

# Mitchell Conrad

West Grove, PA | mconrad4@ycp.edu | 484-502-9014 | linkedin.com/in/mitch-conrad

Computer engineering student dedicated to further developing and applying both academic and professional knowledge in computer systems, electronics, and programming. Experienced in programming, circuit design, and working with others in a high-stress environment. Available to Co-op May - Aug 2022

## Education

**York College of Pennsylvania, York, PA**  
Bachelor of Science: Computer Engineering

**Expected Grad Aug 2024**  
4.0 GPA

## Engineering Skills and Coursework

**Technical Skills and Software:** SolidWorks, TINA, Java, C-Language, HTML, Arduino, Verilog, Visual Studio, Microsoft Office: Word, Excel, PowerPoint

**Relevant Coursework:** Software Engineering and Design, Fundamentals of Computer Engineering, Fundamentals of Electric Engineering, Mathematical Methods in Engineering

## Engineering Projects

**YCP Hacks, York College of Pennsylvania, York, PA** **Fall 2021**

- Designed and implemented a 4-channel MIDI synthesizer using stepper motors, 3-D printing, and Arduino
- Collaborated as an engineering team while on a strict 36-hour time limit and won the Best Hardware Hack award

**Introduction to Electrical Engineering, York College of Pennsylvania, York, PA** **Spring 2021**

- Developed experience in a simulated work environment by creating a product as a team for a theoretical client
- Designed a reading night light using SolidWorks and TINA, prototyped the device using electronics lab equipment, and constructed the final device which exceeded the efficiency requirements by 3%, 40 lumens brighter than required, \$7 under budget, and the battery life lasted 2 times longer than required
- Delivered a strong and professional presentation of the device and its features as a team

**Engineering Practice and Design Studio I, York College of Pennsylvania, York, PA** **Fall 2020**

- Conceptualized systems that used gravitational potential energy of water at a height to propel a small car, designed the device in SolidWorks, and constructed it using shop tools and machines
- Tested the final product to ensure its proper function and successfully propelled the car further than any of the other teams during presentation and testing period resulting in the highest score for the category
- Communicated effectively with partner to combine ideas and delegate duties throughout the duration of the project

## Work Experience

**Computer Science Tutor, York College of Pennsylvania, York, PA** **Feb 2020 - Present**

- Developed debugging skills in C and Java by helping CS 101 and CS 201 students with labs and assignments

**Lifeguard, YMCA of the Greater Brandywine Valley, Jennersville, PA** **June 2017 - Aug 2021**

- Promoted to Head Guard after 2.5 years which increased responsibilities to include checking safety equipment, testing water chemicals, resolving conflict with members, and managing lifeguards
- Demonstrated consistent proficiency throughout high stress situations by performing multiple rescues, responding to multiple code reds, and meeting or exceeding all Vigilance Awareness Tests and Ellis and Associates audits

**Counselor in Training, Camp Horseshoe, Rising Sun, MD** **June - Aug 2016**

- Developed public speaking and leadership skills by assisting with teaching merit badges
- Maintained campsites and buildings, repaired gravel road, placed signage, and mulched

## Leadership and Activities

**Boy Scouts of America, West Grove, PA** **2014 - 2019**

- Learned and applied leadership skills as an Assistant Senior Patrol Leader by teaching knots, lashings, assisting teaching merit badges, and planning events

**Odyssey of the Mind, Avon Grove Charter School, West Grove, PA** **2016**

- Developed skills in teamwork, critical thinking, and leadership by working as a team to create a two-gram balsa structure that held hundreds of pounds and ultimately competed at the 2016 World Finals at Iowa State University