JEREMY ONG

jeremyong.me
tto@andrew.cmu.edu | 360.890.7776

EDUCATION

CARNEGIE MELLON UNIVERSITY May 2020
B.S.in Computer Science, Minor in Machine Learning, Cumulative GPA: 3.80/4.00

SKILLS

TECHNOLOGIES:
Python, C++, Tensorflow, Unix, Qt, CUDA, OpenCV, Flask, Node.js, MongoDB, PostgreSQL, React, Redux

COURSEWORK:
Algorithm Design and Analysis, Computer Systems, Parallel Computer Architecture and Programming, Programming Language Theory, Machine Learning, Modern Regression, Mobile Robot Programming

TECHNICAL EXPERIENCE

AURORA INNOVATION | SOFTWARE ENGINEERING INTERN Jun-Aug 2018
- Built the core communication system between autonomous vehicle operator software and the company fleet monitoring dashboard.
- Configured automatic hyperparameter tuning for the training of perception models.
- Scripted a program to visualize the global poses of training data.

CARNEGIE MELLON CENTER FOR MACHINE LEARNING AND HEALTH | RESEARCH ASSISTANT Jun-Aug 2017
- Worked on GenAMap, a visual machine learning platform for genome studies.
- Architected systems to efficiently transfer data between the backend and user interface.

PROJECTS

SIMON SYSTEM | PENNAPPS Sep 2018
- Consists of two arenas with identical blocks in each. One of the arenas has our robot Simon it. When blocks are moved in the other arena, Simon copies the configuration.
- Implemented the computer vision, path planning, and component communication.

MODWARE | PENNAPPS Jan 2018
- A modular internet of things hardware prototyping kit for the software engineer.
- *Winner*: 2nd place overall, Lutron's IOT award, best hardware hack, hacker's favorite.

FACEBOOK DISCOURSE | FACEBOOK GLOBAL HACKATHON Nov 2017
- A debate platform that fosters productive discourse.
- Presented to the VPs of Technology of Oculus VR, Instagram, and WhatsApp.
- *Winner*: First place out of 20 finalist teams from 11 different countries.

RESISTAR | TARTANHACKS Feb 2017
- An educational augmented reality circuit solver app using Unity.
- Designed algorithms which processed 3D coordinates of physical components to solve for current, voltage, and power and create an electron flow visualization overlay.
- *Winner*: Carnegie Mellon Grand Prize.

BOBS RAMEN | HACKCMU Sep 2016
- Built an internet of things ramen preparer on a team of 4 freshmen.
- Programmed the microcontroller to direct servomotors and take network requests.
- *Winner*: Microsoft Mentor's Choice Award.

TEACHING EXPERIENCE

CMU MACHINE LEARNING DEPARTMENT | TEACHING ASSISTANT FOR INTRO TO ML (MASTER'S) Aug-Dec 2018
- Drafted assignments and tests, coordinated course logistics, and taught recitations.

CMU COMPUTER SCIENCE DEPARTMENT | TEACHING ASSISTANT FOR PRINCIPLES OF COMPUTING Jan-Dec 2017
- Instructed students in foundational computing concepts.