

Practical Plan

Name of the college: Government College of Arts, Science & Commerce, Sanquelim-Goa				
Name of Faculty: Dr Jyosna Gawas		Subject: Botany		
Paper code: BOT-300		Program: B.Sc.		Batch: I
Academic year: 2026 – 2027		Semester: V		Total Practicals/Labs: 15
Credits: 01				
Course Objectives: 1. To provide students with comprehensive knowledge and practical skills in the identification, classification, and description of angiosperms (dicots and monocots) using standard taxonomic principles and tools. 2. To develop proficiency in systematic botany through hands-on activities such as preparation of herbarium, floral analysis, construction of dichotomous keys, and understanding plant-pollinator co-evolution.				
Expected Course Outcome: 1. Demonstrate practical skills in plant morphology, anatomy, herbarium preparation, and the application of systematic principles, including the construction of dichotomous keys and understanding plant-insect interactions. 2. Develop the ability to identify, classify, and describe flowering plants up to family and genus level using standard taxonomic tools and Floras.				
Student Learning Outcome: 1. Accurately prepare detailed phytophraphic descriptions, floral diagrams, and floral formulae for selected dicot and monocot plant families, and identify economically important species within these families. 2. Exhibit competence in field-based plant collection, herbarium techniques, and preparation of systematic keys for the classification of locally available plant species.				
Month	Practicals/Labs Scheduled Date	No. of Practicals / Labs planned	List of Experiments	Reference books
June	23/06/26	0		Taxonomy of Vascular Plants by G. H. M Lawrence
	30/06026	1	Phytography of dicot plant.	
July	7/07/2025	1	Phytography of monocot plant.	
	14/07/2025	1	Description and identification of plants up to family and genus level using Floras.	

	21/07/2026	1	Preparation of herbarium of one terrestrial plant.	Plant systematics: Theory and Practice by G Singh Taxonomy of Practical Botany-II by A. M. Bendre & A. Kumar
	28/07/2026	1	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Annonaceae	
August	4/08/2026	1	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Rutaceae	
	11/08/2026	1	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Leguminosae (Papilionoideae)	
	18/08/2026	1	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Rubiaceae	
	25/08/2026	2	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Apocynaceae, Amaranthaceae	
September	01/09/2026	2	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Orchidaceae, Musaceae	
	08/09/2026	2	Study of classification, diagnostic characters, L.S. of flower, T.S. of ovary, floral formula, floral diagram and any 2 economically important plants of family Arecaceae and Poaceae	
	15/09/2026	0	Ganesh Chaturthi brake	
	22/09/2026	1	Construction of dichotomous keys using any eight locally available plants.	
	29/09/2026	1	Study of co-evolution of flowers and insects using locally available plants.	
October	6/10/2026	1	Field visit and preparation of report.	
	13/10/2026	1	Journal completion and certification	

Assessment Rubrics

Component	Max Marks
ISA 1	NA
ISA 2	NA
ISA 3	NA
Practical	25
Project	NA
Semester End Exam	NA