

## PLANT AND ANIMAL CELL CULTURE

Semester	Subject Code	Category	Lecture	Theory	Practical		Credits
V	21CBT51	Core Practical - III	0	0	3hrs per week	45	3

### COURSE OBJECTIVES

To create an opportunity to students for experimentally testing the principles and concepts studied in respective theory.

### LIST OF EXPERIMENTS

1. Preparation of MS medium
2. Ex-plant preparation
3. Callus induction
4. Surface sterilization of explants
5. Synthetic seed preparation
6. Isolation DNA from human blood
7. Preparation of Animal cell culture media
8. Sterilization of Animal cell culture media
9. Instrument and facilities for animal cell culture.
10. MTT assay demo

### REFERENCE BOOKS

1. Plant Biotechnology - The genetic manipulation of plants (2<sup>nd</sup>ed) Slater A, Scott NW, Fowler MR (2008) Oxford University press.
2. Plant Tissue culture: Techniques and Experiments (3<sup>rd</sup>ed) Smith RH (2013) Academic Press, USA.
3. Plant Tissue culture: Theory and Practice, BhojwaniSS and RazdanMK (1996), Elsevier, India.
4. Biotechnology, Sathyanarayanan.U, Paperpack Publications (2005).
5. <https://www.thermofisher.com>

### Syllabus Designer:

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