

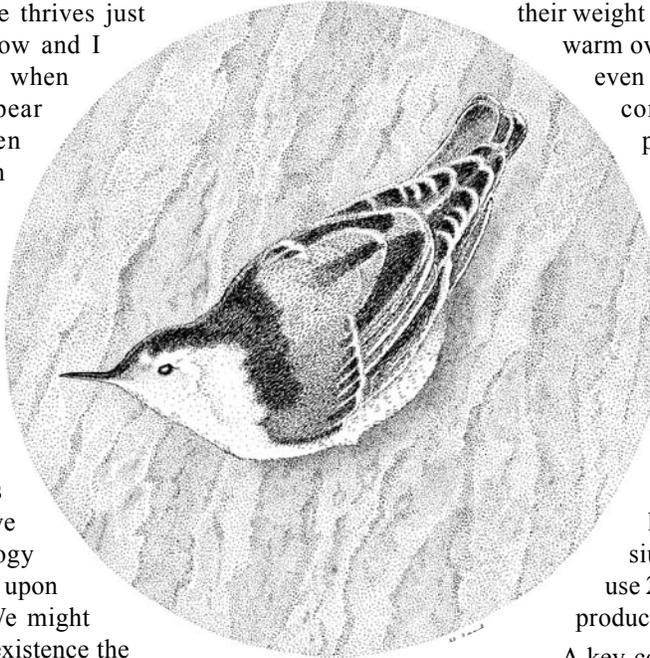


## FLYING INTO WINTER

By Margaret Gillespie, Illustration by Heather Lord

A thick hemlock tree thrives just outside my office window and I am pleasantly surprised when birds unexpectedly appear on its branches to open sunflower seeds from the nearby winter feeding station. At a time of year when tracks in the snow are the major evidence of local wildlife, these lively visitors are a welcome burst of color and action. During this frosty, snowy, windy season, it is amazing how birds survive without all the technology that we humans depend upon for warmth and food. We might be tempted to call their existence the “simple life” but birds’ winter adaptations are far from simple!

Black-capped Chickadees are frequent and entertaining visitors to bird feeders. Have you ever noticed that they come in a flock and seem to be on a schedule? This winter grouping generally includes about six birds consisting of a dominant pair that nested during the summer, some of their offspring, as well as other juveniles and adults. Specific bird feeding stations become preferred sites on their daily circuit of three or more good foraging spots. Chickadees may be the ultimate “weight-watchers,” except that they need to gain about 10 percent of



their weight in fat per day in order to stay warm over cold winter nights. Don’t even think about how you could compete by adding 12 or 15 pounds of fat to your frame from sunrise to sunset! At night these birds turn into the ultimate energy conservationists by lowering their body temperature. Peter Marchand in *Life in the Cold* describes how chickadees become hypothermic by reducing shivering to the point where their temperature lowers 10 to 12 degrees Celsius, with the result that they use 20 percent less energy in heat production.

A key component of winter survival for birds is their insulating feathers. In late summer, many birds begin molting or losing their summer breeding plumage and replacing those feathers with new ones. Although often more drab, the new plumage in winter resident birds has been found to weigh 25 percent more than the old plumage, providing needed insulation. Smaller birds have more surface area for their size from which to lose heat but birds like Chickadees and Kinglets actually have proportionally more feathers than much larger birds. In addition, as birds fluff out their feathers, air is trapped and warmed near the body. Birds preen to

*Continued on page 10*

## FORGING TRAILS

### PENTHOUSE ON A POLE: LAYING OUT THE WELCOME MAT FOR A PAIR OF OSPREYS

Last spring a pair of Ospreys attempted to build a nest on a utility pole on the shore of the lake – a first in living memory for the Squam watershed (see photo on page 2 and in our new Photo Gallery on our website at [www.nhnature.org](http://www.nhnature.org)). The utility pole had live electrical wires, and after discussion with the home owners, New Hampshire Electric Cooperative, and New Hampshire Audubon, we decided to deter the Ospreys from nesting in this dangerous (for the birds and the people) situation. A quick alteration to the top of the pole was all that was needed to make it unsuitable for the birds. We agreed to monitor the Osprey’s activities and see if they found another nest site on the lake – perhaps on one of the many more suitable dead trees on the shore – but no further nest building was observed in the immediate vicinity of the lake, although individual Ospreys were sighted fairly regularly throughout the summer.

*Continued on page 2*

**FORGING TRAILS** *continued from page 1*



*This pair of Osprey built their home in a rather unsafe location... with help, we will be providing a new and safer one.*

The New Hampshire Electric Cooperative was extremely helpful and responsive to this situation and very generously offered to donate and install a pole with a platform to provide the Osprey pair with a safer nesting site. A location has now been chosen here between our Marsh Pond and Upper Pond. We will install the pole in early December. As a way to make the site really enticing to a prospecting Osprey, we will use a completely prefabricated stick nest (not just a platform) which has been constructed inside an inverted pyramid-shaped frame ready to be bolted to the 40-foot utility pole.

This nest structure was actually built by yours truly more than 10 years ago for a project I was working on at Turkey Pond in Concord. We ended up building a smaller platform in a live tree and my huge nest frame ended up sitting in the barn of the Massabesic Audubon Center in Auburn for most of the last decade – just waiting for the perfect opportunity to be pressed into action. Now it will get its moment in the sun.

Ospreys are now doing well in New Hampshire – after being almost extirpated in the sixties and seventies. Over the last 25 years they have increased from just one pair in 1980 to more than 60 pairs statewide in 2007. Since 1987, they have nested in the central Merrimack Valley and this year at least 12 pairs nested here in the Lakes Region. Perhaps the Science Center will host number 13.

