Saint Ignatius’ College, Riverview, Proceeds on the Digital Education Revolution Track with Hitachi Data Systems

Saint Ignatius’ College, Riverview, in New South Wales, Australia, has a long tradition in and reputation for providing its students with the best educational tools available. Introducing a 1:1 laptop scheme to enhance the learning process meant the college needed to upgrade its central storage infrastructure. Hitachi Data Systems worked alongside Hitachi TrueNorth Partner Accucom to deploy Hitachi Adaptable Modular Storage 2100. The solution accommodates high data volume, encourages innovative learning, and better supports digital literacy for the college.

About Saint Ignatius’ College
Located in the Sydney suburb of Riverview, Saint Ignatius’ College, Riverview, is a Jesuit school for boys serving day students and boarders from years 5 through 12. Established by the Jesuits in Sydney, Australia, in 1880, it is part of the international network of Jesuit schools that began in Messina, Sicily, in 1548. Today, the college is committed to providing its 1,600 students and 300 staff with access to the best teaching and learning tools available.

A Digital Deluge
Educational institutions today are increasingly relying on technology for teaching and learning in and out of the classroom. In support of this trend, the Australian Government introduced the Digital Education Revolution (DER) initiative in 2009, which aims to deliver sustainable and meaningful change to education in Australian schools.

A major component of DER is the National Secondary School Computer Fund, which strives for a computer-to-student ratio of 1:1 for students in years 9 to 12 nationwide. Depending on need and preference, schools can purchase...
netbooks, laptops, tablet computing devices or desktop computers, or deploy a mix of mobile and stationary devices for use in the classroom.

According to Infrastructure Manager at Saint Ignatius’ College, Matthew Taylor, the college was facing requirements for computers that were growing beyond the 1,600 PC and Apple Mac clients currently deployed. The college was challenged with increasing demands on its storage network and needed a more robust solution to support its rapid data growth. With more and more students owning their own laptops, the college predicted resulting data growth of 25%, year on year.

“The college prides itself on providing innovative and effective e-learning environments that will encourage more critical student thinking, boost student interest and enhance communication between students and teachers.

“One of the courses that we offer is in multimedia, where students learn to film and edit movies. With video and data-rich applications now a large part of our school curricula, such large files mean that we need more room to store this additional data,” said Taylor.

Solution Takes Storage to the Top of the Class

Saint Ignatius’ College had been using Hitachi Adaptable Modular Storage (AMS) 200 as its core storage infrastructure for a number of years. This was used to store all email, databases, student records, print services and Linux data on the network. While this Hitachi offering had provided the college with a reliable solution for almost 5 years, it was reaching maximum storage capacity and was preventing the college from moving its information and communications technology capabilities forward.

In addition, the college wanted to implement a virtual desktop environment so that staff and students could access all of their data and applications outside of the classroom. This would allow students to access the college’s e-learning resources via their virtual desktops across any network and device, and from any location.

“We needed a solution that would maintain high levels of information availability, so that all staff and students would have easy and flexible access to files and applications should anything happen to the network,” said Taylor. “By providing access to the college’s resources over a virtual desktop infrastructure, we can enable students to learn both within the classroom environment as well as at their own pace in the comfort of their home.”

Saint Ignatius’ College Graduates to Storage Success

Saint Ignatius’ College engaged independent specialist storage solution provider Accucom and put out a tender with a number of different vendors to find a solution that met the college’s evolving needs. Accucom conducted a thorough analysis of the college’s existing storage infrastructure and recommended that it stick with Hitachi, considering the high reliability and interoperability that the company had previously delivered.

The college deployed Hitachi Adaptable Modular Storage 2100, a reliable, scalable storage system that provides enterprise-grade performance to manage its data and other applications. It also provides a virtualized storage network.

“We started with 3 storage racks and bought an additional rack at the beginning of this year,” said Taylor. “The upgrade was seamless. The new rack was installed in 10 minutes. It took longer to get the rack out of the box! The college also implemented Hitachi Device Manager and Hitachi Tuning Manager. These software modules allow Taylor to manage the storage network and analyze the data to help formulate improvements, all from a single intuitive web interface.

Accucom was integral to the entire deployment process. “Our solution architects worked in conjunction with Matthew Taylor to understand the college’s business drivers. This ensured that the solution we proposed would not only meet but also exceed their requirements and the system demands. We work in a consultative way with our customers as we believe that business is done through a strategic partnership, not on a transactional basis,” said Accucom Sales and Marketing Manager, Natasha Babic.
According to Matthew Taylor, with the new Hitachi solutions in place, catering for current and future storage capacity is easier than ever before. “We now have a faster and more powerful storage network that more than tripled our storage capacity from 7TB to 27TB. As a result, everyone’s storage quota has been increased from 500MB to 2GB, meaning we can share and store more multimedia files and do much more work with video,” he explained.

A Look Forward

With AMS 2100 now deployed, Saint Ignatius’ College is moving towards a virtual computing environment. A pilot of VMware View, VMware’s desktop virtualization and desktop management software, has been stored on AMS 2100 to provide select staff and students with access to their own virtual desktop. Full deployment of VMware View is planned in the next few months, following completion of the pilot with select year groups.

“The pilot has been very successful so far, giving staff and students greater mobility and freedom to access their information, and a complete rollout will be completed in the next 2 months. This would not have been possible without the AMS 2100,” Taylor said.

Another key step will be to put disaster recovery in place to guard in the event of a network failure on the primary system or a natural disaster. The college will be using Hitachi TrueCopy synchronous software, a remote mirroring feature built into AMS 2100, which saves data to primary and secondary sites simultaneously. It will provide the college with the ability to create a secondary disaster recovery site using its legacy AMS 200 hardware and provide peace of mind to both the IT staff and students. Once the college migrates its data from the legacy system to the new one the team will develop the mirrored site to provide a robust and reliable disaster recovery solution.

“The disaster recovery capability will rapidly reduce the hassle and downtime associated with network failures, and gives us peace of mind that our data is in safe hands. While the AMS 200 is being phased out as our primary storage system, we can use the storage system for our new disaster recovery site, giving us a higher return on investment,” added Taylor.

Taylor has determined that Saint Ignatius’ College now has a clear storage strategy to accommodate its rapid growth, ultimately providing its students with a superior learning environment. “We have been using Hitachi for a number of years and have always been really impressed with its performance. By providing the systems to adequately store, connect and back up our resources, we are confident that we have the foundation to provide our students with the education and training needed to live and work in a digital world,” he concluded.