

# David McLain

[davidmclain@arizona.edu](mailto:davidmclain@arizona.edu) • (808) 861-5317

<https://github.com/david-mclain>

## EDUCATION

---

### University of Arizona

#### *Bachelor of Science in Computer Science*

*Minor in Mathematics*

- GPA: 3.5/4.0
- NSF Grant Scholarship

Tucson, Arizona

May 2021 – Present

### Pima Community College

#### *Pre-engineering*

Tucson, Arizona

August 2019 – May 2021

## SKILLS

---

### Technical Skills –

Programming languages: Java; Python; C#; C; MIPS; SQL; HTML

Operating Systems: Windows; Linux; Unix

Software and Libraries: Git; Eclipse; VS Code; Nano; Notepad++; Terminal; React; Unity

### Non-Technical Skills –

Languages: English; Spanish; Japanese

## RELEVANT COURSEWORK

---

Object-Oriented Programming and Design

Algorithms

Software Development

Game Development

Analysis of Discrete Structures

Computer Organization

Cloud Computing

Comparative Programming Languages

## PROJECTS

---

### Minecraft REST API –

Fall 2021

• Created a REST API that displayed information from a database with Minecraft Servers and a script such that when a POST request was received a new AWS EC2 instance was created and added to the database, which then ran a bash script to launch a Minecraft server and then add it to the database.

### Sorting Algorithm Visualizer –

Summer 2022

• Designed a sorting algorithm visualizer which animates bars to demonstrate sorting algorithm process, implemented using React and JavaScript

### What You See is What You Get Text Editor –

Fall 2022

• Developed a GUI based text editor as part of a team using object-oriented programming, implemented in Java using Swing and AWT libraries

### Chess Game –

Fall 2022

• Managed a team of four in coordinating weekly sprint meetings to develop a GUI based Chess game which used object-oriented programming principles and design patterns along with sockets to communicate to a server for an online game, implemented in Java using Swing and AWT libraries

## EXPERIENCE

---

### Tutoring –

• Tutored peers of multiple backgrounds in Computer Science and Math classes to enhance understanding of subject material