Savitha Venkatesh

+1 (256) 652-5545 | savithav2000@gmail.com | linkedin.com/in/savitha-venkatesh | github.com/savitha-v | savitha-v.github.io/savven

PROFILE

Data-driven software engineer bridging the gap between data pipelines and user-facing applications by leveraging strong analytical skills and development expertise to design, build, and manage efficient software solutions.

EDUCATION

M.Sc. in Applied Computer Science – Software Engineering, *University of West Georgia*, Aug 2023 - May 2025

B.Sc. in Data Science, *University of Texas at Dallas*, Aug 2018 - May 2022

SKILLS

Management: JIRA, Agile, MS Office, Confluence, Git, Public Speaking & Presentation, Bilingual Communications, Project Scheduling & Strategic Planning

Technical: C++, R, Python, SQL, Java, HTML, CSS, JavaScript, Hadoop, Hive, AWS S3, Google BigQuery, Redshift, Bootstrap, Spring Framework, Angular, DevOps, Microservices, WebUI, API, ITIL, Visual Studio, PyCharm, RStudio, NetBeans, Jupyter Notebooks, Git, Eclipse, MySQL, SQLite, Snowflake, DataGrip, AWS

WORK EXPERIENCE

Software Engineer, Cognizant, Jun 2022 – Aug 2023

Underwent extensive hands-on training for eleven weeks mastering **project management** and **software development concepts** and **technologies** to be well-equipped to meet client needs for their projects and tasks

Team Project: Managed a team of five new graduates to design, develop, and launch a full-stack e-commerce shopping website allowing users to shop for handmade items using **Spring Boot, Spring Tool Suite, MySQL, Angular, JavaScript,** and **HTML**. Increased team efficiency by 20% through effective task allocation and utilization of **GitHub Task Board** for **project management**, while also putting together a presentation for the senior software engineers and executives in the ADM branch and scoring an average rating of 4.8 out of 5

Data Engineering Intern, VMware, May 2021 – Aug 2021

Developed a task tracker tool to track all data engineer and analyst jobs daily by reporting details of each job through **AWS Redshift** and **S3**, using **JIRA** to **schedule** and **plan** tasks for this project, and employing **Python** for the backend and automation and **SQL** queries for creating the output leading to a 25% reduction in time spent on tracking and reporting daily data engineer and analyst jobs

Conducted a **gap analysis** on data maintained by two different pipelines (one from EDW and one from EUC Data Engineering) and edited my team's **SQL** run job using **Git** to extract data from the EDW pipeline, thus reducing data pipeline maintenance efforts by 30% and creating a streamlined and more efficient data processing workflow

Cloud Team Student Engineer, University of Texas at Dallas, Sep 2020 – May 2021 & Aug 2021 – Feb 2022

Planned and created documentation to carry out specific tasks and functions **in Amazon Web Services (AWS)** using **Jira** and **Confluence** and created templates on **AWS CloudFormation** to provide necessary resources for the development of an application or solution

Projects: AppStream 2.0 is a computing resource developed in response to COVID-19 and remote student learning to allow students to stream applications and access software instead of downloading them on their personal devices

- Tested Automated Mass Spectral Deconvolution and Identification System (AMDIS) which is one of many applications run in AppStream 2.0, and developed workflow and troubleshooting guide on **Confluence** for students and professors using AMDIS, thus reducing support requests by 15% and increasing student adoption of the platform by 40%

PORTFOLIO PROJECTS

Down By The Fishin' Hole, UWG – Program Construction II, Feb 2024

Engineered a **Java-based** simulation game (**github.com/savitha-v/Down-By-The-Fishin-Hole**), showcasing advanced **object-oriented programming** techniques by leveraging **encapsulation, inheritance, and polymorphism** with its classes and subclasses

Utilized **interfaces and abstract classes** to establish a flexible and extensible design, allowing different fish behaviors and fishing hole characteristics and **Java's collection framework, employing arrays** to manage game elements dynamically

Implemented **exception handling** to manage runtime errors, ensuring robust game functionality

Developed a **user-friendly textual interface** with interactive menus, enabling players to navigate the game world, simulating real-world fishing experiences

This project underscores my proficiency in **Java's core features, design patterns, and standard libraries**, illustrating my capability to construct intricate, well-organized software solutions.

Personal Training Booking Platform, UWG – Web Technologies I, Dec 2023

Developed a responsive website (**savitha-v.github.io/ptconnect**) for purchasing personal training sessions as part of my final exam project in a web development course

Implemented using **HTML, CSS, JavaScript,** and **Bootstrap**, the site demonstrates my proficiency in **front-end technologies** and showcases an **intuitive user interface** for a seamless purchasing experience.

Career Portfolio, UWG – Web Technologies I, Oct 2023

Developed a professional portfolio website (**savitha-v.github.io/savven**) for my midterm exam project in a web development course

Implemented using **HTML** and **CSS** and showcasing my technical skills and projects, the site features a clean design, easy navigation, and highlights my software engineering expertise, serving as a central hub for potential employers to explore my work and capabilities.

Pima Indians Diabetes Study, Independent Project, June 2020

Using **Python**, created **predictive supervised machine learning models** based on **regression** and **classification** methods mirroring the accuracy of the Pima Indians Diabetes Study, which was a study conducted on Pima Indian women predicting whether they could potentially be diabetic or at risk based on fasting vital signs and biodata

Models allowed user to input their vital signs and understand if they were at risk for diabetes

Energy Consumption, Independent Project, May 2020

Using **RStudio**, **visualized** energy consumption data by creating **bar graphs** for each country/region's energy type and usage and for amount consumed by top five countries/regions, and a **correlation map** between energy types used **Visualizations** allowed for understanding on types of energy used by countries, and if consumption of one energy type was correlated to another: Ethanol and biodiesel usage do not correlate with kinetic energy usage. US consumes the most energy in 10 out of 17 energy types, followed by China. Results show that population has a strong correlation to energy consumption.

Boston Crime Analysis, UTD - Data Analysis for Statisticians & Actuaries, February 2020

Team project - **Analyze** and **visualized** various types of crimes and patterns in Boston over a 3-year period using **RStudio** by creating a **line graph** representing crime rate categorized by crime type, month, and year, and a **bubble plot** showing occurrence numbers of each crime grouped by district and year

Results showed that districts B2, B3, C11, and D4 had most crimes and highest crime rate was in December and January