

UK WATER COMPANY KEEPS OPERATIONS FLOWING



Severn Trent relies on Sungard AS to deliver the resilient IT services needed for fluent operations. Working with an extensive list of requirements and an aggressive timeframe, the team brought together the resources, skills and partners needed to complete a complex data center migration project that will provide significant cost savings.

SOLUTIONS

- Dual-site Colocation Services for production and recovery environments at multiple Sungard AS UK data center facilities
- Consulting Services for data center design
- Data Center Migration Services for secure equipment transportation
- Project Management

RESULTS

- Nearly £1 million in cost savings
- Resources needed to meet aggressive deadline for data center relocation
- Design expertise and consultative approach made for a smooth transition into a new facility
- Structured and agile methodologies combined to shorten timelines
- Peace of mind throughout the project



ABOUT THE COMPANY

As one of Britain's largest water utility companies, **Severn Trent** provides more than eight million people with fresh drinking water every day. And when they've finished with it, they take it away for cleaning and treatment before returning it safely to the environment. The company also helps municipal and industrial clients design, build and operate water and wastewater treatment facilities and networks.

“Sungard AS brought the right people on board to make the data center migration happen for us. They provided internal resources with the right design expertise and project management skills, along with third-party partners to make the transition as seamless as possible. This made a massive difference in our ability to meet our deadline.”

Mark Gwynne

*IT Director — Service Management,
Severn Trent*





THE CHALLENGE

As a large UK water company, Severn Trent impacts the lives of people across the Midlands—from the outskirts of Sheffield, down to Bristol, and into north and mid-Wales. All told, that means delivering about two billion liters of water each day. In addition, the company treats 3.4 billion liters of wastewater daily.

The complex network of pipes, pumping stations and other assets required to deliver these services without interruption creates an equally complex IT environment where continuity is a must. This is especially true when you consider the multitude of equipment sensors that alert Severn Trent to problems that may impact service anywhere in the vast area the company covers.

“If we couldn’t get services to the people and properties we need to, it would cause a major issue,” says Mark Gwynne, IT Director—Service Management, Severn Trent. “As a water utility, we’re classified in the UK as a nationally critical infrastructure. So, it is incumbent on us to provide clean water to millions of customers and to take their sewage away.”

“There are a number of technologies and systems that support those essential processes,” Gwynne continues. “From a resiliency perspective, that means we need to be doubly sure that they work and, if they’re not working, that we have a disaster recovery solution we can fall back on.”

The Sungard AS data center in Woking, near London, provides the resiliency needed for Severn Trent’s primary IT environment—and has since

2014. Leased space in a second facility served as a recovery environment in case of disaster. However, this property was being converted into residential flats and Severn Trent had to vacate the premises by the end of 2020.

“We needed to close and relocate the data center we had used for 35 years,” Gwynne explains. “With only 18 months to do that, we had a hard deadline to hit to avoid substantial penalties.”

The complexity of this secondary site added to the challenge. “The data center grew over time, and we had a lot of legacy solutions running there. It was also very complicated from a networking perspective,” says Gwynne. “We have a lot of network activity happening to ensure the correct routing is in place for people to have the ‘single service’ experience they expect for some of our applications.”

Adding to this was the need to run multiple IT environments in parallel during the transition. “Until we were fully migrated to a new environment, we would have the added challenge of running a third new data center alongside the existing two we already had. And, we would have to run all this in tandem with services we ran in a Microsoft Azure cloud.”

The COVID-19 pandemic and the restrictions it placed on the people, places and supply lines involved in the move, increased the level of difficulty Severn Trent faced with such a large IT transition.





THE SOLUTION

When it came to overcoming all these challenges in the accelerated timeframe, Gwynne says his company went directly to Sungard AS.

“In my mind, there wasn’t any other choice. We’ve been doing business with Sungard AS for ten years and they’ve never let us down. So, we didn’t really think to go anywhere else, we just saw it as an extension of the services we already had,” confirms Gwynne. “They understood where we were going and what we were doing, so they knew how to bring the right people on board to make it all happen.”

Assembling the team to accelerate the project

As part of the migration project, Severn Trent wanted to move IT assets from the leased facility to Sungard AS’ data center in Hounslow, West London. This would increase the resilience built into the production and recovery environments for the first time. The primary data center would stay in Woking, while the new recovery site would be in Hounslow.

The seven-month project began in May 2020. The Sungard AS account team and migration consultants were joined by a Severn Trent internal team, including Gwynne, enterprise architects, and sponsors from the business operations side of the company. Sungard AS extended the team to include resources from a third-party provider to help manage the complex mix of logistics involved in any data center relocation.

“Sungard AS provided internal resources with the right design expertise and project management skills, along with third-party partners to make the transition as seamless as possible,” Gwynne says. “Having a third-party who knows how to work with

Sungard AS to get through all of the checks and balances that need to be done for a successful migration made a massive difference in our ability to meet our December deadline.”

Guiding the migration from start to finish

Working together, Sungard AS guided Severn Trent throughout the project—from planning to cut over and beyond. This included a critical first step: auditing the existing Severn Trent data center to determine project scope. Working onsite, the teams documented all the racks, cables and equipment involved, methodically mapping out what needed to be removed and how they needed to be reconnected for a turnkey migration.

Sungard AS then designed, sized, and reviewed the new resilient environments with Gwynne and his team to provide insight into the steps involved in a complex migration and what the future-state environments would look like.

The effort put into this design work also helped to avoid excess costs. “There was a lot of planning devoted to making sure we were getting the right level of rack density and power,” Gwynne says. “Rather than overspending in buying excess capacity, this helped us to keep costs at a minimum to get more value for our money.”

