

## Lab: The Power of Pyramids

Age Structure Diagrams, also known as Population Pyramids, are created by plotting the percentages or numbers of males and females in the total population in each of three age categories: prereproductive (ages 0-14), reproductive (ages 15-44), and postreproductive (ages 45 and older). In this lab, you will analyze various countries based on their age structure diagrams to determine trends and assumptions.

Visit the website [www.census.gov](http://www.census.gov) and select “people” then “international database”. “Demographic overview” and year should automatically be selected as the current year. Select a country of your choice on the right – please choose a different country than the students around you. Hit “submit” at the bottom.

**Create the following table** for the oldest set of data along with the data projected furthest into the future (most likely this is 1995 and 2025, but your country’s data may be slightly different).

Country Name: \_\_\_\_\_

year	midyear population	growth rate	total fertility rate	crude birth rate	life expectancy at birth	infant mortality rate	crude death rate	net migration rate
1995								
2025								

Go back to “people” and “international database” from the homepage and change “select report” to “population pyramid graph”. Be sure your country is selected on the right and hit “submit”.

**PRINT (now or at home) the population pyramid graph** for your country and submit it with your lab.

^^^ Use 2020 then Copy/Paste into your google doc

**Answer the following questions** based on the table you created and the pyramid you printed.

- How has the population of your country changed over the time period represented? Explain possible causes.
- How has the growth rate changed over the time period represented? Explain possible causes.
- Using the growth rate from 1995, how long would it take for the population to double? (hint: use rule of 70)
- How has migration affected your country? Explain possible causes for this migration.
- Compare and contrast this data with the country of another student. #5 & 9: Pick another pyramid & compare (if yours is developing, pick a developed & vice versa)
- Describe the shape of your age structure diagram.
- Looking at your age structure diagram, classify your country as preindustrial, transitional, industrial or postindustrial. Justify why you chose this classification.
- Is there a difference in the numbers of males versus females in your country? What reasons can explain this?
- Find a student with another country whose shape is different. What might cause these differences? (think population controllers, natural or man-made causes, etc.) #5 & 9: Pick another pyramid & compare (if yours is developing, pick a developed & vice versa)

**#10 & 11: Use the "Population by 5 year age group" option on the drop-down menu**

10. Using your age structure diagram, determine the percent of the population that has yet to reach child bearing age. What does this number say about the potential growth of the population?
11. What percent of the population is 55 and above? What does this number indicate about future growth?
12. If you had a business and wanted to capitalize on this demographic information, what kind of business would you own and why?
13. How might the growth trends of your country influence socioeconomic policy in the country?