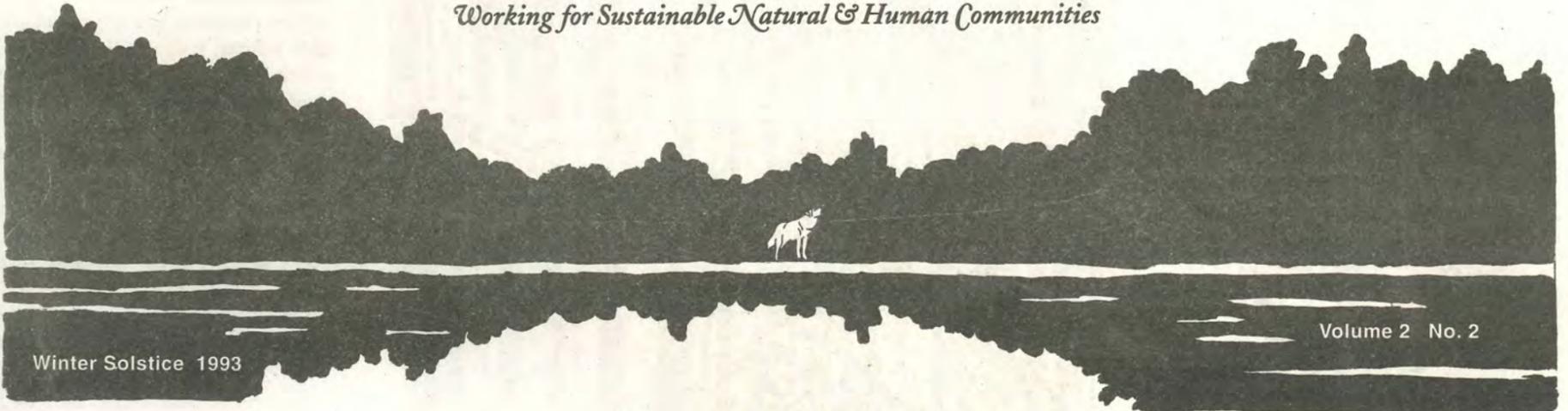


Nonprofit Organization
U.S. Postage
PAID
Lancaster, NH
Permit No. 6

The Northern Forest Forum

Working for Sustainable Natural & Human Communities



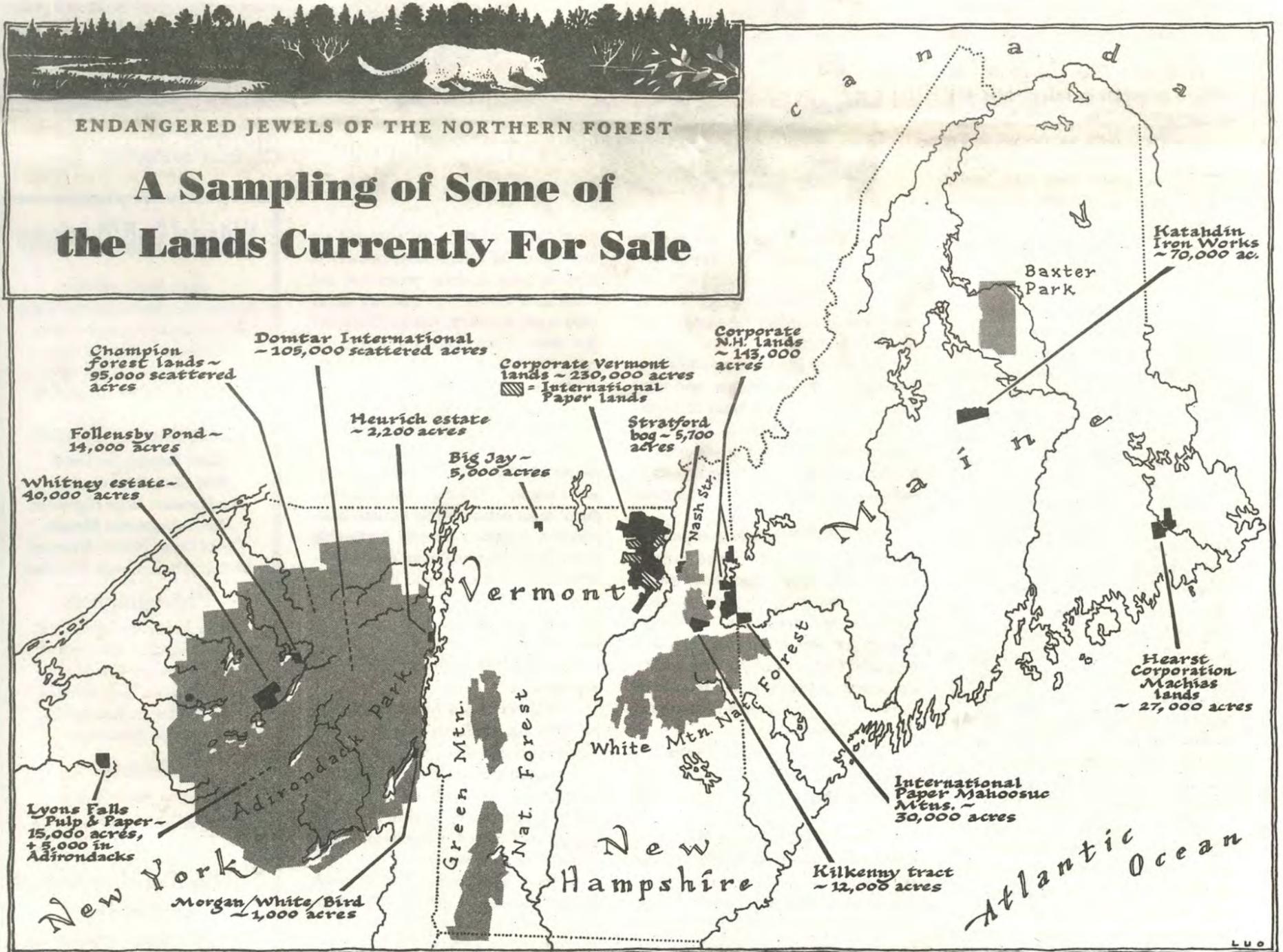
Winter Solstice 1993

Volume 2 No. 2

Land For Sale

Buy Land—Establish a Network of Ecological Reserves

22 Conservation Groups Call for Public Acquisition of 810,000 Acres in Northern Forest from Willing-Sellers



*Inside: *Wolves & Cougars in Maine? *Is the Maine Forest Practices Act Working? *Bad News for Maine's Industrial Forest
*Atlantic Salmon Restoration *Adirondack Wildlife *Clinton 'Compromise' Clearcuts Ancient Forests
*Maine Plans to Export Wood Chips *Growth-At-Any-Cost Economics *Adirondack Hamlets*

Time to Change an Ecologically Unsustainable 'Political Reality'

"It becomes increasingly difficult to say what are practical suggestions, when one's research tends to show that what is politically feasible is usually too minor to make any difference, while changes significant enough to be worthwhile are often unthinkable in practical political terms."

—World Resources Institute

The single most important step we can take to assure the long-term ecological and evolutionary integrity of the Northern Forests is the establishment of large connected ecological reserves that are adequately buffered from anthropogenic disturbances. This requires the acquisition of millions of acres of corporately-owned Northern Forest lands from willing-sellers.

