

COOPERATIVE EXTENSION

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the Cochise County Master Gardener

NEWSLETTER

VOL. 6, NO. 1

JANUARY 1995

BARE ROOT TIME IS NEAR!

Jan Groth
Staff Writer

Bare root season begins the first week of January and continues through early spring. Many field grown deciduous trees, especially fruit trees, are undercut, dug, and then handled and sold with little or no soil on the roots; hence, the name "bare root."

This is really one of the most fun planting times of the year and has several advantages:

- Bare root trees are much more economical to buy—often costing 30-60% less than the price of the same plant sold growing in a container later in the year.

- You will have a much wider variety of fruit trees from which to choose in bare root season. There are great varieties available now that are quite hard to find in later spring, summer, and especially in fall.

- Roots can be examined at the time of purchase to ensure you are buying a quality plant.

- The manner in which a bare root tree is planted allows it to establish faster and better than if planted later from a container. The tree is planted during dormancy, roots become established, thus allowing the tree's energy to go toward growth when the warmth of spring arrives.

Plant your new bare root trees within two days after purchase. Once at home, immediately place your new tree's roots in a container of water with Vitamin B1 added for a minimum of 30 minutes or a maximum of 48 hours before planting. This will keep the roots plump and fresh while preparing your planting site. Do not let these roots dry out! If your new trees cannot be planted within 48 hours of purchase, do not let them stand in water. "Heel them in" in a shady place by gently packing roots with moist sawdust, mulch, or sand. Keep the roots cool, moist, and safe from exposure to frost.

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Robert E. Call

Robert E. Call
Extension Agent,
Horticulture

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Now it is time for the workout. Dig your planting hole 2 - 3 times the width of the root mass and deep enough to easily accommodate the length of the roots without cramping, bending, or cutting them to fit. With all the controversy right now regarding soil amendment - "to amend or not to amend" - you must decide to amend your soil based upon your soil condition and personal choice. If you do amend your soil, add a *maximum* of 1/3 mulch or compost to 2/3 of your native soil. Do *not* add fertilizer to the planting hole or soil as this can injure the tree. Fertilization should not be done until new growth begins.

Before planting, the roots should be carefully examined. Any broken, twisted, or discolored tips should be trimmed back to healthy tissue.

Next, determine the original soil line by the color change on the trunk. Set the tree in the planting hold so that the soil line of the tree is a bit above the soil line to allow for settling. You do not want your new tree's trunk buried deeper than the original soil level. This could be fatal for the tree.

Now, work the backfill soil around the roots, firming the soil gently as you fill the hole and making sure roots and soil are in contact. Run water slowing over the root area to eliminate air pockets and settle the soil. If your tree settles too deeply, pump it up and down while soil is saturated and raise it to the proper level.

It's a good idea to water a bare root tree initially with a Vitamin B1 solution to give the roots a boost and help prevent transplant shock. Because Vitamin B1 is manufactured by the leaf of a tree, a bare root, leafless trees could benefit from a little extra help. I even enjoy giving a B1 treatment at 2 to 4 weeks after planting. I'm not sure how much it is helping the tree, but it sure makes *me* feel good - and I've never lost a new tree.

After the initial watering, water new bare root plantings conservatively—watering thoroughly but infrequently. Dormant trees need less water, and if the soil is kept too wet, new feeder roots may not form.

Because much of the root mass is cut and left in the field when the trees are dug, there is a lower root-to-top ratio in bare root trees. The tops must be moderately thinned and pruned so the roots can supply enough water to support the

size of the top and the amount of energy in new leaf growth. This pruning may either be performed at the nursery or after the tree is planted.

Bare root season is a joy. You'll find great, fun varieties at really affordable prices. It's a really enjoyable project at a time of the year when not a lot of other gardening is going on. So, plant your bare root, watch and enjoy the fruits of your labor when spring bursts forth. Happy winter gardening!

High on the Desert

Gary A. Gruenhagen

Last March I shared with you some of the kudos we received from people who attended the First Annual High Desert Landscaping & Gardening Conference. Everyone had a great time and urged us to put together another conference in 1995, and we have done just that. The second annual conference will be held at the Ramada Inn in Sierra Vista on February 16-17. If you attended last year's conference, you won't be disappointed this year, and if you didn't attend last year, you'd better not miss this one! We've planned another great program with outstanding speakers discussing topics ranging from Anazasi Water Harvesting to Xeriscape Design Principles. By popular demand, we have included more topics on landscaping and environmental stewardship. A registration form for the conference is included in this issue of the newsletter. See you there!

