

SOLIDAGO

The Newsletter of the
Finger Lakes Native Plant Society



Logo art of Tall Goldenrod, *Solidago altissima*,
by Nat Cleavitt, 2006

Volume 13, No. 3



October 2012

EDITORIAL

Autumn Splendor



AS THE GREEN HERBAGE that has surrounded us since spring begins to change color, wither, and drop, we approach a drastic transition into the more somber, leafless landscapes of winter. But what a transition! While spring gently gives us a spectacular wildflower pageant in pastel hues, autumn shouts with all the boldest colors of her palette in a triumphant display that is unsurpassed at any other season. “October’s bright blue weather” (of Helen Hunt Jackson’s familiar poem) dazzles and invigorates us; while the wonderful beings we call PLANTS gloriously rejoice over completing another season of growth, flowering, and seed production.

Colored trees predominate, because of their sheer size and abundance of leaves — *scarlet* in maples and sumacs, *yellow* in hickories, birches, and aspens, *purple* in ashes and Sweet Gum, and *orange and bronze* in oaks. But the shrubs, vines, and herbs are having their own festival, with smaller-scale, sometimes subtle changes in color that are fascinating to watch as they develop, day-by-day. Look for intense purple with hints of turquoise in Bittersweet Nightshade, shimmering lavender foliage on Maple-leaved Viburnum, and gorgeous blues, crimsons, magentas, oranges, and yellows in drooping clusters of fruits in their full autumn luxuriance.

Among wildflowers, the composites dominate. Constellations of asters twinkle along roadside ditches, and in fens and wet meadows, with rays that range from white to lavender to royal purple, swirling around yellow disks; while goldenrods spill their fragrance and bright velvet everywhere, against the greenest grass we have seen since early spring.

The centerpieces to all of these are the GENTIANs, elegant cobalt blue miracles of early autumn that may be the most beautiful blooms of the season. Gentian species are scarce in the Finger Lakes Region; but **Fringed Gentians**, the loveliest, still bloom in sequestered havens on damp limy soils that nurture their amazing flowers and smooth yellow-green foliage.

All of these are here, they are exquisitely beautiful, and they beckon us. Go out and enjoy them!

The **Fringed Gentian** (*Gentianopsis crinita*) is the quintessential autumn wildflower of the Finger Lakes Region. Drawn at Cornell University’s Fringed Gentian Natural Area near Ithaca, N.Y., on 22 Sept. 1991 (½ life size).
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Finger Lakes Native Plant Society

Volume 13, No. 3

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THE FINGER LAKES NATIVE PLANT SOCIETY STEERING COMMITTEE

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Please Contribute to *Solidago*

WE WELCOME CONTRIBUTIONS THAT FEATURE WILD PLANTS OF THE FINGER LAKES REGION OF N.Y. We include cryptogams (bryophytes, lichens, fungi, and algae) as "flora," and recognize that green plants provide habitats and substrates for these and many animals, especially insects. We are interested in zoological associations as long as plants are an integral part of the story.

We can use a wide spectrum of material in a variety of writing styles. Our regular columns include the NAME THAT PLANT CONTEST (identifying a mystery plant from images), LOCAL FLORA (plant lists from special sites), OUTINGS (reports of FLNPS-sponsored excursions), PRESSING CONCERNS (news from regional herbaria), and PLANT PROFILES (on specific local plants). We also occasionally publish APPRECIATIONS (memorials to local botanists), CHARISMATIC PLANTS (stories about formative early encounters with flora), REVIEWS (of books, talks, workshops, nurseries), FEEDBACK (commentaries and letters to the editor), ESSAYS (on botanical themes), VERSE (haiku, sonnets, and poems of less formal structure), ART (botanical illustrations, plant designs, pencil sketches, decorations), and PHOTOGRAPHS (stand-alone images, photo essays, and full-page composite plates, or originals that can be scanned & returned). We also can always use FILLERS (very short notes, small images, cartoons) for the last few inches of a column.

At present we operate in a black-and-white universe, so contributors need to plan illustrations for this format.

Please send *Solidago* contributions
& correspondence to

Robert Dirig, Editor, P. O. Box 891, Ithaca, NY
14851-0891, or by email to red2@cornell.edu.

**Deadline for the December 2012
issue is November 15th.**

NAME THAT PLANT CONTEST



I GROW IN DAMP, LIMY PLACES in the Finger Lakes Region, especially in fens and on seepy calcareous banks and cliffs. My leathery, spoon-shaped leaves grow in a rosette, which sends up long stalks, each topped with a single flower (*above*), in August and September. My concave petals are pure white, and beautifully fluted between olive-green veins, which (if I do say so myself) form one of the most elegant and beautiful flowers of the season. I'd love to introduce myself, but need to wait until you try to guess my name. My portrait was taken at McLean Bogs Preserve on Sept. 1st 2006, by the Editor, who will receive entries (to the email address in the box on the previous page), and report my identity in the next issue.

The photo from the last issue's NAME THAT PLANT CONTEST [*Solidago* 13(2), page 2] was of **American False Hellebore** (*Veratrum viride*). Its pleated leaves are very distinctive, as well as quite showy. Later in the season the flowers are equally attractive, although somewhat subtle, unless viewed up close. Ronald Palmquist commented: "Those distinctive leaves are of a *Veratrum viride*. When I first saw them in the woods I thought they were escaped plants from a garden show."

Thanks to all those who entered the contest and congratulations to contest winners: Betsy Darlington, Bob Dirig, Vern Durkee, John Gregoire, Sue Gregoire, Ken Hull, Susanne Lorbeer, Ronald Palmquist, Lisa Podulka, and Louise Raimondo. — *David Werier*



Design from
Gentiana clausa

~3~

THANK YOU!

WELCOME to the October 2012 issue of *Solidago*! You may notice a slight difference in the layout, although I've followed the framework developed by **DAVID WERIER** since the inception of this newsletter, in October 2000. We owe a huge debt to David for his production of 47 quarterly issues of *Solidago* over 12 years! Their very high quality and interest have done much to promote the FLNPS. David has offered to continue his popular "Name That Plant Contest," and has been appointed *Newsletter Editor Emeritus*.

Members of the **FLNPS STEERING COMMITTEE** have also given long years of service in establishing this wonderful regional botanical organization and performing the "routine but noble tasks" that maintain it. All present and past members of the Committee have my thanks and respect for their continuing dedication and contributions.

FOR THIS ISSUE, I thank David for his support during the transition; writers Rosemarie Parker, Norm Trigoboff, Charles R. Smith, Anna Stalter, Ellen Folts, & David Werier; Rosemarie & Susanne Lorbeer for soliciting Ellen's account of the Fern Walk, which is the first extensive article on local pteridophytes published in *Solidago*; Ellen & Charles for their photos, as credited; David, Anna, & Rosemarie for orientation and advice; Nat Cleavitt & Lori Leonardi for help with a bryophyte reference; Torben Russo & Scott LaGreca for feedback and support; Gnomon Copy for printing; and Rosemarie & Susanne for mailing the issue. The botanical drawings and decorations on pages 1, 3, 11, & 14 are mine.

I am honored to have been asked to edit *Solidago*, and hope you will enjoy this and future issues. — *Robert Dirig*

October,

ESSAY

1900.

Junior Naturalist Monthly.

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AUTUMN LEAVES.



N the hills the leaves are coloring. Gradually the summer greens are turning to red and gold. The October haze is on the fields. The sky is near Stillness is in the air The year is ripe.

I see the pageant along the countryside, like a procession stretching away to paradise. There are kings and queens in purple and silver and gold. There are people in green and buff and brown. There are children in red and pink and yellow My eyes are drunk with color

Over the fields and in the swamps I wander I smell the weedy odor of the Indian summer Yellow and fiery-red are the maples. Red and morocco-red are the oaks. Nut-brown are the beeches. Straw-yellow are the grasses, and brown and sere are the weeds. Each kind has its color

And yet there are colors on the maple in the meadow and other colors on the maple on the hill The oak on one side of my doorway is maroon-red and that on the other side is veiny-yellow, and they have been the same in all the Octobers in which I have loved them. Each plant has its color

Floating, sailing turning the autumn leaves drop one by one. Content I sit in silence, and let the colors fill my soul.