The *Forum* is one of 22 conservation groups calling for the acquisition of "Endangered Jewels of the Northern Forest." We believe the purchase of these 810,000 acres represents a necessary, but not sufficient, step in protecting the natural systems that support life in the Northern Forest region. As we report in this issue, wolves and cougars appear to be returning to Maine independently of human restoration efforts. For viable populations of these two endangered native predators, we will probably need reserves throughout the 26 million acre Northern Forest region that encompass approximately 50 percent of the region and are connected to other large reserves in neighboring regions.

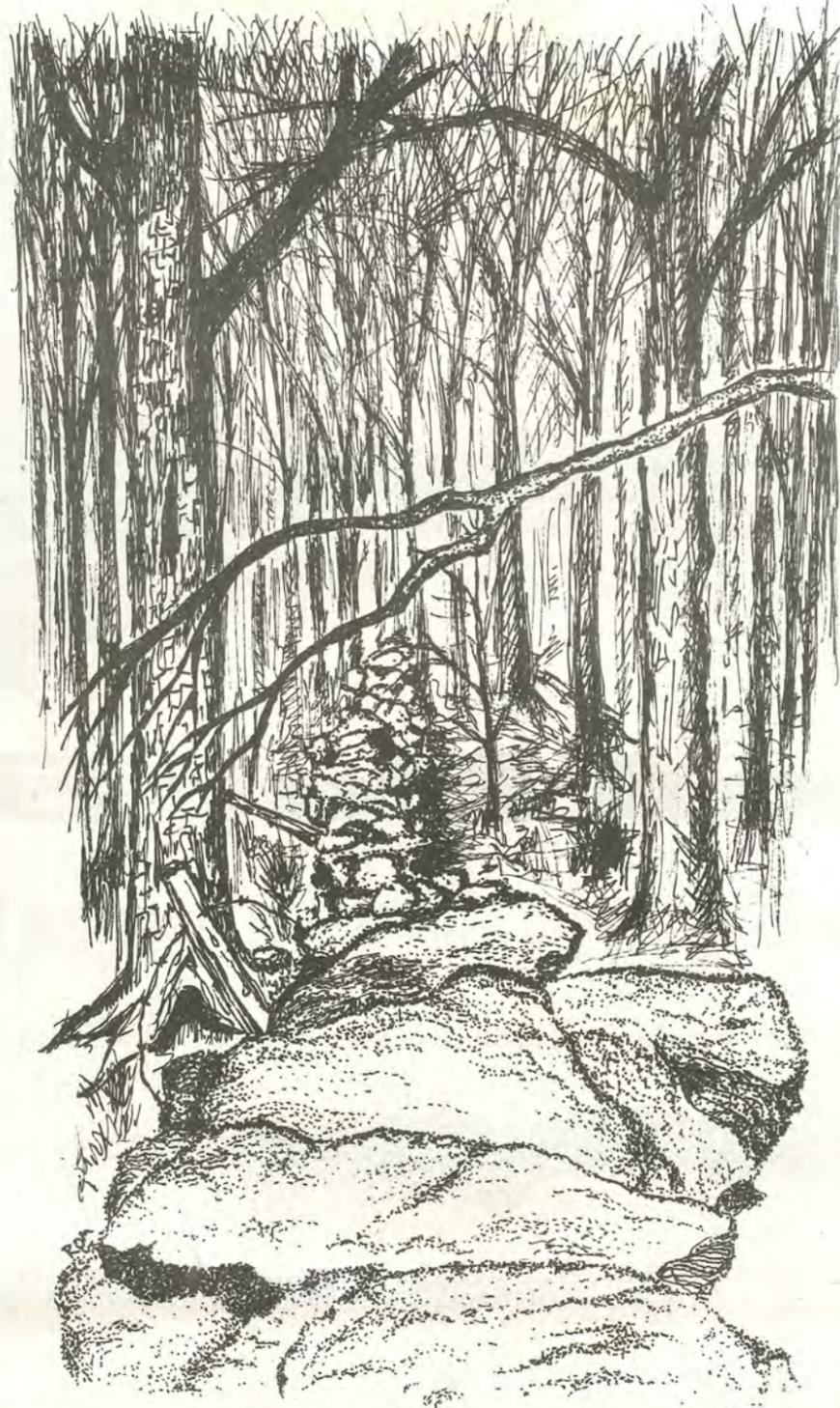
Predictably, the high priests of political pragmatism will dismiss this last statement as "naive" and "politically impossible." They will trot out all the old chestnuts that masquerade as "political wisdom" around these parts. Sadly, such thinking is, in reality, the orthodoxy of the status quo—unexamined assumptions that fail the tests of logic, physical reality, and, ultimately, of political reality itself.

Let us, for a moment, imagine it is New Year's Day 1984. How would our "political pragmatists" view the next ten years? Would any have predicted the downfall of the Communist Party in the USSR? The breaching of the Berlin Wall? The end of Apartheid in South Africa? The handshake between Yasir Arafat and the Prime Minister of Israel?

Would these pragmatists have predicted that public outrage over clearcuts and other abusive practices of industrial forestry would lead to the enactment of stringent forest practices regulations well before the end of the century? Did they predict that the paper industry would redirect its investment strategy to the Southeast, leaving Northern Forest mills significantly less competitive? (If they did foresee this development, why did they not act to shelter the regional economy via diversification, promotion of value-added manufacturing, and the restriction of raw log exports?)

Did the pragmatists predict that millions of acres of absentee corporate and large family holdings would be offered for sale? Or that additional millions of acres would be identified as "non-strategic" to long-term corporate interests?

Did the pragmatists evince an understanding of the global ecological



crisis? Did they recognize that growth-at-any-cost industrial civilization has exceeded the physical limits of Planet Earth, and that the bill has come due for centuries of stealing resources from future generations?

Did these pragmatists show any compassion for the human and non-human victims of these crazy economic policies? hardly. Instead, they used "pragmatism" to defeat or water down all measures designed to address the suffering caused by industrial "pragmatism".

The role of the prophets of political realism is to defend the vested interests of the status quo—regardless of the costs to democracy, economic sustainability, the environment or simple truth. What is practical, in their world-view, is to ignore the limits of physical reality, to subvert democracy, and to corrupt market forces and government regulation to their own ends.

Self-appointed "political realists" who oppose land acquisition for Northern Forest ecological reserves will claim:

**We don't know enough to act now; conservation biology is "unproven theory."* This is a half-truth that is utterly hypocritical. We will never know everything about the ecology of the Northern Forests, but, as Professor Steve Trombulak, Dr. David Publicover, Dr. Reed Noss, and numerous other respected ecologists have often said, we know

more than enough to act now and act decisively. The call for more research is a phony ploy to delay protection and restoration efforts. The industry flacks who want absolute, irrefutable proof that reserves are necessary have never subjected forestry or the paper industry to similar scrutiny. Will they agree to no further logging anywhere in the Northern Forests until independent scientists can prove absolutely and irrefutably that logging benefits ecosystem integrity? Will they insist that their paper mills cease operations until independent scientists provide irrefutable proof that dioxin and other organochlorines benefit human and non-human organisms? Unless industrial advocates are willing to subject their practices to the same scrutiny they demand of protection strategies, they should drop this argument.

**We don't need reserves; private property and industry are protecting biodiversity just fine.* While white-tail deer may concur, neotropical migratory songbirds, salamanders, salmon, wolves, cougars, mycorrhizal fungi, old growth forests, and independent scientists say this is nonsense.

**We can't afford to buy so much land in this age of deficits.* This is an awfully plausible-sounding objection, but only if unexamined in its proper context. This is a favorite argument of the same elements of the timber industry who shamelessly lobby for even

greater subsidies than they currently receive. These folk have shamelessly lobbied the Northern Forest Lands Study and the Northern Forest Lands Council (NFLC) for capital gains, estate tax and further property tax breaks. (While property taxes on small, non-industrial owners who live on their land may be excessive and in need of equitable reform, it is difficult to make a similar case for absentee, billion dollar transnationals that pay 19 cents [\$0.19] per acre in property taxes in the unincorporated townships of Coos County, NH.)

