Customer Overview
The Washington School Information Processing Cooperative (WSIPC) is a public cooperative in Washington that provides information services to the state's school districts. WSIPC membership includes 279 school districts and nine Educational Service Districts, whose member districts serve approximately 715,000 students in 1,463 schools throughout the state of Washington.

Fast Growing Data Led to Long Backup Times
WSIPC had been struggling with how to best back up and store its fast growing data for some time. The organization had been backing up to tape, but nightly backups had been taking nearly 24 hours to complete, leaving little time for restores or maintenance.

“Our data grows at a rate of nearly 50 percent a year. We were backing up to tape, but our backup windows had grown to the point where our jobs were running constantly,” said Ray Steele, senior systems engineer at WSIPC. “We began looking for a new backup solution in conjunction with a datacenter consolidation project and decided to investigate disk-based backup solutions in an effort to cut our backup times and to streamline operations.”

Cost-Effective ExaGrid System Delivers Powerful Data Deduplication and Scalability
After looking at several different approaches, WSIPC narrowed down the field to systems from ExaGrid and EMC Data Domain.

“We looked closely at solutions from both ExaGrid and Data Domain and found that we liked ExaGrid’s post-process data deduplication better than Data Domain’s inline method. With ExaGrid’s approach, the data is backed up to a landing zone so that the backup times are faster,” Steele said. “The ExaGrid system was also more cost-effective and scalable than the Data Domain unit.”

WSIPC purchased a two-site ExaGrid system and installed one system in its primary datacenter in Everett, Washington and a second in Spokane. Data is automatically replicated between the two systems each night in case it is needed for disaster recovery. The ExaGrid units work in conjunction with the organization’s existing backup application, HP Data Protector.

48:1 Data Deduplication Dramatically Reduces Amount of Data Stored, Speeds Transmission Between Sites
“We’ve been very impressed with ExaGrid’s data deduplication technology. Our data dedupe ratio is currently 48:1, which really helps to make the most of the disk space,” said Steele. “The data deduplication also helps to speed the transmission time between sites because only the changed data is sent over the WAN. When we set the system up, we were prepared to increase our bandwidth to accommodate for lots of additional data, but we haven’t had to do that because the ExaGrid does such a good job at deduplication.”

ExaGrid combines last backup compression along with data deduplication, 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 deduplication 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 zone-level data deduplication technology moves only changes, requiring minimal WAN bandwidth.

**Backup Times Reduced from 24 Hours to Six Hours**

Steele said that since installing the ExaGrid system, the organization’s backup times have been reduced from nearly 24 hours to six hours.

“Our backup jobs run so much faster now, and they run flawlessly. We basically don’t think about backups anymore,” he said.

**Easy Setup, Management and Administration**

The ExaGrid system was designed to be easy to set up and maintain, and ExaGrid’s industry-leading customer support team is staffed by trained, in-house engineers who are dedicated to individual accounts. The system is fully supported and was designed and manufactured for maximum uptime with redundant, hot-swappable components.

“We installed the ExaGrid system ourselves and it couldn’t have been easier. We unpacked the unit, racked it, and called into ExaGrid support to finish the setup,” said Steele. “Once the system was up and running, we really haven’t had to touch it. It doesn’t require any real thought once it’s set up, and it’s very easy to manage.”

Steele said that ExaGrid’s customer support is knowledgeable and proactive.

“ExaGrid’s customer support team has done a wonderful job for us,” he said. “They have been extremely helpful and answer our questions promptly. Also, they’re very good at keeping us informed about new developments and they’re proactive.”

**GRID Architecture Ensures Scalability**

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 a 130TB full backup plus retention. Once virtualized, they appear as a single system to the backup server, and load balancing of all data across servers is automatic.

“One of the main reasons we began looking for a new backup solution was to keep up with our fast growing data. ExaGrid’s GRID architecture will enable us to easily scale up to meet our future requirements,” Steele said. “With the ExaGrid system, we’ve been able to reduce our backup times and reliance on tape, and we’re more confident in our ability to properly back up our data.”

**ExaGrid and HP Data Protector**

The ExaGrid system supports cost-effective and scalable disk-based backup using HP Data Protector backup software. ExaGrid also supports the ability to replicate HP Data Protector backups to a second site for off-site disaster recovery protection.

**Intelligent Data Protection**

ExaGrid’s turnkey disk-based backup system combines high quality SATA drives with zone-level data deduplication, delivering a disk-based solution that is more cost effective than standard SATA drives. ExaGrid’s zone-level data deduplication 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 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.