



MINNESOTA PLANT PRESS

VOLUME 4 NUMBER 1 NEWSLETTER OF THE MINNESOTA NATIVE PLANT SOCIETY SPRING 1985

1984 FIELD TRIP SLIDES NEEDED

Bring your favorite ten field trip slides from MNPS 1984 field trips for the May 1 monthly MNPS meeting. Steve Eggers will coordinate the showing of field trip slides. If you have questions about what to bring, he can be contacted at (evenings).

SAVAGE FEN UPDATE

The Savage Fen Wetland Complex in Scott County is a natural resource of ecological significance. The 64-acre fen is one of the best preserved among the 21 calcareous fens found in Minnesota. The plant communities are one of the rarest wetland communities in North America. Savage Fen contains seven plant species listed by the state as threatened or of special concern. A previous issue of the Minnesota Plant Press alerted MNPS members to the potential commercial expansions that would pose a serious threat to the fen's continued existence.

The Corps of Engineers has permit jurisdiction over the discharge of dredged or fill material in Savage Fen, under Section 404 of the Clean Water Act. Any party proposing to place such material in the fen must consult the Corps regarding permit requirements.

If you are interested in knowing more about the Savage Fen Complex, a copy of the report is available for study. Contact Neil Anderson for further information. The Minnesota Plant Press will keep you informed of any further developments regarding the protection of this critical area.

WILDFLOWER GARDEN TRANSPLANT AND SEEDLING EXCHANGE

As part of the May 1 meeting, an exchange of wildflower garden transplants and seedlings will be held.

If you need to thin out over-abundant native Minnesota wildflowers from your garden this spring, why not bring them to the exchange? Are you looking for a certain species? Perhaps someone has enough to share and can tell you the conditions under which it thrives.

If you are starting native plants from seed this spring, please bring in a few seedlings for others.

Plants should be labeled with name of plant, name of donor and phone number of donor. Come a little early to drop off your plants before the meeting begins.

PLEASE DO NOT COLLECT WILD PLANTS FOR THIS EXCHANGE.

One of the MNPS goals is the conservation of native plants. By gardening the plants started from seed and transplants from another garden, we can enjoy wildflowers in our gardens without disturbing native populations.

Chris Soutter

PROGRAM IDEAS FOR 1985-1986 NEEDED

The programs committee will be putting together the lecture series for 1985-1986 this summer. If you have ideas for topics or speakers, please convey this information to Peg Kohring.

Minnesota Native Plant Society Membership Registration

Mail to: MNPS, 220 Biological Sciences Center, Univ. of Minnesota, St. Paul, MN 55108

_____ New Member _____ Renewal

Membership Categories:

- \$8.00 _____ Individual
- \$6.00 _____ Senior (over 62 or retired)
- \$10.00 _____ Family (Two or more related individuals at same address)
- \$15.00 _____ Institution
- \$6.00 _____ Student (Full-time)
- \$25.00 _____ Donor

Name _____ Address _____

City _____ State _____ Zip _____ Phone _____

U. OF M. CAMPUS ADDRESS: _____

UNIVERSITY HERBARIUM NEEDS CABINETS

The University of Minnesota Herbarium, located in the Biological Sciences Building on the St. Paul campus, desperately needs cabinets to house specimens. While a total of 150 cabinets are needed over the next five years, five cases are needed immediately. The current price is \$500 per cabinet.

The Minnesota Native Plant Society has a challenge for membership donations. For every dollar you give to purchase a herbarium cabinet, MNPS will match the contribution dollar-for-dollar up to \$250. A gift of \$23 will buy an herbarium shelf and afford protection of plant specimens.

Fill out the form below and send it to the Minnesota Native Plant Society, 220 Biological Sciences Center, 1445 Gortner Avenue, University of Minnesota, St. Paul, MN 55108.

