

Class : 10Register
Number**SECOND REVISION EXAMINATION, FEBRUARY - 2024**

Time Allowed : 3.00 Hours]

SCIENCE

[Max. Marks : 75

PART - I

Choose the correct answer.

12x1=12

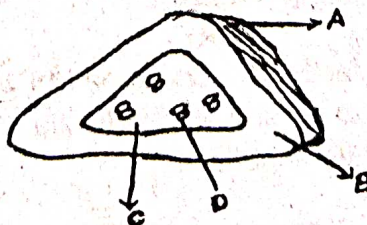
- Power of a Lens is -4D then its Focal Length is
a) 4m b) -40m c) -0.25m d) -2.5m
- Which one of the following is a Polyatomic Molecule.
a) Glucose b) Oxygen c) Sodium d) Carbon Monoxide
- aprons are used to protect us from Gamma Radiations.
a) Lead oxide b) Iron c) Lead d) Aluminium
- $C_2H_5OH + 3O_2 \rightarrow 2CO_2 + 3H_2O$ is
a) Reduction of Ethanol b) Combustion of Ethanol
c) Oxidation of Ethanoic acid d) Oxidation of Ethanol
- One horse power is equal to
a) 764 Watt b) 746 Watt c) 674 Watt d) 467 Watt
- Gypsum is
a) $CaSO_4$ b) $CaSO_4 \cdot \frac{1}{2}H_2O$ c) $2CaSO_4$ d) $CaSO_4 \cdot 2H_2O$
- A patient with blood group 'O' was injured in an accident and has blood loss In this condition the doctor should effectively use ----- blood group for transfusion.
a) 'O' Group b) 'AB' Group c) 'A' or 'B' Group d) All blood group
- Node of Ranvier is found in
a) Muscles b) Axons c) Dendrites d) Cyton
- Himgiri developed by Hybridization and Selection for disease resistance against rust pathogens is a variety of
a) Chilli b) Maize c) Sugarcane d) Wheat
- A Cheap conventional Commercial and Inexhaustible source of energy is
a) Hydropower b) Solar Energy c) Wind Energy d) Thermal Energy
- Excessive Consumption of Alcohol leads to
a) Loss of memory b) Cirrhosis of Liver
c) State of Hallucination d) Suppression of brain function
- is the ATP factory of the cells.
a) Mitochondria b) Cytoplasm c) Lysosome d) Chloroplast

PART - II

Answer any seven questions. Q.No. 22 is compulsory.

7x2=14

- Define Inertia. Give its classification.
- Mention two cases in which there is no Doppler Effect.
- State Charle's Law.
- Aquatic animals live more in Colder regions. Why?
- What are the agents of Soil Erosion?
- Define Triple Fusion.
- Identify the parts A,B,C and D in the given diagram.



CH / 10 / Sci / 1

20. What are Psychotropic Drugs?
 21. What is Reflex arc?
 22. ${}_{92}\text{U}^{238}$ experiences α - decay. Find the number of Neutrons in the daughter element.

PART – III

Answer any seven questions. Q.No: 32 is compulsory.

7x4 = 28

23. a) Draw a ray diagram to show the image formed by a Convex Lens. When the object is placed between F and 2F.
 b) If you keep ice at 0°C and water 0°C at in either of your hands, in which hands you will feel more chillness. Why?
24. a) Define Atomicity.
 b) Along with Cryolite and Alumina, another substance is added to the Electrolyte. Name the substance and Give one reason for Addition.
25. Give the applications of Universal Law of Gravitation.
26. a) What is Stellar Energy?
 b) Why are the Ceilings of concert halls curved?
27. a) Define Volume Percentage.
 b) Match the following
- | | | |
|------------------------|---|--------------------|
| 1. Functional Group OH | - | Benzene |
| 2. Heterocyclic | - | Potassium Stearate |
| 3. Unsaturated | - | Alcohol |
| 4. Soap | - | Furan |
| 5. Carboxylic | - | Ethene |
28. What are the advantages of Physical Exercises in our daily life?
 29. Differentiate Arteries and Veins.
 30. Natural selection is a driving force for evolution. How?
 31. a) Enumerate the functions of Blood. (any two)
 b) What is Respiratory Quotient.
 32. a) Calculate the P^H of 1.0 x 10⁻⁵ M KOH.
 b) Draw the structure of the following compounds.
 i) Cyclo Butane ii) Benzene

PART-IV

Answer all the questions in detail.

3x7=21

33. a) i) Differentiate Nuclear Fission and Nuclear Fusion. (any three)
 ii) While catching a cricket ball, the fielder lowers his hands backwards. Why?
 iii) What is Echo?
 (OR)
 b) i) Define Electric Potential and Potential Difference.
 ii) An alloy of Nickel and Chromium is used as Heating element. Why?
 iii) What is the audible range of Frequency?
34. a) How is Ethanol extracted from Sugarcane Juice?
 (OR)
 b) i) Differentiate Reversible and Irreversible Reactions. (any two)
 ii) Explain the factors influencing the rate of the reactions.
35. a) i) With a neat diagram, Describe the parts of a Typical Angiospermic Ovule.
 ii) What are the advantages of using 'Biogas'.
 (OR)
 b) i) Changes in Life Style is risk factor for occurrence of Cardio Vascular diseases can it be modified. If can you suggest measures for Prevention.
 ii) Define : Ethanobotany. Write its Importance.

CH / 10 / Sci / 2