How DB Systel UK Protects One of the Largest Global Railway Networks from Downtime

Cloud confidence at scale with N2WS and Amazon Web Services (AWS)

DB Systel UK is a division of major European rail company Deutsche Bahn, which provides managed IT, cloud solutions, and backup services. Its primary goal is to ensure its customers can meet their objectives — ensuring trains are dispatched and run on time.

The scale of the backup and reporting process was large. There were thousands of routes to report on, and DB Systel UK needed confidence in its ability to back up data on over 1,500 volumes across 700 servers as the business adopted a cloud-first strategy.

Without automated cloud-based backup and recovery, DB Systel UK's customers would be at risk of downtime and data loss, potentially impacting customer trust. "If our rail customers are unable to run their applications, they are unable to dispatch trains, and if they cannot dispatch trains, they will incur huge losses very quickly," says Leanne Robinson, Principal Account Manager of DB Systel UK.

The decision to use N2WS

DB Systel UK had been using manual scripts for backup and knew that this process wouldn't scale for its large, complex, and dynamic environment. The company turned to cloud-native solutions offered by N2WS, available in AWS Marketplace.

N2WS provides backup and disaster recovery (DR) designed to handle half of a petabyte (PB) of data without the need for scripting. N2WS also provides the ability to restore a single file or entire workload in just a few clicks and achieve application-consistency without taking systems offline. Using N2WS Backup & Recovery, customers can create their first backup, typically within 30 minutes.

N2WS Backup & Recovery gives DB Systel UK confidence that data across hundreds of servers is protected and retrievable.

Now that auditing, reporting, and backup compliance objectives are met, DB Systel UK's IT team has more time to focus on higher-value tasks. "As an organization, we want to focus on innovation and, if our time is taken designing and developing a solution ourselves, we're taking time away from innovation for our customers," says Leanne Robinson.

N2WS: Powerful data backup and restore, purpose-built for AWS

- Production workloads on AWS are protected with backup and one-click restore
- One console to manage data at scale with centralized reporting
- Back up data life-cycling with cost-optimal storage tiering
- Compliance needs met with support for retention periods of 7+ years
- Application-consistent backups to manage customer data

CHALLENGE

A growing managed services company needed an automated solution for backing up and restoring customer data across 700 servers to quickly and efficiently serve a large provider of rail transport and infrastructure in Europe.

SOLUTION

DB Systel UK used N2WS Backup & Recovery, available in AWS Marketplace, designed to handle half a petabyte (PB) of data without the need for scripting.

RESULTS

- Automated backup and disaster recovery for AWS workloads provides confidence in the backup process
- Compliance needs met with cost-optimal storage options
- Simplified management of over 20,000 snapshots and half of a PB of data

N2WS: Built on AWS

N2WS leverages snapshot technology to provide enterprise-class backup for production workloads. For example, DB Systel UK can cycle Amazon Elastic Block Store (Amazon EBS) snapshots into Amazon Simple Storage Services (Amazon S3) buckets. This keeps automated records at specific moments in time to allow users to retrieve data from the important moments before a crash.

This process happens at scale, and N2WS and AWS solutions can store data efficiently in flexible tiers to fit the customer's needs.

"The reality is that anything that requires human effort is subject to human error," says Stuart Lupton, Cloud Architect at DB Systel UK. "No matter how conscientious our staff are, there will always be those human errors." N2WS Backup & Recovery provided the automated solution the company needed to reduce the risks associated with manually backing up hundreds of servers across multiple accounts.

N2WS: A cloud-native solution for AWS backup and restore

As a cloud-native backup tool built specifically for AWS, N2WS Backup & Recovery gives you the ability to automatically back up data as often as needed and recover quickly, simplifying workloads and saving time and resources.

Its flexibility allows for durable, secure solutions for storage service, data-transfer, and networking options to meet needs at any size or scale.

Your giant recovery button

Automated policies and schedules

Define backup targets, set backup frequency, and retention periods.

Cross-region & cross-account DR

Replicate snapshots to multiple regions. Recover from anything in seconds.

VPC Capture and clone

Automate backups of VPC settings and recover to any region.

"With N2WS and our approach to tagging we can give our customers 100% confidence that every one of their servers is backed up."

— Stuart Lupton, DB Systel UK

The benefits for DB Systel UK

DB Systel UK has saved near 20% of operational time just by switching from manual scripting to N2WS Backup & Recovery.

These time savings can be attributed to the ease at which N2WS allows DB Systel UK to manage backups, data retention, recovery, and reporting. It currently takes over 20,000 snapshots and protects over half a PB of data.

The cost-effective storage tiering available with N2WS Backup & Recovery also helps DB Systel UK meet European compliance regulations: Now DB Systel UK can retain backup data for more than seven years—ultimately helping its own customers stay in compliance and avoid fines.

The need for backup and recovery

Amazon EBS Failures

Human Error

Ransomware

AZ Failures

Compliance + Data Security

About N2WS

N2WS is dedicated to creating "cloud-native" solutions for protecting workloads and data hosted in AWS. It adopts the AWS paradigm for backup and storage, proving customers with confidence that their data is regularly backup up and can be recovered in mere seconds in the event of an outage or failure.

Managed Service Providers operating large-scale production environments on AWS. Learn more about **N2WS for AWS environments**.

aws marketplace