[by Liberty Hyde Bailey]

L. H. B.

The Nature of Caywood Point, Finger Lakes National Forest

by Charles R. Smith

FINGER LAKES NATIONAL FOREST, with an area of approximately 15,000 acres, is the only National Forest in New York State. It sits astride the Hector Ridge, the boundary between the Seneca Lake and Cayuga Lake watersheds. At the westernmost boundary of this National Forest, on the eastern shore of Seneca Lake, lies **CAYWOOD POINT**. Caywood Point has fascinating cultural and natural histories. The historical information below is excerpted from the Finger Lakes National Forest website [http://www.fs.fed.us/r9/forests/greenmountain/htm/fingerlakes/links/press/docs/forest_notes_article_fossenvue_flnf.pdf], where the interested reader can find a much more detailed account of the history of this special place.

From 1875 until the early 1900s, Caywood Point was the location of a summer camp, **FOSSENVUE**, with ties to both Geneva and Peterboro, New York. The camp was founded by **Elizabeth Smith Miller**, who lived at Lochland Estate, on the shore of Seneca Lake in Geneva. Fossenvue evolved into a summertime retreat for a number of suffragettes and the children of influential social reformers of the time. The camp was quite progressive for its period, and a center for lively theoretical, political, and philosophical discussions, among both men and women, as well as recreational pursuits. The noted Ithaca artist, Louis Agassiz Fuertes, is reported to have been among the visitors to Fossenvue.

The original founders of Fossenvue included Anne Pilfrey Bridge, James Fowler, Anne Fitzhugh Miller, Elizabeth Smith Miller, William Fitzhugh Miller, Emily Dilworth Snyder, and Ruth Leslie VerPlanck. Fossenvue is an anagram of the phrase "Seven of Us." It is reported that the group had a contest to rearrange the letters of "seven of us" to name the camp, and the prize (a cooking apron) was won by Elizabeth Smith Miller. There were several buildings at Fossenvue, but only one, the "Queen's Castle" remains (Fig. 1); it has been restored by the Forest Service. Elizabeth Smith Miller became known as the "Queen of Fossenvue," and the building honoring her now is listed on the National Register of Historic Places.

Over time, Caywood Point became a summer camp, **CAMP SENECA**, for the Boy Scouts of America. Eventually, it fell into disuse by the Scouts. Around 1996, it was purchased by the U.S. Forest Service and added to Finger Lakes National Forest. The old, dilapidated buildings on the site were razed. In 2004, the Forest Service renovated and repaired the Queen's Castle and improved a road to the lakeshore. It is the only easily

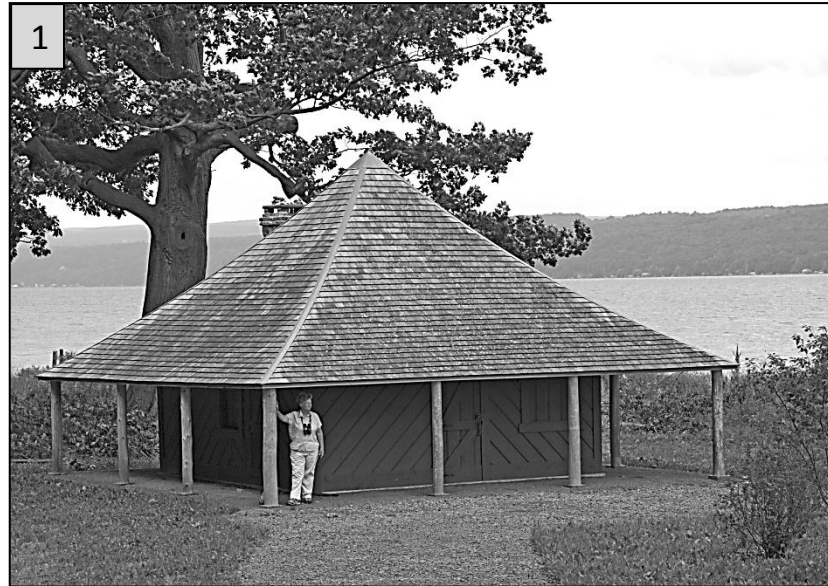
accessible lakeshore property included as part of Finger Lakes National Forest at this time.

THE NATURAL HISTORY OF CAYWOOD POINT is closely linked to its geomorphology. It is a steep, dry slope, with a west-facing aspect. The underlying rock strata, consisting mostly of calcareous shales, lie near the surface and are exposed in many places. The relatively high pH of the soil is suitable for many plants that do well in shallow, dry, alkaline soils. Among the locally rare or scarce plants that can be found at Caywood Point are *Allium cernuum*, *Arabis drummondii*, *Celastrus scandens*, *Morus rubra*, *Oryzopsis racemosa*, *Quercus muhlenbergii* (Fig. 2), *Shepherdia canadensis*, *Solidago squarrosa*, and *S. ulmifolia*. Though not rare in our area, *Asplenium platyneuron* and *A. trichomanes* (Fig. 3) also can be found growing on the exposed shale banks along the trail to the Queen's Castle. Several of these plants were seen on the Finger Lakes Native Plant Society's field trip to Caywood Point on 15 July 2012 (see list).

Other plants contribute directly to the butterfly diversity that can be found at Caywood Point, where more than 20 different butterfly species have been observed over the past three years. *Zanthoxylum americanum* is a relatively common understory shrub in the forest at Caywood. *Juniperus virginiana*, another plant that favors alkaline soils, has become established in an abandoned vineyard (also part of the National Forest) bordering the road that leads to the parking area at Caywood. Both of these plants provide food for the larvae of two locally rare species of butterflies. Larvae of the Giant Swallowtail (*Papilio cresphontes*, Figs. 4-5) feed on *Zanthoxylum*, a member of the citrus family (Rutaceae). In the southern part of its range, Giant Swallowtail larvae feed on the leaves of cultivated citrus. A small colony of Giant Swallowtail was found for the first time at Caywood Point in June 2011. Another specialist, the Juniper Hairstreak (*Callophrys gryneus*), has larvae that feed exclusively on *Juniperus virginiana* in our area. The hairstreak was found for the first time at Caywood in June 2012, nectaring at *Cornus racemosa* (Fig. 6).

CAYWOOD POINT IS LOCATED just west of N.Y. Route 414, north of Watkins Glen and Valois, N.Y., just opposite the entrance to Shalestone Vineyards. As you travel north, look for the Forest Service sign (white letters on brown background) that says "Caywood Point" on the west side of the road. You can drive between the gateposts and down a one-lane, gravel road to a parking area, where there is an information kiosk and toilet. It is an easy walk of about 0.7 mi. from the parking area to the Queen's Castle and the lakeshore at Caywood Point. In addition to the Queen's Castle, you also can enjoy seeing some very old, massive, open-grown oaks (Fig. 7). The walk back is more challenging, up a 20% slope, but there is a bench

