

Case Study: Wireless Design and Implementation

Large private university leverages Atrion's wireless expertise with Extreme Networks for campus-wide deployment

When a large university in New Jersey needed to upgrade their wireless infrastructure throughout their campus, including in some new state-of-the-art buildings featuring student dormitories, social spaces, and advanced technology collaboration centers, they turned to Atrion for support in designing and implementing a solution.

The company received proposals from many providers and chose Atrion based on the experience displayed during initial meetings and a strong recommendation from another long-time customer.

The Challenge:

The university has a large campus with both indoor and outdoor spaces requiring strong, consistent wireless coverage. As a leading STEM school, technology is at the forefront of the university's success. In addition to new construction that required wireless infrastructure, the entire campus needed to be migrated from a legacy controller-based solution to ExtremeCloud IQ, all while seamlessly maintaining service throughout the existing buildings. Despite having a technical staff of their own, the university lacked the direct experience on the Extreme Networks wireless platform and the manpower to configure thousands of wireless access points (APs). Additionally, the university didn't have the physical space to stage the access points prior to deployment. An added challenge was that the legacy wireless system, implemented by a prior regime, was also broadcasting at full power, leading to interference throughout the deployment, requiring significant wireless expertise to continually tune the environment.

The Solution

To fully meet the business challenges and provide the company with the best possible solution, Atrion:

- Received four pallets of Extreme wireless gear at our office and staged the configuration of thousands of access points
- Created a secure and efficient wireless design, managed entirely by ExtremeCloud IQ
- Senior engineers regularly tuned the wireless environment while accounting for external network design factors and third-party interference
- Performed repeated site surveys throughout the entire campus to maximize coverage and performance
- Provided on-site professional services throughout the project, from design to staging and implementation

The Benefits

By choosing Atrion, the company realized the following benefits:

- Deployment of what is believed to be the first Wifi-6 network at any NJ university
- No need to find space to receive large shipments and stage the equipment
- A wireless network optimized for both coverage and performance
- Atrion managed the entire project from initial design to completion and support, providing the company with one point of contact for the duration of the project