Capstone #3 Proposal

Context

The sponsor of the project, WebFilms, is a movie streaming service looking to implement a formal recommendation system into their platform. They have a rating system currently on their platform and have collected their data which can be found here (via Kaggle). The rating system has given them some initial information about their users' preferences but they are looking to implement a recommendation system to reduce the amount of time a user spends browsing for material to watch. They are finding that customers spend a lot of time browsing but eventually leaving the platform due to not being able to find a move quickly as they have identified a direct correlation between browsing time and whether a user selects a movie to watch. This has them worried as advertisers are not keen on spending ad dollars on a platform that doesn't have users constantly watching.

Problem Statement

WebFilms needs to implement a formal recommendation system into their movie streaming service and would like a ML algorithm that is capable of providing recommendations based on their collected data. Success is defined by having a 80% accuracy rate of recommending a movie the observation (aka user in this instance) would enjoy. We are restricted to the data provided. The delivery date for the model, report, and presentation is December 15tth, 2022.

Criteria for Success

Development of a recommendation system that has an accuracy rate of 80% when measured against the provided data. It is important to note that we will not be handling implementation.

Scope of Solution Space & Constraints

We are limited to developing the recommendation system and WebFilms will be responsible for deployment. We have no other data sources to pull from regarding this project.

Stakeholders

The following are identified as the key stakeholders of the project:
- WebFilm's UI/UX team as they will need to identify how a recommendation will be submitted to a user
- WebFilm's data team as they will be responsible for implementation of the model and providing any information related to the data set we are using
- WebFilm's marketing director as she wants to be able to put together literature that will tout the new addition to their platform

Data Sources

The primary data source we will be using can be accessed here and was provided by WebFilm's data team.