Eric Zheng

Education

Carnegie Mellon University B.S. IN COMPUTER SCIENCE

High Technology High School

Expected May 2023

June 2019

Skills and Knowledge

C, Python, Java, HTML/CSS/Javascript, IATEX, Haskell, Git, Autodesk Inventor

Coursework

Principles of Imperative Computation, Mathematical Foundations for Computer Science

Experience

HIGH SCHOOL DIPLOMA

MITRE Quantum Information Science Group

Feb. 2019 - June 2019

INTERN

- Studied linear algebra and quantum mechanics
- Designed and conducted experiments to measure noise on superconducting quantum computers using Python

Wearable Robotic Systems Laboratory, Stevens Institute of Technology

June 2018 - Aug. 2018

RESEARCH INTERN

- Worked on haptic joystick with Professor Damiano Zanotto and other students
- Created and implemented tension distribution scheme and joystick prototype

Department of Mechanical Engineering, Tsinghua University

RESEARCH INTERN

June 2017 - Aug. 2017

- Worked on underactuated robotic grasping project with Professor Wenzeng Zhang
- Designed and prototyped a novel robotic finger in SolidWorks

High Tech Academic Team

Sept. 2015 - June 2019

MEMBER

- Competed in local, state, and national guizbowl tournaments
- Built automated scoring and statistics system for High Tech student-run tournaments

Projects

Speak into Space (PennApps Fall 2019)

FULL STACK DEVELOPER

Sept. 2019

- Worked on backend and frontend for a lip-reading web application
- Interfaced Flask application with Tensorflow model
- Awards: Top 10 Hack, Best Use of Google Cloud

MATE Underwater Robotics Competition

MECHANICAL LEAD (2017-19)

Sept. 2016 - June 2019

- Directed mechanics subteam in CAD modeling, construction, and documentation of underwater ROV
- Designed ROV frame structure, actuators, and waterproofing system
- Awards: Special Award for Top CAD, 2nd Place Overall

Honors

2019	Maureen O'Donnell Oxford Classical Dictionary Award, National Latin Exam	Lincroft, NJ
2019	1st Place Individual, New Jersey Science League AP Physics C Competition	Lincroft, NJ
2018	Selected Oral Presenter, National Junior Science and Humanities Symposium	Hunt Valley, MD
2018	2nd Place Paper, Jersey Shore Junior Science Symposium	Toms River N.J.

Publications

• Zheng, Eric and Zhang, Wenzeng, 2018. "An underactuated PASA finger capable of perfectly linear motion with compensatory displacement". The Journal of Mechanisms and Robotics 11(1) [doi: 10.1115/1.4041786]