

Reg. No. : .....

Name : .....

**Fourth Semester B.Sc. Degree Examination, August 2022**

**Career Related First Degree Programme under CBCSS**

**Group 2(a) : Biochemistry and Industrial**

**Microbiology**

**Vocational Course VI**

**IM 1472 — FOOD MICROBIOLOGY**

**(2019 Admission Onwards)**

Time : 3 Hours

Max. Marks : 80

**SECTION – A**

Answer **all** questions. Answer in **one** or **two** sentences. Each question carries **1** marks.

1. Yoghurt
2. Pascalization
3. Aflatoxin
4. Sauerkraut
5. Koji
6. Nisin
7. Thawing
8. Asepsis
9. Radurization
10. Probiotics

**(10 × 1 = 10 Marks)**

P.T.O.

## SECTION – B

Answer any **eight** questions. Answer not to exceed **one** paragraph. Each question carries **2** marks.

11. Differentiate Food yeast and Fodder yeast
12. Infectious hepatitis
13. Spoilage of fish
14. Rennet
15. SCP
16. Food preservation by radiation
17. Whiskers on meat
18. Preservation of milk
19. Food Intoxication
20. *Pediococcus*
21. Osmophiles
22. Quality assurance in food industry
23. Bread making
24. Botulism
25. Putrefaction
26. Redox potential

(8 × 2 = 16 Marks)

## SECTION – C

Answer any **six** questions. Answer not to exceed **120** words Each question carries **4** marks.

27. Explain the factors affecting microbial growth in food.
28. Discuss the different chemical methods of food preservation.
29. Describe food borne infections.
30. Discuss the microbiological analysis of milk.

31. Give details on manufacture of cheese.
32. Comment on Good Manufacturing Practices (GMP).
33. Give brief account on spoilage of cereals.
34. Discuss about common molds associated with food materials.
35. Explain the methods of Food plant sanitation.
36. Give brief account on mycotoxins.
37. Different stages in wine production.
38. Give an account on Methylene blue reduction test.

(6 × 4 = 24 Marks)

#### SECTION – D

Answer any **two** questions. Essay type. Each question carries **15** marks.

39. Discuss the principle and methods of food preservation using high and low temperatures.
40. Write an essay on food born infections and poisoning caused by *clostridia* sp, *Escherichia* sp and *Staphylococcus* sp.
41. Discuss the principles of HACCP system. Add a note on ISI and BIS standards.
42. Give a brief account on microorganisms important in food microbiology.
43. Write briefly on the production of various microbial enzymes.
44. Write an essay on the spoilage and management of milk and dairy products.

(2 × 15 = 30 Marks)