Task Description

The objective of Task 3 for the Elevo Pathways Internship is to perform Exploratory Data Analysis (EDA) on the Titanic Dataset using Python. This task utilizes the classic Titanic, Machine Learning from Disaster dataset [available on Kaggle] to explore and analyze passenger data. The process involves key steps to uncover insights and prepare data for further analysis.

- Importing the Titanic Dataset into Python as the recommended data source.
- Performing data cleaning: handling missing values, converting data types to ensure consistency.
- Generating summary statistics and group-based insights (e.g., survival by gender/class).
- Visualizing key patterns and correlations using plots to identify trends.

Tools and Libraries

This task employs Python along with essential libraries:

- Pandas for data manipulation and analysis.
- Seaborn or Matplotlib for data visualization.

Covered Topics

The task covers fundamental concepts in data analysis, including:

- EDA fundamentals such as data types, missing data handling, and descriptive statistics.
- Data visualization techniques for exploring relationships and distributions.