



Manufacturing Company Implements Emerald IP KVM Solution for Advanced Control Room Operations

- **Industry:** Manufacturing
- **Region:** EU
- **Solution:** Emerald® IP KVM
- **Product:** DESKVUE PE, PE Transmitters/Receivers, GE Gateway, Remote App, Boxilla®, ControlBridge®

BACKGROUND

A manufacturer needed a reliable IP KVM solution to streamline its process monitoring operations and enhance its control room capabilities. To modernize its manufacturing process control facilities, the company sought a scalable, high-performance solution to interconnect multiple control rooms and server rooms across its vast production areas.

THE CHALLENGE

The company aimed to standardize its IP KVM infrastructure with a single, reliable brand that could seamlessly integrate with virtual machines. The primary challenge was ensuring a stable, 24/7 IP KVM system that could manage both physical and virtual machines within the control room.

The company required a solution that could efficiently link multiple control rooms and server rooms over large areas of the plant using IP-based technology. Prior to this upgrade, the company lacked a unified approach to integrating its control systems, making it challenging to manage operations across different locations.

The company's key criteria for a new solution included stability and reliability for 24/7 operation, seamless integration with virtual machines, scalability to support future expansions, and user-friendly control room functionality.

THE SOLUTION

The proposed solution addressed the company's need for a standard IP KVM system that overcomes connectivity limitations. The company implemented a comprehensive Black Box® Emerald IP KVM solution, including Emerald DESKVUE PE for multi-view, multi-monitor workspace customization, Boxilla for centralized KVM management, ControlBridge touch panel for seamless system control, Emerald GE Gateway to share virtual machine sessions for better collaboration, Emerald PE Transmitters and Receivers for IP-based connectivity, and Emerald Remote App turning a laptop into a KVM receiver for secure remote access.

The solution was deployed at the company's new site, which houses state-of-the-art machinery. Plans are already underway to expand the system to an additional site. The Emerald system enables operators to connect seamlessly across control rooms and server rooms, facilitating real-time collaboration and efficiency.

Using Emerald DESKVUE PE, the company's control room operators can now customize their window layouts, enabling them to efficiently manage multiple target machines in a single workspace. This provides intuitive control over both virtual and physical servers, enhancing operational efficiency.

This implementation is a pilot project to evaluate the effectiveness of Black Box solutions. The success of this installation positions the company to roll out the technology across its other mills internationally, creating a standardized and interconnected control environment.

RESULTS

The deployment successfully met the company's core requirements for seamless virtual machine integration, reliable 24/7 operation, and extended connectivity across large areas. As a result, operators can now manage both physical and virtual machines within the same workspace.

The system supports easy expansion to additional facilities. Control rooms and server rooms are seamlessly interconnected.

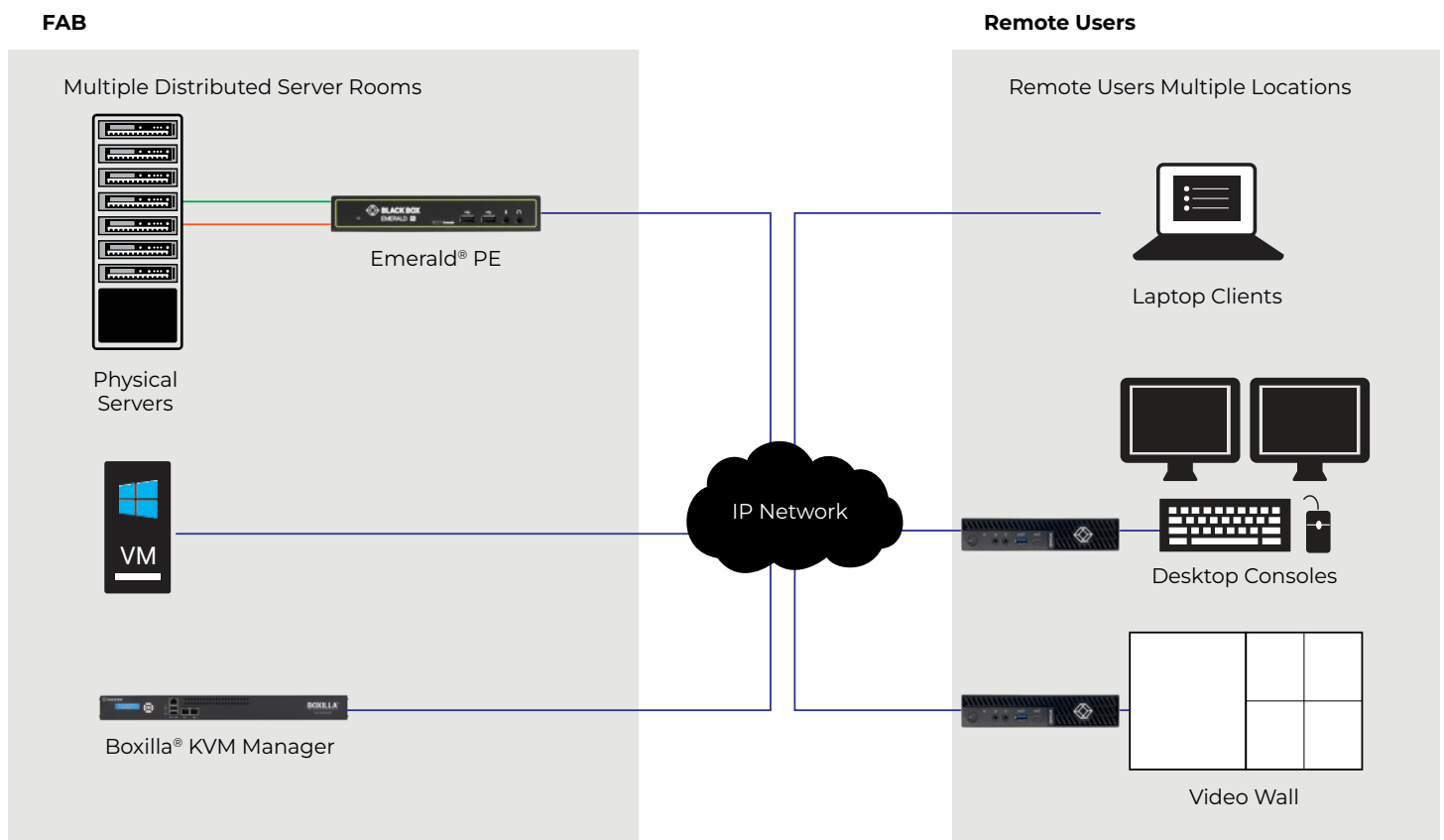
One surprising advantage was the ability for operators to save and recall custom workspace layouts on-the-fly. This functionality significantly enhances productivity, as users can instantly switch between pre-configured control environments. ControlBridge provided an intuitive user interface which helped to facilitate the task switching of the technician.

