

# Tomato Pest Identification



Indicates very common pests



Photo by Jude Boucher, UConn



# Tomato Pests



**Early Blight:** dark leaf spots with rings; yellow tissue around spots; vine lesions brown with light centers; defoliates plants from bottom up



# Tomato Pests



Photo by Rob Wick, UMass



Photo by Joan Allen, UConn



Photo by Jude Boucher, UConn



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**Late Blight:** large dark areas on leaves, stems, and fruit; can be white flour-like growth on underside of leaf lesion, or on vine or fruit lesion



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Photo by Jude Boucher, UConn



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**Septoria leaf spot:** small, dark spots with ash-grey centers; defoliates plants from bottom up



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Photo by Joan Allen, UConn



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★ **Anthraco nose ripe rot:** sunken, water-soaked fruit lesions; sometimes on stem end; salmon-colored spores



# Tomato Pests



**Leaf mold:** light spots on top, dark-purple fuzz underneath



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Photo by Jude Boucher, UConn

**Powdery mildew:** white, fuzzy leaf spots; kills leaves



# Tomato Pests



**Ghost spots**

**Grey Mold:** large, grey, fuzzy area on stem or fruit;  
**Ghost Spot:** white rings on fruit



# Tomato Pests



**Fusarium crown rot:** stem girdled near soil line; brown discoloration in stem and roots; bottom leaves yellow and wilt; plant death



# Tomato Pests



Photo by Rob Wick, UMass



Photo by Tom Zitter, Cornell University

**Verticillium wilt:** internal stem discolored brown near soil line; leaves and plants wilt and die



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**Phytophthora/Buck-eye rot:** girdled stem; plant death; hard, brown spot or white spores on fruit



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Photo by Rob Wick, UMass

**Pythium:** girdled stem on seedlings; brown soft fruit rot; white fuzzy growth



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Photo by Jude Boucher, UConn

**Southern blight:** white growth on stem or brown resting spores; lower leaves wilt and die; plant death



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Photo by Joan Allen, UConn



Photo by Rob Wick, UMass

**Sclerotinia Blight/White Mold:** white-cottony fungal growth, with black resting spores; soft watery fruit rot with large black spores



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★ **Bacterial canker:** yellow and brown leaf margins;  
fruit spots white, sometimes with dark centers



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Photo by Rob Wick, UMass



Photo by Joan Allen, UConn



**Bacterial spec: tiny dark specs on leaves or fruit**



# Tomato Pests



Photo by Rob Wick, UMass



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★ **Bacterial spot:** dark spots on fruit or leaves



# Tomato Pests



Photos by Meg McGrath, Cornell University

**Pith Necrosis:** brown stem and fruit spots; brown, hollow stems; adventitious roots grow on stems



# Tomato Pests



**Tomato or Tobacco mosaic virus:** stunted, mottled and distorted leaves; fruit with internal or external browning



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**Tomato spotted wilt virus:** mottled or streaked leaves turn brown and droop; plants stunted; fruit with yellow or multicolor spots or rings



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**Blossom end rot:** collapse of the tissue at the blossom end of the fruit; followed by soft rot or dark fungal growth invading damaged tissue



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**Phosphorus deficiency: purple leaves**



