



Nos. 41 & 42

Summer Solstice—
Autumn Equinox 1993

the Seedhead News

Gardens Galore! The Renovation of Our New Sylvester House Annex Is Under Way

By Andy Robinson

We did it! After four months of intensive work—developing a site plan, consulting with city zoning officials, talking with contractors and restoration specialists, going door to door to meet the neighbors—we purchased our new home from the Sylvester family on July 1.

The property include two historic adobe houses, dating back to the 1920s, on a three-quarter-acre plot. Heirloom pomegranate and tangerine trees, planted more than 50 years ago, still bear fruit. Two garden beds have already been dug and planted, and the soil's health attests to the stewardship of the Sylvester family, who maintained five acres of fields on their property. Indeed, the Tohono O'odham corn planted in late July is already a foot high and should be tasseling by the time you read this.

The buildings are looking a lot spiffier, too. New metal



The historic Sylvester House property, pictured here in the 1920s or 30s, is the new NS/S office and garden annex.

roofs protect both the main house and the rear guest house, future home of our seed collection. Electricians, carpenters, plumbers, and volunteers keep the site humming. The adobe walls are being repaired and stabilized. We're making the adobe on site, the old-fashioned way—in a pit, with a sifted mixture of soil, sand, and horse manure, water, and willing feet to tramp it all together.

No, we aren't about to abandon our home at the Tucson Botanical Gardens. Thanks to the tremendous growth of Native Seeds/SEARCH, space has been extremely tight—both in the office and the garden. Desks are crammed into spaces that people can barely squeeze into. Meetings overflow the main room. Because of our limited gardening space, several rare crop varieties in the seed bank are overdue for grow-out and rejuvenation.

The Sylvester House provides long-term solutions for many of these obstacles. When completed, our new "urban mini-farm" will include several large garden plots, plus trees and perennials from around the state. We plan to gather cuttings from several old fruit trees identified through the Arizona Regis-Tree program and create a small heirloom

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CS Fund Challenges NS/S Members to Raise \$10,000

The CS Fund of Freestone, California, a long-time supporter of Native Seeds/SEARCH, has issued a challenge to our members: **The foundation will match every dollar you contribute to the Sylvester House, up to a total of \$10,000.**

As you can imagine, it takes a lot of money to restore a 70-year-old house—especially one that's made of mud. Add in the landscaping and garden development, and our total fund-raising goal approaches \$150,000 over the next two to three years. We hope to raise a big portion of these funds from our membership. By contributing now, your gift will be worth twice as much, thanks to the CS Fund. Please show your support now. Fill out the pledge card enclosed in this issue, and return it to us today. All amounts will help!

How the Sylvester House Gardens Will Save Native Seeds

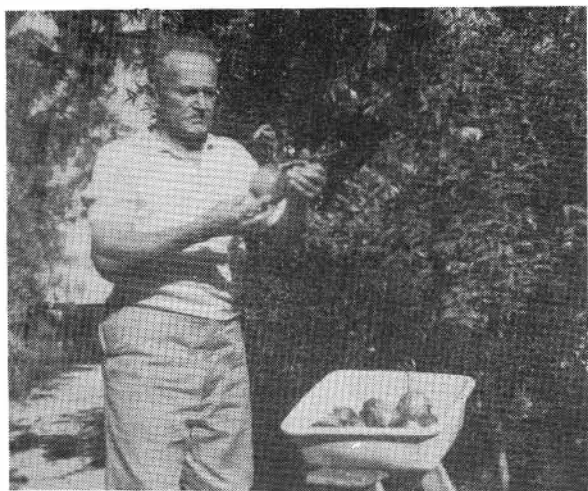
By Linda Parker
Curator of Collections

Seeds are living things that can grow old and die if they are not periodically rejuvenated by growing them out. Our seedbank now holds more than 1,200 collections of seeds adapted to Southwestern growing conditions. Many of the seeds are rare or one-of-a-kind collections. Their vulnerability to catastrophe or senescence has been one of the driving forces behind our long search for secure grow-out space.

The purchase of the Sylvester House now gives us a full quarter-acre (16,000 square feet) of growing area that we can supervise and observe daily. This long-awaited increase in growing space gives us the opportunity for all of the following:

- Large corn grow-outs to increase diversity and seed quantities;
- Systematic grow-outs of endangered and rare seeds in small plots for seed increase and observation;
- A landscape of wild crop relatives and desert plants long associated with local cultures. Our plans include a chiltepin area; a basket maker's walkway of sotol, beargrass, and devil's claw; and a desert food area of cholla, prickly pear, and mesquite—plants that have proven value in controlling diabetes;
- A mini-orchard of heirloom fruit trees, starting with the 60-year-old pomegranates and tangerine planted by the Sylvesters;
- Expanded areas for seed curation and seed cleaning and drying.

We look forward to sharing the benefits of these expanded grow-outs with members in future Seedlistings.



Art Sylvester with pomegranates from bushes he planted in the 1930s. The Sylvesters grew alfalfa, watermelons, onions, and potatoes on 5 acres, in addition to maintaining fruit trees, trellises, and flower gardens around the house.



Within days of the closing, volunteers, work crews, and staff were busy filling dumpsters, clearing garden areas, and repairing the main house and annex. Here a roofer secures an edge of the new metal roof. Photo by Linda MacElwee

Gardens Galore!

(continued from page 1)

orchard. The buildings will provide us with extra work space for seed cleaning and storage, meetings, library research, even a herbarium of plant specimens. Best of all, Sylvester House is only a few hundred yards from our present office.

We need your help! If you have ever considered an additional contribution to Native Seeds/SEARCH, now is the time to give. Your membership dues help to fund our conservation programs, but they don't begin to pay for things like electrical wiring, plumbing, or landscape plants. *Please return the enclosed card with your check or pledge.*

We also welcome your volunteer support. If you've got a few hours to spare for scraping paint, pruning bushes, or digging in the garden, please call us at 327-9123. We are especially interested in volunteers who have experience in the construction trades. But experienced or not, we'll put you to work. You might even get to jump in the mud pit and mix adobe!

For more on Sylvester House, its up-and-growing gardens, and scheduled volunteer work days, turn to page 4.

News From Chile Heaven

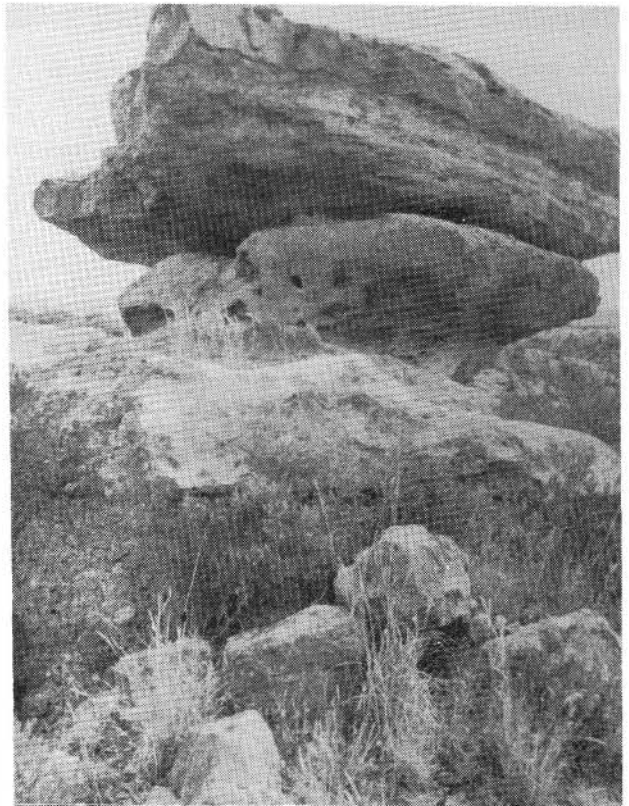
By Gary Nabhan

The Rock Corral Canyon Botanical Area near Tumacacori, AZ, has been established as North America's first *in situ* conservation site for economically important wild plants. Native Seeds/SEARCH signed a memo of understanding with the U.S. Forest Service earlier this summer establishing a cooperative management plan for this rich genetic reserve. This summer NS/S research staff and interns began inventorying the flora and fauna within the botanical area.

