

New Hampshire Audubon's Conservation Notes

News from the Conservation Department



March, 2010

Conservation Department Staff

Carol Foss, *Department Director*
Diane De Luca, *Coastal Biologist*
Laura Deming, *Wetlands and Riparian Biologist*
Pamela Hunt, *Avian Conservation Biologist*
Vanessa Jones, *GIS Specialist*
Chris Martin, *Raptor Biologist*
Rebecca Suomala, *Biologist*

New Hampshire Audubon
84 Silk Farm Rd.
Concord, NH 03301
603-224-9909
www.nh Audubon.org

Banner photo by Chris Martin



Letter from the Director

It is my great pleasure to share this report on the 2009 activities of New Hampshire Audubon's Conservation Department (and a glimpse into 2010). We had a busy and productive year both in the field and in the office, continuing long-term monitoring efforts for several state-listed threatened and endangered bird species and participation in regional conservation partnerships, initiating a roadside survey for Rusty Blackbirds, and addressing issues in land use, transportation, and forest resource planning and policies.

Highlights of the year included completion of the State of New Hampshire's Birds report, discovery of a Rusty Blackbird population in the Swift Diamond and Dead Diamond watersheds, collaboration with an environmental consulting firm to document Peregrine Falcon activity at a proposed wind energy site, and the first year of monitoring Bicknell's Thrush at Mittersill. The following pages provide details on these and the many other Department projects.

With your support and the help of our dedicated volunteers, the Conservation Department is hard at work furthering New Hampshire Audubon's mission to protect and enhance New Hampshire's environment for wildlife and for people.

Thank you for being part of New Hampshire's conservation community.

Carol R. Foss

From the President

I recently celebrated my one-year anniversary as President of New Hampshire Audubon. During the past 12 months, I have been continually impressed with the breadth and depth of our Conservation Department's work. From the forests of Pittsburg to the salt marshes of Hampton, from remote field sites to government offices, these dedicated individuals are hard at work on behalf of New Hampshire's wildlife and natural resources. I hope you will take the time to learn more about their activities from the following pages, and join me in wishing the Department continued success in 2010.

~ Mike Bartlett

Carol Foss receives EPA Lifetime Achievement Award

Carol Foss, Director of Conservation at New Hampshire Audubon, received a Lifetime Achievement Award from the U.S. Environmental Protection Agency (New England)! Lifetime Achievement Awards are reserved for individuals who have demonstrated a sustained commitment to environmental issues over a career or lifetime. The award was presented on Earth Day, Wednesday, April 22, 2009 in Boston. Carol's career with New Hampshire Audubon spans more than 30 years and includes stints as Education Director, Director of Wildlife Programs, and Director of Conservation. During that time Carol has served as a mentor to countless colleagues and aspiring biologists. "Carol's work ethics and well-known commitment to sound science have allowed her to bring people together to achieve significant conservation successes. Most important among these are development of the state's Threatened and Endangered Species list in the late 1970s and establishment of the New Hampshire Fish and Game Department's Nongame Program in the late 1980s," said NH Audubon President, Michael Bartlett. This is a fitting recognition of Carol's achievements and commitment to conservation.

What's Inside

The State of the Birds
How Well Does Your Community Protect Natural Resources?
Celebrating 30 Years of Counting Eagles
Staying Connected in the Northern Appalachians
Integrating Transportation and Conservation Planning in New Hampshire
Applying the New Hampshire Wildlife Connectivity Model at the Municipal Scale
Project Nighthawk – 2009 Update
Rusty Blackbird Surveys
Thank You to Donors
Volunteer for the Conservation Department & Wish List
Whip-poor-will Project Update
Asian Long-horned Beetles
Backyard Winter Bird Survey Highlights
New Hampshire eBird and New Hampshire Bird Records
Bird Conservation in the Hampton-Seabrook Estuary
New Hampshire Dragonfly Survey
New Hampshire Forest Resources 2010 Plan in Preparation
Upland Sandpipers on the Seacoast
Powwow Pond Update
Peregrine Falcons – A Moving Experience
Peregrine Surveys at a Proposed Wind Energy Site

The State of the Birds

by Pamela Hunt

Under contract with the NH Fish and Game Department, I took the lead in creating the first-ever “State of the Birds” report for New Hampshire. Modeled on a national report that was released early in 2009, “The State of New Hampshire’s Birds 2009” is a comprehensive overview of the population trends for all 186 species that breed in the Granite State. In addition to compiling information on population trends, the report goes two steps further and both identifies the most important threats facing our birds and proposes conservation actions to reverse the existing declines.

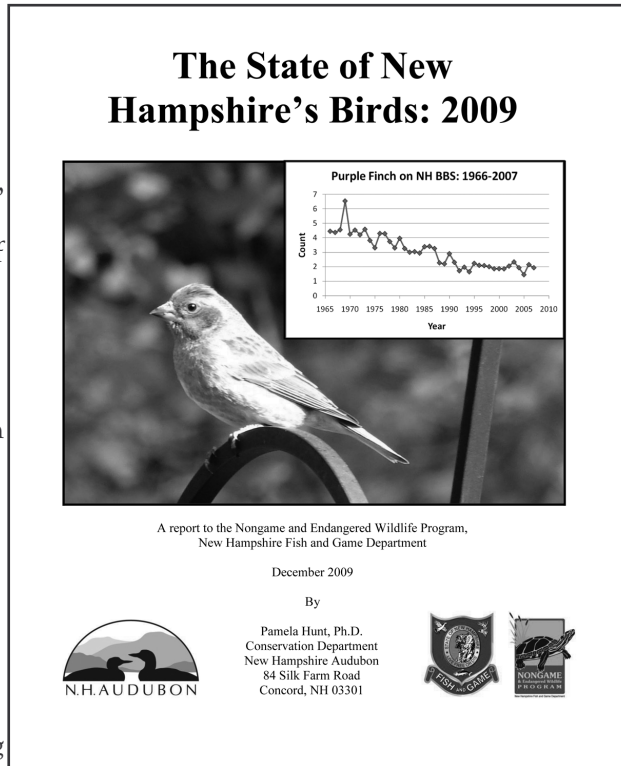
With respect to overall population trends, the state’s breeding birds fall into three roughly equal groups. One third are increasing or stable and one third are declining. For the remaining third the trend is unclear or there are not sufficient data to determine a trend. Each of these groups requires a different conservation approach. For increasing species, it is important to continue monitoring and watch for

potential effects from emerging threats like climate change and forest pathogens. For poorly understood species, there is a critical need for baseline population and trend data that can enable

us to assess which species are most vulnerable. Examples include many wetland birds and rare species of spruce-fir forests.

But it is the declining species that demand our most immediate attention. When birds are assigned to habitat and foraging groups, declines are most pervasive for species that use grassland and shrublands, and for those that feed primarily on flying insects (e.g., swifts and swallows). Also declining are many forest species that nest on the ground and/or migrate out of North America in the winter. The causes of these declines are likely as broad as the life histories of the birds themselves, leading in turn to a complex menu of conservation strategies. There is not space to go into detail here, but NH Audubon is working on a publication that will make the

information in “The State of the Birds” more readily available to the general public. For updates on report availability contact NH Audubon.



How Well Does Your Community Protect Natural Resources?

by Carol R. Foss

Local land use decisions play a critical role in determining the future of New Hampshire’s natural resources. Whether by enacting zoning regulations or encouraging voluntary practices, municipal planning boards help shape the changing faces of our cities and towns. The documents that govern local land use – master plans, zoning ordinances, and subdivision and site plan review regulations- can be important tools for protecting natural resources for future generations.

In 2007, Conservation Department staff and colleagues at The Jordan Institute collaborated under contract from the NH Fish and Game Department to explore strategies for incorporating the New Hampshire Wildlife Action Plan into local land use decision-making. One product of that collaboration was a process for assessing protections for wildlife habitat and natural resources in municipal land use planning documents. We have continued to refine and expand the process since the original pilots in Chester and Salisbury.

The assessments review a city or town’s land use planning documents with respect to 20 topics pertaining to protection of wildlife habitat and natural resources, and provide suggestions and sample language for possible revisions. We also review the

locations of important natural resources (agricultural soils, flood storage areas, water supply lands, high quality wildlife habitat, and wildlife connectivity zones) with respect to local zoning districts. Meetings with the Planning Board provide clarification of current provisions and an understanding of local concerns and priorities.

The Conservation Department completed wildlife habitat and natural resources protection assessments for three New Hampshire municipalities in 2009. Deerfield commissioned an assessment with funding from the NH Department of Transportation and I-93 Community Technical Assistance Program (CTAP) Round 1 Discretionary Funds. The report is posted at <http://www.townofdeerfieldnh.com/offices/planning-board.php>. Assessments for Franklin and Laconia were funded by a grant to the Lakes Region Planning Commission from the Samuel P. Pardoe Foundation, and were prepared in coordination with a Smart Growth Assessment by Lakes Region Planning staff.

Communities interested in further information about these assessments may contact Carol Foss (224-9909 x331; cfoss@nhaudubon.org).

Celebrating 30 Years of Counting Eagles

by Chris Martin

Even though it actually took place in January 2010, we wanted to include results from the most recent Mid-winter Bald Eagle Survey in this Newsletter. – Ed.

