

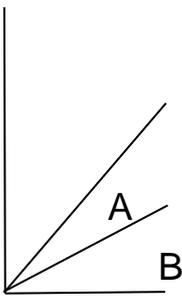
Practice Questions

PHYSICS

Q.1 At the start of the journey, odometer of a car read 2641 km and on reaching the destination it read 2666 km. What is the distance travelled by the car?

Q.2 A car covers 20 km in first hour and 30 km in the next hour. Identify the motion of the car.

Q.3 Study the graph and answer the questions:



- Which is moving faster A or B? Justify.
- Which type of motion is shown by A and B?

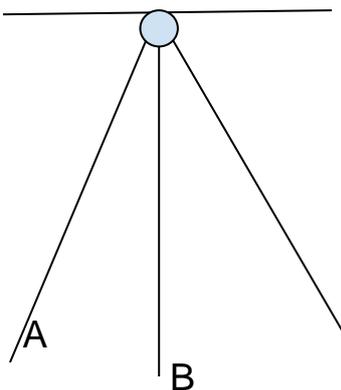
Q.4 Ankit travels to his school by bus which moves at a speed of 15 km/hr. He reaches school in 20 minutes. Calculate the distance covered by Ankit in Km.

Q.5 Nishant was not able to capture an image formed by lens 'A' on a screen.

- Identify Lens 'A'.
- Draw its diagram.
- Write the nature and size of the image formed by it.

Q.6 A truck is moving at a speed of 54 km/hr. What is its speed in m/s?

Q.7 Label positions A and B of an oscillating simple pendulum shown below.



Q.8 Arun purchased a mirror 'X' for his bicycle. Identify mirror 'X'. Justify his choice.

Q.9 A bullet train moves with a speed of 540 km/hr. Convert its speed in S.I units.

Q.10 Radha is observing her image in a plane mirror. The distance between the mirror and her image is 3m.

- a) What is the distance between Radha and her image?
- b) If she moves 1m forward, what will be distance between mirror and her image?
- c) If she moves 2 m backward from the mirror, what will be the distance between Radha and her image now?

Q.11 Name the two types of Lenses. What kind of image is formed by each? Draw them too.

CHEMISTRY

Q.1 Write the feed of the sheep during summer and winter season.

Q.2 'X' is the process of taking out threads from the cocoons for use as silk. Identify 'X'.

Q.3 The process of shearing does not hurt a sheep. Justify the statement.

Q.4 Complete the analogy-

Longer fibers: _____ :: Shorter fibers: woollen cloth.

Q.5 Identify the breed of the sheep-

- a) Its wool is used for making hosiery items.
- b) It gives a coarse wool
- c) It is found in Haryana and its wool is used for making carpets.
- d) This sheep from Jammu and Kashmir provides wool for shawls.

Q.6 Name any four varieties of silk.

Q.7 What are silk fibers made of?

Q.8 Which is the most common silk moth found in India? Write any two characteristics of silk obtained from it.

Q.9 a) Draw life cycle of a silk moth.

b) In which stage cocoon is formed?

c) In which stage silk moth feeds on leaves? Write any three characteristics of this stage.

Q.10 Define Sericulture. Why do workers of sericulture industry often develop asthma, chronic bronchitis and difficulty in breathing?

Q.11 Define shearing. Why shearing of sheep is done during summer?

Q.12 'N' is the process by which groundwater gets recharged. What is 'N'?

Q.13 Why an antacid tablet is taken when we suffer from acidity.

Q.14 An acid and a base react to form a salt and water, with the evolution of heat.

a) Name the reaction.

b) What is the role of heat produced?

c) Complete the equation:

Sodium chloride + hydrochloric acid \rightarrow _____ + water + heat

Q.15 What change will occur if you add natural indicator obtained from china rose petals to lemon juice?

Q.16 What should be applied to soothe the effect of ant's sting?

Q.17 Write two points to tell that agricultural practices are responsible for depletion of water table.

BIOLOGY

Q.1 Answer the following

a) 'X' is the movement of animals in groups from one part of the world to another according to season for food and reproduction. Identify 'X'.

b) Amoeba is a unicellular micro-organism found in pond water which has finger-like projections on its surface. Write two advantages of these projections for amoeba.

c) Pigment 'M' imparts green colour to the leaves. Identify 'M' and state its role in the process of food manufacture in plants.

d) Grazing animals are known as ruminants. What is the scientific term used for the partially digested food which is brought back from stomach to mouth of a ruminant for re-chewing? Also name the process involved.

