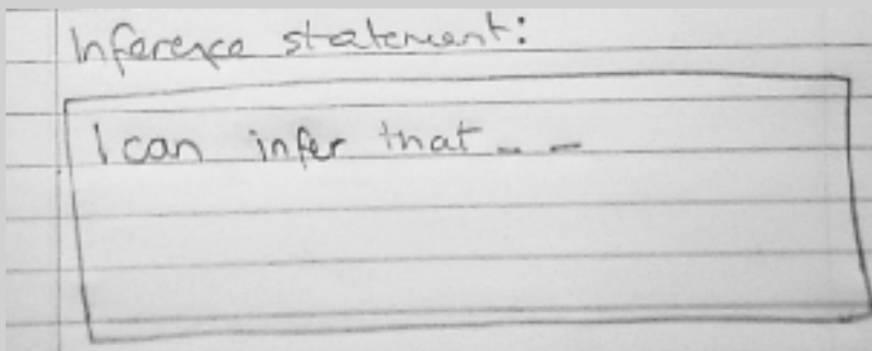


Using your conceptual model, your understanding of the plateau and the limestone research make your inference statement in a box in your journal



Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone.



Period 4

• Sea level has changed
? (higher)

~~• River has eroded down~~

~~• River was up high~~

• During ice age, ocean was higher and now has gone down

~~• Continental plates came together and made land rise~~

~~• River brought in fossils which got embedded in the rock~~

pos) • The ocean rose and the sea creatures got stuck in mud which when the plates shifted rose

~~• Water level dropped~~

Using your conceptual model, your understanding of the plateau and the limestone research make your inference statement in a box in your journal

why are there sea fossils in the Kaibab limestone, 8,000ft above sea level?

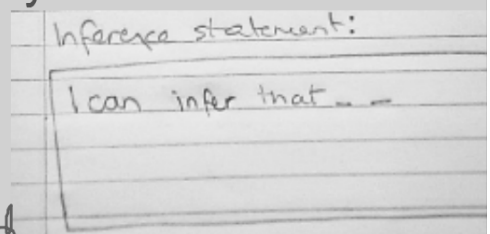
Inference statement:

I can infer that...

Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone.



Using your conceptual model, your understanding of the plateau and the limestone research make your inference statement in a box in your journal



why are there sea fossils in the Kaibab limestone, 8,000ft above sea level?

- ✓ • Left their shells behind
- ✓ • Flood washed in from Ocean
- ✓ • Beach, shell, underneath sand
- ✓ • Left behind
- ✓ • Washed onto shore
- ✓ • River flowing from the Ocean
- ✓ • water used to be at that level
- ✓ • levels of water diff.
- ✓ • water all over
- ✓ • Other animals
- ✓ • earths plates create mountain
- ✓ • Glacier
- ✓ • a weird event

Period 1



Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone.

Using your conceptual model, your understanding of the plateau and the limestone research make your inference statement in a box in your journal

why are there sea fossils in the Kaibab limestone, 8,000ft above sea level?

- The animals lived in the water
- was once a ocean
- all animals lived in water
- formed under water (ocean)
- a lot of fish in water
- Elevation of river higher
- a big hurricane moved animals
- water reduced over time
- sea animals travel up river
- moving plates
- plates rose

Inference statement:
I can infer that...

Period 2

Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone.



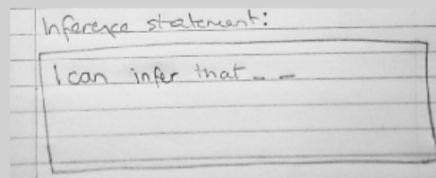
11/01

Limestone

#4

Period 3

Using your conceptual model, your understanding of the plateau and the limestone research make your inference statement in a box in your journal



Earth shifting
? Creatures → rock
? River left creature
Covered by sea
sea level high back then
Ice age
Plate shift

why are there sea fossils in the Kaibab limestone, 8,000ft above sea level?



Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone. .