This year's count marked NH Audubon's 30th consecutive year coordinating New Hampshire's portion of the Mid-winter Bald Eagle Survey – part of a national survey of eagle distribution and abundance in winter. One of the key benefits of long-term data sets like the Mid-winter Eagle Survey is the way in which it places small annual changes into proper multi-decade context. When we began doing these surveys in January 1981, the Granite State's wintering Bald Eagle population was near the lowest of lows. During the first few years, mid-winter count participants found only a handful of eagles statewide, and on both federal and state levels the species was classified as endangered.

Now fast-forward to January 2010, when observers in New Hampshire tallied a record-high 61 Bald Eagles (37 adults, 24 immatures) during the one-day survey, matching the number seen on the count in January 2009. Additionally, eagle breeding territories found in the state showed a one-year jump of 33% from 15 sites in 2008 to 20 in 2009! Progress towards full population recovery such as this led to the removal of the Bald Eagle from the federal Threatened and Endangered Species List in July 2007, and its down-listing to threatened status in New Hampshire by the NH Fish & Game Department in September 2008.

Results from the 2010 Survey

Undeterred ... well, okay, maybe slightly deterred ... by chilly temperatures and biting northwest winds, 83 hardy observers turned out on January 9, 2010 (and on a warmer January 7, 2010 in the Lakes Region) to look for eagles. As in past years, eagles were seen primarily in five major wintering areas: along the Androscoggin, Connecticut, and Merrimack rivers, around Great Bay and other coastal areas, and in the Lakes Region. Figure 1 shows trends in eagle abundance over the 30-year span of New Hampshire's mid-winter count and Figure 2 shows where observers saw them in the January 2010 count.

Statewide winter eagle counts are coordinated by NH Audubon's Conservation Department in collaboration with the NH Fish and Game's Nongame and Endangered Wildlife Program. While very few of us were involved when these counts began some 30 years ago, there are two individuals that deserve special mention this year.

First, a tip of the hat and a huge "Thank you" to Dick Hughes, who has "retired" from active participation in the Mid-winter Survey at Great Bay after nearly 30 years. Dick often volunteered to cover one of coastal New Hampshire's most wind-blown spots – the eastern shore of Great Bay. Dick is largely responsible for cultivating a great new crop of eagle-watchers in and around Great Bay.

And finally, congratulations to Dawn Stavros, who has been involved in every Mid-winter Survey since the beginning, and hasn't stopped yet. Along the way, she acted as survey coordinator and archivist, and trained two more generations (daughter and two grandchildren) in both the art and the science of eagle-watching!

Volunteer recruitment and training for winter eagle survey participants occurs each year in November and December, prior to the start of the winter eagle-watching season. If you'd like to get involved in future counts, please contact Chris Martin at NH Audubon, cmartin@nhaudubon.org, 603-224-9909 x317.

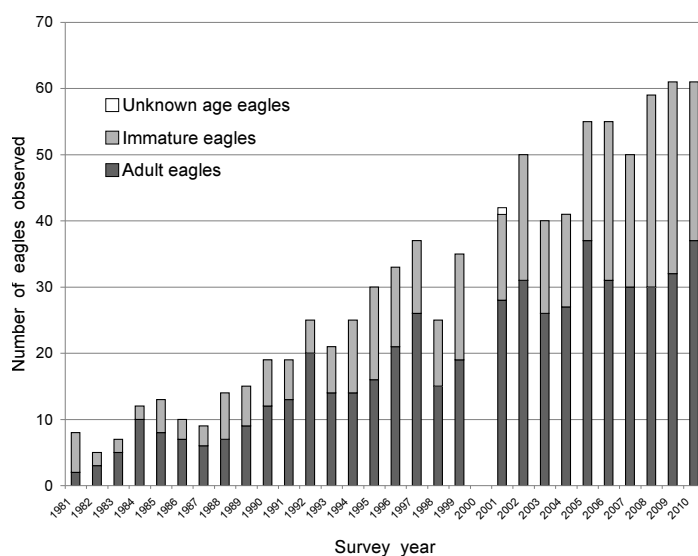


FIGURE 1. RESULTS FROM NEW HAMPSHIRE'S MID-WINTER BALD EAGLE SURVEY DAY, 1981-2010, COORDINATED BY NH AUDUBON.

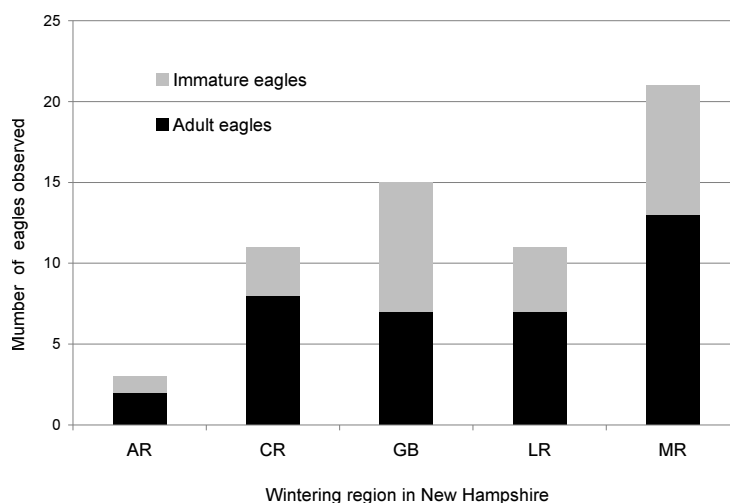


FIGURE 2. NH AUDUBON'S 2010 MID-WINTER BALD EAGLE SURVEY DAY RESULTS BY REGION (AR=ANDROSCOGGIN RIVER, CT=CONNECTICUT RIVER, GB=GREAT BAY/COASTAL, LR=LAKES REGION, MR=MERRIMACK RIVER).

Staying Connected in the Northern Appalachians

by Mark Zankel, The Nature Conservancy

New Hampshire Audubon has joined with The Nature Conservancy, the NH Fish and Game Department (NHFG), and more than a dozen other partners in an exciting new initiative, “Staying Connected in the Northern Appalachians.” The Northern Appalachians region, also known as the “Northern Forest,” is one of the most intact temperate broadleaf forests in the world. Spanning 80-million acres in four states and four Canadian provinces, it is home for more than five million people, as well as rare alpine vegetation, many at-risk species, old-growth forests, large blocks of unfragmented forest, and high quality rivers. Nevertheless, the Northern Appalachians face challenges posed by fragmentation and climate change. Recent analysis reveals that the region risks being separated into disconnected ecological islands — isolating wildlife populations, limiting the ability of their young to disperse, and limiting their ability to migrate and adapt in response to a changing climate. The Staying Connected initiative was established to help mitigate the impacts of habitat fragmentation and climate change by maintaining and restoring landscape connections across the Northern Appalachians for wide-ranging and forest-dwelling wildlife (such as bear, moose, lynx, marten and bobcat). Led by The Nature Conservancy, the initiative will focus on eight priority areas where landscape connections for wildlife are at risk due to development and transportation corridors.

Locally, we are focusing on the priority area known as the Northeast Kingdom (VT) – Northern New Hampshire linkage. Computer modeling – building from the NH Wildlife Connectivity model developed by NH Audubon and NHFG – combined with field tracking and expert local knowledge to identify key areas of connectivity that enable wildlife to move through the landscape. For example, where are the best opportunities to link the West Mountain Wildlife Management Area and the Nulhegan Basin Refuge in Vermont with the Vickie Bunnell Preserve, Nash Stream Forest, and Umbagog National Wildlife Refuge in New Hampshire? The project will culminate with a detailed connectivity conservation plan, outreach to local communities and landowners, and targeted work to address road crossings.

Integrating Transportation and Conservation Planning in New Hampshire

by Carol R. Foss

The 2005 federal transportation act “SAFETY-LU” includes the Surface Transportation Environment and Planning Cooperative Research Program (STEP), which encourages collaborative research. New Hampshire Audubon received a STEP grant to improve integration of transportation and conservation planning in New Hampshire. This provides an important step in

efforts to reduce negative impacts of our transportation networks on wildlife populations. The grant had several components:

- Convening a working group to develop strategies and advise the project;
- Developing a framework for assessing impacts of transportation projects;
- Creating a wildlife connectivity model (see below); and
- Compiling existing conservation plans in the state.

The working group included representatives of state and federal agencies, non-governmental organizations, and a consulting firm. The group developed a list of resources for which impacts of transportation projects should be assessed, types of impacts to be assessed for each resource, and distances over which each impact is likely to occur.

The group identified a major gap in New Hampshire’s transportation planning process – transportation projects proposed by cities, towns, and regional planning organizations receive no environmental review until they are in the NH Department of Transportation (NHDOT) “pipeline” for design and construction. We are working with colleagues at the Rockingham Planning Commission and NHDOT to develop guidelines for an early environmental screening process for proposed transportation projects.

Screening proposed projects for potential environmental impacts before they are submitted to NHDOT will make it easier to identify the least damaging alternatives and mitigation strategies early in the planning process. Experience in other states shows that early screening can lead to better environmental outcomes. In addition, this approach can save money by alleviating the need for costly project redesign, mitigation and conflict resolution when significant environmental impacts are identified later in the planning process.