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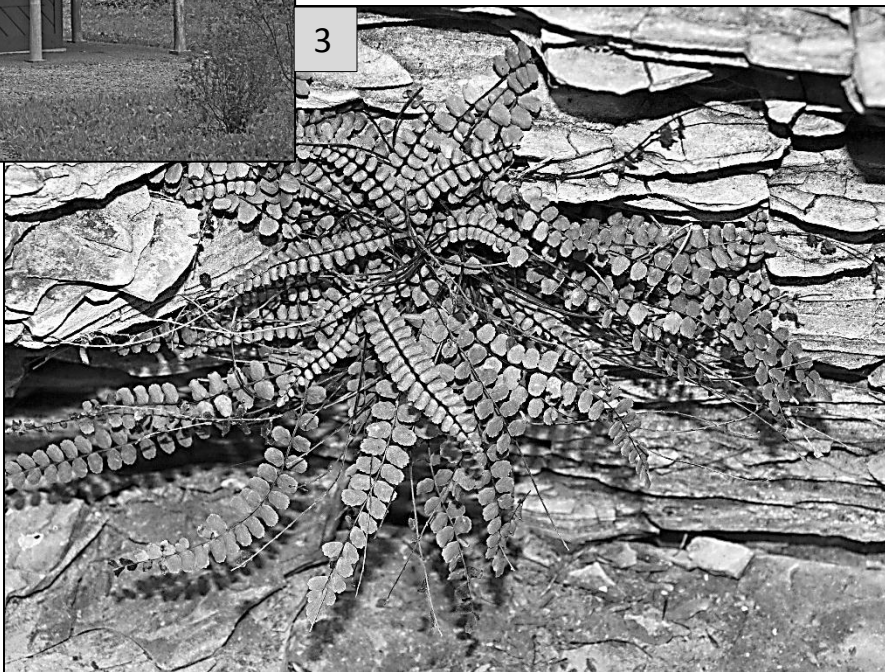


about halfway up where you can sit, rest, and enjoy the view. If you happen to visit Caywood Point on a hot summer day, be sure to take along plenty of water. Whether your interest is cultural history or natural history, Caywood Point is well worth a visit.

*Charles R. Smith, Department of Natural Resources, Cornell University.
(crs6@cornell.edu)*



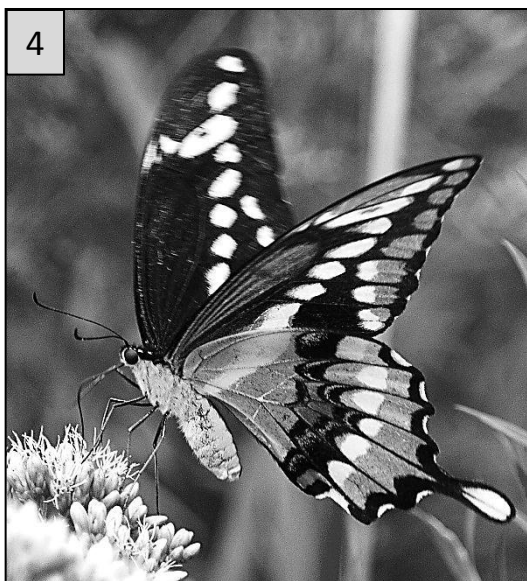
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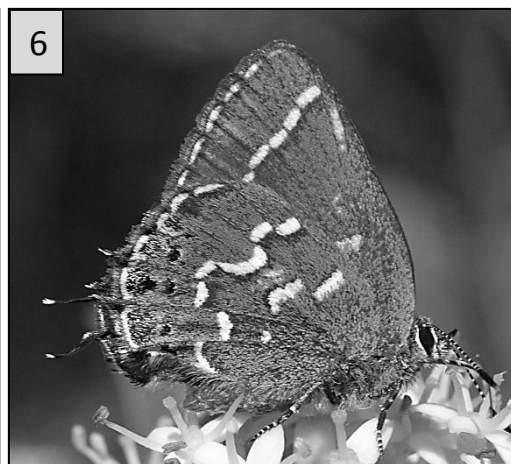
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6



Treasures of Caywood Point, Finger Lakes National Forest

1 - Queen's Castle on Seneca Lake. **2 - *Quercus muehlenbergii***, a rare oak at this site. **3 - *Asplenium trichomanes***, a lime-loving fern. **4 - Giant Swallowtail**, now resident at the site, nectaring at *Eutrochium* cf. *maculatum*, on 19 Aug. 2011. **5 - Giant Swallowtail larva** nibbling on its *Zanthoxylum americanum* foodplant, 5 Sept. 2011. **6 - Juniper Hairstreak** nectaring on *Cornus racemosa*, 7 June 2012. Its larval host is *Juniperus virginiana*.



7 - Cricket Melin provides scale for one of the massive oaks at Caywood Point. 🍷 Photo by Charles R. Smith.

FLNPS Caywood Point Trip, July 15th 2012

by Anna Stalter

Ten FLNPS members and friends joined **Charlie Smith** and **Robert Wesley** for a walk along the newly constructed trail leading from a parking area just off Route 414 in Hector to the eastern shore of Seneca Lake at Caywood Point. Charlie, who knows the area well as a result of many years' work with the Finger Lakes National Forest, had suggested the trip. With Robert along for plant identification, and Charlie providing avian and lepidopteran identifications and knowledge, the group ambled down the trail. Despite a persistent drizzle, we observed numerous plant species, some notably unusual and others familiar (see list at right), and we got a nice view of a Hummingbird Clearwing Hawkmoth (*Hemaris thysbe*) nectaring in a patch of Beebalm (*Monarda fistulosa*). Once down the hill, we stopped for lunch by the lake shore, taking in the history and the natural beauty of this former camp. The real show-stopper was a Giant Swallowtail (Fig. 4), flitting among the vegetation for several minutes, much to the delight of the photographers among us. On the way back up the steep hill, we made a brief foray to the cliff edge on the east side of the trail, where we had a dizzying view of the lake below, and added several more plant species to the trip list. Thanks to Charlie and Robert for leading an enjoyable and memorable trip to this unique site!

Plant Species Observed at Caywood Point Trail, Seneca County, N. Y., on July 15th 2012

West-facing Calcareous Slope along the Trail

Quercus muehlenbergii (Fig. 2), *Q. alba*, *Juniperus virginiana*, *Prunus virginiana*, *Fraxinus americana*, *Celastrus* sp., *Solidago juncea*, *Monarda fistulosa*, *Erigeron annuus*, **Dianthus armeria*, **Daucus carota*, **Prunella vulgaris* var. *vulgaris*, *Morus rubra*, *Elymus villosus*, *Zanthoxylum americanum*, **Valeriana officinalis*, *Toxicodendron radicans*, *Tilia americana*, *Ostrya virginiana*, *Ulmus rubra*, *Elymus virginicus*, **Prunus mahaleb*, *Helianthus divaricatus*, **Rosa canina*, **Picris hieracioides*, *Verbena urticifolium*, **Plantago lanceolata*, **Hypericum perforatum*, *Geranium robertianum*, *Acer nigrum*, *Antennaria parlinii*, *Amelanchier intermedia*, *Danthonia spicata*, *D. compressa*, *Carya cordiformis*, **Verbascum thapsus*, *Asplenium trichomanes* (Fig. 3), *Lactuca biennis*, *Rhus typhina*, *Dryopteris marginalis*, *Ribes cynosbati*, *Rubus odoratus*, *Prenanthes* sp., *Ageratina altissima*, *Boechera canadensis*, *B. laevigata*, *Rosa carolina*, *Circaea lutetiana* ssp. *canadensis*, *Cornus rotundifolia*, *Galium boreale*, **Rhamnus cathartica*, *Rhus aromatica*, **Epipactis helleborine*, *Symphoricarpos alba*, *Comandra umbellata*, *Triosteum perfoliatum*, *Parthenocissus quinquefolia*, *Maianthemum racemosum*, & *Ceanothus americanus*.

Steep, Dry Overlook and Cliff

Polypodium virginianum, *Antennaria plataginifolia*, *Carex platyphylla*, *Polygonatum biflorum*, *Hepatica rotundifolia*, *Solidago caesia*, *Phlox subulata*, *Solidago nemoralis*, *Boechera stricta*, *Pinus resinosa*, *Tsuga canadensis*, *Quercus rubra*, *Vaccinium pallidum*, *Carex pensylvanica*, *Solidago squarrosa*, *S. bicolor*, *Amelanchier stolonifera*, *Viburnum acerifolium*, *Aquilegia canadensis*, *Asplenium platyneuron*, & *Diervilla lonicera*.

Lake Shore

**Coreopsis tinctoria*, *Pycnanthemum incanum*, **Allium vineale*, & **Senna marilandica*.

[* indicates a naturalized, non-native plant.]



