

ON THE FRINGE

NRIIVE HANT SOCIETY OF NORTHEASTERN OHIO

Founding Chapter of
THE OHIO NATIVE PLANT SOCIETY
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MESSAGE FROM THE PRESIDENT

As this issue reaches you, we find ourselves into the growing season and our busy program schedule. Please refer back to your first quarter journal for the entire year's schedule of events. If events are added, you will be notified. Of course changes also do occur. Call here at anytime to clarify or confirm updated schedules of events.

Many of you are curious as to the status of "Trillium", the Journal of the Ohio Native Plant Society. I attended the annual meeting of all chapters that compose the Ohio Native Plant Society, which was held in Columbus on March 28, 1993. The state journal has had problems. To make up for their failure to print issues in the calendar year 1992, the state will try to lish 2 issues this year to make up for their shortage of 2 from last year. They will do so at no additional charge to

members of the participating local chapters (we are one). They aim early summer for issue #3 (you should have received two last year).

The delay is based on two separate causes. One, Editor, Paul Solyn, of Ohio University in Athens moved out of state. It was recent that Dr. Jerry Snider of the University of Cincinnati agreed to take over. Another cause was the lack of enough copy to fill the expected number of pages. In March, we were told they are within a couple of pages of complete.

Based upon comments from chapter delegates as to content, receptivity and quality of "Trillium" as perceived by the members, some clarification is appropriate. I am enclosing in this issue, the "Guidelines for Authors" set forth by Trillium's editorial board. Hopefully this will encourage greater local participation, we are assured they do not want scientific treatise work. Furthermore, book reviews, favorite spots, gardening tips are all welcome. Their guidelines seek to set a minimum standard and do require scientific accuracy though not at the expense of readability!

The editorial staff of Trillium intends to present in depth articles describing natural areas of significance. The first such article should be appearing in the upcoming issue. It will feature "Hazelwood Preserve", a 65 acre natural landmark located in Cincinnati. It was studied by E. Lucy Brown. It's soil is acidic occupying an edge of the Illinosian glacial till plain. The preserve contains a 500 plant population of 3 bird orchids. Permission to enter should be obtained.

At the annual meeting, it has again been brought to our attention that some nurseries are still selling plants they should not. I speak of both rare and listed species as well as exotic invasive species. One allegation is particularly annoying. Breezewood is reported to be selling Michigan dug orchids. If you learn of these type of happenings, please let us know. For those who are motivated, write your state representatives. Perhaps even your federal representatives, upon receiving enough complaints, maybe they will act. Also, for state listed species, notify Ohio Department of Natural Resources.

Finally, if you see the "renewal" message by your name sticker on the last page, this will be your last issue unless you rejoin.

It has just recently been reported that a new species of orchid has been discovered just across the Ohio border into Kentucky. The white pouched orchid is similar to the Yellow Lady's Slipper in appearance. The name? Why, Cypripedium kentuckiensis, of course, so start searching the border areas!

Speaking of new orchid species, our May 8th add on program of Paul Martin Brown from the New England Wildflower Society, featured the discoverer and describer of Plantanthera pallida, a white fringed orchid somewhat between ciliaris and blephariglottis. His scientific description was in the journal "Novon". Paul found the new species at Montauk, Long Island where it had been known for some years, but as a suspected variation of ciliaris or blephariglotis. Besides distinguishing traits, a genetic study proved it a good separate species.

NORTH CHAGRIN'S LOWER CASTLE TRAIL

By Tom Sampliner

Especially in early spring when those rainy days accumulate and sound the wake-up calls to the forest, stretches of the lower castle trail at North Chagrin Reservation in Cuyahoga County's Emerald Necklace are a carpet of pastels from the wildflowers.

That portion of the trail that parallels River Road not too far south of Squire's Castle is especially rich. An added attraction is the close access to several turnouts along River Road, so those of us who are camera buffs can park real close and become human pack mules for more reasonable distances. With tripods, backpacks full of lenses, camera bodies and the like, this maybe as important as the more obvious attraction.