We appreciate the opportunity to work with NHDOT and the regional planning commissions to improve the environmental outcomes of transportation projects in New Hampshire.

Applying the New Hampshire Wildlife Connectivity Model at the Municipal Scale

by Carol Foss and Vanessa Jones

During 2008, Conservation Department biologists collaborated with colleagues at the NH Fish and Game Department to develop a wildlife connectivity model for New Hampshire. This model identifies “paths of least resistance” for wildlife across the landscape. Different land cover types have different “resistance levels” for different wildlife species. For example, densely developed urban areas have high resistance for most species, while undisturbed forest has low resistance. Agricultural lands have low resistance for a red fox, but high resistance for a lynx.

We have been applying the wildlife connectivity model in our assessments of municipal planning documents for their effectiveness in protecting important wildlife habitat and other

natural resources. Using existing protected lands as core areas, we use the model to identify connectivity zones, or areas of lowest resistance, between them. A local-scale analysis connects protected lands within the city or town, while a regional-scale analysis connects large blocks of conservation land in a more extensive area. We then overlay the connectivity zones with local zoning districts. Once connectivity zones are identified, municipalities can use cluster development, expanded riparian buffers, and conservation easements to maintain pathways for wildlife movement through developing areas.

Project Nighthawk – 2009 Update

by Rebecca Suomala

Project Nighthawk volunteers installed gravel nest patches at St. Paul's School (Concord), Woodsville High School, and Stevens High School (Claremont). Forty-five patches have been installed since the Project's inception in 2007, thanks to many project volunteers including Jane Kolias in Concord and Lou-Anne Conroy in the Upper Valley, and the Ashuelot Valley Environmental Observatory and Ken Klapper in the Keene area. Groups used Project Nighthawk's Gravel Patch Handbook to install patches independently in Bradford, NH and Burlington, VT. Nighthawks have yet to nest on a patch but males have displayed over several patches as they try to attract a mate.



ST. PAUL'S STUDENTS ON THE PATCH THEY CONSTRUCTED IN MAY, 2009. PHOTO BY JANE KOLIAS.

In 2009, we began checking for nests on any non-patch rooftops with displaying nighthawks in Concord but found only one nest (see below). Keene observers discovered one recently fledged nighthawk on a rooftop but the nest location was unknown. This is the first confirmed nesting in Keene in many years.

For the third year, a nighthawk nested on the ground at a company in Concord. Volunteers documented nest activity each night beginning on May 19. When the nest failed from flooding rains, we used the volunteers' knowledge of incubation behavior to find the pair's re-nesting site. The second nest was on a



COMMON NIGHTHAWK FLEDGLING AND HOUSE SPARROW IN KEENE DURING LATE JULY. PHOTO BY KEN KLAPPER.

rooftop, but we were denied access and had to use nightly behavioral observations to follow incubation and subsequently confirm a second nest failure. Without rooftop access, we were unable to determine if the egg(s) hatched, when failure occurred in relation to hatch and why.

Project Nighthawk was funded by the Nuttall Ornithological Club and private donations. Volunteers tallied more than 600 hours in 2009. To volunteer or receive a 2009 summary, contact me (603-224-9909 x309 bsuomala@nhaudubon.org), or check the project's web site: www.nhbirdrecords.org under Bird Conservation.

Rusty Blackbird Surveys Yield Scattered Pairs and Population Cluster

by Carol R. Foss

Rusty Blackbird populations have been declining across North America since at least the 1920s, with dramatic declines documented since the 1960s. This species breeds in spruce-fir forest associated with shallow wetlands from Alaska to Newfoundland, south into Minnesota, Michigan, New York, and northern New England. They winter in wooded swamps and bottomland forests, primarily in the southeastern United States and the Mississippi Valley.



RUSTY BLACKBIRD
BY VANESSA JONES

Conservation Department staff and volunteers participated in a regional effort to document current Rusty Blackbird distribution in the northeast, through broadcast surveys at suitable wetlands along driving routes within their historic range. A grant from the Nuttall Ornithological Club supported additional surveys of remote wetlands in the White Mountains. Overall, the New Hampshire effort included 331 surveys of roadside and remote wetlands from Sandwich north to Pittsburg, and documented Rusty Blackbirds on 49 surveys. While many of the occupied sites were widely scattered, two small watersheds west of Lake Umbagog yielded six and eight occupied wetlands, respectively. With several additional pairs in nearby townships, this area supports one of the highest known concentrations in New England, and provides an excellent opportunity for further research.

Graduate students from the University of Georgia and Dalhousie University in Nova Scotia trapped and banded 40 Rusty Blackbirds across the northeast from New York to Nova Scotia, including 20 New Hampshire birds. Tissue samples from these birds have been distributed to researchers in the United States and Canada who are investigating diet and condition, mercury levels, blood parasites, and genetics.

Carol Foss attended an international symposium on Rusty Blackbirds on February 11, where researchers presented preliminary results from the 2009 tissue analyses, and participants developed a Rusty Blackbird Research and Management Strategy to guide research and monitoring efforts for the next five years.

Thank You

Conservation Department Projects are supported by funds from the Conservation Department Appeal and New Hampshire Audubon's Dr. Margery J. Milne and Dr. Lorus J. Milne Biological Science Research Fund.

The New Hampshire Audubon Conservation Department gratefully acknowledges grants from the following:

Davis Conservation Foundation
Federal Highway Administration
Norcross Wildlife Foundation
Northeast Utilities Foundation
Nuttall Ornithological Club's Charles Blake Fund
TransCanada Corporation

A very special thank you to everyone who donated to the Conservation Department Appeal in 2009 and to specific Department projects. Your support helped to make these programs possible.

