



KEY HIGHLIGHTS

INDUSTRY: EDUCATION



CHALLENGE

Dominican University wanted to reduce disaster recovery time, provide system fault tolerance and control the cost of acquiring new servers.

SOLUTION

Using VMware® Infrastructure 3 products to virtualize its application servers, Dominican University dramatically cut disaster recovery time, reduced hardware replacement cost and improved CPU utilization.

VMWARE AT WORK

- VMware Infrastructure 3 Standard, featuring:
 - ESX Server 3 with VMFS
 - VirtualCenter 2

DEPLOYMENT ENVIRONMENT

- ESX Server 3 on HP ProLiant DL585 servers with 4 CPUs, 16G RAM and 200GB disk
- Guest operating systems: Windows Server 2003 with Active Directory service and SUSE Linux
- Applications: Blackboard Transaction System, CollegeNET, Crystal Reports, Windows Server Update Services, Symantec AntiVirus Corporate Edition and numerous Web servers

"In the past, if a server failed, disaster recovery time would have taken anywhere from one to three days. With VMware technology, recovery time is reduced to just hours."

Jackson Ratcliffe

Executive Director of Information Technology, Dominican University of California

Dominican University

Founded in 1890, Dominican University of California is located 12 miles north of San Francisco. The university has a long-standing reputation for excellence in scholarship, research and community outreach. With approximately 500 faculty and staff members, Dominican University offers more than 60 programs of study to nearly 2,000 undergraduate and graduate students. From a single data center on the university's main campus, the information technology department provides a variety of application, intranet and Web services to faculty, staff and students.

In 2003, there were 35 servers in the data center; within three years, that number had grown to 60 and was still growing. The new servers provided additional application services and system redundancy, but along with those came increased complexity and operating costs. "My focus was on providing disaster recovery and system fault tolerance," says Ratcliffe. "I also wanted to reduce the cost of acquiring new hardware." After testing other virtualization products, VMware stood out among its competitors with the most mature and reliable high-performance solution that could provide both hardware cost savings and advanced management features like disaster recovery.

Results

- Reduced server disaster recovery time by 94 percent
- Reduced server replacement costs over three years by 60 percent
- Increased CPU utilization by up to 88 percent
- Reduced new server deployment time from days to hours
- Maximized application availability
- Reduced air-conditioning and electrical requirements by 15–20 percent
- Eliminated rack space problems