WISCONSIN PRAIRIE ENTHUSIASTS

MARCH 1988 VOL. 1, NO.2

We have incorporated and are finishing up the process for our tax-exempt status. March of each year will be our membership drive month where all newsletters sent out will include the form for renewing your membership. Also there is a questionnaire on the backside, please fill it out when you return the form with your dues for the coming year. The dues is used for the publication of the newsletter, postage, and money to be set aside for the purchase of land in the future. Please help us to educate others and preserve our native landscapes for the future generations by becoming a member and spreading the word about what WPE is doing.

BOARD OF DIRECTORS

On January 13, 1988, the following people were elected to the Board.

Fred Faessler - President - 2705 11th Ave., Monroe, WI 53566, 608/325-9374

Gary Felder - Vice-President - 712 22nd Ave., Monroe, WI 53566, 608/325-4394

John Ochsner - Secretary - W2763 Hwy 59, Monroe, WI 53566, 608/862-3816

Kay Barry - Treasurer - 1717 Country Lane, Monroe, WI 53566, 608/325-6147

Marie Brown - Editor - 956 Industrial Ct., Janesville, WI 53545, 608/754-0443

Ray Amiel - 804 27th Ave., Monroe, WI 53566, 608/325-2636

Steve Apfelbaum - N673 Mill Rd., Juda, WI 53550, 608/897-8547

Robert Baller - 1712 Tremont Dr., Beloit, WI 53511, 608/362-4669

Bill Bauman - 1743 13th St., Monroe, WI 53566, 608/325-6855

Jacqueline Kraus - N2747 Greenbush Rd., Monroe, WI 53566, 608/328-8005

Kathleen Sulzer - W4790 Sulzer Rd., Monroe, WI 53566, 608/325-4692

COMMITTEES AND CHAIRPERSONS

PUBLIC RELATIONS - Steve Apfelbaum
(includes membership, fund raising, newsletter, news release)

EDUCATION - Kay Barry
(includes burn school, sport show, slide shows, programs, hikes, historical background)

MANAGEMENT - John Ochsner - Gary Felder
(includes land management, stewardship, burning, seed collecting, inventory, planting, workdays)

MINUTES FROM FEBRUARY 18th MEETING

by John Ochsner

Discussions were held concerning the Fire School to be held at Blackhawk Technical College, insurance associated with the burn the following day of the school, our booth for the Green County Conservation League Sport Show to be held May 21 and 22 in Monroe, and Gary Eldred of the SouthWest Prairie Enthusiasts told us of the Cuba City High School prairie restoration and asked for assistance with seed collecting for their project.

The meeting was followed by a presentation by Mark Leach, a graduate student from UW-Madison, Dept. of Landscape Architecture, on "Prairie Corridors of Wisconsin". The talk and slide show were very informative and we thank Mark for his time in putting the show together for us.

DATES TO REMEMBER (March - April)

MARCH 17 - WPE meeting at VFW Hall, 1428 17th St., Monroe, WI 53566. 7pm. Speaker, Jean Blum, facilitator for PROJECT WILD in the Monroe area and member of the International Crane Foundation.

MARCH 19-20 - BURN WORKSHOP - Blackhawk Technical College, 6004 Prairie Ave., Janesville, WI 53545. (Fee $25.00 prepaid, $30.00 at the door).

MARCH 22 - ROCK COUNTY CONSERVATIONIST (RCC) meeting in the Back Lounge, lower lever, Hyatt-Smith Building, University of Wisconsin Center-Rock County, 2909 Kellogg Ave., Janesville, WI The speaker will be Tom Kautz, Director, Rock County Parks and his topic will be "Rock County Parks at your Backdoor". There will be a short business meeting before Mr. Kautz's talk.

APRIL 16 - STEWARDSHIP DAY AT NEWARK ROAD PRAIRIE. 10:00am. Volunteers are needed to cut brush, mow trails for walking and fire breaks, pick up litter and do general maintenance. Contact Dick Newsome (365-2609) for more information. (Newark Road Prairie is located on Newark Road near Knutson west of Beloit.)

APRIL 21 - WPE meeting at VFW Hall, 1428 17th St., Monroe, WI 53566. 7pm Speaker, Dr. John Harrington, UW-Madison Dept. of Landscape Architecture will be speaking on Right-Of-Way Plantings and Vegetation.

MAY 1 - SPRING ECOLOGY - BIG HILL PARK, Beloit. 1:00pm. This is a field outing led by Robert Baller, Wildlife Biologist with Applied Ecological Services, Inc. and will meet in the parking area near the teaching lab. (Big Hill Park is located on County D north of Beloit.)

