

S U C C E S S S T O R Y

Hitachi Storage Solutions at Work

Bank Nederlandse Gemeenten

INDUSTRY Finance

SOLUTIONS *Business Continuity/Disaster Recovery*

Hardware—Hitachi Universal Storage Platform™

Software—Hitachi In-System Replication software bundle



“A bank is really just one big information system: IT is its operational core. A bank that doesn’t have access to its IT for three days will be bankrupt.”

*Fred Apon
IT Infrastructure Specialist
BNG*



**BANK
NEDERLANDSE
GEMEENTEN**

BNG: Success Is Determined by Human Factors

While the amount of stored data keeps growing, the Bank Nederlandse Gemeenten (Bank for Netherlands Municipalities or BNG) wants to enable its employees to retrieve stored documents quickly. This is why BNG replaced its Hitachi Lightning 9970V™ single-cabinet enterprise storage SAN solution with a system that offers improved scalability. The organisation opted for the Hitachi Universal Storage Platform™ model USP100, which, besides the greater storage capacity and better performance, offers more management capabilities.

Data storage forms a major part in the diverse activities of BNG's IT department. In its capacity as financial service provider, BNG needs to comply with strict legislative and regulatory standards. BNG takes very strict measures to ensure continuity, availability, and security. Moreover, the Dutch government requires that banks store an increasing amount of information. Also, despite the existence of guidelines such as Sarbanes-Oxley and Basel II, not all legislation has fully crystallised, and consequently, BNG's staff would rather store too much than too little information. Partly due to this, BNG's data storage has seen considerable growth during the last few years.

Fred Apon, IT infrastructure specialist, BNG, suspects that this growth will continue for

quite some time. "We are not only obliged to store more data, but, as a result of the growing number and complexity of applications, the data volume has expanded considerably. We also need to store more and more extra copies for security reasons and the necessity to separate environments. In many cases, between ten or fifteen copies are involved," he explains. In this framework, the Hitachi In-System Replication bundle offers him exactly the functionality that BNG requires. The documents also have a much greater size than the formats that were used, say ten years ago: examples include Microsoft® PowerPoint presentations, images, and in some cases even movies—and simply the fact that a Microsoft Word document requires much more storage space than a WordPerfect file.

Additional Features, Same Cost Structure

In 2002, BNG decided to set up a SAN environment in its primary data centre in The Hague as well as a disaster recovery data centre in Rijswijk. The SAN was based on a Lightning 9970V system configuration. BNG opted for a more open and flexible platform for various reasons, including faster disaster recovery, simplified management through centralisation, and standardisation and continuous data availability. To date, BNG has been very pleased with its decision. Even so, the platform failed to meet all of the bank's increasing number of requirements. "We were nearing the capacity limit. Hitachi Data Systems saw this coming, too. We have regular contact with Hitachi Data Systems, and quickly found ourselves negotiating a new solution that was more future-proof and scalable. I was particularly excited by their promise that the USP100 would offer better management functionality at the same cost level," Apon comments.

This positive relationship meant that Hitachi Data Systems did not have to put in a great effort to convince BNG of its best options, especially as both parties communicated so well. "Hitachi Data Systems always lives up to its promises. All banks invest heavily in reliability and security, and we are no exception to the rule. It is ingrained in our culture, so that we in turn make reliability the central criterion when we evaluate vendors," Apon says.

Another important criterion for Apon was whether the USP100 would operate in more or less the same way as the Lightning 9970V system. "After all, it's no good to have to throw all your knowledge and practices overboard," Apon explains. The USP100 is a logical follow-up, offering a broader range of capabilities at the same costs and allowing the IT department to work more efficiently.

Storage Layers

One of the features provided by the USP100 is that it can accommodate different types of disks in a single storage system, which meant that BNG was able to insert multiple storage layers. Apon explains, "This has allowed us to differentiate according to the requirements of our customers. It is one thing to make all the data available at lightning speed, but one should not forget the costs involved. With the new storage system, we are able to match the customer's performance requirements

For change management, the USP100 has the important capability to perform micro-code upgrades in actual real time, without connectivity loss, even if systems are linked using a single connection.

Apon doesn't need to waste words on the migration: "It went like a charm, without a single failure. This is the result of excellent communication between us, which guarantees that the preliminary cycle went smoothly and the eventual migration did not lead to any problems. We are both relatively small players

Another point of interest is the use of SAN storage for backup and archiving purposes, as the case may be in combination with encryption, deduping, and compression. Apon explains, "As I indicated earlier, single documents are often stored in various different places. This not only takes up a lot of storage space, but it also results in an additional management burden. This is an issue we can't afford to neglect, so we are currently investigating the possibilities. We are also keeping abreast of the developments in IP storage, which is certainly an interesting area. However, for our organisation it is way too early to adopt this."

At present, BNG can manage perfectly with the SAN implemented by Hitachi Data Systems. And if this situation should change, Hitachi Data Systems will be the first to hear about it. "Migrating to another environment would involve too many disinvestments. A much more important consideration, however, is that Hitachi Data Systems has consistently provided us with solid advice during the last five years. Storage involves more than technology. It must be aligned with the entire IT environment and with the operational approach. Hitachi Data Systems is interested in finding out about its customers and asks the right questions, so it is able to come up with the right alternatives. In the end, success is determined by human factors," Apon concludes.



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against the costs. We can now pass on various rates to our internal customers, depending on the required storage quality level."

Apon draws an analogy with his home administration: "I have immediate access to my bank statements, but I keep the deed of purchase for our house somewhere in a box with other important documents. I am perfectly able to retrieve the document, but it doesn't matter to me that this will take a little longer."

Another important feature is the ability to isolate mission-critical business applications and dedicate resources to them, so that Apon is able to offer his internal customers improved quality of service.

The new platform also offers the possibility to create disk snapshots. BNG has already been using this feature on a regular basis to create security copies software upgrade and patch cycles. The data is replicated to the disaster recovery centre in Rijswijk through use of Hitachi Remote Replication software. This allows BNG, in the event of a calamity, to continue its operations without losing any data, guaranteeing its service provision to customers.

and share a culture characterised by reliability and continuity. In other words, BNG and Hitachi Data Systems are a good match."

Growth Path

It is evident from the fact that BNG is not yet using all the features available on the USP100 platform that the solution selected by BNG will provide scope for growth in the future. However, IT is already closely evaluating a number of these features, such as the virtualisation feature. "The implementation of virtualisation is not as simple as vendors would have you believe. Although we are studying this aspect, the benefits still do not justify the costs. In our current setup, there is not enough need to split our environment into completely separated sections, as all of our customers are BNG employees. This may be true for other companies as well. In contrast, for IT service providers that provide outsourcing services for full business processes, virtualisation by definition forms a highly relevant development," says Apon.

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