In recent years, conservation easements have become increasingly popular tools for land protection. Easements are most often created in order to offset environmental impacts of projects or to help conserve working lands—those used for agriculture, ranching, or timber production. However, little information has been collected on how well easements serve the goals of habitat protection.

A conservation easement is a legally binding agreement between a landowner and a private organization or public agency. In the agreement, the owner typically retains the right of private ownership, but agrees to restrict development rights on the property in order to protect its natural resources. Not surprisingly, conservation easements almost always reduce the land’s market value.

Developers have found easements to be a handy and often economical means of ensuring that their projects are acceptable to local government, by agreeing to set aside land from development in exchange for allowing the project to be built. Ranchers are discovering that easements can provide tax incentives, and so are more willing to set aside portions of their property free from development.

But do conservation easements actually succeed at protecting our native flora? Is there any quantitative data that supports this strategy? Are agreements being honored by all parties? What do we need to know about them in order to evaluate their usefulness? Are easements an acceptable mitigation option in all cases?

The East Bay Chapter’s Conservation Committee has begun to look at the process by which easements are created so that we can more effectively implement our conservation strategy. We are investigating both the regulatory framework that permits easements, as well as actual case studies in which easements have been created.

The impetus for this study came from a proposed subdivision in a city in our chapter area where a federally endangered plant species occurs. Those participating in the review... (continued on page 6)

Initiative Underway to Define and Conserve Rare Plant Communities

By Donna Shorrock

For over 15 years, CNPS has been classifying natural vegetation and tracking its location and extent through its Vegetation Program, initiated by Drs. Michael Barbour and Todd Keeler-Wolf and others. Since then, work has continued in identifying and mapping vegetation. Now we are expanding this work to focus upon rare vegetation types, or plant communities.

The logic behind documenting vegetation, in addition to individual plant species, is based on the fact that a plant community is an association of species that interact in a shared, physical environment. As such, the response of vegetation to environmental changes can serve as an indicator of the overall health of the ecosystem and the species contained within it.

It is also within vegetation, or plant communities, that one can measure biological diversity. This typically includes the number of different native species, the variety of different habitats, the variety of interactions between species, and the range of genetic variation among individuals within a species. When conservation efforts look only at individual species, none of these other elements are preserved.

(continued on page 6)
From the Executive Director

Wildflowers in the Desert

In the spring my 11-year-old daughter and I had the opportunity to visit Joshua Tree National Park for the first time ever, and what a memorable experience we had.

Thanks to a generous invitation from the Los Angeles/Santa Monica Mountains Chapter, we explored the southern portion of this desert park for three days in the company of many other CNPS members. According to Steve Hartman, our field trip leader, this year’s wildflower season was one of the best in years. Lucky us!

The desert was stunningly beautiful with wildflowers everywhere we looked and their fragrances filling the air. Carpets of purple lupine, golden poppies, blue chia, purple mat, sand verbena, wild Canterbury bells, desert marigolds, and desert stars decorated the flat valleys, sand dunes, and rugged mountains. We also enjoyed ocotillo, jojoba, and chuparosa that were also in flower.

During our meandering walks and while others were looking at the most intimate parts of the plants, my daughter and I had fun looking for animals and interesting rock formations. We found many lizards and insects, a few birds and jack rabbits, and several desert wood rat nests. Chuckwalla lizards were particularly conspicuous and uninhibited.

I also took pleasure in getting to know some CNPS lifetime members. I was especially thrilled to be in the company of Sally Casey, CNPS Fellow, recent Volunteer Service Award recipient, and a founding member of the Santa Clara Valley Chapter. At 85 Sally is full of life, and her love of nature is readily apparent. She also generously shared her knowledge of plants with us. Sally represents what the Society is all about—caring for and sharing with others the knowledge and enjoyment of California’s native flora.

Amanda Jorgenson
Executive Director
When you read this, the legislative session will be well underway. Overriding much of the activity within the Capitol will be the daunting task of adopting a state budget and the 2008 election.