Getting down to business, the trail from the castle southward undulates alongbottom lands before turning upward at the River Rouge sled and ski concession areas. It is that stretch of trail that is particularly loaded.

If you can't find enough specimens of Purple Cress, Cardamine douglassii to photograph in several pastel shades from pink to white, you're not in the right spot. The same could also be said of Spring Beauties, Claytonia virginica.

Perhaps not quite as common place, but plentiful enough are: Trillium grandiflorum, Bloodroot, Sanguinaria canadensis; Blue Cohosh, Caulophyllum thalictroides; Trout Lily, Erythronium americanum and to a lesser extent hepatica

hepatica, <u>Hepatica</u> <u>acutiloba</u>; <u>Rue Anemone, Anemonella</u> thalictroides, Wake Robins, <u>Trillium erectrum</u>; <u>Toothwort, Dentaria laciniata</u>; Ramps, <u>Allium tricoccum</u> and Wild Ginger, <u>Asarum canadense</u>.

Some of us shy away from the sedges and grasses due to the minute detail required for identification. One early sedge that is easily recognized by broad leaf blades and well represented on this trail is the Plantain Leafed Sedge, Carex plantaganea. Some beautiful examples are found on the banks lining the trail. The sedges are therefore accessible for photographers who can set up right in the trail, extend tripod legs and shoot even with the banks lining the trail.

Occasional patches of both Dutchman's Breeches, <u>Dicentra cucullaria</u> and Squirrel Corn, <u>Dicentra canadensis</u> can be found. Frequently they're amidst solid masses of Ramps, Purple Cress and Trout Lily.

At Squire's Castle, just south of where River Road turns into the parking lot driveway, there is a small wooded patch near the culvert adjoining the road. In the middle of this small area is a nice group of the white flowered Trout Lily.

Walking south away from the Castle parallel to the road, you eventually turn west and start upland toward the sled hill. On the way, you cross one of the many creek tributories to the Chagrin River. That first creek is surrounded with one of the largest solid masses of Wild Hyacinth, Camassia scilloides that I've ever encountered. Early to mid May that mass is an impressive sight of thousands stalks with racemes of blue flowers amidst a sea of greenery.

One lonely patch of Goldenseal, Hydrastis canadensis sticks out amidst all this greenery just a little farther south of the Hyacinth.

Later on, yet mid June, there are Lillies and other interesting finds.

Keep the trail in mind for a local quick but always productive walk.

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TRILLIUM

The Journal of the Ohio Native Plant Society

Guidelines for Authors

What we publish: Trillium publishes articles dealing with plants native to Ohio, and with all related subjects. We're interested in both scientific studies and popular articles. Our readers include both professional botanists and knowledgeable amateurs; most are members of our sponsoring chapters in the Ohio Native Plant Society.

We rarely publish articles on plants that do not grow in Ohio. In addition to articles on Ohio botany, we're interested in topics in related sciences, conservation, horticulture, and botanical history. We also publish profiles of natural areas in Ohio and adjacent states, book reviews, and news of interest to ONPS members.

Tone: Write in a style that is natural and comfortable. We don't require authors to conform to the style of an academic journal, nor do we "write down" to a general audience. We especially like articles to emulate the tone of Smithsonian or Scientific American. It's fine to use first-person pronouns ("I" or "we") when the context allows it, and to address the readers as "you", especially in practical articles. Please don't use the passive voice unnecessarily. In the reference to a plant, give both the scientific name and any common names with which readers may be familiar.

Accuracy: We require scientific information to be accurate and complete, and all manuscripts considered for publication will be reviewed for scientific accuracy. However, we don't insist that every article reflect an original contribution to scientific knowledge.

Length: Most articles should be between 500 and 3,000 words long. Occasionally we will use articles as long as 5,000 words. Very long articlesmust be of exceptional merit and may have to be serialized.

