

### Top 10 Insect Vegetable Pests- *In 10 Minutes!*



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### WHY ACCURATE INSECT IDENTIFICATION IS IMPORTANT!!

- The vast majority of insects are not pests (less than 1% of all species)
- Not all pest species are equally susceptible to insecticides
- Some insects have developed resistance to some insecticides
- The behavior of related species can differ a great deal; this affects control
- The common vegetable pests cause the vast majority of the problems and are quite predictable

### Indications of pest activity:

- Actual pest
- Frass (feces)
- Cast skins
- Honeydew
- Disease symptoms
- Leaf curling
- Distortion of new growth
- Webbing
- Chlorotic spots on leaf surface



### INJURIOUS ASPECTS OF INSECTS

- Horticultural Pests
- feeding injury
- oviposition injury
- disease

### Chewing Mouthparts

Bite or rasp off and swallow solid food  
Symptoms include holes, missing leaves, windowpanes, scraped areas

Insects with chewing mouthparts:

- Beetles
- Caterpillars
- Grasshoppers
- Bees and Wasps
- Flies



**Sucking Mouthparts**

Feed on plant sap by piercing plant tissue  
Symptoms include spotting, curling, wilting, tissue death

Insects with sucking mouthparts:  
Aphids  
Scales  
True Bugs  
Leafhoppers  
Thrips  
Mites

**THRIPS DAMAGE**

**Peppers & Melons**

**High Tunnel Grown Lettuce**

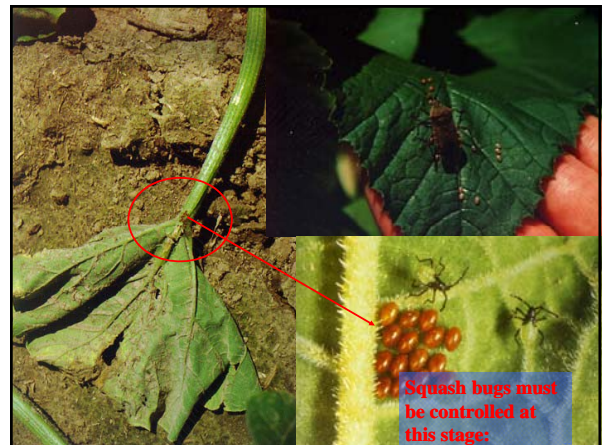
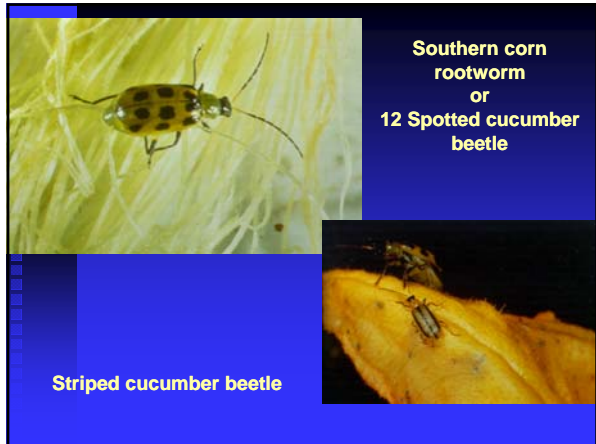
Aphids

**APHIDS**

**MITES- melons & tomatoes**

Leaf chlorosis most obvious symptom

Webbing often present





**Corn earworm:**



Corn Earworm larvae have diverse shapes and colors:



**Tomato fruit worm**



**Cabbage Worms!!** If you don't have them, something's wrong with you!

**Cabbage butterfly**

Diamondback moth →



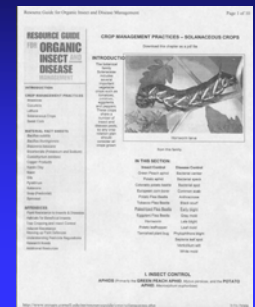
**Cabbage looper**



**Imported Cabbage Worm:**



**Cornell Resource Guide for Organic Insect and Disease Management**



## Conclusions

- The main insects pests tend to occur every year and on the same crops
- Learn to recognize them and establish some scouting protocols
- Predictable pest problems are easier to prevent through IPM techniques