



“What’s wrong with my vegetable plant?”

A guide to many vegetable garden plant disorders

Colorado State University Extension

Plants succumb to many different problems while we grow them in our gardens. They may get problems that have a biotic (living) origin, such as a virus, bacterial infection, fungal infection etc. However, it’s equally common that the problem is abiotic (non-living) in origin, these can include fertilization issues, moisture issues, environment (heat, cold etc.), complications with the soil etc.


This guide is designed to help walk you through where you’re seeing your problem and figuring out what might be causing the issue. Once you know the issue you can click through to one of our videos on the topic and find out more, including what you can do to resolve the issue whether it be this year or next. Happy sleuthing!


We have divided this guide into plant families, a plant family is a group of plant with similar growth habits and characteristics. Most members of the family are susceptible to similar growing issues. As you determine what family your plant is you can then ask where you’re seeing symptoms. This guide has divided symptoms into four main categories: stems, fruit/flower, leaves, and roots.

This guide goes over the most common plant families found in the vegetable garden. There are many more, if you have questions, you can reference our Colorado Vegetable guide: <https://growgive.extension.colostate.edu/colorado-vegetable-guide/>. This will provide more information on certain plant topics and specific plant varieties. Please also reach out to your local county extension office.

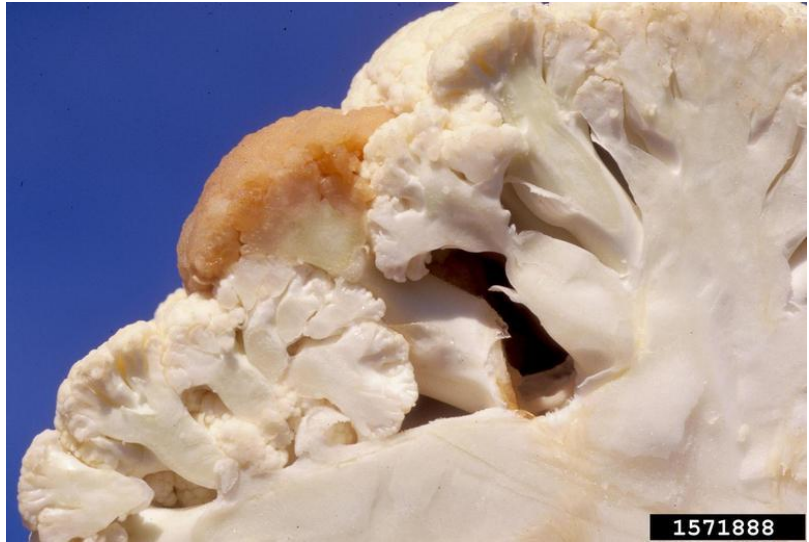
Scroll down to see photos and descriptions of many of the most prevalent diseases and disorders of vegetables in Colorado home gardens.

Cole Crops: kale, brussels sprouts, cauliflower, cabbage

Stem/Plant	
<p>Bitterness – Harvested plant has a strongly bitter taste. Typically caused by insufficient watering. Resuming sufficient water will not improve the bitter taste. For more information: https://youtu.be/3uUbkDVMRHA</p>	<p>No Image</p>
<p>Bolting - Plant flower develops faster than expected, typically as a consequence of high temperatures. For more information: https://youtu.be/uIKZ0ilhJ8</p>	 <p>5363677</p> <p>Howard F. Schwartz, Colorado State University, Bugwood.org</p>
<p>Buttoning –Premature formation of curd (edible part of cauliflower, broccoli etc.). Typically, a consequence of cold temperatures, early transplanting, insufficient fertilizer, or other conditions that slow plant growth.</p>	<p>No Image</p>

<p>For more information: https://youtu.be/gftdvGc_FyE</p>	
<p>Blinding – Blind plants are those that have not produced a fruit such as cauliflower or broccoli. May be caused by insufficient conditions, temperature, fertilizer, water.</p>	<p>No Image</p>
<p>Hail - Shredded holes or tears in plant leaves. May become necrotic (dead) and infected if left unharvested.</p>	 <p>Gerald Holmes, Strawberry Center, Cal Poly San Luis Obispo, Bugwood.org</p>

Curd damage - If one or two curds are browning and discolored, check for damage that broke them off of the head.



Gerald Holmes, Strawberry Center, Cal Poly San Luis Obispo, Bugwood.org

Edema - Typically associated with high soil moisture, cool temperatures slowing transpiration. Leaves may have water-soaked areas, blisters on epidermis, warty growths. Leaves may yellow, droop, then fall from the plants with prolonged infection. For more information: <https://youtu.be/8B9du9exAV0>



Mary Ann Hansen, Virginia Polytechnic Institute and State University, Bugwood.org

Edema continued



Joseph LaForest, University of Georgia, Bugwood.org

Downy Mildew - Small angular lesions develop on leaves and blooms. Lesions enlarge and become irregular yellow-orange necrotic (dead) patches. Undersides of the leaves have a gray-purple downy appearance.



Gerald Holmes, Strawberry Center, Cal Poly San Luis Obispo, Bugwood.org

Black rot -Bacterial. Symptoms begin as yellow V-shaped lesions extending towards the base of the leaf. Veins within the lesion blacken. Symptoms may resemble other types of abiotic drought stress.



Tom Creswell, Purdue University, Bugwood.org



Gerald Holmes, Strawberry Center, Cal Poly San Luis Obispo, Bugwood.org

Alternaria - Circular dark brown spots with concentric rings on the upper surface of the leaf. Centers may fall out for a “shot-hole” appearance. As infected areas grow leaves may drop.



Howard F. Schwartz, Colorado State University,
Bugwood.org

Damping off - Fungal organisms infect very young seedlings. Can appear as poor germination. In young seedlings the stem will pinch or rot at the soil line, seedlings will then fall over and die.



Gerald Holmes, Strawberry Center, Cal Poly San Luis
Obispo, Bugwood.org

Fusarium wilt - Plants develop a dull, yellow-green color overall. Generally more noticeable on one side first. Lower leaves wilt and die first. Vascular tissue turns brown, may resemble black rot. Warm soils temperature exacerbates the problem.

For more information:

<https://youtu.be/1vaabBob39g>



M.E. Bartolo, Bugwood.org

Head

Downy mildew - Small angular lesions develop on leaves and blooms. Lesions enlarge and become irregular yellow-orange necrotic (dead) patches. Undersides of the leaves have a gray-purple downy appearance.



Howard F. Schwartz, Colorado State University,
Bugwood.org