Documentation: Use whatever documentation your subject requires. End notes in any standard format are acceptable. We can also include brief bibliographies or lists of suggested reading, but cannot publish extensive bibliographies.

Illustrations: Please let us know with your manuscript or query if you can provide illustrations. We prefer line art but may be able to use halftones. We may also be able to obtain illustrations. All artwork must be either original or from out-of-copyright sources.

Conservation: Please include any relevant conservation issues in your article. We do not publish articles that we believe would intend to encourage the collection of wild plants or the sale or trade of plants of unknown to be available from legitimate sources or that home gardeners can propagate. You may include a short list of recommended sources. In articles dealing with rare or threatened species, you may wish to avoid divulging precise locations of species on which there is likely to be collecting pressure.

Language: Please use inclusive (non-sexist) language.

Book reviews: We publish reviews of books that will be of interest to our readers, and these need not be specific to the botany of Ohio. Books for full review (500-800 words) should be new or recent publications (recent enough that most of our readers won't already be familiar with the, at least). For reprints and reissues we may use shorter notes. Please query before submitting reviews. If there's a book you'd like to review but you don't have a copy, let us know. We can request a review copy from the publisher.

Format: Manuscripts should be double-spaced or equivalent, on one side of $8\frac{1}{2} \times 11$ paper, in legible print. We prefer to receive two copies of unsolicted manuscripts, but for queries and solicted manuscripts one copy is sufficient.

Whenever possible, we'd like to receive Final drafts of articles on PC-compatible diskettes. Either $3\frac{1}{2}$ - or $5\frac{1}{4}$ -inch diskettes, double or high density, are acceptable, and we can work with the formats of most major word processors.

Editing: We will return the edited manuscript to you for verification and approval. Please let us know if you will be unavailable at any time between the submission of your manuscript and the anticipated date of publication.

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ANNUAL DINNER SPEAKER

James K. Bissell, Curator of Botany and Director of Natural Areas for the Cleveland Museum of Natural History, has accepted the board's invitation to be the speaker at our annual banquet, Saturday evening November 13, 1993 at the Garden Center of Greater Cleveland.

Jim has selected as his topic, "RARE_PLANTS OF OHIO" including the habitats they grow in". Significant samples from all over the state will be included.

Those who know Jim appreciate what a fine speaker he is. Based upon Jim's annual contribution to the state list of rare plants, we can expect a knowledgeable talk with quite a few personal experiences. So start spreading the word and let's have a big turnout for one of our own.

THE TRICK WITH BOTRYCHIUMS

By Tom Sampliner

Over Memorial weekend this Spring, on a trip to York County in southern Maine I was visually introducted to numerous different Botrychiums.

The site was an old cemetery in the town of Acton, Maine. In open but mowed spaces between headstones, our group was able to observe the differences between several species. I don't know about the rest of you, but I rarely find Botrychiums at all; yet here in profusion, I was finally able to put a visual image with written descriptions.

Imagine the sight we provided passing motorist with 16 people, all on hands and knees, looking for different species. I wouldn't have been surprised if the police decided to check out this weird group.

A good introductory discussion of the succulent ferns is contained in Boughton Cobb's book "A Field Guide to the Ferns and Their Related Families". The succulent ferns are known botanically as the Ophioglossaceae family, represented by two genera; namely, Ophioglossum and Botrychiums. The former, are known commonly as the Adder's Tongue Ferns while the latter are known as Grape Ferns.

Adder's Tongue is an appropriate description for the fertile frond because the panicle consisting of a single stalked spike was naked sporangia cohering in 2 rows; the resemblance is a snake's tongue.

The Grape Fern epithet fits the sporophyte (fertile frond) because the round tightly packed sporangia resemble grape clusters.

Various authors give general shared traits as being perennial, smooth, without scales, soft fleshy stems and roots. When you consider that the sterile fronds generally range from only 16 centimeters for Botrychium virginianum, the Rattlesnake Fern, it's no wonder discovery and observations are difficult.

