Executive Summary

Location
Europe

Industry
Education

Challenge
To build a robust WLAN network covering a number of locations. The key challenge was to scale the number of locations covered, increase performance, yet control infrastructure costs.

Solution
Over a hundred units of Microsemi’s series 6500 and 9000 midspan injectors were deployed for their core IT infrastructure to power the campus-area WLAN network across 180 locations.

Results
Significant wireless performance with uncompromised bandwidth was accompanied by a major reduction in installation and configuration time, while also increasing the return on investment (ROI) of the network infrastructure to more than 8 years.

Client Background

Dustin is one of the leading online-based resellers of IT products with additional services and solutions in the Nordics. A leading networking and communications systems integrator in the region, Dustin solves IT problems for companies and makes IT accessible, using their knowledge to help customers find the right solutions.

Business Challenge

Tasked with providing staff and students with wireless coverage on multiple campuses, Dustin transformed their client’s WLAN coverage from a basic network overlay to that of core IT infrastructure. With Dustin’s help, the client planned to deploy 5,000 to 6,000 access points (APs), along with the necessary data switches, to build a robust WLAN network that covered all locations.

The key challenge was to scale the number of locations covered and increase performance while minimizing infrastructure costs. Wanting to maximize the lifetime of their investments, the client wanted to keep data switches in place with a lifecycle of at least eight years. Network administrators also faced fire safety regulations that restricted the use of more than three single ports in a wiring closet.
Microsemi’s Power over Ethernet (PoE) Midspan Injectors
Helping Customers Meet Burgeoning Wireless Network Demands

Microsemi’s Solution
After a detailed analysis of the client’s business requirements, Microsemi offered its PoE midspan injectors to efficiently and reliably power the comprehensive network of APs.

Several solutions were evaluated on key parameters such as quality, scalability, price, and service. The client chose to implement over a hundred units of Microsemi’s series 6500 and 9000 midspan injectors for their core IT infrastructure to power 180 locations across the campus-area WLAN network.

The customer credits the following distinct attributes of Microsemi’s midspan injectors as the key drivers of their decision:

- They enable full power per port on all ports concurrently, ensuring complete and un-interrupted power supply
- Remote management facilitates quick assessment of endpoint issues and allows remote reboot/power diagnosis
- Interoperability and compliance with industry technology and safety standards
- Lifetime warranty reduces total cost of ownership (TCO) and provides assurance to IT managers

Value Delivered
Already compatible with the customer’s adopted wireless infrastructure, Microsemi’s robust PoE midspan injectors were seamlessly deployed in the multi-site WLAN network, reducing the complexity of the transition.

As a result, the demand for full-speed wireless access across all campuses is being met. Wireless performance has improved with uncompromised bandwidth while enhancing the experience of staff and students. These significant performance advantages were accompanied by a major reduction in installation and configuration time, and an increase in the ROI of the network infrastructure to more than eight years.

Related Information

- PoE Product Portfolio: https://www.microsemi.com/products/poe-systems/poe-systems
- PoE Solutions for Campus Environments: https://www.microsemi.com/applications/industry-solutions/education

For more information and specifications, please call, email, or visit our website.