Staff: Barry Bishop
Jan Groth
Carolyn Gruenhagen
Elizabeth Riordon
Virginia Westphal



High on the Desert

Second Annual High Desert Gardening & Landscaping Conference February 16 & 17, 1995

Conference Program

Thursday, February 16, 1995

Registration and Breakfast 7:30 - 9:00 am
Welcome and General Session 9:00 - 10:00 am
 Gary Paul Nabham, PhD*, *Lessons From the Desert Elders: Food and Health in Dry Lands*

Session I 10:30 - 11:45 am
 A. Matthew B. Johnson, *Mesquites In High Desert Landscapes*
 B. Mike Kilby, PhD, *Table and Wine Grapes*
 C. Tom Doerge, PhD, *Improving Desert Soils*

Lunch, Door Prizes & Exhibits 12:00 - 1:00 pm

Session II 1:30 - 3:00 pm
 A. Peter Gierlach, *Grow Native or Move Back to Ohio*
 B. Donna Ellsworth & Roberta Gibson, *Bees, Butterflies and Other Beneficials*
 C. Jimmy Tipton, PhD, *Roots - What's Going on Underground*

Session III 3:00 - 4:30 pm
 A. Jim Kowee, *Do Your Own (DYO) Landscape*
 B. Elliot Edwards, *Gourd Culture and Crafting*
 C. Roberta Gibson, *Ants In Your Plants*

Session IV 4:30 - 5:45 pm
 A. David Eppele, *Agaves For Landscapes*
 B. Carrie Nimmer, *Wild Flowers!!*
 C. Deborah Young, PhD, *Diagnosing Plant Problems*

Friday, February 17, 1995

Registration and Breakfast 7:30 - 9:00 am
General Session 9:00 - 10:00 am
 Carrie Nimmer, *Xeriscape Design Principles*

Session V 10:30 - 11:45 am
 A. Joel Glandsburg, *Anasazi Water Harvesting*
 B. Dale Leiendecker, *Growing Vegetables*
 C. Dick Kelley, *Arizona Oaks*

Lunch, Door Prizes & Exhibits 12:00 - 1:30 pm

Session VI 2:00 - 3:30 pm
 A. Bill & Athena Steen, *Straw Bale Construction*
 B. Tom DeGomez, *Growing Strawberries and Brambles*
 C. Mike Merkwin, *Composting - The Oldest Form of Recycling*

Session VII 3:30 - 5:00 pm
 A. Kevin Dahl, *Less Work, More Production With Permaculture*
 B. Janet Rademacher, *New Water-Efficient Plants For the High Desert*
 C. Terry Mikel, *Soil, Plant, Water Relationships*

Reception 5:00 - 6:30 pm

Saturday, February 18, 1995 - Optional Tours
 A. Ron & Norma Murray, *Cactus Gardening*
 B. Rob Call, *Fruit Tree Pruning Demonstration*
 C. Bill & Athena Steen, *Straw Bale Construction*
 All tours are included in the registration fee. Transportation is on your own with carpooling suggested. Maps will be provided. The number of participants is limited to the first 20 to register for the *Cactus Gardening* tour. Please indicate on the registration form.

* Dr. Gary P. Nabham first moved to Tucson in 1976 to serve as a Research Assistant at the Arizona Sonora Desert Museum, where he also served as Writer-in-Residence before becoming Staff Science Advisor in December 1993. He has a B.A. from Prescott College and an M.S. and PhD from the University of Arizona. He is a cofounder of Native Seeds/SEARCH as well as author of eight books and over fifty technical articles on ethnobiology, natural history and desert life.

Robert E. Call

Robert E. Call, Extension Agent, Horticulture

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

High on the Desert Conference Registration

Name _____
 Address _____
 City _____ State _____ Zip _____
 Telephone _____

Full Conference \$60.00 After Feb. 3 \$70.00
 One Day \$40.00 After Feb. 3 \$45.00
 Commemorative T-Shirt \$10.00 After Feb. 3 \$12.00
 Size M L XL (circle one)

Amount Enclosed \$ _____

Make check payable to: High Desert MCG Conference

Mail to: U of A Cooperative Extension Office
 ATTN: Rob Call
 1140 N. Colombo, Sierra Vista, AZ 85635
 (602) 458-1104, Ext. 141

Please indicate your preference for each session:

	I	II	III	IV	V	VI	VII
A	A	A	A	A	A	A	A
B	B	B	B	B	B	B	B
C	C	C	C	C	C	C	C

Cactus Gardening Tour ☐
 Request vegetarian meals ☐

[This form may be reproduced]

THE BLACK WIDOW

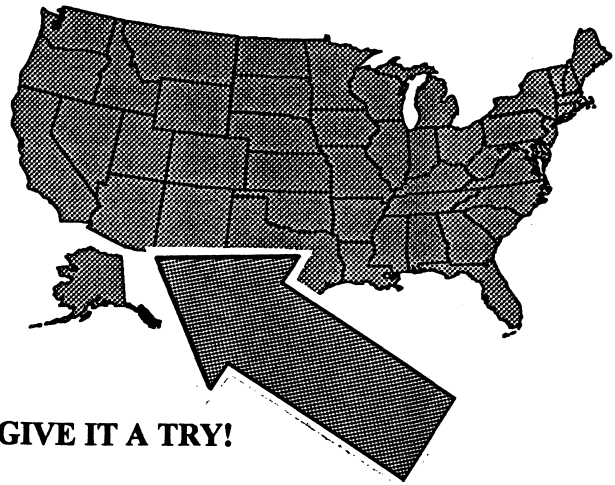
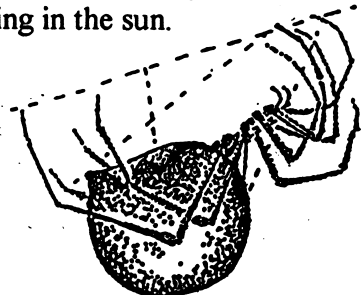
Elizabeth Riordon
Staff Writer

The spider was actually quite beautiful. So black it shined like a piece of newly broken obsidian in the sunlight. The scarlet marking on its underside was crisp and bright. The spider had made its home just behind the trash can, under the edge of the stucco.

We had lived here for about one year and construction scared off the wildlife. The first welcome from the native animal life was from the little lizards. They sat, in the afternoon, decorating the wall. Too fast for the children to catch, we could only get close enough to wonder at their beaded-patterned backs. When the moth season arrived, the lizards had a feast on the day-sleeping moths that were under the stucco edge. When they weren't looking for food, some of the lizards lived under the trash can near the spider.

Once we caught a lizard that had gotten trapped in a can on the porch. We excitedly put the little thing in the plastic "bug box" and kept it all evening on the dining room table. The night was too dark to go outside and let it free, so we left that task for the morning. Sadly, it did not survive the night. The "bug box" was, again, only for insects.

This morning the trash truck came early, before the rain. When we put the trash can back, one of the lizards did not move. Even when we reached out to touch it, it stayed still. Nearby were three other tiny lizards, just as still as their brother. Their heads had been opened, their brains had been eaten. Only one, who had been hiding behind a box scurried off to safety. A few inches away from the miniature scene of carnage, the fat black widow sat, shining in the sun.



GIVE IT A TRY!

Barry R. Bishop
Staff Writer

All of us are from somewhere else, otherwise the population here wouldn't increase. Because we came to Southeastern Arizona from somewhere else, we have special plants that we either grew up with or we have a favorite that we like best, and we are told, "Oh that won't grow here. Don't even think about it."

Don't you believe it! Everything grows here. We just have to be willing to make sure the plant gets the right requirements it needs.

A college professor said he was visiting a friend in Northern Oklahoma, and while they were sitting in the friend's back yard watching the fireworks exploding in the sky, he moved over to one side and struck a banana plant. Banana plant in Northern Oklahoma? You have got to be kidding—they don't grow there! But, there it was!

You can grow anything in Arizona, but you have to be willing to follow the plant's needs. If you have to dig up the plant and bring it inside before the cold snaps it, then it has got to be done. Don't let anyone say that the plant doesn't grow here. If the sun is too intense for it, give it shade; if it is too hot, then keep it cool. If it can live well in a container, you have it easy. If it only does well planted in the soil, it has got to be removed. Whatever the needs of the plant are, if you provide it, the plant can be grown here.

So, when somebody says it cannot be done here tell him or her "to stick it in their ear. It can too, and you can prove it."

WINTER GARDENING

Cathé Fish

In winter I really enjoy having a large variety of fresh garden greens for salads or cooking. Colder weather to me means time to plant salad greens. In my twenty years of gardening here, I have found that successful cold weather gardening comes from the right seed selection and using a floating row cover to keep bugs off. The best varieties are those specifically selected for winter weather and shorter day lengths. Seed catalogs will say "over-winters nicely" or "can handle snow."

