

# COOPERATIVE EXTENSION

University of Arizona and U.S. Department of Agriculture cooperating.



the Cochise County Master Gardener

## NEWSLETTER

VOL. 3, NO. 4

APRIL 1992

### PLANT OF THE MONTH

Barbara Shelor  
Staff Writer

The manzanita became my favorite plant of the high desert upon my first encounter with it shortly after I moved to Arizona. The gnarled limbs and smooth, bronze-red bark of the manzanita make it a standout for a newcomer to the Southwest. And, when it is blooming, as it has been for the past several weeks, the delicious fragrance of the blossoms wafts on the winds even at lower elevations.

*Arctostaphylos manzanita*, common manzanita, is an evergreen shrub which belongs to the HEATH family. The plant flowers in the spring with dense clusters of urn-shaped blossoms ranging from white to pale pink to deep pink. The fruits which appear in the fall are red-brown berries, and it is from this tiny berry that the name seems to derive. Manzana means 'apple' in Spanish; manzanita, the diminutive form, means little apple.

Common manzanita is a chaparral plant which grows at elevations from 3,000 to 8,000 feet. It is a valuable food for wildlife, and there is much evidence in the Huachuca Mountains of the fondness the javelina has for it.

Since manzanita is a very hard wood, there are other uses for it. It is particularly suited for bird perches and "bird gyms" because large birds and parakeets cannot easily destroy the wood with their beaks. As a firewood it burns very hot, and some say it creates a blue flame, although I could not find anyone to actually verify this. The fruit is sometimes used for jelly.

*Arctostaphylos uva-ursi*, also called bearberry, hag cranberry, or kinnikinnick, is a trailing evergreen species with a colorful berry. The leaves have been used for a dye and as a medicinal astringent. Native Americans used the leaves for tobacco and the berries for food.

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Robert E. Call  
Extension Agent,  
Horticulture

2500 Fry Blvd \* Sierra Vista, AZ 85635 \* 458-1104

The manzanita is not a protected plant, but to remove it for transplanting to the landscape, one must have the permission of the landowner. Some people think it is difficult to transplant. So, if you prefer, it is available in local nurseries. For those who might like to germinate seeds, success could be erratic. The seeds need scarification (in nature wildlife and fires aid this process). Collect the seeds and store in airtight containers in a cool place. The following year stratify (keep at 40° for three months) and sow.

### CUTTINGS 'N' CLIPPINGS

● A research team from the National Autonomous University of Mexico in Cuautitlan reports that the tiny crimson beetle that preys on the prickly pear cactus can provide a safe, stable red pigment for coloring foods. The pigment extracted from female cochineal beetles (*Dactylopius coccus*) has been tested extensively, but because harvesting the dye is labor-intensive, it is very expensive. Because the pigment is derived from an entirely natural source, the dye needs no approval from the FDA. (*Science News*, September 14, 1991)

#### Staff:

Carolyn Gruenhagen  
Sara Hayden  
T.J. Martin  
Elizabeth Riordon  
Barbara Shelor  
Virginia Westphal

Articles to be published in next month's newsletter must be received at the Sierra Vista Cooperative Extension Office by April 24.

