Names: Bushra Rahman Class: CS 4375.004

Assignment: ML Portfolio Summary

Technical and Soft Skills

This portfolio for machine learning demonstrates the following technical skills:

- proficiency in <u>Python</u> (with focus on libraries for machine learning and data science, including sklearn, seaborn, pandas, and numpy)
- proficiency in $\underline{\mathbf{R}}$
- proficiency in <u>C++</u>
- ability to use the <u>RStudio</u>, <u>VSCode</u>, and <u>PvCharm</u> IDEs
- ability to use <u>Jupyter Notebook</u> and <u>Google Colab</u>
- familiarity with a wide range of common machine learning algorithms, including...
 - o linear and logistic regression
 - Naive Bayes
 - o kNN
 - o k-means and hierarchical clustering
 - o decisions trees
 - o neural networks

...and demonstrates the following soft skills:

- project management, both independently and with a team
- analytical thinking and problem solving
- ability to read and write technical reports
- time management

Summary

My interest in machine learning has increased after understanding the fundamentals in this course and producing this portfolio. The advent of many new machine learning applications into our culture, like AI generators for art, music, speech, text, and code, feels like the perfect coincidence with my completion of this course. It is a cutting edge field that is as astounding and foreign as it is engaging and powerful, but working on the projects in this portfolio has given me the experience to gain some familiarity and skill in this field. I am interested in pursuing more machine learning projects in the future to apply the skills I have developed in Python and to gain more experience using R. I want to focus on the potential of this field to improve people's lives, and in the future, I hope to create and share machine learning projects that can provide others with a positive impact.