

M.Sc. 1st Semester Examination, 2012

**AQUACULTURE MANAGEMENT
AND TECHNOLOGY**

*(Saline Water Fisheries Resource Diversity,
Conservation, Management and
Remote Sensing Technology)*

PAPER — AMT-102

Full Marks : 40

Time : 2 hours

The figures in the right-hand margin indicate marks

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

Illustrate the answers wherever necessary

1. Answer *four* of the following questions : 2 × 4
- (a) Define upwelling. Mention its importance.
- (b) What do you mean by Bhasabandha fishery ?

(c) Which is the second largest lagoon in India? Mention its location and enlist four important fish species available in this lagoon.

(d) What do you mean by *In situ* conservation?

(e) Define PFZ.

(f) Mention the Name, head quarter and branches of any one Marine Fishery Research Institute in India.

(g) What do you mean by Eutrophication?

(h) Define Image and Pixel.

2. Write notes on *four* of the following : 4 × 4

(i) Indian EEZ and its fisheries potentialities.

(ii) Role of Remote Sensing Technology for coastal resource management in India.

(iii) Prawn fisheries resources of Sundarbans Mangrove.

(iv) Role of NBFGR for fisheries resource conservation in India.

- (v) Crab fishery in West Bengal.
- (vi) Bombay duck fishery in West coast of India.
- (vii) Molluscan fishery resources of estuarine West Bengal.
- (viii) Biomagnification and its impacts.

3. Answer any *two* of the following : 8 × 2

- (a) (i) Why an estuary is more productive ecosystem ?
- (ii) Enlist the major Estuaries in India.
- (iii) Describe the fisheries resources at Hooghly -Matlah estuary. 2 + 2 + 4
- (b) (i) Mention the categories of threatened species according to IUCN (2000) rules.
- (ii) Enlist the different threats to fisheries resource diversity degradation.
- (iii) Add a note on the different *Ex-situ* conservation aspects for fisheries resource diversity. 2 + 3 + 3
- (c) (i) What do you mean by Pelagic and Demersal fishery ?

(ii) Give an account on distribution, production trends and means of exploitation of Indian Oil Sardine.

(iii) Add a note on the present status of deep sea fishing in India. 2 + 3 + 3

(d) (i) Write down the fish faunal resources of Chilika lagoon.

(ii) Discuss the role of Chilika Development of Authority.

(iii) Mention the strategies to be adopted to increase fish production in Chilika lagoon. 3 + 2 + 3