Ospreys return to New Hampshire in April – after spending their winter months in South America – just after ice out on the lakes. Just in case you are wondering, Ospreys feed exclusively on live fish and present no threat to loons. Hopefully our “penthouse on a pole” will prove to be irresistible and we will have a ready-made Osprey exhibit in 2008.

Thanks to Guy Ford of the New Hampshire Electric Cooperative, Chris Martin of New Hampshire Audubon, and Gail and Peter Walcott for their cooperation and assistance. Look for photos of the pole installation in the new website Photo Journal in December and in next spring’s issue of *Tracks and Trails*.

*Forging Trails is written by Executive Director Iain MacLeod.  
You may contact Iain at 603-968-7194 x 23 or iain.macleod@nhnature.org.*



**SQUAM LAKES NATURAL SCIENCE CENTER**

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The Squam Lakes Natural Science Center is a non-profit educational institution incorporated in 1966 as a charitable organization under statutes of the State of New Hampshire with its principal place of business in Holderness. Our mission is to advance understanding of ecology by exploring New Hampshire’s natural world. Tracks & Trails is a regular publication of the Squam Lakes Natural Science Center sent to all members. Comments about the newsletter are welcomed by newsletter editor Janet Robertson at 603-968-7194 x 12 or [janet.robertson@nhnature.org](mailto:janet.robertson@nhnature.org).

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## NEWSBRIEFS

- ◆ Please join us in wishing Naturalist Beth Roy the very best as she joins the Vermont Institute of Natural Science in Woodstock as their new Camp Program Manager in December. Beth has been a vital part of the education staff since January 2000, not only teaching classes and piloting lake cruises, but managing school reservations and the education intern program as well – always with a smile on her face. We will miss Beth’s cheery personality and can-do attitude.
- ◆ A number of staff members have recently taken part in outside professional development opportunities. Animal Care Assistant Joanne Braley traveled to Philadelphia to attend the annual conference of the Association of Zoos and Aquariums in mid-September. While the event drew professionals from across the nation and covered a wide range of topics, Joanne focused her attention on learning about animal training and different methods to incorporate into the training done here. She also visited the Philadelphia Zoo. Animal Care Assistant Rachel Cilley attended a one-day workshop at the New England Aquarium in September, sponsored by the National Association of Interpretation. She learned about animal training techniques the aquarium uses with their marine mammal collection and how to apply the ideas to other species. Also in September, Naturalist Eric D’Aleo attended the Mount Washington Symposium for Air and Climate, learning about climate change, air quality, the northern forests and geology of the White Mountains, and sustainable energy planning. Eric noted that the presentations by scientists and research experts were highly informative, and helpful to him as the head of our ‘Green Team.’ Naturalists Margaret Gillespie and Beth Roy, and Education Program Director Amy Yeakel, attended the New England Environmental Education Alliance Conference at Smithfield, Maine from September 14-16. Titled “Building Bridges: Creating Change for a Common Good,” it featured Tom Wessels of Antioch New England and Alisa Gravitz of Co-op America as keynote speakers. Tom spoke about his recent book, *The Myth of Progress: Toward a Sustainable Future*. Alisa’s talk focused on the process of building bridges between consumers, investors, and businesses to create change for both human and environmental good. Another interesting session, “Biomimicry in Action,” showed how humans have copied nature’s innovations (thorns – barbed wire, burr – Velcro), and looked at potential educational applications. Next

year this regional conference will be in New Hampshire. Volunteer Coordinator Carol Raymond regularly attends meeting of the New Hampshire Association of Volunteer Administrators. Topics covered recently include addressing the needs of different generations of volunteers, risk management, and a review of labor laws governing volunteers.

- ◆ Over the last several months there has been some intense Board and staff activity to develop our new Strategic Plan. This plan will serve as a road map for the next five years and guide new program initiatives, capital expenditures, and fundraising efforts. This work is the culmination of more than two years of strategic thinking by the education committee, which formulated a resolution adopted by the Board last year, affirming our education priorities. The draft plan will be circulated to the Board and staff for review in December and published in January. This will remain a “live” document and we welcome input and comment from all members and friends. Thanks to all who have been involved in drafting this important document.
- ◆ The new and improved website is now live! Utilizing fresh photographs and branding, the site is more visually appealing and better reflects all that the Science Center has to offer. Users can now quickly and easily navigate to find all the information they need about programs and events, visiting, becoming a member, volunteering, online shopping, and much more. Other exciting new features include a Photo Journal, an Interactive Trail Map, Podcasts, and coming soon, a live Critter Cam! Visit often at [www.nhnature.org](http://www.nhnature.org).
- ◆ Beautiful fall weather favored this year’s Autumn Festival on September 29. Guest speaker Ben Kilham, author, wildlife biologist, and black bear expert, spoke in front of a standing room only crowd and then answered questions and signed copies of his book. When Ben first started his research on black bears, he discovered there was very little information about them. His intimate, long-term study of black bears has added new information, including discovery of a gland which helps bears distinguish edible food. We are grateful to Community Guaranty Savings Bank for sponsoring this event and for Stonyfield Farm for donating yogurt samples. Longhaul Farm of Holderness provided a wonderful lunch.
- ◆ Almost 300 people enjoyed the annual Halloween Hoot N Howl on October 26 and 27. A series of live skits focusing on “naturally” spooky phenomenon,

such as parasites, scavengers, and waste, charmed the costumed guests. In The Wizard of Squam skit, Dorothy and her new friends were threatened by the Wicked Witch of Waste as they searched for an environmentally friendly household in a world spinning with ecological challenges. Maxfield Real Estate of Center Harbor generously sponsored the event. Thanks to Daisy Girl Scout Troop 10062, Brownie Girl Scout Troop 93, and Junior Girl Scout Troop 2269 from Moultonboro and Sandwich for carving the jack-o-lantern pumpkins to light the way. We also thank our wonderful volunteers and these contributors of food and supplies: Dunkin Donuts, Plymouth; Golden Pond Country Store, Holderness; Hannaford Supermarket, Plymouth; Holderness General Store, Holderness; Moulton Farm, Meredith; Shaw’s, Gilford; Tootsie Roll Industries; Wal-Mart, Plymouth.

