

C 61282-A

**FOURTH SEMESTER B.Sc. DEGREE EXAMINATION, APRIL 2019
(CUCBCSS-UG)**

Biotechnology

BTY 4C 15---ENVIRONMENTAL BIOTECHNOLOGY

Time: Three Hours

Maximum: 64 Marks

Section A

Answer **all** questions in a word or phrase.
Each question carries 1 marks.

1. Biolac.
2. Biosorption.
3. BTEX.
4. Phytostimulation.
5. DNAPLs.
6. Dehalorespiration.
7. Bioventing
8. Biofiltration.
9. SCP.
10. Gasification.

(10 x 1 = 10 marks)

Section B

Give short answer to any **seven** out of ten questions.
Each question carries 2 marks.

11. Antisense RNA mechanism.
12. Biopol.
13. Bioleaching.

14. Biosensors.
15. Yeast as SCP.
16. Phytoextraction.
17. Methanogenesis.
18. Safety of biofertilizers.
19. PLA.
20. Biodiesel from petro crops.

(7 x 2 = 14 marks)

Section C

Answer in a paragraph to any **four** out of six questions.
Each question carries 5 marks.

21. Explain the bioremediation of soil.
22. Production of Ethanol from biomass.
23. Spirulina as SCP, production and application.
24. Bioplastic from PHB.
25. Bioleaching of Uranium.
26. Viral biopesticides.

(4 x 5 = 20 marks)

Section D

Write essays on **any two** questions.
Each question carries 10 marks.

27. Comment on the significance of genetically modified organisms.
28. Discuss the methods of biopower generation.
29. Discuss *B. Thuringiensis* as a natural pesticide.
30. Explain the production of biogas by micro-organisms.

(2 x 10 = 20 marks)