PROJECTS

1. **Mill Operations Optimization**

Technology : Oracle, SQL, Python (pandas) and CSV

Description :

Ardent Mills is a company that operates in the business domain of food and agriculture. It is a leading flour milling and ingredient company that provides a wide range of products and solutions for the food industry. As a part of their new initiative they want to improve their operational efficiency, reduce waste, streamline processes, and enhance overall performance.

Roles & Responsibility:

- Utilized Excel to collect and consolidate data from various mill operations.
- Conducted initial data validation and quality checks using Excel functions such as VLOOKUP, conditional formatting, and data validation rules to ensure data accuracy and consistency.
- Designed and deployed data pipelines with Python and Pandas, automating data extraction and ensuring consistency.
- Configured ETL processes, ensuring efficient data handling from extraction to loading. Designed database tables within the target system for optimal performance and data integrity.
- Provided insights to stakeholders through detailed Excel reports and interactive dashboards, supporting data- driven decision-making.

2.Vendor Management Inventory

Technology : SQL, Python (Pandas), Power BI and Microsoft Excel

Description:

Collaborated with a team to develop and deploy the Vendor Management Inventory (VMI) system for Navajo Inc. This project utilized the data engineering techniques employing SQL, Python, and Pandas to optimize inventory management.

Roles & Responsibility:

- Analyzed project requirements to understand data structures and dependencies. Implemented SQL database schema aligning with business objectives.
- Utilized Excel for initial data validation and quality checks, employing functions such as VLOOKUP, conditional formatting, and data validation rules to ensure data accuracy and consistency.
- Leveraged Excel's formulas and advanced functions for complex calculations and data aggregation. Preprocessed, cleaned, and transformed raw data with Python and Pandas for analysis.
- Configured ETL processes, ensuring efficient data handling from extraction to loading into the target SQL
- database.
- Utilized Power BI for advanced analytics and generating actionable insights.