Mr. Richard S. Aaronian	Mrs. Mary M. Boulanger	Ms. Laura Deming	Mrs. Andrea C. Giroux	Mrs. Catherine Johnson
Mr. & Mrs. Albert Abrevaya	Col. Pierre D. Boy, Retired	Larry J. Denoncourt	Mr. Paul W. Glover, Jr.	Mr. & Mrs. Harry V. Johnson
Mrs. Eleanor A. Ackley	Mr. Bruce W. Boyer	Ms. Lorraine M. Deon	Ms. Phyllis A. Going	Mrs. Margot Johnson
Mrs. Ruth C. Adams	Mrs. Flora R. Braley	Ms. Carolyn A. DeSchuytner	David & Kathi Govatski	Ms. Lynn Johnson
Mrs. Cera J. Ageieff	Ms. Barbara A. Brawley	Ms. Julia M. DiStefano	Mr. & Mrs. Eugene Gray	Mr. Donald Jones
Mrs. Judith H. Alger	Mr. & Mrs. Thomas J. Bridge	Mrs. Marjorie M. Doan	Ms. Nancy Greenwood	Mr. & Mrs. Joseph W. Kabat, Jr.
Mrs. Jane J. Allen	Ms. Eleanor Briggs	Ms. Jane M. Doherty	Ms. Judith P. Gregory	Mr. John F. Kane
Mr. & Mrs. R. Leonard J. Allen	Mr. Frank W. Brown	Mrs. Anne K. Donahue	Mrs. Rachel Grenier	Mr. Peter Kaplan & Ms. Katharine H. Hanson
Mrs. Sara M. Allen	Mr. & Mrs. Philip A. Bryce	Sandra Donnell	Ms. Edith R. Griscom	Jim & Lynn Kegley
Mr. & Mrs. V. Blake Allison	Mr. Richard Buchanan	Dr. & Mrs. David B. Donsker	Mr. Charles A. Griswold	Mrs. Betty E. Kelley
Mr. & Mrs. Stephen R. Ames	Mrs. Linda O. Bundy	Mrs. Monica E. Dove	Ms. Mary Lou Guerinot and Mr. C. Robertson McClung	Ms. Hope A. Kelly
Mr. Richard E. Amidon	Mrs. Betty A. Burgoyne	Mr. Weston Dow	Mr. & Mrs. Albert L. Gustafson	Mr. & Mrs. Auvern Kenison
Mr. Donald S. Anderson	Mr. Ken Burt	Mrs. Linda K. Draper	Mrs. Susan B. Gutterman	Mr. William F. Kenney
Mrs. Richard P. Arms	Mr. David L. Butler	Ms. Kathryn I. Dube	Mr. & Mrs. Paul M. Guyre	Dr. John W. Kirk
Ms. Deborah L. Armstrong	Ms. Judith Buttaro	Mr. & Mrs. Robert Duffley	Ms. Mary D. Haig	Mr. & Mrs. Thomas J. Knott
Mrs. Susan J. Armstrong	Ms. Hope Zanes Butterworth	Mr. & Mrs. John DuPre	Mrs. Geraldine M. Haley	Mrs. Patricia A. Koenig
Mr. & Mrs. Michael Arsenault	Ms. Judith Campbell	Carol Duston	Ms. Elizabeth A. Hall	Ms. Barbara A. Kresse
Ms. Elizabeth Ashworth	Mrs. Nancy E. Campbell	David & Kelly Dwyer	Mrs. Shirley E. Hall	Mrs. Janet N. Krueger
Mrs. Brenda D. Augenti	Mr. Stephen Campbell and Ms. Anne Baird	Ms. Mary C. Dye	Mr. & Mrs. David C. Halsted	Ms. Mary Kruitwagen
Mr. & Mrs. Charles R. Austin	Mr. William E. Campbell	Mrs. Katherine E. Dymont	Ms. Claire L. Hamel	Mrs. Gail P. Labrecque
Mrs. Jeannine C. Ayer	Mr. & Mrs. Alfred Cann	Mr. & Mrs. Glenn R. Eaton	Mr. Richard K. Hamlen	Mr. & Mrs. Norm Labrecque
Mrs. Harriett H. Bailey	Mr. Michael Caragher	Mrs. Jean M. Eckhardt	Mr. & Mrs. Robert E. Hamm	Ms. Ann E. LaCroix
Mrs. Joann W. Bailey	Mrs. Jacqueline M. Carbonneau	Ms. Nancy Ekola	Mrs. Penny H. Hardy	Mr. & Mrs. Thomas E. Laflamme
Ms. Reva E. Bailey	Mr. & Mrs. Pierre O. Caron	Mrs. Mary E. Ellis	Mr. & Mrs. Baxter Harris	Ms. Naomi Lafond
Mr. & Mrs. Scott K. Baldwin	Mr. & Mrs. Winslow Carr	Mrs. June E. Ellison	Mr. William C. Harris	Ms. Elizabeth A. Landry
Ms. Barbara Barboza	Ms. Anne Carroll	Mr. Edith Anne Emery	Ms. Kate Hartnett and Ms. Racheal Stuart	Mrs. Sophia Lane
Mrs. Norma J. Bard	Mr. & Mrs. Peter Cassell	Dr. B. J. Entwisle	Ms. Theresa E. Harwood	Mr. & Mrs. Henry W. Langley
Mr. & Mrs. Roy E. Barlow	Mrs. Nancy Caswell	Ms. Deborah B. Estaver	Ben & Robin Haubrich	Mr. John W. Lanier
Mrs. Susan P. Barnes	Mr. & Mrs. Larry E. Cate	Mr. & Mrs. Michael Evans	Mrs. Suzanne B. Hazen	Mr. Robert J. Lannon
Ms. Stephanie Barnes	Ms. Elizabeth Cavanagh	Mr. & Mrs. Richard Fabian	Mr. David Healy	Mrs. Constance R. Lanseigne-Case
Ms. Gail Barr	Mrs. Elizabeth Chadwick	Mr. & Mrs. William C. Fahey	Mr. & Mrs. Kenneth C. Heckman	Mrs. Katherine P. Larson
Mrs. Barbara D. Barrand	Mrs. Sarah B. Chadwick	Mr. Robert N. Faiman, Jr.	Mr. & Mrs. Richard Henderson	Mr. & Mrs. Richard H. Laskey
Mr. Douglas D. Barringer and Ms. Norma Howcroft	Mr. & Mrs. David W. Chamberlain	Ms. Jane Cooper Fall	Ms. Nellie A. Henson	Ms. Marilyn E. Lemos
Ms. Ulrike Barth	Dr. & Mrs. Jerry R. Chamberlin	Mr. & Mrs. Timothy W. Farres	Ms. Betty G. Herrin	Mrs. Lucie C. Lepine
Mr. & Mrs. Francis Bartlett	Mr. Roger A. Chambers	Mr. & Mrs. Paul J. Fenton, Jr.	Mr. & Mrs. Glenn P. Heymans	Mrs. Barbara A. Lerch
Mr. & Mrs. Michael J. Bartlett	The Chary Fund	Mrs. Joan K. Ferguson	Ms. Eudora M. Hibbard	Mr. & Mrs. Alfred H. Lessard
Mr. Paul D. Basham	Ms. Wendy Chatel	Mr. & Mrs. Roderick L. Ferland	Mr. & Mrs. Harvey D. Hill	Mr. & Mrs. Richard J. Lewis
Sylvia Bates & Thomas Masland	Mr. Neil M. Cheney, Jr.	Mr. John A. Fibiger	Ms. Marjory Hillman and Mr. Lou Marcello	Mr. & Mrs. John Libby
Mr. & Mrs. William F. Baxter	Ms. Eleanor L. Childs	Dr. David G. Field	Sally Hochgraf	Mrs. Audrey M. Lindgren
Mrs. Barbara B. Beal	Ms. Elizabeth Christensen	Dr. Ann B. Flood and Dr. Harold M. Swartz	Mr. Fenton A. Hodge	Ms. Donna R. Liolis
Mrs. Kathryn M. Beauregard	Dr. George A. Clark, Jr.	Ms. Virginia Clifford	Mr. & Mrs. Lee Hodson	Mr. & Mrs. Michael Litvin
Dr. Mae L. Beck	Mr. Harold C. Cole	Mr. Kenneth E. Folsom	Mrs. Harriet P. Hofheinz	Mrs. Debra A. Lockwood
Mr. Joseph A. Becker	Ms. Nancy A. Colena	Ms. Elizabeth Forsham	Ms. Deborah Holbrook	Mrs. Ann R. Loeffler
Ms. Barbara A. Beers	Ms. Laurie J. Comeau	Mr. & Mrs. James L. Foss	Mr. & Mrs. Thomas Holton	Ms. Becky Lohmiller
Mr. Joseph W. Belanger	Mr. Frederick T. Comstock, Jr.	Ms. Nancy D. Foster	Carol C. Hoogstrate	Mr. William H. Longmaid
Mrs. Janet L. Beliveau	Mr. & Mrs. Gregory Connors	Dr. & Mrs. Edward H. Fowler	Mr. Donald M. Hooper	Mr. & Mr. Brian J. Looney
Mr. & Mrs. Frank Benham	Mr. & Mrs. Harry Conroy	Mrs. Mary G. Fowler	Mr. & Mrs. Ronald J. Houseman	Ms. Sylvia Lord
Mrs. Suzan I. Bennett	Mr. & Mrs. Hamilton Coolidge	Ms. Sharon F. Francis	Ms. Mary L. Howard	Ms. Gisela Lovatt
Mr. & Mrs. Dean E. Bensley	Mr. & Mrs. Michael F. Cordingley	Ms. Nancy C. Frank	Mr. David M. Howe and Ms. Helen E. Costello	Ms. Judith L. Lukas
Mrs. Shirley A. Bentley	Ms. Ruth M. Coutermarsh	Mr. Joel I. Friedlander	Mrs. Ruth L. Howe	Ms. Rita Mackey
Dr. & Mrs. Kenneth D. Bergman	Ms. Ann M. Crabb	Mr. & Mrs. Wesley G. Frost	Mr. & Mrs. Daniel H. Hubbard	Mr. & Mrs. Stephen J. Maddock
Mrs. Diana M. Bertin	Mr. William M. Crafts	Mrs. Carol A. Frye	Mr. & Mrs. Richard F. Hughes	Mr. Kenneth J. Mahoney
Mrs. Sally J. Bertrand	Mr. Lloyd Cryans	Ms. Mary Alice Fullerton	Ms. Barbara J. Hunt	Ms. Marilyn Mahoney
Dr. & Mrs. Dan Bezon	Ms. Madyson Cryans	Mr. John W. Furlong	Mr. & Mrs. Richard T. Hutchins	Mr. & Mrs. Richard Mailhot
Mr. Alfred G. Bickford	Ms. Alice M. Custard	Mrs. Judy Gagne	Mrs. Katharine M. Ingram	Mrs. Virginia A. Mansolino
Mr. & Mrs. Kenneth W. Bickford	Mr. & Mrs. Donald A. Dallaire	Mr. & Mrs. Stuart C. Gallup	Mr. & Mrs. William R. Israel	Ms. Janis O. Manwaring
Mr. & Mrs. Gordon Bingham	Mr. & Mrs. Terence E. Dancy	Mr. & Mrs. Jesse A. Galt	Ms. Lauren Jacoby	Mr. & Mrs. Paul Marashio
Mr. Richard J. Bishop	Mrs. Elaine R. Danisienka	Mr. & Mrs. G. Spencer Garrett	Mrs. Marcelline S. Jacques	Mr. Thomas Markey
Mr. & Mrs. Harold Black	Dr. R. Laurence Davis	Mr. Mark Gashi	Mr. & Mrs. William J. Jahoda	Mr. Paul W. Marsh
Mr. Wilfred A. Blain	Mr. & Mrs. Joao E. De Almeida	Ms. Jane H. Gifford	Mr. Thomas K. James	Mr. & Mrs. Paul D. Marshall
Ms. Arline A. Blair	Ms. Char Delabar	Ms. Helen Gilman	Betsy & Harold Janeway	Mascoma Chapter of NH Audubon
Mr. Frank Bolton, Jr.	Ms. Diane Deluca and Mr. Stephen G. Walker	Ms. Kristen M. Gingras	Mrs. Virginia L. Jensen	Ms. Mary N. Masland
Mr. Forrest H. Bornkessel				Mrs. Shirley B. Mason
Mr. & Mrs. Arthur C. Borror				Mrs. Lilo Masters
Ms. Mary Ellen Boudman				Mr. & Mrs. Hubert O. Matheny, Jr.