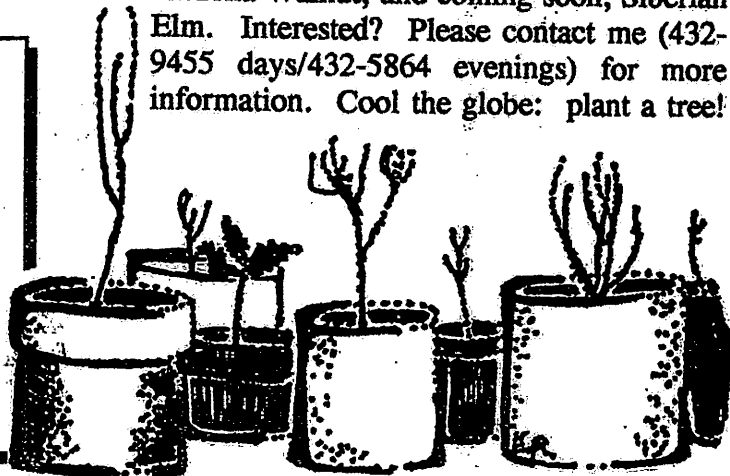
### COCHISE GLOBAL ReLEAF

Joanne McEntire  
Guest Writer

Cochise Global ReLeaf is planning to participate at the Earth Day Fair in Sierra Vista at the Wal-Mart Plaza on April 25. If you would like to help volunteers distribute information on drought-tolerant trees, please contact Dee Lewis (458-4170 evenings). We will have posters and seeds available for sale.

Are you looking for a project? Do you have a place and the supplies to start seeds? Since 1990, Cochise Global ReLeaf has been growing out seedlings in two tree banks which are located on volunteers' properties in Palominas and Pomerene. Now, Cochise Global ReLeaf will provide you with seeds to grow out. Your project will be to start a small nursery, and in the future donate the successful seedlings to the established CGR tree banks for transplanting and more growth, or to schools, public agencies, or non-profit organizations who apply for trees.

You can choose what kind of seeds to grow, and start a selection every year. We have Arizona Ash, Mesquite, Desert Willow, Honey Locust, Border Pine, Alligator Juniper, Chinaberry, Arizona Cypress, Arizona Walnut, and coming soon, Siberian Elm. Interested? Please contact me (432-9455 days/432-5864 evenings) for more information. Cool the globe: plant a tree!



## **MOTORS AND ENGINES: MAINTENANCE**

**DeForest Lewis, Jr.**  
**Guest Writer**

Proper operation and care of power equipment can prevent damage and injury to your plants, yourself, and to your equipment. Safety procedures and maintenance guidelines can be found in owners/operators manuals, which should be read, kept handy, and passed on when equipment changes hands.

Three key elements for good electric motor and gasoline engine maintenance are:

1. Keep the motor or engine cool. Excess heat will ruin either and is produced when overload occurs or the cooling system is clogged. Keep the machine clean inside and out, around fans, shrouding, and cooling fins. Oil is necessary for both lubrication and cooling and should be of the proper viscosity and rating. Keep oil fresh and at proper operating levels or ratios.

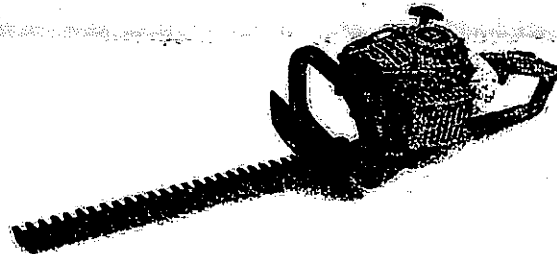
2. Keep dirt and trash out of rotating parts, especially engine parts. Safety first here! Never attempt to clear debris while unit is under power. Trash wrapped around shafts or debris in cooling fan can burn out a motor or burn up an engine. Always check these areas before starting up and during breaks in operation.

3. Keep parts lubricated. Dirt, water, and other contaminants will damage motors and engines if permitted to enter the lubrication system, usually through the carburetor or air intake. The abrasive action of dirty lubricants will cause overheating and thinning of the lubricant. Dirty air or oil filters will cause excessive heating and slow proper lubing. Two stroke engines are lubricated by oil mixed with gasoline. Gently agitate this mixture often and limit storage time to a month if possible. Four stroke engine oil should be changed within

twenty-five hours of service, and fifteen hours of heavy dusty use. Periodic lubrication of shafts, cables, and axles will improve machine longevity.

The use of power equipment in our landscape is time saving, convenient, and sometimes very frustrating and expensive. Preventive maintenance of your motors and engines will always pay for itself, so lessen the stress.

If you haven't fired up your trimmer, mower, edger, shredder, or tiller yet, then you should clean all filters, empty fuel from tank and float bowl if provided, replace with fresh fuel and read the start up procedures from your operators manual. Electric wiring should be checked for fraying and good connection and replaced if damaged. Safe operation is paramount, but always think clean air, clean oil, clean fuel, sharp edges, proper timing, and your equipment should work for you, not vice versa.



