

CARMEL COLLEGE OF ARTS, SCIENCE & COMMERCE FOR WOMEN
NUVEM - GOA
SEMESTER END EXAMINATION, APRIL-MAY 2023

Semester: II of B.A. & B.Sc. GE-BOTANY Class & Div: F.Y.B.A & F.Y.B.Sc.

Course Title & Code: Coastal and Mangrove Ecology (BOG102)

Maximum Marks: 80 Date: 27/04/2023 Duration: 2 Hours Total No. of Pages: 02

Instructions: 1. All questions are compulsory; however, internal choice is available.
2. Figures to the right indicate maximum marks assigned to the question.
3. Draw appropriate labelled diagrams wherever necessary.

Q. 1. Answer any four of the following: (4 marks x 4 = 16)

- What are mangroves? List any three mangroves found in Goa.
- How are sand dunes formed?
- List the biochemicals present in different mangrove species.
- Differentiate between *ex situ* and *in situ* conservation methods.
- What is the role played by sea grasses in the mangrove ecosystem?
- State the importance of cyanobacteria in the mangrove ecosystem.

Q. 2. Answer any four of the following: (4 marks x 4 = 16)

- List the methods of assessing biodiversity.
- Comment on the factors which affect photosynthesis in mangroves.
- How does sewage cause pollution in the mangrove ecosystem?
- Write a short note on organic and inorganic chemical pollutants in the mangrove ecosystem.
- Write a note on factors influencing litter decomposition.
- Write briefly on the visit to Dr. Salim Ali Bird Sanctuary at Chorao Island.

Q. 3. A. Elaborate on the different types of roots found in mangroves. (6)

OR

- Explain seed dispersal and seedling establishment in mangroves. (6)
- Describe the three groups of mangroves as recognized by P.B. Tomlinson. (6)

Q. 4. A. Write a note on species selection as a conservation strategy. (6)

OR

- Elaborate on the propagation and planting techniques of mangroves. (6)
- Describe the different salt regulation mechanisms in mangroves. (6)

Q. 5. A. Explain any three factors affecting biodiversity of the mangrove ecosystem. (6)

OR

A. Summarize the role of microalgae and seaweeds in the mangrove ecosystem. (6)

B. Describe any three anthropogenic factors that pose a threat to the mangrove ecosystem. (6)

Q. 6. A. Give a general account of the fauna of mangrove ecosystem. (6)

OR

A. Explain antagonism and competition in mangrove ecosystem with suitable examples. (6)

B. Elaborate on the need for conservation of mangrove ecosystem. (6)