Mrs. Lorraine Mathiesen
Mr. & Mrs. John I. Mattill
Ms. Muriel McAlister
Dr. & Mrs. Craig F. McBeth
Ms. Patricia A. McBride
Mr. William E. McCabe
Ms. Linda S. McCloskey
Mr. & Mrs. Ken McComb
Mr. Stanley C. McCumber
Mrs. Constance J. McDade
Mrs. Margaret McDaniel
Ms. Marianne McDaniel
Mr. Peter McDonough
Mr. Jon D. McKee
Mr. & Mrs. Clayton McKenney II
Ms. Edith Crocker McKown
Mr. & Mrs. Ronald E. McLaughlin
Mr. Peter O. McVay and
Mrs. Susan C. Martin
Grazyna Medynski
Mr. John G. Meisel
Ms. Esther L. Merrill
Mr. John P. Merrill
Mr. & Mrs. John W. Merrill
Mrs. Malcolm A. Merrill
Mr. & Mrs. Joseph Meyette III
Ms. Leola J. Miller
Mr. & Mrs. Stephen R. Mirick
Mrs. Nanci R. Mitchell
Mrs. Dorothy C. Mite
Mrs. Sandra L. Molloy
Mr. & Mrs. Jack L. Moltenbrey
Mrs. Lois S. Moore
Mr. & Mrs. Richard W. Moore
Mr. Lawrence B. Morris, III
Ms. Martha A. Mowry
Mrs. Helga Mueller
Mr. & Mrs. John W. Muenzinger
Ms. Katharine T. Murray
Ms. Patricia A. Myers and
Mrs. Carolyn Sheehan
Jeff & Ann Nelson
Mr. & Mrs. Joel P. Nelson
Mr. Joseph F. Nelson
Mr. R. Wayne Nelson
Carol R. Foss and
Harold P. Nevers
Ms. Linda M. Newell
Ms. Guinevere D. Newton
Mr. & Mrs. William S. Nichols

Mrs. Barbara A. Nicholson
Mr. & Mrs. Paul R. Nickerson
Mr. & Mrs. Wayne B. Nicoll
Mrs. Carla M. Nielsen
Ms. Lynda Niles
Mrs. Patricia D. Niswander
Mr. & Mrs. Wallace L. Nunn
Mr. Daniel P. Nute
Mr. David O'Hearn
Mr. Robert M. Olszewski
Mr. & Mrs. Jeffrey M. Opper
Ms. JoAnn O'Shaughnessy
Mr. & Mrs. Ronald E. Osimo
Ms. Pauline Otterson
Ms. Patricia Parker
Mr. & Mrs. William Parkinson
Mrs. Theodore Parkman
Ms. Priscilla Parmenter
Mr. & Ms. Northam D. Parr
Ms. Lydia M. Pastuszek and
Mr. Brian Monahan
Mr. Robert P. Patenaude
Mrs. Barbara Paterson
Mr. C.W. Patrick
Mr. & Mrs. Robert J. Pelletier
Mr. & Mrs. Stephen Pennell
Mr. & Mrs. Richard M. Pennock
Ms. Alice S. Perry
Mr. & Mrs. Mark Peters
Mr. & Mrs. Michael M. Peters
Petersen Family Fund
Mr. & Mrs. Henry H. Peterson
Mr. & Mrs. John Petricone
Ms. Elizabeth M. Phillips
Mr. James Pickford
Mr. & Mrs. William W. Pinney
Mr. & Mrs. Stephen D. Plodzick
Ms. Andrea J. Plummer
Mr. & Mrs. Theodore Pobywajlo
Ms. Jane S. Potter
Mr. Lawrence F. Potter
Mr. & Mrs. Thomas Potvin
Mrs. Rebecca S. Powell
Ms. Ann H. Preston
Louise C. Price
Mrs. Barbara S. Proper
Mr. & Mrs. Robert C. Puth
Mr. & Mrs. Harold S. Putnam
Mr. Robert A. Quinn
Mr. & Mrs. Mark A. Radwan

Ms. Joan M. Ramsay
Ms. Judy Ramsey
Ms. Blenda Rappaport
Ms. Beth Raymond
Ms. Marlene Record Family
Ms. Martha Reinhardt
Mr. Joseph H. Reisert
Mr. N. Chester Reynolds
Ms. Jane P. Rice
Mrs. Barbara D. Richards
Ms. Gail G. Richards
Ms. Louise M. Richards
Mr. Peter M. Richards
Dr. & Mrs. Robert S. Ridgely
Mrs. Caroline Cressman Riggs
Mrs. H. Elizabeth Ring
Mr. Chandler S. Robbins
Mrs. Elinor Y. Robie
Mrs. Marion T. Roche
Ms. Linda J. Rogers
Ms. Judith G. Romano
Mr. Alvin M. Rosen
Mrs. Marilyn G. Ross
Mr. & Mrs. Brian C. Rossignol
Ms. Roberta Rountree
Mr. & Mrs. Garrett B. Rowe
Mrs. Herbert H. Rowell
Ms. Mary E. Salach
Mr. & Mrs. John Sanborn
Mrs. Elisabeth N. Sanders
Mr. & Mrs. Ralph E. Sanders
Mrs. Laura C. Savage
Mr. & Mrs. Brant T. Sayre
Ms. Sandra L. Scagliotti
Mr. & Mrs. Robert Scarchilli, Jr.
Ms. Margaret C. Schoene
Mr. & Mrs. John G. Schreiber
Mr. & Mrs. James R. Schubert
Mr. & Mrs. Bruce M. Schwaegler
Mr. Jeffrey M. Schwartz
Seacoast Chapter of NH Audubon
Ms. Leslie Seigal-Bergum
Mr. & Mrs. James A. Sellers
Ms. Kathleen S. Seymour
Mrs. Judith G. Sheldon
Mr. & Mrs. Frederick T. Short
Mr. & Mrs. Ralph Sidore
Mr. Russ Silva and Ms. Janet Nolan
Mr. Richard D. Sizer
Mr. & Mrs. Dennis H. Skillman

Dr. Robert J. Skinner, Sr.
Mrs. L. William Slanetz
Mr. & Mrs. Charles W. Smith
Mr. & Mrs. Jeffrey E. Smith
Mr. & Mrs. Jeffrey P. Smith
Mrs. Ruth H. Smith
Mr. Kent Smith and
Ms. Bonney Cashin
Mrs. Norma J. Smith
Ms. Robin N. Smith
Mr. & Mrs. Stephen Smith
Ms. Mary Lou Soczek and
Ms. Carol Sarno
Mrs. Hilda W. Sokol
Mr. & Mrs. Kenneth Solinsky
Ms. Ann C. Somers and
Mr. Loring N. Webster
Mr. Steve Spafford and
Ms. Sharon E. Nelson
Ms. Rebecca A. Spiegel
Ms. Devin J. Starlanyl and
Mr. Richard P. Gerdus
Mr. & Mrs. Arthur G. Stavros
Dr. Benjamin B. Steele
Mr. & Mrs. Peter Stettenheim
Mr. Richard S. Stevens
Mr. & Mrs. Harrison E. Stover
Ms. Tianne Strombeck
Mr. & Mrs. Paul G. Stroud
Karen L. Sullivan
Mr. & Mrs. Lawrence B. Sunderland
Mr. & Mrs. Henry Swan
Mr. Guy A. Swenson and
Ms. Mary Lindstrom
Mr. & Mrs. Leonard A. Swenson
Ms. Karen M. Swistak
Mr. William J. Taffe
Mr. & Mrs. George A. Tasker
Mr. & Mrs. David Tellman
Ms. Linda A. Thomas
Mrs. Carol J. Thompson
Mr. Peter Thompson
Mr. Thaddeus C. Thorne
Mrs. Marcia M. Tingley
Mr. & Mrs. Stephen Tippet
Mrs. Elizabeth Todd
Mrs. Beatrice E. Towne
Mrs. Anne O. Trudeau
Denise Turcotte, CSC
Mr. & Mrs. Raymond F. Turner

Mrs. Nora M. Tuthill
Mrs. Marjorie Tuttle
The Tyrrell Foundation
Mrs. Ruth Underwood
Mr. Allan E. Upton
Mr. Anthony J. Vazzano and
Ms. Susan E. Wiley
Mrs. Robert C. Vernon
Mr. & Mrs. Mark Vernon
Mrs. Jane Vincent-McIlwaine
Frances & Carl Von Mertens
Ms. Lesley Waldron
Mr. & Mrs. Anthony R. Walker
Mr. & Mrs. Walter Walker
Mrs. Sidney A. Walker
Mr. & Mrs. Robert D. Wallace
Mrs. Margaret Wallingford
Mrs. Marion E. Ward
Mr. George H. Watkins
Mrs. Margaret B. Watkins
Ms. Devin J. Starlanyl and
Mr. Richard P. Gerdus
Mr. Philip S. Wells
Mr. & Mrs. Maynard B. Wheeler
Mr. Anthony W. White
Mrs. Jean M. Whitman
Mr. Douglas T. Whitney
Barbara Wilkins
Ms. Cheryl Anne Williams
Mr. & Mrs. John R. Williams
Mr. & Mrs. John O. Willis
Ms. Demetra Wittmann
Dr. & Mrs. Merrill K. Wolf
Mr. Robert P. Woodward
Ms. Elizabeth A. Woolf and
Mr. Richard J. Geffen
Mr. Jonathon Woolf
Ms. Suzanne Woolf
Mr. Thomas S. Woolf
Mr. Frances E. Wright
Mr. & Mrs. Glen S. Wright
Ms. Mary P. Wright
Ms. Kay Yeagley
Mr. & Mrs. Russell Yearke
Mrs. Joan Young
Mr. Peter P. Zak
Mr. & Mrs. Craig C. Zamoida

Volunteer for the Conservation Department

Wildlife Field Surveys

There are many different surveys for volunteers with varying abilities and time commitments. For a full list, check the web site, <http://www.nhbirdrecords.org/volunteer/nha-volunteering.htm> or contact Becky Suomala, bsuomala@nhaudubon.org or 603-224-9909 x309.

