# Liam Burke

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## **Summary of Qualifications**

- Northern Arizona University Electrical and Computer Engineering Undergraduate
- Cumulative GPA of 3.38
- Coursework in circuit design, analysis, and testing, as well as basic programming skills

#### **Education**

## Northern Arizona University, Flagstaff Mountain

August 2013 - Present

Bachelor of Science in Electrical Engineering with Computer Engineering Emphasis, Minor in Mathematics – Anticipated Graduation May 2017

GPA: 3.38 Honors Student

Dean's List – One Semester

#### **Skills**

**Software**: MATLAB, Python, Java, 68K Assembly Language, Mentor Graphics, Altera Quartus, Quartus Prime, ModelSim

**Hardware**: MSP430 Microcontroller, Waveform Generators, Digital and Analog CMOS Circuits, Cyclone V Developmental Board

**General**: Digital Logic, Statistics, Discrete Analysis, Differential Equations, Research Skills, Communication Skills, proficient in working with a team, able to work independently if needed

## Technical Projects applicable to WL Gore Internship

## **Solar Panel:**

An Arduino Microcontroller, C programming, and light sensors were used to read light levels in any given environment. With the data collected, two servo motors would shift and tilt a physical metal plate, which was meant to represent a smaller scale of a solar panel, and position it to face the light source that produced the highest output. Time management skills were attained through the project as well, as meetings were set up and Gantt charts developed deadlines for all aspects of the project.

# MSP430 Game Design:

Utilizing the MSP430 Microcontroller and C programming, a game was developed that accepted user input through an analog stick, and then provided output to the MSP430's graphical interface. Creating this game was done with a single partner, and compromise was pivotal during the design process because two specific ideas were developed, but only one game could be made.

## **Smart Blinds:**

Once again utilizing an Arduino Microcontroller, C programming, light sensors, and a stepper motor, a physical set of blinds were raised and lowered dependent upon how much light data was being read from the light sensor.