High Desert Gardening

By Margo Murdock

This is the first in a series of articles written for High Desert homeowners about gardening in what for many is a "foreign" environment. If you've gardened elsewhere, the four primary differences here are soil, water, wind, and sun.

Soil. Our soil is alkaline (pH over 7) which binds up some micronutrients like iron so that plants that are not adapted to alkaline soil have difficulty pulling iron from the soil. The plant symptom you see is chlorosis or a yellowing between the veins of leaves while the veins remain green. Our soil in the foothills also has not really eroded from the granite and limestone of the mountain. I call it "soil to be". The particles are large and water flows through quickly and easily. It cuts your hands when you work in it. It is low in nutrients, especially nitrogen. Adding compost helps improve soil fertility and slow water drainage. However, this may not be necessary for native plants.

Water. The second difference is our water which is also alkaline. You can see this as the white calcium ring where you have an emitter. In the foothills our natural annual rainfall is around 12 inches. Rain is slightly acid and helps those plants that like acid soil. The low rainfall we have also contributes to our lack of organic matter. Organic matter is created when plants and animals die and decompose. Without water you don't get decomposition which is why dog poop on the trails turns to "clinkers" instead of returning to the soil.

Wind. The third difference is wind. In our hot dry environment the wind dries leaves pulling out any remaining moisture within plant leaves. It also breaks leaves and stems that aren't adapted to it.

Sun. The final difference is the sun which would be hot anywhere, but is even more intense at higher altitudes. When gardening books call for "full sun" they don't mean here. A half day of sun, typically morning sun, is the exposure needed here.

The amount garden work you have to do is directly related to the type of plants you choose. Those adapted to the conditions above and that are sized for the space where they're planted generally won't take much additional effort on your part. Those that are not adapted, typically those available from nurseries supplied from other areas of the country, will be stressed most of the time – and so will you be.

Information Sources. If you'd like to learn more about gardening in Albuquerque, the master gardeners are a great resource. You can purchase their book called *Down to Earth – A Gardener's Guide to the Albuquerque Area*. Using the master gardener website you can get local information, learn more about the book and where it's sold, send in gardening questions, or if you'd like to become a master gardener, find the application form. Classes begin each January.

Late Summer/Early Fall Activities. When the temperature gets above 95, it's hard to be an enthusiastic gardener. Now is an ideal time to put in native or warm season grasses and new native plants since monsoons have begun. These plants are attuned to late summer rains and have lots of time to develop good roots in warm soil before the ground freezes. The rains cause germination of native plant seeds and provide moisture for growing. Now is the best time of year to plant trees, shrubs, and perennials in

Albuquerque. The exception is plants with low frost tolerance, usually those with USDA hardiness zones higher than 7 (our zone). These plants are better planted in the spring since they're more adapted to heat than cold.

Don't prune plants and grasses now unless they're invasive – wait until spring. You get to admire seed heads all winter and the foliage helps protect roots from frost. Some foliage may even blow away if you're lucky.

When the temperatures recede into the low 80's, don't forget to change your irrigation controller to run less often.

More on winter irrigation in the next article. Please send me an e-mail at murdock@swcp.com if you have topics you'd like to see covered in future articles.