

Dave Ho

dave.ho@ucla.edu ♦ 3040 Vin Grande Ct San Jose, CA 95135 ♦ (408) 334-6432 ♦ <https://daveho.me>

I am a full-stack developer interested in a wide spectrum of technologies. Recently, I have been pursuing a newfound passion of using machine learning in various applications. In the coming summer, I hope to continue my exploration of more technologies and am looking for opportunities to work with others in innovative software projects.

EDUCATION

UNIVERSITY OF CALIFORNIA AT LOS ANGELES

Major in Computer Science; Minor in Statistics, Sep 2019 – Jun 2023 | GPA: 4.0

EXPERIENCE

Ezra, San Jose, CA

Founder, Full Stack

Jun 2020 – Present

- Ezra is an AI-powered financial advisory mobile application that scrapes SEC, twitter, and news data to provide long term investment recommendations. [link](#)
- Implemented and trained graph recurrent neural network on S&P 500 price and sentiment data using PyTorch
- Implemented DCF Model to forecast intrinsic value of portfolio and predictive sharpe ratio optimization model (Backtests performed 15% better than S&P 500 on 2018-2020 backtest)
- 200+ users reserved for private beta launch.

VMWare, Palo Alto, CA

Data Science MTS

Jul 2019 – Jun 2020

- Built Machine Learning models to automate security triaging process of virtual machines and classify true security issues
- Built Machine Learning models to predict workload timeouts on VMs, enabling proactive recovery actions to be taken
- Constructed multi-dimensional time-series prediction models to detect anomalies within machine health that would result in high cost and usage
- Developed a suite of Reinforcement Learning frameworks (DQN, DDPG, Reinforce, Actor Critic): [link](#)
- Designed Deep Learning and PyTorch workshop for VMware community Developed advanced NLP techniques for a lab in an internal ML conference Continued engagement as a consultant for Data Analytics and ML: [link](#)
- Developed advanced NLP techniques for a lab in an internal ML conference: [link](#)

Twyne, Los Angeles, CA

ML Research Engineer

Sep 2019 – Jun 2019

- Twyne helps users interact with the world through simple and natural motions by bringing automated and customizable ML-based gesture recognition to the smartwatch.
- Developed data engineering (framing and labeling) scripts to process gesture motion data from smartwatch wearable
- Implemented and trained Spectrogram Fourier Transform of time series data and LSTM model using PyTorch (~87 % accuracy)
- Improved model and customization of user gestures with Siamese networks (95% accuracy)
- Constructed prototype that uses "swipe next" & "swipe back" gestures from smartwatch to navigate through google slides presentation

ACTIVITIES & HACKATHONS

UCLA Hack on the Hill Hackathon (HOTH 7) 1st Place, Los Angeles, CA

- Best Hack 1st place award; Built fast-paced song-guessing game for parties.

Feb 2020

UCLA DevX, Los Angeles, CA

- Backend engineer for several UCLA in-house startup projects. (e.g. pulp, twyne)

Sep 2019 - Present

UCLA ACM AI, Los Angeles, CA

- ML Research Engineer for several AI based projects (e.g. deep fake detection, twyne)

Sep 2019 - Present

SKILLS & INTERESTS

Languages

Python, C++, Javascript, SQL, R

Systems

PyTorch, Linux, Git, RDBMS, Flask, Node.js

ML

Reinforcement Learning, Natural Language Processing, RNN, CNN, GNN, GAN