Special Project - Winter Eagle Database

Looking for 1-2 volunteers to assist in development of statewide geo-referenced database of winter bald eagle sightings. Volunteer(s) will review survey data from 2005-2010, identify location coordinates using Google Maps (or some similar mapping program), and enter coordinates into Excel database. Individual should be somewhat familiar with MS Excel software, with NH geography in general, and with the methods used in the Mid-winter Eagle Survey. Most work should occur in Fall 2010, but could begin sooner, as available. Contact Chris Martin at cmartin@nhaudubon.org or 603-224-9909, x317.

New Hampshire Bird Records

Volunteering is at the heart of *New Hampshire Bird Records* and there are many ways to help. Here are some of the current openings: Advertising Manager, Computer Data Entry, Graphic Production Assistant, and Feature Writer. For more details check the web site: <http://www.nhbirdrecords.org/volunteer/index.htm> or contact Managing Editor, Becky Suomala, bsuomala@nhaudubon.org or 603-224-9909 x309.

More Opportunities

There are many more volunteer openings in the Conservation Department. Check the web site for a full list: <http://www.nhbirdrecords.org/volunteer/nha-volunteering.htm>

Wish List

Portable CD player in good condition
10'x10' sheets of rubber roofing membrane
FRS radios
Night vision binoculars
Sturdy plastic 5-gallon buckets with metal handles (i.e. joint compound buckets)

Whip-poor-will Project Update

by Pamela Hunt

Whip-poor-will surveys again took place across the state in 2009, but the bigger news was the second year of territory mapping in the Ossipee Pine Barrens and Mast Yard State Forest. At the latter site, volunteers and staff logged over 50 hours of nocturnal visits from May through July, all with the goal of figuring out what portions of the forest were most frequented by Whip-poor-wills. Using a method known as triangulation mapping, observers took simultaneous compass bearings on calling birds and used the intersection of these two bearings to locate the birds. Almost 400 such bearings were collected at Mast Yard, and when the dust of analysis settled there appeared to be eight territories on the state forest (see Figure 1) – down from nine in 2008.

Using aerial photos and information provided by the state, we were able to assess the habitats present in each of these territories in both years. The findings came as no surprise to those of us who were out in the woods each night. Although the study area is 75% forest, Whip-poor-will territories consisted of only 34% forest, indicating that they preferred the more open portions of the site, including a power line corridor and thinned pine stands. The value of these data is that they will hopefully lead to management recommendations to enhance habitat for this declining species, and return its signature call to more of the New Hampshire landscape.

As the 2010 field season approaches, we are already preparing to continue this research project. High on the list of priorities is placing radio transmitters on up to 11 birds, allowing us to determine where they are even when they're not calling. Attempts to use radio transmitters in 2009 were hampered by weather among other problems, so only a single bird was captured – only to have its transmitter fall off the next evening. Recent forestry operations at Mast Yard, and ongoing burns in

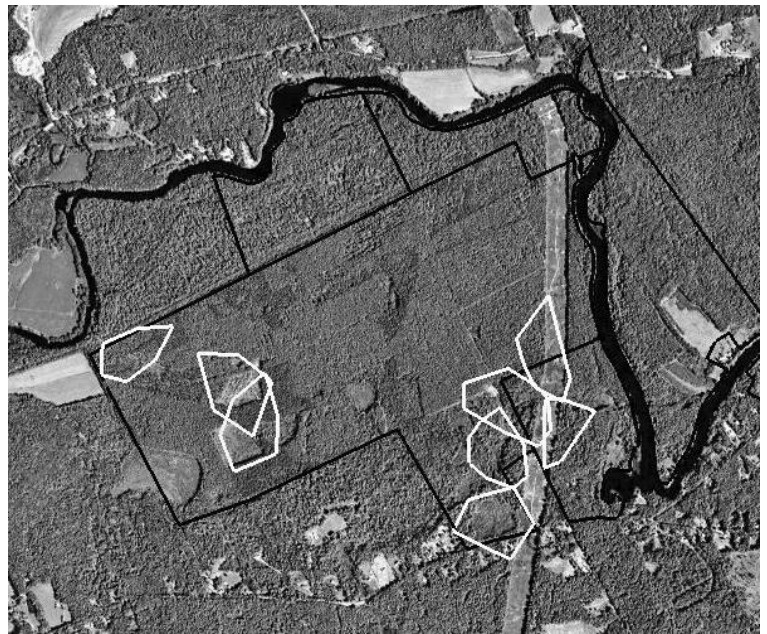


FIGURE 1. AERIAL PHOTO OF MAST YARD STATE FOREST, SHOWING WHIP-POOR-WILL TERRITORIES IN 2009.

Ossipee, will provide excellent opportunities to study how birds respond to habitat changes. Will new birds settle in the selective cut at Mast Yard? How long after a burn do they wait until using restored habitat in the pine barrens?

Great credit goes to the select volunteers who endured mosquitoes, ticks, and sometimes total darkness in pursuit of Whip-poor-wills. They are almost surely waiting patiently for the return of spring, and the opportunity to dust off their headlamps and revisit the evening woods, replete with the calls of coyotes and owls, and a night sky relatively unobscured by urban lights.

The Whip-poor-will Project was funded by the Nuttall Ornithological Club, Norcross Wildlife Foundation, and private donations.

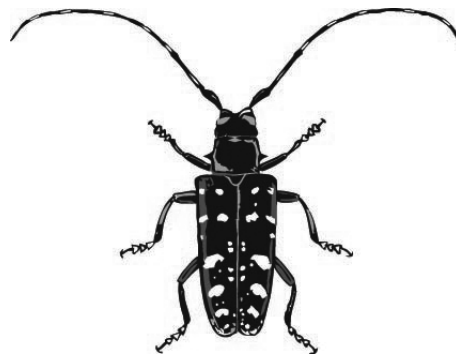
Asian Long-horned Beetle

by Laura Deming

This past summer, Conservation Department staff worked with several state and federal agencies to educate the public about a new invasive species, the Asian Long-horned Beetle (ALB) (*Anoplophora glabripennis*). Native to Asian forests, this wood-boring insect arrived in North America in untreated shipping crates and pallets. Since 1996, the Asian Long-horned Beetle has infested urban and suburban areas in Toronto (Canada), New York, New Jersey, Chicago, and most recently, Worcester, Massachusetts. Although not yet documented in New Hampshire, this species may be accidentally introduced via firewood from infested trees.

Asian Long-horned Beetles attack

and kill hardwood trees, including maple, boxelder, birch, American elm, American horsechestnut, poplar, and willow. The only known method of eliminating ALB is to destroy the trees by chipping or burning.



FEMALE ASIAN LONG-HORNED BEETLE BY MIKE BOHNE, US FOREST SERVICE, DURHAM NH.

Through extensive media coverage, workshops, and two "Beetle Blitz" events in August, the outreach campaign has alerted a broad audience to the potential threat of this species. The public is urged to keep an eye out for this distinctive insect (see image), to report any suspected sighting, and to refrain from transporting firewood. More information can be found on the UNH Cooperative Extension website: <http://extension.unh.edu/ALB/>

Backyard Winter Bird Survey Highlights

by Rebecca Suomala

We now have 23 years of data from the annual Backyard Winter Bird Survey in February. Originally begun as the “Cardinal-Tufted Titmouse Census,” it was expanded in 1987 to gather information on the distribution and abundance of many winter species in New Hampshire. Each year about 1,300 people participate, recording the birds they see in their yard on the survey weekend. Here’s an excerpt and a few graphs from the 2009 Backyard Winter Bird Survey Results by Pamela Hunt that shows some of the patterns we’re starting to see.

