UG (CBCS) Even Semester Examination, May 2025

EDUCATION
(B.Sc. B.Ed.)

6th Semester

Course No. : BSBP - 603

(Plant Physiology & Biochemistry, Ecology & Utilization of Plants)

Full Marks : 50
Pass Marks : 20

Time : 2 hours

The figures in the margin indicate full marks for the questions

(*Answer five questions*)

1. (a) What is transpiration? Why is it important for plants? 3+2=5

   (b) How water is absorbed by plants? 5

Or

2. (a) Elucidate the properties of water. 5

   (b) Describe the source-sink relationship in plants. Enumerate the factors affecting translocation in plants. 3+2=5

3. Write a note on :

   (a) Photosynthetic pigments 5

   (b) Photo-phosphorylation 5

Or

4. Write a note on :

   (a) Soil profile 5

   (b) C-3 pathway 5

5. (a) Describe the water cycle operating in environment. 5

   (b) Explain physio-chemical properties of soil. 5

Or

6. (a) Explain the morphological and anatomical adaptations present in xerophytes. 5

   (b) Explain the Crassulacean Acid Metabolism (CAM) pathway. 5

7. Write a note on :

   (a) Oxidative phosphorylation 5

   (b) Properties of enzymes 5

Or

8. Write a note on :

   (a) Biological Nitrogen Fixation 5

   (b) Glycolysis 5

9. (a) Describe in detail ecological pyramids. 5

   (b) What are gibberelins? Describe their physiological roles. 1+4=5

Or

10. (a) How seed germination occur in plants? What are the factors controlling it? 3+2=5

    (b) Explain ecosystem. Describe the components of grassland ecosystem. 2+3=5

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