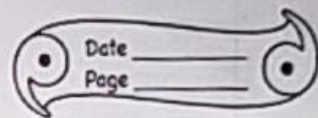


Assignment - ①



1. Define the following :-

- a) Matter b) Diffusion c) Intermolecular force of attraction.

Ans) a) Matter is something that, has mass, occupies space and can be perceived by our sense.

b) The intermingling of two or more substances due to the motion of their particles in order to get a uniform mixture is called Diffusion.

c) The force which are present between the particles of matter is known as inter-molecular force of attraction.

2. What do you mean by kinetic Theory of matter?

Ans- The theory which reveals that any substances whether solid, liquids or gas is made up of tiny particles called atoms, molecules or ions which are in contact motion is called the 'kinetic theory of matter'.

Q - 3. Write the postulates of kinetic theory of matter?

- Ans.
- i) Matter is composed of very small particles called atoms or molecules.
 - ii) The constituent particles of a kind of matter are known in all respects.
 - iii) These particles have space or gaps between them which are known as inter-molecular space.
 - iv) There exists inter-particle or inter-molecular force of attraction in between the particles of matter.
 - v) Particles of matter are always in a state of random motion and possess kinetic energy which increase with the increase in temperature and vice-versa.

4. What happens when :-

a. Water is kept in a deep freezer.

b. Water is heated.

Ans: a) When water is kept in a deep freezer the water change into solid.

b) When water is heated the water change into water vapour.

5. What do you mean by solid? Give some examples.

Ans: Solid is a state of matter. Solid have definite shape, volume and mass. Ex - stones, wood, etc.

6. Explain the interconversion of the state of matter with examples?

Ans: The change of phenomenon of change of one state into another and vice-versa is called interconversion of state of matter.

7. What is sublimation? Mention any two substances that sublime.

Ans. The process in which solid directly change to gaseous state is known as sublimation.
Iodine and camphor are two substances that sublime.

8. Give reason why :-

a. Liquids are called the fluids

b. Solids have a definite shape

Ans. a) Liquids are called the fluids because liquid can flow in any direction freely.

b) Solids have a definite shape because in solid the particles are tightly packed.

9. What are the characteristics of the particles of matter?

Ans. i) Very small in size
ii) They have inter-molecular space
iii) They are always in constant motion. (Brownian motion)
iv) They attract each other. (Inter-molecular force)

10. Explain with an activity which shows that the particles of matter are very small in size.

Ans) - Take 1 L of water in a beaker.

- Add some crystals of potassium permanganate in it.

- The very small crystals of ~~potassium~~ potassium permanganate change color of whole water.

- This is because each crystals of potassium permanganate breaks into smaller and smaller particles and react independently with water.

- From the we can conclude that each substance is made of much smaller particles.

11. Explain Brownian motion with example.

Ans. The haphazard, random motion of the suspended on the surface of a liquid or in air is called Brownian motion.
ex- movement of pollen grains in water.

