

Run, Rabbitbrush, Run

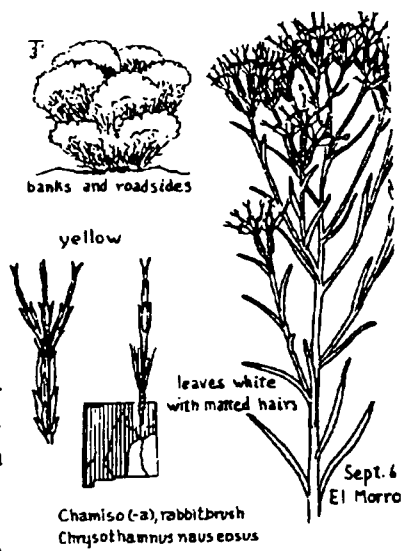
by Roger Peterson

Aster, Chrysopsis, Chrysothamnus, Eupatorium, Franseria, Haplopappus, Hymenoxys, Kuhnia, Perezia, Verbesina...

Familiar composite names are in trouble.

In relentless pursuit of "monophyly" taxonomists carve and combine traditional groups of plants and animals. A "natural" or "monophyletic" group not merely contains only species that are related to one another but contains all descendants of a given ancestor. Thus the traditional "Reptilia" is no longer considered natural because it omits birds, which descend from dinosaurs and therefore belong with reptiles. Similarly "Algae," "Gymnospermae," and many others of the older biology books are either polyphyletic (comprise more than one genealogical line) or paraphyletic (leave out a line that should be included).

Students of Compositae (Asteraceae) seem to be having a particularly wild time these days in their attacks on the sins of poly- and paraphyly. Bill Weber of the University of Colorado for years has been replacing familiar, big genera with strange sounding little ones, many of them created by american botanists a century ago but long dis-used. For instance he thinks that the name *Aster* properly applies to a couple of Mediterranean species; our species belong in *Chloracantha*, *Symphotrichum*, *Machaeranthera*, and others. Guy Nesom of the University of Texas reviewed *Aster* in 1994 and left no New World species there; most went to *Symphotrichum*.



In these new accounts, our *Chrysopsis* species merge with *Heterotheca*, *Franseria* with *Ambrosia*, *Kuhnia* with *Brickellia*, *Perezia* becomes *Acourtia* and *Hymenoxys* species go to *Tetaneuris* and *Picradenia*. *Haplopappus* disappears in some treatments, its species distributed to *Ericameria*, *Hazardia*, *Isocoma*, *Machaeranthera*, *Oreochrysum*, *Pyrocoma*, and *Stenotus* and (its anagram) *Tonestus*, although some authors keep a few species in *Haplopappus*, the ones similar to *H. gracilis*.

Chrysothamnus is a battleground. A comfortable, easy-to-understand treatment by Loran Anderson in 1986 included 16 species and 41 subspecies, many of the latter reduced from species, others raised from varieties. In 1993 Guy Nesom and Gary Baird of the University of Texas transferred four species including *C. nauseosus* and *C. parryi* with their many subspecies to *Ericameria* (formerly the home of turpentine bush, *Ericameria laricifolia* or *Haplopappus laricifolius*) and recognized Anderson's subspecies as varieties (grouped under a few subspecies). The dean of compositologists, the late Arthur Cronquist, in a 1994 work, also recognized varieties, not all the same as Nesom and Baird's, and put them back in *Chrysothamnus*. Anderson in 1995 wrote that if some *Chrysothamnus* species belong in *Ericameria*, they all do, and transferred the other 12. Nesom and Baird replied that this was wrong; the 12 are more closely related to *Stenotus*, another *Haplopappus* segregate that, according to these authors, belongs to a different subtribe from *Ericameria*, the *Solidagininae*.

Until things settle down, we may have trouble navigating. For instance in his wonderful new Third Edition of *Flowering Plants of New Mexico*, DeWitt Ivey steers a middle course between novelty and conservatism, but the plant that you may know as jimmyweed (*Haplopappus heterophyllus*) is found as rayless goldenrod (*Isocoma pluriflora*); spotted knapweed is still a *Centaurea* but Russian knapweed is in *Acroptilon*; *Dyssodia* species other than *D. papposa* will be found 27 pages away under *Thymophylla*.

