

Education

Pasadena City College

August 2017 - Present

Degree: Associates in Science for Transfer in Mathematics (Expected 2020)

Area of Study: Computer Science

Coursework: Discrete Mathematics, Data Structures, Object-Oriented Programming (C++ and Java)

Projects

SQL Relational Database System

github.com/jaasonw/Database

- Developed a relational database management system in C++ that supports a subset of SQL commands (SELECT, INSERT INTO, CREATE TABLE, DROP)
- Implemented a B+Tree to index database entries for fast querying
- Implemented a finite state machine to develop an SQL command parser

Graphing Calculator

github.com/jaasonw/graphing-calculator

- Developed a graphing calculator in C++ that plots 2D cartesian functions
- Implemented an input tokenizer and the shunting yard algorithm to convert infix expressions to postfix
- Utilized inheritance and polymorphism to handle multiple graphs
- Used SFML for rendering

Sushi Shop

github.com/jaasonw/sushi-shop

- Led a team to develop a sushi making game in Java
- Developed a game where the player is given a randomized sushi order and must move a plate to catch falling ingredients to construct the order
- · Used JavaFX and the JavaFX canvas for the GUI and rendering
- · Utilized inheritance to develop the game engine framework and game logic

Work Experience

PCC Learning Assistance Center, Pasadena Computer Science Tutor / Lab TA

January 2019 - Present

- Worked one-on-one with students to teach computer science concepts and debugging techniques
- · Worked with professors to help improve lectures and build long term study habits within students
- Provided assistance to students with software issues in classrooms and computer labs

Involvements

She.Codes Board Member

September 2019 - Present

- A club at PCC that aims to provide a sense of community and support to women in the tech industry
- Streamlined new member registrations during club rush
- Wrote and sent weekly newsletters to club members
- Hosted and co-hosted workshops during club meetings

Skills

Languages: C++, Python, Java, JavaScript/TypeScript, HTML/CSS, LATEX **Libraries/Frameworks**: Bootstrap, JavaFX, jQuery, Node.js, SFML

Tools/Software: git, bash