- ◆ November 1 marked the official closing of the Gephart Exhibit Trail, but just in time for the holiday season, a selection of SLNSC brand gifts and favorites are available at the updated online Howling Coyote Gift Shop. Full-color images and detailed descriptions, plus the convenience and security of PayPal will make shopping easy, online at [www.nhnature.org](http://www.nhnature.org). You can also take advantage of your 10% member discount with online purchases. And, between now and December 31, 2007, if you spend \$50 or more at the online Howling Coyote Gift Shop, you will receive a free SLNSC Green Bag!



*This wild baby Black Bear was photographed along the Ecotone Trail in mid-October*

## STAFF PROFILE: IDA GOULD

By Laura Dentel



Ida Gould was hired as Office Manager in November 1999. In addition to the normal administrative duties associated with an office manager position, Ida is responsible for all computer systems and technology and the daily administration of lake cruises. Another interesting role assigned to Ida is that of “incident commander” in the case of emergencies. Ida and her husband, Russell, have two children and live in Campton.

*LD: Where did you work before you came to work here?*

IG: I worked at Plymouth Stitching in Ashland for seven years until it closed. I did a variety of jobs there. When I started I did accounts

payable. Before they closed I was one of the last people in the office in charge of all aspects of the operation.

*LD: Why did you choose to work at the Science Center?*

IG: Actually, it found me. Maurice Lafreniere, one of the board members, owned Plymouth Stitching and told me about this position. I was excited about the prospect of working at a unique organization.

*LD: What are some of the biggest changes you have seen?*

IG: The Horizon Project was just getting under way when I began and it resulted in many changes to the exhibits, trails, parking lot, and the addition of the Welcome Center. Technology has also been a big change. We had only around five computers to start with, and only one dial-up connection to the Internet. We now have two servers, 30 computers, and six classrooms with computers and projectors that are all networked!

*LD: Tell us what a typical day at work is like for you – in the busy season!*

IG: Typical is not really the word I would use to describe what my days are like. I always have a plan in my mind of what I think I am going to accomplish, but that always changes the minute I walk through the door. During the summer, the constants of my day are overseeing the

operations of the cruises, sorting and processing mail, checking in groups, and assisting with all general operations. Along with these duties are the usual computer questions, admission issues, and cruise-related activities.

*LD: What do you like best about your job?*

IG: I enjoy the variety of things that I do. I never know what the day will bring – from bats flying around in my office to seeing 400 school children walk by my window.

*LD: You are known as the computer guru on staff. How did you get so tech savvy?*

IG: I started by learning how to program with the first Apple computers available to consumers when I was in high school. I have since taken many courses, but most of my knowledge comes from previous jobs and this one.

*LD: What would you consider your greatest accomplishment?*

IG: Surviving the season with a smile on my face and looking forward to the next one.

*LD: Outside of work, what do you like to do for fun?*

IG: Spending time with my family and playing with our three cats are my favorite things. My hobbies include reading, kayaking, crocheting, crafts, and photography. I am also a member (and Webmaster) of the Lakes Region Camera Club.

## GREEN FACT

For ideas on using native plants in your garden, consult the PlantNative website, [www.plantnative.org](http://www.plantnative.org). This organization’s website lists nurseries by state specializing in native plants, and has sections with regional book and plant lists, and how to guides. PlantNative is dedicated to moving native plants and naturoscaping into mainstream landscaping practice in order to promote biodiversity, preserve our natural heritage, reduce pollution, and enhance livability. Its goal is to work with nursery owners, landscape professionals, and consumers to increase public awareness of native plants and related landscaping practices and to increase both the supply of and demand for native plants.



Renew your membership online at  
[www.nhnature.org](http://www.nhnature.org)

# NATURALIST'S CORNER

## BIRD FEEDING

By Dave Erler

Over the years I have conducted a few workshops on bird feeding and the pros and cons of doing so. Since some people are surprised to hear that there are any cons to feeding birds, here are some considerations and myths about feeding wild birds.

How can feeding birds be anything but a good thing? In a biological sense, feeding wild birds is a wash as to whether birds benefit or are harmed by it. On the plus side, some species such as Northern Cardinals, Tufted Titmice, and Mourning Doves have probably been able to expand their ranges or increase their populations in northern New England due to bird feeding. In cold hard winters, many other bird species also benefit from an extra source of energy rich food.

On the negative side, if bird feeders are not strategically placed, they may increase the chance of birds becoming easier prey for predators, particularly house cats, or colliding with glass windows when startled. Bird feeding stations may also become a hot spot for birds to pick up bacterial and fungal diseases. Since feeders attract and concentrate both healthy and unhealthy birds, they increase the chance that diseases can be spread. *Salmonella* bacteria thrive in damp, soiled environments. When feeders accumulate old seed and bird feces, the result is prime conditions for *Salmonella*. This is a particular concern in late winter because the immune systems of birds, as well as most other wildlife, have been weakened due to the cumulative effects of winter stress. After a stretch of warmer damp weather in March (allowing *Salmonella* to thrive), people may find a few dead or dying birds in the yard while other sickened birds fall easy prey to predators. Feeders that keep seed dry and have perches that allow feces to drop clear of the feed help reduce this risk. On the other end of the spectrum, open flat tray feeders are probably the feeder style that will attract the most species but also require the most maintenance. Limiting the amount of seed placed on a tray feeder to that which can be cleaned up by birds in one day, as well as regularly cleaning the tray with a bleach solution, will greatly reduce this risk.