Enthusiasts these name-changers may be, but not nuts. They have evidence. Following any of their treatments can be defended. Unlike birders, botanists recognize no authority that can sanction particular names over others; it's every man and woman for himself. Common names have never looked so good.

Inside...

Bush Muhly for the Landscape	3
Calendar	4
Losing Species, Languages	5
New Plant Found	8

Environmental Center Provides Voice for Environment in Southern New Mexico

Kevin Bixby, Director

Premised on the belief that good public policy depends on the involvement of an informed citizenry, the Southwest Environmental Center is dedicated to educating the public about important environmental issues in southern New Mexico and empowering people to take action on behalf of the environment.

The Center opened its doors at its current storefront location in Las Cruces 1992. It was started by a group of environmental activists, some aligned with various organizations such as the Native Plant Society and Sierra Club, others working alone, who saw the advantages of having a place where groups and individuals could interact with each other, the public, and the media on a regular basis. Their hope was for the Center to become a focal point for environ-

mental activity and information, a "beachhead" for an environmental ethic in the region. Intended to be a community resource, used and useful, the Center's offerings include a library, teachers' resource center of classroom materials, informational displays, a small store selling books, t-shirts, bird feeders, etc., and meeting space and office space. The Center is open to the public. Members are entitled to a 10 percent discount on purchases, and may check out materials from the library.

The Center holds programs and outings on various environmental topics. Coming in April, for example, is an evening lecture series, "Introduction to Alternative Building Technologies for Homeowners and Builders," covering everything from straw bales to tires. Beginning in March is a series of Saturday morning outings focusing on natural history in the Las Cruces area, starting with a trip to the Robledo Mountain pre-dinosaur trackways.

The Center has also taken the lead role on a number of issues. It is promoting a citizen-driven management plan for the Rio Grande corridor in southern New Mexico, which includes restoration of riparian and aquatic habitats. The Center was one of

The *Newsletter* is published six times per year by the Native Plant Society of New Mexico. The Society is composed of professional and amateur botanists and others with an interest in the flora of New Mexico. Articles from the *Newsletter* may be reprinted if fully cited to author and attributed to the *Newsletter*.

Membership in the Native Plant Society of New Mexico is open to anyone supporting our goals. We are dedicated to promoting a greater appreciation of native plants and their environment, and to the preservation of endangered species. We encourage the use of suitable native plants in landscaping to preserve the state's unique character and as a water conservation measure. Members benefit from chapter meetings, field trips, publications, plant and seed exchanges, and educational forums. A wide selection of books is available at discount. The society has also produced two New Mexico wildflower posters by artist Niki Threlkeld. Contact our Poster Chair or Book Sales representative for more information. Call chapter contacts for local information.

Advertising Schedule
Approved advertisements will cost \$40 per year.

Schedule of Membership Fees
Dues are \$10.00 annually for individuals or families. "Friends of the Society" include organizations, businesses, and individuals, whose dues of \$25.00 or more provide support for long range goals. To join us, send your dues to Membership Secretary, 10800 Griffith Park Drive, Albuquerque, NM 87122.

Newsletter Contributions
Please direct all contributions for the newsletter to Tim McKimmie, editor. See address below or email to tmckimmi@lib.nmsu.edu
Deadline for the next newsletter is April 1.

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SOCIETY CORRESPONDENCE: Our main address is: NPSNM, POB 5917, Santa Fe NM 87502-5917. See above for membership and newsletter correspondence.

two groups to bid on state land leases as a way to protect streamside habitats damaged by decades of uncontrolled livestock grazing. The Center is also active on other fronts, including pesticides, bicycle facilities and wolf reintroduction.

The Center, located at 1494A South Solano Drive, is run entirely by volunteers, except for an occasional work-study NMSU student. Funding comes from members (a basic annual membership is \$20), grants, and fundraising events like rummage sales and raffles. To volunteer, become a member, or find out more, call the Center at 522-5552.

