

The main operator of Finland's largest west coast port selects Cisco

Signal Networks Finland implements Finland's largest WLAN of mobile terminals

ABSTRACT

CUSTOMER:
OY RAUMA STEVEDORING LTD

INDUSTRY:
PORT OPERATOR

CHALLENGE:

- The renewal of the entire operative IT system to improve services and operations
- Converting inventory management to a real time system
- Creating an extensive network to cover the entire area and also to support multiple work station types and applications

SOLUTION:

- A wireless local area network (WLAN) covering the entire Port of Rauma
- Servers
 - 2 units Cisco ACS authentication server
 - 1 units Cisco WLSE monitoring server
 - 2 units Citrix Metaframe server
- Access points and terminals:
 - 116 units Cisco Aironet 1200 Access Point
 - 6 units Cisco Wireless Bridge
 - 21 units LXE VX3-12 forklift mounted PCs
 - 16 units Symbol MC900-G portable terminals

BENEFITS:

- The basis for a new, real time inventory management system which adapts to future needs
- A more reliable, faster and more extensive solution, with a bigger range and improved data security
- Improved usability
- Improved customer services by automation and more efficient processes

The largest operator in the Port of Rauma, Oy Rauma Stevedoring Ltd., is in the process of revamping its entire IT system. This necessitated the building of a real time inventory management system, which in turn required the renewal of the port area network. A partner specializing in port solutions was brought in to implement a Cisco Systems technology based WLAN solution. With the solution, Rauma Stevedoring renews its hardware, improves its processes and obtains a system supporting future functionality.

A fully owned subsidiary of the forestry company UPM Kymmene, Rauma Stevedoring Ltd is a port operator in the Port of Rauma, Finland's largest west coast port. In 2004, port traffic totaled 6.3 million tons. Annually, Rauma Stevedoring's ERP system processes over three million export units.

Rauma Stevedoring took the strategic decision to renew its old operative IT system. The new system encompasses all information management of import and export processes, from the tender stage to vessel loading. This includes a new system for real time inventory management, which enables improving operative processes, development of services and renewal of hardware and applications which have reached the end of their lifecycles.

The functionality required was not possible with the old narrow band radio system; it was slow, obsolete and lacking in functionality.

"We were looking for a solution which could utilize any application. On the other hand, we were looking for a solution, with which we would not have to worry about work station characteristics vis a vis applications. In addition, the new solution had to meet today's tough data security demands", says Rauma Stevedoring IT manager **Hannu Ketola**.



Cisco Systems Finland Oy

Lars Sonckin kaari 16, 02600 Espoo, Finland; Puh: 0204 7061, Faksi: 0204 706300, www.cisco.fi



RAUMA STEVEDORING OY

A fully owned subsidiary of the forestry company UPM Kymmene, Rauma Stevedoring Ltd is a full service port operator based in the Port of Rauma. The company operates all port functions: cargo handling, warehousing, shipping, shipping company services, international transport and customs warehousing services. The company turnover in 2004 was MEUR 53.8; the number of employees was 614.

World class technology, expert partner

Rauma Stevedoring decided to go with a WLAN standards based, Cisco Systems technology based wireless network solution. The system, covering the entire port area and browser based, was delivered by Cisco partner Signal Networks Finland.

"We selected a browser based WLAN solution because of versatility and efficiency. We want to have the same application for forklift mounted PCs, portable terminals and workstations. Signal Networks has the know-how for port solutions; they were the best company to deliver a turnkey solution", Ketola comments.

"We select the best possible solutions and products to meet customer needs. Cisco network hardware possesses excellent functionality and network control characteristics. Also, their security levels meet today's demands. Furthermore, Cisco solutions are expandable for future needs", says Signal Networks CEO **Pekka Laitinen**.

The entire Port of Rauma is covered by an indoor and outdoor WLAN. The basis of the solution are Cisco ACS authentication servers (2 units), Cisco WLSE monitoring servers (1 unit) for network appliance control and Citrix MetaFrame servers (2 units) for terminal administration. To cover the entire Port of Rauma and its buildings, 116 units of Cisco Aironet 1200 Access Points were installed. The selected antennae were LXE Spires, of which there are two per access point using a diversity antenna setting.

SIGNAL NETWORKS FINLAND OY

Signal Networks Finland provides wireless solutions for heavy industries. Signal is the Finnish importer of LXE (www.lxe.com) and a Business Partner of Symbol (www.symbol.com); it also implements WLAN solutions based on Cisco Systems products.

"By utilizing diversity antenna settings, we were able to expand access point range to its most extensive, and retain a stable link also on the perimeters of the network. To access points with no network cable access, we created links using Cisco 350 Wireless Bridges", points out Cisco systems engineer **Tomi Järventie**.

Selected as the vehicle terminal was the Linux based LXE VX3-12 forklift mounted PC. The operating system was designed in a way which requires no IT skills from users. The Symbol MC9000-G was selected as the portable terminal.

Increased efficiency and usability

The Rauma Stevedoring port network is Finland's largest mobile terminal WLAN solution used in a 24/7 critical business environment. The new system is more reliable, faster and more extensive than previously. The technology also meets future needs. The process approach eliminates overlap and makes resource usage more efficient.

Usability was also improved. The browser based system provides users with WLAN terminals which are faster, lighter, and have larger color screens. This makes working in a challenging environment easier.

"A browser based system with a graphic interface is more intuitive to use, and does not require extensive IT training. Thus, when training users we can concentrate on production applications", Ketola points out.

"Rauma Stevedoring's IT department played a significant role in this project. The challenges were met together, and cooperation is easy. The project support included Cisco Finland contact people and technical experts. The best is of course the result; a hundred per cent reliable WLAN covering the entire port area", says Laitinen of Signal Networks.

When browsers are fully introduced, the network will be expanded on the terminal side. Early next year, 140 more forklift mounted PCs and 40-50 handheld terminals will be deployed. Another future consideration is the utilization of the network for other use, including IP Telephony and geographical location.

Further information:

Rauma Stevedoring Oy
IT Manager Hannu Ketola
GSM +358 400 904938
hannu.t.ketola@raumasteve.fi

Signal Networks Finland Oy
CEO Pekka Laitinen
Tel. +358 9 3434 3350
pekka.laitinen@signalnetworks.fi

Cisco Systems Finland Oy
Sales Manager Jouni Mäntylä
Tel. 0204 7061
jouni.mantyla@cisco.com