



# MANGALORE UNIVERSITY

## DEPARTMENT OF BIOSCIENCES

### MSc BIOTECHNOLOGY

#### BTP 507 PLANT BIOTECHNOLOGY

##### Course outcome

The student will

- learn the set-up of a plant tissue culture lab
- develop hand-on practical skills in plant tissue culture methods
- learn the use of media, hormones etc,
- study early development of plants, protoplast culture etc.

Estimation of plant hormones (e.g. auxins, gibberellins)

Plant tissue culture methods

Callus culture (compact and friable)

Ovule and anther culture

Cell suspension cultures

Embryogenesis

Synthetic seeds

Protoplast preparation

Protoplast fusion techniques

Plant cell immobilization

Methods of inducing resistance through tissue culture

