

Strengthening Cybersecurity and Simplifying Operations for a Leading Orthopedic Hospital in the US

Overview

A leading orthopedic hospital faced growing cybersecurity challenges as its legacy firewall infrastructure struggled to keep pace with evolving threats. Disparate configurations across multiple locations limited visibility, increased administrative complexity, and slowed incident response. To modernize its security environment, the hospital partnered with Black Box® to deploy next-generation Palo Alto Networks firewalls and implement centralized management.

The result was a more secure, resilient, and efficient network infrastructure that improved threat protection, streamlined operations, and positioned the organization for future growth.

Challenges

The hospital's aging perimeter security infrastructure created operational and security concerns. Firewall policies varied across sites, making management complex and reducing visibility into network activity. As cyber threats became increasingly sophisticated, IT teams faced challenges maintaining compliance, responding quickly to incidents, and ensuring consistent protection across the organization.

The hospital needed a solution that would strengthen security, simplify management, and provide a scalable foundation for long-term growth.

AT A GLANCE

CHALLENGES

- Legacy security systems struggled against evolving threats
- Inconsistent firewall configurations reduced visibility and compliance
- Growing security needs demanded centralized protection

SOLUTIONS

- Migrated to Palo Alto next-generation firewall platform
- Automated migration tools accelerated deployment and configuration
- Centralized management improved visibility control and monitoring
- Post-migration support ensured continuity and performance optimization

RESULTS

- Enhanced threat detection and mitigation capabilities
- Improved operational efficiency through centralized firewall management
- Reduced risk exposure with real-time monitoring and greater visibility
- Strengthened compliance and readiness for future growth

BENEFITS

- Scalable, future-ready cybersecurity infrastructure
- Simplified network operations and administration
- Proactive protection against evolving cyber threats



Solutions

Black Box designed and executed a comprehensive migration to next-generation Palo Alto Networks firewalls across the hospital's environment. Automated migration processes accelerated deployment while minimizing operational disruption and reducing configuration complexity.

The new solution introduced centralized management, real-time monitoring, and enhanced visibility across the network. High-availability configurations ensured reliability and business continuity, while Black Box provided post-migration support to optimize performance and facilitate a smooth transition.

Results

The firewall modernization initiative delivered significant improvements in both security and operational efficiency. Security teams gained enhanced visibility into network activity and could identify and mitigate threats more quickly. Centralized management reduced administrative overhead and simplified policy enforcement across locations.

With a unified security architecture in place, the hospital strengthened its compliance posture, reduced cybersecurity risk, and established a scalable infrastructure capable of supporting future business and technology requirements.

Why Black Box?

This engagement highlights Black Box's ability to deliver complex cybersecurity transformations with minimal disruption. Combining deep healthcare industry expertise with advanced security and migration capabilities, Black Box successfully modernized the hospital's security environment while maintaining operational continuity.

The result was a unified, intelligent security framework that improved visibility, accelerated threat response, strengthened compliance, and enhanced overall resilience. Through its proactive approach and technical excellence, Black Box continues to help healthcare organizations protect critical systems, support patient care, and confidently navigate an evolving threat landscape.

Black Box® is a trusted IT solutions provider delivering cutting-edge technology products and world-class consulting services to businesses across the globe in every industry. The breadth of our global reach and depth of our expertise accelerate customer success by bringing people, ideas, and technology together to solve real-world business problems.