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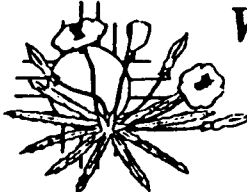
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Many thanks to Robert Dewitt Ivey for permission to use the wonderful drawings from his book *Flowering Plants of New Mexico*, in our Newsletter.

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FLORA NEOMEXICANA: What About Bush Muhly?

by Robert Sivinski

I am not well informed on native plant propagation and landscaping, but I have noticed the steady increase in the use of ornamental grasses in recent years. This is as it should be. Native grasses make beautiful and interesting specimen plants in any garden. One of my favorite grasses is bush muhly (*Muhlenbergia porteri*). The popular name may be derived from its frequent habit of growing at the base of bushes, or else the "bushy" mound of foliage produced by the mature plant. It is a common species throughout central and southern New Mexico and prized by ranchers as excellent winter forage for livestock. Bush muhly is unusual for its small leaves and branching, perennial stems (culms). The stems are alive year-round and do not die back to the ground in winter. A mature bush muhly produces a thicket of delicate, zig-zagging stems that terminate in feathery panicles of small spikelets with awned florets. The flowering panicles are purplish and as autumn closes in, even the stems and leaves take on a purple hue. A large specimen is a lacy mound of delicate stems about one foot high and two feet across. It is a long-lived desert perennial, at least Zone 6 cold hardy, and does not need supplemental irrigation. These are all admirable qualities, yet I have not seen any bush muhly for sale by native plant dealers. Why not?

Several years ago I salvaged half a dozen bush muhly plants from a construction site near the Albuquerque Airport. I transplanted them to a basalt rock garden near the university where they flourished and produced lacy, purplish-green mounds in spaces between the black boulders. Bush muhly is also a natural companion plant for the bases of yuccas and desert shrubs such as creosote (*Larrea tridentata*) and mesquite (*Prosopis glandulosa*). It should be offered the same spaces in native landscape arrangements. I have no advise on the propagation of this beautiful grass, but I believe successful growers will have a welcome addition to their landscapes.

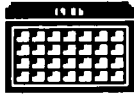
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Hoegrass, bush muhly
Muhlenbergia porteri



CALENDAR

ALBUQUERQUE

- March 7 "Endangered Species Legislation" by Charlie McDonald. 7:30 Albuquerque Garden Center, 10120 Lomas Blvd.
 March 9 Field trip to Wildroot Horticulture Nursery. 9:30 am.
 April 4 "Where to See NM Wildflowers" by Carolyn Dodson. 7:30 Albuquerque Garden Center.
 April 6 Wildflower Fieldtrip with C. Dodson. 9 am.
 May 2 "Cactus and Succulents" by Paul Shaw. 7:30 Albuquerque Garden Center
 May 4 Fieldtrip to west mesa. 9 am.

GILA

- March 15 "Conservation through Cooperation" by Gene and Elisabeth Simon. 7 pm. Harlan Hall, WNMU campus.

OTERO

- March 9 Fieldtrip to Cabellero Canyon. John Stockert, 585-2546
 March (13-20) Jarilla Mtns. Contact Dee Umberson.
 March 15 Noxious weed search on Holloman AFB. Call 434-3041
 March 23 Fieldtrip to Valley of the Fires. 9 am Carizozo store at NM380.
 April 1 NMSU Herbarium. 9:30 am, in front of Ag(Gerald Thomas) building, NMSU campus (on Espina).
 April 26-28 Fieldtrip to Boyce Thompson Arboretum and Desert Botanical Garden in AZ. Overnight camping, 434-3041.
 May 4 Fieldtrip to Laborcita Canyon, 9 am. La Luz Post Office.

LAS CRUCES

- March 13 "Irrigation Fact & Fantasy" by Ted Sammis. 7:30 SW Environmental Center, 1494 S. Solano
 March 17 Fieldtrip to Spring Canyon. 8:30 Fairacres Post Office
 March 23 Highway cleanup. 10 am St. James Church
 April 10 "Plants of the White Sands Missile Range" by Dave Anderson. 7:30 SW Environmental Center.
 April 14 Fieldtrip to WSMR. 6:30 am Kmart/Hwy 70.

