Syed Rizvi

(832)-643-9462 • asad5688@gmail.com • Houston, TX GitHub: https://github.com/SyedA5688 • Personal Website: https://syedarizvi.com/in/syed-a-rizvi-01

EDUCATION

College of Natural Science and Mathematics, University of Houston, TX

Bachelor of Science in Computer Science

Cumulative GPA: 3.97, Major GPA: 3.9

May 2023

EXPERIENCE

Phillips 66, Houston, TX

May 2020 - Present

Information Technology Intern

- Worked in an Agile Kanban DevOps team environment to assist in development of a pdf document information extraction tool using Azure cloud services and Microsoft Form Recognizer tool
- Trained a custom entity extraction model on Azure ML dealing with highly variable, unstructured pipeline contract pdf documents
- Trained text classifier for contract document categorization based on agreement clauses contained within contract documents
- Created data exploration and visualization dashboard on machine health monitoring dataset using Alteryx and Tableau

HULA Research Laboratory, Houston, TX

September 2020 - Present

Machine Learning Research Assistant

- Coauthored research paper proposing MorphSet, a novel set transformer-inspired neural network architecture for case-level renal disease classification; paper accepted at MICCAI, pending press
- Delivered oral abstract on MorphSet architecture and significance to over 100 medical professionals at the AI in Nephropathology Workshop in Amsterdam 2021
- Developed custom labeling interfaces using React and the Labelbox JavaScript SDK, allowing for rapid fine-grained annotation of medical images
- Delivered presentation on custom LabelBox labeling schemes using LabelBox platform to computer vision research group at the University of Buffalo, NY
- Assisted in development of style initialization techniques to improve on style-transfer methods for data augmentation on nephropathology datasets
- Created image processing Python scripts leveraging k-means clustering and binary masks for image tile extraction from kidney biopsy whole slide images

Taipei Medical University, Taipei, Taiwan

March 2021

Data Analyst Intern (Remote Work)

- Preprocessed and merged wearable device data measurements taken from 18 Taiwanese patients using Python data management libraries
- Performed correlation analysis and visualizations between physical activity, circulation, fatigue, and sleep measurements taken over 9 months
- Explored time-lag cross correlations among patient data

INDEPENDENT PROJECTS

AWS Lex Bot Generator

January 2021

- Chatbot generation pipeline aimed at automating and improving AWS Lex chatbot creation
- Helped configure AWS Lambda triggers to automatically start chatbot build process when a configuration file containing dialogue specifications is submitted to the app
- Developed using AWS Lex, Lambda, S3, DynamoDB, and React

• Placed 1st overall in the HP & AWS Bot-a-thon competition

Autoencoder Anomaly Detection

August 2020

- Machine learning model developed for anomaly detection in environmental sensor data within Amazon's Seattle Sphere conservatories
- Placed 3rd in the AWS & NVIDIA Environmental Hackathon (\$3000 award)
- Developed using Amazon Sagemaker, Python, Pytorch, and Jupyter Notebooks

NutrientView Mobile App

July 2020

- Nutrient logging app utilizing image recognition to track and display 25 macro and micronutrients consumed in food items
- Micronutrient Q&A chatbot integrated to give users insight on different nutrients
- Developed using React Native, IBM Watson image recognition, Azure bot service, Firebase, and the Edamam Nutrition Analysis API

StormReady Mobile App

May 2020 - June 2020

- Hurricane awareness mobile app aimed at educating users about potential hurricane risk factors and providing helpful tips for storm preparation
- Implemented a location monitoring alert system with push notifications
- Developed using React Native, Firebase, and the AerisWeather API

TECHNICAL STRENGTHS

Libraries: Pytorch, Keras, Numpy, Pandas, Scikit-learn, Matplotlib, Jupyter Notebooks

Programming Languages: Python, C++, R, Octave, MATLAB, JavaScript, Java Cloud Services: Azure DevOps, Azure ML, AWS Sagemaker

Data Processing: Alteryx, Tableau

CERTIFICATIONS

Machine Learning February 2021

Stanford University, Coursera Online Course

- Supervised and Unsupervised Learning Algorithms
- K-Means clustering, PCA, machine learning pipelines

Data Science Tools June 2021

IBM, Coursera Online Course

• Python, R, SQL, IBM AI cloud service platform, Jupyter Notebooks

Data Science Methodology

June 2021

IBM, Coursera Online Course

- Overview of data science flowchart and process used to answer business problems
- Business understanding, dataset creation, modeling, and evaluation stages

HONORS AND AWARDS

Dean's Distinguished Scholars List, The University of Houston

Fall 2019 - Fall 2020

ACTIVITIES

Management Information Systems Student Organization

January 2020 - Present

Professional Development Committee

- Worked with a teams of 20+ committee members to perform 75 individual resume reviews leading up to recruiting season following resume guidelines set by the C.T. Bauer College of Business
- Delivered presentation on IT candidate development to over 50 undergraduates at a professional development workshop