



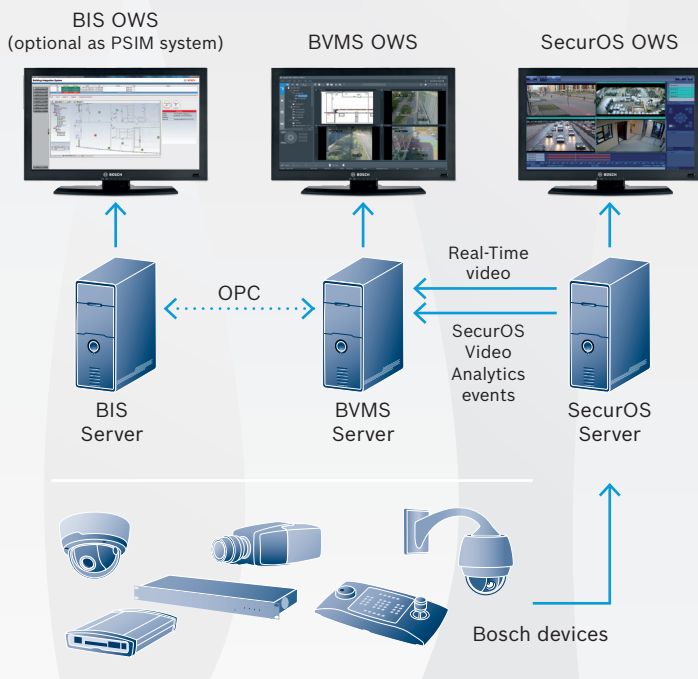
**BOSCH**

Invented for life

# Integrated Security, Video Management and Video Analytics Solution

## Video Intelligence Solution

# Bosch Security and Safety Systems and Intelligent Security Systems (ISS)



### Key-notes

- ▶ SecurOS VMS extended with native video analytics modules in combination with Bosch products provide unmatched technological excellence of video intelligence solutions
- ▶ Industry leading video quality delivered by Bosch video cameras allows SecurOS video analytics algorithms to maximize performance
- ▶ Integration of SecurOS platform with BVMS and BIS drives scalable end-to-end solutions addressing specific customer needs

### How does it work?

- ▶ SecurOS Video Analytics events are sent to virtual inputs of BVMS (and further passed to BIS if necessary)
- ▶ Events from analytics can be displayed and searched in BVMS/BIS operator GUI and used to automate tasks
- ▶ Using SecurOS as middleware, SecurOS Video Analytics modules can be used with BVMS/BIS
- ▶ If necessary, specialized native GUI of SecurOS video analytics modules can also be used



As a leader in enterprise video management and video intelligence solutions, including License Plate Recognition, Face Recognition, Container and Train Car number Recognition, the ISS SecurOS line is a great choice for Bosch devices.

Combined solution (SecurOS video intelligence solutions + BVMS + optional BIS as PSIM system) with native support of Bosch IP Devices, including all relevant protocols, CPP-ENC, CPP3, CPP4, CPP5, and the newest CCP6 enable to create a comprehensive security system.

ISS provides end to end solutions for Bosch IP technologies, with significant emphasis placed in providing scalability and flexibility to meet the customers' needs. Using the ISS SecurOS products, Bosch offers viable solutions for various vertical markets with high degree of adaptability to the individual challenges of each control zone.

ISS video analytics allows to automate many routine tasks, and perform them with consistently high quality 24x7. The main advantage of using ISS technologies in the Bosch solutions (in comparison with traditional video surveillance) is that there is no need to constantly monitor all lines of control and exclusion of human factor (any mistakes/weariness).

Bosch cameras are certified to meet the demanding performance needs for advanced analytics, ensuring the success of projects on the first go, saving time, resources and costs.

The use of ISS products is confirmed by successful large-scale projects implemented in many countries of the world (city surveillance, manufacturing and industrial, transportation, warehouse and logistics, banks and retail).

## Compatibility

ISS Solutions	Bosch devices
<b>SecurOS video intelligence solutions:</b> <ul style="list-style-type: none"> <li>• <b>SecurOS Auto</b> (License Plate Recognition)</li> <li>• <b>SecurOS Transit</b> (Character Recognition of train carriages, tankers, and platforms)</li> <li>• <b>SecurOS Cargo</b> (ISO Container Number Recognition)</li> <li>• <b>SecurOS Face</b> (Face Capture &amp; Recognition)</li> </ul>	<b>Bosch Video Management System (BVMS) Building Integration System (BIS)</b>  <b>All Bosch IP devices</b> including Cameras & Encoders  All CPP-ENC, CPP3, CPP4, CPP5, CCP6 IP devices  For full list of devices refer to the Bosch firmware-product matrix in the tools section of our IPP portal <a href="http://www.ipp.boschsecurity.com">www.ipp.boschsecurity.com</a>

# Applications / Vertical Markets



**Transportation**  
Integrated solutions for traffic safety, transportation site safety. High reliability algorithms for automatic number recognition.



