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Project Proposal

Overview:

Our proposed group project is to create a data visualization tool that will allow a user to find a movie that they want to want watch.

Domain Situation:

This app will be a web app and it help solve the issue of users trying to determine which movie to watch. It can be difficult deciding which movie to watch based on the multitude of choices.

The vis tool will utilize a dataset of movie data which includes data such as: title, directory, year, duration, actors, Facebook likes, gross revenue, genre, plot keywords, budget, and IMDB score. The dataset is in a tabular format. In addition, we will use the IMDB open API called OMDB. This has additional features such as Movie posters, Oscar awards and plot synopsis.

Some user stories for our data vis tool are:

* As a user, I to view relevant results based on my search criteria
* As a movie watcher, I want to be able see movies that my favourite is in so that I can watch all the movies that actor has been
* As a user, I want to discover movies that I find interesting.
* As a user, I want to be able to search by keyword so I can watch the genre I am interested in.
* As a movie watch, I want relevant suggestions of movies so I can find new movies to watch

Task and Data Abstraction:

The task that user is doing is searching the data. The data is refined by user inputs. Once a target is found, they can query the data to see additional attributes.

Visual Encoding/Integration Idiom:

The two main vis formats we are considering are:

1. Collapsible Force Layout – this vis idiom shows nodes that when clicked on, expand to show linkages to other nodes, leading the user to an appropriate selection. Based on user inputs, the size of the nodes would expand or shrink.
2. Word Cloud – this vis idiom shows all of the data in a word cloud format. The size of the words would increase or decrease based on user inputs

Algorithm:

The proposed algorithm will sort the data based on linkages such as genre, director, year etc. Based on the user inputs, the size of the data will increase or decrease. For example, if the user clicks on movies for 2016, those corresponding movies will increase in size in the visualization.