

Time: 02 Hrs

Instructions:

1. Write the Roll no. on your question paper.
2. Candidate should ensure that the question paper supplied to them is complete in all respects. Complaints in this regards, if any, should be made to the invigilatory staff on the duty in the exam centre within 15 minutes of Commencement of the exam. No complaint shall be entertained thereafter.

(Section: A)

Q. A Multiple-Choice Questions:

(5)

1. The type of coiling in DNA is

- | | |
|-------------|-----------------|
| a. Zigzag | b. Left-handed |
| c. Opposite | d. Right-handed |

2. Which is the leading cause of blindness in children worldwide?

- | | |
|---------------------|-------------------------|
| a. Glaucoma | b. Cataracts |
| c. Colour blindness | d. Vitamin A deficiency |

3. The specific gravity of lipid is.....

- | | |
|--------|--------|
| a. 1.5 | b. 1.0 |
| c. 0.8 | d. 0.2 |

4. TMP stands for:

- | | |
|-------------------------------|----------------------------|
| a. Thymidine-5` monophosphate | b. Tocoferol monophosphate |
| c. Thyroxine monophosphate | d. Thiamine monophosphate |

5. Which of the following vitamin helps in blood clotting?

- | | |
|--------------|--------------|
| a. Vitamin A | b. vitamin C |
| c. Vitamin D | d. vitamin K |

Q. B Very short Answer type question:

[5]

1. Give any two function of cholesterol.
2. Write the name of RNA base.
3. Enlist any two factors affecting enzymes activity.
4. Give the source of vitamin E.
5. Mention the main sources of cobalt.

(Section: B)

Q. C Short Answer Type Questions: (Attempt any five)

(5 × 3 = 15)

1. Draw the RDA chart of minerals.
2. What are coenzymes? Give any two example?
3. What do you mean by allosteric inhibition?
4. Explain the structure and functions of RNA.
5. Give the qualitative tests of lipids.
6. Elaborate the lock and key model with suitable diagram.

(Section: C)

Q. D Long Answer Type Questions: (Attempt any three)

(5 × 3 = 15)

1. What are lipids? Classify them and give their biological significance.
2. Briefly explain the role, source and deficiency disease of each vitamins.
3. Explain the cause and symptoms of the diseases related to deficiency and excess of minerals.
4. Explain the biological roles of DNA and RNA.