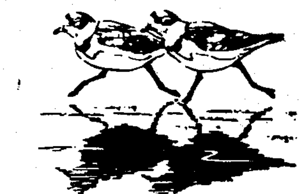
WISCONSIN ENDANGERED RESOURCES FUND

by Marie Brown

This fund was approved by the state Legislature in 1982 and appeared on the tax form in 1983. It was supposed to be established as a supplemental program for the Bureau of Endangered Resources (BER) but ended as the sole source of funding. According to THE NICHE (Newsletter of the Wisconsin Bureau of Endangered Resources) "Past contributions via the check-off have made it possible for endangered resources and wildlife management specialists to remove the double-crested cormorant from the threatened species list, band thousands of young bald eagles, release 14 peregrine falcon chicks, buy radio telemetry collars for timber wolves, building nesting platforms for osprey and Forster's terns, plus print educational materials for children, and protect and manage critical natural areas. Donations have also funded native plant surveys, nongame species management projects for frogs, grassland birds and bluebirds, research on endangered turtles, and preliminary survey to determine the status of dozens of other plants and animals in the state."

"Last year's check-off total of $525,000 along with other donations made directly to the program provided most of the Bureau's operating budget." This covers 3 basic areas besides the 6 full-time people coordinating this effort. The areas are non-game and endangered species, natural areas and land acquisition, and natural heritage inventory.

If you have not filed your taxes, think about checking the box for the CHECK-OFF FUND. If you have filed your taxes, contributions can be made to the WISCONSIN ENDANGERED RESOURCES FUND, P.O. Box 7921, Madison, WI 53507. The money you donate will help to preserve a part of our native heritage to pass onto future generations.



Piping Plovers

A BIG THANK YOU

by Kay Barry

The Wisconsin Prairie Enthusiasts is finally underway as a real, live organization with incorporation papers, bylaws, officers, board of directors, and big plans for the future. First of all, a great big thank you to Steve Apfelbaum and his company Applied Ecological Services (AES) for his support. <u>AES has been WPE's corporate sponsor</u>!! AES has picked up all the costs of our newsletter, loaned staff, computer time, and other equipment. In addition Steve has been the sparkplug that started us off. sharing his enthusiasm and expertise. Thank you Steve and AES. We're going to try to do it on our own now but we still will need your guidance and enthusiasm.

Forster's Tern

WHO ARE OUR DIRECTORS?

KAY BARRY, wife of retired physician and WPE member Dr. George Barry, has lived in Monroe since 1948. Born and raised in Chicago, she and her friends spent days playing in a prairie near their home, giving their own names to the lovely flowers they found (purple spikes (<u>Liatris</u>), snotweed (Spiderwort)). Always being interested in outdoor activities, canoeing, hiking, and skiing, she has passed on her knowledge through the Girl Scouts as a leader for over 20 years. Kay became interested in natural landscapes and prairies in 1979 and has attended numerous workshops held by the UW Arboretum and Rivers Edge Nature Center. As a member of the Monroe Parks and Recreation Board, she is very involved in the development and natural landscaping of the Honey Creek Park, just west of the city.

MARIE BROWN, wife of military retiree James, has lived in Janesville for the last 10 years. She is originally from Adams, WI (sandy Adams County). While taking Sunday afternoon drives or in later years, special flower hunting drives, Marie learned many of the plants from her mother who was into wildflowers and edible plants. Many of the plants that she is familiar with do not grow in the soil type that is here in southern Wisconsin. She is very interested in learning the plants here and going back up north to identify more plants that grow along roadsides and little remnants that remain. She has been involved with Boy Scouts and helping them to understand more about our native landscapes around Janesville.

STEVE APFELBAUM. His interest in prairie and presettlement landscape is directly traceable. An evening of star gazing and camping on the highest point of land (a glacial Kame (June 1968) near Dundee, IL) was followed by a beautiful sunny morning. He awoke to the most amazing myriad of wildflowers (shooting stars, puccoons, birds foot violets) growing all around the sleeping bag. His curiosity and enthusiasm for these plants let him to explore the subject, and remaining remnants of presettlement landscapes in the Chicago region. During his personal explorations, serendipity allowed him to meet and receive inspirational boosts from now well known prairie enthusiasts of the Chicago region: Robert Betz, Floyd Swink, Ray Shullenberg, and others. More recently he has had the pleasure to be a part of the growing movement to restore large areas to native vegetation. He is especially inspired by the growing "grass roots" support in Southern Wisconsin for prairies. For 12 years he has served over 100 projects as a research and consulting ecologist. His project involvement has allowed him to conduct field ecological studies throughout the United States, Canada, Mexico, and the Hawaiian Archipelago. One of his special areas of interest is research in remote wilderness systems and natural areas. Steve has authored over 100 technical reports and publications spanning a diversity of subject materials from bird populations and vegetation responses to wildfire, to lichenological investigations. Steve, a graduate of University of Illinois, Champaign-Urbana, has a Bachelors, Masters, and additional credits in Ecological Sciences with emphasis in botany, zoology, and chemistry.