The botanical area, about 50 miles south of Tucson in the Coronado National Forest, shelters the northernmost known population of wild chiles—the small round firecrackers better known to chile aficionados as chiltepinos or chilipequins—as well as wild relatives of tepary beans, cotton, and gourds. In all, the new botanical area is thought to be home to some 500 plant species, including as many as 14 “at-risk” species identified by the Forest Service and Nature Conservancy. The site drains the southern flank of Tumacacori Peak at elevations of 3600–4500 feet and is a diverse area of desert scrub, grassland, and oak woodland. The canyon wall and outcrops create a variety of microclimates within this convergent zone.

In August, Mexican scientists and resource managers visited the botanical area to participate in an NS/S-sponsored field course titled “In Situ Conservation of Threatened Plant Resources.” This bilingual workshop focused on how to locate, design, and manage protected areas to conserve wild crop relatives and other threatened useful plants. Organized by summer interns John Turill and Beth Drexler, the course also featured lectures and field exercises by Don Norman, Humberto Suzan of Arizona State University, and Susan Anderson and Peter Warren of The Nature Conservancy.

Barron Orr of the University of Arizona's Office of Arid Lands Studies unveiled our new Geographic Information



Wild chiltepine bushes growing in the shelter of rock overhangs at Rock Corral Canyon Botanical Area near Tumacacori.

Photo by David Cavagnaro

Systems data base for the area, which we will use to track the status of rare plants and impacts on them.

For resource managers and other interested people, NS/S has compiled a training manual from the workshop entitled “In Situ Conservation of Threatened Plant Resources: Their Management in Protected Areas.” To order this manual, send \$10.00 to Native Seeds/SEARCH, 2509 N. Campbell Ave. #325, Tucson, AZ 85719.

More on Germinating Chiltepinos: Try a Little Tenderizer

From Judith A. Airey, Reno, NV

I treated **Texas chiltepinos** with trypsin, a digestive enzyme, before planting. Between days 18 and 28 from planting, 17 of the 25 seeds germinated. The weather was unseasonably cool, especially for the first 14 days, and the other seeds I planted were also slow in germinating.

My hypothesis for using trypsin was that the passage of the seeds through a bird's digestive system could be responsible either for the inactivation of an inhibitory protein or the activation of a protein in the chiltepine seeds. Digestive systems contain both acid and digestive enzymes.

The seeds were submerged in a solution of 0.02 g trypsin in 100 ml water and incubated 3 hours at about 100° F, then at room temperature for 4 hours. The trypsin concentration used is quite low, and the incubation times were arbitrary. The higher temperature was chosen because some birds (e.g., chicken and quail) have slightly higher body temperatures than do humans. The room temperature incubation was

unintentional due to transportation failure (my bicycle crank broke; then the bike I borrowed had a flat.)

The seeds were planted in commercial potting compost and kept indoors. For the first 14 days the temperature did not exceed 70° F during the day and fell to the upper 50s at night. Day 17 was the first day reached the upper 70s. The following day, two chiltepine seedlings had germinated. Tomato seeds planted at the same time germinated over a period from 9 to 29 days.

Although there were no untreated controls, the fact that 68 percent of the seeds germinated under cool conditions suggests that protease treatment may be useful. If the seeds require the inactivation of a protein inhibitor, then many proteases could be used to attack the inhibitor. For general use, the best choice would be papain, a protein found in unripe papaya and meat tenderizers.

(If anyone follows up on Judith's protease experiment, we would like to hear about your results. Good luck.—ed.)

Thanks for Your Help

The renovation of the Sylvester property involves the time, labor, money, and love of many, many people. We are grateful for the donations of the following craftsfolk, contractors, scouts, church groups, and individuals.

Rocky Brittain
Carl & Shawn Broderick
Elizabeth Buchroeder & Dan Ostrom, **Aardvark Landscaping**
Patricia Clark
Bill & Kenneth Allen Curtis, **Curtis Plumbing**
Brian Dahl, Clayton Parker & Emmet Rose
Julia Fonseca
Laura Lee
Ann & Bettina Martin
Tim Murphy
Garth Goebel & Ron Rusdinski, **Orion Builders**
Karyn Scott
Dale Turner
Shy Valenzuela, **Sunrise Electric**
Eagle Project Workers, Scout Troops 731 and 337: Joe Clark, Josh Clark, Joe Devereaux, Linwood Estes, Chad Hancock, Andrew Hardt, Aaron Howe, Ben Howe, Ron Howe, Dave Scott, Joe Scott
Explorer Post 771: Brett Cadiente, Garron Cadiente, Ken Hakes, George Hanna, Jr., George Hanna, Sr., Matthew Marquette, Mark McCown, Steve McCown, Sean McLeod, Jonathan Peterson, Ron Simmons, William Traynor

We hold work days the second Saturday of each month. If you can volunteer September 11, 6–11 am, or any other time, call Nancy at 327-9123.

Sylvester House Wish List

Please call NS/S if you can donate any of the following for the Sylvester House buildings and gardens:

- Ladder
- Tables & chairs
- Shelves/bookcases
- Pruning saw & garden tools
- Wheelbarrow or garden cart
- Filing cabinets
- Garden shredder
- Carpenter's tools
- Picnic table



Volunteers Jon Peterson and Steve McCown heft stones at a Sylvester House clean-up.

Photo by K. Kendrick



Bob Stone in July amidst the corn sprouts at the Sylvester House floodwater field.

Photo by K. Kendrick

Corn, Melons, and More

By Bob Stone, Sylvester House Gardens Manager

The first gardens at Sylvester House are already up and growing. On July 14 and 15—just two weeks after the purchase of the property—we hired a backhoe and dug two large garden beds, adding loads of sand and manure to amend the soil. The next week, we planted Tohono O'odham June corn in the 16' x 20' Tohono O'odham floodwater field, and added a row of Hopi Pink beans the week after. By mid-August, the corn was more than a foot high, and the beans were growing vigorously.

Garden intern Daniel Pablo from the village of Big Fields on the Tohono O'odham reservation assisted in preparing a 10' x 10' raised waffle bed. Daniel then planted Tohono O'odham watermelon, San Juan melon, O'odham domesticated devil's claw, and Tohono O'odham Ha:l (squash) in the waffle beds.

With the recent much-needed monsoon rains, these traditional Southwestern crops are coming along nicely. Now Linda Parker, Linda MacElwee, and I are planning the layout for more grow-out beds. Eventually, we will have a quarter-acre under cultivation.

But What About the NS/S Farm?

The farm lives! At least, the *idea* of a Native Seeds/SEARCH farm is very much alive, and we still have our antennae out for the right piece of land.

In the meantime, the Sylvester House is a stepping stone toward this larger and more comprehensive demonstration farm home. More important, the purchase of the Sylvester House has *quadrupled* our available gardening space. It will allow us to learn how to handle a larger grow-out until we work up to field scale with a farm. This experience should prove invaluable once we obtain farmland and can plant by the acre.

The Sylvester House also gives us an opportunity to test our planning and fund raising skills. The farm, when we finally locate it, will be an expensive and intricate project. At the Sylvester House we will learn as we grow, which will improve our odds for success later on.

Trees That Speak: Arizona Regis-TREE Honorees

An orchard on Big Bug Creek planted in the 1870s by "the Frenchman," a colorful gentleman murdered by claim jumpers; a prehistoric ruin at Lynx Creek with piñon pines, agaves and other examples of perennials used by inhabitants between 1150 and 1300 AD; fruit trees from abandoned mining towns and homesteads; and old ranch orchards planted by pioneers—these are among the 29 newest additions to the Arizona Heirloom Fruit & Nut Regis-TREE.

