AISHWARYA AJAYKUMAR

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PROFILE

Senior Analyst proficient in leveraging analytics for strategic planning in cross-functional collaboration, data synthesis, optimization, and driving business growth.

- Languages: Python (Pandas, NumPy, SciPy, StatsModels), SQL, R
- **Skills:** Exploratory Data Analysis, Data Engineering, Data Mining, Predictive Modeling, Sensitivity Analysis, A/B testing, Client Relationship Management, Agile Project Management
- Technologies: MS Office, PySpark, Scikit-learn, Keras, Flask, Selenium, NLP, SAP, Power BI, Tableau, SAS EM
- Certifications: Azure Fundamentals, AWS Cloud Practitioner, AWS Solution Architect, Azure Data Scientist

EDUCATION

Purdue University, Daniels School of Business

West Lafavette, IN

Master of Science in Business Analytics and Information Management

August 2023 - August 2024

• Achieved 9th place in the 2024 CCAC National Kaggle competition with an ensemble model predicting NCAA ticket sales.

SRM Institute of Science and Technology

Bachelor of Technology, Electrical and Electronics Engineering

Chennai, India July 2015 - July 2019

PROFESSIONAL EXPERIENCE

Mu Sigma Inc. | Client: Fortune 100 CPG, Confectionary & Petfood manufacturer *Project Manager*

Bangalore, India March 2022 – July 2023

- Led a cross functional team of 15 Data Analysts, Data Engineers, and UI/UX Developers, adopting Agile methodologies to improve strategic decision-making with sales forecasting in the supply chain. Directly contributed to a growth strategy, expanding the product's footprint in key European markets and the USA.
- Orchestrated CI/CD workflows with Azure DevOps, automating build, test, and deployment phases. This initiative facilitated comprehensive execution planning, project timeline definition, and effective change management, ensuring project adaptability and success.
- Implemented ARIMA, ARIMAX, Holt-Winters, Prophet 4-model framework for sales forecasting, which improved forecasting efficiency by 70% and cut down on labor hours dedicated to forecasting by ~90%.

Lead Decision Scientist

January 2021 – February 2022

- Minimized waste in production process for a pet food manufacturing factory, by recommending optimal raw material inputs to the plant by analyzing historical production patterns. Employed Monte Carlo simulations to create an input optimization algorithm, which resulted in a savings of 60% or 5000 Euros/week.
- Engineered an advanced data engine solution using docker containers and Azure IOT devices, facilitating a write-once, run-anywhere approach to standardize factory data across platforms, which led to a ~15% savings in storage costs and improved data accessibility for strategic planning.

Decision Scientist

October 2019 – December 2020

- Conducted comprehensive exploratory data analysis and stakeholder interviews to identify operational inefficiencies in packaging lines, leveraging a Power BI dashboard to implement and monitor improvements, achieving a 55% reduction in incident rates.
- Created a data integration system with PySpark for large-scale processing, integrated Django APIs for SQL data extraction, and enhanced data accessibility for a React app, driving improved user interaction and engagement.

Canadian Imperial Bank of Commerce USA (Capstone Project) Risk Analytics Intern

West Lafayette, IN

January 2024-April 2024

• Automated the data refresh process for a key fraud detection dashboard using Python scripts and Azure data Factory, significantly reducing monthly manual data manipulation and accuracy checks, streamlining operations, and enhancing real-time fraud monitoring capabilities.

ACADEMIC PROJECTS

- Built a predictive model to determine listing prices and revenue for Airbnb with Gradient boost, refined with PCA and hyperparameter tuning, to optimize listing profitability.
- Forecasted loan defaults by combining Logistic Regression and LightGBM models for improving risk assessment for financial institutions.
- Optimized online categorization for a classified's platform using CNNs and NLP, including LSTM and gradient boosting, significantly enhancing user search experience and listing accuracy.