ROB BALLER is a Wildlife Biologist for Applied Ecological Services, Inc. Originally from Beloit, Rob attended the UW-Stevens Point graduated in 1985. His BS is in Wildlife and Biology, with a minor in Resource Management. Over the past several years he has served as a volunteer for the Wisconsin Bureau of Endangered Resources, The Nature Conservancy, and participated in several conservation groups such as The Rock County Conservationists, the Ned Hollister Bird Club, and the Janesville Park System. He is also teaching classes at Blackhawk Technical College on Prairie Restoration and Prairie Wildflower Identification.

FRED FAESSLER who resides in Monroe with his wife, Pam, and daughter, Traci has a new found interest in prairie. Although he was born and raised in the area and has been a farmer many years, he has discovered native landscapes since working with Applied Ecological Services and keeping his eyes open to the surrounding terrain. As he has said, "I never knew there so many places that I have driven by that had big bluestem grass, I never noticed them before." From learning a couple of plants, his interest has taken off to discover and to help educate others.

FIRE ECOLOGY IN SOUTHERN WISCONSIN
by Robert S. Baller, Wildlife Biologist

When the first European explorers passed through southern Wisconsin they discovered a landscape covered with grass and wildflowers. The familiar oak woods of today were virtually non-existent, the only true forests being found on the floodplains of large rivers. Original survey records from the 1830's confirm that Rock County was mostly prairie and savanna (scattered oak trees with an understory of prairie).

Because of these grasslands, wildfire was a regular occurrence throughout the Midwest. The frequency of fire was increased by the hunting practices of local Indians, who used fire for driving game. While most trees and shrubs can be severely limited by fire, prairie plants are well adapted to fire and often require it for optimal growth. In this way, the prairie became a self perpetuating community; prairie plants provided the fuel for wildfire, and only prairie plants (with the exception of oak trees) could survive the fires. Bird and animal species have similarly adapted to these wildfires, since fires occurred regularly for nearly 10,000 years. Unfortunately, most true prairie animals were driven to the point of extinction before scientific studies on the this hypothesis were made.

Today, 150 years after settlement and the cessation of wildfires, the prairies have all been plowed for agriculture, and the remaining savannas have grown into dense woods. However, small remnants do survive, weedy and overgrown with trees and succeeding to forest. The Wisconsin Bureau of Endangered Resources is regularly burning more than 50 natural areas around the state, in order to reverse this trend of succession. Local agencies such as The Nature Conservancy (TNC), the Rock County Conservationists (RCC), and the Wisconsin Prairie Enthusiasts (WPE) often assist in burning these areas in southern Wisconsin. One example is the spring burn of the Beloit-Newark Road State Scientific Area under stewardship of Beloit College. This is a 30+ acre tract of virgin prairie (possibly the only unaltered land in Rock County).

This experience with fire and prairie ecology has revealed many ways in which prairie communities benefit from prescribed burns: a few are listed below.

1 Trees and shrubs are destroyed, reducing competition for water, nutrients, and most importantly, sunlight. Most prairie plants require full sunlight to grow properly.

2 Residual plant material is removed, allowing sunlight to penetrate to the ground during the critical springtime growth stages (if the burn is in the spring). Plants grow more vigorously since they are not wasting energy pushing through several inches of debris.

3 Nutrients are cycled back to the soil in the usable form of ash, rather than remaining suspended in residual plant matter.

4 Because of these factors (and others yet unknown), most prairie plants significantly increase their flowering and seed production following a spring burn.

5 European weeds, aggressive and

sometimes noxious, are limited by fire. Prescribed burns at carefully selected times are the best way to control non-native pests such as wild parsnip, quack grass, and fox-tail.

6 Many bird species, such as bobolinks and grasshopper sparrows (rare and declining from habitat loss) require shrub free grasslands for nesting.

