1st SEMESTER HORTICULTURE TECHNOLOGY (COMMERCIAL MEDICINAL AND AROMATIC PLANTS) SKILL ENHANCEMENT COURSE (SEC)

MAP122S COMMERCIAL MEDICINAL AND AROMATIC PLANTS-I: BASICS OF PLANT PRODUCTION IN MEDICINAL AND AROMATIC PLANTS

CREDITS: THEORY: 2, PRACTICAL: 2

Objective: To acquaint the students with propagation, harvesting and quality improvement methods.

THEORY (2 CREDITS)

UNIT-I

Introduction to Medicinal and Aromatic Plants. Basics of plant production: Plant propagation technique (vegetative, sexual & asexual). Factors influencing growth, role of macro and micro nutrients.

Nursery techniques, brief account of plant protection measures, methods of harvesting and post harvesting handling.

UNIT-II

Role of genetics in breeding of MAPs. Breeding methods: self and cross pollinating. heterosis, sterility and self-incompatibility in herbs; mutation and polyploidy breeding, wide hybridization; production and maintenance of pure seeds. Systems followed in the release of plant varieties.

PRACTICALS (2 CREDITS)

- Asexual vegetative reproduction techniques- cutting, budding, layering. Methods of seed collection and storage technique.
- Preparation and layout of nursery and field beds/ plots, methods of seed sowing, preparation of shoot and root cuttings. Transplanting of seedling and rooted cuttings, irrigation technique, hoeing, weeding and weed control.
- Raising and harvesting of at least on crop: Lavender, Rosemary, Thyme, *Sassurea costus*, *Valeriana jatamansi*, and other local MAP's.