



Common Fruit Pests, Damage and Management in the South Western Agro-Ecological Zone (SWAEZ), Uganda



Arthropod pests are among major threats to fruit production in the SWAEZ. Most of these pests have a wide host range with severe damages observed on mango and citrus. The damages result from insect feeding habits that range from piercing, sucking and chewing. Besides feeding habits, insect reproductive behaviour also inflicts significant damage to fruits.

Piercing and Sucking insect pests

1. Scales



IPM of Mites, whiteflies and aphids

Aphids, mites and whiteflies populations usually increase during the dry spells, therefore intensive monitoring and control is necessary.

Cultural control

- Monitor regularly for presence of aphids, whiteflies, honeydew and sooty mould
- Field sanitation (weeding, destroying bushes and pruning).

Chemical control

- Use contact or systemic insecticides appropriately (e.g., Ambush, Karate, Malathion, Decis, dimethoate & imidacloprid).

Integrated Pest Management (IPM) of Scales and Mealybugs

Cultural control

- Use clean planting materials free of any scale infestation
- Proper plant spacing and pruning
- Orchard sanitation by removing infested plant parts
- Proper weeding and control of alternative hosts.

Chemical control

- Monitor fields to determine scale population levels (if 4 leaves out of every 10 are infested use chemical control)
- Use systemic insecticides (e.g., neonicotinoids like acetamiprid, dinotefuran, and thiamethoxam) to overcome the protective coat of scales
- Use horticultural oils to suffocate the scales
- Control ants to prevent spread of scales using insecticides.

2. Whiteflies

3. Aphids

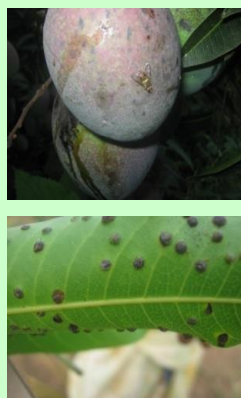


4. Red spider mites

5. Mealybugs

Pest damage by reproductive behaviour

1. Fruit fly



IPM of Fruit Fly and Mango Gall Fly

Cultural control

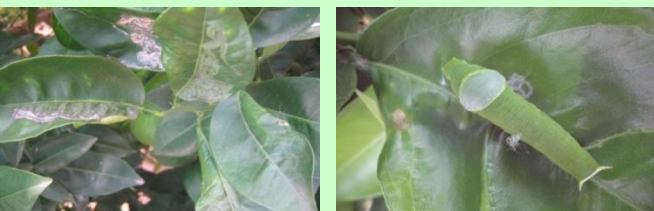
- Proper field sanitation (weeding, remove and destroy infested fruits)
- Proper pruning to allow in sun light
- Use baits and pheromone traps
- Avoid planting guavas and pawpaw close to mango orchards
- Timely application of insecticides.

2. Mango gall fly

Chewing Insect Pests

1. Leaf miners

2. Orange Dog



IPM of Leaf Miners and Orange Dog

Cultural and Chemical Control

- Timely and proper pruning
- Avoid nitrogenous fertilizers when leaf miner populations are high
- Apply systemic insecticides when the plant is infested.