WILSON A. MCDADE

me@**wmcda.de**
Seeking a Summer 2021 **Programming** Co-op

EXPERIENCE

uBreakiFix — *Technical Electronics Specialist*

AUGUST 2017 - MARCH 2021

- Troubleshooting and repairing electronics such as iPhones, Android phones, computers, and gaming consoles.
- Also involved with front-of-house duties such as checking customers in and answering phones.
- Gained lots of experience with a changing work environment because we had to adjust to different corporate policies and partnerships.
- Learned important customer service and communication skills, namely how to communicate technical problems to end users using metaphor and simplistic terms.

EDUCATION

Rochester Institute of Technology — *Bachelors — CS Major, CE Minor — 3.33 GPA*

AUGUST 2019 - EXPECTED GRAD MAY 2024

PROJECTS

Drinkr, a Python Based Drink Dispenser — *Python, Kivy, Raspberry Pi GPIO, Soldering, Linux*

wmcda.de/drinkr

- Built a GUI using Kivy, an open-source python based GUI library running natively on a Raspberry Pi 3b+ to drive 1-4 pumps to dispense drinks
- Learned a lot about how Kivy works from the hours spent fixing dependency issues while attempting to run Kivy on a (unsupported) Raspberry Pi 4.
- Had to interpolate a lot of different information from outdated and incomplete documentation as well as forum posts and github issues in order to make a product worth putting into production

RTL-SDR Antennas — *Python, SDR, Antennae, Raspberry Pi, Linux*

wmcda.de/rtlsdr

- Built multiple antennas and used them to download pictures from weather satellites and receive pings from aircraft transponders.
- Learned how to deploy two 24/7 systems (Flightradar24, Goestools), and how to track and ensure uptime.
- Gained experience troubleshooting issues in the field.

Homemade Go-Kart — *C++, Arduino IDE, PWM, Circuitry*

wmcda.de/gokart

- Took apart a treadmill and salvaged the motor, linear actuator, and motor controller.
- Had to troubleshoot sending PWM signals to the motor controller with limited resources (datasheets, etc)
- Was able to make the motor and linear actuator move as well as receive data from the tachometer but could not complete the project because I wasn't able to design a go-kart frame

CERTIFICATIONS AND SKILLS

Kivy	Software Defined Radio	Python
Linux	Arduino C++	Java
Raspberry Pi	Soldering	Antenna Design