Customer Case Study

Wireless technology helps create first-class 21st Century learning environment

Customer Profile: Indian Prairie School District 204 is the third largest district in Illinois, encompassing 46 square miles, including portions of Naperville, Aurora, Bolingbrook and Plainfield. Its 21 elementary schools, seven middle schools, three high schools, one alternative school, and one preschool serve roughly 29,500 students. It is recognized as a thought leader in the learning community.

Situation

One of the greatest challenges facing educators in the 21st Century is the importance and ubiquity of technology at a time when school funding is being severely curtailed. School districts that are struggling to keep teachers and maintain programs are finding it difficult to justify the expense required to supply the devices needed to create 21st Century learners.

Among those was Indian Prairie School District 204 in Illinois. Already known as an innovator, the District determined in 2011 that it wanted to incorporate more technology in the classroom. Yet the budget wasn’t available to create a “one to one” technology program. It was then that the Superintendent, Dr. Kathryn Brikett worked with her staff to explore the possibilities of implementing a Bring-Your-Own-Technology initiative.

Solution

“Rather than supplying students with devices, that District had gone to a concept called Bring Your Own Technology, or BYOT,” says Stan Gorbatkin, Assistant Superintendent for Technology Services at Indian Prairie School District 204. “Students today have access to all sorts of technology, such as smartphones and tablets, and their parents upgrade it for them more frequently than a school district can afford. It looked like a great way to bring technology into the classroom quickly and cost-effectively without tying ourselves to any one device that might be obsolete in a year or two.”

While BYOT would solve the classroom technology issue, it created another – ensuring sufficient bandwidth for all the devices that would be hitting the wireless network in each school. While the schools already had wireless technology in place, it was older technology designed for limited use by teachers and administrators. Moving to BYOT would require more coverage with faster connections and more bandwidth to support simultaneous use by thousands of users.

Work began in early 2012 on a pilot program to install Cisco 802.11n wireless access points that would provide high density and high capacity in 30 classrooms located in six schools. Training was also provided to teachers in those classrooms, both on how to use the technology effectively and how to communicate about it to parents to alleviate their concerns.
Business Results

The pilot program was a huge success. In a post-pilot survey, the responses of 746 parents, teachers and students overwhelmingly confirmed the positive effect the BYOT program had, particularly on student engagement.

"In the survey, 81 percent of the teachers said student engagement levels have risen as a result of BYOT," Gorbatkin says. "In addition, 90 percent of the teachers said they’d received positive feedback from the students, and 90 percent of students surveyed support expansion of the program within the District.

Finally, 70 percent of the students believe the initiative has helped in their learning activities. It quickly became obvious that we were on to something, and that the program is worth pursuing in all our schools."

One of the reasons for the high marks achieved by the pilot program was how well the connections worked. Despite the large number of different devices being used, teachers and students were able to access the wireless network without any latency or conflict issues. The program also expanded wireless access into areas that hadn’t had it previously.

Now that the concept has been proven, Indian Prairie School District 204 is incorporating BYOT generally and Internet-based resources into its curriculum.

“A good example is our new math curriculum in the middle schools,” Gorbatkin says. “Rather than giving them textbooks they have to carry to and from class, we are keeping the textbooks in the classroom and having them connect to online content for study outside of school. It gives us much more flexibility to accommodate different comprehension speeds and learning styles.”

One concern that always enters into a BYOT discussion is what happens with students who cannot afford their own technology. In those cases, Gorbatkin says the school does provide devices. But those needing school-supplied devices are a small percentage, which frees the District to invest the majority of its technology budget on building a first-class infrastructure.

Along with other initiatives, Gorbatkin says that Single Path has approached this endeavor in a manner which helped its success. Overall, he has been very happy with Single Path’s knowledge and commitment to finding innovative solutions to the unique needs of IPSD 204.

“Single Path takes the time to get to know the unique needs of their customers rather than simply trying to sell hardware. They have an excellent balance of sales, marketing, technical and training staff. I know I can count on them to deliver on-time and on-budget, and to come to me with solutions. I see Single Path and the District as partners in success.”

— Stan Gorbatkin, Assistant Superintendent for Technology Services, Indian Prairie School District 204