

King Career Center and LabSim:

Solving Crimes One Online Lab at a Time:

King Career Center Teachers Hands-on Crime Scene

Investigation with LabSim

Case Study

Need: Real-World Experience before the Big Day in Court

As part of the Anchorage School District, the Martin Luther King, Jr. Career Center (KCC) is the connection between school and work, enabling high school students to explore careers and apply academics in a true-to-life vocational setting. Junior and senior students learn good work habits and make plans for their future, with many prepared with the hands-on experience to enter the job market directly after high school graduation—or at least with keen understanding of what they want to be—or don't want to be—when they “grow up.”

The students in Teena Calkin's Public Safety & Security classes learn to work as part of a professional criminal justice team, preparing them for careers as police officers, medical examiners, or crime scene investigators. Each course culminates in a real courtroom setting to present their case in front of a real judge, public defender, and district attorney. “It's like a college intro to justice class, with all the fun stuff that college professors don't get to do thrown in,” said Calkin, a probation and parole officer for nearly 11 years who has been teaching at KCC since 2006. “We do the full investigations, gather evidence, file reports, then take them to a real court with a real public defender where they have to answer questions from the professionals about their cases.”

First, of course, they have to prepare—and they've got lots of time to do it. In fact, Calkin teaches each class, with an average of 10 students per class, for a two-hour block five days a week for an entire semester. That's plenty of time to delve deep into the myriad roles a criminal justice professional might encounter whether they choose to go into law enforcement, courts, or corrections.

In addition to legal terminology, students study basic interview techniques, crime scene investigation including photography, basic fingerprinting techniques, basic report writing, courtroom presentation, and basic firearms safety. Second semester students explore the juvenile justice system, learn and conduct traffic collision investigation, a more challenging crime scene investigation, and learning how to work in an emergency dispatch center. Calkin evaluates her students on the basis of written test scores, mastery of skills, professionalism, daily progress and internship participation, with 20 hours of community service required.

While the end result sounds exciting to many of these kids, Calkin was faced with the challenge of teaching the difficult subjects in a way that would motivate them to learn it—and learn it correctly.



Solution: Simulated Online Labs “Make Learning Fun” by Mimicking Video Games

Calkin found TestOut and its LabSim crime scene investigation course at the beginning of her second year. Because CSI is an important and unforgiving discipline, even the smallest error can result in critical evidence being unusable in criminal prosecutions. The LabSim software teaches the correct evidence handling procedures and immerses the students in simulated crime scenes to practice those procedures. It enables them to actively work through a variety of different exercises ranging from lifting fingerprints to performing DNA tests. Using several different crime scenes, learners apply correct procedures to investigate, collect, examine, and document crime scene evidence.

Even better, they learn it in a virtual, game-like environment in the center’s computer lab, Calkin said.

“Kids absolutely love video games and virtual reality, and that’s exactly what TestOut provides in its CSI courses,” she said. “After we walk through all of the terminology and bookwork-type material, we pop in the LabSim crime scene scenarios and they actually get to work through them as if they were playing a virtual game. It makes learning fun.”

But it isn’t just a game. “The students are getting critical thinking skills as they go through the logical thought processes that TestOut has set up in their software,” Calkin said. “You have to make the right step in the LabSim program to move through the crime scene investigation, which forces them to really learn. In real-life, they’d go through the crime scene and make mistakes that could easily get a case thrown out of court. With LabSim, they learn the exact processes they need to go through virtually. If they make a mistake, LabSim doesn’t let them continue until they get it right.”

After the students spend four weeks learning with LabSim, Calkin then expects them to participate in a crime scene investigation off the computer. “If they’re having problems processing the crime scene, I tell them to think about what they did in the LabSim program. If they don’t collect or process the evidence correctly, I’ll contaminate the scene and they have to work with what they have that’s not contaminated, just like in real life. In the majority of cases, LabSim has helped prepare them to process the scene correctly. It’s really an awesome training tool.”

Results: Critical-Thinking Skills Prepare for Any Career

In addition to receiving 1.5 high school credit hours per semester, many of the students are prepared to enter the workforce. While they can’t become traditional police officers in Alaska until they are 21, some have become military police officers shortly after graduation. Some have gone on to get college degrees in computer science with a focus on crime scene investigations. Others have careers in security, law, or corrections.

“After completing my courses, they can go on to a career related to public safety and security or apply the critical-thinking skills LabSim has helped them develop to any number of careers. Their options are wide open.”



Teena Calkin
Public Safety and Security Instructor
King Career Center