Here's what I plant directly in my garden under garden cloth on hoops:

Seeds Blum: (Addressed are in the box at the end of this article) French Swiss chard, Bloom-sdale spinach which overwinters nicely, even in snow, and Cold Resistant Savoy spinach which is ready to eat in 50 days and slow to bolt in the spring.

From *Shepherd's Seed Co:* Nordic spinach which can be cut like lettuce or the outer leaves can be used for a constant winter supply and Paros Swiss chard which was developed in France for its mild sweet flavor.

From *Nichols:* North Pole lettuce, a great overwintering butterhead bred for winter gardening has great compact light green heads with great resistance to cold. This lettuce will bolt when warm spring weather comes.

From *Bountiful Gardens:* Little Gem Cos Romaine lettuce, often considered the best tasting of all lettuces, no waste, thick tight tender heads that can stand in the garden for awhile and still be tender.

I plant locally bought Vates and Georgia collards seeds. From the *Tsang and Ma Asian Seeds* catalog, I planted Japanese Daikon radish. These mild and sweet winter radishes are easy to grow and produce 18 inch long tender roots.

I found some new-to-me winter greens in the *Vermont Bean and Seed Co.* They are all very fast growing (harvest in 45 days) miniature leafy oriental cabbages that thrive in the cold. San-

toh, eaten raw or steamed, has somewhat spicy, pure white celery-like stalks with a broad green leaf. Tsoi Sim has tender bright green leaves on juicy stems and the whole plant, including the flowers, is tasty. Mei Qing Choi has top quality very tender leaves which are delicious when added to vegetable or meat dishes. Kintsai has a nice celery flavor.

The best selection of winter greens is in the *Cook's Garden* catalog. Artic King lettuce, crisp and early maturing, is grown from early fall through a cold winter for the earliest spring crop. Also, Cos Winter Density lettuce tolerates frost and is slow to bolt in the spring, and has sweet flavored, large rounded heads that are tightly folded, good and crisp. *Cook's Garden* also sells seed packets of mixtures of cold hardy, short day, fall and winter lettuces.

If you've never planted a winter garden before, give it a try. You'll be surprised how well we in Cochise County can garden four seasons a year!

CATALOGS

- *Seeds Blum*, Idaho City Stage, Boise, ID 83706 (\$3)
- *Bountiful Gardens*, 5798 Ridgewood Rd, Willits, CA 95490 (free)
- *The Cook's Garden*, P.O. Box 535, Londonberry, VT 05148 (\$1)
- *Shepherd's Garden Seeds*, 30 Irene St, Torrington, CT 06790 (free)
- *Vermont Bean and Seed Co*, Garden Lane, Fair Haven, VT 05743 (free)
- *Nichols Herbs and Rare Seeds*, 1190 N Pacific Hwy, Albany, OR 97321 (free)
- *Tsang and Ma Asian Seeds*, P.O. Box 5644, Redwood City, CA 94063 (free)

COOPERATIVE EXTENSION
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THE UNIVERSITY OF ARIZONA
TUCSON, ARIZONA 85721

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Address correction requested

Look for the Master Gardener table at the Amazing Arizona Mini-Festival at the Oscar Yrun Community Center, Sierra Vista, on January 19, 6:00 - 8:00 pm.

WHAT IS A MASTER GARDENER ANYWAY?

The Master Gardener program began in King and Pierce counties of Washington state in 1972 where an overworked Horticultural Extension Agent, Dr. David Gibby, began training volunteers to assist him in providing support to the community. Dr. Gibby's program was simple and effective. In exchange for a promise to donate a certain number of hours service, he gave volunteers specialized, university-level training in horticulture. Word of his success in recruiting volunteer support soon spread to other communities, and today Master Gardener programs are flourishing throughout the United States and Canada.

The Master Gardener program was started in Cochise county in 1987 by County Horticultural Extension Agent, Dr. Deborah Young. The current agent, Rob Call, has continued the program, teaching the thirteen week Master Gardener course twice a year. Prospective Master Gardeners who take the course study such topics as soils, pest management, botany, gardening, landscaping, and environmental stewardship.

The University of Arizona Extension Offices are located both in Willcox and Sierra Vista and you may reach a Master Gardener to assist you with your questions about gardening by calling the numbers listed on the front page of the newsletter. There is no charge for this gardening service - it is all part of the U of A's commitment to excellence and the people they serve.