The examples of <u>simplex</u> were a first for me. Cobb describes the habitat as damp meadows, moist woodlands and on pasture edges with poor soil. At the cemetery there were loads of British Soldiers and Pixie Cup Lichens in the dry, rather barren, open spaces. Search for a single compound leaf close to the stem and closer to the ground. The common name; "Dwarf", is justified.

Daisyleaf Grape Fern, <u>Botrychium matricariaefolium</u> was an attractive companion to the Dwarf. Even I could see the pale green daisy - lik leaf (twice cut). There weren't yet any clusters of bright yellow spore cases on the fertile frond.

Next, I throw into this mixture <u>Botrychium multifidum</u>, the leathery grape fern. At this point, it is necessary to forget Cobb for a better reference. Try to acquire "Ferns and Fern Allies of Canada" a 1989 work by William J. Cody and Donald M. Britton. I found the leathery (coriaceous) aspect of this fern most helpful as a trait. The Canadians additional description of the blade as evergreen, long-petioled, ternate, attached near the base with the ultimate segments overlapping (imbricate) is as good as words can help without seeing the plant.

To distinguish Botrychium rugulosum, Cody and Britton's key seems to cite a hyaline (transparent or translucent) trait for the sterile frond margins in multifidum but absent in rugulosum as the most obvious difference in their key. However, I can't help but notice that their line drawings seem to agree with what we saw in the field; that rugulosum appears lacier and more serrate along the margins.

These latter two species, <u>multifidum</u> and <u>rugulosum</u> came out of the key as being evergreen, while earlier mentioned species <u>simplex</u> and <u>matricariaefolium</u> are deciduous. The evergreen species were certainly easier to distinguish, displaying mature traits, while the deciduous at this early stage were taken on faith from our leader, Paul Martin Brown.

The next species seen at the cemetery was <u>Botrychium lanceolatum</u>, another deciduous grape fern. This one is recognized by the three sessile deltoid blades being afixed to the top of the stalk. It is true to it's lance - leaved name and can't be confused with any of the previously referred to species.

Over toward the coast near Kennebunk, Maine we saw our final species in Ophioglossaceae family. In a wet open meadow where we had come primarily to see Arethusa bulbosa we found Ophioglossum vulgatum var. pseudopodum by Cody and Britton and Ophioglossom pusillum by still others.

It certainly doesn't look much like a fern. The one leaf or frond is simple, ovate, attached to the rachis at the leaf base. It is oblong, blunt-tipped, smooth and bright green. The sporophyll arises from the leaf base on a slender stalk. It contains two row of bead-like sporangia. This is so small you reall must be bent over on hands and knees to locate one.

A trait that amazed me, was the high number of chromosones in Ophioglossum, 480 in vulgatum. Cody and Britton caution that such high numbers in chromosones and even DNA are only factors to consider. They cite Selaginella apoda or densa with only a 9 count for chromosones yet they have as many morphological features. Certainly these plants have been around for a long time. Whatever the advantage such counts give them, they are successful and always a facinating find to discover, study, photograph and just enjoy wherever encountered.

REMINDERS

Saturday, July 17th 9:30 - 2:30

Fen walk with Emliss Ricks and Art Kuhlman RSVP after 5:00pm daily to Art (216) 928-4336

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Wednesday, August 4th 4:30pm Canoe the Upper Cuyahoga River RSVP with Duane Ferris (216) 834-4536

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Sunday, September 12th, 10:00am - 4:00pm Castalia Quarry Metro Park & Resthaven meet at Castalia Metro Quarry Park Parking Lot, one mile southwest of Castalia on St. Rt. 101

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Tuesday, October 5th, 7:00pm members slide show at the Members slide show at the Chagrin Falls Library.

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Saturday, October 9th, 10:00am - 4:00pm
Cuyahoga Valley
RSVP at Art Kulhman (216) 928-4336 meet at bike and
hike trailhead parking lot on Boston Mills Road,
west of Rt. 8 but east of Riverview.

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