# Gavyn Ezell

## **EDUCATION**

## University of California, San Diego

2020-Present

BS, Computer Science

San Diego, CA

#### Relevant Coursework

Advanced Data Structures, Design and Analysis of Algorithms, Software Engineering, Database System Principles, Computer Graphics, 3D User Interaction

#### **SKILLS**

Programming Languages: Python, JavaScript, SQL, C++

Technologies: Node.is, Express, MySQL, MongoDB, Docker, Unity

#### **EXPERIENCE**

### GoFundMe - Software Engineering Intern

July 2023 – September 2023

Remote

- Worked with a data engineer to standardize event streaming among analytics/ML teams within the company by helping build Eventer, a lightweight API made with FastAPI and Kafka
- Ensured proper integration of Eventer within GoFundMe's main microservices, through header enrichment and data formatting, all in PHP and Laravel

#### VoLo Foundation - Software Intern

**July 2022 – September 2022** 

Remote

- Built a simple web app with Flask for centralized access to diverse health data collected by personal health wearables, such as Fitbit, Oura, and Dexcom, through third party APIs
- Used pandas for simple data processing and organization to cater towards users

## **PROJECTS**

#### **SSBU Personalized Player Tracker**

- used Express.js and MySQL to create a personalized web dashboard for recent pro player information surrounding the Super Smash Bros. Ultimate competitive eSports scene.
- Leveraged Start.gg's GraphQL API, for easier monitoring of your favorite competitors and their info, such as recent placements, upcoming tourneys, and socials
- Incorporated Twilio's Messaging API for a simple notification system

### Ray Tracer from Scratch

- Built a small ray tracer from scratch in C++, under OOP design and practices
- Ray tracer can read a formatted scene description file, and render a PNG image containing transformed triangles, spheres, and lighting
- Incorporated the Blinn-Phong reflection model, handling recursive ray tracing for specular reflections
- Implemented a Bounding Volume Hierarchy, for accelerated rendering runtime, cutting down hours of rendering down to seconds
- Additionally created a script for translating .obj files into a readable files for the ray tracer

## **Eventify - ACM Projects**

- Worked with a group of six people to build a web app where users could easily browse events on campus, and even promote their own events on campus
- Used Express.js and MongoDB for API building and database functionality. Additionally used an AWS S3 bucket for image storage, and Passport.js for user authentication