# Surya Vegesna

404-203-1133 | Atlanta, GA (Open to relocate) | suryavegesna 27@gmail.com | linkedin | GitHub | Portfolio

#### EDUCATION

## Georgia State University

Atlanta, GA

Master of Science in Data Science and Analytics

Aug 2023 - Dec 2024

Vel Tech University

Chennai, TN

Bachelor of Technology in Computer Science and Engineering

Jul 2017 - May 2021

## WORK EXPERIENCE

## Graduate Research Analyst

Jan 2024 – Present

Cox Media Group

Atlanta, GA

- Collaborate with Cox Media to optimize Ad Slot allocation using ML models, driving significant revenue growth.
- Conduct **EDA** on 6 months of Historical data and analyze top-performing ad spots based on matched impressions, net value, and pass rate, resulting in a **20**% improvement in match rates.
- Identify optimal ad slots using XGBClassifier with 87% accuracy in predicting high impression channels.

#### Associate Data Scientist

Jul 2021 – Aug 2023

Tata Consultancy Services | AIG Client

India

- Collaborated with the **Ops Efficiency Team** to optimize data-driven solutions, analyzing life insurance and death policies to enhance risk assessment and policy pricing for the **Fixed Annuity Project**.
- Implemented Random Forest model in TCH, reducing downtime by 15% and cutting false positives by 5x.
- Streamlined and automated **Tableau KPI dashboard** for Sr. leadership WBRs, reducing update time by 40%.

## Data Analyst Intern

Dec 2020 – May 2021

Capgemini

Remote

- Enhanced the **TREKTICS** foreign exchange analytics tool by integrating **30+ financial market feeds**, enabling effective tracking of currency fluctuations for trading strategies.
- Analyzed daily Market and Deal rates, providing market insights and implementing data validation checks.
- Optimized currency conversion algorithms with senior data scientists, increasing data retrieval efficiency by 20%.

## TECHNICAL SKILLS

Languages and Databases: Python, R, SQL, MySQL, PostgreSQL, Big Query, MongoDB Libraries and Tools: Pandas, NumPy, Scikit-learn, TensorFlow, NLTK, Jupyter, GIT, PyTorch

Machine Learning and Analysis: Regression Analysis, Classification, Clustering, Artificial Neural Networks

# ACADEMIC PROJECTS

# $\textbf{Airline Sentiment Analysis with NLP} \mid \textit{GitHub} \mid \textit{Python}, \textit{KeyBert}, \textit{LLama2}$

Sep 2023 - Dec 2023

- Led a team of 5 graduate researchers in a Sentiment Analysis project for Southwest Airlines, identifying customer pain points and recommending improvements from textual reviews.
- Employed **SQL** to extract and preprocess **30,000** text reviews, used NLTK for lemmatization to enhance accuracy.
- Applied NLP with **KeyBERT** and **Llama2**, extracted topics, and provided data driven recommendations.

#### Automated Tumor Detection using Deep Learning | GitHub | TensorFlow, CNN

Jan 2024 – Apr 2024

- Developed an automatic brain tumor detection system using **DenseNet201** in TensorFlow, achieving 97% recall.
- Orchestrated a dataset with 34.95% tumor images, utilizing **ImageDataGenerator** for rescaling and segmentation, achieving **0.97 weighted averages** for precision, recall, and F1-score.

## Telecom Customer Churn Prediction | GitHub | Python, Machine Learning, Power

Mar 2024 – Apr 2024

- Developed a predictive model to forecast customer churn, achieving 89% accuracy with Logistic Regression.
- Analyzed a dataset of 7043 customers and performed feature engineering to enhance model accuracy.
- Recommended strategic actions based on key predictors; contract type, and total charges to reduce churn.

## CERTIFICATIONS AND AFFILIATIONS

Won Kaggle Competition: Secured 1st place in the Kaggle NLP competition with Disaster Tweets. Certifications: Oracle Cloud Generative AI Professional, Data Analytics by CISCO.