NEW BOOK NOTICE

MARY A. HOOD, "a combination botanist, biologist, poet, historian, humorist, conservationist and grand storyteller," has recently published a book on *Walking Seasonal Roads* in Steuben County, N.Y. (Syracuse University Press, 2012, \$19.95 cloth). See details on this link:

[<http://www.syracuseuniversitypress.syr.edu/spring-2012/walking-seasonal.html>].

Changes in the Local Liverwort Flora?

by Norm Trigoboff

IT'S A DARK AND STORMY NIGHT. You stoke the fire and, for amusement, open your dusty, faded copy of Wiegand and Eames' *Flora of the Cayuga Lake Basin*. In the flickering light, you notice that several small ferns in the genus *Botrychium*, which you see rarely or never, are listed as frequent. *Ophioglossum vulgatum* (now called *O. pusillum*), a fern you've never seen, was rare, though a handful of locations are cited. *Celastrus scandens* (American Bittersweet), a vine with stunning red and orange fruits, was common then, though it's scarce today. You check the date of the book – 1926 – then think,

“Many formerly common plants are vanishing because we destroy so much natural habitat.” You understand, of course, that the situation is complex. Habitats change; they're not really destroyed. Even city skyscrapers offer surfaces for algae, hawks, and other living things. As some plants leave through the revolving door, others enter. Still, if you saw a native plant increase in abundance despite unfavorable habitat changes, it would seem odd and you would look for clues as to why.

IN 1996, I FOUND A LUSH GROWTH of an aquatic leafy liverwort, *Lophocolea cuspidata* (Nees) Limpr., on a small rock face in a small shady creek in Cortland County (c964, NYS¹). Since then, I've collected it in large and small wooded creeks, in big, steep ravines, and fairly flat areas: at twelve sites in Cortland County (c988, NYS; c0322, c0323, c0334, c0336, c0346, c047, c04158, 06145, 0959, 12100, s.n. 5 Sep. 1997, s.n. 24 Aug. 1996, & s.n. 14 Sep. 1998, all in BH); at five sites in Tompkins County (c0016, c05150, 1290, 1294, 12134, & 12142, all BH); once in Chemung County (12140, BH), and once in Tioga County (1255, BH). This tells more about where I've been a ravine hound than about where the plant grows. It might be fairly common throughout much of the state. By the way, some of the plants are *L. cuspidata* f. *alata*, and most of the plants around here are probably transitional forms. For our purposes, “*Lophocolea cuspidata*” is close enough.

A nice thing about looking at all kinds of plants in

Central New York State is that a long series of first rate botanists lived here, studied the local plants, and wrote regional treatments that greatly ease plant identification (e.g., Schuster 1949); let you compare your plant-finding skills with those of the pros (e.g., Wesley et. al. 2008); and perhaps, as I try to do here, let you detect changes in the flora.

Andrews (1957) gave only one site for *Lophocolea cuspidata*: “...on wet rocks immediately adjacent to the brook in Coy Glen, first in 1919 and again in the same locality in 1929 and... still persisting in 1953.” Andrews noted that Schuster (1949) included this find under *L. bidentata*. Probably neither of the two other Tompkins County collections given by Schuster is *L. cuspidata*. Schuster's *L. bidentata* grew in moist areas and had a “delicate, hyaline appearance, whitish-green color and almost constant sterility.” *L. cuspidata*, on the other hand, grows in permanently wet sites, often at the low water mark, is a rugged dark green, and is usually fertile. At any rate, Schuster noted that the plant was “apparently rare locally.” *L. cuspidata* is far from rare today. And it's simply too common, too abundant, too large, too distinctive, and too beautiful to have been overlooked. Thus, we may safely deduce that it has increased in abundance in the last 60 years or so, despite continued mauling of the landscape. The game is afoot.

I compared some black-and-white 1954 aerial photographs of Tompkins County (Cornell University 2009) with the Google Earth website's current color imagery. And over the years the locals have talked to me about how the land has changed. My sense is that generally, back then, the ravines and hedgerows were as lined with trees as today, there were more fields, fewer wooded areas (though there were more old growth woods), fewer buildings, and smaller towns. The key relevant change probably has been the increase in the woods by the ravines. Woods, even young woods, slow runoff. As a result, creeks flow more evenly over the course of a year. The lows aren't as low and the highs aren't as high. This yields larger suitable growth areas for aquatic liverworts, lets the liverworts (and their water-loving bryophyte and vascular plant neighbors) survive droughts, and stabilizes the high humidity around creeks — all good things, as far as I'm concerned. A secondary factor might be that woods decrease soil runoff so that creeks are less silty.

LET'S CONSIDER THREE MORE WATER-LOVING LIVERWORTS that seem to have increased in abundance:

Jubula hutchinsiae subsp. *pennsylvanica* (Steph.) Verd. (a.k.a. *Jubula pennsylvanica*), a small leafy liverwort that looks somewhat like a dark green *Frullania*, lives on permanently wet, shady rock faces in large and small ravines. Dry spells are the easiest time to find it because you can see where the water never runs dry and, of course, the ravine walking is easier.

¹ Don't be put off by the specimen numbers and acronyms in parentheses. You may skip them. They are here only to let serious botanists find the specimens cited. To study the collection “c964, NYS,” a botanist might visit, or request a loan from “NYS,” which stands for the New York State Museum Herbarium in Albany, and ask for *Lophocolea cuspidata*, Trigoboff #c964. “BH” (above and later in this paper) represents Cornell's Bailey Hortorium Herbarium. “DUKE” (next page) is the Duke University Herbarium in Durham, North Carolina.

In 1949, Schuster noted: "The single record of this species indicates it to be one of the rarities in the Cayuga Lake Basin as well as of all of central New York...." Andrews (1957) listed the same site. In 1992, Schuster listed another collection (though perhaps not another site) from the Ithaca area. I've collected it at two small ravines in **Cortland County** (10141 & 1234, BH) and one large ravine in **Tompkins County** (1238, BH). Though the evidence for the plant's increase is a small handful of sightings, one of the sites is a well-known ravine that has been explored by many bryologists over the decades. If the plant had been there, it probably would have been spotted. Furthermore, my sightings are from the last three years. Noticing a plant, or anything odd, for the first time is much harder than spotting it later. I bet if I went back to ravines visited more than three years ago, the plant would be in some of them.

***Riccardia multifida* (L.) Gray** is a narrow ribbon-shaped liverwort, regularly 3-pinnately branched, with a hyaline, unistratose border 2-3 cells wide. Schuster (1949) cited three records from western New York and none from the Cayuga Lake Basin. He noted that this species was "Very rare, local." In the 1980s, I saw what looked like *R. multifida* several times on mud in one spot at Eames Bog (Cornell's Mud Creek Swamp Preserve) in Tompkins County. I was unsure and inexperienced, and didn't save any. Since then, I've found *R. multifida* in **Chenango County** (c05142, NYS); at one site in **Cortland County** (0958 & 10153, BH); and two sites in **Tompkins County** (1269 & 1299, BH). The habitat was permanently wet creek rocks, or dripping rocks along the sides of creeks. The plant was sometimes massively abundant, though never present at more than two or three spots along a creek. One of the Tompkins County collections was from the same large, well explored ravine mentioned in the last paragraph, though it was a bit up the ravine side in a fairly inaccessible spot.

IF CREEK LIVERWORTS REALLY ARE ON THE MOVE, we should see similar changes in aquatic mosses, such as in the genus ***Hygrohypnum* Lindb.** In 1957, Andrews gave only one species: *H. palustre* (Hedw.) Loeske, now called ***H. luridum* (Hedw.) Jenn.** He noted that it was "occasional on rocks in brooks," as it still is today. It also grows on concrete, sometimes in towns. In 1980, Ketchledge listed *H. luridum* and ***H. eugyrium* (BSG) Loeske** for our area. Today, at least two other species of *Hygrohypnum* inhabit Central New York's woody creeks: ***H. ochraceum* (Turn. ex Wils.) Loeske** (12133, BH) and ***H. molle* (Hedw.) Loeske** (12134, BH).