Even after significant cuts to the current year’s base budget, the State faces a deficit of close to $15 billion in the 2008/09 fiscal year that begins July 1, 2008. The big decision facing the Legislature is whether to accept the Governor’s 10% across-the-board cut to all programs or try to allocate cuts to lower priority programs.

Lots of legislation important to native plants is before the Legislature this year. Some bad legislation has already been defeated, including SB 1295, which would have undermined the ability of the Coastal Commission to protect coastal resources, and SB 1618, which would have encouraged clearing unreasonably huge defensible spaces in a futile attempt to prevent wildfires from burning structures.

Two fire-related bills that CNPS is supporting are by Senator Kehoe of San Diego. SB 1595, drafted with the assistance of CNPS volunteers, will encourage responsible management of fire fuels, both vegetation and man-made, and retrofitting of structures to minimize ignition threats. It will statutorily recognize the lessons learned in recent years about the ability of blowing embers to perpetuate fires.

A second bill, SB 1617, will levy a fee on homeowners in areas where the State is responsible for fire fighting, to cover a portion of the fire fighting cost. Not only will this free up general fund revenues for other important programs, but it may also provide a small disincentive to build in wildland areas.

To learn more about these bills and other important legislation, go to the CNPS website (www.cnps.org), click on “Conservation,” and then on “Legislative Activities.”

Vern Goehring
CNPS Legislative Consultant

What Grows Here?
A new resource for CNPS field trip leaders

“W hat Grows Here?” (WGH) is a new feature of the Calflora website (www.calflora.org), which you can use to map and view lists of native and weedy plants in a specific California location. WGH makes it as easy to find out what plants grow in a particular location (thus “What Grows Here!”) as it has always been to use Calflora to discover in what locations a plant grows.

To use WGH you simply enter a location—a zip code, town, park, CalWater watershed, or any one of over 10,000 California place names—to open a map that you can zoom in and out of, highlight different features (towns, peaks, creeks, watersheds, open space, and so on), and then click a button to view an illustrated table of the plants that have been observed in the mapped area.

One way we’d like to see CNPS chapters start using this feature is to include links to WGH maps next to field trip announcements on their websites. Using these links, field trip participants can preview and even print lists of the plants that they’re likely to see. Better yet, for less well-surveyed areas, participants can add to these lists and submit them to Calflora, thus building the shared record of observed plants throughout the state.

We’ve created a Calflora page (www.calflora.org/cnps) dedicated to helping CNPS chapters use Calflora to further their missions, and where you can learn a bit more about using WGH (as suggested in this article) and view some samples.

As always, we’re delighted to answer any questions or help you get started using Calflora in your chapter work. Please get in touch with us at support@calflora.org. And don’t forget, Calflora is always free to amateurs and to anyone doing volunteer work.

Roy West
Calflora Director
SAN GABRIEL MOUNTAINS CHAPTER
Membership Success

The San Gabriel Mountains Chapter has been able to increase its membership by 40% over the past two years, from 154 members in February 2006 to 216 in February 2008. We believe that our success has come from a combination of making people feel very welcome at our program meetings and outings, offering a variety of program topics, and conducting a membership drive during our annual plant sale.

At our programs we personally greet and welcome people, and encourage first-time attendees to get a name tag and leave their e-mail address. We send out program reminders to all and prepare computer-printed name tags with our chapter logo, so by their second meeting, everyone (member or not) has a welcoming name tag. We encourage name tags for all attendees including long-time members.

At our fall membership drive and plant sale we offer a 10% discount on all plants, seeds, books, CDs, and T-shirts to all active members, including those who join that day. This provides an incentive for members to keep their memberships active. A volunteer greets all sale visitors at the door to tell them how the sale is organized and about the 10% discount.

The membership table is located strategically just before the cashier’s table. While in line, customers are given free outreach materials and peruse samples of Fremontia, the CNPS Bulletin, and our chapter newsletter. Whoever is staffing the table interacts directly with them, telling them about the 10% discount and the opportunity to support a worthwhile cause. We stress the important work CNPS does in conservation, horticulture, education, and plant science.

