Project Title - Visualize Happiness

Team Member
Daren Raymond
Paul Anderson
Evan Mobley
Shreya Bakshi

Project Description/Outline -
Per Country - visualize variables that affect happiness

Research Questions to Answer -
1. Does freedom have an affect on happiness?
2. Which countries are the happiest?
3. Is happiness based on geography?
4. Is happiness based on poverty rate?
5. Is happiness based on family size?

Datasets to be Used -

https://www.kaggle.com/mathurinache/world-happiness-report-20152021

https://data.world/samayo/country-names/workspace/file?filename=country-yearly-average-temperature.json
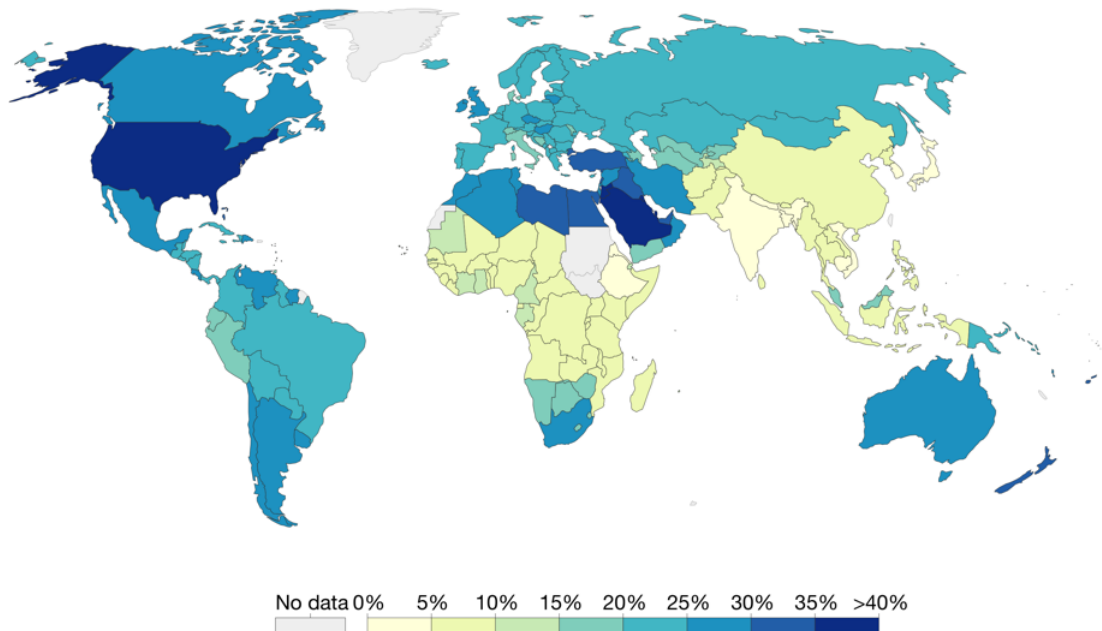
https://data.worldbank.org/indicator

Rough Breakdown of Tasks -

1. Data compile and clean - Paul Anderson
2. Database creation (SQL) - Shreya
3. Python back end - Evan Mobley
4. Flask - Paul Anderson
5. HTML - Shreya
6. Javascript - Evan Mobley
7. Heroku hosting - Paul Anderson

Javascript Library: Chartkick for line plot (3rd visualization)

Share of adults defined as obese, 2016

Percentage of adults aged 18+ years old who are defined as obese based on their body-mass index (BMI). BMI is a person's weight in kilograms (kg) divided by his or her height in metres squared. A BMI greater than or equal to 30 is defined as obese.
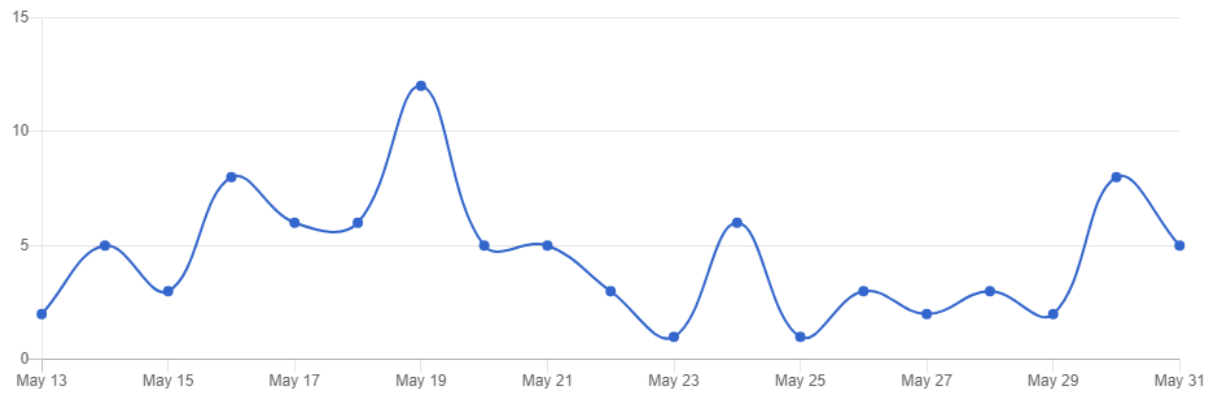
Our World in Data

No data 0% 5% 10% 15% 20% 25% 30% 35% >40%

Source: WHO, Global Health Observatory

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- User can hover over each country and view 2021 ['Happiness Rank','Happiness Score', 'Economy (GDP per Capita)', 'Family', 'Health (Life Expectancy)', 'Freedom', 'Trust (Government Corruption)', 'Generosity']

- Subplots = line of best fit, slope, r^2
- X axis filters: ['Happiness Score', 'Economy (GDP per Capita)', 'Family', 'Health (Life Expectancy)', 'Freedom', 'Trust (Government Corruption)', 'Generosity']
- Y axis filters: ['Happiness Score', 'Economy (GDP per Capita)', 'Family', 'Health (Life Expectancy)', 'Freedom', 'Trust (Government Corruption)', 'Generosity']
- The goal with this chart is to have the user select a column for each access and view the correlation between the 2.

- Plot happiness over time
- Filter by country
- Filter by sub-region (maybe)