

M O R E

T H A N



CITY OF STOCKTON USES VIDEO FOR TRAFFIC MANAGEMENT,
POLLUTION CONTROL, AND CRIME PREVENTION

S E C U

R I T Y



IMAGINE A TRAFFIC MANAGEMENT SYSTEM THAT REDUCES GRIDLOCK, POLLUTION...AND CRIME. YES, CRIME. THAT'S EXACTLY WHAT IS HAPPENING IN STOCKTON, CALIFORNIA. AND VIDEO SECURITY TECHNOLOGY FROM PELCO IS AT THE HEART OF IT ALL.

For more than two decades as the City Traffic Engineer for the City of Stockton, California, Gary Tsutsumi has been working to keep traffic moving. His vision has led to ingenious uses of video technology, reaping multiple benefits for the residents and visitors, the economy, and the environment.

In the mid-1980s, a fiber optic communication network was installed in the city of Stockton. Tsutsumi recognized an opportunity to tap into that network and enhance the city's traffic management system with video.

Tsutsumi knew that if his traffic operations staff could actually see what's happening with traffic, they could adjust traffic signals more effectively. The result: improved signal coordination, rapid response to incidents and signal malfunctions, smoother traffic flows, and less pollution, because moving vehicles produce fewer emissions per gallon than those sitting in traffic.

Tsutsumi funded the initial stage of his project with a pollution mitigation grant from the U.S. Environmental Protection Agency. Fiber was run to every traffic signal in the city, and video cameras were installed at strategic locations. Today, video cameras are installed as part of new traffic signals, and all new traffic signals in the city must connect via fiber to the city's fiber optic network and central traffic control system.

The core of the control center is located in Stockton's City Hall, where a large equipment room houses the video matrix switcher and

racks of digital video recorders, including several Pelco DX8000s. For many years, this center was also the home of the main control room for the traffic engineers. Recently, a larger control center was established in a newer city office building a couple of blocks away.

The visual star of the upgraded control center is the PMCD750 50-inch DLP display from Pelco. This large display wall gives operators unprecedented flexibility in seeing what they need to see, when they need to see it, from any of the more than 200 cameras deployed throughout the system. A dozen smaller flat panel displays give operators a view of other parts of the traffic management system. "From here, we can make changes in the traffic control database and immediately see

the results on traffic flow," explained Todd Greenwood, Assistant Traffic Engineer. The traffic system has delivered on its promise, and it is now generating even more unforeseen benefits.

Like many cities across the country, Stockton's downtown has undergone a dramatic renaissance in recent years. Neglected waterfront properties have been overhauled, replaced by an array of

pristine parkland, a baseball stadium, a sports arena, entertainment venues, eateries and loft apartments – transforming downtown Stockton into a recreation destination for residents and visitors alike.

As Stockton's city center has evolved, so has the use of the city's video system. More users are accessing its capabilities – with tremendous

civic benefits. Three years ago, the Stockton Police Department began using the system to monitor crowds for safety at events. Now in addition to the traffic system operators in the control room, a crew of retired police officers regularly monitors the video cameras for crime and safety issues throughout the downtown area. The system has afforded the police an important tool in responding quickly to incidents.

Cooperation between agencies makes it possible for everyone to share a powerful resource in an economical fashion. Besides the main control room at Traffic Engineering, there are now monitors and camera controllers at a local CalTrans district office, a San Joaquin County Public Works office, and at the City corporation yard. "San Joaquin Regional Transit will be a new user," noted Greenwood. "We can see where their buses are, and if they're running behind, we can adjust traffic signals to give them priority."

Asked about privacy concerns in an urban setting, Greenwood noted, "We are extremely diligent about the proper use of the system. We are only interested in what's going on outside, in public. We use window blanking to shield selected views in residential and other sensitive areas."

Gary Tsutsumi adds, "Ultimately, our goal is an IP network throughout the city. We'd like to add more Pelco Spectra domes, especially the Spectra III EVS domes. To enhance safety, we'd like to add audio and other functionality, like some bigger cities are doing. We're pleased with what the system is doing for us now, and we're looking forward to it growing with us."

