

Case Study

Yuma Schools, Arizona

COUNTRY: USA
INDUSTRY: Education
SIZE: 20,000 students

OBJECTIVE:

Yuma School District One and Yuma Union High School District needed an Internet filtering solution that would work seamlessly across multiple platforms and locations, decrypting SSL web traffic to identify network users regardless of what device students were using and where they were accessing the Internet.

SOLUTION:

Yuma's Director of Technology, Brandan Krizay, struggled to find a solution that would meet these needs—until he discovered ContentKeeper. In ContentKeeper, Yuma has found a fully cross-platform solution that can seamlessly decrypt and inspect SSL-encrypted web traffic at very high speeds.

RESULTS:

Yuma officials now have full visibility into students' web use. They can apply very granular policies, enforce the rules, and investigate violations. What's more, ContentKeeper has made the shift to remote instruction during the pandemic easier as well.

A Former Network Engineer Calls ContentKeeper's School Web Filter the 'Best Technology I've Ever Seen'

With ContentKeeper, Yuma schools can seamlessly decrypt students' web searches, identify 99.9% of network users, and apply very granular Internet policies across all platforms and applications—whether students are learning from home or at school.

Before becoming the Director of Technology for the Yuma, Arizona, schools, Brandan Krizay was a network engineer—so he knows a thing or two about network technology. In his current role, he'd struggled to find an Internet filtering system that would work for his city's schools.

"We tried a number of different solutions, and they all failed us," he says.

Yuma actually has two separate school systems: Yuma School District One is responsible for the elementary schools, and Yuma Union High School District oversees the city's high schools. Each elementary student is given an iPad for learning, and every high school student receives a Chromebook. As a result, Yuma needed a cross-platform solution that could identify network users and apply very granular Internet policies, regardless of what device students were using and where they were logging on from.

However, Krizay found that the solutions he tried would work for one platform but not another. Or, they couldn't decrypt SSL-protected web traffic so that district officials would have full visibility into students' web searches. Or even if they could decrypt SSL traffic, this process would slow network speeds to a crawl.

"We have 20 gigabits per second of throughput on our network, but it seemed like we had dial-up," he observes. "We assumed that SSL decryption was just a unicorn we'd never get to."

That all changed when Krizay discovered ContentKeeper at an education conference. "With ContentKeeper, we found a product that has the best technology I've ever seen," he avows.

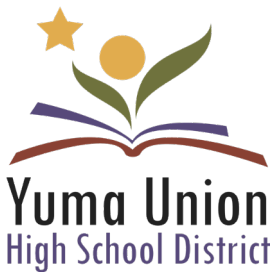
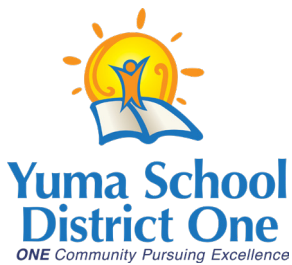
Full transparency

Managing students' web use and making sure they act safely and responsibly online requires full visibility into each user and what they're doing on the network at all times, whether they're on an iPad, a Chromebook, or a Windows-based device—and whether they're logging on from home or at school.

Administrators need this degree of transparency to keep students safe, give parents peace of mind, and protect the school system from legal liability, "I need to know that it's Billy who's on that device, with an accurate portrayal of his Internet footprint," Krizay explains.

“There’s a handful of things that we think we do really well. Thanks to ContentKeeper, Internet filtering and monitoring is now one of them.”

—Brandan Krizay
Director of Technology



Secure Sockets Layer (SSL) encryption poses a challenge to attaining this goal. Without the ability to decrypt web searches and other SSL-protected web traffic, Internet filtering and monitoring tools can only see the top-level domain of a requested website. They can’t see the full path of the request, or what kind of content it is.

“A lot of the other vendors we tried seemed to think they had a way around this problem,” Krizay says. But only ContentKeeper worked seamlessly across all scenarios.

Krizay had a list of eight to 10 requirements he needed from a school web filter. ContentKeeper was able to meet or exceed all of these requirements with a “proof of concept” implementation within a week.

More effective teaching and learning

With ContentKeeper, Krizay says he’s able to identify 99.9 percent of the users on Yuma’s network. This gives principals the autonomy to apply very granular policies governing students’ web use for school, which has allowed for more effective teaching and learning.

“If a teacher says she needs resources A, B, and C for a health or sex education class, but it’s not appropriate for an elementary school student to see that information, the principal can allow that access for seventh graders and still block the materials for the younger students,” Krizay explains.

Having full visibility into Yuma’s network use has also helped district leaders investigate rule-breaking. When a student destroyed some school property in the middle of the night, Krizay was able to use ContentKeeper’s logs to determine whose cell phone was connected to the district’s network from the school’s location at 2 a.m. on the date in question.

What’s more, ContentKeeper facilitated the shift to remote learning when the pandemic emerged. “Filtering students’ web use from home wasn’t a problem for us,” Krizay says. “We rolled past many of the challenges that other districts faced.”

He concludes: “There’s a handful of things that we think we do really well. Thanks to ContentKeeper, Internet filtering and monitoring is now one of them.”