Yes, I want to make a tax deductible gift of \$ _____ to buy an herbarium case for the University of Minnesota Herbarium

Name _____

Address _____

City _____ State _____ Zip _____

PHENOLOGY OF NERSTRAND WOODS

by Harriet Mason

Nerstrand Woods State Park is located in east central Rice County, 1½ miles west of the town of Nerstrand. The statutory boundary encloses two sections of land, a total of 1,280 acres. The northern section contains several steep-sided ravines, a waterfall and a portion of Prairie Creek with its bottom land and steep-sided valley slopes. The southern section also has a portion of Prairie Creek and some ravines but, in general, contains much more level land. Nerstrand Woods is a fine example of a Minnesota Maple-basswood forest. It is a remnant of the southern extension of the Big Woods type of vegetation which once covered south central Minnesota. Carpeted with wildflowers in the spring, it is worth a visit anytime of the year.

Most of the wildflowers listed can be found between the picnic or campgrounds and the waterfall. But many more trails are available for walking.

Anemone, False Rue	April 25
Anemone, Wood	May 2
Baneberry	May 25
Bellwort, Large-flowered	May 2
Blue Cohosh	May 12
Black Snakeroot	June 1
Bloodroot	April 20
Buttercup, Swamp	May 21
Crowfoot, Small-flowered	May 2
Dutchman's Breeches	April 25
Gooseberry, Prickly	May 2
Heart-leaved Alexander	May 24
Hepatica	April 20
Jack-in-the-Pulpit	May 25
Lady Slipper, yellow	May 19
Meadow Rue, Early	May 2
Marsh Marigold	April 30
Orchis, Showy	May 18
Spring Beauty	May 8
Sweet Cicely	May 25
Toothwort	April 27
Trillium	May 14
Trout Lily, Dwarf	April 30
Trout Lily, White	April 25
Violet, Blue	May 2
Virginia Waterleaf	May 19
Wild Blue Phlox	May 12
Wild Geranium	May 19
Wild Ginger	May 2
Wild Sarsparilla	May 19

TRANSPLANTING HELP NEEDED

Maplewood Nature Center, a forty acre preserve operated by the city of Maplewood, can use your help this spring. Volunteers are needed to plant native trees and shrubs in April and wildflowers in May. If you have never transplanted wildflowers or bare root trees, this would be an excellent opportunity to learn how.

Dates: Mid to late April — Plant bare root trees, shrubs and vines.

May 18, 8:30 a.m. — Plant wildflowers. Wildflower identification hike will follow transplanting.

June 1, 8:30 a.m. — Plant wildflowers. Wildflower hike at Jim McKee Prairie will follow transplanting.

Please call Chris Soutter if you can lend a hand.

TREASURER'S REPORT

Dec 15, 1984 - March 15, 1985

RECEIPTS

Membership Dues	144.00
Draft Dividends	9.14
Savings Dividends	11.46

EXPENSES

Postage	62.58
Printing	77.17
Supplies & Misc.	26.03

BALANCE ON HAND

Draft Account	766.79
Savings Account	776.51
Petty Cash	73.20

SPECIAL THANKS

Thank you to the Botany Department at the University of Minnesota and Sandy Hansen for use of the projectors during our meetings, arranging room reservations and providing use of their word processor for typing our newsletters.

If you have a news item, article or other information that should be included in the next issue of the Minnesota Plant Press, please send it to the editor: Neil Anderson, P.O. Box 8052, St. Paul, MN 55108.

ELOISE BUTLER WILDFLOWER AND BIRD SANCTUARY NEEDS VOLUNTEERS

The sanctuary, established in 1907, covers 20 acres and contains four kinds of plant and animal habitats. A guidebook leads visitors along meandering trails which feature 51 points of interest in the bog, woodland, upland oak and prairie terrains.

The garden is enjoyed by many who like the quiet trails, birdwatching, woods lore and the ever changing display of wildflowers. Located north of Highway 12 and south of Glenwood Ave. on Theodore Wirth Parkway the garden is open from April 1, to November 1.

Volunteers greet visitors and answer the phone in the garden shelter. Volunteer hours are: weekdays 10 am-12:30 pm, 12:30-3:30 pm, weekends 12:30-4 pm. You may volunteer to work weekly, monthly or whatever time you have. For more information call: Joyce Smeby- or Shirley Schultz-

ENDANGERED SPECIES ACT REAUTHORIZATION

The conservation of endangered species and their habitat is the goal of the Endangered Species Act, enacted by Congress in 1973. The Secretaries of Commerce and the Interior have responsibility for implementing the Act, the former being responsible for marine species and the latter for all others. Private citizens may participate in the designation of endangered species and their critical habitats, assist in Act enforcement by legal action or by petitioning the Secretaries of the Interior and Commerce to initiate listings.

