

Project Assignment 1 – Geography and Climate of your Island/Country

Total 25 points – Due Friday 2/7/20 by 5 pm at Email

Instructions to turn in:

- 1) These assignments must be TYPED
- 2) Student information: Name, student ID, ATMO 102 Fall 2019, Date all on their own line - in the upper Right Hand Corner
- 3) Title as described in the assignment (replace “your Island/Country” with the actual name of your Island/Country.
- 4) Times New Roman
- 5) 12 pt font
- 6) 1 inch margin
- 7) Page numbers in the lower Right hand Corner
- 8) Include the question and put your answer underneath

GEOGRAPHY

1. (2 points) Physical Map of your Country.

Google around for a physical map of your country. It's really important that you find a physical one so we can see if there are mountains or rivers or lakes in your country. Include the image with your assignment.

2. (2 points) Location Description

What is the latitude and longitude range of your country (you'll need four numbers: one for the top latitude, one for the bottom latitude, one for left longitude and one for the right longitude)? In what part of the Pacific Ocean is it located (North Pacific, Equatorial Pacific, South Pacific, East Pacific, West Pacific, or some combination of these)? What other islands or continents is it near?

3. (2 points) Island or Country Size

How large is your country in km²? Is it larger or smaller than the Continental US (area is 8,080,464 km²)?

4. (4 points) Terrain

What types of physical geography make up the country? Is your country a high island, atoll, continental island? How many islands are there in total or is it just one large island? What types of geographical features are noteworthy? Mountains, rivers, volcanoes, bays? Is the land rocky, sandy or both?

5. (1 point) Capital City Location

What is the latitude and longitude of the capital, or largest city, of your country? Is your city located on the north, south, east, west, or center of your country? Is it on the sea or inland? Describe its location with regard to the terrain you discussed in question 4.

CLIMATE CHARACTERISTICS

6. (3 points) Climate Type

What **Koppen Climate types** exist in your country? (*Hint: Refer to the “Climate Classification” PDF that’s included with this assignment. Or Google “Koppen classification Pacific” and see what you find!*) Once you know your climate type (a combination of letters) google what the description/definition is for your country.

7. (11 points) Seasonality

a) (1pt) What is the **hottest month of the year** and what is its **monthly average temperature** for this month in degrees Fahrenheit for the capital, or largest city, in your country?

b) (1 pt) What is the **coldest month of the year** and what is its **monthly average temperature** for this month in degrees Fahrenheit for the capital, or largest city, in your country?

c) (1 pt) What is the **annual range of temperature** in degrees Fahrenheit for the capital, or largest city, in your country? (*Hint: An annual range is: hottest month average temperature – coldest month.*)

d) (1 pt) What is the **driest month of the year** and what is its **monthly average precipitation amount** in mm for the capital, or largest city, in your country?

e) (1 pt) What is the **wettest month of the year** and what is its **monthly average precipitation amount** in mm for the capital, or largest city, in your country?

f) (1 pt) What is the **annual range of precipitation** in mm for the capital, or largest city, in your country? (*Hint: An annual range is: the wettest month average rain amount – driest month average rain amount.*)

g) (2 pt) How does the annual temperature and precipitation for the capital city of your country **compare to Honolulu**? Make sure to list the necessary values for Honolulu and calculate the difference between your capital city and Honolulu, “larger” or “smaller” is not sufficient.

h) (1 pt) Based on the above information does your capital city experience **large or small seasonality**? (*Hint: Seasonality refers to how extreme the seasons are. Honolulu has less seasonality than New York where there are very strong seasons (hot summers, cold winters).*)

i) (1 pt) Include a figure (plot) that shows the monthly mean temperatures for your capital city (X-axis will be months of the year, Y-axis is temperature in degrees Fahrenheit).

j) (1 pt) include a figure (plot) that shows the monthly mean precipitation for your capital city (X-axis will be months of the year, Y-axis is precipitation in mm).