# NHS Uses Surveillance DB<sup>™</sup> for Mission-Critical Monitoring of Accounts Receivable System

### **INDUSTRY**

Retail Pharmacy

#### **KEY BENEFITS**

- Maintain high availability demands required by pharmacies who depend on the Absolute<sup>AR</sup> system
- The unique ability to monitor across Sybase's entire product stack, and do it all on one screen
- Flashback technology saves hundreds of man hours by removing the need to build custom scripts
- Alert and record specific data to help determine root cause resolutions and avoid application interruption

#### **BRADMARK TECHNOLOGY**

- Surveillance DB for Sybase ASE
- Surveillance RS for Sybase Replication Server
- Surveillance IQ for Sybase IQ

s a leader in pharmacy technology, **National Health Systems, Inc.** provides a range of services for the retail pharmacy industry. Built on a foundation of dedication and commitment to its customers and the profession of Pharmacy, NHS companies PDX, NHIN, and Rx.com provide pharmacies with the tools they need to provide the best possible patient care, manage their businesses, and enhance their competitiveness in the marketplace.

Absolute<sup>AR</sup> Services, a solution from NHS-affiliate National Health Information Network, Inc. (NHIN), is one of the industry's highest regarded, best-in-class accounts receivable reconciliation services. A large number of Pharmacy chains across the U.S. depend on this service for accurate reconciliation, accessible data, and superior information analysis.

In order to provide these critical services

for its customers, NHIN relies, in turn, on Bradmark, to monitor the Sybase backend of the Absolute<sup>AR</sup> system to maintain the high availability required by pharmacies who depend on the technology. PDX turned to Bradmark three years ago, in 2009, when growth in its customer base necessitated expansion to more than a single database host, with Sybase Replication Server used to replicate shared data among the database nodes.

"Absolute<sup>AR</sup> is substantial to its pharmacy customers," Jeff Mhoon, Sybase DBA team lead for the Absolute<sup>AR</sup> project, tells DBTA. "The reconciliation of claims today is so specialized and so complex that it becomes overwhelming for companies to take on themselves. In addition to the business of helping pharmacies reconciling their receivables, Mhoon notes there are additional services customers also find valuable, including



Contract Management in which PDX tracks insurance payments to see if the contracted rate was received. "The pharmacies have very large numbers of claims and transactions and need additional expertise to help them manage their business more efficiently," Mhoon added.

## The Need for High Availability

The complex environment of the Absolute<sup>AR</sup> application includes multiple Sybase products including ASE 15, Replication Server 15, and IQ 15.3. Bradmark's Surveillance tool was selected for this application because of its unique ability to monitor these Sybase products and more importantly, do it all on one screen. "With pharmacies relying so heavily on this core service, it is critical to maintain database availability for Absolute<sup>AR</sup> and to have visibility into the environment supporting that service," says Mhoon.

# **Extensive Monitoring Capabilities**

During the day, critical-use monitoring of resources and processes is required to avoid interruption of clients using the online application by the batch processing and reporting. "Bradmark Surveillance has been instrumental in allowing us to do this by providing a very rich monitoring application. The application allows us to tune the monitoring points very precisely during the day and on a more relaxed basis after-hours. Throughout the day, we may get messages sent to DBAs' phones indicating a process is running long or that CPU resources have exceeded a threshold, whereas at night, we may only get an email once every hour if CPU becomes critically high," Mhoon said.

Without Surveillance, Mhoon says his team would not know if problems existed that could affect availability of Absolute<sup>AR</sup>. "We did not want to maintain and rely on custom written code for monitoring databases and processes," he explains, adding that the company also sought the ability to record monitoring points for later research and reporting. "We needed a product that would not only alert of such situations but record specific data

"We needed a product to not only alert, but record specific data during the event which would allow us to review the data to help in root cause resolution"

during the event which would allow us to review the data to help in root cause resolution," Mhoon added.

Surveillance also provides a vast amount of historical data that allows the group to do extensive research into performance issues. "Bradmark provides a base of reports and we are able to create our own custom reports and queries as needed. In addition, Surveillance's archiving feature allows us to retain historical data for many years due to its summarizing features."

Flashback is one of many features of Surveillance Mhoon agrees to be significant. "Surveillance captures a very extensive amount of data locally and allows you to flashback in time and view the data captured to troubleshoot issues or review processing. This feature alone saved hundreds of man hours by removing the need to build custom scripts around Sybase's monitoring tables to present us with needed information on system usage," Mhoon said.

## **Evaluating**

PDX did not take the selection Bradmark Surveillance lightly, says Mhoon, who explains that the choice was made after careful consideration. The PDX company policy requires the evaluation of three like products. While some of other products that were evaluated could have provided a portion of the capabilities needed, only Surveillance provided the total package. "We did not want more than one monitoring application or need to add a lot of custom programming to the solution," Mhoon explained.

Bradmark Surveillance freed us of adding custom coding which was an important factor for a number of reasons, says Mhoon. "The man hours that it takes to create and maintain scripts and

programs to monitor a system is really extensive. Looking back from the time of implementation until now, Mhoon says the only surprise has been the level of complexity in what Surveillance offers. "It is as simple as being able to bring up a console and see all of your servers, all your database instances on the console but you can also dive down into the complexity of the product so much that you can write custom code to plug into it. You can take the monitoring rules that they provide and you can change almost everything and customize it if you choose. I can plug in the monitoring calls for Bradmark into the scripts that we use to do maintenance - for database reorgs and database backups."

# Support

Reflecting on the working relationship with PDX and Bradmark, Mhoon says the technical support over the years has been the best he has ever dealt with. "Issues are always addressed in a timely manner. The desired method is a WebEx session where the support representative can work on the system and identify issues and resolutions in as little time as possible," he says, "Critical issues have been resolved in conferences with product developers and engineers, and patches are released in a favorable timeframe."

# A Decision for Now and in the Future

In addition, Mhoon notes, he expects to further benefit from Bradmark's Sybase expertise when his team begins a project to upgrade Sybase ASE. He plans to work with Bradmark to leverage the company's experience with Sybase upgrades to build benchmarking data for the Absolute<sup>AR</sup> application using Surveillance's data capture and monitoring. "Bradmark has actually had engagements where they have sent out a consultant to people doing upgrades and taught them how to use the data that Surveillance captures to create baselines and benchmarks and that is what we are hoping to do—create the benchmarks on the existing system and then when we are doing the upgrade we can run the same test and we can pull the same data in Surveillance from the new system," Mhoon added.