

EMERGENCY COMMAND SYSTEM

EMERGENCIES, MANAGED.

Command Support System - bringing mobile, wireless working to the incident ground of the (very near) future

VectorCommand's **Stephen Prendergast** looks at how new computing devices, communications bearers and C⁴I systems are helping UK fire and rescue services transform the way they command incidents.

THE APPLE IPHONE, A SMART PHONE WITH

a vast range of popular Applications ('Apps') and 3G internet access, is transforming the way the world views and uses mobile computing devices. Sales of over 20 million iPhones over a period of two and a half years confirm this.

In the emergency management sector, fire and rescue services are also embracing wireless computing for improved information sharing and command communications during major incidents. Wireless-enabled touch screen laptops, such as Panasonic's ToughBook family as well as large touch screen whiteboards, are now being looked at as the types of devices which will help transform how incident commanders and their teams manage major fires, floods and other emergencies.

With a new generation of high tech emergency command vehicles coming on stream, and with other initiatives set to transform the ways in which UK fire and rescue services manage incidents and coordinate with other services and agencies in the future, there is now a drive to acquire systems that will support these new ways of working – specifically, integrated C⁴I systems (Command, Control, Communications, Computing and Information) deployable on mobile devices, in command vehicles and across wireless networks.

Other key drivers in this modernisation process are: 1. the need for speed, acquiring and collating incident information as quickly as possible; 2. distributing critical information to commanders speedily (to support improved decision making) and; 3. improving situational awareness across incident grounds and between agencies (particularly when these are on a large scale, such as oil storage facilities and large structures, flooding, wildfires and terrorism).

The objective is to create and share – dynamically – a Common Operational Picture, within agencies and between agencies. Post-incident reports routinely highlight how problems involved with creating and sharing an up-to-date Common Operational Picture can seriously handicap response effectiveness.

Leveraging the power of the technologies now on offer is about much more than mobile working, however. A powerful system platform is

With wireless mobile computing at its heart, the Command Support System is transforming the way fire commanders manage major incidents.

required, one that pulls all the different technologies together and integrates them into a single, easy-to-use interface. VectorCommand's Command Support System does this, and because it has been developed specifically for emergency service use, it has emerged as the leading contender for this role. The system links mobile wireless devices (deployed throughout an incident ground or in multi-agency command centres) with mobile command vehicles and other computers within headquarters organisations.

In 'iPhone speak', the Command Support System's 'Apps' suite – intuitive, easy-to-use modules with touch-screen icons and drop down menus – includes GIS mapping, Organisational Asset Management and Database Access (linked to mobilising systems, personnel, building plans, hazards and other databases), Electronic Whiteboard, Standard Operating Procedures, Imagery (still, incident cameras, 'heli-tele' etc), Web Access, Messaging and Conferencing – all available at the touch of an electronic button.

Used together, the Command Support System provides incident commanders and their support teams with a much more accurate, dynamically updated and useful picture of what is happening during the course of single or multiple incidents. Commanders can look at overviews of incidents to get the 'big picture', or drill down to view the picture at fireground sector level. They can also,



The iPhone is transforming the way the world views and uses mobile computing devices and data.

subject to granting of appropriate access rights, look at other incidents, regardless of location. Multi-agency emergency managers can also contribute to and access the Common Operational Picture, dynamically – breaking down the barriers that have previously hindered interoperability between emergency services.

In the same way that the iPhone is transforming the way people use mobile devices, 'Apps' and the internet, so the Command Support System is transforming the way fire commanders and their teams – in London Fire Brigade, Royal Berkshire FRS and South Yorkshire FRS, among others - will manage incidents in the (very near) future.

www.emergencycommandsystem.com