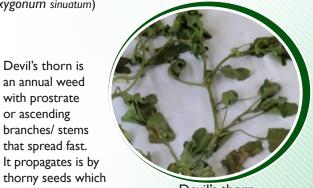
It is successful in propagation because of production of covered seeds.

## **E**merging Weeds

Double thorn (Oxygonum sinuatum)

Growth habit and dispersal Double thorn is an

- erect branched annual weed.
- It propagates through seeds whose prickles are uncomfortably sharp especially if handled when pulling weeds.



Devil's thorn (Emex australis)

### such as beans and dolichos develop a ground cover that reduces germination and growth of weeds.

- Mulching Pyrethrum: The soil is covered with natural or synthetic materials to prevent germination of weeds. Organic mulch includes straw and grass while synthetic mulch includes black polythene.
- Solarization of the soil: A transparent polythene film is spread on the soil to build up high temperatures in the soil that kills weed seedlings, seeds, tubers, stolons and rhizomes on the top six inches of the soil.
- Mechanical weed control: Physical methods are used to remove, injure or kill weeds using hand tools such as pangas, jembes and slashers or animal pulled implements such as sub-soilers. Weeding should be done before weeds flower to form seeds.
- Stale seed bed: Post-emergent herbicides such as glyphosate and paraquat are applied 1 - 3 weeks before transplanting pyrethrum to kill young weeds that germinate after rainfall.



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Disclaimer: The content of this publication is for general information to farmers and extension service. Further information may be available from Kenya Agricultural and Livestock Research Organization (KALRO).

KALRO/ NAVCDP/ BROCHURE No. 145/2024



# WEEDS IN PYRETHRUM AND THEIR MANAGEMENT



# **M**anagement options

shoes.

Double thorn

(Oxygonum sinuatum)

Devil's thorn is an annual weed

with prostrate

that spread fast.

can travel pierced

on rubber tyres or

or ascending branches/ stems

Integrated Weed Management (IWM): Weeds are controlled by use of more than one approach since one method may effectively control some weed species but not others.

Intercropping pyrethrum with legumes: Two or more crops are planted in between pyrethrum rows Legumes

### Introduction

Weeds compete with pyrethrum crop for growth components such as nutrients, sunlight, space and water. Weeds reduce flower yields for pyrethrum by interfering with tiller development. Weeding should be done to keep crop plots free of weeds at all times. Perenial weeds such as couch grass can kill pyrethrum if not removed timely.

### Common Pyrethrum Weeds



Wandering jew (Commelina benghalensis)

#### 2. Couch grass (Digitaria abyssinica)

Growth habit and dispersal

• Couch grass is a perennial creeping grass with long, slender, branching rhizomes that form a dense mat beneath the soil surface.

- 1. Wandering jew (Commelina benghalensis) Growth habit and dispersal mechanism Is a creeping perennial/ annual weed.
  - Stems bear self-pollinating runners with reduced flowers and thin roots.
  - Propagates by seeds and small stem cuttings.



Couch grass (Digitaria abyssinica)

- Rhizomes can go deeper than one meter into the soil.
- It reproduces by seeds and fragmented rhizomes spread with soil and implements



Oxalis (Oxalis latiforlia)

4. Sedges such as Yellow nutsedge (Cyperus esculentus)

Growth habit and dispersal

- An annual or perennial weed
- It reproduces by seeds, rhizomes and tubers/ nutlets.
- Rhizomes grow as deep as 8 to 12 inches

below the soil surface. Buds on the tubers sprout and grow to form new plants.



Purslane (Portulaca Oleraceae)

- **Oxalis** (Oxalis latifolia) Growth habit and
- dispersal A stemless perennial
- herb Reproduces and spreads by both bulbils and seed that spread by wind and cultivation such as harrowing spread the bulbils.



Growth habit and dispersal

- A weak-stemmed, reclining plant with bristles on stems leaves and fruits that cleave to clothes and animal fur.
- Propagation is by seeds.
- Plants can't stand up on their own. They clamber over other vegetation with the aid of hooked bristles.

Cleavers (Galium aparine)



Corn marigold (Chrysanthemum segetum)

7. Corn marigold (Chrysanthemum segetum)

Growth habit and dispersal

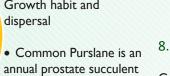
- An annual weed that has both male and female organs.
- The weed propagates vegetatively through cuttings or rhizomes and seeds
- 8. Thorn apple (Datura stramonium)

Growth habit and dispersal

- An erect annual herb forming a bush up to 1-1.5 m tall.
  - The aromatic flowers are trumpet-shaped, white to creamy or violet.



Thorn apple (Datura stramonium)



weed. • Plants emerge from

Growth habit and

- seeds and stem cuttings by forming roots from the cut end of the stem.

Yellow nutsedge

(Cyperus esculentus)