**ANALYZING THE DYNAMICS OF SUICIDE RATES**

**ACROSS SOCIOECONOMIC INDICATORS**

1. **DESCRIPTION**

The objective of this project is to explore how social and economic factors are linked to suicide rates across different countries from 1990 to 2022. It involves gathering and analyzing data from 3 sources to uncover insights into how these factors interplay and influence suicide rates across different countries.

1. **DATA SOURCE**
2. **Source 1: Flat file**
3. **Description**

The first source is a CSV file from Kaggle containing the global suicide rates from 1990 to 2022. Kaggle is an online platform that offers datasets and tools for data analysis.

1. **Link**

The link to the dataset is:

https://www.kaggle.com/datasets/ronaldonyango/global-suicide-rates-1990-to-2022/code

1. **Source 2: API**
2. **Description**

The second source is an API (Application Programming Interface) from the World Bank Data Catalog. It provides performance indicators such as economic performance, social development, and environmental sustainability across different countries.

1. **Link**

The link to the API is: http://api.worldbank.org/v2/sources/83/indicators

1. **Source 3: Website**
2. **Description**

The third dataset can be found on Wikipedia. It is a table detailing the population of each country over multiple years. Wikipedia is one of the largest and most popular online encyclopedias.

1. **Link**

The link to the third data source is:

<https://en.wikipedia.org/wiki/List_of_countries_by_past_and_projected_future_population>

1. **RELATIONSHIPS**

CSV file: The CSV file contains the Country Name, Year, Suicide Count, Age Group, Generation, GDP (Gross Domestic Product), and Inflation Rate.

Website: The website has a list of countries with their population from 1990 to 2022

API: The API will provide us with the performance indicators for each country (Statistical Performance Indicators)

All three datasets are related by the Country name. The CSV file has a one-to-one relationship with the website by Country Name and a one-to-many relationship with the API data by Country name as well.

1. **PROJECT APPROACH**

This project investigates how suicide rates are connected to social and economic conditions in different countries from 1990 to 202. To do this, we will:

* Gather the data from the three sources.
* We will then clean and format the data to ensure consistency and address missing values or outliers.
* Merge the three datasets based on “Country Name”. This will create a comprehensive dataset for our analysis.
* Analyze suicide rates against various socioeconomic indicators using visualizations like scatter plots, heatmaps, and time series graphs.
* Identify potential correlations between suicide rates and socioeconomic factors (unemployment, GDP)
* Explore trends in suicide rates and socioeconomic factors across different countries and time periods.
* The project will finally present a report with charts to help understand the results and potentially use them to develop suicide prevention strategies.

1. **CONCERNS AND CHALLENGES**

It is challenging to see suicide rates through the lens of socioeconomic indicators only. They are also influenced by other factors like social norms, mental health, and cultural differences. Interpreting the variables and establishing causal relationships can be challenging and will require advanced analytical techniques. Another concern is how to ensure data accuracy and reliability. Data sources may have errors or inconsistencies that could potentially affect the analysis. We will need to verify the quality of the data before drawing conclusions.

1. **ETHICAL IMPLICATIONS**

To address the sensitive nature of this project (suicide), we will:

* Analyze the data without any personal identifiers to ensure the analysis is done anonymously.
* Cite all data sources used during this project.
* Present the finding truthfully without any bias to avoid misleading interpretations.