Cliff McLean, Membership Chair
San Gabriel Mountains Chapter

SANTA CLARA VALLEY CHAPTER
The Benefits of a Chapter Retreat

On a clear weekend in early November 2007, the Santa Clara Valley Chapter held a three-day chapter retreat at Pigeon Point Lighthouse Hostel on the San Mateo County coast.

Our chapter retreat was born out of a growing need we had been noticing at our chapter board meetings—a desire to have extended conversations about our chapter’s future. The retreat provided an opportunity for board members to gather in a gorgeous setting, step away from our routine business, and allow our collective imagination to travel forward in time.

Everyone who attended had something to add to our vision of the future, and the feedback we received from participants was universally positive. We gathered a wealth of information and ideas that weekend, which we are using to help navigate our chapter into the next decade.

We now envision a much larger chapter membership, one that embraces and encourages a wave of backyard restorationists, and that includes more members from academic and environmental organizations. We have also begun to create more and different marketing materials that have the CNPS “name brand” on them; items such as water bottles, gardening equipment, and mouse pads are being tested.

The retreat also afforded us a wonderful opportunity to strengthen our bonds with one another by spending a weekend with our CNPS “family” members. We now plan to have a board retreat every two years.

Kevin Bryant, President
Santa Clara Valley Chapter

Scenic Pigeon Point Lighthouse, where members of the Santa Clara Valley Chapter gathered for a retreat last year.
New Benefits for CNPS Members

As a CNPS member you already know about benefits you receive such as this newsletter and the journal Fremonia. But did you know that you can also receive a discount at certain local nurseries? These are among a host of partner organizations—some local, others regional or statewide—that are offering special new benefits to CNPS members.

Starting in 2008, CNPS will begin issuing membership cards to new and renewing members. The membership card will arrive as part of a postcard, to be cut out and carried in your wallet or purse. When you visit a partner nursery or business, simply show your membership card to receive the benefit.

To see a current list of participating organizations and merchants, visit www.cnps.org/membership. The list is updated continually, so check back from time to time. When you patronize these businesses, thank them for their support of CNPS.

Warranting special mention here are significant discounts for two leading publications—$6 off the annual subscription to the highly respected magazine, Pacific Horticulture, and $4 off the award-winning quarterly, Bay Nature.

When will your membership card arrive? New members will receive it when they join, and renewing members at the time of their next renewal. Can’t wait to get your membership card? Renew early and you will receive your card right away.

Is your favorite nursery, store, or botanic garden missing from the list? Help expand it by volunteering to contact them and enlisting their support. Email arvind.kumar@cnps.org to receive supporting materials including sample letters and agreement templates.

Arvind Kumar
CNPS Membership Chair

In Appreciation: Natalie Ames Hopkins
Plant cataloger, and mentor to young women botanists

Natalie Ames Hopkins, a long-time supporter of CNPS, passed away on April 15, 2007, at the age of 87.

Originally from Massachusetts, Natalie and her family settled in San Jose, California, at the end of World War II. Her love of nature and native plants emerged from her experiences in the northern Sierra Nevada, wild seashores, and coastal mountains of California.

In her late forties, Natalie went back to college and obtained a B.A. in botany and M.S. in biology. She worked as a volunteer in the San Jose State University Herbarium with her mentor and CNPS Fellow, Carl W. Sharsmith, where she initiated and led the effort to digitally catalogue 15,000 plant specimen sheets. Following the death of Dr. Sharsmith, Natalie became curator of the Sharsmith Herbarium where she served until 2000.

Natalie was a founding member of the Santa Clara Valley Chapter. She served as its second president and on the state CNPS Board of Directors. As a botanist and ecologist active in native plant conservation for the last four decades of her life, she mentored younger women in pursuit of careers in botany, many of whom became leaders within CNPS.

