

P.G. 1st Semester - 2018**BOTANY****Paper : MBOTCCT101**

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.***GROUP-A**

1. Answer any **five** questions: $1 \times 5 = 5$
- What do you understand by bioremediation?
 - Give two examples of acidophilic bacteria.
 - In which group of bacteria endoflagella occurs?
 - What is chemotherapeutic agents?
 - Name one antibiotic which inhibit protein synthesis of bacteria.
 - Give the full form of ELISA.
 - What is humoral immunity?
 - What is virioids?

2. Answer any **one** question: $5 \times 1 = 5$
- Write down the general characters of Myxobacteria.
 - Briefly write down ED fermentation pathway.
3. Answer any **one** question: $10 \times 1 = 10$
- What is biofertilizer? What are probiotics and prebiotics? Write the molecular basis of mutation in bacteria. $2+2+6=10$
 - What is innate and acquired immunity? Discuss the classical complement pathway of immune system. How monoclonal antibody is produced? $2+4+4=10$

GROUP-B

4. Answer any **five** questions: $1 \times 5 = 5$
- Define bioluminescence.
 - Name one bloom forming alga.
 - What are phytoplanktons?
 - What is pellicle?
 - What is peridinin?
 - Which algal group is used as biofertilizer?

- g) What is contractile vacuole?
- h) Mention the name of storage product of Euglenophyta.

5. Answer any **one**: 5×1=5

- a) Heterotropism of dinophyta
- b) Cyanelle of glaucophyta

6. Answer any **one**: 10×1=10

- a) Which are microalgae? Describe briefly their role in novel food products. 2+8=10
- b) Mention the principle characters of charophyceae. Why charophyceae called as “progenitor of land plants”? Discuss briefly. 3+7=10
