

**Product:**

Vi-System – Real-Time Video Analytics

Application:

Security and Perimeter Protection

Customer: Dolmabahçe Palace**Location:** Istanbul, Turkey**Vertical Market:** Museum**Agent Vi Partners:**

Milestone - Video Recording System

Axis Communications - Cameras

Agent Vi Analytics Alerts Turkey's Dolmabahçe Palace to Security Irregularities

Challenge

One of the largest national museums in Turkey, the Dolmabahçe Palace contains 285 rooms and 46 halls showcasing the largest collection of Bohemian and Baccarat crystal chandeliers in the world. Tens of thousands of tourists visit the attraction annually.

The Palace Authority required a video analytics solution that would automatically alert palace security operators to irregular behavior in any of the palace's monitored rooms, in real-time, in order to protect its priceless exhibits.

As such, the Palace Authority sought a solution that would enable it to deploy a wide variety of analytics rules in order to detect a range of behaviors, without changing its newly-installed surveillance system. Recognizing the value of the exhibits, the solution had to offer the highest possible detection performance.

Solution

The management of Dolmabahçe Palace selected Vi-System – Agent Vi's real-time detection and alert software – to increase the level of security at the site. Dolmabahçe Palace's surveillance system employs Milestone XProtect Enterprise recording solution and network cameras from Axis Communications. Products from these partners – Milestone and Axis – are certified as fully integrated with Agent Vi's software allowing seamless installation and operation of real-time analytics at the site.

The Palace Authority required analytics for 60 channels. Specifically, the palace's existing infrastructure consisted of Axis 221 network cameras, which were Vi-Agent enabled to allow multiple rules to be active on each camera:

- **Person moving in an area** and **Person crossing a line** to detect and alert to unauthorized personnel entering and moving freely in restricted areas;
- **Suspicious object** to detect objects left unattended;
- **Loitering** to detect persons sojourning in close proximity to the exhibits;
- **Crowding** to alert to crowd formation when a user-defined threshold (density) is reached in a specific area;
- **Asset protection** to detect any removal of valuable articles such as wall paintings and freestanding sculptures.

*“With Vi-System we gain **unsurpassed detection capabilities and scheduling flexibility without requiring us to change existing hardware or purchase additional equipment.** As we looked to address a variety of detection and security requirements, we found that Agent Vi is uniquely positioned to deliver a solution that **not only meets our multifaceted needs today but positioned us for future applications.**”*

—IT Director

Dolmabahçe Palace & the National Palaces of Turkey

Vi-System was installed on a single central server which powers the analytics rules on all 60 cameras. Vi-Agents were embedded in the existing Axis cameras, enabling high performance with minimal impact on the network and the server.

Result

With the introduction of Vi-System, the surveillance network of Dolmabahçe Palace has been significantly enhanced. Now, the security team is alerted in real-time to any irregularities within the site, including tampering with the exhibits and entry into the restricted access zones. The detections and alerts enabled by Vi-System ensure better security for Dolmabahçe Palace's priceless collections.

"Dolmabahçe is a very big palace with visitors from all over the world, which brings security risks like vandalism. This kind of thing may only happen once a year, if that – but with irreplaceable national treasures, once is too much," stated Dolmabahçe Palace IT Director and IT Director of the National Palaces of Turkey, Rüstem Coskun. "With Vi-System we gain unsurpassed detection capabilities and scheduling flexibility without requiring us to change existing hardware or purchase additional equipment," he commented. "As we looked to address a variety of detection and security requirements, we found that Agent Vi is uniquely positioned to deliver a solution that not only meets our multifaceted needs today but positioned us for future applications."

According to Ariel Frischoff, VP Sales EMEA & APAC at Agent Vi, "Dolmabahçe Palace officials thoroughly assessed a variety of solutions, and considered both technical and financial merits, before reaching the conclusion that Agent Vi's real-time solution performs better than others on all counts. We're extremely proud of this achievement."



Vi-System rule "Person crossing a line", configured along a railing that marks an off-limits zone. Movement by a person across the line is detected by Vi-System and an alert is generated to notify the security team.

About Agent Vi

Agent Video Intelligence (Agent Vi) is a leading provider of open architecture, video analytics software deployed in a variety of security, safety and business intelligence applications worldwide. The comprehensive video analytics solutions offered by Agent Vi extend from real-time video analysis and alerts to forensic search and post-event analysis, and are fully integrated with a range of third party edge devices and video management systems.

Integrating Agent Vi's advanced video analytics capabilities into existing or new surveillance networks enables users to benefit from the true potential of their surveillance networks, transforming them into intelligent tools that respond to the practical challenges of the 21st century.

About Vi-System

Vi-System is Agent Vi's real-time video analytics software, which transforms standard surveillance networks into intelligent and effective detection and alert systems.

By performing real-time analysis of the video stream, Vi-System identifies and generates alerts for a variety of user-defined events relating to people, vehicles and objects. Used for applications such as security, safety and business intelligence, Vi-System offers effective monitoring of multiple video sources in parallel, enabling automatic detections, alerts and responses to events, as they emerge.

Based on Agent Vi's open architecture, pure-software approach, Vi-System can be easily integrated with a wide range of edge devices and video management systems, in both new and existing surveillance networks.

Vi-System boasts the combined benefits of superior detection performance, high scalability, installation simplicity and ease of use, making Vi-System the most advanced, comprehensive and cost effective real-time video analytics solution on the market.