- Up to 160 GB (4 x max 40 GB HD)r
- Storage duration dependent on image settings
- Recording availability at CIF resolution, with respect to the available APViS recording and compression modes, are provided below:

Connections

Network Connector

- RJ-45 connection to 10/100Mbit Ethernet networks

Video Inputs

- 4 x composite video inputs with loop/through connector, selectable 75 ohm, Hi Z termination
- Autosensing for NTSC and PAL
- 4 x BNC video loop-through ports

I/O

- Single Terminal Block Connector
- 4 x opto-isolated alarm inputs
- 1 x output relay

Serial Connector

- 9 pin D-SUB RS-232 max 115 Kbps
- 9 pin D-SUB RS-232 or RS-485/422 max 115 Kbps, half duplex

Power

- 115/230V AC, 50/60 Hz, Max 1A (typically 60W)

Operating Conditions

- *Temperature 41-104°F (5-40°C)*
- *Humidity 20-80% RHG Included*

Dimensions and Weight

- Physical Dimensions: 16.9" x 12.6" x 3.9", 430 x 320 x 100 mm
- Delivered with brackets for 19" rack mount
- Weight: No disks – 15.4 lbs (7 kg), 2 disks – 18.1 lbs (8.2 kg), 4 disks – 20.7 lbs (9.4 kg)

Approvals

EMC
- CE EN55022 Class B, EN55024
- FCC Class A
- C

Safety
- EN60950, C-UL Listed

Recording availability at CIF resolution				
Compression	Filesize	Normal	Extended	Ext. Long
High	8 kB	45 days	96 days	253 days
Normal	13 kB	27 days	57 days	149 days
Low	17 kB	20 days	42 days	110 days

(Based on 4 x 40 GB HD model, recording from 4 cameras at 1 fps/each)

For more information visit our website: **www.axis.com**

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