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Questions:

4 Marks

1. Give reason for the following.
   Gases exert pressure on the walls of the container.
2. List two properties that liquids have in common with gases.
3. Name the state of matter in which:
   (i) layers of particles can slip and slide over each other
   (ii)particles just move around randomly because of very weak force of attraction.
4. Compare a block of wood, water and air on the basis of the following:
   (i) Compressibility
   (ii) Particle motion
   (iii) Rigidity

3 Marks

5. Name the three states of matter.give examples of each state.
6. When ice at is slowly $-10^{\circ}C$heated, temperature of ice gradually increases till at $0^{\circ}C$, the temperature of the system remains constant when the ice changes into water and then further rises.Explain the observation.
7. Nature is complete but very systematic.There is a system which is exhibited by all types of creations and happenings or even human behaviour.That is the phase of transition.This is a so-called equilibrium state.At this stage both the phases are manifested and with a little energy change in any form, either of the two states can be achieved.Natural phenomena though may not be controlled by human power.
   Give an account of such equilibrium states when we study states of matter.
8. (i)Explain the interconversion of three states of matter in terms of force of attraction and kinetic energy of the molecules.
   (ii)Arrange the three states of matter in the increasing order of rate of diffusion and particle motion.
9. (i) Which factors determine the state of a substance?
   (ii) Convert 30ºC into Kelvin.
   (iii) Water droplets are observed on the outer surface of a glass tumbler containing ice cold water. Give reason.
10. Comment on the following statements:
    (i) Evaporation produces cooling.
    (ii) Rate of evaporation of an aqueous solution decreases with increase in humidity.
    (iii) Sponge though compressible is a solid.

2 Marks

11. What is matter?
12. In what ways air can be considered as matter?
13. What property of the gas is utilized when natural gas is supplied for vehicles?
14. How is pressure developed in a container full of a gas?
15. Ramesh took two beakers A and B containing hot water and cold water respectively. In each beaker, he dropped a crystal sulphate. He kept the beakers undisturbed. After some time what did he observe? Why?
16. Salt and sugar when kept in different jars take the shape of the jar, yet they are classified as solids.Give reason.

Multiple Choice Question

17. Which of the following processing does not convert a liquid into vapours?
    (a) Boiling (b) Heating (c) Evaporation (d) Condensation.
18. Evaporation of a liquid occurs at _____
    (a) boiling point (b) a fixed temperature (c) temperature lower than boiling point (d) all temperatures
19. The conversion of gas into liquid is called _____
    (a) freezing (b) condensation (c) sublimation (d) fusion
20. The fusion is the process in which _____
    (a) liquid changes into solid (b) solid changes into liquid (c) solid changes into gas (d) gas changes into solid