

Answers to this Paper must be written on the paper provided separately.

You will not be allowed to write during first 15 minutes.

This time is to be spent in reading the question paper.

The time given at the head of this Paper is the time allowed for writing the answers.

The intended marks for questions or parts of questions are given in brackets [].

(Attempt **all** questions)

Question 1

Choose the correct answer to the questions from the given options.

[1]

(Do not copy the question. Write the correct answer only.)

- (i) This is an unusual hypersensitivity of the body tissue to certain substances:
(a) Allergy (b) Diabetes (c) Fever (d) Arthritis
- (ii) Typhoid spreads through:
(a) Air (b) Insect bite (c) Contaminated food (d) Polluted water
- (iii) Which of the following is not a disease caused by virus:
(a) Conjunctivitis (b) Measles (c) Tuberculosis (d) Polio
- (iv) Air, water and soil are the examples of:
(a) Biotic components (b) Abiotic components
(c) Cultural components (d) None of them

Question 2

- (i) **Write true or false. Correct and rewrite the false statement.** [1]
 - (a) Oxygenated blood is found in the right side of the heart.
 - (b) Molars are meant for tearing the food.
 - (c) The volume of the chest cavity decreases during inhalation.
 - (d) Pine trees remain green throughout the year.
- (ii) **Name the following:** [1]
 - (a) An instrument used to measure blood pressure.
 - (b) The end product of protein digestion.
 - (c) A viral disease spread by the bite of a mad dog.
 - (d) Two common eye infections.
- (iii) **Define the following:** [4]
 - (a) Blood pressure
 - (b) Adaptation
 - (c) Assimilation
 - (d) Respiration

Question 3

- (i) **Choose the odd one out from the following terms and name the category to** [2]

which the others belong:

- (a) Typhoid, Chicken pox, Polio, Measles
- (b) Neem, pine, Fir, Cedar
- (c) Erythrocytes, Leucoplast, Leucocytes, Thrombocytes
- (d) Heart, kidney, Blood vessels, Blood

(ii) Fill in the blanks:

[1]

- (a) The insects and animals that carry disease causing germs are called -----.
- (b) The stretching and relaxing of arteries with each heartbeat felt as throbbing is called -----.
- (c) The trees growing in the mountains are ----- with the sloping branches.
- (d) Forelimbs in birds are modified into -----.

(iii) Give reason:

[3]

- (a) A child who was suffering from conjunctivitis was sent home by her teacher.
- (b) Mountain goats have white thick fur.
- (c) AB blood group is a universal recipient .
- (d) All teeth in our mouth are not alike.
- (e) Public hygiene is equally important as personal hygiene.
- (f) We should cover our mouth and nose while coughing and sneezing.

Question 4

Distinguish between the following pairs of terms on the basis of what is indicated in the brackets.

(i) (a) Metabolic diseases and Mendel diseases (one example of each)

[2]

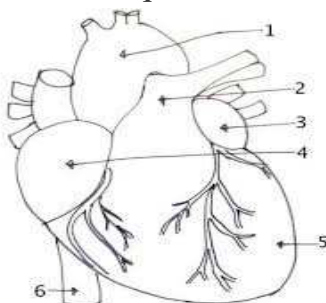
(b) Jaundice and Tuberculosis (affected organ)

(c) Elephantiasis and Malaria (mode of transmission)

(d) Pulmonary artery and Pulmonary vein (kind of blood they carry)

(ii) Given below diagram shows internal structure of human heart. Study it and answer the questions that follow:

[3]



(a) Label the parts marked 1 to 6.

(b) Name the main artery which takes blood from heart to different parts of our body.

(c) Which type of blood is carried by the blood vessel marked 6?

(d) Which chamber of the heart receives oxygenated blood from the lungs?

(iii) During a school trip, Meera observed different types of cacti in the dry garden.

[2]

She notices that they have thick, fleshy stems and spines instead of leaves.

- (a) Why do cacti have spines instead of leaves?
- (b) How does a cactus store water?
- (c) In a cactus plant, photosynthesis occurs in -----.
- (d) How do deep roots help a cactus to survive?

Question 5

- (i) Ravi lives near an unused stagnant pond. Last month he had symptoms like high fever, chills, and sweating. His doctor diagnosed with malaria and prescribed medication. [2]
 - (a) How do you think Ravi got infected with malaria?
 - (b) What is the primary vector or agent that spreads malaria?
 - (c) How can we prevent malaria?
 - (d) Why is it important to complete the full course of prescribed medicine?
- (ii) Rahul visits Rajasthan and sees camels walking easily on the hot sand. He notices that camels have long eyelashes, thick lips, and can drink a lot of water at once. [2]
 - (a) How do a camel's large feet help it in the desert?
 - (b) Why does a camel have a hump?
 - (c) How does its long eyelashes help in the desert?
 - (d) What would happen if a camel were taken to a snowy region?
- (iii) (a) You can see some blood vessels on the surface of the hands, especially in older people. Are those veins or arteries? How can you confirm your answer? [3]
 - (b) What is the function of epiglottis?
 - (c) Identify the disease from their symptom:
 - 1. Painful swelling of parotid gland 2. Highly swollen leg
- (iv) Observe the diagram given below and answer the questions that follow: [3]



- (a) Which disease is the child suffering from?
- (b) What is the cause of this disease?
- (c) Write one symptom of this disease.

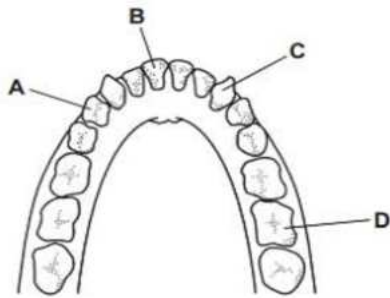
Question 6

- (i) (a) Why are deficiency diseases called non communicable diseases? [3]
 - (b) What prevents blood from flowing in the wrong direction within the heart?

(c) What will happen if a person's diet lack the following :

1. Vitamin B3
2. Calcium

- (ii) The figure given below is part of human digestive system. Study the same and answer the questions that follow: [4]



- (a) Identify the figure.
(b) Label the parts A and B.
(c) Mention the number of A and B in an adult person.
(d) Write the name and function of C and D.
(e) Name the hardest part of A.
- (iii) Give the functions of the following: [3]
(a) Pleura (b) Thrombocytes (c) Bile
