



19101509

QP CODE: 19101509

Reg No :

Name :

B.Sc DEGREE (CBCS) EXAMINATION, MAY 2019

Fourth Semester

B.Sc Zoology Model II Aquaculture

Vocational Course - ZA4VOT08 - MICROBIOLOGY, PATHOLOGY AND POST HARVEST TECHNOLOGY.

2017 Admission onwards

A3EC97B6

Maximum Marks: 60

Time: 3 Hours

Part A

Answer any **ten** questions.

Each question carries **1** mark.

1. Distinguish between Mesophilic and Psychrophilic bacteria
2. Comment on declining phase in a bacterial growth curve?
3. What is Tyndallization?
4. What is rigor mortis?
5. What are the chemical indices of spoilage in fishes?
6. Write a brief note on Irradiation
7. What is canning? Mention its advantages over other preservation methods
8. Comment on struvite formation?
9. Write a short note on Fish marinades
10. What is Fish Meal? How is it prepared?
11. What is Enteritis?
12. Comment on HACCP

(10×1=10)

Part B

Answer any **six** questions.

Each question carries **5** marks.

13. Explain classification of bacteria based on Oxygen requirement. Give examples
14. Give an account of important bacteria of sanitary significance?
15. Explain biochemical spoilage in fishes. How it can be prevented?





16. Distinguish between Immersion freezing and Cryogenic freezing methods?
17. Explain thawing and different thawing methods.
18. Explain Tunnel Freezers and Fluidised bed freezers
19. Give an account on different value added products from fishery sector?
20. Explain MBV and WSSV. List out their symptoms and remedial measures
21. Which are the common crustacean diseases of fish ? List out the symptoms and remedial measures.

(6×5=30)

Part C

Answer any **two** questions.

Each question carries **10** marks.

22. What is culture media? Give an elaborate explanation on culture media, its constituents and different types used in microbiology?
23. Give an account on different types of low temperature preservation. Explain the concept of freezing and its significance in storage of fish.
24. What is Curing? Explain common curing methods in preservation of fish. Write notes on common defects in curing?
25. Comment on protozoan diseases of fish. Describe the damages caused and preventive methods.

(2×10=20)