Now, ten years after enactment, this program is far behind its goal of adequate preservation. At present funding levels, the Fish and Wildlife Service would need 25 years to process the backlog of 1,000 known candidates for listing. Plant species receive inadequate protection once listed: on federal lands, plants are only protected from taking when the plant(s) taken "are reduced to possession"; on private and non-federal lands, the Act does nothing to prevent vandals, collectors and others from destroying or collecting imperiled plant species. The evidence shows that effective plant conservation requires more than the act provides.

Congress needs to know where the public stands with regard to this dilemma. Please write to your senators (U.S. Capitol, Washington, D.C. 20510) and Representatives (U.S. Capitol, Washington, D.C. 20510) to let them know your opinion.

Polygala cruciata L.
Polygalaceae

Cross Milkwort

OFFICIAL STATUS: Endangered

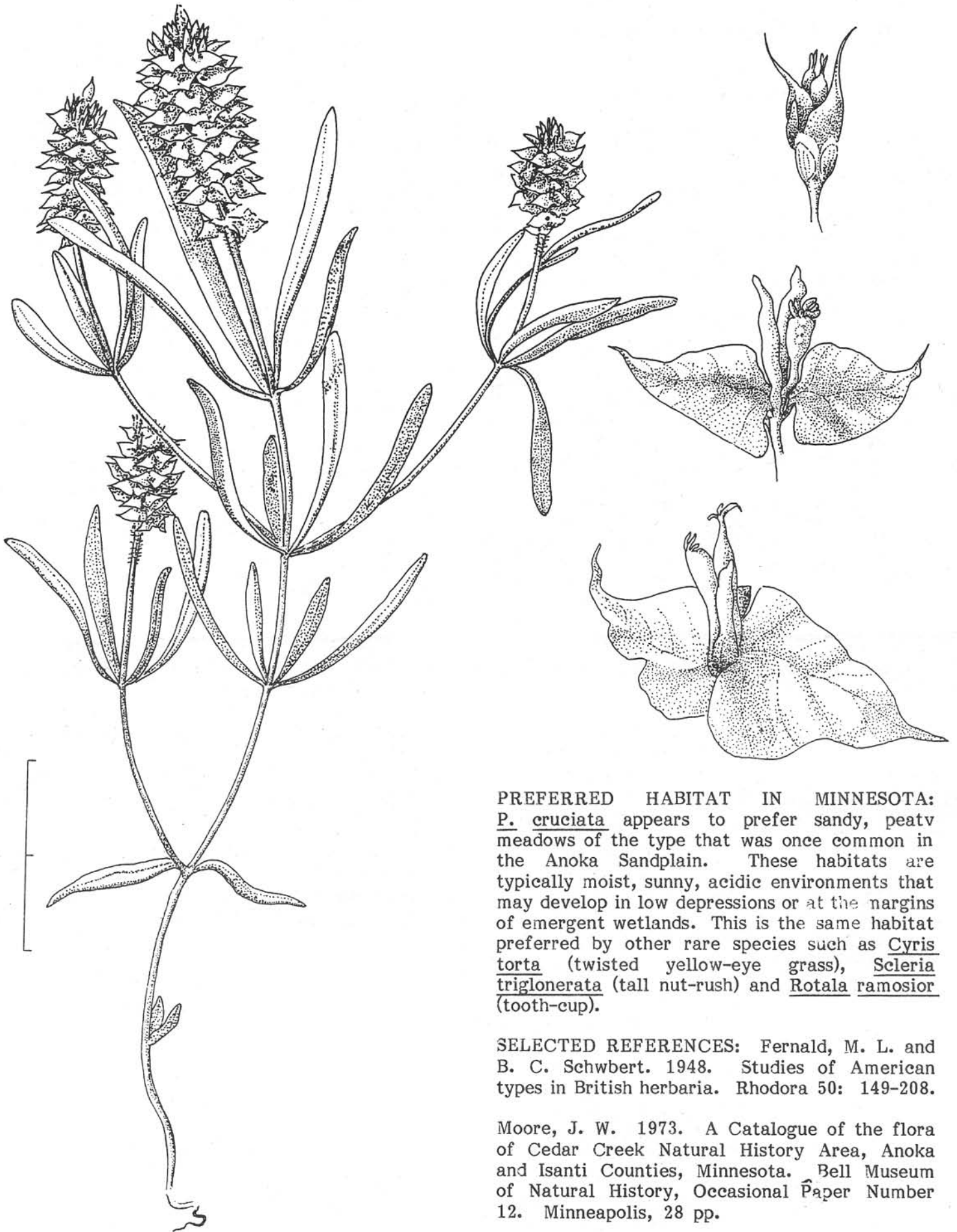
BASIS FOR MINNESOTA STATUS: This small, but conspicuous annual is frequently described as an "Atlantic Coastal Plain Element" in reference to its center of distribution. It occurs primarily in the Atlantic and Gulf Coastal Plains, but has scattered and infrequent occurrences inland. There also appears to be a discrete secondary range that is somewhat disjunct in the Great Lakes Region.

