







Education

Candidate for **B.A.**, **Computer Science**

UC Berkeley, Expected May 2021

Relevant Coursework

The Structure and Interpretation of Computer Programs • Data Structures • Discrete Mathematics and Probability Theory • Great Ideas in Computer Architecture

Technical

Programming

Tools

Docker • Git • Google Cloud API • Dash • Plotly • Scrum Agile • Heroku • CircleCI • Keras API

Experience

Crowdbotics Software Engineer Intern June 2019 - August 2019

- Used **React Native**, **Javascript** and **CSS** to develop blueprints with React Cookiecutter of common web app features such as messaging (customers could add a chat system in their app). Full list can be found on my website.
- Implemented a blueprint that allowed customers to add map navigation through **Google Maps** and travel to destinations.
- Increased installation speeds by 12% by fixing bugs in the web app using a Heroku Prototype of the Docker Server Env.
- Fixed a runtime issue with Crowdbotic's **Djanko** app blueprint using **CircleCI's Local CLI** which increased rendering speeds by **35**% for all app deployments.
- · Worked closely with the team in early product phases to facilitate agile development methodology.
- Designed, developed, and tested new features for React project releases to be used by over 20 customer teams.

Upsync Berkeley Tech Project Lead September 2018 - Present

- Led a team of 5 college consultants to develop the iOS app for Cambi, a merchandise app that grants users loyalty points from online purchases in local stores in San Francisco. Increased consumer traffic by 19%.
- · Led training workshops in **React**, **Swift** and **CSS** for team and organization members.

Better Sports Corporation Tech Project Lead August 2019 - December 2019

- Led a team of 6 college consultants in working with **React** development team and developed company's website using **HTML**, **CSS** and **Javascript**. Fixed 3 deployment bugs which increased app runtime by **12%** and allowed for first beta release on schedule.
- · Used React to design and test the frontend skeleton; helped plan and connect the GraphQL backend.

Projects

ML Algorithm Visualizer @github.com/ZhouColin/ml-visualizer (TreeHacks 2020 Winner)

 Made a machine learning visualization learning tool using the Dash interactive Python framework developed by Plotly. Implemented the React frontend with HTML and CSS and helped develop the Python backend to add support for various ML algorithms.

BlueBook @github.com/ZhouColin/BlueBook

 Developed a React Native app that combines 11 blueprinted features for efficient app creation such as Google Maps, Camera, Login, Firebase and more. Developed using Javascript, React Native, Swift and Kotlin.

pHeed @github.com/ZhouColin/pHeed (nwHacks 2020 Finalist)

• Created a **React Native** app that 'detoxifies' one's Twitter feed by analyzing all Twitter accounts a user follows and scans for negative tone and language using **Google API** for sentiment analysis. Developed the **React Native** frontend and **Kotlin** backend.

Project SID @github.com/jackyzha0/pennappsxx (PennApps 2019 Finalist)

Made an autonomous Tello drone swarm that uses Keras API to detect marine debris. Implemented the React frontend using Javas-cript, HTML and CSS, Google Cloud API for image storage, and developed the Python Flask backend using a SQL database.

InDemand Parking @github.com/ZhouColin/indemand-parking (CalHacks 2020 Finalist)

• **React** app that offers an Airbnb style service for street parking. Developed the backend user **SQL** database and requests using **Java**. Used **Python** and **Flask** for data analysis. Used **React** to connect to the ML microservice.