

## CBSE Science Sample Papers for Class 10

TIME: 2 ½ HRS

MM 60

### One mark Questions

1. Focal length of concave lens is 50cm find its power?
2. Write Functional Groups of **Alcohol** and **Aldehyde**
3. What will be the effect of depletion of ozone?
4. What are three R's?

1X4=4

### Two mark Questions

5. Give any two ways in which non-biodegradable substances would affect the environment.
6. Define biological magnification? How it occur?
7. How is the amount of light entering the eye controlled?
8. Explain the phenomenon of rainbow.
9. Why planet does not twinkle?
10. Write the merits of Mendeleev's periodic table.
11. What is the position of Hydrogen in modern periodic table?

Diagrammatically show the process of budding in hydra.

1. Draw L.S. of a bisexual flower.

2X9=18

### **Three mark Questions**

2. An object 2.5cm high is placed at a distance of 25cm from diverging mirror of focal length 20cm. Find the nature, position and size of the image formed?
3. Sign Conventions for Refraction by lens
4. Why does sun appear red early in morning and at sun set?
5. Draw the structural formula  $\text{CO}_2$ ,  $\text{H}_2\text{S}$ ,  $\text{S}_8$
6. In the periodic table given below Lithium, Carbon, Oxygen and Neon are placed in their correct position. The positions of the nine other elements are represented by letters. These letters are not the symbol of any element.

3	4	5	6	7	8	9	10
Lithium			Carbon		Oxygen	L	Neon
X			E		G	Q	
Y						R	
Z						T	

Answer the following questions

- (a) Give the letter of most reactive metal. And non-metal
  - (b) Name the family of the elements represented by L, Q, R, and T.
  - (c) Name one element in each case occurring in groups 2, 3 and 5.
- 19 Explain the term analogous and homologous organs with example.
  - 20 Only variations that confer an advantage to an individual organism will survive in a population. Do you agree with this statement? Why and why not.
  - 21 How is the sex of the child determined in human beings?
  - 22 What are the different methods of contraception? 3X9=27

### Five mark Questions

23 (A) Write the reaction when

(i) Ethanol is heated with conc.  $\text{H}_2\text{SO}_4$ .

(ii) Acetic acid is reacted with sodium carbonate.

(iii) Methanol burns in presence of air

(B) Why does carbon form compounds mainly by covalent bonding? 3+2

OR

(A) Write the structural formula of **2-methylbutane, 2, 2-dimethyl propane, Butanone**

(B) Explain the mechanism of the cleaning action of soaps. 3+2

24 (A) Describe the various methods of asexual reproduction

(B) Why does menstruation occur? 3+2

OR

(A) What are the advantages of artificial vegetative propagation?

(B) Draw the diagram of flower and explain the parts. 3+2

25 What is hypermetropia? How can it be corrected? How is it different from presbyopia? 1+2+2

OR

Draw label diagram of an eye, write the causes of myopia and show how it can be prevented with ray diagram? 1+2+2