

## Varna and Burgas Airports improve security and operational excellence with Milestone open platform IP video software

*“With the implementation of Milestone XProtect® Enterprise at both airports, Fraport gains the following improvements: unified video surveillance systems at both airports and centralization of the software, hardware and communications; surveillance and control of technological processes in airport servicing – runway, apron, fuel farm, security checks, passenger and baggage flow. The RAD Group manages the installation perfectly with the highest efficiency.”*

Mr Hristo Botev, Head of IT, Fraport

At the end of 2006 the German-Bulgarian consortium of the airport operator Fraport AG and the Bulgarian logistics company BM Star won a bid for the operation of both Varna and Burgas Airports – gateways to the popular Bulgarian Black Sea tourist region. Over a 35-year concession period, Fraport Twin Star Airport Management will be operating and investing in the development of both coastal airports.



This area is called the ‘Summer Capital’ of Bulgaria. Varna and Burgas Airports are at the heart of developed business communities, close to resorts and transport facilities. Their strategic positioning guarantees a good amount of charter passenger traffic and makes them reliable partners for development of regular lines. The potential of these airports will have a strong effect on the expansion of transport networks, tourism and trade between partners from both East and West.

### Overcoming limitations of analog with move to IP

Prior to 2008, Varna and Burgas Airports had multiple individual systems for different tasks, and analog surveillance cameras. The analog technology had limitations in quality like the inability to monitor remotely between the two airports, to expand the systems, or to integrate with other security solutions. Management could see that IP technology was the way of the future and they did not want to be single-vendor dependent in order to get best price performance.

Top challenges in monitoring these airports include:

- Strict requirements of 30-day retention for the airport surveillance put unique demands on their video system storage, hardware costs and operational performance.
- Busy traffic movement on the runways and maintenance on the apron must be managed.
- Passenger flow in the terminals, especially through the customs areas, has to be controlled.



## Milestone open platform is the solution

RAD Group has installed Milestone XProtect Enterprise software, operating several hundred Axis network cameras in both airports, with IBM servers and Cisco network infrastructure. Retention of the recorded video is set to the 30-day regulation. Over time existing analog cameras can also be migrated to the network solution. Control rooms with 37" inch display screens show the Milestone XProtect® Smart Client views of both live and recorded video. The Milestone licensing structure makes it simple for the customer to pay as they grow.



Varna and Burgas Airports are using the Milestone surveillance not just for security but also for operational excellence. The five main areas of its operation are:

- Monitor when aircraft are landing and taking off on the runways
- Monitor activities around the aircraft when they are on the apron to ensure that all activities related to servicing the planes are done properly, including baggage and food supply movements, vehicle traffic, etc.
- Manage operations at the 'fuel farm' where the tanks for refueling are located
- Monitor the baggage claim belts and surrounding areas
- Overview of activities in the customs area
- General surveillance of the arrival and departure areas, shops, and gates

The Milestone surveillance system can be viewed and managed centrally by Fraport personnel for both of the airports or locally at each airport, depending on the user access given. Control rooms in each site include over 12 big display screens.

## Scaling up and out over time

In 2008 the airports set up the Milestone IP video platform, learning the system thoroughly and fine-tuning it. They have a product maintenance agreement (PMA) that has already allowed them to upgrade to include the new XProtect Smart Client 5.0, released in February 2010. This has shown them how they can continue with future upgrades and expand their installation over time. The PMA thereby protects their cost of ownership, giving them return on their investment for years to come.



Varna and Burgas Airports use the XProtect Smart Client to watch and control both live and recorded video, search for events, or export evidence if needed to resolve any questions that might come up in their busy international operations. The XProtect Smart Client lets them watch playback simultaneously with live views, providing superb overview, for example, at customs clearance. Milestone's Smart Search allows them to quickly look for specific activities within a particular area over periods of time.

Fraport Twin Star has plans to build new terminals at both airports, as well. With the Milestone IP video open platform, it will be no problem to expand the system for this coverage, including management of activities during the construction phase.

### **Technical advantages bring savings and more return on investment**

Another big plus with the Milestone software is that no changes are required to the airports' Cisco network infrastructure because XProtect® can support either multi- or uni-casting approaches. By using the uni-casting, there is no disruption of their network setup - no special configurations are necessary.

Milestone's unique archiving capabilities provide great cost efficiencies for the airports, too. Especially considering their 30-day archive retention rule, they make big savings with Milestone's unique archiving technology. This allows them to archive their recorded video on the IBM storage hardware that provides large cost-efficient hard disks, and simultaneously operates with the live video running on faster performance disks.

In addition, initial installations of some H.264 IP cameras have already proven cost savings of 30%, so the airports look forward to incorporating more of these high-compression video cameras in future. XProtect software makes it very easy to add new cameras and innovations as they become available in the market.

The airports look forward to adding other innovative options in the future through video analytics. These could be applied when they make entrance and exit lanes for passenger movements in the terminals, especially in the customs areas. Such uni-directional flow will make it easier for analytics to alert when someone is going in the wrong direction. They also are looking into left baggage analytics and tripwire solutions to help prevent people from going to unauthorized areas. Tailgating alerts could also detect improper access by additional people who try to enter on someone else's card.



Since the airport staff includes some people with programming skills, they are furthermore interested in using the Milestone Integration Platform Software Development Kit (MIP SDK) to make integrations with back-end applications like logistics, to work in concert with the Milestone open platform video surveillance.



### **About Milestone Systems**

Founded in 1998, Milestone Systems is the global industry leader in open platform IP video management software. The XProtect® platform delivers powerful surveillance that is easy to manage, reliable and proven in thousands of customer installations around the world. With support for the widest choice in network hardware and integration with other systems, XProtect provides best-in-class solutions to video enable organizations – managing risks, protecting people and assets, optimizing processes and reducing costs. Milestone software is sold through authorized and certified partners. For more information, visit: [www.milestonesys.com](http://www.milestonesys.com)

