



# "Replicating an Artifact" Assessment

Today the date is:		
MONTH	DAY	YEAR
<input type="radio"/> January		<input type="radio"/> 2006
<input type="radio"/> February		<input type="radio"/> 2007
<input type="radio"/> March	<input type="radio"/> 0	<input type="radio"/> 2008
<input type="radio"/> April	<input type="radio"/> 1	<input type="radio"/> 2009
<input type="radio"/> May	<input type="radio"/> 2	<input type="radio"/> 2010
<input type="radio"/> June	<input type="radio"/> 3	<input type="radio"/> 2011
<input type="radio"/> July		<input type="radio"/> 2012
<input type="radio"/> August		
<input type="radio"/> September		
<input type="radio"/> October		
<input type="radio"/> November		
<input type="radio"/> December		

Marking Instructions	
<ul style="list-style-type: none"> <li>Use a No. 2 pencil or a blue or black ink pen only.</li> <li>Do not use pens with ink that soaks through the paper.</li> <li>Make solid marks that fill the response completely.</li> <li>Make no stray marks on this form.</li> </ul>	
<b>CORRECT:</b> ●	<b>INCORRECT:</b> ☒ ☓ ☉ ☪

For each question, fill in the bubble for the **BEST** answer.

**1. New rocks are formed when:**

- (A) hot lava from inside the Earth cools.
- (B) rocks are squeezed deep underground.
- (C) sand is squeezed together under deep water.
- all of the above.

**2. The main difference between sedimentary, metamorphic, and igneous rocks is:**

- (A) how they feel.
- (B) what they look like.
- how they are formed.
- (D) the minerals they are made of.

**3. A boy has two rocks. Both are the same kind of rock. What property of his two rocks is MOST likely to be the same?**

- (A) size
- (B) shape
- color
- (D) weight

My initials:		
FIRST	MIDDLE	LAST
(A)	(A)	(A)
(B)	(B)	(B)
(C)	(C)	(C)
(D)	(D)	(D)
(E)	(E)	(E)
(F)	(F)	(F)
(G)	(G)	(G)
(H)	(H)	(H)
(I)	(I)	(I)
(J)	(J)	(J)
(K)	(K)	(K)
(L)	(L)	(L)
(M)	(M)	(M)
(N)	(N)	(N)
(O)	(O)	(O)
(P)	(P)	(P)
(Q)	(Q)	(Q)
(R)	(R)	(R)
(S)	(S)	(S)
(T)	(T)	(T)
(U)	(U)	(U)
(V)	(V)	(V)
(W)	(W)	(W)
(X)	(X)	(X)
(Y)	(Y)	(Y)
(Z)	(Z)	(Z)

Do Not Mark

I was born in this month:	
<input type="radio"/> January	<input type="radio"/> July
<input type="radio"/> February	<input type="radio"/> August
<input type="radio"/> March	<input type="radio"/> September
<input type="radio"/> April	<input type="radio"/> October
<input type="radio"/> May	<input type="radio"/> November
<input type="radio"/> June	<input type="radio"/> December




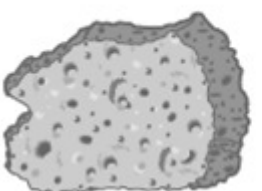
<b>I am a:</b>	<input type="radio"/> Girl	<input type="radio"/> Boy
----------------	----------------------------	---------------------------

Do Not Mark					Do Not Mark				
					s	s	s	s	s
(0)	(0)	(0)	(0)	(0)	(0)	(0)	(0)	(0)	(0)
(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)
(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
(3)	(3)	(3)	(3)	(3)	(3)	(3)	(3)	(3)	(3)
(4)	(4)	(4)	(4)	(4)	(4)	(4)	(4)	(4)	(4)
(5)	(5)	(5)	(5)	(5)	(5)	(5)	(5)	(5)	(5)
(6)	(6)	(6)	(6)	(6)	(6)	(6)	(6)	(6)	(6)
(7)	(7)	(7)	(7)	(7)	(7)	(7)	(7)	(7)	(7)
(8)	(8)	(8)	(8)	(8)	(8)	(8)	(8)	(8)	(8)
(9)	(9)	(9)	(9)	(9)	(9)	(9)	(9)	(9)	(9)

4. One step in how many sedimentary rocks form is:

- (A) lava cools.
- (B) machines squeeze sand.
- (C) salt water sticks sand together.
- (D) sand is squeezed together at the bottom of a lake.

