# Rais Kazi

rais.kazi@utexas.edu · (469) 618-5558 · linkedin.com/in/raisk · raiskazi.com

#### **EDUCATION**

The University of Texas at Austin

Bachelor of Science, Electrical and Computer Engineering

May 2023

Relevant Coursework

Algorithms, Data Structures, Software Engineering Lab, Operating
Systems, Machine Learning, Computer Vision, Probability & Random
Processes, Linear Algebra, Discrete Mathematics, Communications

#### WORK EXPERIENCE

# Capital One, Software Engineering Intern - Plano, TX

June 2022 - August 2022

- Programmed an automated data validator in AWS Lambda that mitigates data pipeline failures reducing downtime by 83%
- Developed the Lambda in Python to read S3 and Postgres to determine state and take advantage of existing infrastructure
- Invoked two child Lambdas that query Snowflake and OracleDB to leverage a more lightweight and customizable solution
- Reduced the time to compare hundreds of records from 3 hours to 5 minutes and alerted the team via email using SNS
- Deployed the validator with Jenkins Pipeline, creating a blueprint for future data validation failure cases across Capital One

# Raytheon Technologies, Software Engineering Intern/Co-Op - Dallas, TX

May 2021 - January 2022

- Developed Windows Services in C# to parse and clean various forms of data for machines throughout Raytheon Dallas
- Used the Splunk Processing Language (SPL) to take the newly cleaned parametric data and manipulate it into meaningful
  metrics to track average machine performance and equipment utilization to optimize factory productivity
- Designed dashboards to display the calculations as graphs and tables in the Splunk Web Application using Simple XML

## Atticus Capital, Software Engineer - Minneapolis, MN

May 2021 - September 2021

- Helped in the development of a Client Portal that handles account creation, portfolio management, and automating communication of clients' critical investment information between Atticus and Interactive Brokers in React and Express.js
- Utilized MongoDB to store user signup information, portfolio selection and allocation data, and other metrics

### **PROJECTS**

**Daintree** - Software Engineering Lab Project

December 2021

- Created a full-stack cloud computing manager that allows for personal and group purchases using Agile methodologies
- Developed in React to allow users to simply checkout hardware sets, create organizations and securely log in with JWT
- Scraped real-time data using beautifulsoup4 and managed product availability, billing and data with FastAPI and MongoDB

## Multithreaded Gaming - Personal Project

July 2021

- Designed and programmed a chat room and gaming application using socket programming and multithreading in Java
- Developed a server to handle new clients and facilitate instantaneous one-to-one messaging between members
- Clients are able to choose between playing games of Mastermind and Go Fish! which were created using OOP principles

### **Indopak Franchise Website** - Freelance Project

February 2021

- Rebuilt website for the largest DFW South Asian grocery/restaurant chain by converting to a modern Flask architecture
- Redesigned with MDBootstrap to make the UI intuitive; component configuration allowed for simple future maintenance
- Deployed with AWS which improved page speed by 556% and decreased load times from 4.84 to 0.87 seconds
- User viewership increased by 78% and is expected to increase due to high scalability which would allow online ordering

# **RESEARCH**

### UT Virtual Reality Lab, Undergraduate Research Assistant - Austin, TX

December 2019 - February 2021

- Created three-dimensional environments to perform eye-tracking experiments to better understand the function of vision
- Used the Unity game engine and programmed in C# to generate game objects and specify the experiment parameters
- Utilized MATLAB to record photogrammetric data to understand the time needed for subjects to calculate movements

#### **SKILLS**

- Programming Languages: Java, C#, Python, C/C++, ARM V4 Assembly, HTML/CSS, MATLAB, SPL, LaTeX, JavaScript
- <u>Technologies:</u> Flask, FastAPI, React, .NET Core, AWS, Splunk, Snowflake, MongoDB, Linux, Bash, Git, Android Studio

# **HONORS**

- University Honors (Spring 2020, Fall 2020, Spring 2021, Fall 2021, Spring 2022)
- Raytheon National Merit Scholarship Award of 2019