Another consideration is what species of birds are attracted to your feeders. If non-native House Sparrows or European Starlings are your most common visitors, it may be wise to discontinue feeding altogether. Why? These species are particularly aggressive and negatively impact many of our native species. The same can be said of Brown-headed Cowbirds, which have greatly expanded their range from the prairie states. Cowbirds have affected many of our native songbirds as they are parasitic nesters, dumping their eggs in other bird's nests, with the resulting cowbird young aggressively out-competing the host bird's young. The decline of such species

*Continued on page 9*

# GARDENER'S NOTEBOOK

## GARDENING IN WINTER?

By Eric D'Aleo



Who gardens in the winter? Not many people do, unless they have a heated greenhouse or live in a tropical zone. Most of us garden vicariously over the winter by thumbing through plant and seed catalogs and thinking about next spring. Although winter may not be the best time for flowers to bloom, this season can be a fine time to enjoy your garden, particularly if you did some planning and work during the past year.

Perhaps you planted a native grass with a seed tuft which looks spectacular under a light snowfall or a red osier dogwood with bark that stands out against the snow in the late afternoon sunlight. Maybe the windbreak of fir or spruce you planted near the old stone wall highlights a nice comparison of texture and color. But did you remember to include the birds when you're planning what colors, textures, and patterns you might want in your garden for the winter season? Having plantings in your garden that provide food, cover, and shelter for our avian neighbors can help keep it a frequented area of activity, even in winter.

Perennial flowers such as purple coneflower, aster, black-eyed susan, and goldenrod will provide a source of seeds for Goldfinches, Juncos, Tree Sparrows, and other small song birds. Shrubs and small trees like high bush cranberry, winter-berry holly, chokecherry, and hawthorns may provide food for Waxwings, Robins, Blue Jays, Cardinals, and Sparrows during the late winter months. Conifers like balsam fir, white spruce, white pine, and hemlock may provide food for Chickadees, Nuthatches, Pine Siskins, and the occasional Crossbills. Evergreens also provide shelter for birds and other wildlife from the harsh winter weather and the eyes of hungry predators.

As you page through catalogs and plan your garden look for plants that are a native winter food source for birds. It may require a bit more effort, but when you spot a flock of Waxwings gorging on the high bush cranberries you planted, the time spent will definitely be worth it.

Visit the following for more information about native plant food sources for birds in the winter.

[http://www.birds.cornell.edu/AllAboutBirds/attracting/landscaping/land\\_tips](http://www.birds.cornell.edu/AllAboutBirds/attracting/landscaping/land_tips)

<http://www.audubonathome.org/yard/index.html>

<http://www.abnativeplants.com/>

<http://www.nwf.org/backyard/>

[http://www.nh.nrcs.usda.gov/features/Backyard\\_Conservation/native.html](http://www.nh.nrcs.usda.gov/features/Backyard_Conservation/native.html)

*Gardener's Notebook and Kirkwood Gardens are  
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# NATURAL ADVENTURES



Photo by Eric D'Aleo

## WINTER BIRD BANDING OPEN HOUSE

Saturday, January 5 • 9:00 a.m. - 12:00 Noon

All ages welcome

For over 25 years Senior Naturalist Dave Erler has been banding and monitoring birds at our winter feeders. Drop by our annual open house anytime between 9:00 a.m. and noon to discover how and why birds are banded – and help out in the process! No reservations required.

Cost: *no charge/member; \$5/non-member*

## OPENING THE GATES TO WINTER

Sunday, January 13 • 1:00-3:00 p.m.

Sunday, February 10 • 1:00-3:00 p.m.

Saturday, February 23 • 10:00 a.m.-12 p.m.

All ages welcome

Have you ever wondered what happens here during the winter? Come view the Gephart Exhibit Trail animals in all their winter glory. A naturalist will guide your walk and discuss the many ways the animals are well-adapted for winter here in New Hampshire. Be ready to snowshoe and see how beautiful the animals look in their winter coats. Snowshoes are available at no charge.

Cost: *\$7/member; \$9/non-member*

## THE BIRD FEEDER PHOTOGRAPHER: A PHOTOGRAPHY WORKSHOP

Saturday January 26 • 9:30-11:30 a.m.

Ages 16+

Winter is a difficult time for wildlife and many people put out feeders to supplement the diets of songbirds. This often leads to a “birdfeeder moment,” which many of us attempt to capture by reaching for the camera, with varied results. This workshop will focus on the challenges and the rewards facing the bird feeder photographer and give you an opportunity to discuss problems, share and learn tips, and photograph winter songbirds here at our feeders. Bring your own camera and equipment.

Cost: *\$8/member; \$10/non-member*

## BIRD IDENTIFICATION SERIES

### WINTERING RAPTORS

Thursday, January 10 • 7:00-9:00 pm

AND Saturday, January 12 • 8:00 a.m.-4:00 p.m.

Ages 14+

Join Executive Director Iain MacLeod for a two-part, in-depth program on the identification and ecology of New England wintering raptors. The workshop includes an evening session and a field trip to the New Hampshire coast and the Parker River National Wildlife Refuge on Plum Island, Massachusetts to look for Snowy Owls, Rough-legged Hawks, Bald Eagles, and Northern Harriers.

Cost: *\$45/member; \$55/non-member*

### WINTER COASTAL BIRDS

Thursday, February 28 • 7:00-9:00 p.m.

AND Saturday, March 1 • 8:00 a.m.-4:00 p.m.

