

MARTHOMA RESIDENTIAL SCHOOL, THIRUVALLA
ANNUAL EXAMINATION 2018-2019
BIOLOGY

STD: VIII

Time: 2Hrs
Marks: 80

SECTION I (40 marks)

Question I

a. Name the following. (5)

1. The group of organism which convert inorganic matter to organic matter.
2. The uptake of mineral ions against the concentration gradient.
3. The water plant in which pollination takes place with the help of insects.
4. The cell mass produced during micro propagation.
5. The form in which food is transported through phloem.

b. Define the following. (5)

1. Ecosystem.
2. Organic farming
3. Vaccination
4. Health.
5. Osmosis

c. Differentiate the following on the basis of what is given in brackets. (5)

1. Pulmonary artery and Pulmonary vein(Type of blood flowing)
2. Bicuspid valve and Tricuspid valve.(Location)
3. Wind pollinated flower and insect pollinated flower.(Any one character)
4. Symbiosis and Parasitism(Definition)
5. Spinal nerve and cranial nerve(Numbers)

d. Given in the box below are a set of 14 terms. Of these 12 can be paired into 6 matching pair one has been done for you as an example (5)

Example: Bryophyllum- leaf

Identify the remaining five matching pairs.

Bryophyllum, buffalo, soil, insects, bacteria, abiotic factor, cheese, mehsana, TAB, desi, pyramid, Typhoid, leaf, marigold.

e. Write the function of the following. (5)

1. Tubular medullary sheath.
2. Sepal
3. Synapse
4. Lymph
5. Uterus.

f. Given below are sets of five terms each. Rewrite the terms in correct order so as to be in logical sequence. Begin the sequence with underlined word.

1. Dispersal of seed, zygote, fertilisation, pollination, seed.
2. Lungs, Pulmonary artery, Left ventricle, Right auricle, Vena cavae.
3. Sensory nerve, motor nerve, spinal cord, receptor, effector.
4. Gestation, specialisation, implantation, differentiation, fertilisation.
5. Frog, green plant, snake, eagle, grass hopper.

g. Give the exact location of the following.

1. Ovule
2. Human ovary.
3. Heart
4. Thyroid gland
5. SA Node.

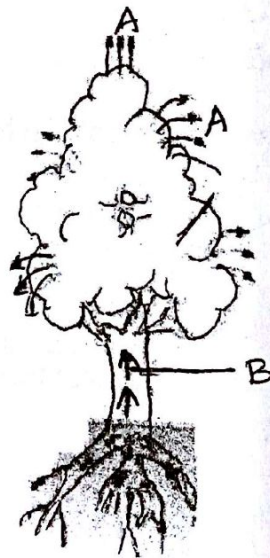
h. Choose the odd one from the following terms given and name the category to which the others belong.

1. AIDS, Malaria, Dengue, Chikungunya.
2. Rubber, Tea, Spices, Cereals.
3. Fragmentation, cutting, Grafting, layering.
4. Coughing, Typing on the key board, Sneezing, Vomiting
5. Water, peacock, warmth, air.

SECTION 2 (40 marks)

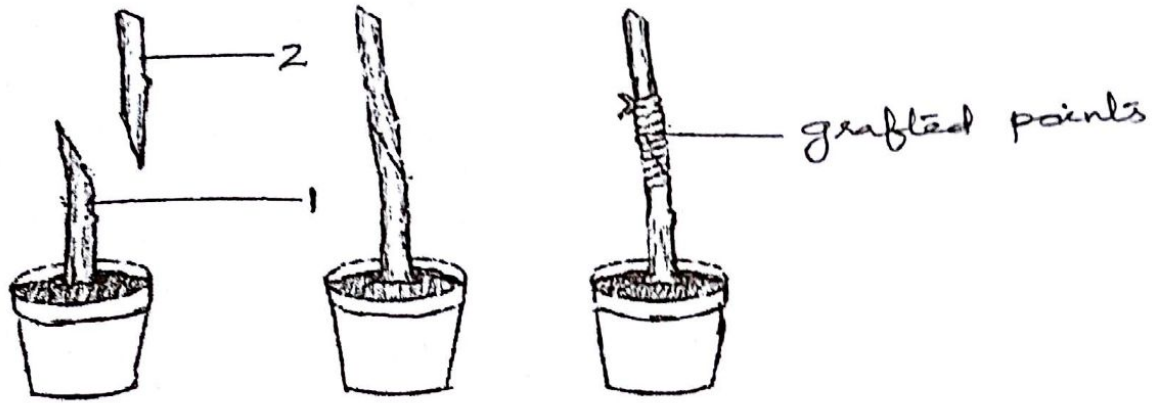
Question 2

a. An outline sketch of a tree is shown in the diagram below. Study the same and answer the questions that follow.



