

# Virtual Perimeter Monitoring System

## An Intelligent, Rapidly Deployable Remote Video Surveillance Kit

The virtual perimeter monitoring system (VPMS) kit is a proven surveillance solution that enables users to access remote video in real time from a central location. Originally developed by 3e Technologies International (an EFJohnson Technologies Company) for the U.S. Navy, the VPMS kit utilizes video analytics technologies in a wireless mesh video network configuration to better protect personnel and property. The VPMS kit helps manage military and civilian operations by alerting users to emergencies or potentially threatening situations.

The portable VPMS kit — comprised of six video sensor units and one alert console unit, each packaged in a rugged, watertight case — sets up quickly, virtually anywhere. After video sensors are placed within 2,000 feet of each other, a mesh network that relays video and data to the alert console will be automatically established. The wireless network can be designed to offer extended distance coverage of up to several miles via the use of higher gain omnidirectional antennas.

The video sensor and alert console units are connected over a secure IEEE 802.11a/b/g wireless mesh network using 3eTI FIPS 140-2 Validated™ devices. Using 802.11g/a features, data rates of 54 Mbps are possible, with actual data throughput of up to 20 Mbps. The kits are powered by any standard 110V AC power source; for remote deployments, an optional battery kit can power the kits for up to 24 hours on a full charge (recharging takes six to 12 hours).

### Video Sensor Units

The video sensor units — an integrated day / night (IDN) video camera, wireless video server, Ethernet video server, wireless access point / bridge, and tripod — contain all the components needed to set up a wireless video sensor and stream the video in real time to the alert console. The sensor unit components can be mounted on the tripod and deployed in 20 minutes or less; they can also be bracketed to convenient railings or bulkheads, or mounted on a vehicle, depending on what the situation demands.

The sensor units intelligently analyze video taken on scene and relay information to the alert console unit — located at a remote command center — over a FIPS 140-2 Validated™ secure wireless LAN.

### Alert Console Unit

The alert console performs all rule / alert set-up functions and serves as the display console for all alerts. The console includes a rugged laptop loaded with Video Management and Video Analytics software and 3eTI secure client software, InfoMatics® middleware and a 3eTI wireless access point / bridge packaged in a watertight case. The laptop connects to the remote sensors over a FIPS 140-2 Validated™ secure wireless LAN integrated via the 3eTI wireless access point / bridge.

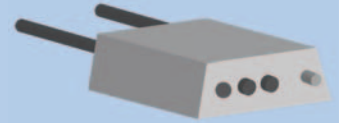
### Video Sensor Unit Components

- IDN PTZ video camera
- 3e-525Ve-4 Wireless Video Server
- Ethernet video server
- Rugged tripod
- Battery (optional)
- Battery charger (optional)
- Waterproof case



### Alert Console Unit Components

- Rugged notebook computer
- 3e-525A-3 wireless AP / bridge
- ObjectVideo - Video Analytics
- 3eTI secure client software
- InfoMatics middleware
- Waterproof case



### Benefits

- Real-time video surveillance for a range of applications
- Intelligent system using video analytics for alerts
- Fast deployment — 20 minutes or less for each kit
- IDN camera for 24-hour surveillance
- Self-forming, self-healing mesh network for uninterrupted operation



*The rugged, watertight cases included in the QPMK — which enables users to access remote video in real time from a central location — makes the system ideal for use in harsh environments, including aboard ships.*

# Virtual Perimeter Monitoring System Applications



**Shipboard Monitoring**



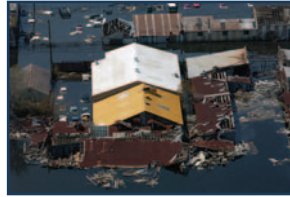
**Terror Attacks**



**Disaster Clean-Up**



**Port Surveillance**



**Natural Disasters**



**Search and Rescue Operations**



**Tactical Military Operations**



**Border Patrols**



**Monitoring Maintenance Crews**



**Ground Support**



**Forest Fire Fighting**



**Outdoor Events**