Curiously, these fiscal hypocrites inflate the cost of land acquisition yet ignore the cost to the federal and state treasuries of their favorite tax breaks. If we allocate \$200 million a year for land acquisition in the region, we could purchase 8-10 million acres within ten years! Although the NFLC has thus far failed to tally the cost of rolling back capital gains for timber, work done by economist Spencer Phillips of The Wilderness Society suggests that it would conservatively cost the federal treasury \$200 million a year, probably considerably more.

So there you have it: the champions of industry tax breaks have endorsed the expenditure of hundreds of millions of dollars to assist the struggling Northern Forest region. The choice we tax payers face boils down to: should we begin to secure permanent environmental protection or should we provide further subsidies to an industry that has fought every environmental protection effort, has degraded land, air and water, and has flourished at the expense of the natural and human communities of the region, *Continued on Page 31*

Editorial Staff This Issue

Jamie Sayen—Editor
Andrew Whittaker—Assistant Editor
Mitch Lansky—Assistant Editor
Kit Kuntze—Cover Design
Dawn Styles—Photographs
Mary Stinehour—Circulation

Contributing Writers

Claire Barnett, Jim Britell,
John Clark, Steve Gorman,
Tim Hermach, Helga Hoffmann,
Ron Huber, Martin Manjak,
David Orton, Natalie Springuel,
Michael Wilson, George Wuerthner

Photographers

Nancie Battaglia, David Carle,
Linda Champagne, Elizabeth Feryl,
Steve Gorman, Garth Lenz,
Alex MacLean, John McKeith,
Bill Silliker, Jr., Joni Soffron,
Joseph Spaulding

Artists

Jon Luoma, Rachel O'Meara,
Suzy Restino, David Utterback

The Northern Forest Forum is
published by
The Northern Appalachian
Restoration Project
of Earth Island Institute

Chlorine-Free Paper—Price is Higher but Costs are Lower

The *Forum* has just purchased a new shipment of chlorine-free paper from Cross Point that contains 20 percent post-consumer recycled fiber. Regular issues of the *Forum* use chlorine-free paper for the cover and the centerfold. The remainder of the issue is printed on unbleached newsprint that is approximately 20 percent recycled.

Chlorine-free paper is very expensive. In fact, we probably are paying twice the price we would pay for similar paper that is bleached with chlorine gas or chlorine dioxide.

For an outfit with the limited resources of the *Forum*, it is not easy to pay so much more for paper. But, when I received the latest bill for the chlorine-free paper, I reminded myself that if the price we have to pay is more, the cost to natural ecosystems and to human society is far less. No dioxins, furans or hundreds of other highly toxic organochlorines were discharged by a paper mill during the chlorine-free paper-making process. While we do not pretend that our chlorine-free paper is harmless to the environment, it is dramatically less harmful to fish, lobsters, fishermen, and nursing mothers.

Dioxins and other organochlorines damage human immune and reproductive systems and increase the risk of cancer. While the paper companies reap billions of dollars in subsidized profits through sales of bleached paper, they pass along the costs of damaged ecosystems and human health to society. If the paper companies were required to pay the true costs of chlorine bleaching—if society removed the current subsidy that allows them to pass these reprehensible costs along to the public—they could not manufacture chlorine-bleached paper profitably and would convert to chlorine-free processes almost overnight. (See Andrew Whittaker's important essay on pages 22-23.)

As consumers, we must insist on chlorine-free paper that contains a high percentage of genuinely post-consumer

recycled paper. (Note: recycled paper will contain chlorine residue because it was initially bleached with a chlorine process. Recycled chlorine-free paper means that no chlorine was used in the recycled phase of papermaking.)

We must boycott chlorine-bleached products. We must insist that state and federal governments purchase only chlorine-free paper. Unfortunately, when the timid Clinton White House floated a proposal to do just that, Maine's Senator George Mitchell, the powerful Majority Leader, disgraced himself and subverted efforts to convert Maine's paper mills to chlorine-free production. At the bidding of his campaign's financial supporters in the paper industry, Mitchell persuaded the White House to squelch the chlorine-free ini-

tiative. The irony is that although Senator Mitchell earned his campaign contributions by faithfully doing the paper industry's dirty work, he actually hurt the long-term best interests of the Maine paper mills that are finding it increasingly more difficult to compete with the more modern, more productive mills in the southeast United States (a southern Mill can produce in four hours what it takes a Maine mill six or seven hours to produce).

Our chlorine-free campaign is producing results as the following letter from a reader attests: "You may recall that I wrote to you some months ago to inform you that the company I work for had switched to chlorine-free, recycled paper products in their cafeterias. This decision resulted from a campaign I

undertook to get the company to examine its paper usage and purchasing policies. Using information from the *Forum* regarding dioxin contamination, I convinced the head of the Food Service division to make this switch. Subsequently, I undertook additional research and wrote a report urging the company to convert to a chlorine-free paper for its standard copying and printing stock. I'm happy to report that we have ordered our paper supplier to only provide paper from Union Camp, a manufacturer that has invested heavily in an ozone bleaching process and is using up to 20% recycled fiber in its paper stock."

A while back, Bowater lamented to its shareholders that it was losing out on European markets that were demanding chlorine-free paper, which it could not provide. When one reads such a statement, one wonders if the left hand of the paper industry knows what the right hand is doing. If European markets are inaccessible, if Maine mills are at a competitive disadvantage with Southeastern mills, and if demands for chlorine-free paper are certain to skyrocket as the EPA, at long last, cracks down on dioxin and the public learns just how costly the under-priced chlorine-bleached paper is, what should this tell the Maine paper mills and their friendly Senator Mitchell?

Chlorine-free paper makes economic sense!

Besides, ecologically and ethically, it is the decent thing to do.

—Jamie Sayen



Endangered Bald Eagles are being poisoned by dioxin and other organochlorines in the tissues of the fish they eat in Maine and New Hampshire rivers. Photo by Bill Silliker, Jr.

For more information on chlorine-free paper, contact

Archie Beaton
Chlorine Free Products Association
102 North Hubbard
Algonquin, IL 60102
Phone (fax): 708 658-6104

Newfoundland Cod Fisheries Collapse, Over-Population & Economic Growth-at-any-Cost

Especially in times of stubborn economic downturn such as now, we keep hearing the litany that "jobs come first"; "environment is a luxury" (sic!); and most importantly, "environmentalists exaggerate the dangers to serve their own ends; nothing really bad will happen anyway". (This has long been what I characterize as the Neanderthal editorial-page policy—not the hard news sections—of the *Wall Street*

Journal, for example.)

Living, as we do, in northern New England, within range of Canadian news media, and reading and hearing the Newfoundland fishery story constantly, I'd say we have an excellent, if deeply tragic, example of a true, unexaggerated contemporary 1993 environmental disaster right off the Northern Forest doorstep. John Crosbie, of Newfoundland, the last national Fisheries Minister in the late Mulroney Government, has called the cod collapse "Not just an environmental problem, but a major social and economic problem." A CBC-Radio report in November put it in even harder terms, ones which any Gloucester or New Bedford fisherman would recognize instantly: A Canadian Government research vessel, dragging through the now-closed grounds off Newfoundland, an area that for five hundred years has been among the richest fishing grounds on earth reported: "In five tows [we] took twenty fish [small cod]." (Note, that's not "bushels," or "pens," or "barrels," or "hundreds," that's just *twenty individual small fish*, from an area that for years has helped feed Europe and

North America.) "You have to be out there to see it; it's barren," said one fisheries scientist. Even with the current Canadian ban, there is no consensus at all on when the cod stocks will return, if ever.