The Regis-TREE, begun in 1991, honors Arizonans who over the years have planted and cared for perennial plants that continue to enrich our lives. In addition to celebrating the efforts and knowledge of native peoples and early settlers, the Regis-TREE is a tool for those interested in conserving these plants. Gardeners, orchardists, researchers, and land managers can obtain propagation material from some of these often uniquely adapted heirlooms.

The large number of 1993 additions to Regis-TREE, announced in April, is due in large part to the efforts of NS/S intern Elizabeth Kaufman of Prescott College, who researched and photographed many of the entries.

If you know of an heirloom perennial plant that has been growing in Arizona since at least World War II, you can nominate it for next year's awards. A Regis-TREE plant may represent the last living collection of a preferred fruit variety, a historic tree, or even an unusually good-tasting stand of wild mountain berries.

Regis-TREE works with landowners or managing agencies to ensure that the genetic characteristics of the plants are preserved—on-site, if possible, but also by distributing cuttings or offspring. Landowners are awarded a certificate and a decorative tile plaque for on-site placement.

The Arizona Regis-TREE is a coalition of nine conservation groups, gardening clubs, Native American organizations, and botanical gardens. Native Seeds/SEARCH manages the program with support from the Pew Memorial Trust. For nomination forms, call or write NS/S.

1993 Arizona Regis-TREE Awards

Blake's Orchard. Remnants of a 1940s Patagonia orchard.

Bradshaw Apple Tree. An 80-year-old apple tree bearing red- and yellow-striped fruit in the Bradshaw Mts. near Prescott.

Caddy Hall Mulberry Tree. A giant tree at the historic Patagonia library.

Chauncey/Hereford Ranch. Now a YMCA camp, the old ranch has 1920s apricot, fig, plum, quince, pecan, and mulberry trees.

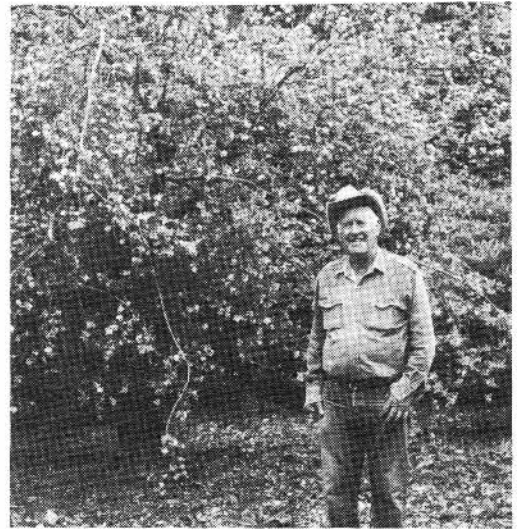
Cienega Camp/Yavapai Ranch. Apples, pears, plums, and peaches have been grown since the late 1800s at the ranch south of Seligman.

Davis Orchard. Planted in the 1870s by the "Frenchman," later murdered by claim jumpers, this orchard on Big Bug Creek near Poland Junction has many varieties of apples, pears, and peaches.

Dearing Ranch Orchard. Established in 1892 outside Prescott, these trees continue to bear apples, pears, and black walnuts.

Emory Oak with Cross. A huge Emory oak growing on Harshaw Creek near Patagonia with a 10" x 12" cross carved into its bark.

Evergreen Chinese Grapefruit. Planted in 1928 in Tucson, this pear-shaped fruit is often served at Chinese New Year.



Jack Turner with 1912 Jonathan apple tree from the MacFarland Orchard. Photo by E. Kaufman.

Flying Fork Ranch. The Brash family planted three varieties of pear near Patagonia around 1912.

Sosa/Carrillo/Frémont House Black Mission Fig. More than 100 years old, the tree graces the patio of this Tucson museum.

Gilliand/Galley Date Farm. Established in the 1920s just south of the Arizona Canal between 40th and 44th Streets in Phoenix.

Goodwin Apple Tree. Planted in 1929, the tree is a survivor of a mining town in Yavapai County that was bulldozed in 1965.

Hartson Ranch Apples. Growing along Butte Creek near Prescott, the trees remain from a ranch homesteaded in the late 1880s.

Harshaw Homesteads. Hardy varieties of apricot, pear, quince, and walnut planted by Harshaw families 60–100 years ago.

Long Beach Village. Pears, walnuts, plum and apple at a Hispanic village site settled circa 1913 along Granite Creek in Prescott.

Lynx Creek Ruin. Occupied 1150–1300 AD, site maintains perennials used by the inhabitants: piñons, agaves, and so on.

MacFarland Orchard. Two varieties of apples survive from a 1912 planting on this ranch near Patagonia.

Mayhew Lodge. Apples and blackberries still grow near the ruins of this lodge on the West Fork of Oak Creek near Sedona.

Mountain Elderberry. The fruit of this 50-year-old tree was used by settlers of the St. Johns area.

Orchard Ranch Pears. Now in an RV park near Prescott Valley, the trees survive from the Sharlot Hall homestead settled in 1900.

Oro Belle Fig. A fig thicket growing untended for 50 years near an abandoned mine in Bradshaw Mts. Cuttings grow in Phoenix.

Pendley Homestead/Slide Rock Park. A bountiful apple orchard on a 1907 homestead near Sedona.

Pioneer Sour Cherry Tree. A frost-tolerant food source since the 1870s for settlers of the St. Johns/Concho area.

Pokahuntos Orchard. Originally a mining claim and later a stage coach station, this apple orchard is on Big Bug Creek.

Sharlot Hall Museum. A 50-year-old peach tree is among the several fruit trees at this historic site in Prescott.

Sierra Prieta Junipers. Two magnificent trees near Prescott, believed to be 800–1200 years old, nominated by hikers who have seen similar trees cut for firewood.

Sphinx Date Garden. A grove planted in 1917 by Frank Brophy, Sr., in the Arcadia District of Phoenix.

Turkey Creek Apple Tree. A 70-year-old Yellow Delicious, untended for 20 years, at a homestead site near Goodwin.



Photo by G. Nabhan

International Diabetes Conferences Highlight Health Through Native Foods and Traditional Culture

By Mary Hoskin
NS/S Diabetes Project Consultant

How appropriate for the 2nd International Conference on Diabetes and Native Peoples to be held in 1993—the International Year of Indigenous People! The Conference, held last May in Hawaii, provided a wonderful opportunity for native people to network with each other and local health workers.

Increasingly, health systems are integrating local cultural practices into their diabetes programs. In one Hawaiian program, people with diabetes enjoy a 21-day immersion into traditional foods and culture, and then meet weekly to get support from each other and health workers in making lasting dietary changes. Australian Aboriginal groups have produced videos and artwork designed to promote lifestyle changes that include healthier traditions. We learned a lot from all these efforts.

Maynard Nutumya and Gary Nabhan participated in a panel discussing the issue of lifestyle change within an appropriate cultural context, and both did a great job! We hope that conferences like this continue to be held and thank Jenny Joe and the University of Arizona's Native American Research and Training Center for the work they put into making it happen.

Days before the Hawaii conference, Gary, NS/S board member Susan Kunz, and I were in Australia for an international conference of diabetes researchers and health practitioners sponsored by the National Science Foundation. This was a much more academic conference, where researchers presented new findings and theories on the disease. The University of Arizona Press will publish a selection of papers from this conference.

Health Workers and Educators
If you are planning a health event and want to know more about how "slow-release" desert foods can help your community, please contact the Native Seeds Diabetes Project at 327-9123.