The populations in the Great Lakes Region have always been small and scattered, but they appear to have recently suffered a significant decline resulting from loss of habitat. For example, it is listed as endangered in Minnesota, threatened in Wisconsin and Ohio, and presumed extirpated in Iowa.

In Minnesota, P. cruciata has a long collection history that gives clear evidence of a decline. It was collected seven times between 1885 and 1905; five times between 1905 and 1966; and only once since 1966. Perhaps more revealing is that all of the records since 1905 are from Anoka County. It may now be extirpated from five of the six counties where it has been historically reported from. The only site where it is known to still survive is in Cedar Creek Natural History Area where it has been verified as recently as 1981.

The decline in Minnesota can be attributed directly to loss of habitat resulting from commercial, residential and agricultural expansion. The rate of habitat loss is increasing because of the heavy development pressure experienced in east-central Minnesota.

COMMENTS: Plants that occur in the northern portion of the species range (including Minnesota) are generally shorter with fewer divergent branches, than southern plants, and have been segregated as var. aquilonia Fern. & Schub. The northern variety occurs in both the inland coastal ranges.



PREFERRED HABITAT IN MINNESOTA: *P. cruciata* appears to prefer sandy, peaty meadows of the type that was once common in the Anoka Sandplain. These habitats are typically moist, sunny, acidic environments that may develop in low depressions or at the margins of emergent wetlands. This is the same habitat preferred by other rare species such as *Cyris torta* (twisted yellow-eye grass), *Scleria trigloneata* (tall nut-rush) and *Rotala ramosior* (tooth-cup).

SELECTED REFERENCES: Fernald, M. L. and B. C. Schwbert. 1948. Studies of American types in British herbaria. *Rhodora* 50: 149-208.

Moore, J. W. 1973. A Catalogue of the flora of Cedar Creek Natural History Area, Anoka and Isanti Counties, Minnesota. Bell Museum of Natural History, Occasional Paper Number 12. Minneapolis, 28 pp.

FIELD

Spring Wildflowers at Crawford Woods

Date: Saturday, May 11, 1985
Time: 9 a.m. to 12 noon

Description: Crawford Woods is a large and diverse example of the "Big Woods" forest that once covered 15% of Minnesota, but is now reduced to only 2500 acres. This large remnant, 120 acres in size, was recently acquired by The Nature Conservancy for the DNR's Scientific and Natural Areas Program. Come and enjoy the spring wildflower display at this new preserve.

Meeting Place: From Rockford, Minnesota, take Highway 19 north for 6 miles to Highway 34. Turn left (west) onto 34 and go 6 miles. Turn right (north) onto County Road 126. Go one and one-quarter mile to the park on the righthand side of the road. The woods will stand out against the surrounding cultivated land. You will see Green Mountain Lake on the west side of Highway 126.

Leader: Keith Wendt. Keith is the Plant Ecologist for the DNR's Minnesota Natural Heritage Program.

Trip to Jim McKee Prairie

Date: Saturday, June 1
Time: 10:30-11:45 a.m.

Description: Jim McKee Prairie is an undisturbed remnant of black soil prairie in Ramsey County. The three-acre site is remarkable for its purity and diversity. Among the plants flowering this day should be stargrass, blue-eyed grass, Indian Paintbrush, downy phlox, alumroot and wood betony. Jim McKee Prairie is owned by the City of Maplewood and is managed by Maplewood Nature Center.