At about the same time this news was breaking, media attention on world population issues referred to some "pro-growth experts" (i.e. "more human population growth eventually results in higher GNP's") who see "gross exaggeration[s] by biologists and environmentalists" (in the latter's deep concerns about the assaults on earth's carrying capacity in the wake of ever-expanding population). "Science and technology will come to the rescue....," according to quotes from these growth-optimists.

While I'd leave any direct connection between the Newfoundland cod collapse and burgeoning human population growth worldwide to experts, a quote from a Prof. Mann of UMass, Amherst is most haunting: "Whether [due to human population pressure] the extinction of various species will matter in practical human terms..." Let's just ask Newfoundlanders (many of whom

tried to warn their government of the impending collapse) if environmental conservation issues "matter" to humans. They now have the bitter answer. And, in our own country, let's all give thanks to President Clinton for restoring federal funds for population control programs, funds which George Bush, to his shame, for his own political ends, willfully eliminated.

Bren Whittaker
Brunswick, VT

Editorial Policy

The *Northern Forest Forum* is an independent journal covering issues of importance to the Northern Appalachians (including the Adirondacks and Tug Hill regions of New York). Signed articles reflect the views only of the writer, and do not necessarily reflect the views of the editors or any other groups or individuals associated with the *Forum*. The *Forum* will publish articles that stimulate the search for sustainable natural and human communities in the region.

If possible, please submit articles on Macintosh-compatible disc. Send articles to: *Forum*, POB 52, Groveton, NH 03582.

ABIGAIL AVERY IN MEMORIAM

As we were going to press, we learned of the death of our beloved friend, long-time Sierra Club activist, Abigail Avery.

Abby was a loyal and devoted friend of the Northern Forests whose generosity and encouragement gave many of us our start. She always sought ways to defend the ecological integrity of the forests without polarizing the situation.

As we enter 1994, we must redouble our efforts to compensate for Abby's absence.

Thanks Abby. We miss you.

22 Northern Forest Conservation Groups Call for Public Acquisition of 810,000 Acres

A 1994 NEW YEAR'S RESOLUTION

"Endangered Jewels of the Northern Forest" A Willing-Seller Land Protection Program

This is the third annual New Year's Resolution for the Northern Forest endorsed by the conservation groups listed on the cover. Each year, the report has been edited and printed by David J. Miller, Northeast Regional office of the National Audubon Society, 1789 Western Ave., Albany, NY 12203-4601. Special thanks goes to the REI Conservation Fund whose donation enabled this year's report to include photographs of several of the natural resource jewels of the Great Northern Forest.

The Northern Forest region faces tremendous forces of change. Changing dynamics in the forest products industry, increases in land speculation and subdivision and increasingly intensified harvesting practices have the potential to fundamentally alter the character of the Great Northern Forest. Today, hundreds of thousands of acres in the Northern Forest are for sale. The threats these "fire sale" circumstances pose to the ecological integrity of these lands is only dampened by the on-going economic recession of the Northeast.

The Northern Forest Area does not have significant region-wide programs to purchase and protect these lands. Some states have modest land protection funds, but not enough to meet the needs. The only source of federal funds to the region is an impoverished Land and Water Conservation Fund and a woefully underfunded Forest Legacy program.

The sponsoring organizations of this report hope that by highlighting these significant tracts of land worthy of protection for future generations, greater public attention will be drawn to the urgency for public funding and action. These landowners want to sell—if only we were prepared to buy. Our unified call for protection of these lands is a New Year's Resolution for all generations and for all of the new years to come.

As important lands are put on the market by willing-sellers and large private corporations are reconsidering the fate of their lands, the federally funded Northern Forest Lands Council is preparing to issue its public policy report to Congress. The 1994 Northern Forest Lands Council report and recommendations to Congress provide a unique opportunity to promote funding for these natural resource jewels of the Great Northern Forest while providing a sustainable future to its industries and local communities.

Conservationists engaged in protecting ecologically significant areas recognize that the Northern Forest Lands Council must take a comprehensive approach to the ecological, social and economic needs of the region. To accomplish this broad objective, a strategy of wildland reserves, sustainable forestry and strong local economies must be pursued. A wildland system will assist in protecting the ecological integrity of the region and its wondrous wildlife resources including the critical breeding habitats for over 100 migratory songbirds. The creation of a system of wildland reserves in the Great Northern Forest by increasing appropriations to the Federal Land and Water Conservation Fund and Forest Legacy Program with state/federal funding partnerships will address the

needs of many of the natural resource jewels in this report. A well-managed forestry system for the Great Northern Forest with appropriate tax incentives can help ensure that forest practices are ecologically and economically sound. Strong local economies coupled with sustainable forestry will not only provide for the people of the Northern Forest but also, in doing so, play a significant role in protecting the special places listed in this report.

For the past several years, our organizations called upon our federal and state government leaders to establish land acquisition and conservation easement funds to protect large tracts of critical lands for-sale, or projected for-sale, in the near future. Some of these lands, like the Raquette River Tract in the Adirondacks, have been protected, while others have changed ownership. Land acquisition from willing-sellers for public good remains the most successful conservation tradition in America since the days of President Theodore Roosevelt. Today, this conservation tool is augmented with the innovative use of conservation easements, which enable land-owners to keep land in forest production and/or agricultural use through a private/public partnership. Protection of these lands for sustainable economic uses can greatly assist local economies while protecting the region's natural resources. The Northern Forest Lands Council must recognize that these natural resource wonders provide the cornerstone to the ecological and economic spirit of the region.

However, the lands listed represent only a snapshot of the large private lands which will be on the open-market this decade. The region's multinational corporations are faced with serious long-term economic decisions regarding their land holdings. Certain large land purchases have been transacted from one forest company to another with the goal of remaining in forest production, as in the Maine Bowater case. However, international competition and the growing

interest of the real estate industry have brought new pressures to the region. Today's market has forced companies to separate their holdings into strategic and non-strategic categories. Companies like Champion International have admitted that it will be difficult to hold on to hundreds of thousands of acres of non-strategic lands in today's economic climate. These lands could end up in the hands of real estate speculators instead of being protected by public acquisition and restoration programs or allowed to continue sustainable forestry through the use of conservation easements. The challenge is before us, and now is the time to act.

The lands listed represent only a snapshot of the large private lands which will be on the open-market this decade.

The Northern Forest Lands Council acknowledges the purchase of interests in land from willing-sellers as a tool to protect critical sites. In 1990, the four-state Governor's Task Force of the Northern Forest Lands Study recommended an annual federal appropriation to the states of \$25 million for land acquisition for each of the following four years. But the Task Force recommendation went unheeded, and the number of parcels on the market, as well as the costs to permanently protect them, is growing.

