Alan Yu

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Education

Rice University, Houston, TX
Bachelor of Science in Computer Science
Bachelor of Arts in Mathematics GPA: 3.97/4.00   May 2020
Honors: Louis J. Walsh Scholarship in Engineering, top 5% GPA in Engineering Department

Skills

- **Programming:** Python, Java, C, JavaScript, PHP, HTML, CSS, R, Matlab, Bash, Perl, SQL
- **Technologies:** Node.js, Server.js, React.js, Git, Vim, TensorFlow, Jekyll, Mercurial
- **Language:** Chinese(fluent), English(fluent)

Relevant Experience

Software Engineer Intern   May 2019 - Aug 2019
Facebook, Menlo Park, CA
- Built a new end-to-end crisis response experience in Facebook Lite making it much easier to use for 300+ million users in developing countries
- Developed new mark-safe flow in the crisis response by adding more interactive features
- Designed and built crisis feed in crisis response page to make it more memory-efficient and more consistent with Android/IOS Facebook main app

Software Developer Intern   May 2018 - Aug 2018
Victorise, Carlsbad, CA
- Added an interface for choosing biking routes using Material Design + Bootstrap as frontend, Server.js + MongoDB as backend to give users more options and enhance their experience
- Redesigned the IOS interface, making it more succinct and user-friendly using App.js
- Fixed version problems and improved the compatibility of the app

Research Assistant, Bioinformatics   Feb 2017 – July 2017
Baylor College of Medicine, Houston, TX
- Processed large-scale DNA data and built a classifier to classify DNA into specific populations with TensorFlow
- Applied deep learning models (ANN and CNN) with TensorFlow to forecast the phasing process of the DNAs
- Reached accuracy above 90% and presented the best model to medical professionals for further applications in personalized medicines for children

Projects

Satellite Image Segmentation (*Kaggle Competition*)   Feb 2019 – Apr 2019
- Assembled a UNet-based neural network model that performs road detections in the satellite images
- Ranked top 10 in the Kaggle Competition among 100+ participants

One Click File Translator (*Aiden's Lab*)   May 2018 – Aug 2018
- Created a one-click *.hic* file translator that will cover multiple file formats and environments making it much easier to compile and visualize raw data collected from genome labs
- Produced dynamic visualizations of the intermediate outputs using Plotly API and d3.js to facilitate the research of medical professionals in the genome lab

Customer prediction (*NorthStar Memorial Group*)   Nov 2017 – Dec 2017
- Utilized various machine learning techniques in R to analyze past contracts for the company, then provided a prediction report for the potential customers and their preferences
- Provided detailed suggestions of targeted customers for the company after predicting potential buyers

Leadership Roles

Founder, Vice President, *Rice Blockchain Club*   Nov 2017 – Present
- Organize weekly meeting of 50+ people on the topics of blockchain technology
- Host campus hackathons for 100+ people under topics of blockchain technology