



K15P 0030

Reg. No. :

Name :

Third Semester M.A./M.Sc./M.Com. Degree (Reg./Supple./Improve.)

Examination, November 2015

BOTANY

(2014 Admn.)

BOT 3C 11 : Biochemistry and Biophysics

Time : 3 Hours

Max. Marks : 60

Instruction : Draw diagrams *wherever necessary*.

SECTION – A

1. a) Write an account on the oxidation of fatty acids.

OR

b) Explain humoral and cell mediated immune response.

2. a) Write an account on the principle, types and applications of electrophoresis.

OR

b) Write an account on the biosynthesis and significance of plant terpenes.

(2×8=16)

SECTION – B

Answer **any two**.

3. a) What is a monosaccharide ?

b) Mention the types of monosaccharides.

c) Write an account on gluconeogenesis.

(1+2+3)

4. a) Define radioactivity.

b) Explain dosimetry.

c) Write a brief account of autoradiography.

(1+2+3)

5. a) What is amino acid ?

b) How do you classify amino acids ?

c) Explain reductive amination.

(1+2+3)

(2×6=12)

P.T.O.



SECTION - C

Answer **any six**.

6. Explain glycoprotein and their importance.
7. Write a brief note on structure and function of cellulose.
8. Write a note on Vitamin B.
9. Derive Michele's Menton equation.
10. Write a note on Hybridoma technology.
11. Mention the principle and applications of paper chromatography.
12. Explain the significance of ESR spectroscopy in biological research.
13. Add a 0. note on enzyme inhibition. (6×3=18)

SECTION - D

Answer **any seven**.

14. Cholesterol.
15. Protein conformation.
16. Isozymes.
17. Antigens.
18. Vaccines.
19. HPTLC.
20. Freeze drying.
21. PET.
22. Plant phenolics.
23. Peptidoglycan. (7×2=14)

(1+2+3)

(2×8=16)

F.T.O.