

B.Sc. Semester - 5 (Remedial) (CBCS) Examination
March/April-2025 (NEW COURSE)
Ecology(Core)

Time: 2:30 Hours**Marks: 70****Instructions:**

1. All questions are compulsory.
2. Figures to the right indicate marks.

Que.1(A) Answer the following objective type questions (04)

- 1) Define term: Holism
- 2) Give the name of Biotic factor
- 3) Which prefix is used respectively broad and narrow range of tolerance in shelford's law
- 4) Which colour of visible light is plant absorbed during photosynthesis?

Que.1(B) Answer in brief (Any one out of two) (03)

- 1) Describe: Abiotic factors
- 2) Explain: Shelford's law of tolerance

Que.1(C) Write a Note (Any one out of two) (07)

- 1) What is positive interaction? Discuss various types of positive interactions among organisms.
- 2) What is biological clock? Explain the phenological event with seasonal variations.

Que.2(A) Answer the following objective type questions (04)

- 1) Give the definition of line transect.
- 2) Define the term community.
- 3) Community consist only biotic factors. True or False?
- 4) Define the word: Frequency

Que.2(B) Answer in brief (Any one out of two) (03)

- 1) What is transect method? Explain line-transect and belt transect.
- 2) Discuss cover and basal area of community.

Que.2(C) Write a Note (Any one out of two) (07)

- 1) What is stratification? Describe vertical and horizontal stratification in forest and grassland.
- 2) What is the community? and explain the characteristics of a community.

Que.3(A) Answer the following objective type questions (04)

- 1) Give the name of basic types of succession
- 2) Define the term Allogenic succession
- 3) Define the term Nudation
- 4) What is sere?

- Que.3(B) Answer in brief (Any one out of two) (03)**
- 1) Explain the causes of succession.
 - 2) Explain fundamental & realised niche
- Que.3(C) Write a Note (Any one out of two) (07)**
- 1) Give an account of general process of succession in nature.
 - 2) What is age distribution? Describe the types of age pyramid.
- Que.4(A) Answer the following objective type questions (04)**
- 1) Give the example of Decomposer.
 - 2) Define the term Consumers.
 - 3) Give the name of Abiotic components.
 - 4) Which type of Pyramid is always upright?
- Que.4(B) Answer in brief (Any one out of two) (03)**
- 1) Give the difference between the Gross primary productivity (GPP) and Net Primary Productivity (NPP)
 - 2) Discuss the number of pyramids in forest ecosystem.
- Que.4(C) Write a Note (Any one out of two) (07)**
- 1) What is productivity? Describe types of productivity.
 - 2) Describe the abiotic and biotic components of any fresh water ecosystem.
- Que.5(A) Answer the following objective type questions (04)**
- 1) True or False: Key stone species are usually predators.
 - 2) In which phytogeographic region the Sunderbans sub-zone includes?
 - 3) Who coined the term biodiversity?
 - 4) Give the definition of Micro habitat
- Que.5(B) Answer in brief (Any one out of two) (03)**
- 1) Give the differences between western Himalayas and eastern Himalayas as phytogeographic regions.
 - 2) Explain: Role of key stone species in ecosystem.
- Que.5(C) Write a Note (Any one out of two) (07)**
- 1) What is biodiversity? Discuss the levels of biodiversity.
 - 2) Explain: National park as biodiversity conservation.