Meeting Place: Meet at Maplewood Nature Center, 2659 East Seventh Street in Maplewood.

What to bring: Wear long sleeves and long pants. Terrain is not difficult, but may be damp

Leader: Chris Soutter, Naturalist at Maplewood Nature Center.

Red Lake Peatland - Bottom to Top

Date: Sat./Sun., June 22-23
Time: 1 p.m Saturday-Peatland Ecology
7 a.m. Sunday - Birds of the Peatland

TRIPS

Description: The Red Lake Peatland, which is a national Natural Landmark, is one of the largest and finest examples of a patterned peatland complex in North America. The Saturday trip will make stops along Highway 72 to explore the major bog and fen landforms, including a spruce ovoid island, a ribbed fen water track, and a tamarack teardrop island. A variety of rare, interesting plant species such as orchids, pitcher plants, and sundews should be seen, as well as an assemblage of bird species that are primarily confined to these unique habitats. PLEASE NOTE: your feet will get wet, so plan accordingly.

Meeting Place: Waskish, Minnesota. On the west side of Highway 72 there is a parking lot near the Tamarack River, which passes through town. Participants will meet there.

Leader: Norm Aaseng. As the DNR's Peat Program Biologist, Norm has been coordinator of the research to identify Minnesota's most ecologically significant and sensitive peatlands.

Weaver Bottoms Canoe Trip

Date: Saturday, July 27, 1985
Time: 10 am

Description: Weaver bottoms is a backwater of the Mississippi River and is composed of a diversity of wetland plant communities including deep marsh, shallow marsh and floodplain forest. The emphasis of the trip will be observing and identifying wetland plants. The highlight of the trip will be (hopefully) observing the extensive lotus beds in bloom. We will see a wide variety of submergent, floating-leaved and emergent plants. Also observed should be a number of species of waterfowl and wading birds. We will not be canoeing any great distance; we will simply be using the canoes for easy access to the wetland plant communities. This will be a joint trip with the St. Paul Audubon Society.

Directions: Weaver Bottoms is located in Wabasha County between Kellogg and Minneiska. From the Twin cities, take Highway 61 south to the Weaver boat landing. The landing is just off the east side of Highway 61. Look for the U.S. Fish and Wildlife Service refuge sign and the Weaver railroad shack. If you cross the Whitewater River, you've gone too far south. It's about a 2.5 hour drive from the Twin Cities.

What to Bring: Canoe, insect repellent, lunch, rain gear, camera

Trip leader: Steve Eggers, an ecologist with the St. Paul District Corps of Engineers.

Trip to Wild Indigo Prairie

Date: August 3, Saturday
Time: 10:00 a.m.

Description: Wild Indigo Prairie is included in the Scientific and Natural Areas Program. There are more than 400 species of plants that have been documented in the Prairie. Easy terrain.

Directions: Meet at the Blue Heron Cafe in Brownsdale at 10:00 am. The Cafe is on Highway 56 approximately 20 miles south of Dodge Center (due south of the Twin Cities Metro area). Bring your lunch or you can eat at a nearby cafe.

Leader: Welby Smith,

Black Dog Preserve: Prairie and Fen in the Twin Cities

Date: Saturday, August 24
Time: 9 a.m. to noon

Description: Black Dog Preserve is a unique fen and prairie complex in the metropolitan Twin Cities area. The preserve is a joint project of the Minnesota Chapter of The Nature Conservancy and the Minnesota Department of Natural Resources Scientific and Natural Areas Program. It is located in the city of Burnsville, on the south side of the Minnesota River.

A fen is most simply described as a grassland on a wet and spongy site, characterized by an internal upwelling of ground water. Unlike the more common "bog", fens are calcium-rich and support a distinct group of plants, several considered threatened or rare. This prairie is one of the best in the metropolitan area.

Meeting Place: Coming south from Minneapolis on 35W, take the Cliff Road exit immediately after you cross the Minnesota River. Follow the road east back under the freeway and then turn left onto Cliff Road. Park on the south end of the MTC Park and Ride Lot.

