

Jinhao Liu



jinhaoliu18@hotmail.com



github.com/jinbest17



linkedin.com/in/jinhao-liu7



8584057922

Work Experience

Tata Consultancy Services - IT Infrastructure Service Intern

Shanghai, China | Jul, 2019 - August, 2019

- Improved customer satisfaction by developing real-time data visualization webpage for PagerDuty maintenance incidents, using Javascript and Finereport BI Software.
- Assisted in project pitch by conducting comparative case study of cloud services and adaptation strategies offered by AWS and Azure.

Skills: Javascript, HTML, BI Software, Azure, AWS

LaunchIt (Student Startup) - Backend Lead

Link: <http://www.launchitnow.org>

San Diego, CA | Oct, 2019 - Oct, 2020

- Implemented full-text search by integrating Algolia with Firebase and React.js; Deployed Serverless functions to sync search indices.
- Developed content pagination using Firestore API and React.js; Reduced cloud service cost for product launch.
- Achieved continuous delivery with Azure DevOps; Separated test and production environment.

Skills: React.js, Google Cloud, Azure DevOps, Algolia

Research Experience

System Energy Efficiency Lab@UCSD - Research Assistant

San Diego, CA | Apr, 2021 -

- Designed and trained Unsupervised Representation Learning & Domain Adaptation models for self-calibrating sensor array using tensorflow v2.
- Leveraged various data analysis techniques, such as tSNE, PCA, seaborn distplot, to compare the performance of features.

Skills: python, tensorflow, seaborn, plotly

Projects

GraphGo Handwritten Algorithm Visualization Tool - Fall, 2020

Link: <http://graphgo.site/>

- GraphGo is a web app developed with React.js and currently supports animating sorting algorithms on handwritten arrays.
- Worked as Tech Lead to coordinate the development of features, including drawing with HTML Canvas, handwriting recognition using Tensorflow.js.
- Set up and maintained web infrastructure, including DNS records, Apache + Express.js server on DigitalOcean VM, and Firebase Backend-as-a-Service.

Skills: React.js, Node.js, HTML Animation, Apache, DigitalOcean, Google Cloud

Web App Analytics and Visualization - August, 2020

- Developed web analytics portal which visualizes real-time client side performance metrics to help identify possible improvements.
- Developed RESTful API with Express.js to send client's performance measurements to MongoDB database.
- Implemented sessioning and password authentication with Passport.js

Skills: Javascript, Node.js, MongoDB, sessioning, authentication

Education

University of California, San Diego

Major: Computer Science B.S.

Expected Graduation: March 2022

Major GPA: 3.937 GPA: 3.898

Coursework:

- Operating System
- Relational Database
- Web Performance & Analytics
- Software Engineering
- Algorithms
- Machine Learning
(Recommender Systems, Deep Learning, Reinforced Learning)

Campus Employment:

Academic Tutor @ CSE Department

Jan 2021 - Mar 2021

- Tutored Digital Systems class taught by Professor Tajana Rosing.
- Developed python scripts to automate grading and visualize students' results
- Held weekly office hours to help and guide students with course materials and homeworks

Skills

- Programming
 - SQL (SQLite)
 - C/C++
 - Java
 - Python (numpy, pandas, sklearn)
 - Git
 - Bash
 - Docker
- Web
 - MERN Full Stack
(MongoDB, Express, React, Node.js)
 - HTML/CSS/Javascript
 - Apache
 - Grunt.js
 - Babel
 - Azure, GCP
 - PHP