



23127917

QP CODE: 23127917

Reg No :

Name :

**B.Sc DEGREE (CBCS) REGULAR / IMPROVEMENT / REAPPEARANCE
EXAMINATIONS, OCTOBER 2023**

Third Semester

**COMPLEMENTARY COURSE - CH3CMT04 - CHEMISTRY - INORGANIC AND
ORGANIC CHEMISTRY**

Common to B.Sc Botany Model I, B.Sc Botany Model II Environmental Monitoring And Management, B.Sc Botany Model II Food Microbiology, B.Sc Botany Model II Horticulture and Nursery Management, B.Sc Botany Model II Plant Biotechnology, B.Sc Family & Community Science Model I, B.Sc Food Science & Quality Control Model III, B.Sc Food Technology & Quality Assurance, B.Sc Zoology Model I, B.Sc Zoology Model II Aquaculture, B.Sc Zoology Model II Food Microbiology & B.Sc Zoology Model II Medical Microbiology

2017 Admission Onwards

9E82AEC5

Time: 3 Hours

Max. Marks : 60

Part A

*Answer any **ten** questions.*

*Each question carries **1** mark.*

1. Give the expression for calculating binding energy of nucleus.
2. Give an example of the use of radioactivity in medical diagnosis.
3. Specify the role played by ferredoxin in living systems.
4. Name two zinc containing enzymes.
5. Name any two quinone class fungicides.
6. Explain the toxic effects of DDT.
7. Illustrate the aromatic nature of Pyrrole using Huckel's theory.
8. What are the common ingredients of antacid?
9. Name any two antidepressants.
10. Name two synthetic compounds used as food flavours.
11. List any two antioxidants.





12. Mention the role of parabens in cosmetics.

(10×1=10)

Part B

*Answer any **six** questions.*

*Each question carries **5** marks.*

13. Differentiate between natural and artificial radioactivity.
14. State and explain Soddy's displacement law.
15. Discuss the significance of Photophosphorylation.
16. What do you mean by plant growth hormones? Write the names of various classes of plant growth hormones.
17. What is Chlordane? How is it prepared?
18. Furan is less aromatic than benzene. Explain this by giving a suitable reaction.
19. Describe a method for the synthesis of Purines.
20. Draw the structure of sulphanilamide. What are its main uses?
21. Give a brief account on the composition shampoo.

(6×5=30)

Part C

*Answer any **two** questions.*

*Each question carries **10** marks.*

22. Explain nuclear fission and fusion with suitable example. Discuss briefly on its applications.
23. Describe the biochemical functions of haemoglobin and myoglobin.
24. Discuss the classification of fertilizers. Give example of each type.
25. Explain the structure and chemical properties of Indole.

(2×10=20)

