



PGA TOUR SUPERSTORE RANKS COMPELLENT AT THE TOP OF THE DATA STORAGE LEADERBOARD



As any golfer will tell you, it takes years of dedication to improve your game—but access to the latest equipment and professional expertise can certainly accelerate the process. The PGA TOUR Superstore offers one-stop shopping with a complete range of apparel, equipment and furnishings to complement the golf and tennis lifestyle. The exclusive PGA TOUR

partner for off-course/off-airport golf retailing, PGA TOUR Superstore also rounds out its product lineup with personal instruction from players with real PGA TOUR experience.

Although the retailer started small with two stores in 2004, its selection and service has proven to be right on par with what consumers want. In just three years, the number of stores grew to 10—rapid growth that created a series of IT challenges.

“Rapid growth resulted in a disparate and unwieldy IT infrastructure that was hard to manage with a limited staff,” says Gentry Ganote, chief information officer of PGA TOUR Superstore’s parent company, Golf & Tennis Pro Shop. “Server growth was difficult and expensive, and isolated disks meant we were utilizing only 20 percent of our storage—we needed to draw up a plan for a scalable infrastructure that could keep up.”

Ganote planned a move to a blade infrastructure supported by a storage area network (SAN) to centralize operations on a scalable architecture that could support growth.

“When I began assessing SANs, Compellent stood out from the crowd,” said Ganote. “Increasing utilization was a primary goal, and I quickly saw how Compellent’s Thin Provisioning and Automated Tiered Storage features could get us where we needed to be.”

The Compellent® Storage Center™ SAN now houses 6 TB of Fibre Channel and Fibre ATA drives that support the 11 blade servers powering business across all 10 PGA TOUR Superstores. Ganote’s team uses the SAN to host Microsoft® SQL Server® databases, and employees at store locations can log into servers remotely to access Microsoft Exchange e-mail services as well as time and attendance applications.

AUTOMATED TIERED STORAGE AND THIN PROVISIONING LOWER DATA CENTER TCO BY 50 PERCENT

Compellent’s Automated Tiered Storage helps PGA TOUR Superstore cut administrative time and reduce the overall storage total cost of ownership (TCO). By dynamically classifying and moving data to the optimum storage tier based on frequency of use, Automated Tiered Storage enables Ganote to reserve high-performance storage for the



“It’s our job to make sure our teams have fast and easy access to the tools necessary to provide good customer service. With Compellent in our data center, we have the perfect tool for the job.”

GENTRY GANOTE
Chief Information Officer
Golf & Tennis Pro Shop, Inc.
(Owner and Operator of PGA TOUR Superstore)

RESULTS REPORTED BY PGA TOUR SUPERSTORE

- » Thin Provisioning helped increase utilization from 20 percent to 60 percent
- » Automated Tiered Storage enabled PGA TOUR Superstore to purchase fewer drives upfront
- » Boot from SAN technology and support for Virtual Iron helped decrease server deployment time from two weeks to five minutes, and helped triple the return on server investment
- » Virtualization on blades helped reduce data center footprint by 30 percent
- » PGA TOUR Superstore now saves approximately 40 percent in operational expenses and realizes 50 percent less TCO over three years when compared to alternative SAN solutions

OPERATING SYSTEMS

- » Microsoft Windows Server 2003
- » Linux

KEY APPLICATIONS

- » Virtual Iron
- » Microsoft Exchange
- » Microsoft SQL Server

LET COMPELLENT BE YOUR CADDY

For Compellent customers, automated features can help significantly reduce costs. In fact, Ganote estimates that PGA TOUR Superstore is saving 40 percent in operational expenses due to Compellent's Thin Provisioning and Automated Tiered Storage. "Without the intuitive Compellent interface and features, we would have to manually tier data," says Ganote. "It's almost like we have an extra IT person watching our data and putting it where it needs to go. It's practical, easy, and it's the way storage should work."

"In the past, it would take at least a couple of weeks to get a single server deployed from start to finish. With Compellent and Virtual Iron, I went from a single server to three front-end servers with a back-end SQL Server in about two hours."

GENTRY GANOTE
Chief Information Officer
Golf & Tennis Pro Shop, Inc.
(Owner and Operator of
PGA TOUR Superstore)

COMPELLENT

7625 Smetana Lane
Eden Prairie, MN 55344

Tel: 877-715-3300

Fax: 952-294-3333

sales@compellent.com

www.compellent.com

applications that need it most. And because it helps reduce costly and time-consuming management usually performed by staff, Automated Tiered Storage lowers TCO while minimizing staff training.

Compellent Thin Provisioning delivers the highest storage utilization possible by eliminating allocated but unused capacity. Ganote now allocates any size of virtual volume upfront, but actual physical storage is only consumed as data is written. Since his storage no longer sits idle, Ganote now purchases fewer drives as storage demands grow.

"Our systems only use the storage they really need—nothing is wasted," he explains. "By improving utilization this way, we're also increasing available capacity and system performance."

Thin Provisioning helps the IT staff at PGA TOUR Superstore improve efficiency as well. New volumes can be created in seconds, enabling Ganote's team to more quickly respond to user demands for more storage. Building on the SAN's ease of use, Compellent's intuitive interface allows provisioning and other management services to be performed remotely.

"From a management standpoint, we require fewer personnel to manage and deploy servers because I can access the Compellent Web interface no matter where I am," says Ganote. "That flexibility means the team has more time to focus on value-added initiatives in the data center, like virtualization."

Compellent's Thin Provisioning and Automated Tiered Storage enabled PGA TOUR Superstore to lower three-year TCO by 50 percent compared to other SAN alternatives.

"We're actually using all the storage we buy, so we can purchase fewer drives upfront—and because most of data is being accessed only 5 to 10 percent of the time, those drives don't need to be expensive high-performance drives," Ganote says. Compellent allows us to achieve a lot more storage per dollar."

VIRTUALIZATION AND BLADE SUPPORT TRIPLE RETURN

With virtualization software from Virtual Iron, Ganote lowered server costs by tripling the effectiveness of existing hardware. Compellent storage virtualization complements Virtual Iron by enabling Ganote to create high-performance, highly efficient virtual volumes in seconds—without allocating drives to specific servers, complicated capacity planning and without performance tuning.

"Virtual Iron connected seamlessly to the Compellent SAN, which easily identified the compute nodes from the virtualized servers and allowed us to create logical volumes," explains Ganote.

Virtualization also allows Ganote to take advantage of Compellent Boot from SAN technology to help improve server deployment time. By creating copies of server volumes to act as "gold" images and mapping them to the SAN, new servers are up and running in as little as five minutes.

"In the past, it would take at least a couple of weeks to get a single server deployed from start to finish," explains Ganote. "With Compellent and Virtual Iron, I went from a single server to three front-end servers with a back-end SQL Server in about two hours."

Building on the efficiencies of the SAN and virtualization with a new blade infrastructure, Ganote reduced the data center footprint by 30 percent, resulting in lower power and cooling costs. "By virtualizing on blades, I can typically put three virtual servers on a single machine, tripling the value of that hardware," he says.

Ultimately, the Compellent SAN is making it easier for Ganote and his team to support the retail staff at PGA TOUR Superstores across the country.

"Every pro needs a caddy," says Ganote. "It's our job to make sure our teams have fast and easy access to the tools necessary to provide good customer service. With Compellent in our data center, we have the perfect tool for the job."