

Securely Meeting BYOD Demands at one of Britain's Leading Independent Schools

Allied Telesis network delivers secure, high-speed Internet access for Shrewsbury School with 24/7 uptime.

Customer: Shrewsbury School

Industry: Education

Location: Britain

Shrewsbury School is one of Britain's leading independent schools for 13-18 year olds, attracting students from across the world. It provides an excellent learning environment, consistently receiving "outstanding" grades by Ofsted and HM Inspectorate of Schools.

The majority of the School's 700 plus students take advantage of full boarding, which means that alongside the excellent teaching facilities, the Shrewsbury site also houses a wide range of other buildings and services, including eleven full boarding houses, two day houses, a medical centre, state-of-the-art sports facilities, a purpose-built catering hall and a Chapel.

Challenge

In an increasingly digital world, providing Internet access across the site is essential, particularly with the proliferation of mobile devices such as smartphones and tablets, which require increasing reliance on being "connected". However, the IT network was not able to keep up with the demands being placed on it, particularly by its digitally experienced students, who were expecting more and more of their devices and connectivity speeds.

Security of the network was also a big priority. The School is legally bound to safeguard its students and promote the welfare of children, but as "digital natives" this generation is sophisticated in the use of technology. An increasing number of smartphones, tablets and laptops were being attached to the network and students frequently found ways to navigate around passwords and locked-down sites.

The School needed a high-performance, resilient network that could handle increasing bandwidth demands and allow students to connect their devices, while providing a high level of security so the network support team could ensure an appropriate level of control and protection.



"The collaborative and flexible approach from Allied Telesis was a critical element that set the company apart from the competition. Having the benefit of a hands-on technical expert who was directly involved in our implementation was integral to the success of this project. Allied Telesis has exceeded our expectations in delivering a bespoke network solution that meets our specific requirements, with the responsiveness and flexibility required for a successful deployment and at a price which many other companies could not match."

Marcus Matthews

Network Manager, Shrewsbury School

Solution

Following a competitive tender, Shrewsbury School selected Allied Telesis to deliver a new, high-performance Ethernet network across the site.

The new network enabled students and staff to enjoy a high-speed network access on all types of devices, while working seamlessly with other standards-based network equipment to ensure a good end user experience.

There is port-based authentication utilizing active directory as an authentication server ensuring the upmost level of security across the whole site. This, coupled with dynamic VLAN assignment controlled by active directory, means only one network point is needed per room. Students and guests can plug in any device and receive different network access based on that device.

The Allied Telesis solution includes the following elements:

- ▶ Two SwitchBlade® x908 core switches stacked to ensure network resilience
- ▶ Six x610 Series fiber switches as distribution nodes to aggregate multiple buildings on a 10GB backhaul
- ▶ Four x510 Series switches as iSCSI interconnects on 10GB links
- ▶ Multiple 8000S Series edge switches to enable IEEE 802.11x security



“The new network was a major investment for the School and we needed to prove that our initiative would make a difference to the working life of the school and those involved with it. Allied Telesis has delivered a problem-free network that is maximizing uptime and delivering the speeds and security we need for the smooth running of the School site.”

Marcus Matthews

Network Manager, Shrewsbury School

Success

Shrewsbury School is seeing significant benefits from the new network infrastructure:

- ▶ High performance network, enabling hundreds of users to enjoy high speeds and instant access
- ▶ A bespoke network that is built around the School's exact needs, utilizing effective legacy equipment to make the most of existing investments, while introducing advanced technology to expand the network
- ▶ Control and protection for the network, using a range of technologies with the switching being at its core, the school has been able to adopt a secure and flexible BYOD strategy