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LinkedIn Gains Networked Efficiency For Corporate Communications with Telemetrics Robotic Systems

For a socially conscious company like LinkedIn, producing and disseminating corporate information and educating its employees with topical, externally facing events is paramount to its mission. To carry this out, the business and employment-oriented service operates a network of three separate production studio locations in California that are virtually connected and can be remotely controlled—using the latest Video-over-IP standard—from any of the venues.

Used to produce literally hundreds of events each year, this highly accurate remote control capability extends to the robotic PTZ cameras and touch-screen control panels in each studio and specialized database software that helps coordinate all of the signals coming from the three locations. They are using RoboEye PTZ cameras and RCCP-1A STUDIO control panels from Telemetrics, a specialist in camera robotics and remote control.

“We host a Speaker Series that might include all three locations, or we might do an individual event in only one studio, but they all utilize this dedicated IP network and the Telemetrics PTZ camera and control panels to make it perform properly,” said Gary Schneider, Manager of

Broadcast Systems Engineering at LinkedIn. The Speaker Series is streamed online and often shared with the world via social media. “We’re always looking for ways to make our operations more efficient and the system we have in place now easily allows that.”

The three LinkedIn locations include Mountain View, San Francisco and Sunnyvale: the company’s main headquarters. Each studio includes five PTZ cameras, an RCCP-1A STUDIO control panel—which provides unified control for camera

robotics and camera shading—and unlimited access to Telemetrics’ Enterprise Database Control System (EDCS). The EDCS’ dedicated server and software forms the foundation of LinkedIn’s multi-site networked system.



The All-Hands studio in San Francisco. Notice the Telemetrics robotic cameras on each side of the stage.

A Telemetrics control panel is installed at each location and can operate all of the networked studios and facilitates remote camera shading and PTZ operation over the network. This networked capability further facilitates multi-site failover and disaster recovery should one of the LinkedIn sites go down. The EDCS leverages Microsoft Sequential Query Language (SQL) database technology. This allows for an easy back up of the database system management.

“The system gives us a lot of flexibility in how we present our events to our employees,” said Schneider, adding that the Mountain View location also includes a Telemetrics TeleGlide® track system that was installed three years ago and continues to produce super smooth, highly automated camera moves while a show is in progress. This modular track system can also be remotely controlled. “For example, if I have multiple venues that are going to participate in an event, we’ll only use one control room and backhaul the video feeds from the other two to the lead control room. We can also control some or all of the cameras remotely across our network, depending upon the project at hand.”

The studios vary in size and include seating for three hundred or more employees to watch and participate in the discussions. [Actually, the San Francisco studio seats 200, Sunnyvale’s capacity is 350 and the Mountain View location accommodates 450]. Two of the PTZ cameras at each location are designated as audience cams that allow real-time interaction with the speaker.



Telemetrics EDCS software links the main control room in Sunnyvale with the other LinkedIn locations.

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Schneider said the Telemetrics EDCS software is invaluable to the production team because when they attempt remote control without the database, if a remote controller from another location takes control of a particular camera that camera is going to take all of the settings of the control panel in another location and it won't match up to the other cameras as desired.

“So, if you are in the middle of a show and another operator takes that camera, all of the shading and paint settings changes, so that's not good,” he said. “The EDCS database solves that problem and helps us share feeds between facilities without any problems.”

Another new feature of the Telemetrics RCCP-1A STUDIO control panel is called reFrame™ automatic shot correction and it will get a lot of use at LinkedIn once it's fully operational. For many of the events, Schneider's team likes to display a split screen of two speakers, much like a news-style interview. Before they had reFrame™, two operators were required to manually keep the talent in frame on screen. Now, reFrame™ and its face recognition technology can be used to do this automatically, with no human intervention. That means one operator runs the entire show.

“The biggest advantage to using Telemetrics equipment is that it makes us much more efficient in how we produce content,” Schneider said. “We don't need individual camera operators. Before these facilities, we used a combination of videoconferencing systems and handheld cameras. I was hired to build systems that are interoperable. So, I need to remote



The Telemetrics system gives us a lot of flexibility in how it presents events to employees.

control any of the cameras on the network. The Telemetrics technology lets me do that with very little effort.”

While the current LinkedIn network includes only California venues, there are plans to expand the system to include other parts of the U.S. and beyond.

“Robotics makes the most sense to do this successfully,” Schneider said. “I've used Telemetrics in the past, have always like the quality and reliability, and plan to continue using it going forward. The more efficient we can be, the more productivity we'll get out of the equipment and staff. I was hired to build systems that are interoperable. So, that's why I need to control the cameras and other equipment on the network remotely. Telemetrics gives us the capability to do more with the resources we have.”

About LinkedIn

The mission of LinkedIn is simple: connect the world's professionals to make them more productive and successful. The company leads a diversified business with revenues from membership subscriptions, advertising sales and recruitment solutions. In December 2016, Microsoft completed its acquisition of LinkedIn, bringing together the world's leading professional cloud and the world's leading professional network.

About Telemetrics, Inc.

Telemetrics, founded in 1973, revolutionized the robotic camera control industry with the introduction of robotic camera control over Triax. Today, Telemetrics is a pioneer of innovative solutions used in Studio, Legislative, Military, Corporate, Houses of Worship, Sports, and Education. Telemetrics offers the S5 line of Pan/Tilt heads, motorized columns with the Televator, ceiling or floor mounted TeleGlide track systems and expansive software control packages with the RCCP-1 platform. Telemetrics is committed to making the most reliable, durable, and dependable broadcast ecosystem in the world... products that can be built on for decades not just years.