By Felipe Molina
NS/S Diabetes Project Coordinator

The International Conference on Diabetes and Native People in Honolulu was a great success, with more than 500 people in attendance. Native peoples from Canada, the United States, Australia, and the Pacific islands were participants and presenters.

It was amazing to see and participate in a gathering of so many people who are interested in learning how to prevent and control the disease. It was wonderful to hear about the new understandings and diets that may eventually help stem the disease in indigenous communities.

Part of the conference's success was its true spirituality. The beginning of the conference was blessed in the four directions by the Hawaiian natives. Native people from other parts of the globe participated by bringing gifts and offerings to the host community. This part of the conference was essential because we, as native peoples, are close to the natural worlds—and the Great Spirit. No gathering begins without the proper rituals because they help people come together and talk from their hearts to reach a good understanding and agreement.

Tepary Beans O'dham Style

2 cups white or brown tepary beans
8 cups water
1 cup fresh green peeled chiles
2 cups enchilada sauce (optional as a substitute for chiles)
1/2 teaspoon chilepin peppers or red chili powder
1/4 teaspoon salt

Wash beans, and soak overnight. Bring to a boil in a large pot, then drain off water. Add fresh water to cover the beans by 2 inches. Cover and simmer for 4 hours (or cook in a crock pot on low for 6 to 8 hours). In the final hour of cooking, add salt, chiles, and sauce, if used.

New Hope for Diabetics: Slow-Release Foods Control Blood Sugar Levels, Boost Endurance

By NS/S Diabetes Project Staff

Most everyone has heard that a high-carbohydrate, low-fat diet helps to prevent heart disease and other ills. However, diets for people with diabetes cut back on carbohydrates, but often keep fats, says nutritionist Mary Hoskin, consultant to the NS/S Diabetics Project.

"The question is: Can diabetics tolerate a high-carbohydrate diet," says Mary. "Our answer is, yes, IF they limit the carbohydrates to beans and other foods that are rich in soluble fiber, starch, or other slow-release substances."

Beans and many desert foods like mesquite flour, nopalitos, cholla buds, acorns, plantago seeds (psyllium, the active ingredient in Metamucyl), and chia seeds are called "slow-release" foods because our bodies digest them slowly. We absorb them in a way that controls blood sugar levels and increases endurance. Long-distance athletes are able to keep up their endurance 20 minutes longer on average if they eat beans or other slow-release foods rather than potatoes or similar carbohydrates.

What are slow-release foods?

Slow-release foods rate low on the "glycemic index"—the only direct measure of the effect of a meal on blood sugar chemistry in the two hours after eating. Slow-release foods are those that raise blood sugar levels less than half as much as eating straight sugar does.

Technically speaking, sugar (glucose) is given a glycemic index value of 100, and other foods are compared with that. When the increase in blood sugar over the two hours following a meal is plotted on a graph, slow-release foods produce a relatively flattened curve of blood sugar increases. Foods for diabetic diets must be so slowly and evenly digested that the area under the curve of the graph line is 50 percent or less of the area produced when sugar alone is eaten.

Simply put, a slow-release food protects diabetics from erratic blood sugar levels, which can stress the pancreas and its insulin production.

Foods for controlling blood sugar

The chart lists the glycemic index values for some foods. Remember, eating foods with low numbers is good for controlling blood sugar. Slow-release foods are great for between-meal snacks. Several servings each day of high-soluble-fiber or slow-release foods can help you improve all aspects of controlling diabetes.

For more on slow-release foods and desert foods that can help control diabetes, send \$2.00 for our sample packet of diabetes information and recipe sheets. The packet is free to Native Americans. Mail your request to: Diabetes Project, Native Seeds/SEARCH, 2509 N. Campbell Ave. #325, Tucson, AZ 85719.

Glycemic Index Values for Some Foods: Eat Foods with Low Numbers to Help Control Blood Sugar.

	Glycemic Index
Legumes	
Soybeans	15
Mesquite flour	25
Kidney beans	29
Lentils	29
Tepary beans	30
Black-eyed peas	33
Garbanzos/chickpeas	36
Lima beans	36
Peas	47
Peas, frozen	51
Fava beans, canned	79
Fruits	
Cherries	23
Apples	39
Apple juice	39
Oranges	40
Grapes	44
Orange juice	46
Bananas	62
Raisins	64
Watermelon	72
Roots and Nuts	
Peanuts	13
Acorns (bellotas)	16
Sweet potatoes/yams	46
Beets	64
Potatoes, baked/boiled	70
Potatoes, instant	80
Carrots	92
Grains	
Oatmeal	49
Sweet corn	59
Brown rice	66
White rice	72
Cereal Products	
Spaghetti	50
Wheat bread	69-72
Corn chips	72

Published values from Jenkins and colleagues in Canada; Brand and colleagues in Australia

Southwest Food Literacy Quiz

By Doctor Hal E. Peña

Yes, friends and gourmands of all persuasions, NS/S's own desert *amigo*, Dr. Hal E. Peña, challenges you to a test of wits and knowledge of Southwest food lore. And that's not all! To the first entry arriving with the correct answers, as adjudged by the good doctor and his staff, we will award a "Chile Dogs" Chile Fiesta T-shirt.

Sharpen up your pencils and gray matter, and send in your entry today to Literacy Quiz, Native Seeds/SEARCH, 2509 N. Campbell Ave. #325, Tucson, AZ 85719. Be sure to include your name, address, and T-shirt size. Answers will appear in the next *Seedhead News*.

1. What four towns in the U.S. have had cafés that offer *enchiladas chatas* or *Sonorenses* with deep-fried corn patties instead of tortillas?

Benson Yuma Tucson New York City
Sells Mesa Deming Santa Fe Elwood, Ind.

2. What two wild foods historically have been harvested from packrat middens by Native Americans weeks after the season of their own direct harvest has ended?

Cholla buds Mesquite pods Piñon nuts
Yucca seeds Prickly pear Sunflower seeds
Saguaro fruit

3. What crop originating in Africa was traded from Mexico to Gila River Pima villages and was growing there when Jesuit missionaries first arrived?

Sorghum Black-eyed peas Watermelon
Millet Yams Cotton Coffee

4. *Tesquino*, a fermented beverage from maize, mescal, or fruit, may have pre-Columbian antecedents, but the word itself is of what origin?

Apache Spanish Arabic Norwegian
Tarahumar Quechua Huichol

5. Wild chiles growing in Mexico and the southern U.S. are given different names in particular regions. Match the name with the region.

Chilipiquin	Sonora
Chiltepic	New Mexico
Chiltepin	Coahuila
Cocori	Texas
Chile del monte	Yaqui Territory

6. What endangered species, thought to be extinct, was rediscovered when served up to a biologist dining at a Magdalena, Sonora, restaurant?

Sandfood Gila monster Masked bobwhite
Saiya Sonoran pronghorn Tarahumara frog
Southwest spotted owl Male chauvinist pig

7. What wild food is eaten with clay to make it more palatable and reduce potential toxins?

Rattlesnake Spadefoot toad Potatoes Datura
Buffalo gourd

8. In processing maize to make hominy, nixtamal, masa, or piki, what additives help release niacin and hold the color of the corn kernels?

Bean plant ash Lime Saltbush ash Oregano
Mrs. Burns' lemon basil Indigo

Short-answer questions:

9. What are the differences between Indian fry bread, popovers, and sopapillas?

10. What is one of the earliest Southwestern foods recovered from human feces in caves in the Rio Grande watershed?

Native Seeds Holiday Bazaar

Saturday, November 20, 10 am–3 pm

Mark your calendar now for this festive start to the holiday season. Visit NS/S at the Tucson Botanical Gardens for unique native foods baskets; Yaqui, Mayo, and Tarahumara arts and crafts; packaged desert foods, including parched corn, piñon nuts, dried cholla buds, hand-ground cornmeal, posole, beans, and more; plus books, books, books. Be sure also to stop by our demonstration garden for tips on winter growing.

