SARTHAK DALAL



EDUCATION

Sep 2022 - May 2024 Rutgers University M.S. in Computer Science GPA: **3.92/4.0**

• Teaching Assistant: CS170: Computer Applications for Business (Fall 23 & Spring 24)

University of Mumbai Aug 2018 - May 2022 GPA: 8.86/10

Bachelor of Engineering in Electronics and Telecommunication Engineering

• B.E. Project: Battery Management and Data Analytics of Battery and Vehicle Data

SKILLS

Languages & Frameworks: Python, C#, C, C++, R, Java, JavaScript, ASP.NET Core, GraphQL

Web Technologies: HTML/CSS, Bootstrap, Flask, React, Angular, NodeJS, TypeScript, Django, Selenium, jQuery

Databases: MySQL, Microsoft SQL Server, PostgreSQL, MongoDB, DynamoDB

Cloud: Microsoft Azure, Azure App Service, Azure SQL Database, AWS, Elastic Beanstalk

Tools: Git, GitHub, VS Code, IntelliJ, Eclipse, Docker, JetBrains Rider, Jupyter, Bash, Heroku, Postman Other Skills: Azure DevOps, CI/CD, Agile Methodologies, Performance Optimization, Debugging and Testing

EXPERIENCE Full list

PipeIQ, Software Development Intern in Machine Learning

Jun 2023 - Aug 2023

- Engineered a customer-centric chatbot utilizing prompt engineering and LangChain agents using Python.
- Created a code snippet for the chatbot using HTML, CSS, and JavaScript, designed for seamless integration via Google Tag Manager, enabling clients to easily install the chatbot on their websites.
- Spearheaded the development of a robust FastAPI endpoint to host the PipeIQ backend on AWS Elastic Beanstalk, ensuring optimal performance and scalability for the chatbot, resulting in improved user experiences.
- Developed and implemented web scraping scripts to extract embeddings from client websites and store them in the **Pinecone vector database**, optimizing search and recommendation capabilities.
- Implemented strategic analytics integration using Google Tag Manager, incorporating Google Analytics, DealFront, and PeopleDataLabs onto the PipeIQ website, leading to a 35% increase in actionable insights for the marketing team.
- Leveraged PeopleDataLabs Data and reverse IP lookup to identify and personalize user interactions, improving lead conversion rates by 40%.

Full list Projects

MovieShop | C#, .NET Core, MVC, Azure DevOps, CI/CD, Azure SQL Database, Entity Framework Core



- Developed a comprehensive MovieShop MVC Application using C# as the primary language and ASP.NET Core with Onion/Clean Architecture to implement a robust and scalable web application.
- Implemented CI/CD pipelines using Azure DevOps, ensuring seamless integration and deployment processes. Automated build and release processes, reducing deployment time by 50%.
- Configured Azure SQL Database for backend storage, leveraging Entity Framework Core for data access and migrations, efficiently managing a dataset of over 10,000 movies.
- Utilized Bootstrap for responsive design, creating a user-friendly interface that works seamlessly across various devices and screen sizes.
- Reduced database query time by 30% through optimization and indexing strategies.

BidBazaar | Java, JSP, Apache Tomcat, MySQL

- Led a team of 4 in creating an auction website like eBay using Java for backend development, SQL for database management, and a web application framework, with features including user account creation, auctions, browsing, advanced search functionality, and admin and customer representative functions.
- Designed and implemented a robust SQL database schema to manage user data, auction listings, and transactions, optimizing queries for efficient data retrieval and ensuring data integrity in the Java-based web application environment.

Publications

- [1] "LexRank and PEGASUS Transformer for Summarization of Legal Documents," in MISP 2022,
- [2] "A Comparative Study on Sign Language Recognition Methods," in ICSES 2022,
- [3] "Arbitrage in cryptocurrency: A survey," in *ISCON 2021*,