Chander Mohan

Data Science Professional

SUMMARY

Passionate and dedicated Machine Learning Engineer with over 1.5 year of hands-on experience in data analysis, data visualization, Project Management, and Model deployment with expertise in Python, SQL, ETL Pipelines, and qualified professional in Master of Data Science from RMIT University.

SKILLS

Languages: Python, R Programming, SQL, HTML, CSS, JavaScript, Hadoop

Libraries and Frameworks: TensorFlow, Scikit-learn, Flask, NLTK, Flask React JS, RESTful API, Gen AI, Docker

Tools and Platforms: Tableau, AWS, Netlify, GitHub, ML-Flow, Excel

ML Ops: DVC (Data Version Control), Model Deployment, CI-CD pipeline, GitHub Actions, Cloud Pipelines

Work EXPERIENCE

CSIRO / Data Science Intern

Jul 2023 - Nov 2023

- Developed and implemented innovative data augmentation methodologies for tabular data in the genetics domain and used Tableau dashboards to present the insights and findings to stakeholders.
- Collaborated with team and stakeholders to understand healthcare data and experiment with different techniques and machine learning model to compare the performance.
- By implementing data augmentation methodologies and creating end-to-end pipelines, we have enabled to derive actionable insights from complex healthcare data and enhance the model performance by 80% to 87% by using Mixup Algorithm.

Marlabs INC / Junior Machine Learning Engineer

Feb 2020 - Jan 2021

- Developed and implemented various machine learning algorithms and models, significantly enhancing business decision-making processes by analyzing and processing both SQL and No-SQL data.
- Collaborated with data scientists, software engineers, and business stakeholders to understand project requirements, gather data, and deliver actionable insights.
- Creating RESTful APIs for machine learning models to facilitate communication with web frameworks.

DCS Technologies / Data Science Intern

Aug 2019 – Dec 2019

- Assisted in data collection, cleaning, and preprocessing tasks to ensure data integrity and quality.
- Assessing the performance of machine learning models using appropriate metrics. Fine-tune models to achieve desired outcomes.
- · Collaborated with other team members for creating comprehensive reports and summarizing findings.

PERSONAL PROJECTS

Portfolio Website | Node js, React, HTML, CSS, CI-CD Pipeline

chandermohan.xyz

- This portfolio reflects my professional journey, personal projects summary, including a deep dive into React.js for this project.
- Design & Developed Custom Components and used Modern framework and React js APIs.
- Implemented a CI/CD pipeline to automate integration, and deployment processes, ensuring seamless updates and improved development workflow efficiency.

Automated Facial Emotion Recognition | TensorFlow, GPU CNN Model, Transfer learning

- The objective of this project is to develop a single CNN neural network that will automatically recognize Pattern in image and facs code for an image.
- Implemented Neural Network CNN model to create this model.
- Explored different image pre-processing tools and libraries to analyze and clean the image data. And create own custom data loader for pre-processing.
- Using the VGG16 Model by utilizing transfer learning with custom layers.

Predicting Liver Cirrhosis Stage | Feature Engineering, Model Comparison, Data Analysis, Visualization

- The aim of this project is to build a model that will predict the stage of Liver Cirrhosis with the help of different type of information about patients like medical history, lab reports and other relevant factors.
- Implemented Machine Learning Concepts to predict the stage of Liver Disease.
- Try to explore every step of a Data Science Project like handling missing values, cleaning, Data Analysis, feature engineering and used different model for prediction and then did model comparison.
- Summarized findings and provide a detailed explanation.

Movie Recommendation and Review Analysis | Data Collection, API, ETL Processing, Model Deployment

- Implemented a robust movie recommendation system with sentiment analysis using MLops principles, showcasing expertise in machine learning integration with operational processes.
- Leveraged TMDB API for comprehensive movie data retrieval, including details on cast, crew, and reviews, demonstrating proficiency in API integration and data acquisition.
- Using Flask framework for user interface, showcasing ETL processing capabilities by fetching data through APIs, appending it to existing datasets, and performing calculations to present refined results.
- Demonstrated adaptability by dynamically updating the dataset through API calls, enabling real-time addition of new movies, and ensuring up-to-date recommendations for users.

Fraud Detection Project by using SQL | SQL, Pandas, Plotly, PostgreSQL, SQL Schema Design

- Designed database design and management for transaction and customer data from CSV files.
- Implemented foreign keys and primary keys to ensure data integrity. And utilized SQLAlchmeya library to connect to the database.
- Build Executed queries and employed Python pandas framework for data manipulation and fraud detection. Generated visualizations such as graphs to analyze fraudulent transactions.

EDUCATION

RMIT University

Feb 2022 – Nov 2023

Master of Data Science

COURSEWORK

Advanced Programming for Data Science, Algorithms and Analysis, Machine Learning, Big Data Processing, Deep Learning, Database Concepts, Data Visualization, Applied Analytics

CDLU University, Haryana, India

Jun 2016 – Jul 2019

Bachelor of Science (Mathematics and Computer Science)

COURSEWORK

Descriptive Statistics, Real Analysis and Probability, Discrete Mathematics, Calculus, Computer Networks, Operating System, Data Structure