CHAPTER REPORTS


Albuquerque - Lu Bennett

"Fire Ecology in an Urban Setting" was presented by Jerome MacDonald and staff from USDA Forest Service at our January regular meeting. In the Sandia and Manzano Mountains east of Albuquerque, the population is rapidly increasing making fire management plans in the area more comprehensive. A great deal of effort is expended by the Forest Service in introducing fire back into its natural role and educating people about fire management plans in the area.

Although well intentioned in the past, the practice of quickly suppressing all fires on public lands has had an adverse effect on the forest ecology. The current practice of the Forest Service is using prescribed fires to aid in restoring and maintaining forest and grasslands as diverse, healthy ecosystems. Also, areas treated with prescribed fires are less likely to burn intensely and are more easily controlled should a natural wildfire occur in the area.

An extensive planning process is required for prescribed fires. The plans are completed months in advance and include detailed considerations of many variables, including wildlife habitat, weather, natural barriers and water to control the fire. Public information, home visits and flyers are used to involve all affected residents.

The 1996 officers of the Albuquerque Chapter are Sandra Lynn, President; Lucy Beals, Vice President; Susan Cook, Secretary; and Susan Homer, Treasurer.



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Losing Species, Languages and Stories: Cultural and Environmental Change in the Binational Southwest

By Gary Paul Nabhan

reprinted from *The Seedhead News* No. 51 Winter Solstice 1995

Many of us are aware of the rapid cultural and environmental changes which are affecting land-based indigenous peoples and their homelands—lands which retain much of the biological diversity remaining on this planet. As Chicksaw poet Linda Hogan has remarked, many of the same pressures which endanger plant and animal diversity affect traditional subsistence-based communities, both directly and indirectly:

“We have seen that the destruction of our homelands and wildlife has always gone hand in hand with the demise of native culture. Today we face the realization that...both natural and cultural diversity are in steep decline. These losses impoverish us all.”

In the United States—a country not considered to be particularly diverse biologically—at least 70 vertebrates and 220 plant species have been extirpated since Europeans' arrival. In 1995, the Center for Plant Conservation estimated that another 2,000 plants risk extinction by the turn of the century unless extraordinary measures are taken to prevent their demise. The Center also estimates that at least 15 percent of those plants have been named, used and culturally valued by North American tribes. Thus, if they die out, indigenous communities will lose resources, symbols and habitat.

For the U.S. some linguists suggest that more than 50 of 155 remaining native languages may disappear by the year 2000. Others suggest that by that year, more than half of the 200 Native American languages north of the Tropic of Cancer will not have two speakers in the same community who can carry on a conversation exclusively in their mother tongue. With that loss of language comes the loss of culturally encoded knowledge about the natural world, including detailed ecological knowledge of the identity, habits, habitats and ranges of rare and endemic biota. For example, in the Sonoran Desert of the U.S./Mexico borderlands, about 40 rare plants— one-third of the flora most at risk in this bioregion— are better known by tribal elders than by field biologists attempting to learn their ranges, limits to survival, causes of decline, animal associates, and so on. However, such detailed traditional knowledge is not necessarily being transmitted intact to younger generations. In one survey of O'odham children and their grandparents, the children could name only a third of the most common plants and animals of their local environment in their native tongue. It is doubtful that much cultural information on the rarest of the local biota is being transmitted at all. Elsewhere in the world, where cultural and environmental changes may be accelerating at a even faster rate, an astonishing wealth of ethnobiological knowledge about locally and regionally restricted lifeforms survives in areas where Western science has barely inventoried the biota. Some cultures in the tropics have classified more than 2,500 plants and animals in their immediate surroundings. Similarly, certain Sonoran Desert cultures in the binational Southwest name, utilize or manage as many as 450 to 600 plants and animals in this bioregion.

Some 60 percent of the world's 6,500 extant languages recorded in *Ethnologue* are spoken by cultural communities residing

in just nine countries: Papua New Guinea, Indonesia*, Nigeria, India*, Cameroon, Australia*, Mexico*, Zaire* and Brazil*. Victor Toledo has pointed out that the six asterisked countries are also recognized as centers of megadiversity for flora and fauna. D. Harmon documented that 16 of the 25 countries with the most endemic languages also rank in the top 25 countries for flowering plant diversity. Without falling into the traps of “trriage” arguments, it is clear that we have much to learn from and conserve within those countries rich in both cultural and biological diversity.

