



**RAN-2503000504066001**

**S. Y. B. Sc. (NEP) Sem.-IV Examination September - 2025**

## **(Microbiology) SEC Algal Growth and its application**

**Time: 2 Hours ]**

### સૂચના : / Instructions

$$(9)$$

**નીચે દર્શાવેલ  નિશાનીવાળી વિગતો ઉત્તરવહી પર અવશ્ય લખવી.**

**Fill up strictly the details of ➡ signs on your answer book**

Name of the Examination:

 **S. Y. B. Sc. (NEP) Sem.-IV**

Name of the Subject :

👉 (Microbiology) SEC Algal Growth and its application

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|-------------------|-------------------------|
| Subject Code No.: | <b>2503000504066001</b> |
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Seat No.:

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Student's Signature

**Q.1. Multiple Choice Questions (Any thirteen)**

(13)

- 01 Which of the following is an essential macronutrient found in most algae cultivation media?
  - a) Nitrogen
  - b) Sulfur
  - c) Chlorine
  - d) Oxygen
- 02 What is the general shape of single-celled algae?
  - a) Club-shaped
  - b) Spherical
  - c) Spindle-shape
  - d) All of the these
- 03 Which is the agar-agar producing genera?
  - a) *Sargasum*
  - b) *Vaucheria*
  - c) *Gelidium*
  - d) *Ochromonas*
- 04 Carrageenin is used for making ice-cream primarily as \_\_\_\_\_.
  - a) Thickener
  - b) Preservative
  - c) Emulsifier
  - d) Sweetener

- 05 What are the two main classes of algae that are used as food?
- Phaeophyceae and Rhodophyceae
  - Xanthophyceae and Chrysophyceae
  - Bacillarioceae and Cryptophyceae
  - None of these
- 06 Which of the following is a rich source of protein as a food?
- Anabaena
  - Spirulina
  - Nostoc
  - Oscillatoria
- 07 Which medium is commonly used to culture freshwater algae?
- Biphasic Soil Water Medium
  - Gaffron's trace element solution medium
  - Erdschreiber Medium
  - Hughes, Gorham and Zehnder's Medium
- 08 What is the cell wall composition of diatoms?
- Gelatinous and thin
  - Silica-impregnated and thick
  - Thin and flexible
  - No cell wall
- 09 What is *Sargassum natans* known for?
- Floating in the Sargasso Sea
  - Its medicinal properties
  - Growing exclusively in freshwater
  - Being used as a fertilizer
- 10 Which of the following is NOT a common application of alginates?
- Paints
  - Artificial sweeteners
  - Flame-proof fabrics
  - Ice-creams
- 11 Which algae species is commonly used to extract Carrageenin?
- Chondrus*
  - Eucheuma*
  - Gigartina*
  - All of the these

- 12 Which of the following cyanobacteria is/are used as a biofertilizer?
- a) *Anabaena*
  - b) *Nostoc*
  - c) Both a and b
  - d) None of these
- 13 Natural collection of algae developed in laboratory is called \_\_\_\_\_
- a) Enrichment culture
  - b) Axenic culture
  - c) Maintenance culture
  - d) Clonal culture
- 14 Which of the following is a pigment present in all algae?
- a) Chlorophyll a
  - b) Chlorophyll b
  - c) Carotenoids
  - d) Phycoerythrin
- 15 Red color of the red algae is due to
- a) Xanthophyll
  - b) Carotene
  - c) Phycoerythrin
  - d) Chlorophyll
- \_\_\_\_\_