# for Self Test

### In Gyansrota APP

Few Sample MCQs

**Download the App** 





#### In class 12, Gyansrota is covering the following 15 chapters of Physics

Electric Charges and Fields Electrostatic Potential and Capacitance **Current Electricity** Moving Charges and Magnetism Magnetism and Matter Electromagnetic Induction Alternating Current Electromagnetic Waves **Ray Optics and Optical Instruments** Wave Optics Dual Nature of radiation and matter **Atoms** Nuclei Semiconductor Electronics: Materials, Devices and Simple Circuits

**Communication Systems** 

Download the Gyansrota App from the Google Play Store and purchase your desired course. In class 11 apart from video classes on all the topics given above, you will get an MCQ app for self-testing. Here are some sample questions from the bank of questions that will be available in the full version of the app.

Question 1. When a glass rod is rubbed with silk, it (a) gains electrons from silk.

(b) gives electrons to silk.

(c) gains protons from silk.

(d) gives protons to silk. Answer: (b)

Question 2. In general, metallic ropes are suspended on the carriers taking inflammable materials. The reason is

(a) to control the speed of the carrier.

(b) to keep the centre of gravity of the carrier nearer to the earth.

(c) to keep the body of the carrier in contact with the earth.

(d) none of these. Answer: (c)

Question 3. Two charges q1 and q2 are placed in a vacuum at a distance d and the force acting between them is F. If a medium of dielectric constant 4 is introduced around them, the force now will be \_\_\_\_\_ .

a) 4F

b) 2F

c) F/2

d) F/4 Answer: (d) Question 4. When 10<sup>14</sup> electrons are removed from a neutral metal sphere, the charge on the sphere becomes \_\_\_\_\_.

a) 4µC

b) 9µC

c) 10µC

d) 16µC

Answer: (b)





#### In class 12, Gyansrota is covering the following 16 chapters of Chemistry

The Solid State Solutions Electrochemistry **Chemical Kinetics** Surface Chemistry General Principles and process of isolation of elements The p-block Elements The d & f block Elements **Coordination Compounds** Haloalkanes and Haloarenes Alcohols, Phenols, and Ethers Aldehydes, Ketones and Carboxylic Acids Amines **Biomolecules Polymers** 

Download the Gyansrota App from the Google Play Store and purchase your desired course. In class 11 apart from video classes on all the topics given above, you will

Chemistry in everyday life

get an MCQ app for self-testing. Here are some sample questions from the bank of questions that will be available in the full version of the app.

Question 1. Which of the following properties does not define a crystalline solid?

(a) When cut into pieces, have irregular surface

(b) Isotopic in nature

(c) Anisotropic in nature

(d) Both (a) and (b) Answer: (d)

Question 2. Solid CO\_2 is an example of

Covalent solid

Metallic solid

Molecular solid

Ionic solid Answer: (C)

Question 3. Which of the following statement is true? (a) Molecular crystal are very hard and incompressible

(b) Ionic crystals have very low volatility.

(c) Metallic bond is directional and rigid.

(d) Boron nitride has an ionic crystal structure. Answer: (b) Question 4. The number of unit cells in 58.5 g of NaCl is nearly (a)  $6 \times 10^{20}$ (b)  $3 \times 10^{22}$ (c)  $1.5 \times 10^{23}$ (d)  $0.5 \times 10^{24}$ Answer: (C)



## Mathematics Class XII

# In class 12, Gyansrota is covering the following 13 chapters of Mathematics

**Relations and Functions** Inverse Trigonometric Functions Matrices **Determinants** Continuity and Differentiability Application of Derivatives Integrals Application of Integrals **Differential Equations** Vector Algebra Three-Dimensional Geometry Linear Programming Probability

Download the Gyansrota App from the Google Play Store and purchase your desired course. In class 11 apart from video classes on all the topics given above, you will get an MCQ app for self-testing. Here are some sample questions from the bank of questions that will be available in the full version of the app.

Question 1. Given set A = {a, b, c}. An identity relation in set A is (a) R = {(a, b), (a, c)} (b) R = {(a, a), (b, b), (c, c)} (c) R = {(a, a), (b, b), (c, c), (a, c)} (d) R= {(c, a), (b, a), (a, a)} Answer: (b)

Question 2. The function  $f : A \rightarrow B$  defined by  $f(x) = 4x + 7, x \in R$  is (a) one-one (b) Even (c) Odd (d) Many-one Answer: (a)

```
Question 3. If f : R \to R, g : R \to R and h : R \to R is such that f(x) = x2,

g(x) = \tan x and h(x) = \log x, then the value of [ho(gof)](x), if x = \sqrt{\pi/2}

will be

(a) 0

(b) 1

(c) -1

(d) \pi

Answer: (a)
```

Question 4. The number of binary operations that can be defined on a set of 2 elements is

(a) 8
(b) 4
(c) 16
(d) 64

Answer: (C)





#### In class 12, Gyansrota is covering the following 16 chapters of Biology

Reproduction in Organisms

Sexual Reproduction in Flowering Plants

Human Reproduction

Reproductive Health

Principles of Inheritance and Variation

Molecular Basis of Inheritance

Evolution

Human Health and Diseases

Strategies for Enhancement in Food Production

Microbes in Human Welfare

**Biotechnology Principles and Processes** 

Biotechnology and Its Application

**Organisms and Populations** 

Ecosystem

**Biodiversity and Conservation** 

**Environmental Issues** 

Download the Gyansrota App from the Google Play Store and purchase your desired course. In class 11 apart from video classes on all the topics given above, you will get an MCQ app for self-testing. Here are some sample questions from the bank of questions that will be available in the full version of the app.

Question 1. The terms homothallic and monoecious are used to denote

- (a) Unisexual condition
- (b) Bisexual condition
- (c) Staminate flowers
- (d) Pistillate flower

Answer: (b)

Question 2. In animals, juvenile phase is followed by(a) Reproductive phase(b) Senescent phase(c) Old age(d) Vegetative phase

Answer: (a)

Question 3. External fertilisation occurs in majority of (a) Fungi (b) Liverworts (c) Algae (d) Mosses

Answer: (C)

Question 4. Vegetative propagation in Pistia occurs by
(a) Sucker
(b) Offset
(c) Runner
(d) Rhizome

Answer: (b)