Jay Chong

Resume has been modified for privacy. Please contact me at jaychong@berkeley.edu

EDUCATION

University of California, Berkeley

BS, Electrical Engineering and Computer Science

Berkeley, California August 2024 - May 2026

Experience

National Center for Supercomputing Applications

Champaign, Illinois

Cybersecurity Engineering Intern

June 2024 - August 2024

- Checked the existence of 100+ Service Principals in DNS, service indexes, and Qualys report. Compiled a spreadsheet containing 300+ data points.
- Developed a web application using React for the frontend and Node.js with Vercel serverless functions for the backend, enabling secure submission and aggregation of 500+ SSH keys.
- Implemented robust client-side validation for SSH key formats and fingerprint extraction using regular expressions and the node-forge library, allowing for 30% faster processing.

SETI Institute

Mountain View, California

January 2024 - June 2024

- Computation Intern • Utilized Numpy, Matplotlib, and Python3, to process and aggregate up to 1,000,000 data points to feed into RADMC3D computation model to produce 50+ images.
 - Developed a robust and efficient modeling framework that can be used by the scientific community to analyze JWST data and study protoplanetary disk winds.
 - Contributed to the modification of RADMC-3D, creating high-fidelity models to simulate wind structures in protoplanetary disks.

Palo Alto Networks & CodePath

Remote

Cybersecurity Certificate Student

February 2022 - December 2023

- Participated in virtual environments to simulate cloud and network breaches and developed skills in digital forensic and incident response investigations.
- Gained knowledge of automation functionalities of Strata, Prisma, and Cortex along with proficiency in endpoint monitoring, log analysis, and network security.
- Certified as an Entry Level Cybersecurity Technician (PCCET) by NIST and skilled in threat intelligence sharing using frameworks like ATT&CK for enhanced cybersecurity.

Projects

Notion Reminder Bot | Discord.JS, Python, Javascript

December 2022 - February 2023

- Co-developed the Notion Bot, a discord bot that delivers task notifications for over 200+ members in a CS club.
- Built 9 custom slash commands to execute bot commands & integrated error handling and bot optimization.

Disk Wind Density Modeler | Python, Jupyter Notebook, NumPy

February 2024 - June 2024

- Created reusable, efficient modules for various astrophysical calculations, enhancing the accuracy and performance of protoplanetary disk models.
- Developed high-fidelity models using RADMC-3D to simulate wind structures in protoplanetary disk.

SSH Key Aggregator | React, Node.js, PostgreSQL, Vercel

June 2024 - August 2024

- Created validations for key formats and fingerprint extraction using regular expressions and the node-forge ensuring the integrity and authenticity of submitted keys.
- Enhanced user experience with dynamic loading states, error handling, and status messages, providing clear and immediate feedback during the key submission process.

SKILLS

Languages: Python, C++, Bash, JavaScript, HTML, CSS, Typescript

Developer Tools: VS Code, Git, PowerShell, Slack, Jira, PostgreSQL

Cybersecurity Tools: Nmap, Splunk, Qualys, Wireshark, Metasploit