### **APRIL REMINDERS**

**WATCH OUT FOR LATE FROSTS**

**STAKE NEW TREES**

**PREPARE FOR PESTS**

*Put out codling moth traps*

**PLANT COOL SEASON VEGETABLES**

*Vegetable Varieties for Arizona*

**FERTILIZE**

*Fertilizing Home Gardens in Arizona*

A complete packet - one year's worth - of *What To Do* columns is available in the Sierra Vista Cooperative Extension Office, as well as the two pamphlets listed above, if you need to consult them.

## BOYCE THOMPSON SOUTHWESTERN ARBORETUM ANNOUNCES...

The fifteenth annual Plant Release and Arid Land Plant Show.

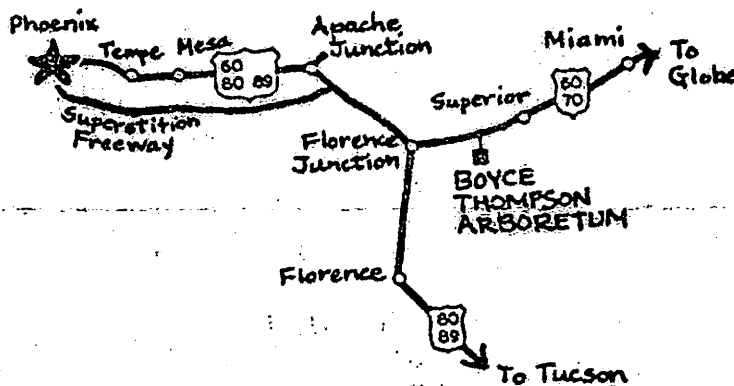
April 4 through April 12, 1992, 8:00 am - 5:00 pm daily

- Plant release featuring new and unusual drought-tolerant landscaping introductions proven successful at Arboretum and sister institutions during recent years
- Cacti and succulents
- Choice plants for indoor use
- Seeds of desert plants
- Cuttings of cacti and succulents

The Arboretum is cooperatively managed by Arizona State Parks, the University of Arizona, and the non-profit Arboretum corporation.

Address: P.O. Box AB, Superior, AZ 85273 - Tel: (602) 689-2811

**THERE WILL BE AN ADMISSION**

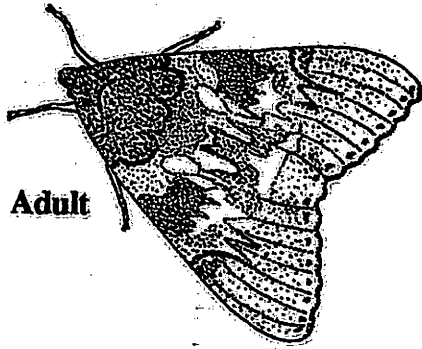


## EARTH DAY - 1992

The second annual Earth Day ENVIRO-THON will be held Saturday, April 25 at Plaza Vista Center (corner of Highway 90 Bypass and Charleston Road). Hours are 10:00 am until 2:00 pm. Last year's event drew an estimated 10,000 people! Come on out and check out the Master Gardener display, and also the displays of approximately 15 other groups (including a recycling area, the Tombstone Vigilantes, B Troop Display, and many other exciting participants).

