Project Title: World University Ranker

Project Summary:

Our project aims to develop a dynamic web application that redefines the traditional approach to university rankings. By including a wider range of metrics, we hope to offer users the ability to customize and personalize rankings based on their unique preferences and values. This feature will allow prospective students to generate rankings that align closely with their specific interests and goals, moving away from the "one size fits all" rankings that we typically see, as well as store their own preferences in personalized accounts.

Description:

Our project allows users to tailor their university research according to their personal goals. By letting users rate and consider aspects like academic excellence, faculty-to-student ratio, campus sustainability, employment outcomes, and diversity, our program aims to enhance the current university rating systems. Our goal is to address the inflexibility of standard ranking techniques, which fail to take into account the varied requirements and values of students. By making a customized rating process possible, we hope to direct students toward colleges that genuinely meet their academic and personal needs.

Creative component:

For our project, we plan to introduce a trend analysis feature based on how universities have ranked in recent years (from 2017 to 2024). This component combines some of our existing data (2023, 2024 columns) with another <u>dataset</u> from Kaggle that contains the overall QS World University Ranking from 2017 to 2022. By including this feature, users will have yet another important metric to consider in their search.

Additionally, we aim to implement a user login system that allows users to create an account and maintain a list of favorite universities.

Usefulness:

Our project offers practical uses for various groups of people. The main audience is prospective students, as they can benefit from personalized insights into universities in order to find a good match. Employers and recruiters can also use the platform to identify universities that typically produce graduates with strong employability skills and relevant experiences. While there are other ranking websites, they often exist behind paywalls and do not allow for nearly as much personalization. Overall, we hope our university ranking will allow for a quick and easy way to compare universities based on what students actually care about.

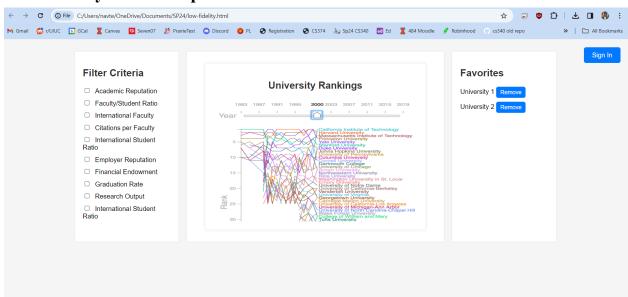
Realness:

The data being used in our project will come from a Kaggle dataset titled "QS World University Rankings 2024." The data, which comes in a csv format, features information about 1,500 universities across 104 different locations emphasizing unique features such as employability and sustainability. In total, there are 29 columns that cover a wide variety of attributes that could factor into the personalized rankings.

Functionality:

Users can interact with our web application by customizing their ranking criteria, generating personalized university rankings, and saving selected universities to their lists. They can create an account to keep track of their recommendations/personal favorites, as well as search for specific criteria they desire in a university. They can update/delete from their list of favorite colleges, which is saved to their account.

Low-Fidelity UI Mockup:



Work Distribution:

In general, we will be working together to design and develop our application so that all of us can benefit from this project and come out with improved skills; however, we will have certain people with better backgrounds focusing on specific components. For example, Navtej is more experienced in frontend implementation with HTML, CSS, and Javascript so he will be leading that field. The rest of us will collectively work together to implement the backend and the database, while also learning to connect these components as we go.