

### Center for Smart Agriculture Production management of medicinal and aromatic crop



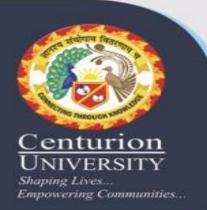
Module 3: Nursery Raising Session 13 Pots/ containers used for raising seedlings



### Plant Containers

### Plant containers

- A container is a small, enclosed and usually portable object used for displaying live flowers or plants.
- Plant containers have two distinct functions
- Growing of plants for transplanting to the field, garden, greenhouse.
- Growing of plants their itself upto maturity.



# Flats

#### **Flats**

- Commercial growers usually usestandard dimensions
  30cm×59cm×8 cm.
- •Flats are shallow plastic, styrofoam, wooden or metal trays, with drainage holes in the bottom.
- They are useful or germinating seeds or rooting cuttings,



### POTS

Pots are used to raise transplants or raise plants to full maturity.

### **BANDS**:

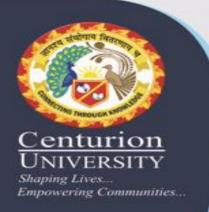
- bands are squareand are open at the bottom.
- $\Box$  these are easily attacked by micro organisms.

### **Clay pots**

- $\Box$  These are the oldest and most popular.
- □ Sizes varying from 5, 10, 13, 15, 25 cm in diameter.
- $\Box$  Usually used for growing young plants.

### **Fibre pots**

 $\hfill\square$  These pots are made from compressed peat and held together with a biodegradable net.



### Paper pots

Paper pots or paper tube pots are more popular with seedling propagation of ornamental and forestry species.

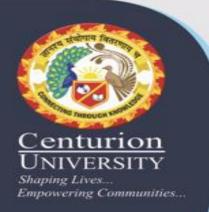
### **Rubber pots**

Recycled rubber parts used to make pots.

### **Plug trays**

 $\Box$  Small-sized seedlings grown in trays from expanded polystyrene or polythene filled usually with a peat or compostsubstrate.

 $\Box$  Plug plants are young plants raised in small, individual cells, ready to be transplanted into containers or a garden.



## Polybags

The chief advantageof using polybags is that the seedling

•can be raised almost year the round under controlled conditions.

 Plantation programme will not suffer due to dry spell or shortage of labours.

Advantages of plastic pots

 $\hfill\square$  Itcan be re-useable .

- □ Itmaintains optimum moisture.
- $\Box$  No breakageof pots.
- $\Box$  Cheap cost.



# Polybags

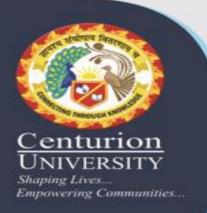
### Problems regarding to polybags

 $\Box$  It should be never placed straight onto soil because roots will grow into the ground and main roots break off when u lifting.

□ Polybags arenot durable and can break prematurely.

☐ They are normally used only once.

 $\Box$  These are problem for nursery waste management, do not decay and often burn, it causes serious air pollution.



### Root trainers

#### **Root trainers**

• These are usually rigid containers with internal vertical ribs, which direct roots straight down to prevent spiral growth.

- The containers are set on frames or beds above the ground to allow air pruning of roots as they emerge from containers.
- It also encourage lateral air root pruning through vertical slits.
- Seedlings in this containers are more vigorous and rapid root growth than polybags.
- Plants in root trainer systems are ready for planting out compared to conventional polybags.
- Hanging pots Barrel containers Tub container



# **Thank You**