**City Surveillance**  
Large scale, multi-tier video surveillance. Situational awareness using video analytics and intelligence modules. Facial recognition for specific security applications.



**Banks and Retail**  
Integrated security solution including facial recognition (including face-control, access control), parking safety.



**Manufacturing and Industrial**  
Effective vehicles registration and control, cargo flow control. Staff and visitors control, access control. Customized video analytics for manufacturing processes and labor safety.



**Warehouse Terminal and Shipping Logistics**  
Integrated security solution including facial recognition, ATM transaction monitoring, people counting, left object detection, etc.

## Key features

### Events and attributes received from SecurOS Video Analytics

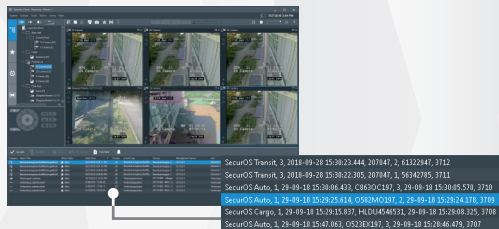
1. General events from SecurOS Video Analytics (Auto / Transit /Cargo)
  - Date and time of recognition
  - The result of recognition: recognized number (car / carriage / container)
  - Date and time of the bestframe
  - Match with the database: black / white / note (information) lists (or sheets)
  - The direction of movement
- 1.2. Additionally for SecurOS Transit
  - The compliance between the carriage number and the checksum
  - Type of train carriage (carriage / tanker / platform etc.)
  - Running number of the railway carriages
- 1.3. Additionally for SecurOS Cargo
  - Detected speed (for the platform with the container)

2. Events from SecurOS Face
  - Date and time of face capture
  - Date and time of the bestframe
  - ID in database
  - Match with the database: black / white / note (information) lists (or sheets)
  - The degree of similarity between the person's face image and database

### Events and video dataflow

- SecurOS transmits video to Bosch Virtual Streaming Gateway through SecurOS RTSP server
- SecurOS sends videoanalytics events with additional metadata to BVMS through Virtual Inputs.
- Virtual inputs can trigger alarms and start server scripts just like any other event in the BVMS and BIS
- Events from analytics are stored in Logbook with ability for searching

## Set up details



Using SecurOS video analytics modules in integrated Bosch solutions allows to:

- automate the routine tasks of vehicles and individuals registration / control
- detect situations that potentially threaten staff safety
- take necessary action to prevent unwanted situations before they go into the category of "act done"
- significantly reduce the security staff load (including operators of CCTV systems):
  - no need for constant surveillance of all control lines
  - elimination of a human factor (fatigue, error)
  - control of a great deal of detecting areas without increasing staff

**The Bosch division Security and Safety Systems** is a leading global supplier of security, safety, and communications products, solutions and services. Protecting lives, buildings and assets is our aim. The product portfolio includes video surveillance, intrusion detection, fire detection and voice evacuation systems as well as access control and management systems. Professional audio and conference systems for communication of voice, sound and music complete the range. Bosch Security and Safety Systems develops and manufactures in its own plants across the world. Additional information can be accessed at [www.boschsecurity.com](http://www.boschsecurity.com)

Visit [www.ipp.boschsecurity.com](http://www.ipp.boschsecurity.com) for details on the Bosch Integration Partner Program

ISS is a leading developer of video management and video intelligence solutions, as well as video based industrial automations systems. The ISS video management platform, SecurOS™, is the nucleus of a complete security eco-system, a visualization platform that integrates native, as well as third party analytics, access control systems, fire and life safety, building management, SCADA, and can be made compatible with virtually any third party system or device. Its "Security on Demand" infrastructure is the solution to rapidly migrating security and surveillance needs and threats.

ISS SecurOS focuses on large mission critical applications security systems: industrial and manufacturing sites, transportation systems, banks, sports arenas, retail locations, and campuses & office complexes. ISS has patented object-oriented event driven core firmware, advanced video compression technologies, intelligent video motion detection and digital video recognition capabilities. Additional information can be accessed at [www.isscctv.com](http://www.isscctv.com).