

Geologic Faults

Engage

Materials: Paper towel and 2 Graham Crackers per student

What To Do:

Explore

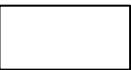
Materials: Set of Road and River squares for each student (A and B), scissors, glue, colored pencils

What To Do:

1. Color and cut out the two sets of Road and River squares found on the next page.
2. Glue Set A side by side in the space below making sure to line up the bushes, road, and river.
3. Make sure the boxes with the letter A are on the bottom far corners.
4. Write three sentences describing what you observe in the boxes.

SET A – BEFORE

Dispose of the crackers as your teacher directs.



5. Place Set B side by side in the space below and push them slightly in the direction of the arrows.
6. Make sure the boxes with letter B are on the bottom far corners.
7. Glue them in the space below.
8. Write three sentences about what you observe on the lines below.

SET B – AFTER

Road and River Blocks

1. Color the bushes green.
2. Color the road brown or black.
3. Color the river blue.
4. Cut them out.

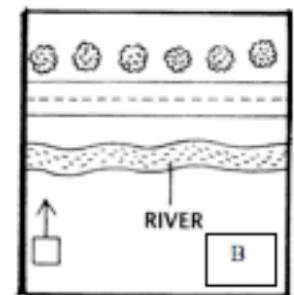
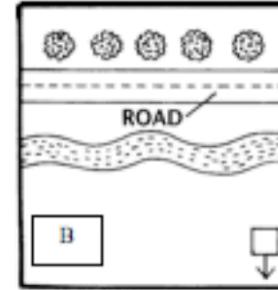
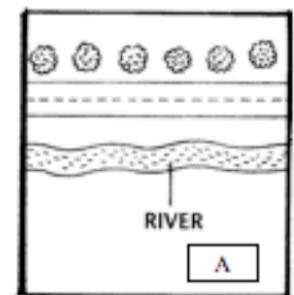
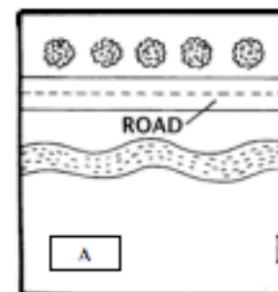


PLATE BOUNDARIES

Explain



GEOLOGIC FAULT

EARTHQUAKES

FRICITION

Elaborate

1. Watch the video “G101 Plate Tectonics, San Andreas Fault” found at <https://www.youtube.com/watch?v=g6LVyF1HI9w>
2. Use the Word Bank to help you fill in the blanks.

WORD BANK

crust	shift	pull	fault	stress	split
earthquakes	run	transform		warping	

1. Plate Tectonics is the theory that says that the Earth's _____, is made up of about 15 individually moving pieces, or plates.
2. These produce _____, mountains, volcanoes, and the crust itself.
3. As these plates interact, they can _____ apart.
4. They _____ into each other.
5. When they move side by side it is called _____ movement.
6. The San Andreas _____ is the division between the Pacific Plate and the North America Plate.
7. If you then look down over here, you can see all of this _____ in the rock.
8. All of that warping is because of the _____ that happens as a result of the San Andreas Fault passing through here.
9. One day there's going to be an earthquake here, and the pieces are going to _____ and move.
10. This piece over here where the Pacific Plate is at is going to head up towards the north and it's going to _____ this highway in half.

Plate Tectonics

S L I S S O F M O N T N L B D N I H
Z S I E D P O U Z O Q V H J D O N Z
Z K F P K S T O P I P A F Q S I N V
T Y Z Y P E A S W T F N A E W T E V
C Z W J R W T J D I X M T O B C R O
M J L C T O J U B S Z A A F E I C L
J O O S H A U J Y O L Z F N N R O C
V R U L I T H O S P H E R E T F R A
E R B N W N L D C R S H Y H M L E N
C N H Q T E O I J E S T E D Y P E O
A W W V L A N L M P O M L B G P D E
C W J X A O I E W U J U S U H A E S
L I L R T O U N G S H P M Z A Z A W
K M V C M R J J S F Y K V A E F F V
Z M E S U P E R V O L C A N O B L A
C T U F E Q K O I W U S Y G H B G W
V K V N A G S E K A U Q H T R A E K
Q A F B G E X T K L U K M E T K Z Q
C O N V E C T I O N C U R R E N T S
Z Q P D J X D X Q R I B P I V F L L

convection currents
earthquakes
hotspot
Law of superposition
Super volcano
Tectonic plates

crust
fossils
inner core
lithosphere
volcanoes
friction

mountains
friction
mantle
outer core

Evaluate

Name _____

period _____

EXIT TICKET

Geologic Faults

1. Where do most earthquakes occur?
 - in the Atlantic Ocean
 - in the middle of a continent
 - along the edge of a plate boundary
2. What causes earthquakes?
 - movement along a fault
 - a tsunami
 - stepping on a fault
3. What evidence do scientists look for to determine the location of a plate boundary?
 - lots of rocks
 - no rocks
 - fault lines
4. The movement along plate boundaries that are side by side is called -
 - divergent movement
 - transform movement
 - convergent movement
5. What type of damage will an earthquake NOT cause?
 - cracks in the earth
 - the movement of roads and rivers
 - wind damage to houses