

Case Study

Popular Indonesian Fast Food Chain Serves Up Data Storage Efficiency with NetApp Architecture





KEY HIGHLIGHTS

Industry

Food and Beverage

Location

Indonesia

Business Challenges

- Limited capacity that made systems unable to cater to rapidly growing volumes of business-critical data
- Lack of scalability that could result in excessive hardware and manpower costs
- Downtime due to system disruptions from incidents such as power outages

The Solution

NetApp FAS3220 with NetApp Virtual Storage Console (VSC) for VMware 'vSphere" and NetApp' Flash Pool" which provided a unified storage architecture that offered consistent data management, integrated data protection, and industry-leading storage efficiency.

Benefits

- Increased storage capacity from 6TB to 66TB
- Improved business continuity, reducing downtime from 1 hour/year to 15 minutes/year
- Reduced backup windows that took one or two days to one hour
- Decreased operational expenses by 30 percent

The Customer

Hoka Hoka Bento (HokBen), is a popular Japanese fast food chain in Indonesia. In Japanese, it means "a warm box meal". Established in 1985, this leading player in Indonesia's food and beverage (F&B) industry manages and operates 150 outlets all throughout Java and Bali.

"In order to maintain our forefront position in the Indonesian market, HokBen constantly strives to create solutions that will offer the best Japanese F&B experience to our ever-growing customer base. Hence, we planned to enhance our operations with a 24/7 online delivery system. However, with demanding customer demands that can result in up to 3,000 delivery requests per day, we needed an architecture that could support our growing data volumes and expansion plans," explained Johan Sutrisno, IT Division Head for HokBen.

Business Challenges

Encountering capacity and scalability issues in the face of rising business demands

HokBen's legacy infrastructure, consisting of 13 servers and 6TB in storage space, lacked the flexibility to accommodate these new requirements, which also included plans for an Enterprise Resource Planning (ERP) application. Hence, the previous system's capacity was unable to keep track of the rapidly growing volumes of business-critical data.

In addition, HokBen's IT team projected that there would be difficulties in scaling up. Laid out in a traditional server architecture, each server had to be installed individually and an installation could take about a month to complete. Backups were also cumbersome, as it would take about a day or two for each server to be individually backed up. These processes will create inefficiencies in time management and resource utilization.

Service disruptions were also an issue. If a server were to experience downtime, up to two out of three applications could be affected, resulting in gaps in customer service. "When it comes to F&B, every second counts. Any downtime could lead to losses in revenue and drops in customer satisfaction levels. That is why solving this problem is extremely critical to our success," Johan said.

Future Plans: Delivering more business growth with a next-generation architecture

The Solution

Building an expanded, secure and integrated IT architecture

HokBen selected NetApp to upgrade its infrastructure in order to elevate its competitive advantage in Indonesia.

"Choosing NetApp as our vendor was an easy choice because of our past relationship with them. They have proven to be a forward-thinking company that is committed to continuously develop and improve their solutions. This means that our systems will constantly get the latest upgrades and updates. Also, their reputation is backed up by a strong support team here in Indonesia. Their powerful technologies from our previous enterprise project have also shown themselves to be easily monitored and managed by our in-house staff," said Johan.

The solution NetApp created for HokBen consisted of NetApp FAS3220, together with NetApp Virtual Storage Console (VSC) for VMware" vSphere" and NetApp" Flash Pool". These solutions' designs are inspired by NetApp's Data Fabric vision, which aims to help companies achieve consistent data management, efficient data transport and IT resource visibility.

The FAS3220 introduced features such as Alternate Control Path (ACP) and service processor to HokBen. It also provided the F&B giant's architecture with additional diagnostics and non-disruptive recovery. FAS3200 also allowed systems to be scaled from a few terabytes to over 2PB of storage capacity. The FAS3200 also came with the DS2246 disk shelf. It utilized the latest high-performance hard-disk technology, with small-form-factor 2.5" disk drives that doubled the capacity per rack unit. NetApp combined FAS3220 with the integrated Data Protection portfolio. It allowed HokBen to take snapshot copies of a data volume in seconds. NetApp also enabled an automated storage tiering for HokBen with the NetApp Flash Pool's intelligent caching.

By combining solid-state disk (SSD) and hard-disk drive (HDD) technologies, this has helped HokBen achieve SSD-like performance at HDD-like prices.

The implementation only took a month to complete. "The proactive and cooperative attitude of NetApp's team allowed us to transition from the traditional system to the new one this quickly. We were very impressed by their responsiveness, attention to detail and capacity to manage the entire process from beginning to end," Johan said.

The Benefits

Accelerating IT, enabling reliability, reducing costs

After enhancing its IT architecture with NetApp solutions, HokBen experienced numerous operational and service benefits.

The organization now has the capacity to better accommodate more customer requests. With the use of virtualization and a unified storage architecture, HokBen can deliver consistent management for customer data and industry-leading storage efficiency. HokBen now has more storage space, expanding to 66TB capacity from its previous 6TB systems. The improved system saw an increase in data storage utilization by 40 percent, which sped up HokBen's system responsiveness with real-time discovery and reporting. This improved system can now cope with the volume of data traffic coming from the restaurant outlets and the new ERP application's processes.

The improved reliability of the new system has also allowed HokBen to operate with peace of mind. Virtual machine backups can now be completed within an hour, instead of one or two days with the traditional system. Furthermore, the nearly instant backups, granular restores and snapshot recovery also enhanced system availability. The use of NetApp's integrated data protection solutions also further ensured that customers' data are stored safely.

"This has taken a load off our IT team. One of the main causes of business disruption is electrical outages. With NetApp's solutions, we have the assurance that our data is reliably managed and protected. We can recover critical data and get back up and running in little to no time after a downtime incident. So far, we have managed to reduce our downtime rate from one hour per year to 15 minutes per year," Johan said.

With the NetApp solution, HokBen has also improved its spending efficiency. Johan explained, "We managed to cut down on capacity, power and cooling expenses by at least 30 percent.

In 2011, the new solution architecture reduced the number of servers from 13 to 4 and now, we have 30 virtual machines running on 7 blade servers. Plus, deduplication and compression across both our primary and secondary storage also reduced capacity consumption and network usage, enabling us to use minimal storage space. With the additional capital, we can re-direct investments into customer-facing initiatives, like the training of staff in order to improve standards of customer service."

Future Plans

Delivering more business growth with a next-generation architecture

"With this new system in place, HokBen is excited for its future. We have expansion initiatives in place which includes franchising as well as having some of our stores operating 24 hours. With such extensive support for our growing data, we will be able to easily scale our system to cater to our needs, both now and in the future. Thanks to NetApp, HokBen is prepared for its next steps," commented Johan.

"We managed to cut down on capacity, power and cooling expenses by at least 30 percent. In 2011, the new solution architecture reduced the number of servers from 13 to 4 and now, we have 30 virtual machines running on 7 blade servers. Plus, deduplication and compression across both our primary and secondary storage also reduced capacity consumption and network usage, enabling us to use minimal storage space."

Johan Sutrisno

IT Division Head, HokBen



Leading organizations worldwide count on NetApp for software, systems and services to manage and store their data. Customers value our teamwork, expertise and passion for helping them succeed now and into the future. To learn more visit www.netapp.com/as