The people of the region, and all those who value the Great Northern Forest must not continue to ignore the opportunity to conserve several significant land parcels in the region. There is an on-going need for better statewide and regional planning so agencies can anticipate when lands are to be put on the open-market,

Endangered Jewels of the Northern Forest

Large Tracts of Land now, or suspected soon to be offered, for sale or easement in the Northern Forest Region from Willing Sellers

<u>Property</u>	<u>Location</u>	<u>Acres</u>	<u>Status</u>
Heurich Estate	Adirondacks	2,200	Pending Sale to State
Whitney Tract	Adirondacks	50,000	Fate Unknown
Follensby Pond	Adirondacks	14,000	Fate Unknown
Morgan/White/Bird	Adirondacks	1,000	Pending Sale to State
Lyons Falls Pulp and Paper	Adirondacks/Tug Hill	20,000	Fate Unknown
Champion Non-Strat.Lands	Adirondacks	95,000*	Fate Unknown
Domtar International	Adirondacks	105,000*	Easement Offered
International Paper Lands	Vermont	30,000	For Sale
Large Corp. Lands Holdings	Vermont	200,000*	Fate Unknown
Big Jay	Vermont	5,000	Fate Unknown
NH Corp. Lands	New Hampshire	143,000*	Fate Unknown
Stratford Bog	New Hampshire	5,700	Easement Pending
Kilkenny Tract	New Hampshire	12,000	Sold to Timber Group
Katahdin Iron Works	Maine	70,000	Sold to Timber Group
Intl. Paper Mahoosuc Mtns.	Maine	30,000	For Sale
Hearst Corp. Machias Lands	Maine	27,000	Fate Unknown

ESTIMATED TOTAL ACREAGE AT RISK 809,900

ACREAGE SAVED IN 1993 20,000**

* Approximate New England and New York Corporate Holdings currently or suspected to be offered for sale or easement in the future.

** This represents the International Paper Raquette River Tract in the Adirondacks.

rather than today's more reactive approach. In the long run, conservation of the ecological and economic integrity of the Northern Forest will require a mix of economic incentives for private landowners; sensible and fair land use regulations; and public acquisition of key lands. The latter will not be a reality for many of the jewels in the Great Northern Forest unless the federal government reverses its present trend of reduced funding for willing-seller acquisition programs.

The following sections outline today's concerns for large tracts of forestland in the Great Northern Forest. While there is cause for celebration with the donation of the Raquette River Tract in the Adirondacks, most of the lands we have listed for the past three years are no closer to protection and stewardship. With the list of lands available for acquisition and easements growing, our hope is that our united call for action will ensure an investment of public dollars before it is too late.

Adirondacks

In the Adirondack Park, there are several large tracts of land with willing-sellers who are open to the possibility of state acquisition of fee titles or easements. Key tracts have been identified by numerous public and private reports in the past several years. Last year, Champion International identified 95,000 acres of non-strategic forest lands which they may put on the market in the future. More recently, Domtar International announced its desire to sell conservation easements on all 105,000 acres of its Adirondack lands. The landowners of these jewels and other potential acquisition/restoration sites in the Adirondacks have had discussions on the protection of their lands at some governmental levels, and many of the parcels are highlighted in New York State's Open Space Plan. In July of 1993, New York State passed the Environmental Protection Fund, which provides funds for land acquisition and conservation easements. However, further matching dollars from the federal government is needed if all of these jewels are to be saved.

International Paper Company's Raquette River Tract

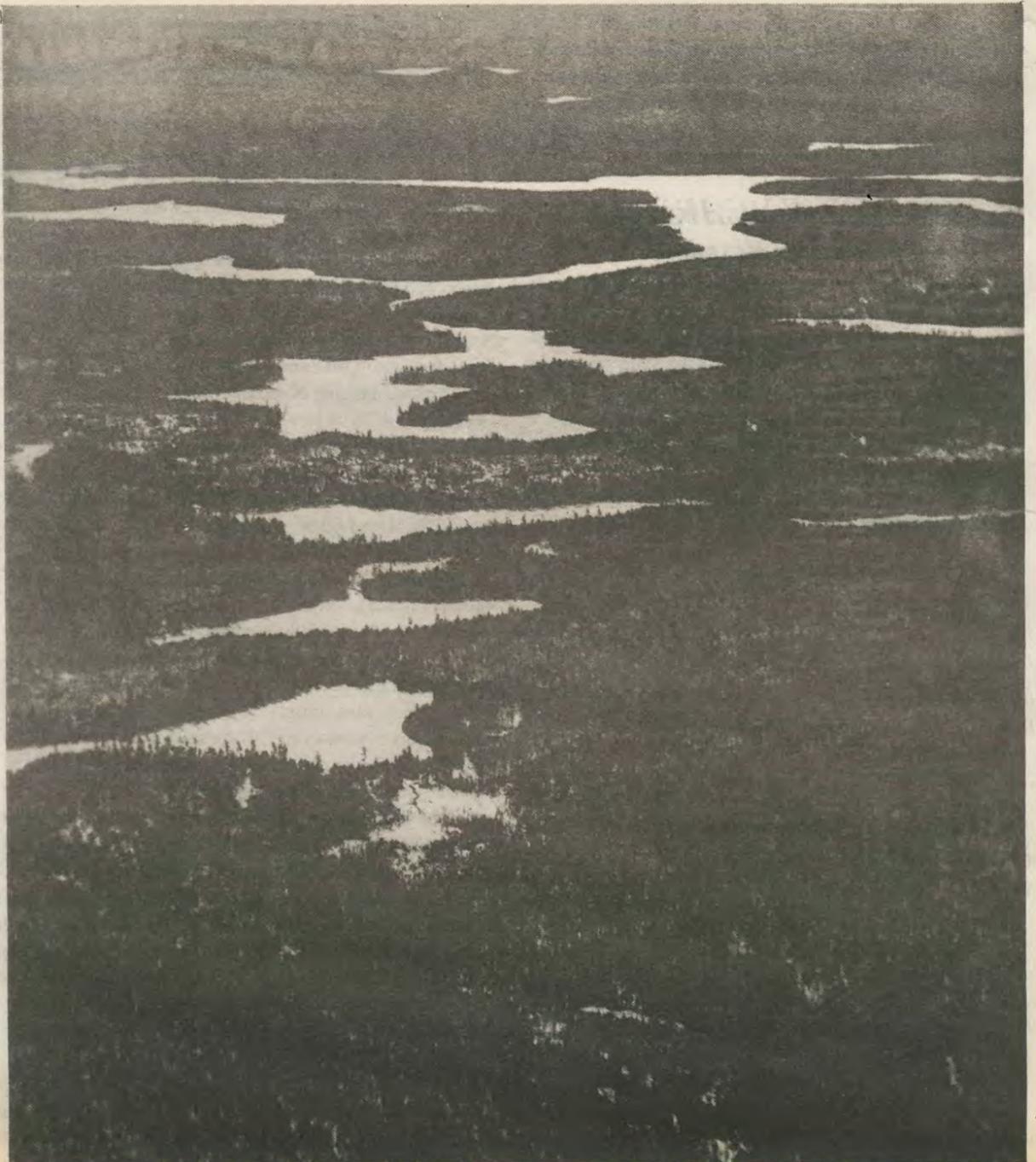
Saved: The Raquette River Tract saved by donation a year ago consists of approximately 20,000 acres of low-elevation boreal bogs, spruce flats, swamps, mixed coniferous forests, and hardwood hills in the northwestern Adirondacks. Eleven miles of the Raquette River, including 22 miles of shoreline, lie in

The over 800,000 acres of prime forest land listed will never be more affordable and can be protected today through easements and fee acquisitions. During the next decade, several hundred million dollars will need to be earmarked as other large parcels are put on the market by willing-sellers. Indeed, the costs to the nation if they are lost to subdivision and developments are inestimable.

the southwestern corner of the tract and form the connecting link between Tupper Lake and Carry Falls Reservoir, a popular historic canoe route. The Raquette is classified as a scenic river in the state's Wild, Scenic and Recreational Rivers System. Protection of this tract was provided for by a private donation of the land by International Paper to the non-profit Conservation Fund. A jewel has been saved for future generations to enjoy.

