



INTEGRATED SECURITY SYSTEMS

APPLICATION NOTE — HOSPITALS

Summary

Hospitals are public buildings open 24 hours a day, every day of the year. The public expects to be able to enter a hospital unchallenged and easily to seek medical attention, or visit a loved one.

Many visitors are in a heightened emotional state, especially in the Emergency Room. As a result there is a constant threat of combustible situations. Doctors, nurses and other hospital staff, are working daily in a stressful environment, caring for patients. They do not need the added burden of concern for their own physical safety as well.

Hospital Security Needs

Hospitals are extraordinarily complex organizations. In large urban hospitals each department, such as medicine, surgery, ER, pharmacy, paediatrics, psychiatry, radiology, medical records, etc. have their own unique processes and needs, and operate fairly autonomously from the other departments. All departments rely upon, and take for granted, the building's infrastructure such as utilities, (light, power, heat, cooling), telecommunications, computer network, and security.

Some examples of sensitive locations within a hospital that demand security planning are:

- Birthing Center
- Paediatrics
- Surgery
- Emergency Department
- Psychiatry
- Pharmacy
- Medical Records
- Radiation Therapy
- Information Services
- Surgery

Often, security measures such as controlled access

Hospitals contain very valuable diagnostic equipment, large quantities of narcotics and other drugs, and private health records. All these assets are targets for theft.

A sad commentary on our times is the fact that people enter hospitals to steal babies.

How do we protect the staff, patients and assets of a hospital as it goes about its business of caring for people, and still maintain an open, accessible environment?

to the pharmacy, or doctor's offices are implemented as stand alone point solutions.

Sometimes, a local surveillance camera is installed in response to an incident. This ad-hoc approach of local point solutions for security is usually the result of departmental budgeting, and tight cost controls.

When looking at the entire hospital operation, and performing a total threat analysis, and comparing the patch work of access control and local security measures to a comprehensive integrated hospital-wide security infrastructure, it is usually revealed that, not only is more costly to install and maintain local solutions, the overall security of the hospital is compromised.





The APEX Solution

DelcoSecurity has 10 years of security automation experience, and understands the unique needs of hospitals.

Major retrofits, additions, or new-builds in hospitals should include an integrated security infrastructure. Working with the hospital, and/or the hospital's consultant, DelcoSecurity, with our partners, is well positioned to develop a threat analysis. From this threat analysis, we can design an overall security infrastructure that is unobtrusive, yet highly effective.

APEX, DelcoSecurity's security solution connects to all security and building management functions and provides security staff with co-ordinated visibility on all activities in the building, and can quickly mount an effective response to threat or situation.

APEX assembles and analyzes inputs from, and provides overall control to the following security systems:

Fire alarms
Access control
Video surveillance
Building power, light, heat, water
Personal Duress systems (active and passive)
Perimeter Intrusion

APEX also monitors and controls the following communications systems

Nurse Call
Intercom
Annunciation
Patient TV access
Telephone
Computer Network

The focus of the APEX security infrastructure is the command and control post which monitors video and status from all security and utilities subsystems, in all zones, and provides remote control of these subsystems for both normal operation of the facility, and in response to emergency incidents. Immediate access to video, audio and status information permits quicker and more accurate assessment of situations, and rapid response through remote control mitigates injury and damage during incidents.

TECHNICAL FEATURES OF APEX

CCTV and video surveillance

Video from all cameras may be recorded onto digital video recorders at a pre-determined schedule and under operator control. Video is also displayed on-demand, and in response to alarms on the operator's graphics displays.

Video recordings are made of all cell door operations. In addition, upon receipt of an alarm, for example from a "man-down" duress system, or a perimeter intrusion, or a fire alarm, the video from the cameras closest to the alarm point is automatically displayed at the command/control post and is recorded on digital video recorders.

Digital video technology provides rapid access to recorded video. In post incident reviews, the guard may call up a selected alarm, and view the video associated with that alarm. No longer does he need to search by "time of day", or scan a video tape to find the segment of interest.

Digital video may also be transmitted and viewed over great distances with no loss of picture quality using internet IP technology.

Secondary Control Post

A redundant, backup control post can be installed to counter the threat of a security breach or damage of the main control center. At the secondary control post, all functions of the primary console can be disabled, and command and control can continue at the secondary center.

Access Control

The APEX system monitors and controls the door access system used to control access to the different areas and zones in the buildings. Once the schedules, and permissions have been established, and identity tokens (e.g. proximity cards or keyring fobs) have been given to accredited personnel, access to controlled rooms is managed automatically by the system without the need for interaction from the control center guards. Every transaction in the access control system is logged, time-stamped and recorded. The guards, may view these logs at anytime.

FEATURES

- Central, integrated monitoring and control of all access control, building utilities, video surveillance and audio communications
- Special duress monitoring within the court rooms.
- Personal active duress available for judges and officers of the court
- Secure cell door and elevator monitoring and control in detention area
- Redundant Secondary command post
- Mobile access to video, audio and status via handheld computers
- Simple, easy-to-use, large colour graphic touchscreen displays
- Digital video displays and digital recording

BENEFITS

- Secure control of access and movements from zone to zone
- Quick situation analysis and rapid effective response
- Rapid access to recorded video indexed by incident
- Continuous communications via paging, intercom, mobile phones
- Lower cost of security labour
- Higher level of security within entire building

Our Partners

APEX is built using proven, commercial-off-the-shelf standard components supplied by manufacturers with strong reputations for quality. Some of our partners supplying components and subsystems for the APEX security framework are:

- RBH access control
- Sensstar Stellar personal duress system
- Genetec digital video and audio systems
- HARDING intercoms
- GE motion, door, etc. sensors
- Pelco CCTV cameras
- AWID, HID, Barantec proximity readers