The apparent correlation of high biodiversity and linguistic diversity has recently led Bruce Wilcox and Kristin Duin to compare various indicators of biological utility, cultural diversity and biodiversity on an ecoregion basis throughout Latin America. Their 1994 article in *Cultural Survival Quarterly* suggests that of 11 habitat types, tropical moist forests, mangroves, tropical dry forests, and desertscrub have the greatest diversity of habitats (base ecoregions) and, possibly, the highest levels of endemism. Of those, tropical moist and dry forests also had extremely high cultural diversity; subtropical forests, savannah/grasslands and desertscrub were moderately rich in indigenous populations.

The isolation of a place by landforms or water also leads to greater cultural diversity. These geographic factors tend to favor unique or endemic lifeforms as well; in fact, endemism and species diversity are not necessarily correlated on a region-by-region basis. Deserts and cloud forests tend to be higher in endemic plant and animal life relative to the total size of their biotic inventories, even though dry and wet tropical forests have larger inventories overall. Thus, the restricted ranges of these unique desert and cloudforest species that occur nowhere else make them extremely vulnerable to vegetation conversion schemes and other changes in land use. On the other hand, tropical forest species (except for orchids and other epiphytes) are often widely distributed.

It appears that *cultural and biological uniqueness* are often undervalued. To paraphrase Delbert Weins' complaint at one Center for Plant Conservation meeting: How much attention are we giving to unique evolutionary lines— families or genera which are represented by only one species? Are all species equal in the uniqueness of the genetic information they contain? Shouldn't we be particularly concerned about a monotypic family going extinct?

The same questions apply to linguistically unique cultures—ones which are now isolated because of historic divergence of their language from the languages of those who shared a common ancestry (perhaps the Zuni of New Mexico) or because of the complete extinction of speakers of related languages (for example, the Seri of the Sea of Cortez, who are related to a number of now-extinct groups in Baja, California). Their languages clearly encode knowledge about the flora and fauna that is not shared with nearby cultural communities that are parts of extant language families. In a sense, the languages of the desert Seri and Zuni of semi-arid grasslands demonstrate *ethnobiological endemism*— unique ways of classifying and using local plants found nowhere else in the world.

I propose that cultural, linguistic and biogeographers— as well as conservationists and cultural survival activists— begin to determine where distinctive cultural groups are living within areas of high biological endemism. To my way of thinking, those are the places where ancient cultural knowledge about the natural world and its biological rarities is particularly vulnerable. Hotspots of monotypic genera (such as *Olneya*, ironwood trees, in the desert or *Lacandonia* flowers in Chiapas) and other narrowly restricted

"Losing Species cont'd"

endemics are well recognized by biogeographers. Distinct language groups are also well recognized by linguists and anthropologists. And yet, have these groups been given any priority in ethnobiological studies? Are these peoples invited to be collaborators in efforts to conserve or protect habitats within their reach? Are medicines or foods being extracted from their homelands without economic or social benefits being returned to the original stewards of these resources?

In early April at the Arizona-Sonora Desert Museum, invited scholars will elucidate how cultural and environmental changes affect the loss of species, languages and ethnobiological stories. I suggest that all scholars and activists assess current methods for identifying hotspots of endemism and linguistic monotypy, mapping them, and determining which areas are threatened. Are there shared threats to species, languages and stories about plants and animals? Can we avert, reduce or minimize those threats? Can we support cultural education and biosphere reserve management programs that celebrate and safeguard the relationships be-

tween indigenous communities and the biotic communities which form their habitats? This discussion should involve conservation and human rights activists who have the advocacy skills for grassroots projects essential to cultural and biological survival. I feel we have a moral responsibility to address the threats which are eroding both biological and cultural resources.



