Sarah Lawrence College Moves Backups Off Campus with ExaGrid and Gains Faster Backups

Customer Overview

Sarah Lawrence is a coeducational liberal arts college, offering undergraduate as well as graduate degrees. Located just north of New York City, the College is nationally renowned for its rigorous academic and creative standards. These are fostered by small seminar classes and individual student-faculty tutorials made possible by a very low student-to-faculty ratio of 6-to-1. Sarah Lawrence has been co-ed since 1968. The College’s 1,300+ undergraduate students and more than 300 graduate students come from nearly every state and from 34 countries.

Data Center Move Prompts Search for a New Approach to Backup

Sarah Lawrence College had been backing up its data to tape but its IT staff had grown tired of dealing with full backups that stretched as long as 36 hours each weekend. When the school began planning to move its datacenter to a co-location facility an hour away from campus, the IT staff knew it was time to look for an alternative to tape backups.

“It simply wasn’t acceptable for us to even consider using tape to back up data across the network to a co-location center,” said Sean Jameson, director of information technology at Sarah Lawrence College. “It was obvious to us that we needed a disk-to-disk solution that would give us faster backups and reduce our reliance on tape.”

ExaGrid Reduces Backup Times, Provides Data De-duplication to Maximize Storage Efficiency

After briefly considering backing up to straight disk, the College chose ExaGrid. The ExaGrid system works with the College’s existing backup application, CA ARCserve™ Backup.

“We easily could have built something ourselves with massive disks, but we wouldn’t have had the data de-duplication necessary to reduce our data. Also, the power draw and footprint alone for a system like that wouldn’t have been practical in a co-location facility, where we pay for rack space and are subject to electrical surcharges,” said Jameson.

Since moving its backups to ExaGrid, the College’s weekly full backups have been reduced from 24 to 36 hours to 10 to 12 hours. Nightly differential backups have been reduced from six hours to less than two hours.

One of the main reasons the College chose ExaGrid was its built-in data de-duplication technology.

ExaGrid combines last backup compression along with data de-duplication, which stores changes from backup to backup instead of storing full file copies. This unique approach reduces the disk space required by a range of 10:1 to 50:1 or more, delivering unparalleled cost savings and performance. ExaGrid delivers extremely fast backup performance because data is written directly to disk, and data de-duplication is performed post-process after the data is stored to reduce data. When a second site is used, the cost savings are even greater because ExaGrid’s byte-level data de-duplication technology moves only changes, requiring minimal WAN bandwidth.

“ExaGrid’s data de-duplication technology enables us to maximize the amount of data we can back up onto the system,” said Associate Director, Information Technology Khanh Tran. “Overall, we’re trying to reduce our energy usage and the ability to backup massive amounts of data onto ExaGrid’s 3U footprint certainly helps.”
ExaGrid Makes Moving to New Data Center Faster and Easier

The ExaGrid system not only provided relief for the College's long backup windows, it also helped make the process of moving the information from the campus datacenter to the co-location center easier.

The ExaGrid system was one of the first systems up and running in the new datacenter. The IT team moved VMware images from its servers in the old datacenter and backed them up to the ExaGrid system in the new datacenter. The images were then extracted from the ExaGrid to servers in the co-location facility.

"The ExaGrid system was critical in allowing us to move our data quickly to the new site and helped us get up and running as fast as humanly possible," said Jameson. "Also, we couldn't really keep tapes at our new site because we don't have personnel there. The ExaGrid has significantly reduced our reliance on tape and has enabled us to automate our backups."

Scalability and Flexibility to Address Future Needs

Since the College's data is growing quickly, scalability and flexibility were critical factors in choosing ExaGrid.

"We're looking to capture more data and to convert many of our paper documents to electronic files, so it's critical that our backup system be able to handle additional capacity in the future. With the ExaGrid system, we know that we can easily grow the system to back up more data," said Jameson. "Looking forward, we can also add a second system to replicate data and to further reduce our reliance on tape."

ExaGrid’s GRID computing software makes the system highly scalable, and when plugged into a switch, different sized configurations can be mixed and matched into a single GRID system with capacities of up to 60TB. Once virtualized, they appear as a single system to the backup server, and load balancing of all data across servers is automatic.

The ExaGrid was instrumental in helping us quickly move our datacenter offsite," said Jameson. "It was cost-effective to acquire and it has taken a lot of the pain out of our daily backup routines. We have a high degree of confidence in the ExaGrid system," said Jameson.

ExaGrid and CA ARCserve Backup

CA ARCserve Backup delivers reliable, enterprise-class data protection across multiple hardware and software platforms. Its proven technology — unified by a single, easy-to-use interface — enables multi-tiered protection driven by business goals and policies. Organizations using ARCserve Backup can look to ExaGrid as an alternative to tape for nightly backups. ExaGrid sits behind existing backup applications, such as ARCserve Backup, providing faster and more reliable backups and restores. In a network running ARCserve Backup, using ExaGrid in place of a tape backup system is as easy as pointing existing backup jobs at a NAS share on the ExaGrid system. Backup jobs are sent directly from the backup application to the ExaGrid for onsite backup to disk.

Intelligent Data Protection

ExaGrid's turnkey disk-based backup system combines high quality SATA drives with byte-level data de-duplication, delivering a disk-based solution that is more cost effective than standard SATA drives. ExaGrid's byte-level data de-duplication technology stores only the changes from backup to backup instead of storing full file copies, reducing the amount of disk needed by a range of 10:1 to 50:1 or more, resulting in a solution that is 25 to 30% the cost of standard SATA drives. The ExaGrid system is easy to install and use and works seamlessly with popular backup applications, so organizations can retain their investment in existing applications and processes.

ExaGrid servers can be used at primary sites and secondary sites to supplement or eliminate offsite tapes with live data repositories for disaster recovery.

For more information about ExaGrid, please visit us at www.exagrid.com or call us at 1-800-868-6985.

About ExaGrid Systems, Inc.

Customers worldwide depend on ExaGrid Systems to solve their backup problems—effectively and permanently. ExaGrid’s disk-based, scale-out GRID architecture adjusts to increasing backup demands due to constantly growing data volumes. It is the only solution that combines compute with capacity as well as a unique landing zone to permanently shorten backup windows and eliminate expensive forklift upgrades. Learn more at www.exagrid.com.