



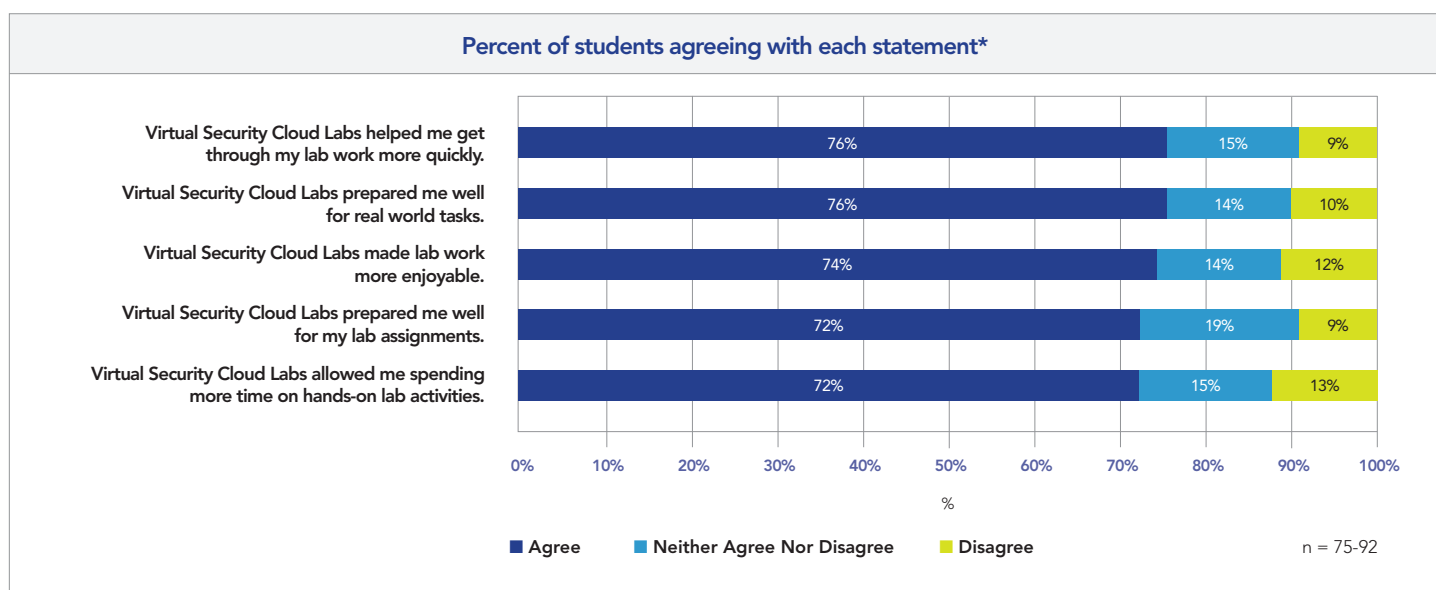
Hands-on

ISSA Virtual Security Cloud Labs: A Solution Students Support

In April 2014, Jones & Bartlett Learning surveyed nearly 130 student users of the ISSA Series with Virtual Security Cloud Labs (VSCL) and asked about their experience with the product. The purpose of the survey was to learn more about student's level of satisfaction with the VSCL environment and the educational benefits they provide. The survey conclusively shows that the VSCL provide the hands-on, realistic learning experience that students truly value.

...and overwhelmingly endorsed *ISSA Virtual Security Cloud Labs* as a helpful learning tool.

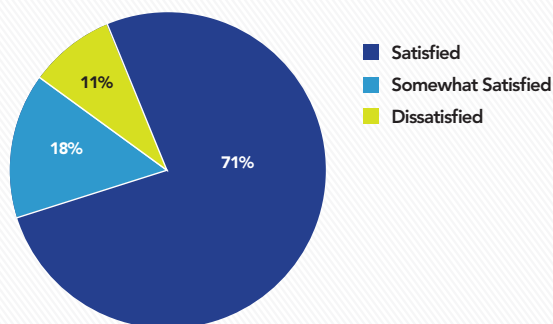
Out of those surveyed the results show that students find the VSCL better prepared them for class and for real-world cybersecurity tasks. Beyond that, they indicated that their time spent using VSCLs made lab work more enjoyable.



Students Overwhelmingly Agree That VSCL Were a Helpful Learning Tool, Which Allowed Them to Spend More Time on Hands-On Lab Activities

- ▶ “[ISSA Labs were the] **best part of my education.**”
- ▶ “I would recommend [ISSA Labs] over the other [Virtual Lab] services I have used.”
- ▶ “How can we get all cyber security courses to use ISSA Labs?”
- ▶ “[ISSA Labs are] a very powerful tool that is a **must in the education environment!**”

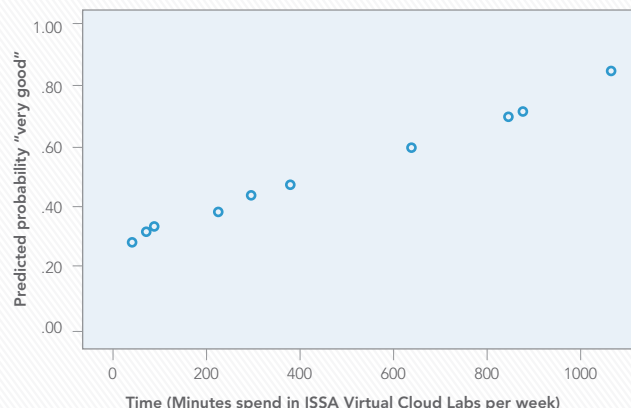
Overall, how satisfied are you with ISSA Virtual Security Cloud Labs?



