

Integra Schools Case Study

• Schools IT Support Service Improves Storage Performance

Integra is the trading arm of South Gloucestershire Council. It provides whole school support to over 200 primary schools, secondary schools and academies across South Gloucestershire, Bristol, Bath, Somerset and Wiltshire. Among the wide range of services on offer, is fully managed and integrated ICT support for the Information Management Systems used by schools. This includes management of the entire storage infrastructure that is hosted across Integra's data centre facilities.

Integra approached us as they were having capacity and performance issues with their existing storage platform for their schools support service. This was hindering the company's ability to scale up its infrastructure as it added new schools to its support portfolio.

"Our existing storage system was coming to the end of its life," explains Nick Pearce, IT & Infrastructure Services Manager for Integra Schools. "We looked at the costs of purchasing new hardware and re-warranting the existing hardware for a further five years but it would have been a high five figure sum just to stand still. I needed to explore a more cost effective way to improve performance and support our growth plans."

• Considering the Options

Nick spoke to his colleagues in the corporate ICT department at South Gloucestershire Council and they recommended he take a look at HPE Nimble storage. Through an existing relationship with the council, the team at Cristie Data was asked to analyse the current performance and capacity requirements of the Integra infrastructure and assess whether Nimble might be the answer.

Through consultative pre-sales engagement, Cristie Data deployed the assessment tool Cloudscope. "It showed that we were only getting about 75% of the performance out of the 20,000 IOPs that we needed out of our existing storage," Nick Pearce explains. "It wasn't really a surprise that it couldn't cope."

This information, combined with the knowledge that the amount of data Integra was going to be handling would grow significantly, led Nick to ask Cristie Data look at exploring the potential in more detail.

integra.

schools

Challenges

- On premises Dell EqualLogic storage struggling to meet capacity
- Hardware coming to end of life
- Storage unable to support business growth

Solution

- HPE Nimble Storage CS5000 cloud-ready adaptive flash array from Cristie Data

Benefits

- Improved storage performance
- Increased storage capacity
- Ability to scale resources quickly
- Complete visibility of workloads
- Storage system that supports future business wins



cristie data
an iomart company

Storage / Virtualisation
Backup / Recovery / Protection

• HPE Nimble Storage from Cristie Data

In response to Integra's issues Cristie Data recommended the HPE Nimble Storage CS5000 cloud-ready adaptive flash array. This has delivered and exceeded the required IOPS and capacity needed and is independently scalable according to the individual requirements of each additional school that Integra brings onto its Wide Area Network (WAN). There are approximately 200 servers communicating with the new storage appliance at any one time

A key benefit is also the visibility of the workload. The InfoSight cloud-based predictive analytics engine in the CS5000 analyses and correlates millions of sensors from all globally deployed systems, continuously learning and analysing this data, which enhances the performance, reliability and predictability of every system.

"InfoSight has been amazing," Nick says. "If there's an issue, it notices it long before we do and I just get an email to say it's been fixed. It's definitely reduced my stress levels!"

HPE Nimble's Cache Accelerated Sequential Layout (CASL) architecture means that any firmware updates are performed with zero impact on the production systems in use by the schools that Integra supports.

Security is built in. The Nimble solution provides full encryption capability to AES-256 bit standards, ensuring Integra's own data protection and privacy policies are maintained. The storage arrays support frequent snapshotting, giving Integra the ability to roll-back systems to a specific point-in-time, thereby enhancing its existing backup and recovery procedures. They can also make use of triple-parity RAID, ensuring tolerance of multiple drive failures without any data loss.

• Results

Integra now has a reliable storage platform that it can build on. It can see the immediate impact when a new school system is added to its infrastructure, meaning that planning and budgeting for future expansion will be more accurate and well defined.

"The performance we see on a daily basis is phenomenal," says Nick Pearce. "The data compression is very, very good so we can run so much more on it and still have room to add more. I can predict where our usage is going three or four months ahead so nothing comes as a shock. If you know that you are picking up an extra 30 schools and they're going to want high quality video stored for instance, I know the system has us covered."

The ongoing partnership with Cristie Data means Integra can continue to plan its storage accurately to cope with new business it wins.

"Cristie Data's proven, consultative approach to infrastructure reviews enabled us to design, deploy and support a system that addressed all the previous issues that had been encountered, whilst providing a scalable, high-performance platform for Integra to build its business on," explains Ryan Smith, Director of Sales for Cristie Data. "Our engineers have been on-hand to assist the Integra IT team with the implementation and any ongoing optimisation of the environment and we look forward to seeing their business continue to expand as a result."

About Integra Schools

Integra Schools is one of the services offered by the trading arm of South Gloucestershire Council. It supports educational establishments with a unique set of cost-effective, forward-looking facilities management and specialist professional support solutions. For more information go to www.integra.co.uk

About Cristie Data

Cristie Data has been an IT infrastructure and data management specialist for over 40 years. We take a consultative and platform agnostic approach to any customer project and advise on the solutions that are best aligned to your business. For more information go to www.cristie.co.uk