The *Hygrohypnum* spp. blend in with the ever-abundant species of *Brachythecium*, *Amblystegium*, *Euhrynum*, and *Brhynia*, which carpet creek rocks. I spotted the *H. ochraceum* and *H. molle* in one creek in Cortland County recently, while thinking about this piece and looking more doggedly than usual at wet rocks. A Google Earth

aerial photo of the area around this creek shows what look like 1940's-era conifer plantations and an otherwise broad expanse of forest (which personal experience indicates is not that old). *H. molle* showed up a few days later in the same big Tompkins County ravine mentioned above (12138, BH). *H. molle* takes after *Euhrynum riparium* (Hedw.) P. W. Richards in size, color, and habitat, though at half an arm's length, *H. molle* looks stockier due to broader, more clasping leaves.

***Fissidens fontanus* (B. Pyl.) Steud.** is an aquatic moss that neither Andrews (1957) nor Ketchledge (1980) listed from our part of the state. It's known from only eleven sites in New York (Clevitt *et. al.* 2006), so it's considered rare here. This last summer, my friend Gopi, Katie the dog, and I hiked several times through the big ravine I keep mentioning (Cornell's Slaterville 600 Preserve) near Dryden. At one point, when Katie was off sniffing in the woods for something suitably stinky and sticky to roll in, Gopi said,

"Pull out your ear plugs and listen to the creek!"

She had urged me to do this at the same spot in that creek on a previous trip. However, I don't like loud sounds, which was the reason for the plugs in the first place, and, as I tried to explain to her, I hear as well or better with the ear plugs as she does without. Furthermore, I understood her point. The small cascades were indeed making interesting sounds. Gopi insisted that I sit next to her on a log and listen. I did. I sensed a heart to heart conversation about to start. At the same time, I saw bright green patches scattered among the dark mosses covering the creek bed. I had walked this creek over a dozen times and noticed those patches once or twice, but passed them by. This time, despite the bright sunshine (I don't like sun either), I escaped from the log, sloshed into the creek, reached through the shallow rapids, and scraped some algae off the creek bottom. A glance with a hand lens showed that, rather than algae, it was an unfamiliar *Fissidens*. I was very happy, and thanked Gopi for pestering me. I think of it as the Indiana Jones moss, because it's pretty much invisible most of the time, but when the sun hits it — you have to be there on a sunny day around midday — it glows, even through shallow rapids. Some small clouds gave me the chance to watch it appear and disappear a couple of times. Here's another spooky thing: It only grew at that one part of the creek, like it too enjoyed the sound of the water. (*Fissidens fontanus* is known to like or at least tolerate high nitrogen levels, and this site was just a ways downstream of a local swimming hole.) Alas, I found another site for *Fissidens fontanus* the next day, in a shoebox in my apartment, collected in Jamesville, N.Y., in 1990, and forgotten (c9019, BH).

My advice: If a natural area is rich with bryophytes, keep going back and explore like a dog off its leash. The easy-to-overlook nature of bryophytes calls into question

the notion about aquatic bryophytes increasing. Though the evidence for *Lophocolea cuspidata* is solid, there may be alternate explanations for the other species. Perhaps creeks, ravines, and other natural areas are more accessible today. Roads, personal transportation, trails (such as the Finger Lakes Trail), maps, and satellite imagery have improved and become more widely available over the years. Increases in forest and decreases in cultivated fields also promote hiking and plant study. On the other hand, people today generally are less outdoorsy than years ago. Have aquatic bryophytes increased? I welcome your opinion.

NOW BACK TO THE THIRD LIVERWORT: *Metzgeria furcata* (L.) Corda var. *ulvula* Nees is a small ribbon-shaped liverwort that lives on tree trunks in areas of high humidity, such as along creeks. Schuster (1949) gave Lick Brook in **Tompkins County** and one site in **Tioga County**. He called it "Exceedingly rare locally." Andrews (1957) gave an additional site in Tompkins Co. I've collected it at five more sites in **Tompkins County**: (1223, DUKE; 1236, 1246, 1250, 1252, 1264, & 12118, BH), as well as at Lick Brook (1262 & 1263, BH). I saw this plant in the field for the first time in late March 2012. I returned, checked nearby trees, and searched a few other ravines and creeks over the next months. This sharpened my sense of where it's likely to grow locally. I'm sure that if I go back to creeks and ravines visited before March, the plant will be in a bunch of them.

Metzgeria furcata is easy to find, once you cue into its field appearance and restricted habitat. Grab your reading glasses and look for tiny, bright, light green snippets of stringy plants 1-2 m. high on the trunks (including in the fissures) of fairly old deciduous trees that are in the shade of Hemlocks (*Tsuga canadensis*) or, less commonly, in the shade of rock faces or steep banks along wooded creeks. It rarely grows on rocks at the bases of such trees. It particularly likes big, steep ravines with high humidity and lots of rock face, especially rock covered with *Metzgeria conjugata* Lindb., a related, usually larger and more abundant species, which may also grow on tree trunks, though usually near the base. *M. furcata* is easiest to spot on smooth sections of Yellow Birch (*Betula alleghaniensis*), though it also grows on ashes (*Fraxinus* sp.), elms (*Ulmus* sp.), oaks (*Quercus* sp.), Basswood (*Tilia americana*), and probably other trees. (I'm curious why it never shows up on maples, *Acer* sp.) *M. furcata* associates strongly with the minute, though far more common and readily found liverwort *Cololejeunea biddlecomiae* (Aust.) Evs., which also needs shade and high humidity. Like most liverworts, both species grow very flat on their substrates. If *C. biddlecomiae* is absent from a tree, go to another tree. Late fall through early spring is the best time to look. In summer, the plant is probably drier and less noticeable; Hemlock-shaded deciduous trees are harder to spot (think about it); lighting is diminished by canopy leaves; and visibility is restricted by lower level leaves. Though *M. furcata* is probably never or rarely abundant locally, it is sometimes

moderately common in and around ravines. Perhaps this is true throughout much of the state.

Once you've seen it, *Metzgeria furcata* is readily identified, though still inconspicuous, even by liverwort standards. This and its restricted habitat make it unlikely to be found without a special search. In 1949, Schuster, who was good at noting habitat features and associated species, didn't mention *M. furcata*'s need for year-round (usually conifer) shade, or *Cololejeunea biddlecomiae* as an associated species. This suggests he hadn't zeroed in on how to find it in Central New York. In other regions, *M. furcata* lives more on shaded rock (Schuster 1992). We may conclude, tentatively, that, rather than having increased in abundance, *M. furcata* has been largely overlooked in Central New York. Here are three more questions to ponder on dark and stormy nights: (1) *M. furcata* relies on two other species of plants (one for substrate, one for shade). How commonly does a plant need two or more other plant species in order to survive? (2) If Woolly Adelgids kill off the Hemlocks, what happens to *M. furcata*? (3) If local surface waters are diverted to serve the current hydrofracking craze, what happens to aquatic liverworts?

Acknowledgements: I thank Blanka Shaw and the late Norton Miller for help with identifications; Blanka Shaw for reading a draft of this paper; Kurt Van Hamlin, Melanie Kozlowski, Katie The Dog, Gopi LaBranch, Lee Miller, Joe O'Rourke, Dan Schiavo, Wanda Wawro, and Al and Ann Witztum for help with collecting; and Anna Stalter and Cornell's Bailey Hortorium for access to specimens and literature.

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Fern Walk at Upper Robert H. Treman State Park

by Ellen Folts

JULY 8, 2012, was a warm day, but as we hiked along the trails they were shaded and cool. The group, led by **Susanne Lorbeer**, was able to find many wonderful ferns. Susanne is a pleasure to hike with. She knows so many plants and takes the time to answer all our questions. She also led discussions about the plants we were seeing, and made sure we were moving at a pace that was comfortable for all participants. This was my first time visiting the Park. I was charmed by the Joe Pye Weed and sedges along the streams: What an inspiring sight. This pairing would be a natural for any garden that needs a summer showpiece.

