2017

M.Sc. 4th Semester Examination FISHERIES SCIENCE

PAPER-FSC-401

Full Marks: 40

Time: 2 Hours

The figures in the margin indicate full marks.

Candidates are required to give their answers in their own words as far as practicable.

Illustrate the answers wherever necessary.

Unit-I

(Fish Processing Technology,
Food Safety and Quality Assurance)

- 1. Answer any two questions from the following:
 - (a) What is Botulism?
 - (b) Point out physical and chemical hazards of processing plant.

 2×2

- (c) What are the needs of hygienic fish handling?
- (d) Affirm the characteristics of post-rigor fishes.
- 2. Answer any two questions from the following: 2x4
 - (a) Briefly explain the fluidized-bed freezing process.
 - (b) How would you maintain the quality assurance in processed product?
 - (c) Distinguish between soft ice and flake ice.
 - (d) What are the packaging requirement for frogen fish?
- 3. Answer any one question from the following: 1×8
 - (a) What is HACCP? State the principles of HACCP. State the composition of HACCP team. 2+3+3
 - (b) What is freezer burn? Briefly narrate any two methods of tharding employed in processing plant. Add a note on drip-loss. 2+(2+2)+2

Unit-II

(Fisheries Extension, Fisheries Economics & Marketing)

- **4.** Answer any two questions from the following: 2×2
 - (a) What do you mean by price determination?
 - (b) State about the Laws of demand and supply.
 - (c) What are characteristics of a perfect entrepreneur?
 - (d) Classify different fish market.
- 5. Answer any two questions from the following: 2×4
 - (a) State about different commercial banks involved in financial assistance to fish farmars in India.
 - (b) Explain the role of NGO's involved in fisheries development in India.
 - (c) State about different methods of fisheries extension.
 - (d) Discuss the role of MPEDA for fish and fishery product export.

- **6.** Answer any one question from the following: 1×8
 - (a) (i) State about law of increasing, constant and decreasing utility.
 - (ii) Discuss different Govt. scheme related to fisherfolk development in India.

 $4\frac{1}{2}+3\frac{1}{2}$

- (b) (i) Mention the objectives of fisheries co-operative formation.
 - (ii) Give an idea about organizational structure of fishery co-operative formation.
 - (iii) How to study the socio-economic condition of fishermen? 2+3+3