Logan Sweet

Education

Olin College of Engineering

BS Electrical and Computer Engineering GPA 3.6, May 2018

Tufts University

Gap Year, School of Engineering 2014

Projects

Microcontroller Arcade Game

Mar. 2018 - May 2018

Worked on a team of 4 to create a penny-operated bomb defusing game using the Microchip PIC24 microcontroller. Developed I2C code from scratch and created a variety of modular puzzles using nested state machines.

Raytheon Senior Capstone Project

Sept. 2017 - May 2018

Worked on a team of 5 to use additive manufacturing processes with magnetic inks to improve the efficacy of passive PCB components. Used software modeling and lab testing to evaluate different materials and test vehicles. Developed a variety of RF test circuits to test promising magnetic materials.

ASL Glove Oct. 2015 - Dec. 2015

Designed and fabricateed a glove that interprets American Sign Language Fingerspelling and outputs translated text to a phone via Bluetooth using flex sensors, an accelerometer, and an Arduino. My team of four publicly posted the final design and code so that others can replicate the glove.

Skills

Technical: LTSpice, KiCad, Flex PCB Design, MATLAB, C, Python, Allegro PCB Designer and Design Authoring, Oscilloscope, Function Generator, Vector Network Analyzer, Time Domain Reflectometer, PCB Design, CAM350, LaTeX, Arduino, Verilog, SolidWorks, AutoCAD, Jira, Adobe InDesign & Illustrator, ShopBot, Laser Cutting **Leadership:** Rapid Prototyping, Product Management, User-Centered Design, Lean Product Development, Scrum Methodologies

Elected Positions:

Freshman class student government representative, Student government vice president for finance, Senior class student government representative

Experience

Electrical Hardware System Integration Engineer, Phones

Google · Mountain View, CA

Oct. 2018 - Current

- Working with cross-functional teams on PCB schematic & layout
- Responsible engineer for flex PCB schematic and layout and sections of MLB schematic
- Schematic owner for a power evaluation board

Signal Integrity Intern

TE Connectivity · Harrisburg, PA

May 2017 - Aug. 2017

- Designed custom high speed connectors for clients
- Characterized PCB connectors with TDR and VNA and created procedure documentation

Principles of Engineering Lead Course Assistant Olin College of Engineering · Neehdam, MA Fall 2016, Fall 2017

- Assisted faculty in a project-based mechatronics course
- Held office hours to guide student project development and answer technical and teaming questions
- Served as lead of 8 student course assistants in 2017: organized meetings, led grading and rubric development, and served as instructor point of contact

Engineering Fellow

MIT Open Style Lab · Cambridge, MA

June 2016 - Aug. 2016

- Worked with occupational therapists and fashion designers to design a custom modular jacket for a quadriplegic client
- Performed materials research on fabric candidates

Technical Studio Intern

Boston Museum of Science · Boston, MA

June 2016 - Aug. 2016

- Created and facilitated new design challenges for the museum

Product Management Intern

Phone2Action · Washington DC

Feb. 2016 - May 2016

- Worked with engineering, sales, and customer success teams to streamline the monthly software release process
- Created documentation of new feature requirements and facilitated internal & external product feedback
- Conducted trainings & served as point of contact for new clients

Summer Intern

Olin College of Engineering Library · Needham, MA

une 2015 - Aug. 2015

- Worked on a team of students, alumni, and faculty to change the space and culture of use of the Olin library
- Designed, prototyped, and implemented ideas using an agile development strategy

Lab Assistant

Vanderbilt University · Nashville, TN

June 2012 - Aug. 2012

- Graphene and nanocarbon synthesis and analysis under principal investigator Dr Yaqiong Xu