Have you ever wondered about the seabirds inhabiting New Hampshire's coast during the winter months? You can learn about them in this two-part, in-depth workshop with Iain MacLeod. Focusing on the identification and ecology of Loons, Grebes, Ducks, Gulls, and other seabirds, the program includes an evening session and a field trip to the coast. You will learn how to differentiate scoters from eiders and mergansers, get tips on identifying gull species, and learn where to look for Black Guillemots, Long-tailed Ducks, and Gannets offshore.

Cost: *\$45/member; \$55/non-member*

### WARM IN WINTER

Saturday, February 2 • 9:30-11:00 a.m.

Ages 8+

Have you ever thought about how animals and people stay warm in the winter? Do animals make homes or just grow more fur? What shelters can people make to stay warm in winter? Join us to celebrate winter at this Groundhog's Day program!

Cost: *\$7/member; \$9/non-member*

### WISE ABOUT TURTLES

Saturday, March 15 • 10:00-11:30 a.m.

Ages 5+

Why do turtles disappear in winter? Join us for a fun, active learning experience through outdoor activities, crafts, story-telling, a wild snack, and a meeting with live turtles. The secret lives of turtles in cold weather will be revealed!

Cost: *\$7/member; \$9/non-member*

### THE SHAPE OF NATURE

Saturday, April 5 • 9:30-11:00 a.m.

Ages 3-6

Spark your child's imagination as we explore the outdoors freely in search of shapes, patterns, and color. We'll explore forest and field to find the shape of nature. Adult must accompany child at no additional cost.

Cost: *\$6/member; \$8/non-member*

*Reservations and advance payment required unless otherwise stated.  
Programs are subject to cancellation if minimum enrollment is not met.*

# NATURAL ADVENTURES

## SCHOOL VACATION

### WINTER BIRD BANDING

Tuesday, February 19 • 10:00 a.m.-12:00 noon

Tuesday, February 26 • 10:00 a.m.-12:00 noon

Ages 6+

Senior Naturalist Dave Erler has been banding and monitoring the birds at our winter feeders for over 25 years. Learn how and why birds are banded – and join in to help! Adult must accompany child.

*Cost: \$7/member; \$9/non-member*

### SNOWSHOE UNDER THE FULL MOON

Thursday, February 21 • 7:00-9:00 p.m.

Ages 14+

When was the last time you took a walk outside at night? Come and enjoy a snowshoe walk in the peaceful winter woods under the light of a full moon. We will investigate the many adaptations plants and animals use to survive New England winter nights. Snowshoes are available at no charge.

*Cost: \$8/member; \$10/non-member*

### EXPLORE WINTER

Thursday, February 28

**Animals in Winter • 11:00 a.m.-12:00 p.m.**

**Snowshoe Explorations • 12:30-2:00 p.m.**

Ages 6+

Brrr – it's cold outside! Learn how animals handle the demands of winter in this one-hour, indoor program called "Animals in Winter." You'll meet three animals and discuss the different adaptations they use to survive. Bring your lunch and stay for an active outdoor session on snowshoes (conditions permitting). In "Snowshoe Explorations" you'll trek on snowshoes to learn, through activities and observations, about what animals do in winter and what helps them make it through until spring. Adult must accompany child. Snowshoes are available at no charge.

*Cost per program: \$5/member; \$7/non-member*

*Cost for both programs: \$8/member; \$10/non-member*



**SQUAM LAKES  
NATURAL SCIENCE CENTER**  
NEARER TO NATURE

## PROGRAMS FOR HOMESCHOOL STUDENTS

Second Thursday of the month, November through April

### ALL ABOUT SERIES

10:00-11:00 AM

Ages 2-5 only

Learn about different New Hampshire animals through stories and activities. Parent/Guardian requested to attend with child.

### HOME SCHOOL HOUR

10:00-11:00 AM

Ages 6-10 only

Discover New Hampshire's natural world through outdoor activities or visits with live animals.

Programs are designed to be taken in sequence, but it is not required.

*Cost for each program is \$5/member child; \$7/non-member child.*

*One adult attends for free. Each additional adult pays child fee.*

*Reserve all six programs for a discounted rate:*

*\$4/member child; \$6/non-member child per program.*

SAVE THE DATE  
**CLEAN UP DAY**  
SATURDAY, APRIL 26



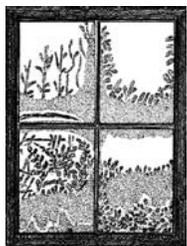
## SQUAM BIO-BLITZ

Friday, June 6 to Saturday, June 7

Join us for what promises to be an exciting, educational, and enlightening event. We are joining forces with the Squam Lakes Association and the Squam Lakes Conservation Society to launch a 24-hour bio-inventory of the Squam Range. We need your help – as budding citizen scientists – to work side-by-side with leading experts in a variety of biological fields to systematically count every species of everything that grows, swims, crawls, flies, creeps, or wriggles. Can you even begin to imagine how many different living things we can identify in one day?

We'll start on Friday evening and some teams will count through the night recording owls, bats, moths, amphibians, crickets, etc. At dawn there will be songbird surveys and then throughout Saturday teams will continue looking for trees, plants, mammals, and any others forms of life (down to microscopic molds and fungus). At the end of the day we will gather together for a cook-out and to wrap-up the event by keying out species, sharing stories, and making a provisional tally of the accumulated biodiversity of Squam.

LOOK FOR DETAILS ON HOW TO SIGN UP FOR SPECIFIC TEAMS IN THE SPRING.



## OPENING A WINDOW TO THE NATURAL WORLD

Most of us have memories of places and events in our childhood that created a lasting connection to the natural world. Perhaps it was finding a bird's nest in our backyard or playing in a leaf pile in the fall with a cherished friend. Perhaps it involved a fort in an old gnarled maple, a walk through a milkweed patch filled with Monarch Butterflies, or a visit to a local nature center. For many of us those seminal moments planted a seed of wonder in our hearts and fostered a life-long connection to the natural world.