# Tomato Pests

Photo by Rob Durgy, CAES



**Rain check:** numerous tiny cracks in the tomato fruit surface, can join to form larger cracks



# Tomato Pests



**Growth cracks:** can be around the fruit or down the sides of the fruit



# Tomato Pests



**Catfacing:** misshaped fruit on blossom end, with scars and holes



# Tomato Pests



Photo by John Howell, UMass

**Greywall or blotchy ripening:** yellow or white on surface and inner flesh



# Tomato Pests



**Gold fleck:** scattered gold flecks on surface

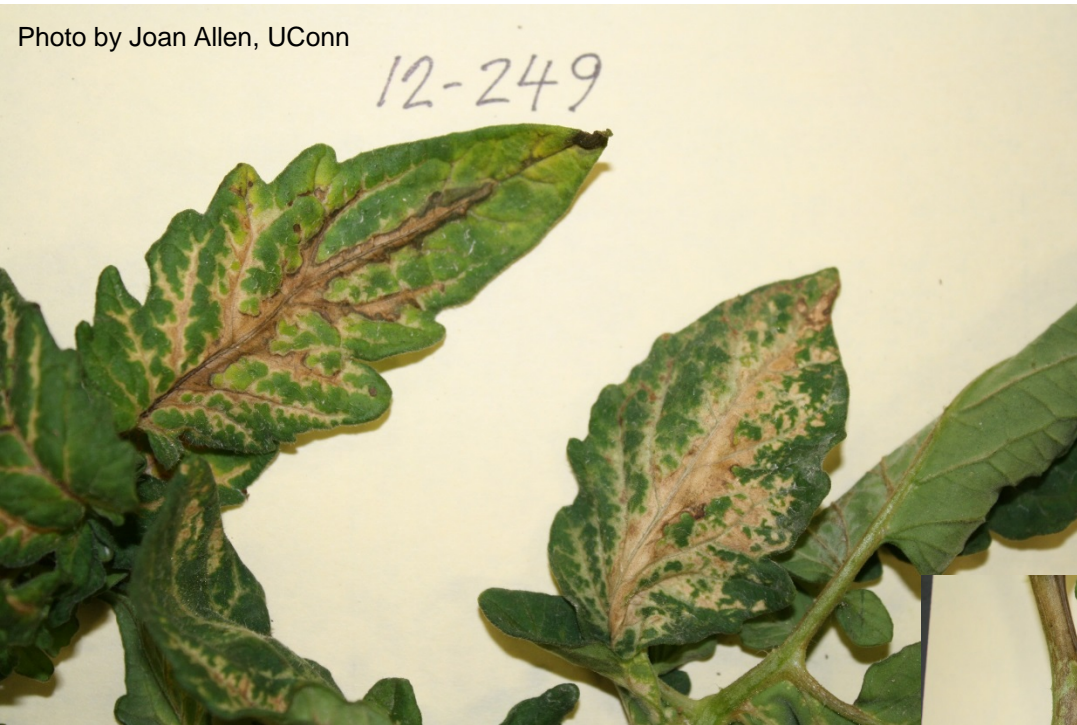
# Tomato Pests



**Zipper:** brown scar down side of fruit, sometimes with shallow hole midway



# Tomato Pests



**Paraquat injury:** dark-brown vines; white along leaf veins; usually worse in mid-canopy

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Photo by Jude Boucher, UConn



Photo by Jude Boucher, UConn

**Flea beetles:** small dark beetles; pit leaves



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Photo by Jude Boucher, UConn

★ **Aphids:** tiny, green, pear-shaped with “tail pipes”; white cast skins; sticky “honeydew” excretion



# Tomato Pests



Photo by Ian Gibson



Photo by Jude Boucher, UConn

**Tomato/tobacco hornworm:** large, green caterpillar with white lines or V's on side and "horn" on back. May be covered with white pupae of parasitic wasp. Defoliates plants, scars fruit or produces large holes



# Tomato Pests



**Tomato fruitworm = corn earworm:** green, red or yellow caterpillar with stripes; 1/4 –inch hole in fruit

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Photo by Jude Boucher, UConn



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**Cabbage looper:** Adult moth grey or brown with silver markings on wings; green caterpillar with white stripes, makes large holes in fruit



# Tomato Pests



**Cutworms (spotted, yellow-striped or variegated):** large grey or brown caterpillars with stripes or black or yellow spots; large holes in fruit

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**European corn borer:** cream-colored caterpillar with dark brown head; makes small holes in fruit, usually near stem end



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**Two-spotted spider mites:** tiny with two dark spots; with webbing; stippled or speckled leaves

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Photo by Joan Allen, UConn



Photo by Joan Allen, UConn

**Broad mite and damage:** microscopic, translucent mites (right); misshape leaves, “russet” surface of fruit and vines;



# Tomato Pests

Photo by Jude Boucher, UConn



Photo by Jude Boucher, UConn



**Colorado potato beetle:** Adult yellow and black stripes; larva pink with black spots, slug-like; chew holes in leaves; defoliate plants and scar fruit



# Tomato Pests



**Three-lined potato beetle:** Adult yellow with 3 black stripes, red head, thorax and underside; larva brown or orange with black head and feces on back, slug-like; chew holes in leaves, defoliate plants; more common on tomatillo and husk tomatoes than tomato and potato



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**(Green) stink bug:** hard-bodied, shield-shaped;  
yellow spots on mature fruit