Get Set for a Doggone Good Time at the 7th Annual *La Fiesta de Los Chiles*, Oct. 23 & 24

By Jan Waterman

Here comes the 1993 Chile Fiesta! This year's playful T-shirt design, "Chile Dogs" by Nancy Lenches, is just a hint of the fun to come. There will be chiles, chiles everywhere, fresh and roasted, potted and pickled, dried and delightfully dished up in a sizzling variety of ethnic delectables. Chile-lovers, this is **THE** event of the year!

Happening Saturday and Sunday, October 23 and 24, from 10 am to 5 pm, you will find familiar faces and new ones as well, dishing up a multisensory celebration of capsicum. We have a spicy mix of music lined up, including Khenany's Andean music, Ballet Folklorico, the Petey Mesquitey Review, mariachis, Hopi dancers, Norteño, salsa, and more! Check out the preliminary schedule below.

There will be "Chile Rap" puppets twice daily, clowns, and face-painting for children of all ages, chile education left and right, and a variety of fascinating demonstrations of chile crafts and cooking techniques. This year you can shop till you drop at 39 crafts vendors—plus the NS/S booths in full regalia—and then take a load off your feet feasting on chile-seasoned delights from 15 or more food booths.

For easy access to this popular event, we once again offer free shuttle service on roomy, air-conditioned buses from the parking lots of El Con Mall (northeast corner) and Catalina High School (south lot). Take the shuttle, and avoid parking headaches.

The *Arizona Daily Star*, Santa Cruz Chile & Spice Co., Macayo Mexican Food and Macayo Mexican Restaurants, Jim Click Automotive Banking Group, KQTL Radio, KIIM/KCUB Radio, *Chile Pepper* magazine, and Golden

Calling All Fiesta Volunteers!

We need you! We're looking for folks who can spare four hours either Saturday, Oct. 23, or Sunday, Oct. 24. Volunteers help with admission, selling T-shirts and chile plants, and much more. To volunteer for a busy "behind-the-scenes" experience of the Fiesta, call Nancy at NS/S, 327-9123. Thanks, and see you at *la Fiesta!*



"Chile Dogs," by Nancy Lenches. T-shirts will be on sale at the Chile Fiesta. Hot Dog!

Eagle join us this year as sponsors.

Admission is \$3.00 in advance, \$4.00 at the gate, and free for Native Seeds and TBG members.

Chile Fiesta Entertainment Highlights

Saturday, October 23

- 10:30–11 am BALLET FOLKLORICO MEXICA DE ANGEL HERNANDEZ.
- 11:15–noon SKIN AND BONES. Old-time music on fiddle, banjo, and Irish drum.
- 12:15–1:15 pm LOS UNICOS. Norteño music at its best.
- 1:30–2 pm HOTEVILLA HOPI CHILDREN DANCERS. Traditional Hopi dances.
- 2:15–3:15 pm SOUTHERN SCRATCH. Dance to Tohono O'odham Willa music.
- 3:30–4:30 pm PETEY MESQUITEY REVIEW. Earth-friendly songs with a Tex-Mex beat.

Sunday, October 24

- 10:30–11:30 am MARIACHI CIELO DE TUCSON.
- 11:45–noon HOTEVILLA HOPI CHILDREN DANCERS. Traditional Hopi dances.
- 12:30–1:30 pm DESCARGA.. Salsa and Latin jazz with Bob and Rafael Moreno.
- 1:30–3 pm KHENANY. Latin American music from Ciudad Obregon, Sonora.
- 3:30–4:30 pm HECTOR AND THE JAVELINAS. Dance music for the Fiesta finale.

Your Garden Reports



Illustration by Bill Singleton

From Larry Riggs, Boulder, CO

This is my second order this (spring) season. All the melons, gourds, and chiles that I ordered before came up and looked great—then somehow I managed to kill them. It was terribly depressing, but I want to try one more time. Wish me luck!

(Please let us know how your second planting turned out, Larry—ed.)

From Sunshine Brewer, West Alexandria, OH

Here are the results from the garden of Native Seeds I planted last year.

Buffalo gourds: Inside germination 80%; transplant survival 10%. Critters—mostly night feeders like deer, raccoon, and groundhog—enjoyed the leaves; unfortunately the gourds did not recover enough to flower.

Indigo: Inside germination 60%; transplant survival 3%. We had a bout of dry weather, followed by 27 days of rain. They drowned.

Apache dipper gourds: Inside germination 90%; transplant survival 50%. The plants weathered well and began producing many blooms. Unfortunately the rain caused fungus and bloom rot. We did bring eight gourds to full term. Average length 3 feet and plenty of seed. Thanks!

Sorghum: Germination 85%. We planted this in between Hopi Blue and Peaches-and-Cream corn. They weathered all storms well, and we stopped the deer with human urine around the edge of the field. Toward season's end, raccoons were riding the stalks down to reach the seed, but we had plenty. We have gifted native organizations in four states with this seed, fed the birds, saved enough for this season's planting, and kept our house mice happy.

Hopi Blue corn: Inside germination 90%; transplant survival 90%. We thought our spacing between corn varieties was sufficient, but the Blue crossed with Peaches and Cream. We plan to plant the seed to see if it will germinate and produce. Although the strain is tainted, the flavor of the fresh and dry corn is delicious.

Teosinte: Inside germination 87%; transplant survival 100%. We isolated this species, placing it with flowers, herbs, gourds, and greens. Flowers began to appear in September, and we harvested in November. No frost! Although we lost a considerable amount to kernel mildew, we have an abundance. I use this seed at my educational outings, showing children how to plant, care, and bring to seed this corn.

Rustica tobacco: Inside germination 30%; transplant survival 15%. Only three plants came to term, but they produced abundant seed. There will probably be plenty of volunteers, too. We have passed this seed to Native American groups. Most use horse manure as fertilizer; we use small fish.

We use no chemical anything, and most work is done by hand. I put up almost 2,600 jars of food stores in 1992, 80% of which was garden produced. I thank you for the start and look forward to new strains.

From Esther Moore, Lake Oswego, OR

I arrived in the rainy state of Oregon last January, prepared for wet, cold weather. Instead I found it very mild the entire year! I carried NS/S seeds with me and tended two plots about 400 square feet in size.

The first block of seed went in the ground at the last of May: **Cochiti corn, Texas Black sorghum, Tarahumara chia, Mrs. Burns's lemon basil, fava beans, and garbanzos.** All plants grew slowly at first, but as the weather warmed, they took off. The corn got a light feeding of organic fertilizer.

I harvested a good amount of the corn around the last of October, along with the sorghum. Because of heavy rains, the corn was taken before the husks were dry. The chia flowered too late for seed production, as did the lemon basil. The fava beans and garbanzos did poorly.

The second planting in mid- to late June consisted of assorted beans, such as **Calico lima, Hopi lima, and scarlet runner beans,** along with **Parral cushaw and Apache hubbard squashes and Mexican tomatillo.**

The squashes took off well, but were cut short by powdery mildew, which was exacerbated by overhead watering. The plants attempted a comeback, but it was too late in the season. I harvested about six Apache squashes. The limas appear to need too long of a season, but I will experiment. The tomatillo plants did not flower until very late in the summer. However, the plants produced *huge* fruits, which were harvested in early November after several heavy frosts. I should get lots of seeds from these.

Gardening in a Northwest climate is a new and challenging experience, especially with NS/S crop seeds. I plan to have fun doing it.

(Esther was Native Seeds's first gardener and paid staffer. For years, she brought into production the desert seeds NS/S collected. Many of the seeds we offer are the result of her ability to grow and increase seed stock—ed.)

Garlic-Growing Tips from the Ugalde Family

By K. Kendrick

Southern Arizonans, plant your garlic now, says organic market grower Frank Ugalde. The Ugaldes supply NS/S and local food stores with their delicious and decorative garlic braids.

