Ethan Glassman

ethan.glassman@gmail.com **2000 Old Page Mill**
Project portfolio at efinkg.github.io/portfolio **Palo Alto CA 94304**
650 575 9193

Education

Expected Graduation May 2016

Washington University MS/BS Joint Degree Program

Candidate, Master of Engineering in Robotics (Electrical Engineering Department)
Candidate, Bachelor of Science Mechanical Engineering
Minors in Mechatronics/Robotics and Computer Science

Elon University Dual Degree Program

Candidate, Bachelor of Science Engineering Physics
Minors in Physics and Applied Mathematics

Experience

Jupiter Research Foundation, *Lead Mechanical Engineering Intern* **Summer 2014**

- Led project to integrate and deploy a 1-micron resolution optical microscope on the Liquid Robotics Waveglider marine robot platform.

Liquid Robotics, *Advanced Technologies Intern* **Summer 2013**

- Designed parts using Solidworks, requisitioned components, manufactured parts in-house using a manual mill, and cast resin parts for a prototype of a new waveglider capability.

Halcyon Molecular, *Intern* **Summer 2011**

- Maintained order, cleanliness, and stock of the machine shop and electronics lab.

Senior Design, *2 Axis Computer Controlled Solar Tracking System* **Fall 2014**

- Built Arduino controller to align solar panels within 10 degrees of orthogonal to sun.

FRC Mentoring: *Helping students design and build 120lb sports-playing robots in 6 weeks*

- Mechanical mentor, Team 3215, Team Prion, Greensboro NC **2011-2012**
- Mechanical/CAD mentor Team 1329, Robo Rebels, St Louis MO **2013-Present**

Personal Projects

CNC Retrofit

- Replaced 1980s era computer hardware with LinuxCNC on a homebuilt computer, rewiring axis drivers to an interface board and writing configuration code.

Robotic Coffeemaker

- Assembled a prototype automatic French press using repurposed consumer electronics.
- Designed code and electronics to control by Raspberry Pi computer from the Internet.

Skills

- **Prototyping** – Design, assembly, precision measurement, and testing
- **Machining –** CNC or manual mill, manual lathe, sheet metal tools, rapid prototype.
- **CAD –** Solidworks, HSMWorks , SolidEdge, Autodesk Inventor
- **Coding Languages –** Python, Arduino, Java, MATLAB, Mathematica, LaTex.
- **Computing –** Github, Linux, UNIX Terminal.
- **Electronics –** Mathematic circuit analysis techniques, oscilloscope analysis, soldering.