

Common Tomato Problems

By Susan Camp

While Jim and I were enjoying a leisurely weekend breakfast this morning, our power went out, which left me without internet access for an unknown period. Since I needed to complete an online search for my planned topic, I decided to revise a column from 2022 about a topic of concern to tomato gardeners every summer: What causes my tomatoes to look so ugly now when they started out red and luscious and sweet a month ago?

The tomato, the unofficial emblem of summer, red and juicy, plucked from the vine on a hot July day and eaten like an apple. Who hasn't stood in the garden with tomato juice running down their chin? What about a tomato sandwich for lunch, on white bread with mayo (we won't haggle over brands here), and a glass of ice-cold tea, preferably sweet? Sandwiches, salads, soups, sauces, we use tomatoes in a thousand dishes every year.

We try to grow them, because homegrown is so much better than store-bought, but sometimes the growing is a lot of work, and the harvest isn't always successful. Every home gardener has faced the despair of sparse flowering, poor fruit set, blossom-end rot, cracking, zippering, or catfacing. Then there are viruses, fungi, and insects like the tomato hornworm that can damage the tomato plants and fruit.

The tomato (*Solanum lycopersicum* or *Lycopersicon esculentum*) should grow easily in moist, well-drained, humusy soil in full sun. It usually does, but not without a number of hiccups, so I am offering a thumbnail description of a few of the common problems that arise during a season.

Catfacing and some other fruit deformities head the list of tomato troubles. The cause of catfacing, so called because the blossom end of the tomato is said to resemble a cat's face—use your imagination here—has not been thoroughly researched, but is thought to result from cool temperatures during pollination and flowering. Excess nitrogen application may also cause catfacing. The fruit bottom is misshapen, often puckered and deeply creased. Larger varieties and heirloom tomatoes suffer most from catfacing, especially if they were set out before the spring temperatures warmed up.

Zippering, long scars that form at the blossom end when pollen-carrying anthers stick to the developing fruit, often result in the development of an opening at the zipper site. The opening may be mistaken for a tomato fruitworm hole, but fruitworms usually enter at the stem end.

Radial cracking around the stem end occurs when the tomato flesh grows faster than the skin. Cracking can result from temperature and moisture fluctuations and overzealous fertilizing. Some tomato varieties crack easily; search for varieties that are less prone to cracking.

Tomatoes with these deformities are edible after cutting off the damaged section. Occasionally, internal black mold caused by anthracnose or other fungi can gain entry through an opening in the tomato skin. You can cut out affected parts and eat the rest of the tomato, although quality may be affected. Some people will find the thought of consuming a tomato with black mold unappetizing.

Blossom-end rot, a common problem, is not caused by a pathogen. It is, instead, a physiological disorder, caused by a calcium deficiency of the developing fruit, so a soil test before planting is a good idea. Other factors that contribute to the development of blossom-end rot include fluctuations in moisture and excessive fertilization with ammoniacal nitrogen (ammonium sulfate, ammonium nitrate, or 10-10-10), magnesium (magnesium sulfate, which is Epsom salts), or potassium. A calcium nitrate (15.5-0-0) fertilizer is a better choice. Tomatoes with blossom-end rot develop a light tan spot on the blossom end of the developing fruit. Gradually, the spot turns dark brown and leathery. Internal decay without external evidence sometimes occurs.

See Missouri Botanical Garden Gardening Help “Tomato Fruit Problems” and Clemson Cooperative Extension Fact Sheet HGIC 2217 “Tomato Diseases and Disorders” for detailed information on these and other problems. Also, our power was restored in about two hours.