

PLATE TECTONICS DISASTER CASE STUDY

Purpose: The purpose of this project is to assess your understanding of plate tectonics and how they affect natural disasters. You will be using your knowledge to create a Google Slideshow presentation demonstrating the concepts learned in this Dynamic Earth Processes Unit.

Directions: You will be working in a group of 3-4 students and you will choose a plate tectonic disaster to study and research. After researching, you and your group members will put together a Google Slideshow presentation. There are three components of this project that will impact the overall grade received, and they are as follows: case study worksheet, Google and Slideshow Presentation. It will be expected that you and your group members will be working on this project in class as well as at home for homework.

Case Study worksheet:

- Mark all 8 disaster locations on the map using numbers
- Fill in 1 most interesting fact about each disaster
- On the back, fill out the required information for the Google slideshow presentation.

Google Slideshow Presentation: These are the required information for your slideshow presentation.

- Explanation of the tectonics involved in this earthquake
 - Discussion of what type of plate boundary disaster occurred on
 - Discussion on which plates were involved and how the plates moved (Map may be useful)
 - Discussion on these natural disasters occur and why they occur
- Geographic location of the earthquake
 - Map of location where the natural disaster occurred
 - Have the name of location written out
- Explanation of the disaster
 - Explain how the natural disaster worked
 - Includes visuals like pictures or videos to help with the explanation
 - Provide real-life descriptions of people impacted by the disaster
 - Include visuals of the evidence of the disaster (example - seismogram from seismograph)
- Table-impacts the disaster caused
 - Place an impact in each box
 - You can report human damages, damages to structures, economic and environmental damages. And any other impacts.
- Two images of the disaster
 - Include visuals of the aftermath of the disaster
- Explanation of prevention /lessons learned /images
 - What major lessons can be learned from this disaster
 - What can we do to prevent or prepare for this type of thing in the future
 - Include visuals of different things people have adapted to deal with future earthquakes from the area of your natural disasters (examples; warning systems, earthquake proof architecture, etc.)
- Work Cited
 - List all resources used during your research.

Case Study Site: _____ Names: _____

Names: _____ Names: _____ Names: _____

PLATE TECTONICS DISASTER CASE STUDY PRESENTATIONS

Short link to presentation Slides: _____

	0 - INC. OR INCORRECT	4 - POOR	6 - FAIR	8 - GOOD
CASE STUDY WORKSHEET				
Case Study Work Sheet	Lacks information and location of plate tectonic disasters	Locations are not accurately located and information is not completely correct	Locations are located and information is clearly and completely explained	Location are accurately located and information is thoroughly researched and accurate
GOOGLE SLIDESHOW PRESENTATION				
	0 - INC. OR INCORRECT	4 - POOR	6 - FAIR	8 - GOOD
Explanation of the tectonics involved in this earthquake	Hardly any facts; vague or incomplete information	Explains some, or part of the tectonics; lacking in detail or completeness.	Clearly and completely explains the tectonics involved in causing this earthquake.	Demonstrates thoroughness and originality of thought in explaining the tectonics involved in causing this earthquake
	0 - INC. OR INCORRECT	1 - POOR	2 - FAIR	3 - GOOD
Tectonic Plates	No information is provided	Explains some, or part of the tectonics; lacking in detail or completeness.	Clearly and completely identify plates involved and type of plate boundary	Demonstrates thoroughness in identifying plates involved and type of plate boundary
Geographic location of the earthquake	No map has been provided.	Map is not clear and all have not been observed.	Map is satisfactory, the key feature can be identified but not all have been mentioned.	Identifies geographic location as well as features of the area. Includes a map
Explanation of the disaster	Question has not been answered or the response is too brief to adequately answer the question.	Provided little to no visual aids and the explanation is brief. Your explanation does not clearly and/or provide enough detail as to why the disaster happens or occurs	Explanation provides us with some understanding as to the workings of your natural disaster; however more information would have been beneficial. The pictures needed to better support the written info.	Your response adequately explains your natural disaster and the diagrams have been well chosen.
Table-impacts the disaster caused	No table has been included.	The table indicates more thorough research was needed. It lacks detail about the impacts your disaster had on the environment and humans.	The table demonstrates research but more impacts could have been listed.	The table very clearly outlines the damage the disaster caused on the people and the environment.
Two images of the disaster	No images have been provided. Or images do not represent the disaster accurately.	One image has been chosen; clearly provide a picture of what happened.	Two images have been chosen; clearly provide a picture of what happened. The significance of images was briefly explained during presentation.	Two images have been chosen; clearly provide a picture of what happened. The significance of images was thoroughly explained during presentation.
Explanation of prevention /lessons learned /images	Little or vague explanation provided.	Explains some, or part of the prevention; lacking in detail or completeness.	Clearly and completely explains prevention/ lessons learned and images included.	Demonstrates thoroughness and originality of thought in explaining prevention/ lessons learned and images included.
Division of Labor	Vast differences in labor and effort.	Some group members contributed more than others.	Group members shared the work equally most of the time	Group members shared the work equally all the time
Work Cited	Little or no work cited.	Includes some sources, and/or inconsistent formatting.	All work cited with completeness in formatting.	All work cited thoroughly and expertly.