## KARA I VAILLANCOURT kvaillancourt@vt.edu (703)-774-5765 https://kvaillancourt.github.io/ B.S. Computer Science, Spring 2017 Exchange Student, Spring 2016 Education Virginia Tech, Blacksburg VA University of Technology, Sydney Australia College of Engineering Information Technology and Creative Intelligence GPA: 3.44 **Technical Lead**, College of Architecture and Urban Studies, Blacksburg, VA January 2017 – May 2017 Work Designing and implementing 3D printer drivers to alter printing techniques that will lead to improved print **Experience** stability and quality. Lead in technical decision making, design, and programming for research project. Developer Intern, Apple, Cupertino, CA January 2016 – March 2016 Developing internal tools for Hardware Project Management team Developer Intern, Qualcomm, San Diego, CA *June 2015 – August 2015* Scripted in Perl to automate analysis of YouTube download patterns on mobile to optimize network sleep time and conserve battery with the LTE Software Integration Team Product Manager, Institute for Creativity, Arts, and Technology, Blacksburg, VA Dec 2013 - Dec 2014 Managed project records, budget of over \$600,000, and team communications of 20 team members Solved large scale collaborative computing problems including system networking, data storage, image processing, HCI, and motion tracking Developer Intern, Heyo, Blacksburg, VA May 2014 - Dec 2014 Created, designed, and implemented Heyo Cart prototypes for production in individual R&D project Worked with HTML, CSS, JavaScript, Python, PHP, and the APIs of Facebook, Pinterest, and PayPal to help small businesses to sell with social media Featured in Inc. Magazine **Activities Programs** Student Ambassador, Computer Science Department at Virginia Tech 2014 - present CodeU, Google June 2015 – August 2015 o Invite-only Android program with 5 month Google mentoring and expense paid summit to present finished applications Memberships Society of Women Engineers (SWE) 2013 - present Association for Women in Computing (AWC) Treasurer 2013 - 2015 2013 - 2015 Honors Residential College (HRC) Apartment Fellow **Honors & National Scholarships GE** Women's Networking Scholarship 2014 & 2015 **Awards** National Center for Women in Information Technology National Award for Aspirations in Computing 2013 **Conference Scholarships** CRA-W, Grace Hopper Celebration, Research Scholar 2016 Apple, World Wide Developer's Conference, WWDC Scholar 2015 & 2016 Google, National Grace Hopper Celebration, Travel Grant 2014 AWC@VT, National Grace Hopper Celebration, Scholarship Recipient 2013

## Skills Programming Skills

- Java, C, Python Extensive Projects (+10,000 Lines of Code)
- HTML, CSS, JavaScript, Perl, SQL Moderate projects (+2,000 Lines of Code)
- PHP, Swift, Objective C, C++, Ruby, Matlab, Arduino Small projects (<1,000 Lines of Code)

## Coursework

- Advanced Data Structures & Algorithms, Computer Organization, Undergraduate Research, Intro to Systems, iOS, Cloud Computing, Systems Capstone, Data & Algorithm Analysis, Comparative Languages
  - Implement a HTTP web server with persistent connections as per HTTP/1.1 protocol
  - o Wrote dynamic memory allocator for programs in C. IE custom versions of malloc, free, and realloc
  - o GIS System of large database manipulation and organization using Java and advanced data structures

## **Independent Work**

- <u>Udacity</u> Android, <u>MIT</u> Open Coursware C++, <u>CodeSchool</u> Angular.js & Javascript, <u>Treehouse</u> CSS & HTML,
  CocoaNuts:iOS Swift & Objective C
  - Wheel of Eats Android app, BubblePop iOS app, Resume iOS app
- Hackathons Hack Mobile, Hack for Impact, VT Hacks, QC Women's Hack, MHacks 6