BIAN LEE

bianlee2004@gmail.com · bianlee.me · linkedin.com/in/bianlee · github.com/BianLee

EDUCATION

University of California, Davis B.S. Computer Science and Engineering, Economics minor   **Grad: Jun 2025**

EXPERIENCE

Data Analyst Intern at California Air Resources Board   **Jun 2023 - Present**
- Performed data quality control, and assisted database migration to .NET system.
- Generated analytical reports on CSV datasets using Excel, SQL query commands, and Python scripting. Developed a calculator tool to compute emission reduction data for equipments, given load factor values and formulas.
- Assisted organization webpage creation with Drupal CMS. Drafted 11 internal documentations on Community Air Protection (CAP) reporting processes, and on executive orders in compliance with State regulations.

Analyst Intern at Vestr.io   **Nov 2022 - Jun 2023**
- Led equity research of US Stocks & and analysis of DeFi & Web3 markets.
- Published weekly newsletters & daily market summaries on latest trends and news, specifically in the cryptocurrency sector. Worked closely with the founder, as the 4th employee at the Series A startup.

Software Engineer at AggieWorks   **Oct 2022 - Jun 2023**
- Collaboratively built clubly.org, a CRUD web app. Implemented backend API using GORM (hosted on Vultr VPS), then front-end modal components (cards, search bar, navs.) with conditional rendering using Svelte. [GitHub]
- Developed an internal tool with Go scripts, to query number of API calls made at each endpoint.

Technical Mentor at SoCal Community College Consortium on Cybersecurity   **Oct 2021 - Mar 2022**
- Worked with professors from Irvine Valley College's Computer Information Management department to create prepatory CyberPatriot (national security competition) materials, and wrote CTF problems for org-wide contests.
- Developed practice VM images for Ubuntu OS using Ansible and Shell Script.

Webmaster at InterSTEM Nonprofit 501(c)(3)   **May 2020 - May 2022**
- Built organization website (interstem.us) with Jekyll, Markdown, SCSS. Published 148 articles, w/ 200k+ views.
- Remotely taught 3 students a prepatory curriculum to help attain CompTIA IT Fundamentals+ Certification.

PROJECTS

DSM-5 Diagnostic Chatbot (mentalheal.tech) | *GPT-3.5 Turbo, Pinecone, Langchain, MongoDB*   **Jun 2023**
- Used LLM to parse through DSM-5 with semantic search, with data stored as vector embeddings. Used OpenAI's engines to create an interactive chatbot with diagnostic ability. Built front-end with Next.js. [GitHub].
- Wrote Python scripts using Beautiful Soup, to scrap web data on Yelp. Stored this data on MongoDB Atlas, and implemented API endpoint using NodeJS. Used Jupyter Notebook + Matplotlib for analysis & visualizations.

Decentralized Exchange Model & ERC-20 Token | *Solidity, Web3.js, React*   **Dec 2022**
- Wrote smart contracts in Solidity for custom ERC-20 token / tokenomics and decentralized exchange (DEX).
- Implemented Constant Product Market formula used in Automated Market Making (AMM) systems. Deployed on Ethereum blockchain mainnet and allowed users to trade token for ETH using Metamask wallet. [GitHub]

EdTech App (opensourcecollage.com) | *MongoDB, NodeJS, React, Firebase*   **Jan 2022**
- Single-handedly developed an EdTech CRUD application on MERN stack with Firebase authentication, hosted serverless. Launched on Product Hunt, and onboarded 18 non-profits. Received 22k+ total visitors. [GitHub]
- Won monetary prize & mentorship from business consultant, Silicon Valley SVSCORE (Mentor: Chuck Scifers).

Independent music composition & production   **Nov 2021 - Present**
- Produced & released 30+ tracks with 12k+ total listeners, 32k+ streams on Spotify. Ran independent marketing campaign on social media, and launched weekly newsletter. Received media coverage in a newspaper.

AWARDS & CERTIFICATIONS

UC Davis Dean's Honors List (College of Engineering)
UC Davis Little Bang! Pitch + Poster Competition Winner (Awarded $1K)
Socal Cyber Cup 3rd Place (Awarded $2.5K)
CompTIA IT Fundamentals+ Certification

SKILLS & COURSEWORK

Technical Skills: Java, C, C++, Python, ReactJS, NextJS, NodeJS, ExpressJS, Shell Script, Git, MongoDB, SQL, HTML, CSS, TailwindCSS, Drupal, Jupyter Notebook, Excel, Postman

Relevant Coursework: Object-Oriented Programming, Data Structures & Algorithms, x86 Assembly, Discrete Math, Computer Network Fundamentals, System Administration (Linux), Databases, Calculus I/II/III, Linear Algebra