Some Common Tomato Problems

Are you having problems growing well-formed, blemish-free tomatoes? Many tomato problems, including leaf spots and fruit rots, are caused by pathogens such as fungi, bacteria, or viruses.

Sometimes the problem isn’t caused by an organism at all but is due to other non-pathogenic factors. These types of problems, termed physiological disorders, are usually the result of a poor growing environment and inadequate crop management.

Fortunately, you can reduce or eliminate many problems by improving the plant’s growing environment. The following list of physiological disorders represents some of the more common tomato problems.

**Blossom-end Rot**

If the symptoms are large, round, dry, brown to black and often sunken leathery areas at the blossom end of the fruit, the problem may be a disorder called blossom-end rot.

A common, but seldom serious disorder, blossom-end rot is caused by a lack of calcium in the developing fruits. This can occur even when there is an ample supply of calcium in the soil. Usually, the first formed fruits are the most seriously affected. The disorder starts at the blossom end of the green fruit and first appears as a dark green, water-soaked spot. It may enlarge to cover half the fruit.

Environmental or cultural factors are usually responsible for the onset of this condition. Extreme fluctuations in soil moisture and extended periods of extremely wet weather coupled with high humidity can encourage blossom-end rot.

Rapid vine growth early in the season, often promoted by high rates of nitrogen, can divert calcium from the developing fruits and bring on this condition.

Poor root growth can also reduce water and calcium uptake, encouraging blossom-end rot. Poor root growth can be due to cultivating too deeply around the plant or by planting seedlings too early in the season in cold soils.
The following guidelines should help you prevent blossom-end rot as well as other problems.

**Improve soil moisture**

Maintain even soil moisture levels by applying a mulch, such as black plastic, straw, grass clippings (free of herbicides), or newspapers. Mulches can help moderate soil temperature and moisture, reduce pest problems, and keep the fruit clean. Black plastic mulch can help warm cold spring soils. Apply other mulches over moist soils later in the season after the soil warms up.

Water regularly and deeply, avoiding frequent, shallow watering. One inch of water a week is generally adequate for most situations. Locate gardens in areas with well drained, fertile soil that is neither droughty nor excessively wet.

**Fertilize moderately**

Maintain good overall soil nutrient levels through good fertility management and regular soil testing. Avoid using excessive amounts of fertilizer, particularly those high in nitrogen. Maintain adequate soil phosphorous levels, especially at planting, and a soil pH between 6.5 - 6.8. Soil testing is available from UNH Cooperative Extension. For more information go to: [http://extension.unh.edu/Agric/AGPDTS/SoilTest.htm](http://extension.unh.edu/Agric/AGPDTS/SoilTest.htm)

**Cultivate carefully**

Avoid excessive cultivation around plant roots. As a general rule, cultivate no deeper than one inch. Be careful when you work closely around the plant.

**Cracking**

Tomatoes often start to crack during warm, rainy periods particularly following a lengthy dry spell. The fruits crack by simply expanding too fast, usually when they are fully-size and beginning to color. To avoid cracking problems, select resistant varieties and keep soil moisture as even as possible. Avoid excessive dryness or wetness through-out the growing season.

**Catfacing**

Tomatoes develop unusual, and sometimes bizarre, swellings and streaks of scar tissue, caused by abnormal development of the tomato flower at blossom time. Cool weather is believed to cause the flower problems. Avoid planting tomatoes until evening temperatures remain above 50 degrees Fahrenheit. (Cover is cool nights are expected.)

**Blossom drop**

In some seasons, many of the earliest blooms may simply fall off without setting fruit. This is usually the result of temperatures below 55 degrees Fahrenheit on cool nights. Blossom drop can also occur later in the season when day temperatures are consistently above 90 degrees Fahrenheit or when night temperatures remain above 75 degrees Fahrenheit.

**Leaf curl**

Leaf curl or “leaf roll” is very common, but doesn’t affect fruit production. It usually occurs after periods of heavy rains, when the soil is very wet. Older leaves are most severely affected, rolling up until their edges touch. Some varieties are more prone to leaf roll than others. Plant tomatoes in well drained soil to avoid this problem.
Sunscald
When green or ripening tomatoes get too much sun exposure, the result is often sunscald. The first symptom is a yellowish-white patch that appears on the side of the fruit facing the sun. The area will enlarge as the fruit ripens and become grayish-white.

To guard against sunscald, maintain adequate foliage on the plants to shade the fruits. Grow plants in tomato cages, control foliage diseases, and avoid over pruning to encourage plants to develop and retain protective foliage.

Remember...
Tomato disorders are seldom a serious problem, but they can be frustrating. By following the above guidelines and planting recommended varieties, you should be able to reduce tomato disorders and produce unblemished, delicious-looking fruits.

For more information about vegetable gardening, including recommended varieties, contact the UNH Cooperative Extension office nearest you. You can also contact the Family, Home & Garden Education Center at 1-877-398-4769 or visit their web site at: http://extension.unh.edu/FHGEC/FHGEC.htm