# Tomato Pests

Photo by Alan Eaton, UNH



Photo by Mary Concklin, UConn

**Brown marmorated stink bug:** white stripes on antennae; suck plant juices from vines and fruit, “bruise” fruit and produce sunken spots



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**Tarnished plant bug: adult; nymph; fruit damage**

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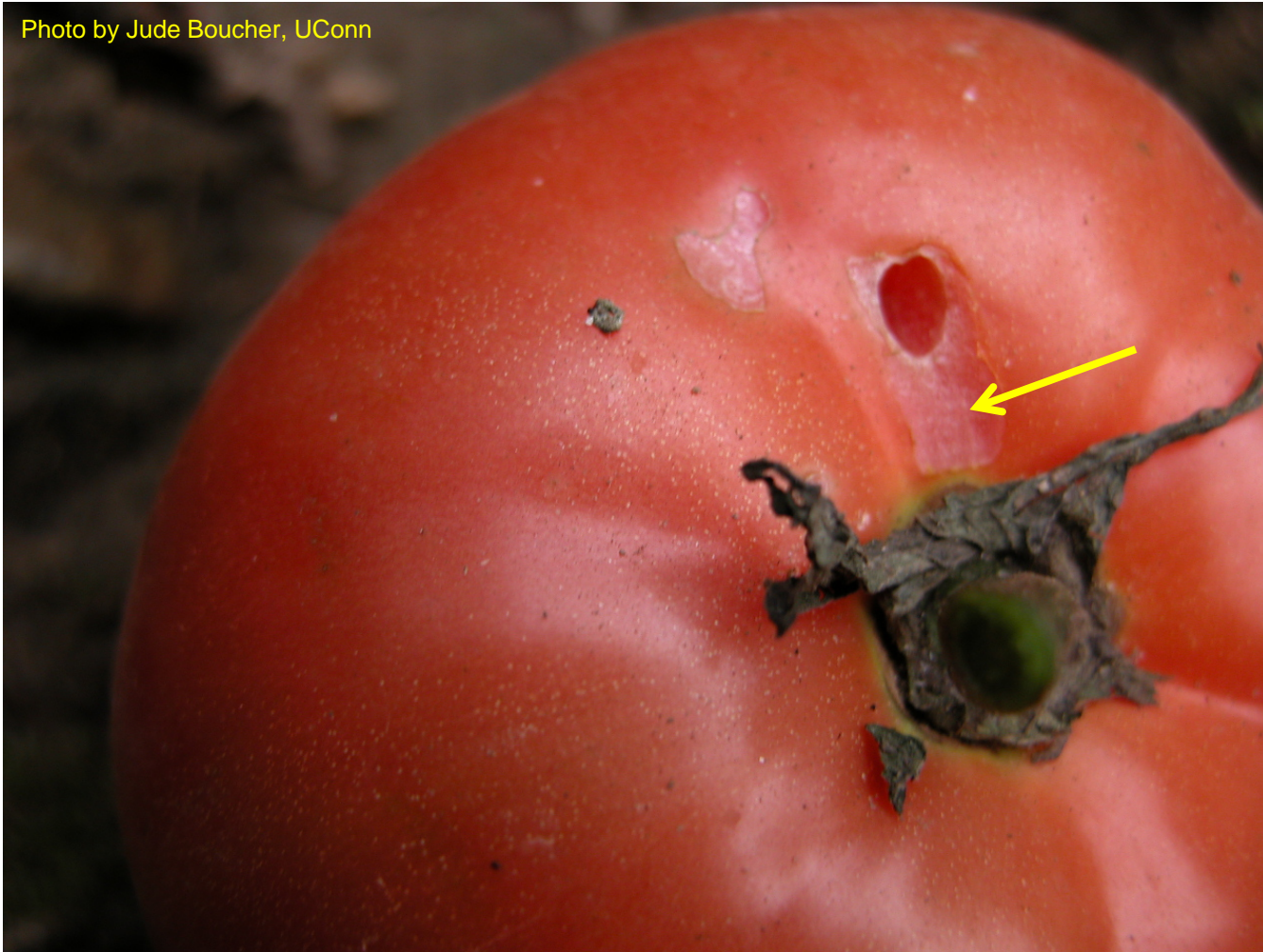


**Tortoise beetle:** adult; larva with waste on back;  
chews small holes in leaves



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Photo by Jude Boucher, UConn



**Slug feeding:** hole surrounded by surface feeding