

SAVITRIBAI PHULE PUNE UNIVERSITY , PUNE

S.Y.B.Sc. Botany

(Sem-III)

SUBJECT

Plant Physiology

Botany (Bo-232) Pepar-II

PowerPoint Presentation

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Contents ...

Credit-I

- 1.Introduction to Plant Physiology
- 2.Absorption Of Water
- 3.Ascent of SAP
- 4.Transpiration

Credit-II

- 5.Nitrogen Metabolism
- 6.Seed Dormancy and Germination
- 7.Physiology of Flowering

Unit 1. Introduction to Plant Physiology

1.1 Plant Physiology -

Plant Physiology the most challenging, dynamic and modern discipline of botany, deals with the various metabolic processes and pathways in plants and microbes.

“the study of various functions performed by plants” e.g. seed germination etc.

Plant physiology deals with the study of organisation and operation of all the physiological, biochemical and enzymological processes.

physiology also called as experimental botany.

Plant metabolism mainly catabolism and anabolism is studied under plant physiology which is concerned with every aspect of plant life.

- * How they use solar energy ?
- * How they obtain and distribute water and nutrients ?
- * How they grow and develop ?
- * How they respond to the environment ?
- * How they produce flowers, fruits and seeds ?
- * How seeds germinate and form new plants ?

