Climate Map Project

Project Overview
Design an island continent and draw a map of its climate features. On separate pages, explain what causes each of the climate features. Compile the whole thing into a nice tidy project.

What should it look like?
- Page 1: Overall climate map and key
- Page 2: Explanation page for pressure belts
- Page 3: Explanation page for prevailing winds
- Page 4: Explanation page for ocean currents
- Page 5: Explanation page for major rainforest and deserts
- Page 6: Explanation page for seasonal climates
- Page 7: Explanation page for Rainshadow Effect
- Page 8: Explanation page for Coastal Wet regions

Due Date: Monday, 2/24/03, at the end of class.

Relative Importance: 10% of 3rd quarter grade.

Step-By-Step Instructions

Step 1. Design your continent so that it satisfies the requirements below. Your continent must:
- cross the equator.
- extend past 40° North or South Latitude.
- have at least one mountain chain that creates a rain shadow.
- be completely surrounded by water, with no other continents nearby.
- be wide enough to have all of the climates we have discussed in class.

Step 2. Make a neat map of your continent that can be used as a template and photocopied.
1. Sketch your continent on a sheet of paper. Add fairly evenly spaced latitude markings. Then sketch the climate features.
2. After you have sketched the climate features, you may decide that you want to alter the shape of your continent.
3. Make a very neat black and white template map that meets these requirements:
   a. The map should be drawn on ordinary, plain white, 8.5" X 11" paper.
   b. All margins must be at least 1cm.
   c. Lines should be dark. Black or dark blue pen is preferable.
   d. Latitude markers should be displayed on the map. You may include latitude lines as well, if you wish.
   e. This map is your template map. It should include only items that you want to appear on all of your maps.
4. Turn in your template map in by the end of class on _____. One full size copy and eight small copies, plus the original, will be returned to you on the following school day.

Step 3. Plan your final map, explanatory diagrams, and general project layout and design.
1. Plan your primary climate map. This is the map with all of the climate features on it.
   a. Use your original template map to draw a rough draft of your final climate map. Include all of the climate features. Try to make it accurate, but limit yourself to rough draft quality at this point.
   b. Design a key to your map. Again, don't make it pretty; it's a rough draft.
   c. Decide what media you will be using on the final draft (colored pencils, markers, prisma pencils, etc.)

2. Explanation Pages – On each of these pages there is a small map that is used to explain one of the seven climate features. There will be seven of these pages. Go through the following steps for <u>each</u> of those seven pages.
   a. For each page, decide what information should be displayed on the small map. For example, the map on the "Major Rainforest and Deserts" explanation page should show the pressure belts and the warm and cold ocean currents. You'll need to show those features in order to properly explain the formation of the rainforest and deserts.
   b. This information should be presented in small "packets." It should look a little bit like notes, but it should be very neat. You can create captions that connect to parts of the mini map. You can also draw extra diagrams that help explain the climate feature. Try to avoid writing full paragraphs. (See example, posted in classroom.)
   c. Think about how you're going to fit that information on the page. You may want to make a rough sketch of the page's layout.

<u>Step 4.</u> Complete your final draft.
1. Complete your map final draft. Don't forget to leave room for a key and a title on the same sheet. The title should be something like "The Climates of <u>(insert your continent's name here).</u>"
2. Complete final drafts of your seven explanation pages.
3. Compile your project. It should be:
   a. ordered logically.
   b. easy to examine.
   c. sturdy (no pages or parts falling off).
   d. easy to store. (size limit <u>12"</u> X <u>18"</u>)

*IF you would like to create a digital version of this project, that is okay.

Some Grading Criteria (Point values have not yet been assigned, but you can be sure that bold items are quite important.)
- **Is the map correct?**
- Does the continent itself meet the requirements?
- Does the continent have all of the necessary climate features?
- **Have all project components been completed?**
- Is the project neat?
- Is the project sturdy (or does it fall apart)?
- **Does it give an overall impression of quality?**
- Do the written components of this project have good conventions?
- Are your explanatory maps easy to understand?
- **Is your project engaging? Is it a joy to look at and read?**
- Are your explanations thorough?
- Are your explanations easy to comprehend?
- **Do your explanations seem to reflect a true understanding of the subject matter?**
- Is the project especially creative (in a good way)?
- Was the continent especially difficult?
- Is there anything else especially good or bad about this project?

If you have an especially challenging continent, you <u>may</u> receive some extra credit. However, if you have an especially challenging continent, you are more likely to make mistakes. At any rate, here are a few ways to make your continent trickier:
- You may decide that your continent exists on a planet that rotates westward.
- You may add some large lakes to the interior of your continent.
- Extend your continent to or past 60°
- Extend your continent to or past a pole of the earth.