Olivia Weng

email: oliviaweng@uchicago.edu

phone: (609) 751 1533 web: http://oliviaweng.com

Education

The University of Chicago

BS, Computer Science spec. Computer Systems 2016 - 2020 (Expected)

Advisor: Yanjing Li

Employment

Braintree, Software Engineer Intern

Jun 2019 - Aug 2019

- · Reduced company spending on AWS by building two Lambda functions scheduled to delete costly stale EBS volumes and AMIBake disk snapshots every day
- \cdot Automated previously manual management of 50 AWS user groups for 400 software developers in Terraform and Go

The University of Chicago, Research Assistant

Jun 2018 - Sep 2018

- · Designed a novel hardware cache that defends against cache attacks by obscuring the architectural state through cache compression
- · Conducted a security evaluation on the cache design using Python and Intel Pin to determine the design was indeed secure against last-level cache attacks

Gridless Power Corporation, Software Intern

Jun 2017 - Aug 2017

- · Upgraded database from local AWS EC2 host to Compose.io MongoDB database of 200+ remote batteries' data to streamline the data inputting and monitoring process
- · Overhauled deployment of battery-monitoring Meteor web app hosting from AWS to Meteor Galaxy for faster redeployment and monitoring

The University of Chicago, Computer Lab Tutor

Jan 2017 - Present

- · Lead team of three to revamp computer lab security standards by integrating the 1PASSWORD password manager and SSH keys as the only points of access to the lab servers
- · Image and monitor 50+ floor machines on-site and remotely via Ansible and Jenkins in a team of four to install and update software and applications

Publications

Olivia Weng and Andrew A. Chien. Evaluating Achievable Latency and Cost: SSD Latency Predictors (MittOS Model Inference). In *Proceedings of the Workshop on Accelerated Machine Learning, AccML@HiPEAC: High Performance Embedded Architectures and Compilers, 15th International Conference.* January, 2020. (to appear)

Awards

Grace Hopper Conference Scholarship, The University of Chicago Dean's List, The University of Chicago

2018

 $2017,\,2018,\,2019$

Teaching

CMSC 15200: Introduction to Computer Science II – $Grader$	Summer 2018, Winter 2019
CMSC 22200: Computer Architecture – Grader	Spring 2018
CMSC 16100: Honors Intro to Computer Science – Grader	Autumn 2017

Service

Society of Women Engineers' Girls' Day in STEM, Volunteer

May 2019

- · Created a workshop that taught basic cryptography topics, in which 50 middle and high school girls participated
- · Facilitated a discussion on diversity and what it means to be a woman in STEM among a group of 7 local Chicago middle school girls

compileHer Tech Capstone 2019, Volunteer

Apr 2019

· Led a group of 12 local Chicago middle school girls through interactive workshops that introduced select computer science topics, guiding them through completing each activity

ACM-W@UChicago Mentorship Program, Undergraduate Mentor

May 2018 - Present

- · Guide Neha (3rd-year CS major) through how to start research and secure a research advisor, pointing her to various professors in the department with whom she could potentially work—she currently works with Professor Shan Lu
- · Support and check in with Melanie (3rd-year CS major) as she goes through the internship recruiting process and the CS major at UChicago, reviewing her resume and helping her select classes

CS Student Activities Council, Student Representative

Sep 2017 - Present

· Secure funding to support four computer science student organizations on campus to host events that foster collaboration and grow the undergraduate tech community at UChicago

Asynchronous Anonymous, Director

Jan 2017 - Present

· Coordinate weekly tech talks given by a diverse set of undergraduates, elevating minority speakers, to build an inclusive tech community at UChicago, engaging students with new technologies

ACM-W@UChicago, Board Member

Jan 2017 - Jun 2018

· Organized study breaks and student panels in committee of five women computer science majors weekly to bring women and minority computer science community together and discuss diversity issues in the tech industry

Extra-curricular Activities

University Double Woodwind Quintet, French horn player

University Symphony Orchestra, French horn player

University Chamber Orchestra, French horn player

University Chamber Orchestra, French horn player

Oct 2017 - Jun 2018

Oct 2016 - Jun 2017

Taiwanese-American Student Association

Events chair, Family head, Advisory board