



First Commercial Bank

Protecting Data During Rapid Growth with Symantec Solutions

To support growth, protect customer data, and increase efficiency, Taiwan's First Commercial Bank turned to Symantec for backup and recovery, disaster recovery, and high availability solutions. Results include the ability to back up a 150 percent annual increase in data without an increase in the backup window, 10 hours a week saved in backup staff time, twofold faster server restoration, and enhanced ability to achieve ISO 27001 certification for information security. Also, a Symantec high availability solution now enables instant failover for critical bank databases.

ORGANIZATION PROFILE

First Commercial Bank (www.firstbank.com.tw) is one of the premier commercial banks in Taiwan. Founded in 1899 and headquartered in Taipei, First Commercial Bank is among the top 200 largest banks in the world, with \$37.3 billion in total assets, more than 7,100 employees, 190 branch offices in Taiwan, and 13 offices outside of Taiwan.

INDUSTRY

Financial Services

SOLUTION

Backup and Recovery
Disaster Recovery
High Availability

Customer First, Service Foremost

Many businesses talk a lot about putting the customer first, but a select few go a step further and make exemplary customer service an integral part of their corporate culture. Such is the case at First Commercial Bank, one of Taiwan's premiere financial institutions. "Customer first, service foremost" is the bank's tradition—a goal that is reflected in its commitment to responsible stewardship of sensitive customer data.

First Commercial Bank has won The Banker magazine's "Bank of the Year in Taiwan" for the second year running, and has also been recognized with awards from Asiamoney and Taiwan's Financial Supervisory Commission (FSC). To protect its reputation and ensure that customer data is secure, the bank relies on Symantec solutions.

Managing Rampant Data Growth

The rapid proliferation of online banking services combined with First Commercial Bank's efforts to centralize and consolidate branch data to its main data center in Taipei have resulted in a temporarily inflated data growth rate of 150 percent per annum. The bank has used Veritas NetBackup™ since 2003, and has been able to effectively protect its growing data stores without imposing a significant burden on IT staff.

"Because of the centralized management that NetBackup provides, we've been able to accommodate this data growth while at the same time eliminating some administrative tasks and reducing time spent on backup and restore operations," says Chin-Fu Lee, vice president and division chief, First Commercial Bank. "Prior to NetBackup, we had no centralized management capabilities. System administrators at each of our locations had to do backups and restores on a per system basis, using native system utilities. Due to NetBackup, the time required to administer backups is growing at a lower annual rate than our data."

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Vice President
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Using Veritas NetBackup, First Commercial Bank has almost doubled its backup and recovery success rates to 95 and 100 percent

“Systemx made it possible for us to get the most out of NetBackup and reduce our labor costs.”

Chin-Fu Lee

Vice President and Division Chief
First Commercial Bank

“Using the NetBackup Vault Agent and virtual tape library replication, we’ve reduced time spent on backup and restore operations by 10 hours per week.”

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Lee appreciates the fact that NetBackup works with a wide variety of hardware and software—a business requirement for the bank, given its heterogeneous technology environment. “We use a variety of databases for our financial data, along with different servers, storage arrays, and tape libraries,” says Lee. “NetBackup is able to accommodate all of these systems.”

Saving 10 Hours of Staff Time Per Week

NetBackup Agents for IBM DB2, Oracle, and Microsoft SQL Server enable First Commercial Bank to perform streamlined backup of those applications. In addition, the bank is using the NetBackup Vault Agent to automate tape rotation and facilitate offsite media tracking, saving 10 hours of staff time every week.

“Before we used the Vault Agent, upon completion of every backup, the administrator needed to eject tapes manually and move them to our disaster recovery facility in Taichung,” says Lee. “Now, using a combination of the NetBackup Vault Agent and virtual tape library replication capabilities, we’ve reduced the time spent on backup and restore operations by 10 hours per week.”

Lee emphasizes, however, that the security of customer data is the most important consideration. “The key point is not how many hours we’re saving, but that we now have standardized operations that ensure data security,” he says.

The bank is also using the NetBackup Desktop and Laptop Option to provide continuous disk-based protection and synchronization for users that are in the office or on the road, as well as the Shared Storage Option to enable dynamic sharing of individual tape drives by “virtualizing” tape resources. “Since we enabled the Shared Storage Option,” says Lee, “we have increased tape drive utilization by dynamically sharing tape drives between media servers. As a result, tape drives are no longer automated by individual media servers.”