Logistic Regression Analysis shows that the more time students spend in the labs the more likely they are to rate their experience as highly positive.

Example: A student spending 10 hours (600 minutes) in product per week is about 20 percentage points more likely to rate it “Very good” as a helpful learning tool than a student spending only close 5 hours (300 minutes.)

Logistic Regression Analysis of the likelihood of rating ISSA Virtual Cloud Labs “Very Good” as a helpful learning tool.



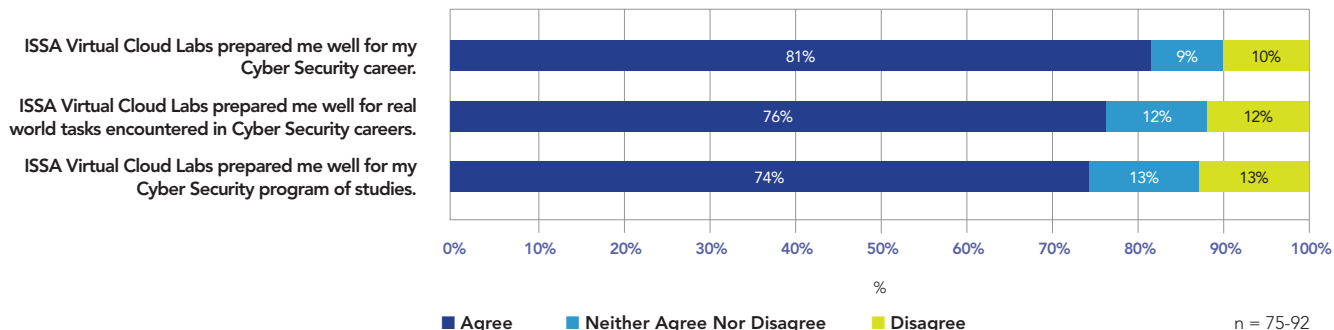
Prob (“Very Good”) = $1 / (1 + e^{-(.971 + 0.002 * \text{Minutes})})$
 Model is statistically significant at $p < .05$
 n=110

ISSA Virtual Security Cloud Labs: A Solution That Helps Students Become Better Cyber Security Professionals

Students agreed that ISSA Virtual Security Cloud Labs prepared them well, even beyond their course of studies, all the way into their Cyber Security careers.

- 81% agreed that ISSA Virtual Security Cloud Labs prepared them well for their Cyber Security career
- 76% agreed that ISSA Virtual Security Cloud Labs prepared them well for real world tasks encountered in Cyber Security careers
- 74% agreed that ISSA Virtual Security Cloud Labs prepared them well for their Cyber Security program of studies

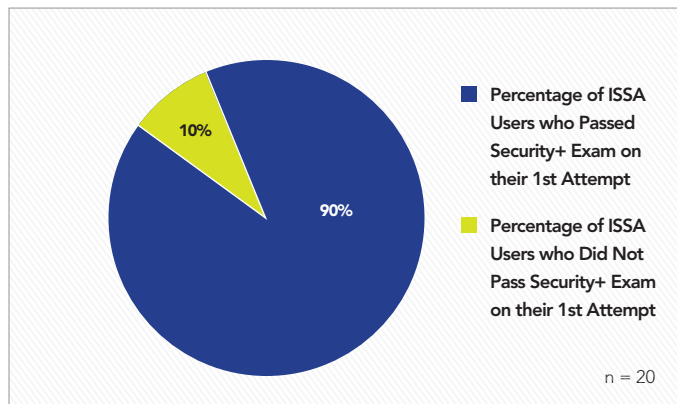
Percent of students agreeing with each statement*



*“Agree” combines “Agree a lot” and “Agree”; “Disagree” combines “Disagree” and “Disagree a lot”.

ISSA Virtual Security Cloud Labs: Prepare Students to Sit for Certification Exams

90% of those students who have sat for the *Security+ Certification Exam*, passed on their first attempt.



Most importantly, students said that *ISSA Virtual Security Cloud Labs* provided them with a realistic experience, which prepared them effectively for the tasks encountered as Cyber Security professionals.

- ▶ “[ISSA Labs are] the **closest thing to actually being in the field or on an actual job assignment.**”
- ▶ “[ISSA Labs] will provide for, and allow, **hands-on experiences, which will help immensely in real-world situations.**”
- ▶ “I would recommend [ISSA Labs] as they give you the **hands-on experience** of related material to prepare for the work related cases.”
- ▶ “[ISSA Labs] **are clear and concise** and are successful at creating an environment that makes learning easy.”
- ▶ “[ISSA Virtual Cloud Labs] **allow you to get ample hands-on experiences** in relation to the topics taught in the classroom. They are easy to use, and come with a step-by-step guideline on how to complete the labs. You can access these labs at school and/or at home. All in all ISSA Virtual Cloud Labs can be seen as an excellent tool in and out the classroom!”
- ▶ “I would recommend using ISSA Virtual Cloud Labs in order to **get hands-on opportunity to learn your course objectives in depth.** I enjoyed using the labs and am happy that it was provided to me.”

Why did students have such a positive experience with the ISSA Series?

