FALL GARDENING

Probably the last thing most gardeners are thinking of now is planting vegetables. However, fall gardens will often produce higher quality, tastier cool-season crops as the vegetables mature during cooler, less stressful temperatures. And after the spring we have had where a lot of gardens got beat to death with all the rain in May, perhaps this is the year to give the fall a go. Plant slightly deeper than you would in the spring so the seed stays cooler and the soil around the seed stays moist longer. Plant more thickly and thin later. The plants may need to be protected from rabbits through the use of fencing. Following is a "calendar" of what to do when.

**Mid-July:** Plant potatoes if you can find or have saved back seed potatoes. Do not use freshly dug potatoes as they have a built-in dormancy that will prevent growth. Also, grocery store potatoes are often treated so they don't sprout. Cabbage, broccoli, and cauliflower can be started from seed at this time. Choose a protected place where the soil can be kept moist and rabbits will not bother them. This will not be where they will grow the entire season but these crops will be transplanted about mid-August.

**Late July:** Seed beets, carrots and beets.

**Late July to Early August:** Seed spinach and long-season maturing lettuce. Leaf lettuce will be seeded later.

**Second Week of August:** Transplant cabbage, broccoli and cauliflower to their final location.

**Mid to Late August:** Seed radishes and leaf lettuce.

Use light amounts of fertilizer before planting. For example, apply 1/4 cup of a low-analysis fertilizer (6-7-7) per 10 feet of row. Sidedress two weeks after transplanting or four weeks after sowing seed by applying 2 tablespoons of a 16-0-0 or 1 tablespoon of a 27-3-3, 30-3-4 fertilizer, or something similar per plant. Watering must occur more frequently because seed should not be allowed to dry out. Overhead watering often causes soil to crust, making it more difficult for young, tender plants to emerge. Prevent this by applying a light sprinkling of peat moss, vermiculite or compost directly over the row after seeding. Even better, use a soaker hose or drip irrigation right next to the row to allow water to slowly seep into the ground.

**Blister Beetles**

These beetles are notorious for quickly stripping vegetables (especially tomatoes) and ornamentals of their foliage. There are several species of blister beetles which vary in size (often between 0.5-0.75-inch-long) and color (such as black, gray or brown-striped), but most are recognized by their elongated, narrow, cylindrical, soft bodies with middle body part (thorax) narrower than the head or wingcovers. Some home gardeners like to use hand picking as a nonchemical method for controlling these large insects. However, wear gloves and use caution because these beetles contain a substance called cantharidin. This chemical is an irritant capable of blistering internal and external body tissues exposed to the chemical. On tender human skin, body fluids of adult blister beetles may cause large, erect, watery blisters. Chemical control of blister beetles is also possible and may be the only practical method of control if populations are large. Cyfluthrin (Bayer Vegetable Garden Insect Control) and permethrin (Bonide Eight and Hi-Yield Lawn,
Garden, Pet and Livestock Insect Control) are recommended. Cyfluthrin and permethrin have a 0-day waiting period on tomatoes.

**Tomato Leaf-Spot Diseases**

Two common leaf-spot diseases will likely appear on tomato plants soon if they haven't already. Septoria leaf spot and early blight are both characterized by brown spots on the leaves.

Septoria leaf spot usually appears earlier in the season than early blight and produces small dark spots. Spots made by early blight are much larger and often have a distorted "target" pattern of concentric circles. Heavily infected leaves eventually turn yellow and drop. Older leaves are more susceptible than younger ones, so these diseases often start at the bottom of the plant and work up. Mulching, caging, or staking keeps plants off the ground, making them less vulnerable. Better air circulation allows foliage to dry quicker than in plants allowed to sprawl. Mulching also helps prevent water from splashing and carrying disease spores to the plant. In situations where these diseases have been a problem in the past, rotation is a good strategy. It is too late for that now, but keep it in mind for next year. Actually, rotation is a good idea even if you have not had problems in the past. But many gardens are too small to make it practical. If you have room, rotate the location of the tomatoes each year to an area that has not had tomatoes or related crops (peppers, potatoes, eggplant) for several years. Fungicides are also needed to fight these diseases in the midwest. Be sure to cover both upper and lower leaf surfaces, and reapply fungicide if rainfall removes it. Plants usually become susceptible when the tomato fruit is about the size of a walnut. Chlorothalonil is a good choice for fruiting plants because it has a 0-day waiting period, meaning that fruit can be harvested once the spray is dry. Chlorothalonil can be found in numerous products including Fertiome Broad-Spectrum Landscape and Garden Fungicide, Ortho Garden Disease Control, GardenTech Daconil, Bonide Fungonil and others. Be sure to start protecting plants before these diseases are first seen if they have been a problem in the past. It is virtually impossible to control these diseases on heavily infected plants. If chlorothalonil doesn't seem to be effective, try mancozeb (Bonide Mancozeb Flowable). Note that there is a five-day waiting period between application and when the fruit can be harvested. You may wish to pick some tomatoes before they are fully red just before you spray if you use Mancozeb as the tomato fruit will ripen inside.

**Prop Up Fruit Tree Limbs if Needed**

Heavy fruit loads this season may cause limbs to break if they are not given extra support. As fruits increase in size, the additional weight on individual branches may be substantial. One-inch thick boards that are 4 inches wide can be used to prop up limbs. Cut a "V" on the top edge of the board on which the limb will rest so that it doesn't slip off. Long limbs that are heavily loaded with fruit may need a prop in the center and another to support the outer part of the limb. Check trees regularly, up to two times a week during the last month the fruit are maturing. You will find additional limbs that need support. Tending to the heavily loaded tree limbs will reduce the number of broken limbs and help keep a balance of the fruiting wood in your tree. Next year, prune long, weak branches back to a side branch to help prevent this problem.

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