1. Name the phenomenon that is labelled A in diagram.
2. Define the phenomenon occurring in A.
3. What is the importance of this phenomenon in plants?
4. Mention any three external factors that will increase the rate of the phenomenon.
5. What does the direction of arrow B indicate?

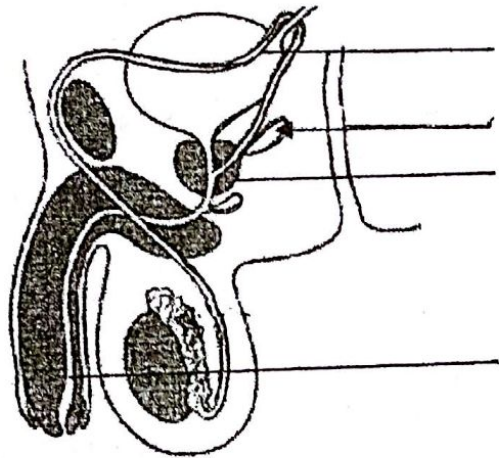
b. Given below is a diagram of grafting in plants. Study the same and answer the following. (5)



1. Label the parts 1-2.
2. Name any two examples of plants in which this kind of artificial vegetative propagation is possible.
3. Give any two reasons why the grafted points are covered with wax and bound together with a tape.
4. Name any other two types of artificial vegetative reproduction.
5. Name any two types of natural vegetative reproduction.

Question 3

a. Given below is the diagram of human male reproductive system. Study the same and answer the questions that follow. (5)



1. Label the parts 1-4.
2. Write one function each of the labelled parts.
3. Name the part where sperms are produced in human beings.
4. Name the hormone produced by pituitary gland which stimulates sperm production.

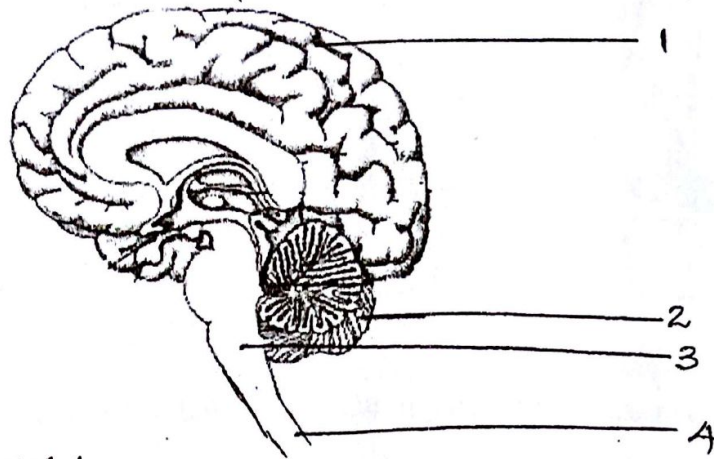
b. Draw well labelled diagrams of the following

1. Yeast cell.
2. Neuron.
3. Root hair
4. Pyramid of numbers consisting of Grass → Deer → Tiger.
5. Human sperm

(PTO)

Question 4

a. Given below is diagram of human brain. Study the diagram and answer the questions that follow.



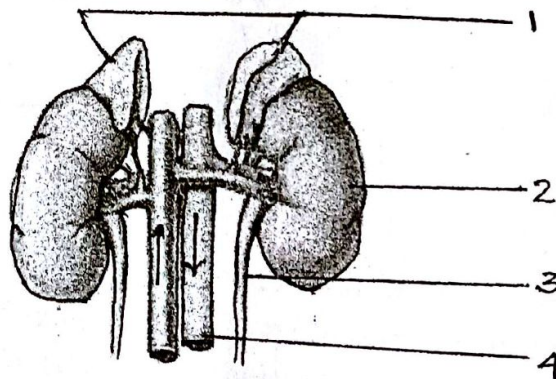
1. Label the parts 1-4.
2. Write any one function of the labelled parts.
3. How do part 1 and 4 differ in their arrangement of axon and cyton.

b Write short note on the following.

1. Cardiac arrest
2. White revolution
3. Risks to an ecosystem
4. Micropropagation
5. Double circulation

Question 5

a. Given below is diagram of certain parts of human body. Study the same and answer the following



1. Label the parts 1-4
2. Name the hormones produced by the gland shown in the diagram.
3. Write one function each of the hormones mentioned.

b. Give reason for the following.

1. All organisms owe its existence to plants.
2. An alcoholic person walks clumsily.
3. A large number of sperms are present in semen.
4. Insect pollinated flowers are large and showy.
5. Adding fertilisers close to root kill the plant.