This Science essentially finds applications in the fields of –

Biophysics

Biotechnology

Biochemistry

Molecular biology

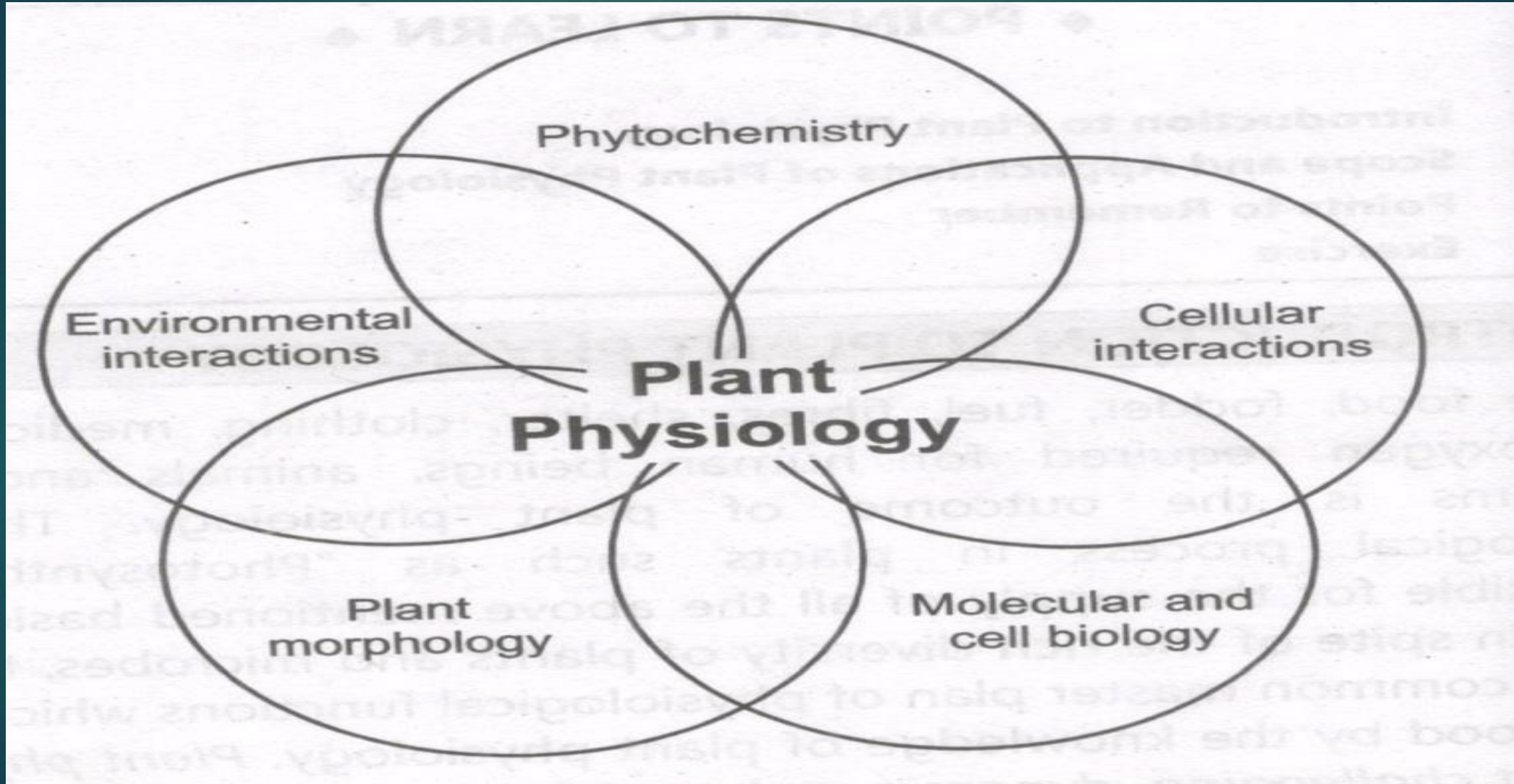
Anatomy

Cytology

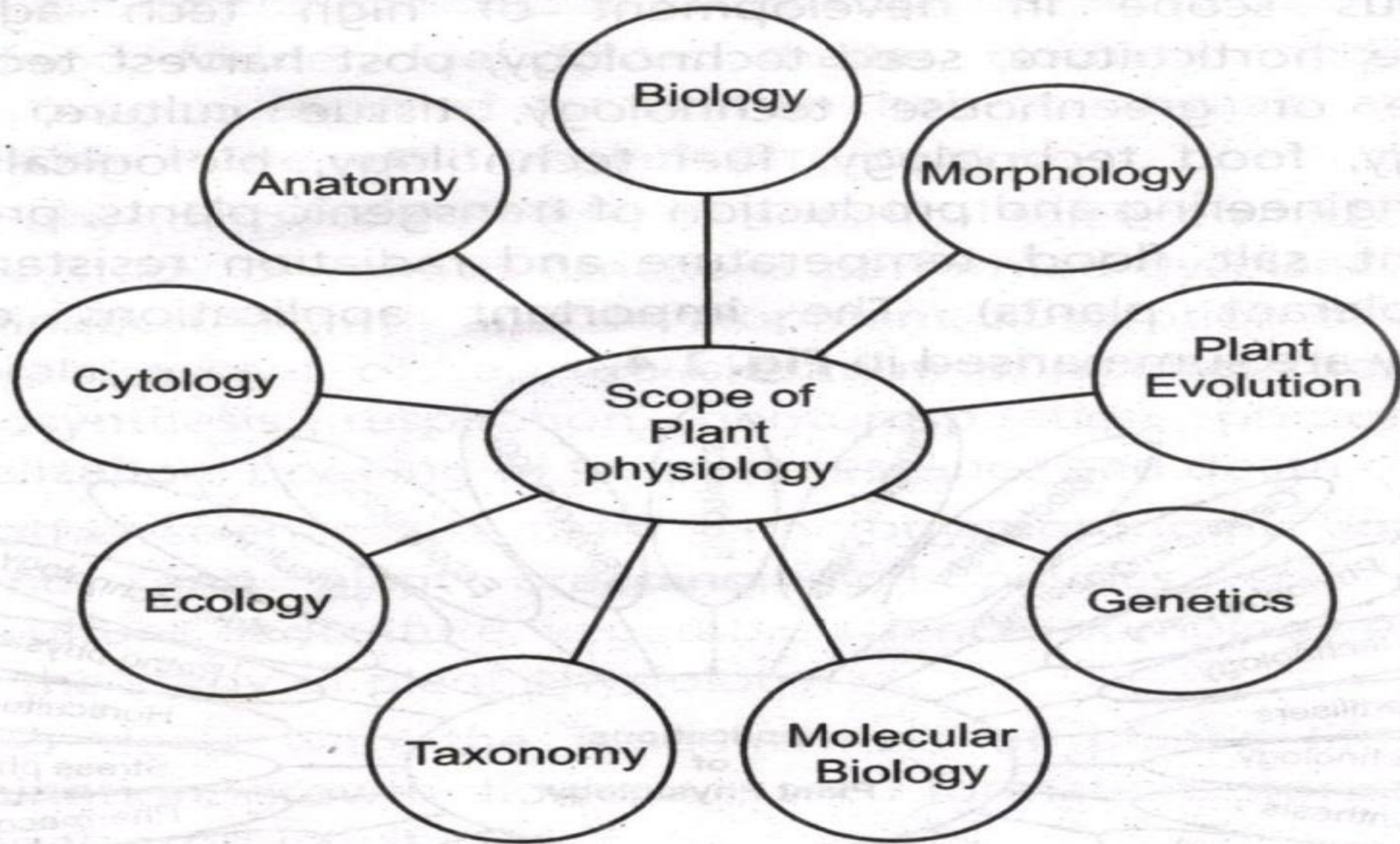
Genetics

Ecology etc.

Scope and applications of plant physiology



Scope and applications of plant physiology



A close-up photograph of a field of bright yellow tulips. The flowers are in various stages of bloom, with some showing a slight red streak on their petals. The background is a clear, bright blue sky. The text "Thank You" is written in a bold, red, sans-serif font across the center of the image. A small red square is visible in the top right corner.

Thank You