1. the main component of Limestone is Calcium Carbonate.
2. The mineral name for calcium carbonate is calcite.
3. What percentage of the earth's sedimentary rock is calcite 15%
4. The chemical composition of calcium carbonate is CaCO_3
5. How can you identify carbonate minerals? They break down in acid. You will see a fizz. The gas given off is CO_2
6. The physical characteristics of calcite are different colors, transparent, cannot be scratched by fingernail.
7. Plants and animals eat organisms that contain calcium. They also deposit their shells in the ocean when they die.
8. The 2 ingredients are calcium and bicarbonate.
9. You would find more calcium carbonate in warm

Lab Safety

- Follow directions
- Proper and careful use of materials for intended purpose
- Safety equipment
 - Recall eyewash demonstration
- Keep materials away from your face

We are working with dilute hydrochloric acid, HCl
HCl is dangerous if in contact with eyes or ingested

- Wear goggles
- Gently use a small amount
- Never point bottle at anyone
- Clean up carefully
- WASH HANDS, then remove goggles

Learning
Target:

I can gather evidence to infer why there are fossils in
Limestone.



the Kaibab

TASK:

- Perform acid test and record observations
- Clean up & wash hands
- Remove goggles and place in box

Lab Safety

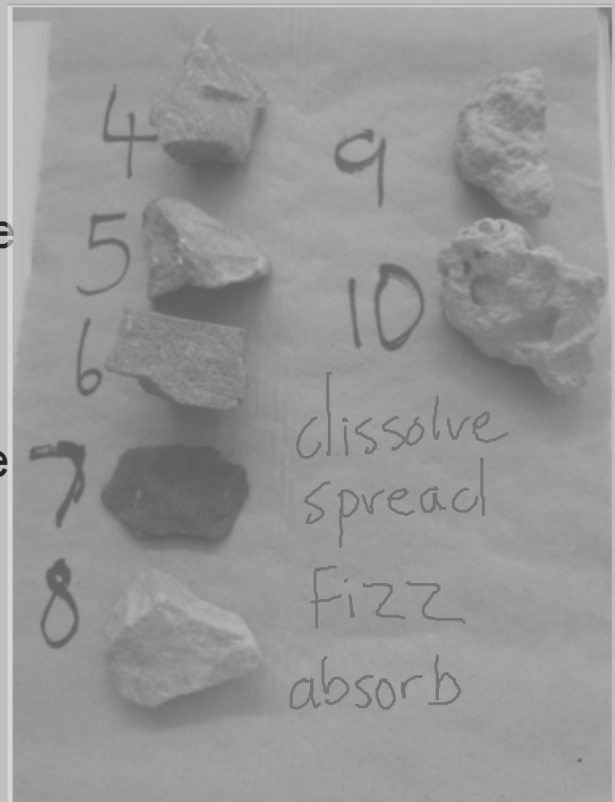
- Follow directions
- Proper and careful use of materials
- Safety equipment
- Keep materials away from your face

Working with acid

- Wear goggles
- Gently use a small amount
- Never point bottle at anyone
- Clean up carefully
- WASH HANDS, then remove goggles

Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone.

1. Place your rocks on a numbered paper towel number side down.
2. Gently put 1 drop of acid on one rock at a time.
3. Carefully observe the reaction and record what you see.
4. Dry the rocks and table with the paper towel. throw away the towel.
5. Return the acid bottle to teacher.
6. Rinse your hands dry with rags
7. Return the goggles



Learning I can gather evidence to infer why there are fossils in the Kaibab

Make this chart in your journals

Rock #	Rock Type	Reaction	Other information
4	Limestone		
5	Limestone		
6	Sandstone		
7	Shale		
8	Sandstone		
9	Limestone		
10	Limestone		

Learning I can gather evidence to infer why there are fossils in the Kaibab target: Limestone.



The material in the rock that reacts with acid is calcite.

Calcite is a common mineral composed of calcium, carbon and oxygen.

Calcite has a chemical name calcium carbonate, or CaCO_3

Calcium carbonate makes up 15% of the earth's sediments.

It is present in marble, marl, travertine and tufa and is the main ingredient in the shells of invertebrates.

I can gather evidence to infer why there are fossils in the Kaibab Limestone.

Copy these definitions into your journal

- **Rock Layers:** flat deposits of rock (like layers in a cake) that extend over a large area
- **Correlate:** to find a relationship or connection between two or more things
- **Plateau:** a large, nearly level area of land that has been uplifted or elevated above the surrounding area.

Learning target: I can gather evidence to infer why there are fossils in the Kaibab Limestone. .