Views from the South

(One member's opinion)
by Tom Wootten

Last year I learned of a small group of incredible people in the Carlsbad area that had banded together under the banner of "Chihuahuan Desert Conservation Alliance". An active group with an environmental bent in Carlsbad? Surely not Carlsbad, New Mexico, maybe Carlsbad, California. Seriously I am not trying to put down that beautiful part of our state, but I do know some about the politics in southeast New Mexico. This group publishes a monthly newsletter called *Desert Voices* which often includes an article by our own Mary Helen Brunt entitled "Plant of the Month". The group should be exceptionally proud of their newsletter, which I really look forward to receiving monthly. I was really flattered when asked to submit articles to this newsletter and have been doing so fairly regularly. I published an article in December 1995 (Vol 2 Issue 12) about an issue to which members of NPS-NM should be alerted. The article follows:

Game Commission Urged to Resign by Tom Wootten

Even in the face of a public opinion poll favoring reintroduction of the Mexican Gray Wolf in New Mexico, at the December 6 meeting of the NM Game Commission, each commissioner announced his personal feelings opposing reintroduction. Even the supposed "environmental community" representative, Jim Charlesworth said, tax money shouldn't be spent on an animal we don't need. Then the public was invited to comment.

Kevin Bixby of the Southwest Environmental Center stated he felt the commissioner's had betrayed a public trust to represent the best interests of the public, requested that each resign, and presented each with a prepared letter of resignation.

Proceedings earlier in the meeting were so flawed during discussions of procedures required by the new Wildlife Conserva-

tion Act that the Rio Grande Chapter of Sierra Club and National Audubon Society protested the action, stating procedures followed were probably illegal. Specifically, confusing oral amendments to previously written proposals were accepted and approved with no written record of what was voted on or approved.

Past correspondence with the state director of Department of Game and Fish and this exhibition has convinced this writer that the New Mexico Game Commission is hell-bent on destroying the Department of Game and Fish especially when considering non-game species.

End of Article

The New Mexico Department of Game and Fish seems to have a knack for always blaming lack of concern for non-game species on the fact that so much of their funding comes from hunting and fishing fees, that non-game species must take a back seat. I know a number of hunters who take exception to this, but it is true that the bulk of the department's funding comes directly or indirectly from game species. The department also has a knack for starting programs to raise funds for non-game but generally fails to publicize them enough to make them successful. As an example how many of you have heard of the "Wildlife Conservation Stamp" that you can buy for \$10.00? The current Governor vetoed the license plate plan passed by the legislature last year. This plan has been very successful in other states. A program my wife and I continue to support is "Share with Wildlife" which has funded some important wildlife research and is involved in educational and rehabilitation programs. I encourage others to support this program and suggest you send copies of your cover letter to the head of the department. He says he responds only to the public, so let him hear from you. Donations can be sent to "Share with Wildlife", NM Department of Game and Fish, PO Box 25112, Santa Fe, New Mexico 87504. Department director is Gerald A. Marachinni. Stay tuned for more reasons why NPS should be interested and concerned about wildlife in general and non-game species in particular.

Natural by Design: Beauty and Balance in Southwest Gardens

Plants for Natural Gardens: Southwestern Native and Adaptive Trees, Shrubs, Wildflowers, and Grasses

by Judith Phillips, 1995, Museum of New Mexico Press.

Book Review by T. McKimmie

With this pair of volumes, Judith Phillips has set a new standard for landscaping books. She has combined a commonsense approach, enthusiasm for natural landscapes, and knowledge of her subject into an artistic set of volumes that will capture the reader's attention and be useful for anyone desiring to develop a more natural looking landscape. This work is destined to be a classic.

Natural by Design consists of essays that present landscaping philosophy, ecology, and "how to do it" material in nine chapters. The author lives near Albuquerque and the books are suited for those living in western high deserts, high plains, and uplands to about 7,500 feet. These areas present extremes of climate such as high and low temperatures, high sunlight and wind, low and sporadic rainfall and generally poor soils.

Some sample quotes include: "The aim in natural gardening is to work within the parameters of local conditions but also to explore as broad a range of plant selection options as the site allows." "Insect activity is more often welcomed than perceived as a threat." "Complexity is the essence of life and a buffer against natural disasters." "We need only be observant and flexible, willing to abandon plants and purposes that prove unproductive and build on those that seem to fit within the larger context."