7 Small mammals such as meadow voles and ground dwelling birds such as bobwhite quail benefit when "travel lanes" are freed of residual plant material, allowing easier movement between clumps of grass.

8 Wildlife habitat is improved overall. Tall, rigid prairie grasses and flowers provide the cover, structure, and diverse insect (food) populations necessary for good nesting and brood rearing. European grasses and fallow fields yield only marginal habitat.

With growing interest in natural landscapes, wildlife habitat, and wilderness preservation, many people are learning about prescribed fire and its role in natural areas management. Fire is the key management tool for restoring and maintaining native prairies, savannas, and wetlands, and must be used safely and correctly, if it is to be effective.

Our environment is important and deserves our concern. Let's learn to manage our natural areas for the benefit of all.


Peregrine Falcon

RIGHT-OF-WAY PRAIRIES

by Dr. John Harrington

Prior to settlement by European immigrants in the 1830's, grasslands of prairie and oak savanna occupied approximately 27.5% of the Wisconsin land cover. The loss of prairie in the last century has been to its conversion to agricultural uses--including farming, grazing, and mowing--and through mismanagement of fire and herbicides. Although the total extent of land in prairie remnants is unknown, it is approximated that less than one-seventh of 1% of Wisconsin's land cover is in either of these plant community types. State holdings consist of approximately 250 hectares (617 ac) while privately owned preserves by organizations such as The Nature Conservancy, universities, and colleges constitute over 100 hectares (247 ac). known railroad owned prairies of varying quality are estimated to contain approximately 63 hectares (155 ac).

The prairie played a significant role in the settlement of Wisconsin. Settlers avoided the open prairie where it was believed that not even trees could grow in such areas; instead, these pioneers settled along creek and river bottoms where trees indicated sufficient moisture existed for growth. Such areas, of course, also provided building materials. As the fertile soil of the prairie was discovered, settlement rapidly expanded onto the open plains, thereby converting the majority of the prairie to cropland.

The influence of the prairie in Wisconsin's heritage can be observed in the naming of towns and regions to reflect these extensive grasslands: examples include Arlington Prairie, Empire Prairie, Military Ridge Prairie, Eagle Prairie, Rock Prairie, North Prairie, Welch Prairie, Strong's Prairie, Hale's Prairie, and Prairie du Sac. With settlement, wild fires which played a part in keeping the prairies free of woody trees [illegible] shrubs were brought under control [illegible] additional acres of prairie were lost. With the advent of herbicide use since World War II, many of the state's remaining prairie remnants has disappeared or have been significantly disturbed.

The saving of the remaining prairies is important to the preservation of this natural heritage at both the state and local levels. In additions, prairie preservation provides options for 1) the development and expansion of educational opportunities in the ecological and biological sciences, 2) recreational and aesthetic opportunities along travel corridors and states recreational trails, and 3) preservation of the high ecological diversity and gene pools found within these grasslands.

Right-of-way prairies can serve as an alternative location to relieve use pressure on high quality scientific areas. These prairies have the potential to serve as representative strips for ecology, botany, landscape architecture, and wildlife classes and as research laboratories for novice and professional botanists, ecologists, and wildlife observers. Corridors provide relief to scientific areas not only as educational and recreational sites, but as research sites for studies on population dynamics, community recovery, and species stability. A network of prairie corridors in the state can provide vast opportunities for a living link to past cultural land history, wildlife and plant movement, and the study of populati[illegible] processes. These corridors may also serve [illegible] a seed source for restorations.

While road and utility rights-of-way are potential preservers of prairie remnants, it is along the railroad where the majority of these elements are found. This is largely due to the relationship between the time of construction of such rail corridors and the demise of the prairie due to agricultural development. Railroad construction, that began approximately in the 1830's in Wisconsin, removed major landscape sectors from intensive land uses such as housing, agriculture, and industry in the form of rights-of-way. Fires set by sparks from burning fuel in early days of the railroad, and later by rusted wheels and engines, helped to keep woody shrubs and trees out of the prairies found in these rights-of-way. Maintenance cutting by railroad crews reduced woody materials but not grass litter.

In the 1950's, many railroads, as a means of reducing brush maintenance and in response to increasing legal responsibilities for right-of-way fires and damage, began treating their rights-of-way with herbicides. In these places where fires were stopped brush moved onto the prairies and those lines which used herbicides wiped out many extant tracts. In addition to direct death, herbicides contribute to disturbances which allow exotic weed species to invade, thereby creating the need for further herbicides applications and mowing. Prior to the 1940's and wide-spre[illegible] herbicide use, observations of undistur[illegible] prairie strips bordered by roadbeds, agricultural fields, and weed patches were common.

