# SAI RAGHAVENDRA VIRAVALLI

Dallas, TX 617-510-6869 | sairag1999@outlook.com | Portfolio | GitHub | LinkedIn

#### **EDUCATION**

Northeastern University, Boston, MA

Master's of Science in Information Systems Relevant Coursework: Data Science, Parallel Machine Learning, Big Data Systems, Machine learning in Finance

### Vellore Institute of Technology, Vellore, India

Bachelor of Technology in Computer Science Engineering

Relevant Coursework: Data mining, Natural language processing, Statistics, Data Structures and Algorithms, Database Management Systems

## **TECHNICAL SKILLS**

Python (NumPy, Pandas, Flask), Java, SQL, Shell, R, C++, JavaScript
: Sklearn, Keras, Pytorch, TensorFlow, scikit-learn, CNN, Neural Networks, NLP, LLM
PostgreSQL, MySQL, Big Query, MongoDB
Data studio, Tableau, Microsoft Power BI, Alteryx, SAS, Seaborn, Plotly
Microsoft Excel, JIRA, API Integration
COBIT, Agile, Scrum, Waterfall, Kanban, IT Governance
Google Cloud Platform (GCP), Azure, Docker, Git, Airflow, Spark, Beam, AWS, Kubernetes

#### **EXPERIENCE**

Jersey Stem, Remote, US	Aug 2023 – Apr 2024
Data Analyst	

- Data Analyst
- Lead data extraction initiatives for non-profit tech companies utilizing GCP and Big Query, achieving 20% process optimization
- Developed and implemented comprehensive data-driven strategies, resulting in a 30% increase in program effectiveness, 25% growth in donor acquisition through targeted campaigns, and a 15% increase in long-term donor engagement
- Played a pivotal role in Salesforce integration, securing a noteworthy boost of \$150,000 in funds through enhanced tracking and streamlined automated communication processes

#### Northeastern University - College of Engineering, Boston, MA

**Program Assistant** 

- Spearheaded a collaborative research project with a cross-functional team of marketers, data scientists, and researchers to enhance marketing campaign effectiveness based on applicant data for the university
- Utilized Python, R, and Tableau for data analytics and machine learning, achieving a 79% ROI from -45% from targeted marketing efforts and 3.5X response rate after implementing models

## Deloitte Touche Tohmatsu Ltd, Bengaluru, India

**Executive Analyst** 

- Integrated ML models for a leading private bank's net banking, boosting fraud detection by 25% and saving over \$300,000
- Orchestrated the design and implementation of ETL pipelines using AWS services, automating data extraction from 7 diverse sources, processing 100GB of data daily, and reducing data synchronization time by 40%
- Facilitated agile ceremonies, including sprint planning, reviews, retrospectives, etc., on JIRA as a Scrum Master for a team of 20+ Dev/Testers across multiple pods. Achieved rapid and predictable delivery, consistently meeting 96% of milestones

## Akriti Consulting, Chennai, India

Data Scientist

- Guided AWS cloud migration for a financial firm, optimizing data handling with Sage Maker, Glue, and Athena
- Enhanced time series **regression** model with a branched **CNN** architecture, achieving a 10% accuracy boost
- Identified and cleansed 3% erroneous training data, improving model accuracy through advanced data analysis
- Implemented data cleaning strategies, resulting in a 95% reduction in data inconsistencies and an 80% decrease in data errors

## ACADEMIC PROJECTS

## Political lean between news sources Analysis

- Scraped web data of 80,000 comments from Reddit using R and 100,000 tweets of news sources to analyze the political leanings of the data
- Utilized sentiment analysis, bi-grams, and word associations to demonstrate bias in various sources, effectively visualizing findings
- Used Random Forest, XGBoost, and Regression; XGBoost achieved 85% accuracy classifying articles by political bias

#### **Restaurant Management System**

- Created relational database design for hospitality industry & executed it leveraging SQL Server & data modeling tools
- Developed database tables, views, stored procedures, common table expressions, procedures, database triggers
- Optimized business metrics through database design and using python functions for various functions
- Used Tableau to build a live dashboard providing metrics, data analysis and data insights

Jun 2020- Mar 2021

Sep 2021-May 2023

Jul 2016- Jun 2020

*May 2022 – Mar 2023* 

*Mar* 2021 – *Aug* 2021

Sept 2021 – Dec 2021

*Sept 2021 – Dec 2021*