



**GOLIATH**  
TECHNOLOGIES®  
HEALTH IT OBSERVABILITY

## **CASE STUDY**

# **Central Maine Healthcare Improves Oracle Health EHR Speed & Reliability and Clinician Satisfaction**

**Central Maine Healthcare significantly improved clinician experience by reducing Oracle Health EHR speed and reliability issues through proactive IT support, resulting in improved clinician satisfaction and IT department credibility.**

## Background

Central Maine Healthcare has significantly improved clinician experience by drastically reducing the time to remediation of issues impacting Oracle Health EHR (Millennium) speed & reliability. This case study explores the challenges faced, the solutions implemented, and the positive outcomes achieved.

Central Maine Healthcare is a nonprofit, integrated health system comprising three hospitals and more than 40 outpatient care sites, providing comprehensive primary, specialty, and acute care services across central and western Maine. Central Maine utilizes Oracle Health EHR and Citrix Virtual Apps (XenApp) to support its clinical operations. The IT team at Central Maine was struggling with performance issues that were causing clinician frustration and impacting patient care.

The primary objectives of the project were to improve clinician experience with Millennium, reduce EHR speed and reliability issues that can impact patient care, and shift the IT support model from reactive to proactive. By focusing on these goals, Central Maine Healthcare aimed to create a faster and more reliable EHR experience.

## Challenge

### Persistent Speed & Reliability Challenges

The IT team at Central Maine was overwhelmed with troubleshooting Citrix performance issues. Aaron Hilton, a system administrator, shared that the lack of visibility into the Citrix delivery infrastructure made it difficult to identify and resolve the root causes of performance problems. This reactive approach led to prolonged resolution times and clinician dissatisfaction.

### The Limitations of Reactive Troubleshooting Approaches

Aaron Hilton, a system administrator at Central Maine Healthcare, shared his experience: *“I’ve received so many tickets where I would spend hours troubleshooting four or more applications to try and find what was causing the latency when it was connection speed all along. The lack of visibility into the Citrix delivery infrastructure caused me to be reactive instead of proactive. It took so much time to react to complaints that I didn’t have time or data to isolate the root cause and resolve the underlying issues that were actually causing the Citrix and Oracle Health performance issues”.*

## Solution

### End-to-End Visibility

Goliath Technologies provided Central Maine Healthcare with an end-to-end visibility solution for Oracle Health EHR and Citrix end-user experiences. This solution allowed the IT team to monitor the entire clinician EHR session, from initiation to logon and

application usage, providing insights into the actual clinician experience. By identifying the root causes of performance issues proactively, the IT team could address problems before they impacted clinicians.

The solution included:

- Purpose-built monitoring & troubleshooting solution that provided an end-to-end view from the initiation of a Millennium session, through the logon process, and the experience while using the application.
- Data presentation based on the user experience, rather than just the health of individual IT elements like networks, servers, storage, and applications.
- Proactive identification of issues, such as Millennium slowness, and pinpointing the IT element causing the problem.

Aaron Hilton remarked, *“Goliath has improved the credibility and reputation of the IT department due to the success with resolving clinician issues. In addition, other Oracle Health EHR application support analysts are coming to me to get user experience data that Goliath collects.”*

## Implementation

The implementation of Goliath Technologies' solution involved:

- Integrating the monitoring & troubleshooting solution with Oracle Health and Citrix Virtual Apps.
- Training the IT team to use the new tools effectively.
- Setting up automated system notifications and custom reports to track the status of different components and clinician experience.

The IT team was able to quickly determine if issues were related to the Citrix environment, data center, the EHR application, or end-user behavior. The ability to drill down into an end user's session and analyze visual proof in real time made it easier to convince end users of the root cause of their performance issues.

## Results

The implementation of Goliath Technologies' solution led to significant improvements:

- Clinician satisfaction increased due to improved Millennium speed and reliability.
- The IT team could quickly determine the root causes of issues, whether they were related to the Citrix environment, data center, Millennium, or end-user behavior.
- The credibility and reputation of the IT department improved as they successfully and proactively resolved clinician issues.
- The time required for weekly committee meetings to address persistent issues was significantly reduced.

Aaron Hilton shared, *“In the past, the team handled persistent issues by holding a weekly committee meeting to work together and try to remediate them. Now, with the use of Goliath’s technology, I have insights that not everyone else is able to see, and I can cut down the amount of time required for the meeting. When you have proof of something, or good information including visual representations in the form of graphs, it gives you really fast resolution”*.

## Key Insights

1. **Proactive IT:** The implementation of Goliath Technologies' solution enabled Central Maine Healthcare to transition from a reactive to a proactive IT support model. By monitoring the entire user session and identifying issues before they impacted clinicians, the IT team could address problems swiftly and efficiently.
2. **Improved Speed & Reliability and Clinician Satisfaction:** The end-to-end visibility provided by Goliath Technologies significantly improved clinician satisfaction. With reduced performance issues and quicker resolution times, clinicians experienced fewer disruptions, leading to a more efficient and positive work environment.
3. **Improved IT Department Credibility:** The success of resolving clinician issues with Goliath Technologies' solution enhanced the credibility and reputation of Central Maine Healthcare's IT department. The ability to provide detailed metrics and visual proof of the root causes of performance problems increased trust and collaboration between the IT team and other departments.

## Conclusion

The collaboration between Central Maine Healthcare and Goliath Technologies resulted in a proactive IT support model that significantly improved clinician experience and Millennium speed and reliability. The insights provided by Goliath's solution enabled the IT team to resolve issues quickly and implement permanent fixes. This case study demonstrates the positive impact of end-to-end visibility on healthcare IT operations.