

## DEPARTMENT OF HORTICULTURE



# FACULTY OF AGRICULTURAL SCIENCES

## University of the Punjab, Lahore

Programme	B.Sc. (Hons.) Agriculture	<b>Course Code</b>	HORT-305	<b>Credit Hours</b>	3(2-1)
Course Title	PRINCIPLES OF ORNAMENTALCROP PRODUCTION				

#### **Course Introduction**

This course is designed to provide a comprehensive understanding of Principles of Ornamental crop production. The principles of ornamental crop production encompass a range of practices aimed at cultivating plants primarily for decorative purposes. These principles include selecting appropriate plant species and varieties that thrive in specific climates and soil conditions, ensuring optimal spacing and arrangement to enhance aesthetic appeal and plant health, and implementing efficient irrigation systems to meet water requirements without wastage.

### **Learning Outcomes**

Upon completing the course, students will gain:

An understanding of the fundamental principles and physiology of ornamental crop production within the field of Horticulture.

	Course Content	Assignments/Readings
	Unit-I	
Week 1	1.1 Introduction to Ornamental crop production 1.2 Importance of Ornamental	
	1.3 Classification of Ornamental crops	
	Unit-II	
Week 2	2.1 Raising of important annuals	
	2.2 Growing of flowering perennials	
	Unit-III	
Week 3	3.1 Foliage plants	
week 5	3.3 Succulents and their types	
	3.4 Flowering bulbs	
	Unit-IV	
Week 4	4.1 Propagation and its techniques	
	4.2 Crop management practices	
Week 5	Unit-V	
	5.1 Seed dormancy	
	5.2 Bulb dormancy	

	Unit-VI	
Week 6	6.1 Recent trends in Ornamental crop production	
,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	6.2 Footows efforting amountal aron muchystics	
	6.2 Factors affecting ornamental crop production	
	Unit-VII	
Week 7	7.1 Pruning, training and shaping	
	7.2 Use of growth regulators	
	Unit-VIII	
Week 8	8.1 PGRs	
	8.2 Crop management	
	Unit-IX	
Week 9	9.1 Manipulation of growth	
	Unit-X	
Week 10	10.1 Manipulation of Flowering	
	10.2 Concept of Bonsai	
	Unit-XI	
Week 11	11.1 Concept of topiary	
	Unit-XII	
Week 12	12.1 Outdoor and indoor decoration	
,, con 12	12.2 their management	
	Unit-XIII	
XX . 1 12		
Week 13	13.1 Flower exhibition 13.2 Aesthetic Value	
	Unit-XIV	
Week 14	Unit-A1 v	
	14.1 Flower arrangements	
Week 15	Unit-XV	
Week 15	15.1 Breeding	
	Unit-XVI	
	16.1 Improving varieties	
Week 16		

	PRACTICAL			
Week 1	Identification of annuals, herbaceous and perennials			
Week 2	Nursery raising			
Week 3	Training and pruning			
Week 4	Planting and cultural operations			
Week 5	Importance and role of seeding in plant production  Types of seeds and their characteristics			
Week 6	Transplanting of nursery			
Week 7	Foliage plants, Varieties and types			
Week 8	Marketing of important vegetables			
Week 9	Overview of succulents, • Types of succulents and their natural habitats			
Week 10	Flowering bulbs with their propagation methods			
Week 11	Management practices (pinching, disbudding, deshooting etc.)			
Week 12	Flower exhibitions and growing structures.			
Week 13	Methods of breaking seed			
Week 14	Bulb dormancy, Importance of dormancy in bulb life cycle			
Week 15	Visits to ornamental nurseries			
Week 16	Visits to parks, cut flower shops			

### **Textbooks and Reading Material**

- 1. Arora, J.S. 2003. Introductory Ornamental Horticulture (4<sup>th</sup> Ed.). Kalyani Publishers, New Delhi.
- 2. Larson, RA. 1980. Introduction to Floriculture. Academic Press, New York.
- **3.** Chadha, K.L and B. Choudhary. 1986. Ornamental Horticulture in India. Indian Council of Agricultural Research, New Delhi.
- 4. Laurie, A. and Ries V.S. 2004. Floriculture: Fundamentals and Practices. Agrobios (Inidia), Jodhpur, India.
- 5. Hessayon, D.G. 2007. The Flowering Shrubs Expert (3<sup>rd</sup> Ed.). Transworld Publishers, London, U.K.

### **Teaching Learning Strategies**

- 1. Lectures
- 2. Discussions
- 3. Presentations
- 4. Quiz
- 5. Assignments

### **Assignments: Types and Number with Calendar**

Compare the growth performance of ornamental plants in different growing mediums (e.g., soil, peat-based mix, hydroponic solution). Provide a detailed analysis of plant health, growth rates, and overall performance.

#### **Assessment**

Sr. No.	Elements	Weightage	Details
1.	Midterm	35%	Written Assessment at the mid-point of the semester.
	Assessment		

2.	Formative Assessment	25%	Continuous assessment includes: Classroom participation, assignments, presentations, viva voce, attitude and behavior, hands-on-activities, short tests, projects, practical, reflections, readings, quizzes etc.
3.	Final Assessment	40%	Written Examination at the end of the semester. It is mostly in the form of a test, but owing to the nature of the course the teacher may assess their students based on term paper, research proposal development, field work and report writing etc.