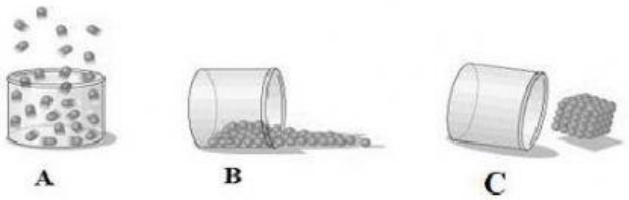
Al Bayader School States of Matter Worksheet Grade 4 ( )

Name: _____

Exercise 1:

Part A: Figures (A), (B) and (C) show the atoms of 3 different materials.



1. Name the state of matter of material (A). Justify your answer.
   i. (A) is a solid since the particles are tightly packed
   ii. (A) is a liquid since the particles are close to each other
   iii. (A) is a gas since the particles are very far from each other

2. Name the state of matter of material (B). Justify your answer.
   i. (B) is a liquid since the particles are very far
   ii. (B) is a gas since the particles are close to each and are flowing
   iii. (B) is a liquid since the particles are close to each other and are flowing

3. Name the state of matter of material (C). Justify your answer.
   i. (C) is a solid since the particles are tightly packed
   ii. (C) is a liquid since it is flowing out of the cup
   iii. (C) is a gas since the cup particles are very far

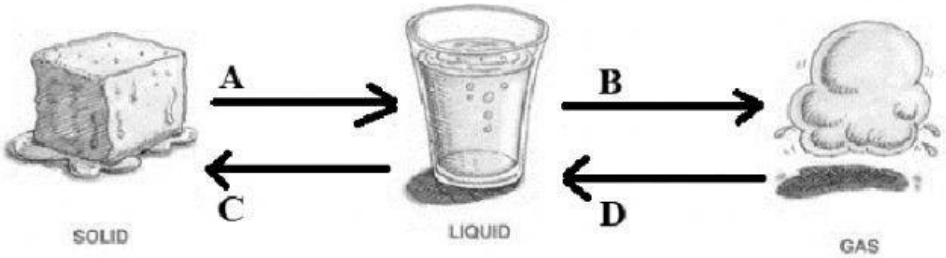
4. Describe the movement of the particles of substance (A).
   i. Particles in (A) vibrate
   ii. Particles in (A) move freely around each other
   iii. Particles in (A) collide as they move quickly

5. Which material has a fixed shape and volume?
    i. Material A
    ii. Material B
    iii. Material C
6. Which materials take the shape of the container?
    i. Materials A and B
    ii. Materials A and C
    iii. Materials B and C

7. Which material has no fixed volume?
    i. Material A
    ii. Material B
    iii. Material C

Part B: The figure below represents the changes in states of matter.

1. Drag and Drop to label changes A, B,C, and D.



Condensation - Freezing- Evaporation - Melting

2. Name the changes of state that need heat.
    i. Freezing and melting
    ii. Melting and Evaporation
    iii. Condensation and Freezing