Customer profile
System Concepts PLUS, located in Dalton, Georgia, provides engineering for industrial process control applications. (Figure 1)

“We’re a system integrator and we do custom controls,” said Joe Summers, president of System Concepts PLUS. “The name is derived from electrical systems with sound engineering concepts. But the PLUS is really where we shine above other companies.”

Jacob Hoyt, a company engineer, explained, “We not only do electrical work. We also have a mechanical engineer and me, a chemical engineer, on staff. So we can also help with the production side of things and the process as we implement our control systems.”

Challenge: Labeling and crimping add costs and time
System Concepts PLUS was building a control system for a customer that manufactures floor materials, such as carpet and vinyl.

“We’re always trying to improve the look of our panels as well as the functionality of the panels,” said Joe. “And we were having problems with wire labels.” The process of crimping wires, labeling them, and connecting to numerous terminals was time-consuming and expensive. In addition, System Concepts PLUS wanted to improve the reliability of the network infrastructure.
Jussara Vicente, the local Phoenix Contact industrial sales engineer, introduce System Concepts PLUS to the “Cabinet Confidence” approach. Cabinet Confidence groups common control cabinet components together into functional areas, and Jussara discussed one functional area at a time. Based on the conversations, System Concepts PLUS saw the value in the competitive prices on the Phoenix Contact printer bundle and PTV terminal blocks.

“We liked the THERMOMARK Card in particular because of the snap-on labels. You can force them to face the way you want. They’re really legible and easy to read, and they look really clean,” said Jacob. “It helped with productivity because you’re able to print off sheets of them at a time. Before, we had just a handheld printer, so you had to print every single label one at a time. Now you can print them off in a sheet; you can actually save those sheets and reuse them again and again and again.”

Joe added, “They have a very nice cage-clamp type terminal block that we’ve started using. It not only works well, but it’s easy to use, and it looks good.”

Phoenix Contact’s automation expertise was also valuable. The end customer had shut down some manufacturing lines pre-COVID, and was having trouble getting them back up and running due to a shortage of human resources.

With the help of Barry Crawford, the automation sales engineer, System Concepts PLUS initially tested a NAT switch. They later implemented managed infrastructure due to availability and cost reduction. The 2000 Ethernet switches were more cost-competitive than the Ethernet switches System Concepts PLUS had previously used. (Figure 3)

Results
System Concepts PLUS achieved a cleaner look in the cabinet build with the Phoenix Contact products. Wires are properly labeled, and the easy connection technology makes installation faster.

The managed switches improve the reliability of the Ethernet infrastructure. With the new control system, System Concepts PLUS helped the manufacturer regain market share, penetrate new markets, and win new customers for the first time.

“My experience with Phoenix Contact has only been positive,” said Jacob. “I called Tech Support, and they initially couldn’t help with my problem. But what was impressive was when Jussara knew that I called Tech Support, she found someone, brought them in, and actually he worked with me in our shop on one of these panels to solve the problem. So it was exceptional customer service.”

Joe said, “We’ve had a good relationship with Phoenix Contact so far. We’ve used their products for many years.

“Phoenix Contact is an innovative company,” Jacob concluded. “Just glancing through the catalog, I often find things to solve problems I didn’t even realize I was working around. Phoenix Contact has such a breadth and depth of catalog that I don’t even know everything you guys offer, but I only see it growing from here.”

Figure 2: The THERMOMARK Card snap-on labels are legible, clean-looking, and simple to install.

Solution

Figure 3: The FL 2000 Ethernet managed switches were more cost-competitive and improved the network reliability.