Heurich Estate

Pending Sale to State: A pristine area on the shore of Lake Champlain. This tract provides wildlife and recreational opportunities. It is scheduled to be one of the first Adirondack projects under the new State Protection Fund. The property includes three miles of shoreline and encompasses 2,200 acres of land. This scenic parcel is currently held by the Open Space Institute in anticipation of its sale to the state.



Whitney Estate: Some of the 40 lakes and ponds on the 50,000-acre Whitney Tract. Photo by Nancie Battaglia

Whitney Estate

Fate Unknown: A true gem of 50,000 acres in the central Adirondacks. This property would be the cornerstone for the creation of a new wildland reserve in the Adirondacks, which has been named by many as the proposed Oswegatchie Wilderness. Without federal matching dollars, we may not have enough to save this magnificent jewel.

Follensby Pond

Fate Unknown: The owner of this 14,000 acre tract has shown interest in selling the property to the state and extended the state's option through 1994. One of the largest, undeveloped, privately-owned waterbodies in the Adirondacks, Follensby Pond would be a logical adjunct to the popular Raquette River canoe route between Long Lake and Tupper Lake. Follensby Pond, known in history as the wilderness setting for the famous 1858 philosophers' camp of Ralph Waldo Emerson and other Boston luminaries, should be a top priority of the state's new Environmental Protection Fund.

The Morgan/White/Bird Properties on Lake George

Pending Sale to State: These holdings include three miles of shoreline on northern Lake George, the

last significant stretch of undisturbed private land on this "Queen of American Lakes." While the southern end of Lake George has been transformed by development, the northern basin can still be saved if this wild shoreline can be preserved in its natural state. The Morgan portion of the holding, including a mile of pristine lakefront, is being held by the Nature Conservancy with hopes of purchase by New York State with the newly enacted Environmental Protection Fund.

Lyons Falls Pulp and Paper Lands

Fate Unknown: This large tract of industrial timberland put on the market last year consisted of 15,000 acres of pristine forest on the headwaters of the Salmon River in the Tug Hill Region and 5,000 acres on the headwaters of the Moose River in the Adirondacks. These areas are noted for their migratory bird habitat. Later in 1993, these lands were taken off the market when working capital loans were received. The long term fate of the property is unknown.

Northern Vermont & Green Mountains

The Vermont portion of the Northern Forest has the lowest proportion of large, contiguous tracts of public or private land. This has made it critical to protect the integrity of existing large tracts of private land, and to consolidate public ownership in already authorized public land units.

Northeast Kingdom International Paper Land

For Sale: This tract includes 30,000 acres of forestland adjacent to Cow Mountain Pond Forest Legacy Project in Granby and also adjacent to

Brighton Municipal Forest and Willoughby State Forest in Vermont. The property includes McConnell Pond and the headwaters of Granby Stream. International Paper recently put these 30,000 acres on the market. They could be considered part of a wildland strategy for the Northeast Kingdom.

Other Corporate Holdings in the Northeast Kingdom

Fate Unknown: In addition to International Paper, there are several other large corporate holdings in Vermont's Northeast Kingdom, which is the most remote and undeveloped portion of the state corporate timberlands, including Champion and Hancock Timber Resource Group. Approximately 200,000 acres could be on the market before the turn of the century. Opportunities to purchase key tracts of these lands may be forthcoming, thus protecting the public values of the Northeast Kingdom.

Big Jay

Fate Unknown: A mountain-top habitat in Northern Vermont which should be protected for generations to come. Currently, efforts are underway to secure public dollars to ensure that Big Jay is protected permanently as public open space. This 5,000+ acre parcel represents the highest-elevation, undeveloped, privately-owned mountain peak in Vermont and is home to a section of Vermont's Long Trail. Protection of Big Jay will provide a haven for wildlife and hikers for many generations to come.



Big Jay. Photo by John McKeith

Northern New Hampshire

The northernmost portion of New Hampshire is dominated by a half-million acres of timberland owned by giant, transnational, forest-products companies. Now, these lands are threatened by major changes in the forest-products industry. Below are important ownerships which represent endangered jewels of New Hampshire's Northern Forest.

The James River Lands

Fate Unknown: Stretching from Wentworth's Location to Whitefield, James River Timber Corporation, a subsidiary of Richmond, Virginia-based James River Corporation, manages some 80,000 acres of forest land in New Hampshire's Coos County. The James River Corporation owns a significant percentage of the holding company, Diamond Occidental Forest Industries, which owns these lands. In 1993, an additional 63,000 acres of forestland was sold by the holding company to Hancock Timber Resources Group.

These properties combined contain numerous outstanding lakes, streams, and wetlands. They are impor-

The Great Northern Forest Region needs policies that promote Protection, Public and Private Ownership and the Preservation of Public Values through programs for Wildland Reserves, Sustainable Forestry, and Strong Local Economies

tant to the public—and to local people in particular—as backcountry where one can not only work for the forest products industry, but also find solitude for hiking, hunting, snowmobiling, camping, fishing and a variety of other recreational pursuits. These lands include some 7,900 acres within the boundaries of the new Lake Umbagog National Wildlife Refuge, approximately 5,000 acres of in holdings in the White Mountain National Forest, and much of the western slope of the scenic Mahoosuc Range, which was originally included in the White Mountain National Forest boundary. In addition, the lands about the Appalachian Trail.

Hancock Timber Resources Group and James River Corporation have not ruled out exploring the possibility of selling conservation easements or fee title on some of these lands in the future. An estimated 143,000 acres of corporate land could be in question. If these companies decide to sell certain lands, public acquisition of some or all of these lands for addition to the White Mountain National Forest, or other federal or state land units, would ensure lasting protection and provide for the full range of land uses. A wildland reserve could be created with certain parcels linked with lands on the market across the Maine border.

Kilkenny Tract

Sold to Timber Group: This 12,000 acre tract in Randolph, New Hampshire, links two important regions of the White Mountain National Forest: The Presidential Range and the Kilkenny Range. The Kilkenny tract was recently purchased from Diamond Occidental Forest Industries, Inc., a partially owned subsidiary of James River, Inc., by John Hancock Timber Resources Group, a division of John Hancock Financial Services, Inc., an investment firm with long-term forest-management objectives.

Encompassing the Crescent Range, this tract contains over 70 miles of trails maintained by the Randolph Mountain Club. Pond of Safety, a high elevation pond, lies in the center of the tract. This Revolutionary War historic site is home to brook trout and a focus for other wildlife. Black bear, moose and fish abound in the region, the habitat is ideal for the pine martin, and has the potential for lynx. Timber harvests have occurred repeatedly in the past and, under careful management, the area will continue to provide quality forest products in the future. Acquisition and/or conservation easements are in order to protect the public value of this land.

Pondicherry

Sold to Timber Group: Nestled in Jefferson Meadow, New Hampshire, Little Cherry Pond and Cherry Pond form a unique natural area that is listed as a national natural landmark. The two shallow ponds and surrounding marsh, bog and forest are home to a wide variety of songbirds, waterfowl, mammals and amphibians. A total of 173 species of birds have been recorded in the area and include 48 species of resident and migratory waterfowl. Great blue herons have recently established a rookery, and loons nest on Cherry Pond.