Leaders: Bob Djupstrom and Peg Kohring. Bob is Supervisor for the Scientific and Natural Areas Program of the Department of Natural Resources. Peg is Assistant Director for the Minnesota Chapter of the Nature Conservancy.

The Prairie in Fall: Glacial Lakes State Park and Ordway Prairie

Date: Saturday, September 12, 1985
Time: 10 a.m. to 4 p.m.

Description: The hill prairie at Glacial Lakes State Park is still much like that found there 100 years ago. Prescribed burns have maintained the species composition, resulting in spectacular displays of native plant communities throughout the growing season.

The Nature Conservancy's Ordway Prairie is a 582-acre mosaic of prairie, wetland, and woods located near the prairie-forest border in west central Minnesota.

Meeting Place: Glacial Lakes State Park. From Starbuck take Highway 29 south for 3 miles to where County Road 41 joins 29. Take 41 for 2 miles to Glacial Lakes State Park (you can also follow the brown and white State Park signs.) Meet at the beach picnic grounds parking lot.

Leaders: Paul Rundell and Ben Thoma.

Field Trip to Boot Lake SNA

Date: Saturday, September 21
Time: 10 a.m.

Description: Boot Lake Scientific and Natural Area (SNA) is located in northeastern Anoka county, approximately 18 miles southeast of Cambridge. The tract supports a diverse array of flora in a noteworthy succession of vegetation types. The preserve is significant geologically as part of a chain of ice-block basin lakes lying in a subglacially formed feature called a tunnel valley. One also finds a continuum of plant communities on the tract beginning with the emergent vegetation and floating mats bordering the lake, to wet meadows, to shrub thickets and wet forests in low-lying areas, through the oak forests found on the driest upland sites.

Directions: One hour's drive from the Twin Cities. From St. Paul, take I-35E north to Co. Road 26 in Wyoming. Take Co. Road 26 west to Co. Road 22, then turn south. Stay on 22 until you reach Co. Road 17, then take 17 east to the entrance sign for the Carlos Avery Wildlife Management Area (this is where the blacktop turns south). Turn left at this intersection onto the unmarked sand road and proceed north to the small parking lot (marked by a sign) for visitors to Carlos Avery area. This lot is located on the right side of the road about 3/4 miles in. Meet in the parking area at 10 a.m.

Leader: Peter Buessler,

Minnesota Plant Press is published by
the Minnesota Native Plant Society,
220 Biological Sciences Center,
1445 Gortner Avenue,
University of Minnesota,
St. Paul, Minnesota, 55108

CALENDAR OF EVENTS

- May 1 - MNPS monthly meeting: "Root and Seedling Exchange" and Field trip slide show from 1984. 7:30 p.m.
- May 11 - Nature Conservancy field trip to Crawford Woods, led by Keith Wendt. 9 a.m.
- June 1 - MNPS field trip to Jim's Prairie, led by Chris Soutter. 10:30 a.m.
- June 22-23 - Nature Conservancy field trip to Red Lake Peatland, led by Norm Aaseng. 1 p.m. Saturday and 7 a.m. Sunday.
- July 27 - MNPS field trip to Weaver Bottoms, led by Steve Eggers. 10 a.m.
- Aug. 3 - MNPS field trip to Wild Indigo Prairie, led by Welby Smith. 10 a.m.
- Aug. 24 - Nature Conservancy field trip to Black Dog Preserve, led by Bob Djupstrom and Peg Kohring. 9 a.m.

Sept. 12 - Nature Conservancy field trip to Glacial Lakes State Park and Ordway Prairie, led by Paul Rundell and Ben Thoma. 10 a.m.

Sept. 21 - MNPS field trip to Book Lake Bog, led by Peter Buessler. 10 a.m.

MNPS monthly meetings are at 7:30 pm in the Palmer Classroom Building, Room 10, University of Minnesota, St Paul Campus

MNPS DIRECTORY

Officers — 1984/1985

Welby Smith, President
Steve Eggers, Vice-President
Deb Brown, Secretary
Roger Eliason, Treasurer
Evelyn Moyle, Director-at-large
May Wright, Director-at-large

Committees

Peg Kohring, Programs
Barbara Coffin, Conservation
Neil Anderson, Newsletter
Nancy Sather. Publicity