Our first fern was **BULBLET FERN** (*Cystopteris bulbifera*, Fig. 1). This wonderful fern forms green bulblets on the underside of the fronds that drop off and become new plants. It also produces spores. We found Bulblet Fern growing in the shade on the shale rock walls near the trail. Nearby we found **MARGINAL WOOD FERN** (*Dryopteris marginalis*) also growing from the base of the rock wall. Later we would find this evergreen fern growing in the woods in richer soil. At about eye level we started spotting an eye-catching, dainty little fern that looks like a small Maidenhair. We soon learned it is **MAIDENHAIR SPLEENWORT** (*Asplenium trichomanes*), which grows in the moss or cracks on the rock walls along the trail. Maidenhair Spleenwort has a spreading, rosette-like growth form. The fertile fronds are upright and sterile fronds lie flat against the walls. Most people hurrying along the trail focus their attention on the stream, missing the interesting plants that make their homes on the side walls and in the rock crevices.

As we neared Lucifer Falls, the largest waterfall in the Park, we spotted **AMERICAN HAREBELL** (*Campanula rotundifolia*). This charming plant was on the rock walls and ledges. American Harebell has wonderful dainty, blue, bell-shaped flowers with slender leaves, but the basal leaves are round in shape (*drawings, next page*). On the other side of the gorge wall was **EARLY GOLDENROD** (*Solidago juncea*), the first goldenrod to bloom.

Throughout our walk we spotted non-native ornamental plants that were probably brought in when the area was settled. There is an old mill on the site, which was a water-powered grist mill. The mill attracted people, and the agricultural hamlet of Enfield Falls was located in the area of the Park. **ORANGE DAYLILY** (*Heemerocallis fulva*) is prevalent. On the side opposite the trail near Lucifer Falls, there is a large patch, which is very pretty.

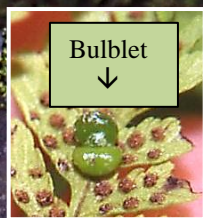
As we walked into the woods again on the valley floor, **MYRTLE** or **PERIWINKLE** (*Vinca minor*) was present and very lush. It was exciting to note that **CANADA WATER-LEAF** (*Hydrophyllum canadense*) is keeping it from expanding up the bank. It seems to be holding its own very well against the Myrtle. Ferns seem to be doing quite well also. We spotted **GOLDIE'S WOOD FERN** (*Dryopteris goldiana*) and **NARROW-LEAVED GLADE FERN** (*Diplazium pycnocarpon*) growing near each other in the woods in rich soil. I was very excited to see this species. It is a very lovely fern with a texture that is different from other ferns, and I found it intriguing to look at. Its pinnae are undivided, like those of **CHRISTMAS FERN** (*Polystichum acrostichoides*), but without the little lobe, and much longer. We also found **SILVER GLADE FERN** (*Deparia acrostichoides*). Its fronds taper at both ends and are broadest in the middle. Silvery Glade Fern has silvery hairs on the rachis and stipe, and silvery sori (when young) that form a herringbone pattern.

AS WE HEADED UP THE STEPS on our way out of the gorge, we spotted **NORTHERN MAIDENHAIR FERN** (*Adiantum pedatum*). This fern looks very delicate, but really, once it is established, it persists for a long time. Its sporangia are protected by the rolled-over margins of the pinnules, forming a false indusium. Bulblet Fern is also present in this area. Once we reached the top and headed into the woods again, we were treated to Christmas Fern, a lovely evergreen species. Not all its fronds were fertile — the fertile ones are narrower at the tip. We also saw Maidenhair Spleenwort again, although the dry weather had caused some of the fronds to wither.

As we walked along the trail, we found **SENSITIVE FERN** (*Onoclea sensibilis*). We didn't see any of its fertile fronds, which are quite different from the sterile fronds. The sterile fronds are bright green and coarsely divided. The fertile fronds have bead-like structures that hold the spores. We spotted **NEW YORK FERN** (*Thelypteris noveboracensis*), with fronds that taper at both ends, and form colonies. We noticed **COMMON POLYPODY** (*Polypodium virginianum*) in several spots at the bases of trees. We also found and compared **INTERMEDIATE WOOD FERN** (*Dryopteris intermedia*) and **SPINULOSE WOOD FERN** (*D. carthusiana*). Spinulose Wood Fern has a smoother texture than Intermediate Wood Fern. The innermost pinnules of the basal pinnae on the Spinulose species are longer than the adjacent pinnules. On the Intermediate species, the innermost pinnules of basal pinnae are shorter than the adjacent pinnules.

Along the trail we noticed **WILD GINGER** (*Asarum canadense*); **RED BANEERRY** (*Actaea rubra*) with bright red, shiny fruit; and **WHITE BANEERRY** or **DOLL'S EYES** (*A. pachypoda*), the fruit of which was still green. When we reached the old mill again, we learned that Norm, a member of the group, had spotted **SLENDER CLIFFBRAKE**

1

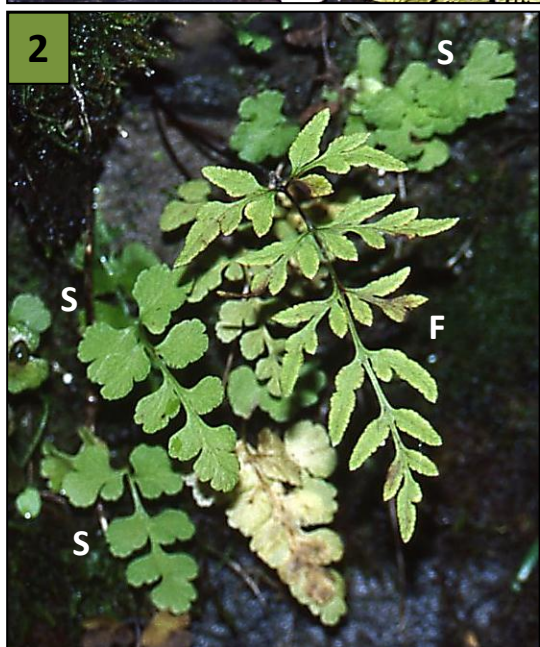


Ferns of the Upper Treman State Park Gorge

Figure 1: BULBLET FERN (*Cystopteris bulbifera*), 17 August 1996, with inset of frond underside, showing sori and "bulblet" (arrow), 20 August 1996.

Figures 2 & 3: SLENDER CLIFF BRAKE (*Cryptogramma stelleri*), a rare local species: 31 July 2003 (2), showing fertile frond (F) and sterile fronds (S); and 8 July 2012 (3), showing a fertile frond underside with paler sporangia along edges of the pinnae (arrows).

[1 & 2 by Robert Dirig, 3 by Ellen Folts.]



The graceful flowers of American Harebell

(*Cryptogramma stelleri*), which is a rare fern. We walked back along the trail where we had first started, and searched again until we located it at about waist height on the wall. It is a small fern with dimorphic fertile and sterile fronds (Fig. 2) that vary in length from about 2 to 4 inches. Like Maidenhair Fern, the sporangia are located on the underside of the fertile fronds, where they are partially covered by the inrolled margins of the narrow pinnae (false indusium; Fig. 3). It was a real treat to find this rare species tucked in among much more prolific Bulblet Ferns.

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"Rotund" basal leaves of American Harebell (*Campanula rotundifolia*)

~!~

Updated FLNPS Website

by Rosemarie Parker

IF YOU HAVEN'T BEEN TO THE FLNPS WEBSITE (www.flnps.org) in the last couple of months, please visit. With the expert and very much appreciated help of **David Furber** (who is himself a native plant gardener), the site has been moved to a content management system. This enables much easier updates, by more people, so it should remain current. Try out the advanced search for plants of garden interest (or only those recommended for gardening). Try the site-specific Google search (ignore the ads). Look at the photo gallery. **DONATE** photos of local flora or great places to visit (e-mail me if you are interested). Check out the *Newsletter* or *Invasives* sections (both in development). In a word – **EXPLORE** – and send your thoughts to me. If you have some time to help in transferring content from our old site to the new, or to help with scanning the Newsletter archive, please tell me!