“Garlic definitely has to get in the ground before the first freeze,” says Frank, “but I like to plant before September 1, if possible.”

Frank, a grandad with the heart of a 21-year-old—literally—took up garlic farming after a heart-transplant operation. He gets lots of help from his family—sons, granddaughters, cousins, and all. “We grow organically,” he told us. “We spread on cow manure for fertilizer, and when the grasshoppers go after the shoots we use soap spray or boil some garlic in water and spray.”

The Ugaldes’ specialty is a family heirloom garlic that Frank calls Purple Queen. He especially likes the keeping qualities and flavor of Purple Queen compared with other varieties. “They’re so purple that one lady asked me, ‘How do you paint them?’”

Frank plants the purple garlic cloves 2 inches deep and 6 inches apart. This year, he’s also planting elephant garlic cloves, which will go 3 inches down and a foot apart. Once planted, the garlic doesn’t put up shoots for about three months, and then it’s another six months to harvest.

Garlic doesn’t tolerate too much water and requires a sandy soil with good drainage. The Ugaldes harvest when the garlic tops are dry but still pliable enough to braid. The garlic braids keep for months if stored in cool, dry, well-ventilated spaces.

NS/S Garlic Trials

By Linda MacElwee
NS/S Demonstration Garden Manager

Last October we planted five varieties of garlic in the NS/S demonstration garden. One was the Ugaldes’ Purple Queen variety from Arivaca. The other four (Burgundy, Creole Red, Italian Red, and Spanish Red) were sent to us from Filaree Farms in



Washington. All five are believed to be the Southern Continental Type.

The Purple Queen jumped up within two weeks. The other varieties just sat there for at least three weeks and took two months to show all their green. The Ugaldes’ was definitely the strongest, biggest, and greenest of the bunch from the start. But by March the other four varieties had caught up, and by April the Purple Queen seemed past its prime stalk time. In mid-May, when all the stalks had turned brown and sat for a spell, we harvested.

Some of the Purple Queen bulbs were huge and streaked with red; all had well-developed cloves. While the cloves of the other varieties were in distinct sheathes, the bulbs were round and their skin was more like that of an onion. They were not as developed as the native variety. The Ugalde garlic also produced stem bulbils.

All five varieties tasted delicious—juicy and mild but potent.

It was interesting to compare the Arizona heirloom variety with the other regional strains. You get a sense of the time and continuous care it has taken for crops to adapt to our area’s unique climatic conditions.

Garlic Lovers’ Special

Spice up your kitchen, diet, wardrobe, and life with our Garlic Lovers’ Special!

While supplies last, Native Seeds/SEARCH is offering braids of organic Arivaca garlic straight from the Ugalde Brothers farm plus our stylish purple garlic braid T-shirt for the special price of \$16.50, plus \$4.00 in mailing charges.

The decorative garlic braids of the Ugaldes’ heirloom Purple Queen are more than two feet long and look great hanging in the kitchen. You won’t find the juicy, pungent flavor of this garlic in “store-bought” varieties.

The heavyweight cotton T-shirt features the garlic braid design at left and can be ordered in medium, large, X-large or XX-large.

Use the order form below, or stop by the NS/S offices on Tuesdays or Thursdays to pick up your garlic delights. Order today; supplies are limited!

Name: _____

Address: _____

T-shirt size: _____ Medium
_____ Large _____ X-Large
_____ XX-Large

Enclose \$16.50 for the garlic braid and T-shirt Garlic Lovers’ Special—a \$22.00 value! For a garlic braid alone, send \$10.00. Add \$4.00 for shipping and handling charges on all orders.

Highlights of Native Seeds' 1992 Annual Report

A new office in Albuquerque, a successful beginning for the Traditional Native American Farmers Association, the discovery of rust resistance in a Havasupai sunflower collected by NS/S, a campaign to raise awareness about the effects of "forestry development" in the Sierra Madre, and 11 Regis-TREE awards to heirloom fruit and nut trees were among the highlights of Native Seeds/SEARCH activities in 1992.



Plant pathologist Thomas Gulya tested some 300 varieties of sunflowers from USDA gene banks for their resistance to rust strains that are devastating commercial sunflower crops in Australia. The Havasupai cultivar, given to NS/S founders Karen Reichhardt and Gary Nabhan 14 years previously, was totally resistant to all the tested races of rust. NS/S put Gulya in touch with the Havasupai tribe for more information about their cultivars.

With funding help from the Wallace Genetic Foundation, New Mexico field manager Brett Bakker opened an office in the Albuquerque Peace Center. Brett collected new varieties from Pueblo farmers and maintained a one-acre grow-out site loaned to us by the Shepherd of the Valley Presbyterian Church.

The Traditional Native American Farmers Association got off to a successful start with a meeting in July of almost 50 farmers from 17 Southwestern tribes in Gallup, NM. The conference was a result of a survey initiated by NS/S in

1991 to determine what obstacles Native American face in the struggle to maintain their land, crops, and culture. Brett provides administrative support for the new organization from the New Mexico office.

The Diabetes Project worked to get out the word about using traditional desert foods to help control diabetes by producing new handouts on the benefits of cactus, acorns, and slow-release foods, sponsoring desert food gathering trips for children at Santa Rosa on the Tohono O'odham reservation, and attending health fairs, health camps and educational events in Arizona and New Mexico.

Native Seeds took a lead role in a campaign to collect and disseminate information about a proposed Sierra Madre "forestry development" project to be funded jointly by Mexico and the World Bank. *Seedhead News* articles helped educate and activate our members. NS/S also worked with the U.S. Forest Service to determine strategies for protecting wild chiles and other crop relatives at Rock Corral Canyon.

At the end of 1992, Native Seeds/SEARCH had 3,731 members, up 11%, including 246 Native Americans. Our two catalogs go out to 35,000 families annually, while the annual Fiesta do los Chiles in October draws nearly 10,000 visitors.

To receive a copy of the 1992 Annual Report, the 1992 audit and Form 990 report to the IRS, or both, call or write Native Seeds/SEARCH.

NS/S Native American Membership Triples

By Angelo Joaquin, Jr.

Thanks to a grant creating the Native American Outreach Coordinator position, membership in Native Seeds/SEARCH tripled from 150 to 454 from April 1, 1992, to June 30, 1993. Native Americans, representing more than 50 U.S. and Canadian tribes, now make up more than 10 percent of NS/S's total membership of 4,362.

Nearly half of the 454 Native American members claim affiliation with Arizona and New Mexico tribes. The Outreach Program targeted these tribes, for which NS/S seeds are most culturally significant.

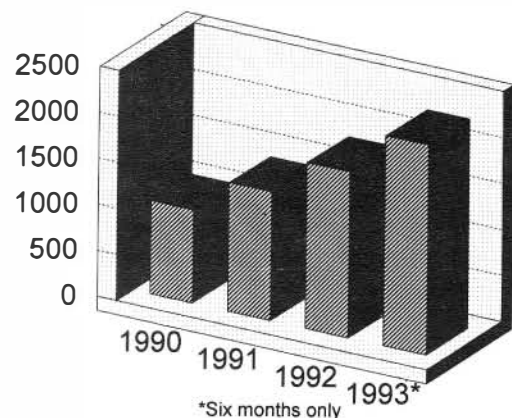
Tribe	NS/S Members
Cherokee	45
Tohono O'odham	44
Navajo	43
Pueblo	33
Hopi	25
Pima	22
Apache	19
Yaqui	15

Starter packs of seeds are distributed for free to Native American gardeners. During the 15-month grant period, the

number of free seed packets more than doubled to 3,557. The Native American Outreach program also gave support to community gardens on the Gila River Indian (Pima) and Pascua Pueblo (Yaqui) reservations and in Tucson and northern Arizona.