The prairies that remain along active railroad corridors are among the last vestiges of this biotic community not yet in state protection. The railroad prairies, therefore, have significant importance to Wisconsin's Natural Areas Program and to the people of the state. It is highly probably that large percentage of the state's total remaining fertile mesic prairies are along corridors where plows were restricted. These corridors are highly accessible by the majority of Wisconsin's citizens. Over 90 miles of abandoned railroad corridors have been purchased by the state to serve as recreational and educational trails for bikers, skiers, snowmobilers, and pedestrians and as attractions for out-of-state tourists. These corridors also provide examples of past Wisconsin vegetation and act as refuges for rare species of both plants and animals.

GLOSSARY

ANNUAL - a plant which completes its life cycle from seed to seed within a single growing season.

BIENNIAL - a plant that lives only 2 years.

DRY PRAIRIE - Sand or limestone with shallow soil.

MESIC PRAIRIE - Medium amount of water, medium deep silt or sandy loam soil.

PERENNIAL - a plant which persists year after year, flowering and fruiting in cycles.

WET PRAIRIE - Lots of water, deep clay, silt loam or peat soil.

A GROWING LIBRARY: NATIVE LANDSCAPE BOOKS

Curtis, J.T. - The Vegetation of Wisconsin. U.W. Press, Madison.

McClain, W.E. - Illinois Prairie: Past and Future. A Restoration Guide. Illinois Department of Conservation, Division of Natural Heritage.

Nichols, S. and L. Entine - Prairie Primer. UW-Extension Madison.

Nuzzo, V. - Our Native Plants: Plants of Dane County and where to find them. Capital Times, Madison, WI.

Reich, B. - Guide to the Arboretum Prairies. U. of Wis.

Zimmerman, J.H. - Wildflowers and Weeds. Van Nostrand Reinhold Co., N.Y.

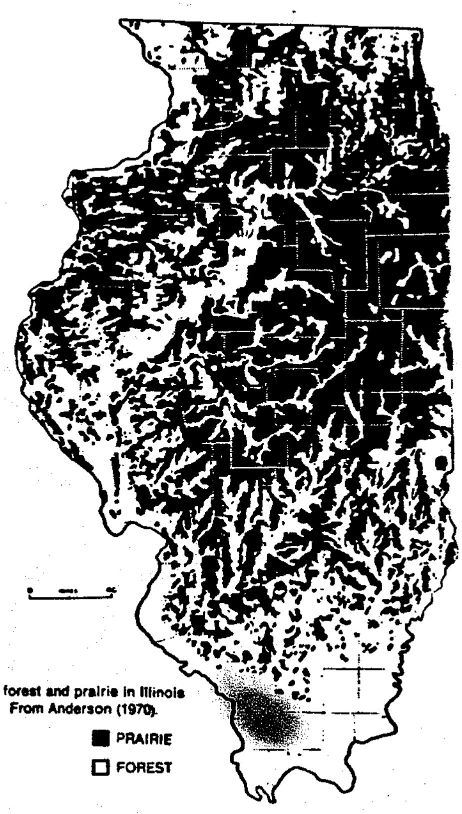
INFORMATION DEADLINE

This newsletter is published bi-monthly (January, March, May, July, September, November) with the deadline for submission of articles, hikes, meetings, workshops, etc. being the 1st of those months. The newsletter will be mailed approximately a week later.

Your comments, opinions, news of your group, and questions you would like to see addressed in the newsletter would be appreciated. If you have a question, chances are that someone else also does.

Please send your ideas, comments, opinions, and articles to: Marie Brown, Wisconsin Prairie Enthusiasts, N673 Mill Road, Juda, WI 53550.

PRAIRIES IN ILLINOIS



Distribution of forest and prairie in Illinois about 1820. From Anderson (1970).

WISCONSIN PRAIRIE ENTHUSIASTS, LTD.
N673 Mill Road
Juda, WI 53550

ADDRESS CORRECTION REQUESTED

HAVE YOU SEEN THIS FLOWER YET???

Pasque flower *(Anemone patens).* 4"-10" tall. This is the earliest blooming prairie plant; flowers March-April. The flowers are purple to white and appear before the leaves. The leaves are deeply cut into narrow lobes and are covered with long , silky hairs. Seeds have a long, feathery tail. Dry prairies.