Once Severn Trent approved the design, Sungard AS project management specialists came on board to oversee the relocation. This involved working with select Sungard AS partners to coordinate the labor, resources and logistics required to decommission and set up the new environment—from how many engineers and trucks would be required, to setting up GPS tracking capabilities to monitor the in-transit process.



THE SOLUTION (continued)

Gwynne recognizes the significance of all this upfront work. “Migrating a data center takes more than loading flight boxes in a truck and transporting them to the other end,” he says. “Based on the audit done at the beginning and planning throughout the process, the relocation team was able to understand the technical details of all of the wiring and equipment and where it needed to go in the new data center. Having all of that mapped out was of massive value for us.”

Flexibility and communication combine to meet deadline

While data center migration is typically done through a series of sequential activities, the looming deadline called for Sungard AS teams to adopt a more agile approach. This meant working in parallel workstreams: While project managers worked to audit the old data center, designers were hard at work on the new data center infrastructure.


All this was done amidst the COVID-19 pandemic, with the team effectively avoiding procurement delays, as well as putting the controls in place to

restrict the number of people onsite in each data center to ensure safe social distancing.

Despite the limitations of COVID, and the pending holidays adding pressure to an already demanding schedule, the move was completed in December.

“We were really pushing the timelines for getting this done, but Sungard AS continued to accommodate us throughout the delivery and during the actual move. They were really flexible in terms of working the hours we needed them to throughout the weekend and were in constant contact with us,” Gwynne says. “We also had people in the Sungard AS data center to bring our services back online to make sure they were up and running.”

Constant communication and collaboration, supported by weekly check-in meetings, kept the project on track. “From a communications perspective, everybody was flexible and totally engaged in making sure we were working together as one team throughout the project,” says Gwynne.



“ We were really pushing the timelines for getting this done, but Sungard AS continued to accommodate us throughout the delivery and during the actual move. They were really flexible in terms of working the hours we needed them to throughout the weekend and were in constant contact with us.”



THE RESULTS

A resilient, cost-efficient infrastructure for the future

Today, Sungard AS primary and recovery data centers provide the fully redundant and recoverable environment Severn Trent needs to support its critical applications, as well as back-office systems that support finance, HR and procurement operations.

With Sungard AS Colocation Services, each facility is staffed 24x7 to manage and maintain the infrastructure, ensure a stable power supply, and respond to service requests. A web portal provides Severn Trent's IT staff with visibility into both environments and services to support them. In addition, the data centers provide a foundation for direct connectivity to the company's existing cloud-based workloads.

With plans to invest more than £6 billion between 2020 and 2025 on new and existing assets—like pipes, treatment works and reservoirs—Severn Trent will have the business continuity needed to deliver the water services customers rely on every day, enabled by a cost-efficient IT platform.

"When we buy data center services from Sungard AS, we expect the environment to be tightly controlled and secure, as well as resilient," says Gwynne. "The experienced design team

Sungard AS brought on board was superb. They were able to advise us how, in detail, to set up our environment—not just to give us the best performance and resiliency, but to manage our costs appropriately, as well."

Given the work involved in closing a data center and migrating a legacy environment that had been in place for 35 years, Gwynne shares that many thought the deadline was unattainable.

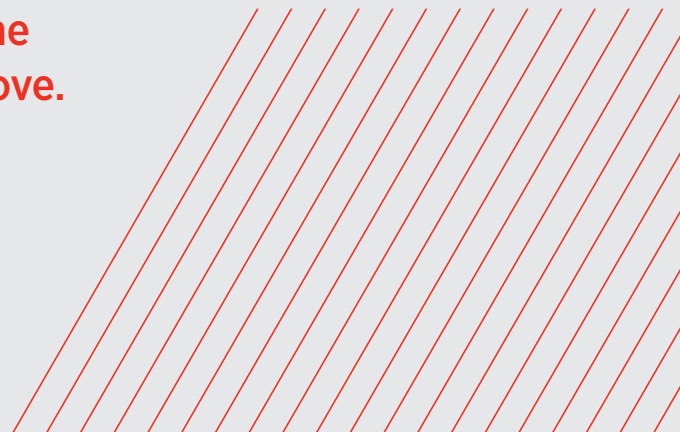
"It was a huge achievement, given the size and scale of what we had to move," he says. "There was a big celebration across IT that extended out to the rest of the business. Our CEO and CFO appreciated the massive effort and the amount of time and dedication that went into making it all happen. Compared to the rent we paid for our old data center, they were elated by the fact that we would be able to save close to £1 million in just a year."

Moving toward the future with Sungard AS also provides great peace of mind. "Our CEO says, 'I just expect technology to work without a problem.' And that's what we have with Sungard AS," Gwynne says. "They are rock solid in terms of providing the services we need, and we never have to worry about it."

“It was a huge achievement, given the size and scale of what we had to move. There was a big celebration across IT that extended out to the rest of the business.”

Mark Gwynne

*IT Director — Service Management,
Severn Trent*



“ In my mind, there wasn't any other choice. We've been doing business with Sungard AS for ten years, and they've never let us down. They understood where we were going and what we were doing, so they knew how to bring the right people on board to make it all happen.”

Mark Gwynne | *IT Director—Service Management, Severn Trent*

www.sungardas.com

If you are calling from
North America contact us at:

+1 (866) 714-7209

If you are calling from
EMEA contact us at:

+44 (0) 808 238 8080

Trademark information

Trademark Information: Sungard Availability Services is a trademark or registered trademark of SunGard Data Systems or its affiliate, used under license. The Sungard Availability Services logo by itself and Recover2Cloud are trademarks or registered trademarks of Sungard AS New Holdings III, LLC. or its affiliates. All other trade names are trademarks or registered trademarks of their respective holders.

© 2021 Sungard Availability Services, all rights reserved. 21-CASESTDY-0054 5/21

