Akash Vishwakarma

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Dynamic Data Detective and Machine Learning Enthusiast, skilled in unraveling complex datasets for actionable insights and innovative solutions, excelling in data-informed decisions with expertise in data analysis, governance, and model development.

EDUCATION

University of Southern California,   **Los Angeles, CA**
Degree - Masters in computer science   **January 2023 - December 2024**
Coursework: Algorithms, Database, Artificial Intelligence, Machine learning & Data Science   **GPA: 3.5**

Savitribai Phule Pune University   **Pune, India**
Degree - Bachelor of Engineering in Information Technology   **August 2018 - May 2022**
Coursework: Data Structure, Statistics, OS, Data Science, Machine Learning and Big Data   **GPA: 9.51**

TECHNICAL SKILLS

- **Python:** NumPy, Pandas, Scikit-learn, SciPy, Keras, TensorFlow, Matplotlib, Seaborn, Pytorch, SciPy
- **Languages:** Python, C, C++, Java, HTML, CSS, Javascript, PHP, Flask
- **Tools & Cloud:** Tableau, Power BI, Git and Github, Azure, AWS, DataBricks, Snowflake, ETL, Docker
- **Databases :** MS SQL, Hadoop, Oracle Server, PostgreSQL, PySpark, NoSQL, RDBMS, MapReduce, Big Data, large-scale datasets
- **Statistics/Modeling:** Hypotheses Testing, supervised and unsupervised learning, Deep Learning Applications, Predictive modeling

PROFESSIONAL EXPERIENCE

Cognizant Data Scientist | Artificial Intelligence via Forage   **November 2023 - November 2023**
- Spearheaded a data analysis project aimed at optimizing inventory management for Gala Groceries.
- Faced with the challenge of inefficient inventory management, so led a project to address frequent overstocking and stockout issues.
- Overcame this by developing a machine learning model specifically to predict inventory needs with greater precision and reliability.
- Optimized the stock replenishment process with a strategic model, achieving a more balanced and responsive inventory system.
- Communicated findings and analysis in the form of a PowerPoint slide to present the results back to the business.

Data Analyst | Bracket Infinity | Mumbai, India,   **March 2020 - July 2020**
- Built a Python-based web scraping algorithm to identify and retrieve over 10,000 missing images and comment details from an e-commerce website plagued by loading errors and data gaps.
- Extracted and analyzed product review data, including comment counts and star ratings, to assess customer feedback patterns.
- Synthesized data into reports, visualizing key insights in Tableau to highlight areas with high positive reviews and star ratings.
- Presented findings and methodologies to non-technical stakeholders, effectively communicating complex concepts and solutions.

PROJECTS

Spam and Ham Classifier | Neural Language Processing, Streamlit, Support Vector Machine (Webiste-Link)   **July 2023**
- Developed and deployed a robust spam detection model utilizing SVM algorithms and TF-IDF vectorization.
- Achieved 98% accuracy in distinguishing spam and ham messages, with the capability to classify over 10,000 messages efficiently.
- The system can significantly reduce the influx of unwanted emails, enhancing email management and security for users.

Anime Recommendation | Generative AI, Langchain (Github)   **July 2023**
- Crafted Anime Recommendation Model with Langchain & Chat GPT API, using Generative AI for user genre and type preferences
- Offers a highly interactive and user-friendly interface, allowing users to effortlessly find anime tailored to their tastes.

Image Analysis Neural Network Model | Python, CNN, Tensorflow (Github)   **June 2023**
- Crafted a neural network model adept at classifying and analyzing fashion-related images, making it an invaluable tool for automated image categorization and trend analysis in the fashion industry. Utilized LeNet-5 architecture with 99.80% accuracy.

Tableau and Power BI Dashboard | SQL, Python, Tableau, Excel, PowerBI (Website - Link)   **December 2022**
- Designed HR analytics strategies using Tableau resulting in a 16% attrition rate reduction.
- Identified 56% of attrition in the R&D department and peak attrition within the 25-34 age group on business data
- Transformed pizza sales data into actionable insights using SQL, Power Query, Python, and Power BI. Conduct exploratory data analysis to identify trends, patterns, and outliers then done data visualization.

PUBLICATIONS

An android application to mark attendance using fingerprint authentication | (Link)   **December 2015 - May 2018**
- Collaborated with 3-member team to create an Android attendance app, boosting efficiency by 40% and reducing department cycle time by 25%. Implemented secure authentication measures to prevent proxy attendance. (Published - IJRAR.ORG)

LEADERSHIP WORK

- Volunteered for Mind Spark event at DY Patil College, Pune. Collaborated in managing event and other volunteer work.
- Mentored juniors, organized college book-giving, conducted gaming event at DY Patil College, featuring CS:GO and PUBG.
- Led team to 1st place in PUBG tourney, securing 5,000 Rs Prize through strategic coordination and leadership skills.