Cryptogams and Insects of the Chemung Pine Barrens, N.Y.

by Robert Dirig

This article supplements an earlier publication on the vascular plants of the Chemung Pine Barrens in Chemung County, N.Y. (Dirig & Cope 2012). During our botanical explorations, we collected or observed a few fungi, lichens, and mosses, and I also made observations of several invertebrates (mostly butterflies) that occurred in this unusual vegetation between 1979-1991.

VOUCHER SPECIMENS have been deposited, as noted below, in these herbaria: CUP (Plant Pathology Herbarium, Cornell University), BH (Bailey Hortorium Herbarium, also Cornell), DUKE (Duke University Herbarium, Durham, N.C.), NY (New York Botanical Garden), NYS (New York State Museum, Albany), and US (U. S. National Herbarium, Smithsonian Institution, Washington, D.C.). A few insect specimens were given to CUIC (the Cornell University Insect Collection).

HABITATS, listed for each species, are as mapped in Fig. 2 of Dirig & Cope (2012: 6), including PB (Pine Barrens Vegetation), RR (Railroad Corridor), LB (Lupine Bank), GR (Grassy Roadsides), OW (Oak Woods), D (Dump Area), H (Hedgerow), and SGP (Sand & Gravel Pit).

An asterisk (*) indicates a naturalized non-native plant or insect.

FUNGI AND LICHENS

Amanita muscaria (Fly Agaric Mushroom): six beneath *Populus grandidentata* [no specimen], 8 Sept. 1982. PB.

Candelaria concolor (Candleflame Lichen): on sunlit trunk of *Quercus alba* (L-1612, NY, NYS, US, DUKE), 7 Oct. 1979; and on *Quercus* sp. (L-1577, NY, NYS), 14 July 1983. PB.

Cladonia cristatella (British Soldiers): on gravelly sand, 8 Sept. 1982 (L-1476, NY). PB.

Cladonia verticillata (Pagoda Lichen): in duff on sandy bank, 12 May 1982 (L-1414, NY). GR.

Erysiphe cf. *polygoni* (Powdery Mildew): on leaflets of *Lupinus perennis*, 12 May 1982 (F-44 = CUP-059785, CUP), 4 Aug. 1982 (F-45 = CUP-059786, CUP). LB. [Identified by Juliet E. Carroll.] This legume is frequently encountered with its leaves whitened by this fungus, throughout New York, records usually beginning in mid-June. A record in May, about three weeks after new growth sprouted, is rather early.

Hypocenomyce scalaris (Oyster Lichen): base to 6 ft. up on bark plates of *Pinus rigida*, 7 Oct. 1979 (L-1416, L-1417, L-1418, NY). Base of native *Pinus resinosa*, 23 May 1982 (L-1420, NY). PB. This inconspicuous squamulose lichen is usually common on pine trunks in relatively undisturbed pine barrens sites throughout the Northeast. It frequently occurs on charred substrates; several *P. rigida* trunks near the railroad in the northern part of the barrens

showed evidence of recent fires. See Dirig (1990) for its distributional and ecological context.

Peltigera didactyla (Saucer Lichen): on disturbed sand, with apothecia, 12 May 1982 (L-1413, NY). GR. This lichen is frequent on sand in the Albany Pine Bush, but few records exist for it in central and western New York (Dirig 1986).

MOSSES

Atrichum angustatum (Atrichum Moss): on soil, 8 Sept. 1982 (M-175, M-179, BH & DUKE). OW.

Leskea gracilescens (Leskea Moss): on *Quercus alba* bark, 8 Sept. 1982 (M-181, BH & DUKE). OW.

Leucobryum glaucum (Pincushion Moss): on soil, 8 Sept. 1982 (M-180, BH). OW.

Plagiomnium cuspidatum (Toothed Plagiomnium): on soil, 8 Sept. 1982 (M-177, BH & DUKE). OW.

Pohlia nutans (Nodding Thread-Moss): on bark of *Quercus alba*, 8 Sept. 1982 (M-178, BH & DUKE). OW.

Polytrichum juniperinum (Juniper Haircap Moss): on soil, 8 Sept. 1982 (M-182, BH & DUKE). RR.

Polytrichum strictum (Haircap Moss): on soil, with the preceding species, 8 Sept. 1982 (M-176, BH & DUKE). RR.

[All except the *Leucobryum* identified by Lewis E. Anderson at Duke University.]

DIURNAL MOTHS

Cisseps fulvicollis (Yellow-collared Scape Moth): 22 June 1982. D, GR.

Ctenucha virginica (Virginia Ctenucha): 2 June 1982; 22 June 1982, nectaring at *Leucanthemum vulgare*; 14 July 1983. RR, GR, D.

Estigmene acrea (Salt Marsh Tiger Moth): male, 12 May 1982. D, GR.

Hemaris diffinis (Snowberry Clearwing): dead adult hanging in a web of *Argiope aurantia* (Garden Spider), 4 Aug. 1982. GR.

**Lymantria dispar* (Gypsy Moth). Larval feeding damage, 23 May, 2 & 22 June 1982 (see Dirig & Cope 2012: Fig. 1-G & 1-H); dead female, many egg masses, & pupae, 4 Aug. 1982; males flying, 14 July 1983; 23 June 1991. PB, OW. [See DISCUSSION below for further details.]

BUTTERFLIES

Poanes hobomok (Hobomok Skipper): male nectaring at **Glechoma hederacea*, dark female form "pocahontas" observed, 2 June 1982; worn male nectaring at **Leucanthemum vulgare*, 22 June 1982. GR, PB.

Thorybes pylades (Northern Cloudy Wing): fresh, 2 June 1982; 22 June 1982. GR.

**Thymelicus lineola* (European Skipper): common, nectaring at **Leucanthemum vulgare*, **Lotus corniculatus*, **Trifolium hybridum*, **Stellaria graminea*, 22 June 1982;

14 July 1983 (CUIC); nectaring at *Apocynum androsaemifolium*, 23 June 1991. GR.

Wallengrenia egeremet (Northern Broken Dash): nectaring at **Centaurea stoebe* ssp. *micranthos*, 14 July 1983 (CUIC). GR.

Colias philodice (Clouded Sulphur): 2 June & 4 Aug. 1982; nectaring at **Trifolium pratense* & *Erigeron strigosus*, & ovipositing on **Lotus corniculatus*, 14 July 1983 (CUIC). GR, RR.

**Pieris rapae* (Cabbage White): 12 May 1982; nectaring at **Leucanthemum vulgare*, 22 June 1982; very abundant, puddling & nectaring at **Centaurea stoebe* ssp. *micranthos* & **Prunella vulgaris*, 4 Aug. 1982; nectaring at **Nepeta cataria*, 8 Sept. 1982; nectaring at **Berteroa incana*, 14 July 1983; nectaring at *Apocynum androsaemifolium*, swarming along RR, 23 June 1991. GR, D, RR.

Celastrina neglecta (Summer Azure): 22 June 1982; 4 Aug. 1982 (CUIC). PB, GR.

Cupido comyntas (Eastern Tailed Blue): 12 May, 2 June, & 8 Sept. 1982; 14 July 1983 (CUIC). LB, PB, GR.

Lycaena phlaeas (American Copper): nectaring. at **Leucanthemum vulgare*, 14 July 1983. GR, RR.

Satyrrium liparops (Striped Hairstreak). 14 July 1983 (CUIC). PB, GR.

Limenitis archippus (Viceroy): 2 June 1982. GR.

Limenitis arthemis (Banded Purple, White Admiral): 2 June 1982; 22 June 1982 (CUIC); 23 June 1991. GR. *L. a. astyanax* (Red-spotted Purple): males puddling, 2 June 1982. GR, SGP. These two morphs intergrade across this part of New York.

Nymphalis antiopa (Mourning Cloak): overwintered adults, 2 June 1982. RR, PB.

