

FREDERICK WANG

frederickpfw@gmail.com | 972-369-2320

EDUCATION

Bachelor of Science, Computer Science
Rice University - (GPA: 3.4/4.0)

Aug 2017 – May 2021

SKILLS

- **Languages:** Python, Java, SQL, C, R, React
- **Tools:** Git, MongoDB, Neo4j, Spark, Hadoop, Node.js, TensorFlow, AWS, Unix

EXPERIENCE

Lutron Electronics, Inc. – Software Engineering Internship accepted

Summer 2020

- Cancelled due to COVID-19 pandemic

Polytronix, Inc. – Software Developer Intern

Jul 2018 – Dec 2018

- Designed and developed a **Java** application to automate bid search process and customized data entry
- Led to replacing 4 hours of daily manual work and tripling the daily biddable product pool

Vinstar Big Data – Data Science Intern

May 2018 – Jul 2018

- Designed a **Python** and **SQL** program to categorize nonstandard descriptions with 90% accuracy, assisting with urban development
- Implemented modified Levenshtein Distance to discern categories from Chinese phrases in **Python**

Computational Neuropsychology and Simulation Lab at UNT – Research Assistant

Feb 2016 – May 2017

- Redesigned test administration and data collection/entry process to double testing capacity
- Investigated subcortical circuits that influence neurocognitive illnesses with Dr. Thomas Parsons, Ph.D.

Rice University OIT Help Desk – Student Consulting Assistant

Apr 2019 – Current

- Communicating and delegating tasks effectively with team members to solve customer issues quickly
- Resolving account issues, troubleshooting laptop software or hardware failure to customer satisfaction

PROJECTS

Inventory Managing and Invoicing Application

- Inventory management and invoice creation CRUD application using the **MongoDB, Express, React, Node.js** stack for personal business use

Document Classification Projects

- Implemented both a recurrent neural network and a feed-forward network with **Python** and **Tensorflow** to tag a line of text to its document with over 85% accuracy
- Implemented a kNN classifier with **Python** and **Spark** to classify documents with nearly 90% accuracy using

“Looking For Group” Discord Bot

- Designed and developed a Discord server bot using the **Discord.py API** to allow users to create online groups for activities with custom notifications
- Serves over 100 users, shortening wait times to find a group by several hours

Kernel and File System

- Kernel from scratch for yalnix in **C** with virtual memory management, context switching, and fork support
- File system from scratch for yalnix in **C** with read, write, seek, and hard link functionality

Data Entry Automation – Rice University

- Streamlined new student data entry from PDFs with several **Python** programs

LEADERSHIP

Rice University First Year Programs – Orientation Week Coordinator

Dec 2018 – Sep 2019

- Planned and created Rice O-Week 2019, interviewed and led over 200 student leaders
- Prepared and executed 2 weeks of events with a cohesive theme and mission statement in mind to welcome the incoming freshmen
- Collaborated with many university offices to effectively host campuswide events and showcase Rice resources