Downy and Hairy Woodpeckers are by far the most common woodpecker species in the survey, and are probably recorded by almost all observers. Abundance of both has been slowly creeping up over the last 20 years, and the “record highs” set in 2009 aren’t terri-

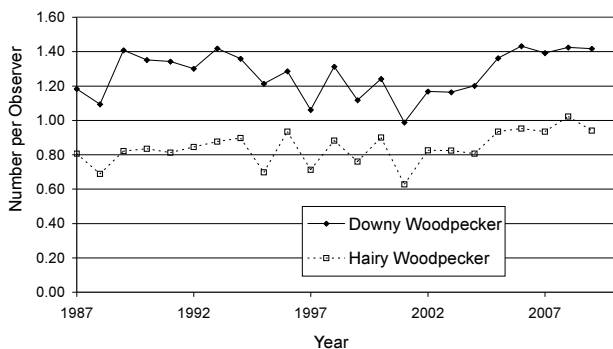


FIGURE 1. STANDARDIZED NUMBERS OF DOWNY AND HAIRY WOODPECKERS ON THE BACKYARD WINTER BIRD SURVEY, 1987-2009. NOTE THAT BOTH SPECIES TEND TO INCREASE AND DECREASE AT THE SAME TIME.

bly dramatic (e.g., Hairys beat their previous high by a mere two woodpeckers!). At the same time, both species have also been increasing on the summer Breeding Bird Survey (BBS) since the 1960s, so something is working in their favor! Perhaps more interesting in the BWBS data is the fact that these two species’ populations seem to go up and down at the same time, as shown in Figure 1.

After a 16-year hiatus Pine Siskins were back in force in 2009, and in numbers that were higher than those of Common Redpolls the previous winter. Another frequent theme on the BWBS has been the increasing winter numbers of fruit-eaters such as American Robins and waxwings, and in 2009 they were everywhere again. Robins eked out to a new all-time high (Figure 2), the numbers of Eastern Bluebirds were over twice the previous record, and Cedar Waxwings hit their second-highest total.

For a copy of the full results, contact me at or you can find them on the web site: <http://www.nhbirdrecords.org/bird-conservation/backyard-winter-survey.htm>.

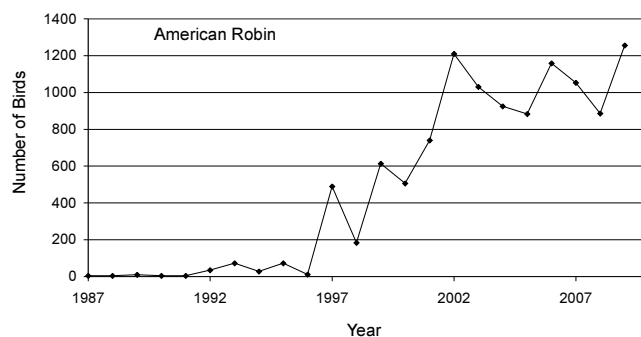


FIGURE 2. NUMBERS OF AMERICAN ROBINS ON THE BACKYARD WINTER BIRD SURVEY, 1987-2009.

New Hampshire eBird and New Hampshire Bird Records

by Rebecca Suomala

New Hampshire Bird Records has teamed up with eBird and released New Hampshire eBird (www.ebird.org/nh). This website provides a version of eBird specifically tailored to the Granite State, and it also means a big change for how birds are reported to New Hampshire Bird Records (NHBR). We are finally embracing an on-line reporting system! It’s time to move away from our old DOS-based data entry program and into the 21st century. Observers now use NH eBird to report their sightings, which are available for publication in NHBR, as well as for a wide range of other uses.

eBird is a free, user-friendly way for birders to record, archive, and share their observations on-line. Anyone can go to the web site and enter information about a bird they have seen. The data come to life via interactive maps which are tailored to New Hampshire. eBird is also a personal records-keeping system and resource for understanding bird distribution. On customized “My eBird” pages users can

New Hampshire eBird

Welcome to New Hampshire eBird

Birding News and Features

Introducing New Hampshire eBird

New Hampshire eBird and New Hampshire Bird Records (NHBR) have teamed up to collaborate with birders and are excited to announce the release of New Hampshire eBird, an online portal specifically tailored to the Granite State. Not only does this website provide a version of eBird with a New Hampshire focus, but it will also help to revise and improve the reporting framework for New Hampshire Bird Records. From now on, reporting to New Hampshire eBird will be all you need to do to make sure your sightings are available for publication in NHBR, as well as a wide range of other uses.

Report your fall sightings to New Hampshire Bird Records

And do it through New Hampshire eBird! With the release of New Hampshire eBird, the editors of New Hampshire Bird Records will now be harvesting data directly from eBird. No need to spend days digging through notebooks or to send us spreadsheets—we’ll be watching your submissions and pulling out your most interesting sightings. We do still ask you to document your rarities for us. We may be contacting you for documentation throughout the season or at the end as we work on the New Hampshire Bird Records summary. And for those that need some time to ramp up to using eBird, or that live in areas without fast internet connections, we do still welcome our reports in traditional form (excel files or on paper). We may be able to help with eBird entry.

Have You Seen a Rare Bird? — Be sure to document it!

Rare birds are fun and exciting to see, but they can also be valuable to our knowledge of species occurrence and distribution if they are well documented. The best documentation provides enough details that someone looking at the sighting 50 years from now will be confident of the identification. New Hampshire Bird Records (NHBR) collects and archives bird sighting documentation and the New Hampshire Rare Birds Committee (NHBRBC) reviews the sightings. All eBird data is reviewed and there may be times when someone, such as the NHBR Season Editor, asks you for documentation or more details on a specific sighting. Don't be alarmed or offended — they are looking after the quality of data

New Hampshire eBird rarities Pool

Most Checklists Submitted for Current Month

- Rockingham — 105
- Carroll — 72
- Cheshire — 57
- Stratford — 45
- Concord — 31

view their life, state and county lists—all generated automatically.

Launched in 2002 by the Cornell Lab of Ornithology and National Audubon Society, eBird’s goal is to maximize the utility and accessibility of the bird observations made by recreational and professional bird watchers. eBird data is also available for conservation and research – something that has been at the heart of New Hampshire Bird Records. We believe that NH eBird will be the best way to ensure that data is available to the most people and securely archived for generations to come. Fall 2009 is our first NHBR season using eBird and Fall Editor, Steve Mirick had his hands full with more than 17,000 bird sightings! There are always challenges with this kind of change but we’re very excited about it.

The conversion to NH eBird was supported by funds from the Margery and Lorus Milne Fund and private donations.

Bird Conservation in the Hampton-Seabrook Estuary

by Pamela Hunt

Although NH Audubon completed its "Avian Assessment of the Hampton-Seabrook Estuary" in 2007, we continue our interest in and commitment to the state's largest expanse of salt marsh and tidal mudflats. With funding from the Davis Conservation Foundation, we provided input into several conservation efforts targeting either Hampton-Seabrook or estuaries in general. Early in the year, I met with a University of NH graduate student who was compiling a "restoration compendium" for Hampton-Seabrook, a document that gathers available data on resources and threats and goes on to propose conservation priorities and strategies. Our bird data helped inform some of the priorities in this report.

At the same time, the Piscataqua Region Estuaries Partnership was working on a 2010 update to its "estuaries management plan." NH Audubon biologists attended several meetings where key conservation actions and objectives of the plan were discussed, with the end result that for the first time the new plan will include specific actions related to birds. Hopefully, the recognition that NH's estuaries are critical habitat for salt marsh sparrows and migratory shorebirds, and that these species can serve as valuable indicators of ecological condition, will lead to increased opportunities for much needed research, monitoring, and habitat restoration.

Another piece of the Hampton work was a brochure titled "Bird Conservation in the Hampton-Seabrook Estuary," that NH Audubon produced at the end of 2009. The brochure summarizes the conservation issues facing birds in the estuary for the general public, and will be made available at multiple local outlets (e.g., chambers of commerce, parks and beaches).



New Hampshire Dragonfly Survey

by Pamela Hunt

The NH Dragonfly Survey is a partnership between N.H. Audubon, the NH Fish and Game Department, and UNH Cooperative Extension. The project started in 2007, and to date has trained roughly 150 people in the biology and identification of dragonflies and damselflies. Slightly less than half of those have gone on to collect and submit data as part of this statewide survey, resulting in over 5,000 records from scattered parts of the state. The number of new town and county records (the first time a species has been recorded in a given town or county) continues to grow, and 61 towns have now recorded at least 50 species (up from 46 in 2008). Major gains were made in 2009 in Sullivan, Strafford, and Rockingham counties.

LOOKING FOR DRAGONFLIES
ALONG THE SHORE OF
WORLD END POND IN SALEM
DURING THE REGIONAL MEETING
OF THE DRAGONFLY SOCIETY
OF THE AMERICAS
IN JULY, 2009.
© PAMELA HUNT



The increase in coverage of towns in Rockingham County was due in part to a unique gathering in early August, when the Dragonfly Society of the Americas held its Northeast regional meeting in the Salem/Kingston area. Fifty dragonfly enthusiasts – including several of our very own "dragonhunters" – spent three days scouring the local rivers and wetlands for anything they could find. And find they did, with noteworthy records including Scarlet Bluets, Arrowhead Spiketail, Coppery Emerald, and Seaside Dragonlet.

The project's focus will turn north and west in 2010 because Grafton and Coos counties have large areas with little or no data. By the time this newsletter reaches you, we'll likely have already scheduled the next series of workshops, and begun to prepare the existing corps of volunteers to seek new challenges along the upper Connecticut River and in the White Mountains. What they'll find is anyone's guess, but if the last three years are any guide, they'll have a great time doing it.

