Raymond Lin

raymond.lin7510@berkeley.edu | +1 (626) 376 - 6567 | Monterey Park, CA
linkedin.com/in/raymondlin7510/ | github.com/raymondlin7510

Education

University of California, Berkeley Expected Graduation: May 2027
Bachelor of Science in Electrical Engineering and Computer Sciences (EECS) Current GPA: 3.733

- Relevant Coursework: Computer Security (Golang), Data Structures (Java), Discrete Math and Probability, Efficient Algorithms and Intractable Problems, Great Ideas in Computer Architecture (Machine Structures) (C, RISC-V), Introduction to Database Systems (SQL), Linux System Administration (Bash), Structure and Interpretation of Computer Programs (Python, Scheme, SQL)

Skills

Languages: Bash, C, C, HTML/CSS, Golang, Java, JavaScript (React, jQuery), Python (Django), RISC-V, Scheme, SQL, TypeScript
Software: Arduino IDE, Git, IntelliJ IDEA, Linux, Vim, Visual Studio Code (VS Code)
Soft Skills: Communication, Collaboration, Creativity, Problem solving, Empathy, Perseverance, Organization

Experience and Projects

Computer Science Mentors (CSM) July 2024 - Present
CS61B Junior Mentor and Tech Mentor Berkeley, CA

- Created and presented slide-based lectures, guiding students through worksheets within the weekly section for 5 students, covering CS61B material (Data Structures).
- Dedicated 6 hours weekly to collaborating with Tech Chairs and Mentors while honing full-stack development skills in Django (Python backend) and React (JavaScript/TypeScript frontend).
- Enhanced the Scheduler on the CSM website by implementing a waitlist feature, streamlining the enrollment process for students unable to register immediately.

Nanotechnology Unleashed! January 2024 - May 2024
Research Apprentice and Software Developer Berkeley, CA

- Co-developed a web-based simulation tool with JavaScript, React, and TypeScript for a table-size e-beam lithography machine, enhancing precision and control, with a 25% improvement in control accuracy and a 30% reduction in load times through Python code.
- Deployed real-time data visualization tools using Matplotlib and Plotly, now used by over 50 students and faculty monthly, facilitating direct monitoring of device performance.
- Led efforts to stabilize system operations, reducing simulation errors by 40% and lowering server resource use by 20%, which enhanced overall lab productivity.

Build Your Own World | Java April 2024 - May 2024

- Designed a procedural world generation engine, enabling the algorithmic creation of an explorable world with dynamically generated rooms and hallways connected by Depth-First Search (DFS), accommodating up to 1 million unique configurations per session based on user inputs.
- Enhanced player experience by incorporating adjustable line of sight functionality and audio features, including sound effects and background music, to deepen immersion and gameplay engagement.
- Implemented save and load functionality by serializing the game state to a text file and deserializing it to resume gameplay to ensure data persistence and game state management.

NgordNet | Java March 2024 - April 2024

- Engineered a browser based tool that explores the history of word usage and lexical relationships across English texts, efficiently managing over 1 million unique lexical relationships.
- Integrated WordNet data of about 1000 words to enable graph traversals for finding common ancestors and hyponyms, enhancing semantic analysis capabilities.
- Utilized dynamic hashmaps and arraylists for robust data management, facilitating complex queries on common ancestors and hyponyms.

Activities

Mandarin Noodle House (Family Owned Business Restaurant) August 2022 - Present
Waiter/Software Developer Monterey Park, CA

- Redesigned and optimized the Point of Sale (POS) system with React and TypeScript, adding intuitive graphics and streamlining workflows for servers to efficiently process orders and calculate costs.
- Currently developing a customer-facing website, using React for frontend and Django for backend to showcase the restaurant's unique offerings, simplifying menu navigation and improving customer engagement.
- Maintained a clean and organized environment, achieving an A-grade health inspection rating.
- Collaborated with various organizations, such as Vans and Aroma Music, and celebrities like Rich Brian to promote our restaurant while also supporting their movements of immigrant cultures within local communities.