

D 41457-A

Name.....

Reg. No.....

FIRST SEMESTER M.Sc. DEGREE EXAMINATION, JUNE 2008

Microbiology (Main)

MBI 2T—GENERAL MICROBIOLOGY

(2005 Admissions)

Time : Three Hours

Maximum : 80 Marks

Answer all questions each in 2 or 3 sentences in section A. Discuss any 5 in section B.

Section A

1. Chemostat.
2. Cardinal Temperatures.
3. Deep freezing.
4. Spore coat.
5. Continuous cell culture.
6. Metachromatic granules.
7. Cold sterilization.
8. Peptidoglycan.
9. Turbidostat.
10. Antisepsis.
11. Incineration.
12. Chemolithotrophs.
13. Enrichment media.
14. Mutagens.
15. Ethylene oxide.
16. Numerical classification.
17. Corn meal agar.
18. Facultative anaerobes.
19. McIntosh Fildes Jar.
20. Streak culture.

(20 x 2 = 40 marks)

Section B (Discuss any five)

1. Membrane transport systems.
2. Classification of Bacteria.
3. Mode of action of any *three* antibiotics.
4. Anaerobic culture methods.
5. Evaluation of Disinfectants.
6. Structure of Bacterial cell wall.
7. Nutritional requirements of Bacteria.

(5 x 8 = 40 marks)

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Name.....

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SECOND SEMESTER M.Sc. DEGREE EXAMINATION, JUNE 2010

Microbiology

MB 2.3 T—INDUSTRIAL MICROBIOLOGY

(2005 Admissions)

Time : Three Hours

Maximum : 80 Marks

Section A

*Write about/answer **all** the questions, each in **two** or **three** sentences.*

1. Air lift **fermenters**.
2. Aeration in **fermenters**.
3. Agitation in **fermenters**.
4. **Antifoam** agents.
5. Solid substrate fermentation.
6. Cell disruption.
7. **Homolactic** fermentation.
8. Rotary vacuum filtration.
9. Control of protein haze of beer.
10. Hops.
11. **Lagering**.
12. GRAS status.
13. pH control in **fermenters**.
14. Single cell proteins.
15. Temperature control in **fermenters**.
16. Adjuncts.
17. **Penicillium chrysogenum**.
18. Baker's yeast.
19. Fungal amylases.
20. Malting.

(20 x 2 = 40 marks)

Section B

*Write note on/discuss any **five** of the following.*

1. Strain improvement by genetic engineering.
2. Wine making.
3. Production of ethanol.
4. Aseptic **fermenters**.
5. Continuous fermentation.
6. **SCP** production.
7. Citric acid production.

(5 x 8 = 40 marks)