

Roll No.

Total No. of Pages : 02

Total No. of Questions : 09

B.Tech. (Biotechnology) (Sem.-4)

INDUSTRIAL MICROBIOLOGY

Subject Code : BTBT-401-18

M.Code : 77586

Date of Examination : 02-07-22

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains FIVE questions carrying FIVE marks each and students have to attempt any FOUR questions.
3. SECTION-C contains THREE questions carrying TEN marks each and students have to attempt any TWO questions.

SECTION-A

1. Write briefly :

- a) Define Biopesticides. Give examples.
- b) List names of five industrially important microbes.
- c) What are SCPs?
- d) What is submerged fermentation?
- e) What is Biohydrogen?
- f) What are Bioplastics? Give examples.
- g) Why is Strain improvement practised?
- h) What is Biomass? List commercially important types.
- i) How are Biosensors applied?
- j) Give names of Microbial Enzymes used in Cheese production.

SECTION-B

2. Discuss characteristics of Industrially applied microbes.
3. Write about Screening and isolation strategies of desired microbes.
4. Explain production and applications of biofertilizers.
5. What raw materials are used for Biodiesel production? Discuss criteria for selection of raw materials.
6. Write a note on Production and application of SCPs.

SECTION-C

7. Elaborate on techniques of Strain Improvement, Preservation and Maintenance of microbes.
8. Deliberate on technology of Mushroom cultivation, Uses, economic parameters and Constraints involved.
9. Discuss production, biochemical attributes and applications of lipases, proteases and amylases.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.