Scott Krulcik

Education

Carnegie Mellon University

B.S. Computer Science - Minor in Business Administration - 3.65 QPA - Expected graduation in May 2018.

Courses: 15-410 Operating Systems, 15-440 Distributed Systems, 15-451 Algorithms, 15-316 Formal Models of Security

Saratoga Springs High School

Graduated 3 of 547 in June of 2014. Scored 2400 on SAT.

Industry Experience

Google Inc. - Software Engineering Intern May 2017 - Present

Worked with Spanner and Cloud Spanner databases as a member of the Docs Platform storage team. Gained experience with Apps Framework, Guice, Boq, performance evaluation and project planning.

Google Inc. - Software Engineering Intern May 2016 - August 2016

Transitioned a network queue library from a blocking paradigm to an asynchronous one. Coordinated migration between international client teams with millions of users. Gained experience with concurrency and Dagger dependency injection.

WhatsApp (Facebook) - Software Development Intern May 2015 - August 2015

Created an Apple Watch app, implemented push notification actions, and stabilized handling of storage limits for an iOS app with hundreds of millions of users. Presented work to Apple's Watch Evangelist and WhatsApp's engineering team.

Prom App LLC - Co-Founder, Developer July 2014 - May 2015

Developed an iOS app and web application for a partner in the fashion industry. Launched app on the Apple App Store.

Valogix LLC - Software Development Intern June 2013 - August 2014

Contributed to enterprise inventory management software running on the Spring Framework.

Research

SCS Honors Undergraduate Research Thesis March 2017 - Present

Exploring synthesizing formal information flow policies from explicit input/output examples. Advised by Jean Yang.

Planetary Robotics (CMU Lunar XPRIZE Team) January 2016 - June 2016

Developed a video compression algorithm for low-bandwidth transmission from the Moon. Advised by Red Whittaker.

Engineering Design and Development - Project Leader September 2013 - June 2014

Led a team of 21 students to design and build a stereolithography 3D printer and supporting software.

Teaching

15-539 Computer Science Pedagogy - Teaching Assistant August 2017 - Present

Guided teams of students creating and evaluating high school curriculum. Taught by Mark Stehlik and David Kosbie.

15-214 Principles of Software Construction - Teaching Assistant August 2016 - December 2016

Software engineering course focusing on design, reliability and concurrency. Taught by Charlie Garrod and Josh Bloch.

Other Experience And Interests

ScottyLabs - Director of Technology September 2015 - Present

Manage ScottyLabs' APIs, plan TartanHacks, and organize Crash Course and Web Dev Weekend workshops.

Programming Languages

Advanced: Java, C — Intermediate: Swift, JavaScript, SML, Python — Proficient: OCaml, bash, Objective-C, HTML, CSS

Interests

Outdoor Adventures — Hiking in the Adirondack Mountains, downhill skiing, tracking wolves in Yellowstone

History — New York State Military Museum tour guide and docent, SSHS Quiz Bowl trivia team (national semifinalist)

Sports — Kyokushin karate (2nd-degree black belt), varsity track (pole vaulter), pickup soccer