For more than forty years, the Squam Lakes Natural Science Center has provided enriching natural experiences that help plant those priceless seeds of wonder. Please support our Annual Fund campaign with your generous gift and allow us to continue to provide opportunities for you, your family, and New Hampshire's students to get nearer to nature. If you have not already sent your gift, please consider doing so now – or donate online at [www.nhnature.org](http://www.nhnature.org). Thank you for your support!

### TAX-FREE IRA ROLLOVER

Last year Congress implemented significant pension reforms, creating new philanthropic opportunities. The Pension Protection Act of 2006 allows the transfer of up to \$100,000 from traditional and Roth Individual Retirement Accounts (IRA) to qualified charitable organizations such as the Squam Lakes Natural Science Center. Distributions are tax-free and avoid early withdrawal penalties but no charitable deduction may be taken.

To qualify you must be 70½ years of age or older, your gift may not exceed \$100,000 per year, you must make the gift before December 31, 2007, and the transfer must be an outright direct transfer from an IRA or Rollover IRA to one or more charities.

Please consider taking advantage of this opportunity, which is only available until the end of 2007. As always, we recommend you consult your tax professional or financial planner to determine what is best for you. The Squam Lakes Natural Science Center is a 501(c)(3) non-profit organization and our tax id number is 02-0271824.

### NATURALIST'S LEGACY SOCIETY

If you have already named the Squam Lakes Natural Science Center through your will or other estate plans, please let us know. As a member of the Naturalist's Legacy Society, you will be invited to donor recognition events and recognized in the Annual Report, unless you prefer to remain anonymous. Recognizing planned giving donors allows us to express our appreciation and may also inspire others to give support through their own estate plans.

*Opening a Window to the Natural World is written by Development and Communications Director Janet Robertson. For more information, contact Janet at 603-968-7194 x 12 or [janet.robertson@nhnature.org](mailto:janet.robertson@nhnature.org).*

## BUSINESSES INVEST IN EDUCATION

In addition to Annual Fund gifts, every year numerous businesses provide support in the form of memberships, sponsorships, and in-kind contributions of goods and services, which help to sustain the education programs and services we provide for the community. We are grateful for this strong community backing, which is vital to our work.

We thank these businesses that provided support in 2007 through memberships: Belknap Landscape Company, Hemphill Power & Light, Laconia Savings Bank, Morrell Corporation, Pike Industries, Pinetree Power Tamworth, Rockywold-Deephaven Camps, Public Service of New Hampshire, Samyn-D'Elia Architects, and Tennis Courts of New Hampshire.

We are grateful to these businesses that provided support in 2007 through sponsorships: Belknap Landscape Company, Bridgewater Power Company, Community Guaranty Savings Bank, Cormack Builders, Cross Insurance Agency, Bill Driscoll Associates, EOS Research, Hypertherm, Longhaul Farm at Squam Lake, Henry S. Maxfield Real Estate, Meredith Village Savings Bank, New Hampshire Electric Co-op Foundation, Old Print Barn, Plymouth Travel and Tours, Public Service of New Hampshire, Rockywold-Deephaven Camps, Samyn-D'Elia Architects, Squam Boat Livery, Stonyfield Farm, and Tanger Outlet Centers.

We receive an average of \$50,000 of in-kind contributions of goods and services annually, many from businesses. We are grateful for each and every contribution; all 2007 in-kind donors will be listed in the 2008 Annual Report. Major in-kind gifts were received in 2007 from: 82North.com Online Services, Balsams Grand Resort Hotel, Belknap Landscape Company, Bound Tree Medical Company, Charles River Laboratories, Common Man Restaurant, Martignetti Companies, MegaPrint, Plymouth Animal Hospital, Precision Lumber, Rhino Bike Works, Peter Smith Associates, Smuttynose Brewing Company, Squam Boat Livery, Tootsie Roll, True Colors Print & Design, Venture Print, and Walter's Basin.

## WISH LIST

Pine needles for animal enclosures

2-quart and gallon plastic pots for Kirkwood Gardens

## BIRD FEEDING from page 5

as Wood Thrushes has at least been partially attributed to cowbird parasitism. Although other factors have helped cowbirds expand their range, bird feeding is certainly one.

So what are some myths about feeding birds?

**Myth # 1** - Once bird feeding is started, you must continue because birds become dependent on feeders, and, if you were to discontinue for whatever reason, the birds will starve. Studies have shown that birds rarely get more than 20% of their daily calorie needs from feeding stations. Birds have survived for eons by opportunistically switching to what seasonable foods are available. Birds seem to be smart enough to know that an all-seed diet is not adequate for any species.

**Myth #2** - Don't feed birds in the summer because the young birds brought to the feeders will become lazy and dependent. Not true. If anything, parent birds bringing young to feeding stations may actually increase the young ones' survival by exposing them to another food source. However, if you live in an area where bears are present, it isn't wise to feed birds in the warmer months unless you are prepared to "bear proof" your feeders or take them in every night.

**Myth #3** - It is not ethical to feed birds as those resources could be put to better use growing food that could feed the poor and starving. Although a purist might find traction with this concern, in reality, feeding birds is less of a resource drain than keeping household pets. The pet food industry far surpasses the bird food industry in the amount of resources consumed, so this argument only has standing if one chooses not to have a household pet.

There are other alternatives to attracting birds to your yard besides bird feeders. A well-maintained bird bath or landscaping with birds in mind are just two possibilities.

So why feed birds? It's fun! If done responsibly, feeding birds provides hours of enjoyment and a sense of contact with the natural world. Bird feeding is a great introduction to nature study for both young and old. It can also be the first step in getting people to become more aware of and to care about the natural world around them.

