

D 73106

(Pages : 2)

Name.....

Reg. No.....

**FIRST SEMESTER B.A./B.Sc. DEGREE EXAMINATION  
NOVEMBER 2019**

(CUCBCSS—UG)

Botany

BOT 1B 01—ANGIOSPERM ANATOMY

Time : Three Hours

Maximum : 80 Marks

**Part A**

*Answer all questions.  
One Word/Fill in the blanks.  
1 mark each.*

Fill in the blanks :

1. Protective covering of secondary plant body is \_\_\_\_\_.
2. Vascular tissues are highly reduced in \_\_\_\_\_.
3. \_\_\_\_\_ is a conductive wood ?
4. \_\_\_\_\_ is a dead mechanical tissue.
5. Central cap like inactive cells within the root of apical meristem is termed as \_\_\_\_\_.
6. The process of water secretion through the structurally modified portion of the leaf is called \_\_\_\_\_.
7. Reserve food in Aleurone grain is \_\_\_\_\_.
8. Apical cell theory was proposed by \_\_\_\_\_.
9. Aerenchyma is a type of \_\_\_\_\_ tissue.
10. Name the vascular bundles in which xylem and phloem are arranged in the same radius \_\_\_\_\_.

(10 × 1 = 10 marks)

**Part B (Short answer questions)**

*Answer all questions.  
2 marks each.*

11. Who proposed histogen theory ? Explain the concept'.
12. Explain the nature of mesophyll tissues found in the dicot and monocot leaf.

Turn over

13. Differentiate between vessels tracheids.
14. What do you mean by anomalous secondary growth ?
15. What is apposition ?
16. Describe Hydathode.
17. Differentiate between heart wood and sap wood.
18. Differentiate the stelar and extra stelar secondary growth.
19. Differentiate Schizogenous and lysigenous ducts.
20. Write note on Parenchyma.

(10 × 2 = 20 marks)

#### Part C ( Short Essay)

*Answer any six questions.  
5 marks each.*

21. Explain various types of secretory tissues present in plants.
22. Explain meristematic tissues.
23. 'Describe simple tissues',
24. Explain secondary growth in dicot stem.
25. Describe nodal anatomy.
26. Give an account on different types of starch grains.
27. Discuss structure of cell wall.
28. Give the structure of bordered pit with the help of a diagram.

(6 × 5 = 30 marks)

#### Part D (Essay)

*Answer any two questions.  
Each question carries 10 marks.*

29. With the help of diagrams, explain the Permanent tissues in plants
30. Write an account on Anomalous secondary growth in Bignonia stem
31. Describe nodal anatomy.

(2 × 10 = 20 marks)