For more information on the NH Dragonfly Survey, visit <http://www.wildlife.state.nh.us/Wildlife/Nongame/dragonflies.html> or contact Pam Hunt at phunt@nhaudubon.org, 603-224-9909 x328.

New Hampshire Forest Resources 2010 Plan in Preparation

by Carol Foss

The New Hampshire Division of Forests and Lands prepares a Forest Resources Plan approximately every 10 years for submission to the Governor and Legislature. The most recent Forest Resources Plan was published in 1996 and an interim status report provided in 2002. The Division began gathering input last fall for the 2010 Forest Resources plan, which is currently underway. Audubon staff have a long history of providing input to these plans, and the current effort is no exception. Conservation Department staff spent several hours discussing new and continuing issues affecting New Hampshire's forests with JB Cullen and Bob Edmonds, who are coordinating preparation of the 2010 plan,

and provided extensive written comments as well. New issues of concern include potential spread of the Asian Long-horned Beetle (see elsewhere in this newsletter), roles of New Hampshire forests in carbon sequestration and renewable energy generation. Audubon's comments addressed eight issue statements and provided 27 recommended actions. The draft 2010 plan will soon be available for public comment, and readers are encouraged to attend public information sessions this spring. We look forward to release of the draft plan and to working toward its implementation in collaboration with partner agencies and organizations.

Upland Sandpipers on the Seacoast

by Diane De Luca

Conservation Department biologists are working cooperatively with the NH Fish and Game Department, Portsmouth International Tradeport, USDA Wildlife Services and the Department of Transportation to conduct detailed research on the Upland Sandpiper nesting habitat at Pease International Tradeport (Pease) in hopes of creating suitable habitat in other areas of the seacoast. Pease, formerly the Pease Air Force base, currently supports the only confirmed nesting population of Upland Sandpipers in New Hampshire. Two pairs of Upland Sandpipers were confirmed nesting at the Great Bay National Wildlife Refuge in 1997 and 1998 but have not been confirmed since. Sightings from Durham, Dover, Manchester and southern Coos County in the last decade imply that birds are still visiting appropriate habitat elsewhere in the state.

Biologists monitored the Pease Upland Sandpiper population on a weekly basis from May through early September during the 2009 breeding season. NH Audubon has monitored this population at varying intensities since 1989 and much has already been learned at this site. Surveys during the 2009 breeding season estimated that 9-12 pairs continue to use Pease during the breeding season. These numbers are close to the overall average number of breeding pairs since monitoring began at this site (Figure 1). Productivity numbers, however, were low and likely reflected the cool and wet conditions that persisted through June. The 2009 monitoring was conducted as part of the research to develop a strategy for reducing the risk of bird strikes while minimizing the impact on the Upland Sandpiper population in NH. This will be accomplished through the analysis of current sandpiper nesting habitat; evaluation of potential nesting habitat away from runways; and collaboration with airfield and land managers to develop a strategy for enhancement and management of suitable alternate nesting sites.

In order to more thoroughly evaluate the nesting habitat at Pease, we conducted a detailed vegetation analysis at all identified nesting and foraging areas. We mapped each identified site using GPS and collected measurements on habitat parameters that included dominant plant species, vegetation height, density, patchiness, topography, and several other variables. This data will be collected again in 2010 and will help to guide habitat management at alternative sites. In addition to looking closely at current nesting sites, other potential habitat in the seacoast region was mapped using the National Land Cover Data habitat types with overlays of grassland, pasture/hay and cultivated land. We generated a list of historic Upland Sandpiper activity in the seacoast region from sources such as New Hampshire Bird Records stored at NH Audubon. These sites were then visited, broadcast surveys for Upland Sandpipers were conducted, and a broad grassland survey was completed at each location. No Upland Sandpiper activity was noted at any of the surveyed sites in 2009 but these visits will be repeated in 2010.

Currently, the site that shows the greatest potential for Upland Sandpiper habitat management is the Great Bay National

Wildlife Refuge. The refuge is contiguous to the airfield and has shown recent Upland Sandpiper activity. In the fall of 2009, Refuge staff mowed a significant acreage of overgrown field habitat and there are plans to do a spring burn in some other areas as well.

This will dramatically improve potential habitat for Upland Sandpipers at this site. Conservation Department biologists are also planning to attempt to attract sandpipers to this site using playback techniques. Playback has been used successfully with a number of species, but as of yet little is known about Upland Sandpiper response. We are hopeful that 2010 will enable us to evaluate this further and look forward to continuing this work in the 2010 field season.

Upland Sandpiper research is partially funded through grant from the Department of Transportation Aeronautics Division.



BECKY SUOMALA AND VANESSA JONES
COLLECTING VEGETATION MEASUREMENTS
AT PEASE TO EVALUATE NESTING HABITAT.
PHOTO BY DIANE DE LUCA.

Powwow Pond Update

by Pamela Hunt

As reported in the previous Conservation Department newsletter, NH Audubon volunteers conducted water bird surveys in the Kingston area during the fall of 2008. The goal was to compare Powwow Pond – recognized by NH Audubon as an Important Bird Area – to several nearby ponds that had never received consistent coverage. The project was initiated in response to a plan to treat Powwow Pond with herbicide to control native vegetation, with unknown effects on the foraging habitat of migratory water birds. The proposed herbicide treatment took place in the summer of 2009, and volunteers repeated their surveys in October and November to see whether birds shifted their use patterns as a result of the herbicide's presumed effects on aquatic vegetation.

The data from 2009 show significantly lower numbers of most species when compared to 2008, including three of the four species for which Powwow Pond appears particularly important: Ring-necked Duck, Ruddy Duck, and Pied-billed Grebe. The fourth species, American Coot, occurred in similar numbers, although the high count was below the long-term average. Although there were fewer ducks and grebes, it is hard to say for sure that their absence was a result of the herbicide treatment. Any number of things can influence where birds decide to stop during migration, and weather conditions in particular likely play a major role. Taking a longer view, the differences between 2008 and 2009 are within the normal range of variation seen at Powwow Pond for the last 15 years. It's also very difficult to draw policy conclusions from only two years of data. Given that the issue of herbicide use on aquatic plants continues, NH Audubon hopes to continue these surveys to see how long-term patterns of water bird use vary among years.

Many thanks to the volunteers who conducted surveys for this project: Terry Bronson, Patience Chamberlin, Len Medlock, Dennis Skillman, and Warren Trested.



84 Silk Farm Rd.
Concord, NH 03301

CHANGE SERVICE REQUESTED

Nonprofit Org.
US Postage
PAID
Permit No. 522
Concord, NH

Peregrine Falcons – A Moving Experience

After eight consecutive years of producing young in a nest box installed on the Brady-Sullivan Tower near the Amoskeag Bridge, Manchester's falcon pair moved one mile down Elm Street to nest on the Citizens Bank building. "We were looking for them in their usual spot, but they weren't there, and the camera showed an empty nest!" said Chris Martin, NH Audubon's raptor specialist, who coordinates the state's Peregrine Falcon management efforts. The female falcon laid her eggs on a narrow decorative ledge at Citizens Bank – right over Elm Street. This



DOW. PHOTO WAS TAKEN FROM A CONFERENCE ROOM WITHIN THE CITIZENS BANK BUILDING BY JOHN DYKE OF CITIZEN'S BANK.

ADULT PEREGRINE FALCON PAIR PERCHED JUST ABOVE THE ORIGINAL NEST SITE – A NARROW LEDGE BETWEEN A DECORATIVE RAILING AND THE WINDOW.

female was raised in a similar window box situation in Worcester, Massachusetts in 2005, so perhaps the Citizens Bank ledge reminded her of her old home. Unfortunately the ledge did not provide room for the young peregrines to spread their wings and exercise their wing muscles before taking flight. "When the chicks were three weeks old, we moved them into a more secure nest box located on the roof," said Martin. After a nervous couple of hours, the adults located the chicks in their new home and all was well. All three chicks ultimately fledged without incident.



THREE DOWNY PEREGRINE FALCON CHICKS, 5/15/09, IN THEIR NEW HOME CUSTOM-BUILT BY NH AUDUBON'S CHRIS MARTIN (ALSO THE PHOTOGRAPHER)

Peregrine Surveys at a Proposed Wind Energy Site

by Carol R. Foss

The Conservation Department collaborated with the Stantec Consulting (Stantec) to investigate potential impacts of a proposed wind energy development in Groton, NH, on breeding Peregrine Falcons. Iberdrola Renewables (Iberdrola), an international energy corporation with a 12-turbine wind farm in Lempster, NH, is preparing an application for development of a wind facility of up to 25 turbines in Groton. Two active Peregrine Falcon aeries, in Hebron and Rumney, are located within five miles of the proposed project, and the NH Fish and Game Department (NHFG) requested that Iberdrola commission a field study to assess

Peregrine activity patterns within the project area as part of the site evaluation process.

The study involved simultaneous observations from four sites on 20 days from June 23 to September 10, 2009. NH Audubon biologists monitored activity in the vicinity of the two Peregrine aeries and Stantec biologists monitored activity in the vicinity of the proposed turbine sites. The report resulting from this study has been delivered to NHFG, and will be submitted as part of Iberdrola's application to the New Hampshire Site Evaluation Committee.