Q.2. Answer the following :

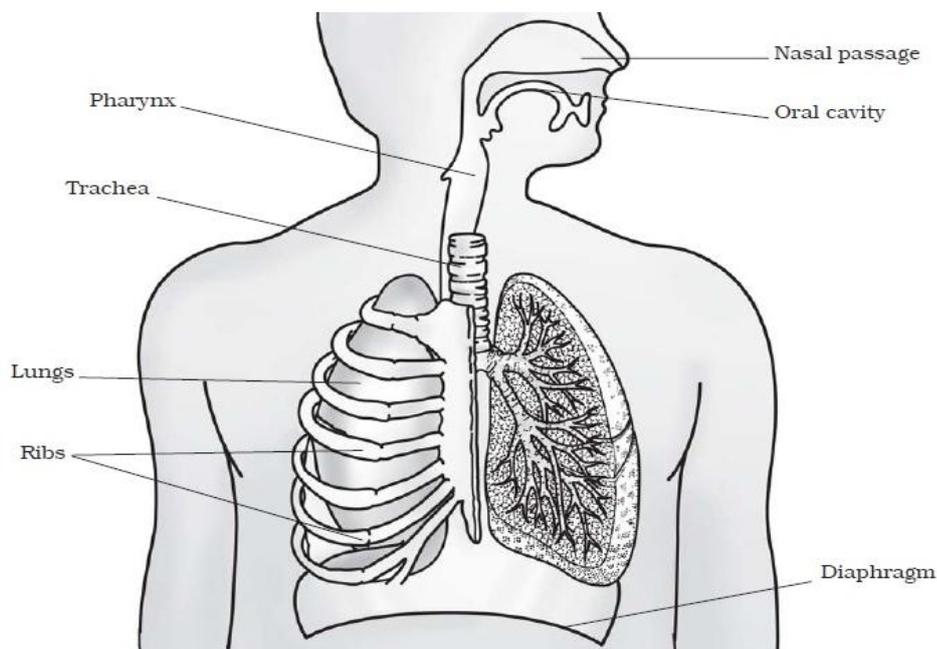
a) Define anaerobic respiration. Write a word equation for this process. Name an organism which always respire anaerobically.

b) Given below are the adaptations of some animals found in polar and tropical regions. Identify the organism and write the significance of their adaptation.

Adaptation	Organism	Significance of adaptation
(i) a long large beak		
(ii) has large fan like ears		
(iii) wide and large paws		
(iv) huddle together in a group		

Q.3 Study the diagram and answer the following questions:

- What does the diagram represent?
- What is the function of diaphragm?
- What are the steps involved in this process?



Q.4 Name the types of teeth you have. State function and number of each type.

Q.5 Name and define heterotrophic mode of nutrition exhibited by mushroom.

Q.6 We suffer from muscle cramps after heavy exercise. Why?

Q.7 Stomach is a thick-walled bag and the widest part of the alimentary canal. The inner lining of stomach produces and releases many secretions. Name any two secretions and state their function.

Q.8 Green plants use a gas and a liquid to make food 'F' .

- a) Identify the process.
- b) Write the word equation for the same.
- c) Name and draw the opening which allows exchange of gases.
- d) How will you test the presence of 'F' in plants ?

Q.9 Rita suffered from a condition in which she passed watery stools frequently.

- a) What is this condition called?
- b) State any two conditions which lead to the above condition.
- c) Can this condition become fatal?
- d) Suggest a remedy for this condition.

Q.10 Why do we generally find insectivorous plants growing in the soil lacking nitrogen?

Q.11 Name any two glands associated with human digestive system.

Q.12 Name three plant nutrients commonly present in fertilizers and manures.

Q.13 Name the process in which absorbed molecules are transported via blood to various organs to build complex substances like proteins.

Q.14 Name the department of the government that prepares weather report. State any two elements of the weather.

Q.15 Name the association :

- a) Both the organisms are benefitted.
- b) Only one of the organism is benefitted.
- c) Give one example of each.