Kevin Lee López served as Native American Outreach Coordinator from April to August 1992, and current coordinator Angelo Joaquin, Jr., took over in November.

FREE SEED PACKETS TO NATIVE AMERICANS 1990 THROUGH FIRST SIX MONTHS OF 1993



MAYORDOMO

Chronicle of an Acequia in Northern New Mexico

(*Mayordomo*, by Stanley Crawford, recounts the seasons of an acequia, or irrigation ditch, in a northern New Mexico village and the lives of the people who depend on it. Author Tony Hillerman joined in the tributes for this book, praising it as "A beautiful work...full of humanity and kindness and understanding.")

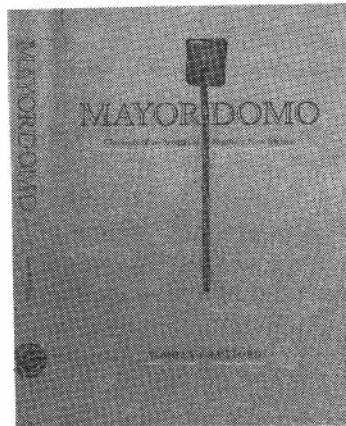
Native Seeds/SEARCH is proud to offer this wonderful book as a choice to those joining NS/S at the \$30 Family Membership level. See page 15 for a Membership Form. This selection from Mayordomo is reprinted with the permission of the University of New Mexico Press.

On the north side of the river, in the bottom-lands of La Jara, the cold air tends to pool and can often produce a frost even after a hot clear day, particularly on the heels of a storm. Only by mid-June is it finally safe to put out tomatoes and other tender plants. By then also late-planted winter squash and hard-shell gourds will break through the crust of earth at last, and the last days of the month will end in a race with weeds in fields and gardens—often to be lost at either or both ends of vegetable rows, in tangles of wild grasses and alfalfa and clover suddenly grown waist high. At this time in the summer the garden or field planted to row crops will seem less a whole than a series of disjointed parts, each crying out for individual attention: more water here, less there, fertilizer in this corner, cultivation here, but weeds, always weeds, seedling and full grown, everywhere. . . .

By July the flooding river has swept itself downstream to leave a quieter, clearer flow, and the memory of that other begins to fade, to offer the possibility that it might have been only a nightmare; another river has taken its place, a gentler mountain stream that seems unrelated to its torrential parent, clear now, not murky, murmuring and splashing, not roaring and booming, a stream that will soon let itself be walked across even by children. We are seven working on the banks and in the water up at the dam on the morning of the third of July, a bright clear day; the water is just warm enough now to wade and swim in without numbness. . . .

The bright morning grows rapidly hot and the nip of the water turns refreshing. The work progresses rapidly. Five feet at a time the crew extends the fragile barrier out into the flow, securing logs with rocks, chinking gaps with twigs and branches cut from nearby willows and junipers and held in place with more rocks, all the while laughing and shouting,

cracking jokes, shouting out commands and requests for more logs and rock and brush. The moment is luminous and transparent: boys and men working together in the dancing reflections of the water to build that most essential structure, the beaver dam. And at this sweeping bend in the river course overhung by clumps of cottonwood and a clear blue sky, with the still slanting sunlight on the glaring white ribbons of sand and bleached rocks along the banks, we work to the alpine sounds of rushing water and the clacking of rocks smashing against each other, the plaintive and spasmodic whine of the saw, the shouts and laughter, the rustle and splash of boughs being thrown and dragged into water; for this moment men become boys again and boys at last become men, as they assemble piecemeal what back-hoes and bulldozers with their powerful blades and buckets can do so much better—yet in another sense, can never do at all. And later perhaps we will remember only that we built a beaver dam to bring water to our gardens, in the way people have built them all over the world for thousands of years, and that we came home wet and aching and satisfied far beyond what we could explain to those who weren't there.



Members: Each One Reach One

We need your help! Our growth has been fueled by members like you. Some 4,000 families and individuals across the country (and, indeed, around the world!) now belong to Native Seeds.

This increase in membership parallels and supports the expansion of our seed bank and outreach programs. Now we need your help to keep on growing.

You know the benefits of Native Seeds/SEARCH membership: *Seedhead News*, a 10% discount on catalog items, free admission to the Chile Fiesta, the feeling of participation in helping to preserve native seeds.

If every current member brought in one new member, we could grow and distribute dozens of additional crops. Our organization would be stronger and better prepared to face the future. And we'd have a lot more friends acquainted with our work.

Here's how you can help:

1. Encourage your friends and family members to join. Show them the membership form on page 15.

2. Even better, give a gift membership. Help make birthdays, anniversaries, weddings, graduations, and other happy occasions even more memorable.

Please take this opportunity to share a good thing with someone you love. Thanks!

Book Review:

Nabhan Takes a Hike

Songbirds, Truffles, and Wolves: An American Naturalist in Italy. By Gary Paul Nabhan. 1993: Pantheon House, New York. 227 pp. \$22, hardback.

Reviewed by Kevin Dahl

What?! A new book from Nabhan that isn't about the Southwest or Native American agriculture? Something about truffles and Italy? What's going on?

A darned fine book—that's what.

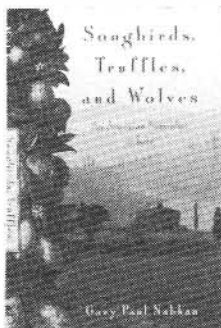
In 1990 Gary Nabhan walked 200 miles through the Italian provinces of Tuscany and Umbria with friend and expert saunterer Ginger Harmon. This traditional pilgrimage along the Franciscan Way to Assisi had more than one purpose, and the resulting book blends spiritual journal with ethnobotanical field notes. It explores the teachings of Saint Francis, "a historic figure who could do more for me than adorn my birdbath," and at the same times gives the reader a taste of the countryside—in much the same way we had a taste of gathering the desert in Gary's earlier works.

Seeking what wolves and wilderness might be left in the region where Catholicism's greatest environmental saint was born and taught, Nabhan also searches for "a fresh dynamic between culture and nature." Native Seeds/SEARCH readers will especially enjoy Gary's look at how New World crops impacted the Old World after the "Columbian exchange." He describes a market stall in Genoa, Columbus's reputed birthplace:

"Pomegranates, once rooted only in the Arabian peninsula." The monologue in my head ticked them off. "Cucumbers, cradled in India. Pears, nurtured in Asia Minor. Tomatoes, from the western watersheds of South America, diversified in Mexico. Avocados, dropping out of Central American trees"—and the stallkeeper caught me pinching them for ripeness.

Characteristically, the book reveals fascinating research (the genetic bond between fava beans, Italians, and malaria, for instance, or how using living maples for grape trellises protects the crop) and historic perspective (poppy seed bread as a remnant of times when the poor used bitter, often hallucinogenic, herbs and seeds to disguise the taste of "rustic breads made from stale or larvae-ridden flours and meals").

Enriched with what Frederick Turner calls Gary's "patient, penetrating insights," this book joins the ranks of the finest travel books in that it reveals much about both the country and the traveler's deepest concerns as he blends natural history and personal history. "Nabhan dissolves physical and cultural boundaries once again, reminding us to embrace a curiosity that tends the sacred," writes reviewer Terry Tempest Williams.



News & Notes

Sally Giff Pablo—To the great regret of all her friends and colleagues, Sally Pablo has had to resign from the NS/S Board of Directors because of ill health. A friend to Native Seeds since the late 1970s, Sally joined the Board in 1991. She has served for many years as a member of the Gila River Pima tribal council, taught the Pima language to elementary school children, and worked with her mother in demonstrating traditional food preparation ways. For many years, Sally kept alive an O'odham seed bank and also found time to write a chapter on the Gila River Pima for the Smithsonian's *Handbook of North American Indians*. Sally's quest for knowledge and respect for tradition will be sorely missed on the Board.