5. A student wrote down some observations of four rock samples she was studying. Based on her observations, which is MOST likely to be a sedimentary rock?

<p>(A)</p> 	<p>has large crystal shape that is almost clear, has smooth sides</p>
<p><input checked="" type="radio"/></p> 	<p>has many very small grains of sand in different layers</p>
<p>(C)</p> 	<p>has solid black color, looks like smooth glass with sharp edges</p>
<p>(D)</p> 	<p>has rough surface full of holes and is light in weight</p>

6. A student has two blocks. He wants to know if they are both made of the same material. What information about the two blocks would help him to decide?

- (A) Both blocks float in water.
- (B) The blocks are the same size.
- (C) The blocks are the same shape.
- (D) All of the above.

7. Could a metamorphic rock become an igneous rock?

- (A) Yes, if people change it.
- (B) Yes, by moving down a river.
- (C) Yes, by melting and then cooling.
- (D) No, a metamorphic rock cannot become an igneous rock.

8. A team of materials engineers invented a new material that can get very hot without melting. They are using this material in the Space Shuttle. How else might this material be used?

- (A) to design new baking pans
- (B) to design a new kind of oven
- (C) both A and B are possible
- (D) neither A nor B is possible

9. Which type of rock is formed when hot lava cools?

- (A) coal
- (B) igneous
- (C) limestone
- (D) metamorphic

10. A materials engineer has been asked to help design a new running shoe. What might she do to design the shoe?

- (A) Ask a running coach what properties the running shoe should have.
- (B) Look at other running shoes to see what materials they are made of.
- (C) Design materials that have properties that will be important for the shoe.
- (D) All of the above.

11. Which of the following is a property of a brick?

- (A) rough
- (B) made out of clay
- (C) can be used to make walls
- (D) all of the above

12. How could you test the hardness of a mineral?

- (A) Squeeze it in your hand.
- (B) Crush it with a hammer.
- (C) Rub it with your fingers.
- (D) Scrape it with another mineral.

13. What information would BEST help someone to identify a kind of rock?

- A the shape of the rock
- B the way the rock feels
- C the way the rock looks
- D what the rock is made of

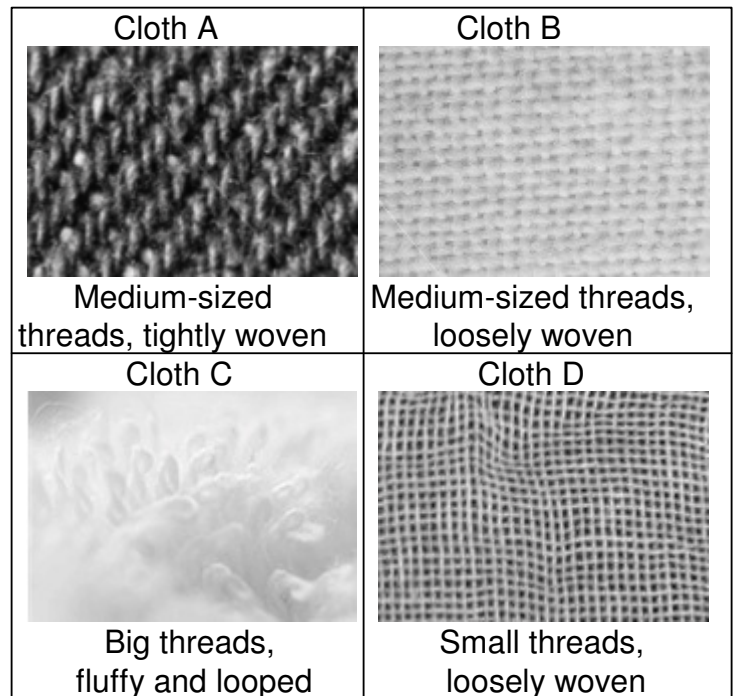
Look at the pictures of four kinds of cloth viewed close-up. Answer questions 14 to 16.

14. Which cloth would be BEST for making towels to soak up lots of water?

- A Cloth A
- B Cloth B
- C Cloth C
- D Cloth D

15. Which cloth would be BEST to quickly separate a mixture of peas and water?

- A Cloth A
- B Cloth B
- C Cloth C
- D Cloth D



16. Could the different kinds of cloth be made of the same raw material?

- A No, they must all be made of different raw materials.
- B No, cloth A must be made of a different raw material.
- C No, cloth C must be made of a different raw material.
- D Yes, they could all be made of the same raw material.