

Reg. No.:



Name:

University of Kerala

W6644

Third Semester FYUGP Degree Examination, November 2025

Discipline Specific Core Course

BOTANY

UK3DSCBOT201 - Histology and Reproductive Botany

Academic Level: 200-299

2024 Admission

Time: 1 Hour 30 Minutes(90 Mins.)

Max. Marks: 42

Part A. 6 Marks.Time:6 Minutes.(Cognitive Level:Remember(RE)/Understand(UN)) Objective Type. 1 Mark Each.Answer all questions

Qn No.	Question	CL	CO
1	What are raphides ?	RE	1
2	What are plasmodesmata?	RE	1
3	Cite the essential whorls of a flower	UN	4
4	What are tyloses?	UN	3
5	Give the reason, why stamens and carpels are called as essential components of flower?	UN	4
6	Identify the function of cambium?	UN	2

Part B.8 Marks.Time:24 Minutes.(Cognitive Level:Understand(UN)/Apply(AP))Short Answer. 2 marks each.Answer all questions

Qn No.	Question	CL	CO
7	What is sporopollenin? Why is it important for pollen survival?	UN	4
8	Differentiate interfascicular cambium and intrafascicular cambium	UN	2
9	Explain the structure and function of lenticels	AP	3
10	. Explain double fertilization and triple fusion	AP	4

Part C. 28 Marks.Time:60 Minutes (Cognitive Level:Apply(AP)/Analyse(AN)/Evaluate(EV)/Create(CR)) Long Answer.7 marks each.Answer all 4 Questions choosing among options * within each question

Qn No.	Question	CL	CO
11	A) Classify and compare the different theories on the organization of the root apex. OR B) What are non living inclusions of cell, explain the different types of reserve foods, mineral crystals and secretory products with illustration?	AP	2, 3
12	A) Create a detailed description and illustration that explains the process of anomalous secondary growth in the stem of Boerhaavia	AN	3, 2

Qn No.	Question	CL	CO
	OR B) What are the key differences and similarities between secondary growth in dicot stem and root		
13	A) b) Prepare a comparative chart with narration and illustrations, showing the structural differences among various types of dicot stomata. OR B) a. Explain about the different types of vascular bundles with suitable example and diagrammatic representation.	EV	2, 1
14	A) With the help of diagrams, describe different types of ovules found in angiosperms OR B) Construct an idea about normal secondary growth of a dicot stem.	CR	4, 2