The ponds are managed by the New Hampshire Department of Fish and Game. The Audubon Society of New Hampshire owns the Pondicherry Wildlife Refuge which consists of the land immediately surrounding the ponds. While the ponds and immediate shoreline are protected from development, the wide array of wildlife habitat and associated wetlands and streams that make this area unique is subject to the needs of private timberland investors. Ownership recently transferred to John Hancock Timber Resources Group, a division of John Hancock Financial Services, Inc. and an opportunity exists to unite the protected areas around Little Cherry Pond and Cherry Pond with the broader diverse habitat in the valley and make the Pondicherry region a true refuge for wildlife. Acquisition and/or easement tools need to be explored.

The Maine Woods

Maine has the largest share of the Northern Forest (58%) and the lowest proportion of public ownership in the Northeast (5%). Several tracts in the Maine Woods that represent some of the best and most vulnerable wild lands left in Maine, are currently at risk and their future is unknown.

Katahdin Iron Works

Sold to Timber Group: This area encompasses numerous remote ponds and mountain peaks, miles of undeveloped river and stream shoreland, and nearly the entire watershed of the West Branch Pleasant River above Silver Lake. It borders the Hermitage, an old-growth pine stand owned by The Nature Conservancy; the Gulf Hagas, a registered national landmark; and the Appalachian Trail, which bisects the property just southwest of the Nahmakanta township which was purchased by public conservation agencies several years ago.

Stratford Bog

Easement Pending: This 5,900 acre tract was part of the land that was sold to real estate speculator Claude Rancourt in the 1988 Diamond International sale. On the east, it abuts the publicly-owned 41,000 acre Nash Stream Forest; on the west, it is adjacent to 1,200 privately-owned acres under conservation easement. All of these lands are less than 10 miles from the White Mountain National Forest.

Stratford Bog has outstanding public value, including wildlife habitat, productive forests and opportunities for outdoor recreation. Owner Raymond Hartshorn is negotiating the sale of a conservation easement with the State of New Hampshire and the U.S. Forest Service, under the Forest Legacy Program. At present, he intends to retain 200 acres for development. In the past year, Mr. Hartshorn has conducted heavy logging operations on this tract including a three-quarter mile long clear-cut for a proposed airplane landing strip. He has also constructed a new road into the bog.

These negotiations are only possible because Congress heeded earlier calls for continued funding of the Forest Legacy Program. There is no other apparent way to protect this strategically located parcel. Now that Congress has done its part, we can only hope for a successful conclusion by the responsible agencies.

Of the approximately 70,000 acres in the Katahdin Iron Works Area, 32,000 acres were sold by James River Corporation/Diamond Occidental Forest, Inc. in 1993 to Hancock Timber Resource Group. Hancock Timber Resources Group is open to future public acquisition or conservation easement strategies. Abutting parcels are owned by Champion International Corporation, which has indicated some interest in selling their land in the area.

The Katahdin Iron Works lands should be protected for the full array of advantages for public value. Public ownership along the Appalachian Trail could be expanded, and, in the short term, sensitive areas (shorelands, ridgetops, deer yards, endangered plant sites, etc.) could be protected through full-fee ownership or conservation easements held by public agencies. In the long term, full-fee public acquisition from willing-sellers of all of the KI lands would give the strongest assurance for safeguarding the public value of the area.

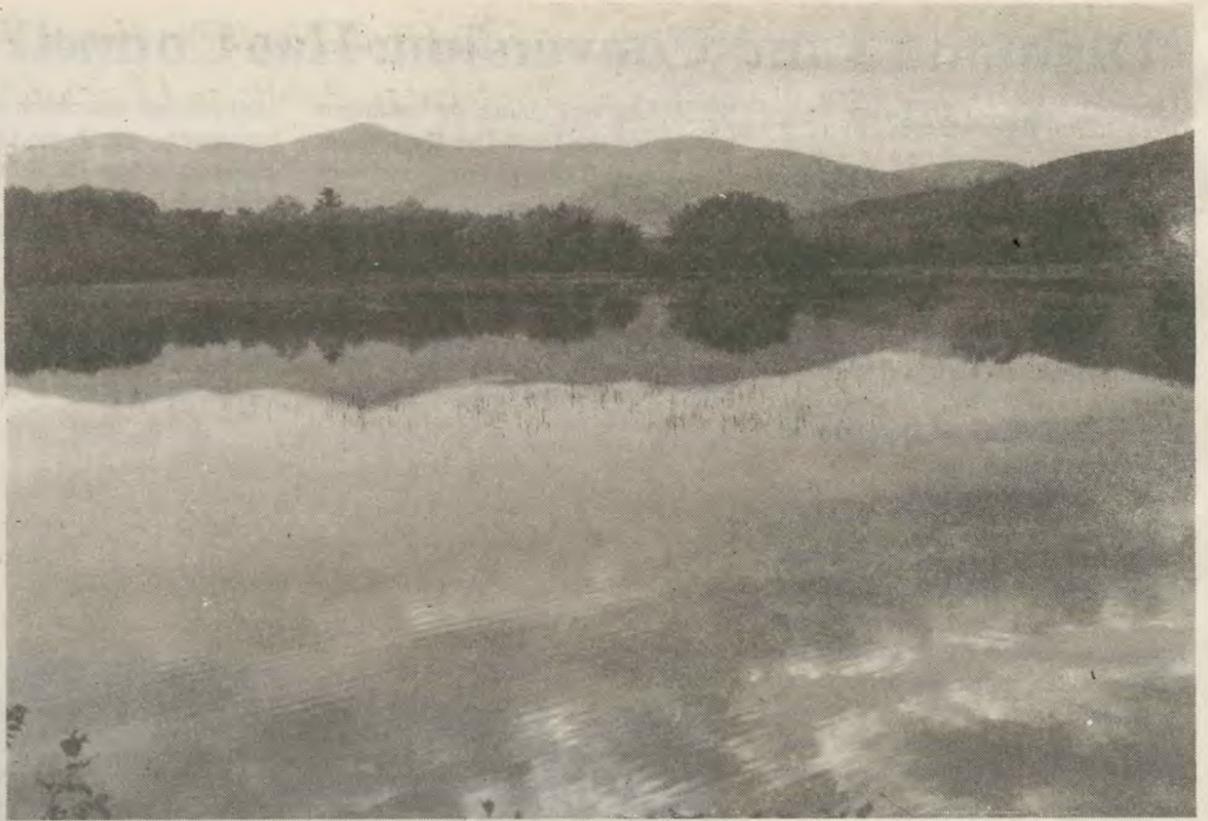
Mahoosuc Mountains

For Sale: During the summer of 1993, International Paper Company (IP) quietly put 30,833 acres of forestland in Maine near the New Hampshire border on the market for \$7.9 million. The property encompasses four parcels, ranging from a hundred acres to more than 15,240 acres, including some of the wildest stretches within the viewshed of the Appalachian National Scenic Trail. The Mahoosucs have long been deemed to be a high priority area for public land protection. Nearby, there is already a mix of state (public reserve, state park) and federal (national forest, Appalachian Trail, National Wildlife Refuge) lands.

Some of the most spectacular of the IP lands are directly threatened by development. One of the largest ski resorts in the Northeast has proposed to buy over a thousand acres to build a lake, to expand alpine skiing trails and equipment, and to construct a lodge, hotel, village and other commercial and residential facilities in this area. The IP lands sale presents an extraordinary opportunity to permanently protect key wildlife and forest habitat in western Maine and connect them with a potential wildland reserve across the New Hampshire border to the west and with the White Mountain National Forest to the South.