## VOLUNTEER UPDATE

### VOLUNTEER RECOGNITION DINNER PARSONS AWARD



*Helen Robinson and Peter Wood*

Trustees and staff hosted the annual Volunteer Recognition Dinner on August 29 at the Italian Farmhouse in Plymouth to honor and thank all our dedicated volunteers. The event was generously sponsored by Bill Driscoll Associates, Tanger Outlet Centers, and Cross Insurance Agency. Numerous area businesses contributed items for door prizes for the volunteers: Abondonte, Canoe, Center Harbor Cellars, Corner House Inn, Homestead Restaurant, Inn at Mill Falls, Keepsake Quilting, Mount Washington Cruises, Pirates

Cove Adventure Golf, Spinelli Cinemas, Squam Lake Camp Resort, Waterville Valley Ski Resort, Winnepesaukee Bay-Gulls, and Winnepesaukee Forge.

Board Chair Peter Wood announced the new Parsons Award recipient: Helen Robinson. Helen first volunteered for the initial docent class of 1997. She has given many hours since then helping with education programs, especially enjoying Otter Enrichment, and also working on special events. Helen's name was chosen lottery-style from this group of 49 eligible volunteers: Jim Barry, Ellen Bennett, Janice Byrne, Dorothy Chekas, June Corrigan, Andrea Eaton, Bea Edgar, Janice Elgin, Fran Fernandes, Karen Firmin, Clara Fowler, Linda Gately, Allan Gavan, Amber Gordon, Eileen Gosselin, Ramona Goutiere, Joyce Hackett, Steven Hackett, Patricia Heinz, Ann Hinman, Mari Hoell, Pat James, Eva Karcher, Susan Kemp, Esther Marshall, Peggy Martin, Joan Mayerson, Mary Ann McRae, Connie Morrison, Lauren Moulis, Winnie Oustucky, Doris Phippen, Diane Potter, Clare Read, Jean Shlager, Julian Shlager, Judy Sniffen, Susan Stepp, Carol Stewart, Sydney Stewart, Shirley Stockwell, Eileen Torrey, Susan Vines, Fred Weisz, Jan Welch, Betsy Whitmore, Barbara Widmer, and Beverly Wood. The Parsons Award honors long-time volunteers Natalie and Don Parsons; each year a new recipient represents the spirit of volunteerism.

The volunteer appreciation display located in the Trailhead Gallery acknowledges cumulative volunteer hours and is updated each year to reflect total hours. Names added to the display this year were announced at the dinner. New to the 200+ hours category are: Jim Barry, Clara Fowler, Eileen Gosselin, Peggy Martin, Connie Morrison, Bill Phippen, Jean Shlager, Julian Shlager, and Lea Stewart. Moving to the 500+ category are: Joyce Hackett, Mary Ann McRae, Robert Snelling, Susan Stepp, and Judith Webster. Natalie Parsons and Carol Stewart moved to the 1,000+ level.

Trustee Judith Webster received the Presidential Volunteer Service Award Silver Medal for giving over 250 hours of volunteer service in a single year. This outstanding achievement was due in part to her work on the spectacular 40th Anniversary Gala held in 2006. This year's recipients of the Presidential Volunteer Service Award Bronze Medal, for 100 to 249 hours of service in a single year, are: Jim Barry, Nancy-Jane Duncan, Joyce Hackett, Steven Hackett, Patricia Heinz, Eva Karcher, Joan Mayerson, Paul Mayerson, John McRae, Natalie Parsons, Diane Potter, Betty Schoonmaker, Jean Shlager, Julian Shlager, Judy Sniffen, Susan Stepp, Lea Stewart, Sydney Stewart, and Betsy Whitmore.

## WE ARE GRATEFUL FOR THESE MEMORIAL AND HONORARY GIFTS RECEIVED FROM JANUARY 1 THROUGH OCTOBER 31, 2007.

**In memory of Michael Robert Brown**

Phyllis Houser

**In memory of Robert Hendrick**

Susan and Thomas Stepp

**In memory of Thatcher Payne Luquer**

Anne Louise Luquer Clinton

**In memory of Charles Main**

Paul and Margaret Cannon

**In memory of Alice Menzies**

Mr. and Mrs. Bruce Clark

Carol Colburn

Mr. and Mrs. Dave Demers

Town of Guildhall, Vermont

Anne G. Hartshorn

Kenneth Hoyt

Mr. and Mrs. David Miniutti

NH Order of Eastern Star,  
Priscilla Chapter

NH State Police Benevolent  
Association

Arnold Tilton

Mr. and Mrs. Lee Wilder

**In memory of Donald Parsons**

Golden Touch Beauty Shop

Reverend Sydney Lovett

New Hampton Community School

Dr. and Mrs. Barry Ruthfield

Susan Schlener and Lucille Morell

Mr. and Mrs. Vincent Sciacca

Arthur Worth

**In memory of William Schulz**

Marnie Blaisdell Schulz

**In memory of Greg Smith**

Mary P. Dickson

Frances Chalmers and Gail Smith

James Talcott Fund of the  
New York Community Trust

**In memory of James Sylvestre**

Robin Gould

**In honor of Lydia Eaton**

Reverend John Brock and Martha Deering

**In honor of Jane and Eric Ellingson's 50th anniversary**

George Carr

**In honor of Dave Erler**

Garden Club of Dublin

**In honor of Veronica and Paul Guyre**

Mr. and Mrs. Pete Heissenbittel

**In honor of Mr. and Mrs. George E. Levin**

Carol and Robert Mayer

**In honor of Warren and Paul Miller**

Mr. and Mrs. John McLaren

**In honor of Russell C. Orton**

Chase Orton, Leslie Orton,  
Piper Orton

**In honor of Julian Shlager**

Mr. and Mrs. Leon Grossier

## FLYING INTO WINTER *continued from page 1*

take care of their feathers and to spread oil from a gland near the base of their tail, preventing rain and wet snow from getting through to their insulating down.