Phyciodes tharos (Pearl Crescent): 14 July 1983 (CUIC). GR, RR.

Speyeria cybele (Great Spangled Fritillary): 8 Sept. 1982, 23 June 1991. GR, RR.

Vanessa cardui (Painted Lady): larval nests on **Cirsium vulgare*, 14 July 1983. This sporadic migrant, which does not reach inland sites in New York every year, was abundant throughout the state in 1983.

Cercyonis pegala (Common Wood Nymph): 4 Aug. 1982, 14 July 1983 (CUIC), 23 June 1991. GR, RR, H, D. Adults intergrading between *C. p. alope* and *C. p. nephele*.

Megisto cymela (Little Wood Satyr): 2 June 1982 (CUIC), 22 June 1982, 23 June 1991. GR, RR, H, D.

Danaus plexippus (Monarch): nectaring at *Asclepias tuberosa*, 4 Aug. 1982; 8 Sept. 1982. GR.

OTHER INSECTS (AND A SPIDER)

Arphia sulphurea (Sulphur-winged Grasshopper): 2 June 1982 (CUIC). GR, RR. This beautiful grasshopper is characteristic of pine barrens and other xeric sites in the Northeast.

Dissosteira carolina (Carolina Grasshopper): 4 Aug. & 8 Sept. 1982, 14 July 1983. RR, GR.

**Popilla japonica* (Japanese Beetle): on *Asclepias syriaca*, 14 July 1983. RR, GR.

Tabanus atratus (Black Horse Fly): a male of this huge species, 8 Sept. 1982 (CUIC). D. [Identified by L. L. Pechuman, CUIC.]

Argiope aurantia (Garden Spider): 4 Aug. & 8 Sept. 1982. GR.

DISCUSSION

GYPSY MOTHS were present in high numbers during the 1982-1983 seasons. On 23 May 1982, all species of oaks showed much larval chewing, with some feeding damage on *Populus grandidentata* and *P. tremuloides*. On 2 June 1982, we saw severe larval feeding damage on the foliage of *Quercus prinoides* and tree oaks (*Q. alba*, *rubra*, *coccinea*), the leaves of the latter stripped to the veins. Larvae were about 1 inch long on this date, also eating leaves of *Acer rubrum* and *Vaccinium pallidum*. On 22 June 1982, larval denudation was evident on *Pteridium aquilinum* (!), *Hamamelis virginiana*, *Vaccinium stamineum*, *Rhododendron periclymenoides*, *Rhus glabra*, tree oaks (especially *Q. alba*, less so on the Red Oak group), *Ulmus* sp., *Acer rubrum*, and *Amelanchier* sp. The patter of falling frass was loud enough to be heard over noise from traffic and gravel company machinery in the SGP to the south. A fresh male pupa was noted on this date. On 4 Aug. 1982, a dead female adult was found on the ground in the PB, and many pupae and new egg masses were seen on tree trunks throughout. On 14 July 1983, males were flying, and severe larval damage noted to oak leaves everywhere at the site.

Among species listed, the following are characteristic of pine barrens vegetation elsewhere in the Northeast: *Cladonia cristatella*, *C. verticillata*, *Erysiphe polygoni*, *Hypocenomyce scalaris*, *Peltigera didactyla*, *Thorybes pylades*, *Cupido comyntas*, *Lycaena phlaeas*, *Satyrrium liparops*, *Cercyonis pegala*, and *Megisto cymela*.

Unfortunately, we found no evidence of KARNER BLUE (*Lycaeides samuelis*) or FROSTED ELFIN (*Incisalia irus*), both rare *Lupinus perennis* associates; or of EDWARDS' HAIRSTREAK (*Satyrrium edwardsii*) and BUCK MOTH (*Hemileuca maia*), both *Quercus ilicifolia* feeders of limited distribution, at this highly disturbed and fire-suppressed pine barrens remnant.

Thanks to Ed Cope for help with field logistics and to Scott LaGreca for reviewing a draft of this paper before publication.

LITERATURE CITED

- Dirig, R. 1986. Fertile collections and distribution records of *Peltigera didactyla* (Peltigeraceae) in New York State. *Evansia* 3: 37-38.
———. 1990. Distributional and ecological notes on *Hypocenomyce scalaris* (Lecanorales, Lecideaceae) in eastern North America. *Mycotaxon* 37: 441-462.
Dirig, R., & E. A. Cope. 2012, April. Flora of the Chemung Pine Barrens, N.Y. *Solidago* 13(2): 4-7, 12.

Finger Lakes Native Plant Society



Design from calices of Closed Gentian, *Gentiana clausa*.

UPCOMING PRESENTATIONS & OUTINGS, AUTUMN 2012

October 13th (Saturday), rain date, **October 20th**: **ANNUAL SEED COLLECTION WALK**, led by **Krissy Boys**, at an Ithaca-area site to be determined. Meet **1:00 p.m.** at **Cornell Cooperative Extension (CCE)** to carpool.

Grab a bag and help collect seeds for the FLNPS December seed exchange, the Plantations Wildflower Garden, and your own efforts. Learn how to identify desirable species, even with no flowers and few leaves; determine whether seeds are ripe; and see how to store and propagate them, while walking in pleasant surroundings. Please sign up (e-mail: info@flnps.org, [redacted]) so that we can notify you of any last-minute changes (e.g. postponement due to rain).

October 17th (Wednesday): **SUGAR MAPLE MYSTERIES**, a talk by **Brian Chabot** of Cornell University. **7:00 p.m.** at the **Unitarian Church Annex**, E. Buffalo St., Ithaca.

October 27th (Saturday): **FERNS & MOSSES AT THE CLARK RESERVATION**, a walk led by **Bernie Carr & Norm Trigoboff**. Meet **8:30 a.m.** [note early time!] at CCE to carpool, or at the Clark Reservation at **9:30 a.m.**

Clark Reservation is one of our more spectacular natural areas, very rich in ferns and mosses. The drive there from Ithaca takes 45 minutes to an hour. This is a rugged, rocky, sometimes slippery area, so dress appropriately. The limy substrate supports many unusual calciphiles, including the very rare Hart's Tongue Fern.

November 10th (Saturday): **FALL TREES WALK**, led by **Anna Stalter**, to an Ithaca-area site to be determined. Meet **1:00 p.m.** at CCE to carpool.

Learn how to identify trees by looking at buds and bark.

November 14th (Wednesday): **ESCAPING THE DEER'S MOUTH**, a talk by **Laura Martin** of Cornell University. **7:00 p.m.** at the **Unitarian Church Annex**, Buffalo St., Ithaca.

White-tailed Deer have proliferated in the Finger Lakes region, and overgrazing threatens many native plants. But can some plants evolve to tolerate heavy browse? Laura asks whether some populations of Jewelweed, an annual wetland herb, already have. More broadly, Laura asks if invasive species — whether native (like deer) or introduced (like honeysuckle) — always have negative ecological consequences.

December 19th (Wednesday): **FLNPS SOLSTICE GATHERING: 7:00 p.m.**, **Ken Post Classroom** in the **Horton Lab** on the Cornell University campus (for details, check FLNPS mailings and website at www.flnps.org).

An annual celebration with local native seed exchange table, plant identification contest, dish-to-pass snacks with native and naturalized plant ingredients, members' slide show, live music, door prizes, food contest prizes, and lots of botanical fun.

All presentations are from 7:00-8:30 p.m., and are free and open to the public. They are held at the Unitarian Church Annex (corner of East Buffalo & North Aurora Streets in Ithaca, N.Y.). Please enter at the side door of the Annex on Buffalo St. and go upstairs.

Unless otherwise noted, walks and outings begin and end at the parking lot of the Cornell Cooperative Extension headquarters (CCE), located just off Willow Avenue in Ithaca. Field trips are free and open to the public. **Please stay on trails and do not collect any plants or cryptogams without the trip leader's consent.** For more information, call the trip leader at the number provided, [redacted], [redacted]

[redacted] Please consider leading a walk or suggesting a theme or location (contact Anna Stalter). Enjoy!