

C 62641

(Pages : 2)

Name.....

Reg. No.....

SECOND SEMESTER (CUCBCSS—UG) DEGREE EXAMINATION, MAY 2019

B.Sc. Biochemistry

BCH 2C 02—BIOCHEMISTRY—II

Time : Three Hours

Maximum : 64 Marks

Section A

*Answer **all** the questions.*

Each question carries 1 mark.

1. Write an example for heteropolysaccharide ?
2. Glucose on oxidation with bromine water forms _____ ?
3. Name one amino acid gives yellow colour with ninhydrin ?
4. Iodine number of the fat/oil indicates _____ ?
5. A glycosaminoglycan which does not contain uronic acid derivative as one of the component is _____ ?
6. What is a non-reducing sugar ?
7. Proteins absorb UV light at 280 nm and show a characteristic peak at this wavelength. Which amino acid residue in the protein is responsible for this absorption ?
8. Name the base is not present in RNA ?
9. What is chitin ?
10. Amino acid which act as the precursor of epinephrine synthesis is _____.

(10 × 1 = 10 marks)

Section B

*Answer any **seven** questions.*

Each question carries 2 marks.

11. What is protein denaturation ?
12. What are anomers ? Give one example ?
13. What is saponification number ? Give its significance ?
14. Give two general chemical reactions of amino acids ?

Turn over

15. Give the structure of triacyl glycerol ?
16. Give the structure of methyl β -D-glucopyranose ?
17. What are sphingolipids ? Give one example ?
18. What is a zwitter ion ? Give one example.
19. Draw the structure of cysteine ?
20. What are essential fatty acids ?

(7 $\times$ 2 = 14 marks)

Section C

*Answer any **four** questions.
Each question carries 5 marks.*

21. Explain proteolysis with an example ?
22. Give the biological significance of fat ?
23. Write a short note on secondary structure of tRNA ?
24. Describe any *one* method for protein sequencing ?
25. Draw the structure of ergosterol and explain its functions ?
26. What are osazones ? How is it formed ?

(4 $\times$ 5 = 20 marks)

Section D

*Answer any **two** questions.
Each question carries 10 marks.*

27. Give an account of the structure and important properties of glycogen and cellulose ?
28. Describe the features of Watson and Crick model of DNA ?
29. Write an essay on the classification of amino acids ?
30. Give an account of the classification and biological functions of lipids ?

(2 $\times$ 10 = 20 marks)