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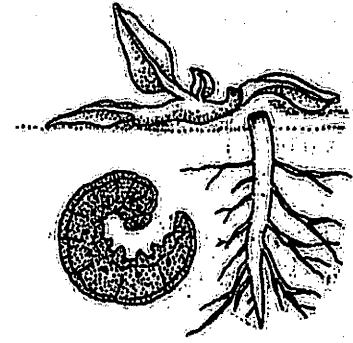


Adult

## WHAT'S BUGGING YOU®

by T. J. Martin

### CUTWORMS



Larvae & Damage

**COMMON NAME:** Cutworm, Miller's Moth

**SCIENTIFIC NAME:** Noctuidae

**DESCRIPTION:** **ADULTS** - Mottled grayish or brownish moths with a 1 - 1½ inch wingspan. The hind wings are paler in color. Nocturnal in nature, they are attracted to street and porch lights. **EGGS** - The eggs are laid in the soil near food plants. **LARVAE** - The larvae are grayish or brown, often with stripes or spots (I have observed ones with triangle-shapes on the sides). They can grow to 1½ - 2 inches in length. If disturbed, they will curl up. Cutworms are seldom seen in the light of day. **PUPAE** - The larvae pupate in the soil, sometimes making a sort of earth "shell" around them.

**LIFE CYCLE:** There may be up to five generations per year, especially in warmer climates such as ours. The eggs in the soil hatch and the larvae feed on the available plants until they have fully matured. They then burrow into the soil and pupate. If early enough in the year, they will emerge as a new generation of adults, seek a mate, and lay more eggs to repeat the cycle. Cutworms overwinter in the soil as larvae or pupae.

**HOST PLANTS:** All garden vegetables. Especially vulnerable are newly sprouted or transplanted seedlings.

**TIME OF YEAR:** Early spring (approx. March in Sierra Vista) to frost in early winter.

**WHAT TO LOOK FOR:** If you walk to your garden and see your new seedlings toppled like a clearcut forest, then you can be fairly assured that the cutworm is the culprit. They cut the stems clear through just above or below the soil line.

**PROBLEMS AND DAMAGE:** As might be expected, severe problems arise if all your seedlings are cut down. If they don't happen to get the main stem the first night, you can be sure they will be back for another meal the next.

**CULTURAL CONTROLS:** Deep plowing, tilling, or digging in the late fall and again in the early spring will expose eggs and overwintering larvae to the elements and predators. Handpick larvae at night using a flashlight. Remove winter mulch in the early spring to get rid of any pests before they come out of hiding. Some folks say that if you place a toothpick, nail, etc. upright next to the seedling, the cutworm will not be able to fell the plant. You may also try digging in the soil around a felled plant to expose the pest as it often settles down to sleep right next to it's latest victim.

**COMPANION PLANTING AND REPELLENTS:** Extract of pineapple weed or sagebrush is supposedly an effective repellent.

**TRAP PLANTS OR BAITS:** Cutworms love cornmeal but cannot digest it. Encircle your plants with this material and they may get a fatal stomachache. Another bait is a sticky combination



Address correction requested



of molasses, water, and bran that can be set out on the ground and the critters will become hopelessly entangled as they feed.

**MECHANICAL CONTROLS:** The tried and true method of exclusion is to encircle the seedling with a "collar" approximately 2-3 inches in height. Bury the collar half under the soil line and leave the rest above ground. The collars can be made of just about anything: bathroom tissue rolls cut in half work perfectly, as do rings cut out of plastic bottles, cans, PVC, paper cups, etc. Mulch around plants with oak leaves, straw, crushed egg shells, wood ashes, or anything else that will irritate their soft bodies as they try to crawl across it. A circle of diatomaceous earth will cut them up and eliminate the problem.

**NATURAL CONTROLS:** If they can find them, birds, toads, lizards, moles, firefly larvae, soldier and ground beetles all love to eat cutworms. These pests are also parasitized by Braconid and Trichogramma wasps, Tachinid flies and parasitic nematodes. Bats and swallows make short work of the adults.

**BIOLOGICAL INSECTICIDES:** *Bacillus thuringiensis* (Bt) (Dipel, Thuricide, etc.) is effective as reportedly is *Bacillus popilliae* (milky spore).

**CHEMICAL CONTROLS:** Please consult the Agricultural Extension Agent or a Master Gardener Volunteer for current recommendations. Phone 458-1104 in Sierra Vista or 384-3594 in Wilcox. Whatever you use, FOLLOW LABEL DIRECTIONS EXACTLY, and take the necessary precautions to protect yourself, other humans, non-target animals, and the environment.