Where is a good sheltered spot for the night? Chickadees retire to thick evergreens which protect them from wind. A tiny tree hole makes a good spot for one chickadee although the bird emerges the next morning with a temporarily curved tail! But what about those exposed legs and feet? Winter birds have a special trick under their scales -- it's a wild version of a heat exchanger! In the legs and feet, arteries bringing warm blood from the heart are right next to veins bringing cold blood back from the feet. Arterial blood is cooled somewhat so not so much heat will be lost to the air through the feet. Venous blood is heated somewhat so cold blood will not be returning to chill the bird's core. Of course there is always the one-legged bird trick where one foot is drawn up into the feathers. Perhaps the most secretive ploy is one the habit ruffed grouse have of tunneling into the snow to spend the night under an extra insulating blanket -- a good spot during snowstorms too.

With all these winter adaptations tucked under their feathers, do birds really need our help? Hibernating insects, winter berries and seeds can be challenging to find. As we all know, winter can be unpredictable. While providing a bird feeding station is not essential, it may give birds, especially first year birds, that extra boost needed to get them through our harshest season. Besides, bird feeding is an opportunity for us to observe birds and their behaviors -- a fascinating pastime. Watch the parade of Nuthatches, Goldfinches, Tufted Titmice and Cardinals, to name a few. Put out black, not striped, sunflowers that give birds lots of food energy. Don't forget to hang some suet or peanut butter to keep the Woodpeckers coming. Birds will place your feeder on their internal daily map so try to be consistent with your feeding and be sure food is out early in the morning when they need to replenish their energy, even if it means loading feeders in the evening.

Winter isn't just for the birds! Check out the winter landscape on foot, snowshoes or skis. Take some of the lessons you learn from birds with you -- insulate, eat well and be active!

## TRAIL'S END

Phew! November 1 has come and gone and the trails are closed until May 1, 2008. So we can relax, right? Wrong. There are many things that the staff and trustees accomplish during the 'winter off months.' Among them are:

1. Preparing and agreeing on the budget for 2008. Brian Eaton, Iain MacLeod, and the staff do much of the hard work of preparing the budget "from the ground up." But, the Board's Finance, Investment, and Audit Committee, under Mike O'Leary's leadership, spends many hours reviewing the budget to make sure we can "afford" all the expenses; and then the Board of Trustees must understand and vote to accept the budget – a major feature of the December and January meetings. Did you know that more than 20 percent of the annual budget comes from contributions, primarily the Annual Fund, and a further 10 percent from memberships? So, members like you are critical to our survival. Thank you for all you do.
2. Reviewing and revamping the many education programs that are the Science Center's raison d'être. Amy Yeakel and her education team are in the thick of this, whether it's planning for taking programs to schools, bringing schools to the Center, or developing new outreach enrichment ideas. Interaction with the Education Committee of the Board is a vital part of this brainstorming.
3. Refreshing the animal exhibits on the trails so that they continue to educate and inform, not to mention withstand the ravages of seven-year old boys who are inspired by the Igguldon's *Dangerous Book for Boys* to test all Jim Eckert's stalwart construction.

These are only three of the many activities that go on "behind the scenes" during the winter, to which all the staff and trustees contribute. One special effort that has been gaining momentum during the summer and fall, and that will come to a head this winter, is the updating of *Forging Trails*, the strategic vision document that has guided our actions so well during the last five years. Bob Snelling has been energetically guiding the efforts of a team of trustees and staff to review *Forging Trails* and, where necessary, modify it so that it is relevant to the next five years. Bob will present an advanced draft to the trustees at their December meeting with the notion that it should be ready for broader circulation early in 2008. So, be warned – your thoughts will be solicited!! Meantime, if any of you have burning ideas about new strategic thrusts that can't wait until you have a draft of *Forging New Trails* to chew on, you can email me as shown below – but I would encourage you to wait until you see the noble efforts of Bob Snelling, John McRae, Iain MacLeod, and many others.

Thanks for all your support.

*Trail's End is written by Peter M. Wood, Chairman of the SLNSC Board of Trustees.  
You may contact Peter at 603-968-7194 x 27 or peter.wood@nhnature.org.*

### Do you know the State Bird of New Hampshire?



## WINTER BIRD NATURE QUIZ

1. Which bird or birds would you see in New Hampshire in winter?
  - A. Canada Warbler
  - B. White-breasted Nuthatch
  - C. Eastern Phoebe
  - D. American Goldfinch
2. What bird, mostly white in color, migrates to New Hampshire in winter when its food supplies are limited in the Arctic?
3. Which New Hampshire bird tunnels into the snow for warmth in winter? It also grows extra fringes on its toes that act like snowshoes.
4. New Hampshire's State Bird is a visitor at winter bird feeders. What bird is it?
5. What are New Hampshire's only winter birds that climb down trees head-first?

Answers: 1. B and D 2. Snowy Owl 3. Ruffed Grouse 4. Purple Finch 5. Nuthatches (Red-breasted and White-breasted Nuthatches)



## The Howling Coyote Gift Shop

Browse our updated online Howling Coyote Gift Shop at our website, [www.nhnature.org](http://www.nhnature.org). The online Howling Coyote Gift Shop now features the convenience and security of using PayPal and standard 'shopping cart' technology to search for and buy products. Shop from the comfort of your home for SLNSC logo T shirts, vests, caps, and more.



**Members receive a 10% discount with every purchase.**



Between now and December 31, 2007, if you spend \$50 or more at the online Howling Coyote Gift Shop, **you will receive a free SLNSC Green Bag.**

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