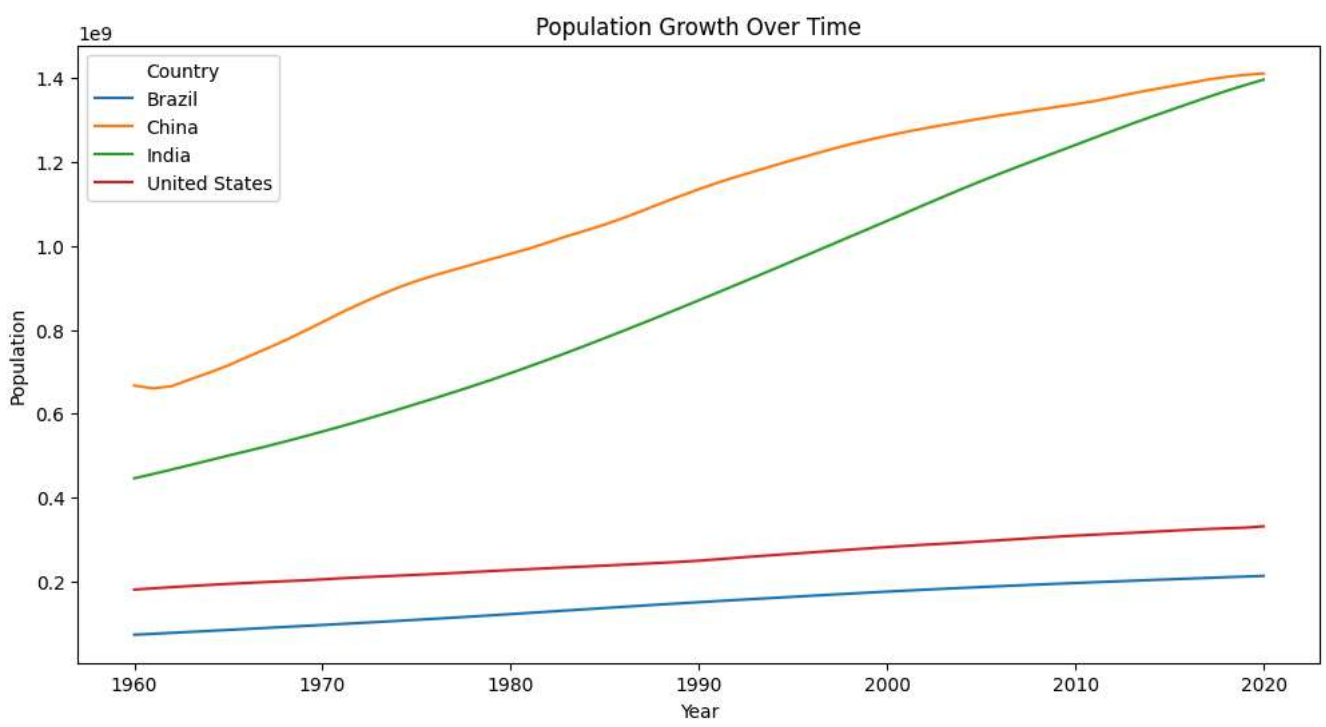
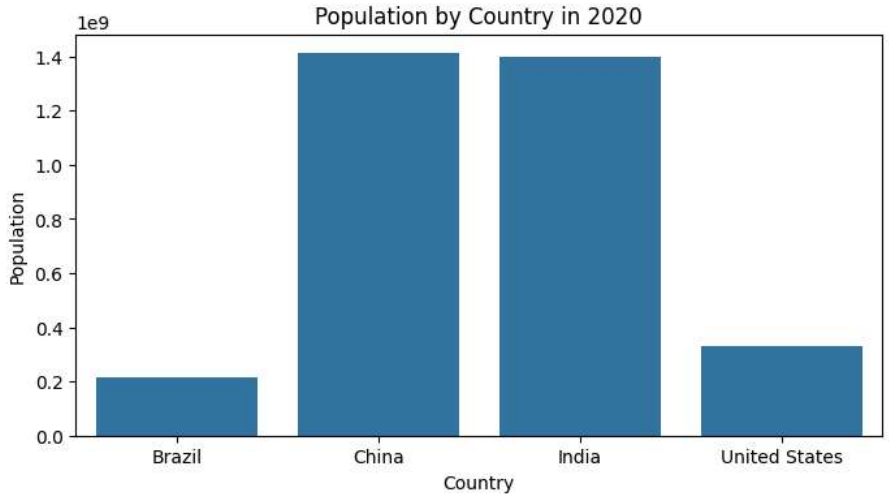
```
import pandas as pd
import matplotlib.pyplot as plt
import seaborn as sns



url = 'https://raw.githubusercontent.com/datasets/population/master/data/population.csv'
df = pd.read_csv(url)


print(df.head())
```

```
  Country Name Country Code  Year  Value
0        Aruba          ABW  1960  54608
1        Aruba          ABW  1961  55811
2        Aruba          ABW  1962  56682
3        Aruba          ABW  1963  57475
4        Aruba          ABW  1964  58178
```

```
# Data Cleaning and Transformation
# Filtering for a few selected countries for demonstration
countries = ['United States', 'India', 'China', 'Brazil', 'Russia']
df_filtered = df[df['Country Name'].isin(countries)]

# Filtering data for years 1960 to 2020
df_filtered = df_filtered[(df_filtered['Year'] >= 1960) & (df_filtered['Year'] <= 2020)]


# 1. Line Chart for Population Growth Over Time
plt.figure(figsize=(12, 6))
sns.lineplot(data=df_filtered, x='Year', y='Value', hue='Country Name')
plt.title('Population Growth Over Time')
plt.xlabel('Year')
plt.ylabel('Population')
plt.legend(title='Country')
plt.show()
```



```
# 2. Bar Chart for Population by Country (for the most recent year)
latest_year = df_filtered['Year'].max()
df_latest_year = df_filtered[df_filtered['Year'] == latest_year]

plt.figure(figsize=(8, 4))
sns.barplot(data=df_latest_year, x='Country Name', y='Value')
plt.title(f'Population by Country in {latest_year}')
plt.xlabel('Country')
plt.ylabel('Population')
plt.show()
```




```
# 3. Histogram for Population Distribution (for the most recent year)
plt.figure(figsize=(8, 4))
sns.histplot(df_latest_year['Value'], bins=10, kde=True)
plt.title(f'Population Distribution in {latest_year}')
plt.xlabel('Population')
plt.ylabel('Frequency')
plt.show()
```