SOLUTION AT A GLANCE

Business Drivers

- Enhance data backup and recovery
- Improve protection for customer data
- Reduce backup and recovery administration time
- Streamline internal and external audit requirements
- Offer high availability for Microsoft SQL Server databases

Technology Challenges

- Centralize backup administration across heterogeneous systems
- Stay within 10-hour backup time window
- Automate tape ejection and rotation
- Minimize recovery time for Microsoft Windows-based servers

Solution

Backup and recovery solution with high availability solution for SQL databases

Symantec Products

- Veritas NetBackup™ with
 - Agent for DB2
 - Agent for Microsoft SQL Server
 - Agent for Oracle
 - Vault Agent
 - Desktop and Laptop Option
 - Shared Storage Option
- Symantec Backup Exec™ System Recovery Server Edition
- Veritas Storage Foundation™ High Availability (HA) for Windows

Symantec Services

- Symantec Essential Support Services

Symantec Partner

- Systemx (<http://www.systemx.com.tw>)

Technology Environment

- Applications: Custom core banking applications, Microsoft Office
- Databases: Oracle; Microsoft SQL Server 2000, 2005; IBM DB2
- Servers: IBM mainframes running z/OS; IBM servers running IBM AIX, Microsoft Windows Server 2003, Red Hat Enterprise Linux, and SUSE Linux Enterprise
- Storage: IBM System Storage DS8000 for mainframes; Fujitsu ETERNUS 6000; EMC CLARiiON CX3-40; IBM DS4500; Sun StorageTek C280, C178, B280
- Tape Libraries: Sun StorageTek VSM2, VSM3 virtual tape libraries, and StorageTek 9310 for mainframes; Overland REO9000, REO9100, NEO4000 for UNIX and Windows

Near 100 Percent Successful Data Recovery

Prior to NetBackup, First Commercial Bank's backup success rate hovered in the 50 to 70 percent range. After implementing NetBackup, the backup success rate rose to over 95 percent, according to Lee. "Usually backups are 100 percent successful," he says. "Any gap comes from occasional human error in setup issues or running short on tape. Using NetBackup, we're able to stay within our 10-hour backup window for incremental backups."

The bank's recovery success rate was similarly affected, having ranged from 50 to 70 percent before NetBackup. "With NetBackup, our recovery success rate is now close to 100 percent," says Lee.

Twofold Faster Recovery of Business-Critical Servers

To enable rapid recovery of its Microsoft Windows-based servers, First Commercial Bank uses Symantec Backup Exec™ System Recovery Server Edition. Before using the solution, recovering a server manually from CDs and loading data from disk took approximately four hours. Using Backup Exec System Recovery, servers can now be recovered in two hours.

"Before using Backup Exec System Recovery, we had to install the operating system and apply all required patches manually, which was time consuming and error prone," says Lee. "With Backup Exec System Recovery, we can restore even to dissimilar hardware, which was helpful recently when we migrated some of our rack-mount servers to blade servers."

High Availability for Customer Data

The bank is also using Veritas Storage Foundation™ High Availability (HA) for Windows to increase uptime and provide virtually instant failover for its Microsoft SQL Server 2000 and 2005 databases, which store the customer data that is used internally by bank employees. The bank has

BUSINESS VALUE AND TECHNICAL BENEFITS

Enhanced Backup and Recovery

- 10 hours/week less staff time devoted to backup and recovery tasks
- Over 95% backup success rate (increased from 50-70%)
- Near 100% recovery success rate (increased from 50-70%)
- 10-hour backup window maintained despite 150% annual data growth

Improved Disaster Recovery

- 95% improvement in recovery time objective (RTO) of Microsoft SQL Server databases—from 4 hours to 10 minutes
- Twofold faster recovery of Microsoft Windows-based servers

Security and Compliance

- Achieved ISO 27001 certification for information security management
- Easier compliance with internal and external audit requirements

implemented a 1:1, active/active clustering architecture using the Veritas Cluster Server technology included with the Storage Foundation HA solution.

"Failovers happen once or twice per year when systems become unstable," says Lee. "However, there is no impact on our users. Using Storage Foundation HA, a database instance can be taken over by another server very smoothly, with no downtime." Lee reports a recovery time objective (RTO) of 10 minutes, a 95 percent reduction from the four hours they experienced prior to implementing the Symantec solution.

A trusted Symantec Partner for 24x7 Support

First Commercial Bank receives front-line support and systems integration services through Systex, a Symantec Partner based in Taiwan. For NetBackup, the bank chose Symantec Essential Support Services, delivered through Systex, for round-the-clock support.

"Systex provides timely service and troubleshooting, and helped us integrate NetBackup into our environment quickly," says Lee. "They're very capable technically. Systex made it possible for us to get the most out of NetBackup and also reduce our labor costs."

Achieving Operational Excellence

The standardized backup and restore procedures made possible by NetBackup helped enable First Commercial Bank to achieve ISO 27001 certification in August 2006, according to Lee. Compliance with this respected global information security standard will allow the bank to be more competitive and provide its customers with even greater confidence that their data is secure.

"By providing an easy-to-manage, standardized platform for backup and recovery, NetBackup has made it possible for us to comply with internal and external audit requirements and meet our standards of operational excellence," concludes Lee. "And that means ensuring transaction integrity and service stability for our customers in Taiwan and around the world."