

STAT 650 - Project 2

Grading Rubrics

Yoonsung Jung

1. Introduction (10 points)

- Overview of the project (5 points)
- Objectives and research questions (5 points)

2. Dataset Description (10 points)

- Source of the dataset (3 points)
- Description of variables (7 points)

3. Data Pre-Processing (15 points)

- Handling missing values (5 points)
- Data cleaning and preparation (5 points)
- Data transformation and feature engineering (5 points)

4. Exploratory Data Analysis (EDA) (20 points)

4.1 Univariate Analysis (7 points)

- Summary statistics (3 points)
- Visualizations (4 points)

4.2 Bivariate Analysis (7 points)

- Correlation analysis (3 points)
- Visualizations (4 points)

4.3 Multivariate Analysis (6 points)

- Multivariate relationships (3 points)
- Visualizations (3 points)

5. Regression Analysis (35 points)

5.1 Simple Linear Regression (7 points)

- Model fitting and results (3 points)
- Evaluation metrics (4 points)

5.2 Multiple Linear Regression (7 points)

- Model fitting and results (3 points)
- Evaluation metrics (4 points)

5.3 Polynomial Regression (7 points)

- Model fitting and results (3 points)
- Evaluation metrics (4 points)

5.4 Logistic Regression (7 points)

- Model fitting and results (3 points)
- Evaluation metrics (4 points)

5.5 Regularization Techniques (7 points)

- LASSO and Ridge regression (3 points)
- Elastic Net regression (4 points)

6. Model Evaluation and Comparison (15 points)

- Evaluation metrics for all models (8 points)
- Comparison of model performance (7 points)

7. Results and Interpretation (10 points)

- Summary of findings (5 points)
- Insights and implications (5 points)

8. Formatting and Readability (10 points)

- Legible and professional, looks like it could be published (5 points)
- Ordering and transitions are clear. Not hard to read (5 points)

9. References (5 points)