This work will be invaluable for anyone building a new home, allowing them to start from scratch and avoid mistakes while building a permanent landscape. It wouldn't be surprising if the book was responsible for a few readers selling their existing homes just to begin anew with ideas from this book, the enthusiasm is that catching.

The work combines visions of both architect and naturalist. The writing quality is excellent and Ms. Phillips has now matured as THE landscape author. The style is pleasing and matter of fact, and will generate enthusiasm in the most sedentary reader. The photography is magnificent. Readers from southern New Mexico may wish that more examples were from that part of the state.



The chapter on planting and early maintenance is excellent. The ecological approach is adaptable to any site, rather than being site specific, making the work much more valuable. There are enough specific examples so that gardeners can get the general idea and then take off on their own.

Other features include sections on site preparation, water harvesting, weeds, pruning, eg. "making a few cuts and watching the results is the best way to learn," maintenance, and a chapter on wildlife habitat. The book also features the landscapes of many members of the Native Plant Society of New Mexico.

Plants for Natural Gardens, the companion volume, describes nearly 200 plants, most of which are natives to the high-desert Southwest. It is conveniently organized by ecosystems: upland; shrub-desert and grassland; and oasis. Plant profiles include "notable characteristics" such as growth rate, soil preferences; mature size and other physical characteristics; "adaptations" or what the plant needs to survive; "landscape use and care"; "propagation"; and "related species" that are similar in character and requirements. There is even a section for urban gardening. A propagation appendix and list of additional readings are included, and it is indexed by both common and botanical names.

What is the comparison with the author's *Southwestern Landscaping with Native Plants* (1987)? The new books are definitely not a revision of the former work. The two volume set is more expansive, more cohesive and more attractive. It is more a conversation, versus the workbook style of the 1987 work, which will nevertheless remain a good one volume "how to."

Dues to Increase: Report From the Board

The NPSNM held its semiannual board meeting February 10, 1996. A motion was passed to increase the membership dues from \$10 to \$12 per year. In addition, \$2 from each members dues will be returned to their respective chapter. The chapters will be able to use this money as they wish. The increase will be effective Jan. 1, 1997. Until that time members will have the option of pre-paying as many years as they wish at the current rate of \$10.

The Board also decided to hold a planning retreat in the fall, 1996. The purpose of this retreat will be to make goals for the 21st century. This will be a weekend retreat and discussion of society business will be kept to a minimum so that the board can focus on their visions for the NPSNM's future. All society members are encouraged to give input through board members or chapter contacts. More information will be forthcoming.

A New Death Camus

by Charles A. Huff

In 1995 a new plant species was named. Its name gives a clue as to its location. The plant is *Zigadenus mogollonensis* Hess & Sivinski and is part of the Lily Family, Liliaceae. The common name of this new species is up for grabs I guess so I'll call it Mogollon Death Camus. I collected the plant in 1994 in the Mogollon Mountains, Gila National Forest, and could not key it in any of our keys, and for good reason! It isn't in any of our books. It will be thanks to the work of Bill Hess and Bob Sivinski.

The plant looks like Elegant Death Camus in its overall appearance but the flowers are much larger. They are yellowish to greenish with some dark brown to purple coloring in the outer perianth segments and they nod on their stalks. The glands of the perianth segments are large and somewhat heart shaped. *Zigadenus mogollonensis* grows to about 70 cm in height with large, keeled, flat leaves. The inflorescence is mostly racemose with occasional paniculate flowers at the lower end. It is endemic to the Mogollon Mountains under the canopy of Douglas fir, White fir and Aspen at an elevational range of approximately 8000 to 10,500 feet (2700 - 3200 meters). Associated plants include but are not limited to, *Zigadenus elegans* (Elegant Death Camus), *Pyrola elliptica* (Shinleaf Wintergreen), *Pyrola picta* (Whitevein Wintergreen) and *Chimaphila umbellata* (Pipsissewa).

The easiest place to see these beautiful plants is on the north side of Bursum Road (Forest Service Road 28) approximately 200 meters west from Cold Spring. Cold Spring is between Silver Creek Divide and Sandy Point. There are several individuals on the cut bank at this location. Enjoy these wild beauties in flower starting about the middle of July and lasting to about the middle of August.



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