Natalie also included CNPS in her estate plans. In December of 2007, CNPS received a letter from her son Thomas Hopkins, with a check for $50,000. Her family and many academic and CNPS friends want her bequest to be used to establish a Natalie Hopkins Education Fund to support women students and researchers in pursuit of native plant studies. We are grateful to Natalie and her family for their generosity.

Amanda Jorgenson
Executive Director
Conservation Easements

of this development project included city planners and elected officials, the developer and his consultant, the California Department of Fish and Game (which regulates the conservation easements), attorneys who were consulted in the case, and individuals within CNPS.

As we participated in the public response and carried our concerns back to CNPS, we discovered that there were large unanswered questions and considerable disagreement about how the process should work.

• Did the conservation easement facilitate or circumvent the environmental review process (CEQA)?
• Was it an appropriate and sufficient mitigation for the project, and if so, when and how should it be implemented?
• Are urban, fragmented populations of endangered plant species doomed even when on land that has been set aside specifically to protect them?
• Economically does it make more sense to purchase land outright rather than to set up a conservation easement?
• Does the easement effectively protect high-quality plant habitat and sensitive plant species?

In an upcoming issue of *Fremontia*, we hope to answer these and other important questions. As we gather this information, we welcome input about your own local experiences, which can be sent to Lech Naumovich, conservation@ecnps.org, and Laura Baker, Lbake66@aol.com.

Laura Baker is currently corresponding secretary and conservation committee chair for the East Bay Chapter.

Lech Naumovich is the conservation analyst for the East Bay Chapter. This paid position is funded through donations from chapter members.

Rare Plant Communities

In the face of ongoing development and unknown consequences resulting from climate change, it becomes ever more important that we develop effective conservation tools that will systematically aid practitioners in identifying and protecting rare vegetation types. Toward this end, CNPS recently formed an advisory committee whose expertise is guiding the development of defensible and systematic procedures to identify, map, rank, and disseminate information.

Once completed, local chapters will be able to use these procedures to define and conserve rare vegetation types. An additional goal of this program is to publish a white paper that identifies problems facing rare vegetation. It will also outline approaches to document and rank rare types with an aim at influencing land preservation and management.

Dialogue and collaboration with chapter members and agencies will be essential in this process, and we are also seeking grant support and private donations. If you can contribute any of your time and energy, or lend financial support to this important work, please contact Julie Evens at jetens@cnps.org.

Donna Shorrock is a vegetation ecologist at CNPS with a background in wetlands and a love of all vegetation types.

Maritime chaparral is a rare vegetation type restricted to areas along the coast that are heavily influenced by fog. It is characterized by a variety of manzanita species, and is threatened by fire suppression and increased fragmentation from encroaching development.

Riparian stands along the east side of the Sierra Nevada include rare vegetation such as water birch (*Betula occidentalis*). Sensitive montane riparian vegetation types are susceptible to changing climatic conditions and resulting water availability.
Gardening With Natives

A garden is more than just a collection of plants

BY BARBARA EISENSTEIN

I am a plant person with a special passion for California natives. I can hardly restrain myself at CNPS chapter plant sales. Seeing salt bush (Atriplex lentiformis) I wonder how it will look in my yard. Will gum plant (Grindelia stricta) produce pretty yellow flowers on those green, rubbery cups? Will my mountain mahogany (Cercocarpus betuloides) be covered with seeds sporting graceful, sinuous tails that shimmer in the late day sun? The only way to know is to try each one. Yet this approach can leave a garden looking cluttered and disorganized, lacking the harmony of natural settings. A garden, after all, is more than just a collection of plants.

Hardscape—paths, surfaces, fountains, steps, and so on—forms the canvas on which garden plants are displayed. It defines space and provides structure. Rocks can be an important hardscape element, serving many purposes in gardens. They can provide a backdrop against which flowers, leaves, or branches stand out. They can be used to create paths to carry people from place to place. They can lead the eye along a meandering route that slows it down and helps it focus on different areas. A large rock can be a focal point in itself. Small rocks, pebbles, and decomposed granite make excellent, permeable walking surfaces. Desert, chaparral, and scrubland gardens benefit from the use of rocks and pebbles as inorganic mulch. Properly placed rocks can simulate dry stream beds. Rock walls have long been used to separate areas and define garden boundaries.