Many thanks to the CS Fund for their Sylvester House challenge grant and to Smith and Hawken for its donation of finely wrought garden tools to the Sylvester House. We are grateful to the Jessie Smith Noyes and McCune Foundations for their support of the Traditional Native American Farmers Association and to the Foundation for Deep Ecology and the Valentine Foundation for supporting the work of Native Seeds/SEARCH. Volunteers and staff at our crowded office also want to thank Al Petrie for building the picnic table that is in constant use for seed cleaning, informal meetings, and potlucks.

Staff Changes—Denise Masayeva and Maynard Nutumya have returned to Hopi to take jobs in their homeland. Both have been an integral part of Native Seeds for the past several years. Denise served as seed curator's assistant, helped with diabetes education, and took on administrative tasks as well, while Maynard helped extend outreach for the Diabetes Project. Many of the Hopi seed offerings in our catalog come from the fields of their families and neighbors. Their friendship and willingness to share their culture have enriched our lives. Our sadness at their leaving is tempered by joy for their upcoming marriage and the knowledge that they will continue to work with NS/S on special projects.



Denise and Maynard

Special Offer

For a limited time, autographed copies of Gary Nabhan's *Songbirds, Truffles, and Wolves* are available from Native Seeds/SEARCH for \$22, plus \$1.50 shipping. NS/S members receive a 10% discount on the book price.

Native American Outreach Coordinator Angelo Joaquin, Jr., has donned another hat as Diabetes Project Director. Mary Hoskin, who oversaw the program's rapid growth, will serve as consultant. Native American Intern Bob Stone has added the job of managing the Sylvester House gardens to his repertoire.

Ads for *Seedhead News*—Do you have a rototiller, a bounty of fresh vegetables, gourds, or soil amendments you want to sell? Do you want to publicize your business to NS/S members? Advertise in the *Seedhead News*! We are now accepting ads on a trial basis. Classified ads for individuals are \$10 for 15 words; you must be an NS/S member to advertise. For a rate sheet for business ads, call or write Native Seeds/SEARCH. All ads are subject to screening by NS/S. No personal ads will be accepted.

5th Annual Seeds of Change Conference will take place in San Francisco, October 15–17. Titled “The Bioneers: Practical Solutions for Restoring the Environment,” the conference will focus on biodiversity and bioremediation. Speakers include Native American conservationist Winona LaDuke and California Assemblyman Tom Hayden. Presenters include ethnobiologist Wade Davis, *Altered Harvest* author Jack Doyle, Ocean Arks founder John Todd, Artemis Project director Claudine Schneider, and microbiologist William St. John. Conference cost is \$180. For more information, call 505-989-8575.

Seed Exchange—If you have NS/S seeds you would like to trade with another member, we will list them in our Seed Exchange Forum. Send a list of the seeds you have to trade and the seeds you want in return, along with your name and address, to Seed Exchange, *Seedhead News*. We will publish your note, and gardeners who want to trade seeds with you can contact you directly.

Sierra Madre Update—As we went to press, the joint World Bank/Mexico “forestry development” project in Mexico’s Sierra Madre remained on hold. We will keep you informed of further developments in upcoming newsletters.

Native Seeds Holiday Bazaar

Saturday, November 20, 10 am–3pm

Don't forget this festive occasion and one-stop holiday shopping opportunity. Visit us at the Tucson Botanical Gardens for unique native foods baskets; Yaqui, Mayo, and Tarahumara arts and crafts; packaged desert foods, including parched corn, piñon nuts, dried cholla buds, hand-ground cornmeal, posole, beans, and more; plus books, books, books. Take time also to stroll the NS/S garden for tips on winter growing.

The Seedhead News

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Native Seeds/SEARCH

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Membership Form

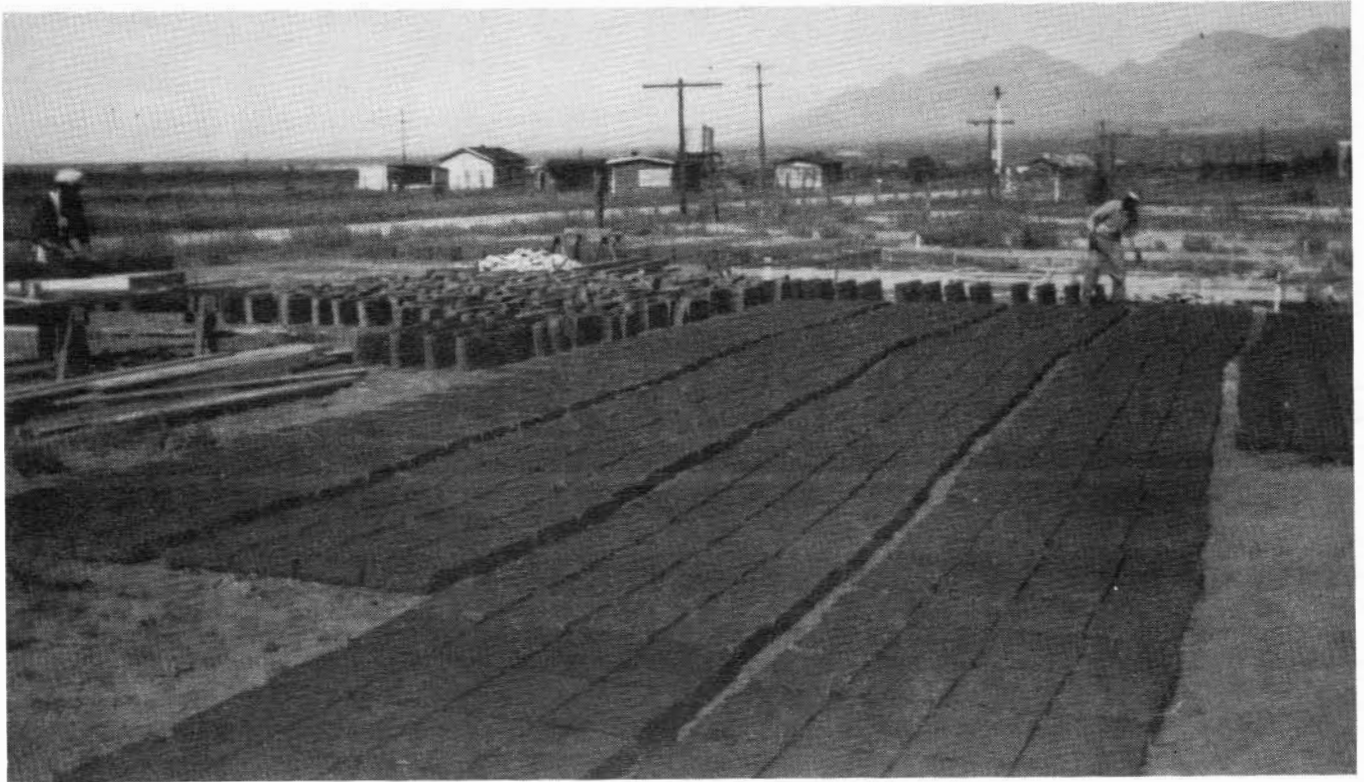
Check one: Renewal; New member; Gift
 Associate (\$18 per year)
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choice: *Mayordomo* *Yaqui Deer Songs*
 Sustaining (\$75 per year) receives both books.
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 Native American (free; please provide tribal
affiliation: _____)
 Donation to Sylvester House \$ _____

Name(s): _____

Address: _____

City: _____ State: _____ Zip: _____

Phone: _____



Adobe making at the Sylvester property, probably in the early 1920s. Alvernon Road runs north toward the Santa Catalina mountains. A building site has been staked out behind the man at center, most likely on the present site of the Tucson Botanical Gardens. Art Sylvester built most of the buildings on that property.

**Native Seeds/SEARCH
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