The Emerald solution is extremely efficient, with IP-based long-distance connectivity that is essential for multi-site control. Adding ControlBridge and DESKVUE simplifies operator interactions. The company praised Black Box for its outstanding support throughout the implementation process, ensuring a smooth and efficient deployment.

Looking ahead, this pilot project marks the first step in a larger digital transformation initiative for the company. The company plans to expand the solution to two international locations, standardize Emerald solutions as the company-wide IP KVM platform, and continue enhancing operational efficiency through IP-based connectivity.

With Black Box Emerald IP KVM solutions, the company modernized its control room operations, enabling seamless integration of virtual and physical machines, long-distance connectivity, and flexible workspace configurations. This cutting-edge implementation positions the company for future scalability and operational excellence across its global network.

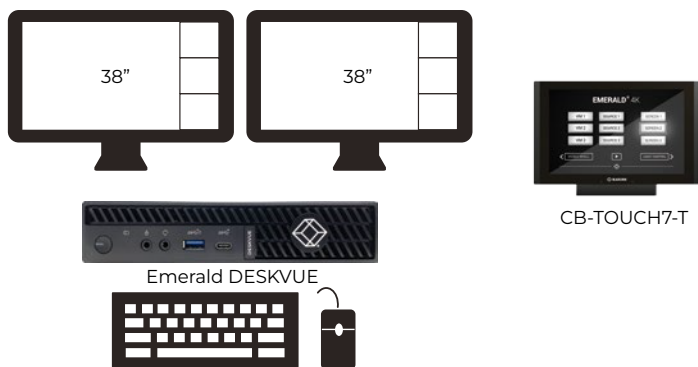
For more information about Emerald IP KVM solutions, click [here](#).



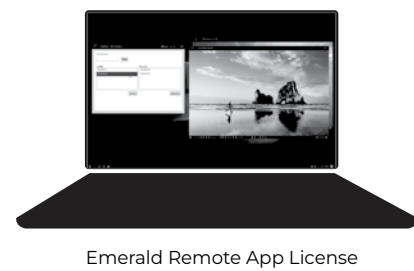


4 Types of Customized Operator Workspaces

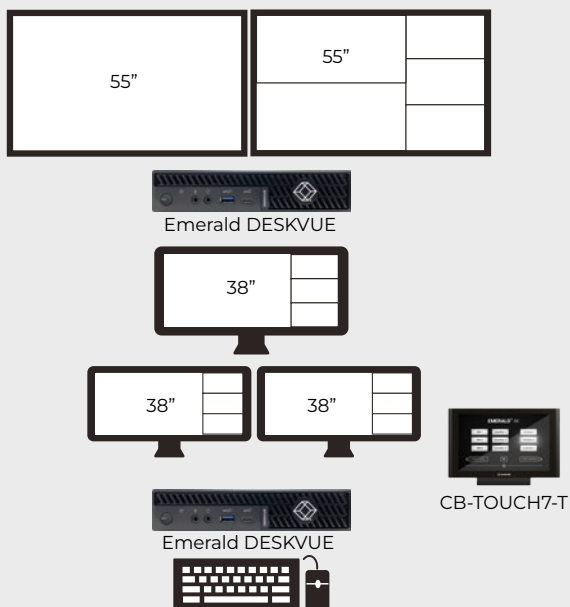
#1 Dual Monitor Workspace



#2 Remote Laptop User



#3 Multi-Monitor Workspace with Video Wall Access



#4 Kiosk Workspace



ABOUT BLACK BOX

We specialize in advanced, high-performance technology products that support mission-critical environments.