In nature nothing is more beautiful than the interplay of plants and rocks. Whimsical-looking giant coreopsis (Coreopsis gigantea) grows among the orange-beige granite of the Santa Monica Mountains. Coralbells (Heuchera elegans) spill over sinuously-lined gneiss of the San Gabriel Mountains. Small, delicate annual wildflowers peak up through gravel-sized decomposed granite in Death Valley. Each of these natural arrangements can be reproduced on a small scale in a garden setting.

The successful use of rocks in the garden requires an understanding of how they get where they are in nature. Large, abrupt geological events can move rocks in an apparently haphazard fashion, mixing boulders of all different sizes. This is seen in talus slopes resulting from frost heaving and landslides. Rivers and streams subjected to periodic, violent floods can also display a mixture of boulders and stones. The arrangement of rocks in a dry stream bed is the result of moving water, sometimes raging with enough power to transport boulders the size of cars, and other times carrying smaller rocks and pebbles in its gentle current. Still, in all of these sites the placement of the rocks is the consequence of physical events and conditions. The rocks come to rest where they must, their arrangement being anything but random.

Rocks can also appear in orderly arrangements. A parallel alignment of rocks in outcrops can result from large-scale geological movement, such as the uplift that has created the mountain ranges of California. The dip and strike of parallel rock structures provides scientists with information helpful in the reconstruction of the geologic history of these areas. Again, copying natural settings like these through the careful placement of rocks results in a believable and aesthetically pleasing landscape.

Walk along dry and flowing streams, visit foothills and mountains, observe glaciated terrain. Take notice of the natural arrangement of rocks. The more one observes these settings, the better one will be at creating harmonious gardens. And while you are scrutinizing the rocks, take a look at the plants. Notice spacing, diversity, repetition, and relationships. The most beautiful gardens borrow design elements from Mother Nature.

Barbara Eisenstein is the horticulture outreach coordinator at Rancho Santa Ana Botanic Garden. She arrived in California ten years ago and fell in love with California and its extraordinary flora.

Research Grants Available

Each year the CNPS Educational Grants program receives funding to help support field research related to California’s native plants. Students, CNPS members, or postdoctoral botanists are eligible, in that order, for grants that are generally not more than $1,000.

Proposals should involve taxa or plant communities that are of concern due to direct or indirect potential impacts and be relevant to our conservation mission. Certain small endowed funds are available specifically for graduate students planning research involving rare plants or evolutionary botany.

For a copy of the grant guidelines, email your request to Joan Stewart at tori2toli@ocsnet.net. Completed proposals must be received in the CNPS office no later than September 30, 2008.

Joan Stewart, Chair
CNPS Educational Grants Committee

CONSERVATION CONFERENCE

January 17–19, 2009
Sacramento Convention Center and Sheraton Grand Hotel, Sacramento, California

Early Registration: July 1-October 31, 2008

Keynote Speakers:
Jerome Ringo, Past Chairman of the National Wildlife Federation
Stephen Hopper, Director of the Royal Botanic Gardens, Kew
John Muir Laws, Sierra Nevada Naturalist, Artist, Author, and Educator

The “CNPS 2009 Conservation Conference: Strategies and Solutions” aims to bring together over 1,000 scientists, conservationists, university students, public policymakers, professional and amateur botanists, and local and regional land-use planners from all regions of the state and beyond to share and learn about the latest developments in conservation science and public policy. This conference will be the largest of its kind devoted to California botany and landscape conservation. Its purpose is to identify and promote strategies and solutions to California’s conservation challenges and to celebrate its diversity.

To register and to find out more about conference topics, keynote speakers, and sponsorship and volunteering opportunities, see www.cnps.org.

Next Chapter Council Meeting

(SEPTEMBER 5, 2008)

HOST GROUPS: NORTH BAY CHAPTERS

(Details available at: http://cnps.org/cnps/admin/cc/index.php)