Hearst Corporation's Machias Lands

Fate Unknown: This large tract owned by Hearst Corporation includes 27,000 acres of land in Wesley and T25 Township, Maine including the Machias River, Little Mopang Stream, and Old Stream. Hearst Corporation has sold most of its Maine holdings over the last several years and this unique property is their only remaining holding in the state. The Machias is one of Maine's most important recreational rivers for canoeing, kayaking and rafting. It is also one of



Katahdin Iron Works Valley from Silver Lake to the northern Boundary Mountains. Photo by Joseph Spaulding

Maine's few natural salmon breeding rivers. The 27,000 acres include the immediate watershed of all three rivers and is currently undeveloped. The state of Maine is interested in acquiring the parcel but stymied by the purchase price. Acquisition funds would ensure the protection of this jewel of the Maine Woods.

Conclusion

The cost of protecting these jewels is in the range of 75 to 100 million dollars, based on the average market price across the region. The cost at this time can only be a range with a distribution of title fee acquisition and conservation easements still to be determined. The over 800,000 acres of prime forest land listed will never be more affordable and can be protected today through easements and fee acquisitions. During the next decade, several hundred million dollars will need to be earmarked as other large parcels are put on the market by willing-sellers. Indeed, the costs to the nation if they are lost to subdivision and developments are inestimable. These costs will also be a major burden to local communities. A movement to revise federal Land and Water Conservation Fund priorities and further develop new funding mechanisms such as the Forest Legacy Program offer an unprecedented opportunity to purchase these valuable lands at affordable prices.

Without leadership from our state houses and

Congress, these hopes for the New Year will turn into development nightmares with new condominium complexes and other developments changing the character and, in most cases, the traditional uses of the region. These lands provide examples of the endangered natural resource jewels of our Northern Forest and point out the need for our resolution to state and federal governments to provide land-protection funding. These jewels will be lost or preserved by our action today, and the outcome, good or bad, will be a permanent legacy for generations to come.

22 Conservation Groups Support Public Acquisition

The following 22 conservation groups urge citizens from across the region to join with us to protect these and other jewels through this Northern Forest New Year's Resolution:

- *The Adirondack Council
- *Adirondack Mountain Club
- *Appalachian Mountain Club
- *Appalachian Trail Conference
- *Association for the Protection of the Adirondacks
- *Audubon Society of New Hampshire
- *The Conservation Law Foundation
- *Environmental Air Force
- *Environmental Planning Lobby
- *The Green Mountain Club
- *National Audubon Society
- *National Wildlife Federation
- *Natural Resources Defense Council
- *New Hampshire Wildlife Federation
- *New York Rivers United
- *The Northern Forest Forum
- *RESTORE: The North Woods
- *Sierra Club
- *Society for the Protection of New Hampshire Forests
- *Trust for Public Lands
- *Vermont Natural Resources Council
- *The Wilderness Society



Stratford Bog: A portion of the three-quarter mile clearcut for a proposed airplane landing strip. Photo by John McKeith

Diamond Land Conversion: Has Council Missed Something?

by Mitch Lansky

The sale of the Diamond Occidental lands to developers in New Hampshire and Vermont was a major spur to the formation of the Northern Forest Lands Study. Most of the Diamond lands in Maine were sold to Fraser, James River, Hancock, or others in the forest industry. But does this mean that the Diamond land sales in Maine are not a problem?

A Pattern?

My curiosity over the subject was first aroused by a call I received from a St. Albans, Maine resident who informed me that a few thousand acres of Diamond lands there had been sold to a large contractor. The caller, who was himself a part-time logger, was concerned with the intensity of the cutting. The operation was obviously directed toward liquidating the commercially-valuable timber to get a quick payback on the purchase.

Soon afterward, I noticed that another large contractor had purchased Diamond lands in nearby Drew Plantation, and was cutting this rather heavily (though the cutting would not qualify under the Maine Forest Service's definition of a "clearcut" because it left slightly more than 30 square feet basal area per acre of trees). This contractor is a representative in the Maine legislature.

A few months later, another caller informed me that a Canadian contractor had purchased over a thousand acres from Diamond near the Brewer/Holden border. Much of the wood cut was shipped to Canadian mills.

And then someone called to tell me that a large contractor had purchased a Diamond lot in Kossuth and had cut almost anything with value, including deer yards and aquatic buffer strips.

Shocked by such abuses, my informant had called the Land Use Regulation Commission (LURC) to stop what were obviously illegal cutting practices. LURC officials showed up, months later, after the cutting was completed, and did fine the contractor for cutting the aquatic buffers.

This caller had talked to the contractor who had told him how much the

land cost and how much wood was cut. Apparently, despite the LURC fine, the contractor got 100% return on his investment in just one and a half months and still had the land to sell.

Implications

I did not solicit any of these calls. Indeed, I have made no major effort to research this subject, so it is quite possi-

ble that these examples, involving thousands of acres, represent just the tip of an iceberg, an iceberg that includes sales of non-strategic parcels by other industrial landowners to their contractors. If so, it may mean that the Council's statistics on land conversion are missing something important. There are thousands of acres of parcels that are still under current-use tax, they are still being "managed," but the intention of the "management" is forest liquidation and sale. Until the land is subdivided or sold for development, this type of practice does not show up in land-conversion figures.

The purchase and liquidation of former industrial timber tracts by large contractors is attractive for several major reasons:

1. purchase price of the land is less than the value of the standing timber plus the value of the cleared land.

2. There are no forest-practices regulations to prevent a landowner from rapidly liquidating the most valuable timber.

3. There are no regulations in Maine to prevent rapid resale of purchased land.

4. Even if the land is not rapidly resold, the current-use tax (around a dollar per acre) is so low that holding on to non-productive land is only a minor burden at most.

Ironically, the Council has chosen not to directly confront forest practices, even though lack of regulations is a major factor allowing land conversion. The Council has also been lobbying for lower land taxes, even though low land taxes with no silvicultural strings attached make forest liquidation a more profitable endeavor. If the Council does not address these crucial issues, it may end up offering solutions that may become part of the problem.



Large clearcuts and whole-tree clearcuts are not examples of land "conversion" according to the Northern Forest Lands Council. Photo by Stephen Gorman

Cougar-Like Animal Kills Bobcat in Eastern Maine

by Jamie Sayen

In November a hunter in eastern Maine witnessed a battle between a bobcat and a large, brown animal, thought to be a cougar, that left the bobcat mortally wounded. The Maine Department of Inland Fisheries and Wildlife (DIFW) is conducting tests on the bobcat carcass and samples of fur and blood found at the site of the battle to see if, indeed, this was a cougar. Test results will not be available for a few months.

Anthony Fuscaldo was hunting in woods near Columbia Falls when he heard "something that sounded like a woman screaming in pain. I've never heard anything like that before," he told the *Maine Times*. He walked over a rise and spotted a large, brown, tawny animal shaking something with its head about 15 feet away. He guessed that the animal was about four feet long and weighed about 80 pounds.

When the animal turned around, he saw a "big angry head—about the size of an average human head." It "let out a big snarl," and, after a few moments it dropped the bobcat and "took three tremendous long leaps" and disappeared

into the brush. After killing the mortally wounded bobcat, Fuscaldo notified DIFW.

Ken Elowe, a wildlife biologist with DIFW reported that claw and bite marks appeared to be the correct size for a cougar. "We don't know what it was," said Elowe, "but whatever it was big enough to kill a bobcat."

The last known killing of a cougar in Maine occurred in 1938 along the St. John River. There are 20-30 sightings every year, and some of them are very convincing. In 1992 cougar hair was collected in New Brunswick.

Following this sighting, Fuscaldo received several phone calls from other people who thought they had seen this big cat, including one man who said he made an imprint of its track after it attacked a moose.

Although the Eastern Cougar is considered extinct, it is listed as an endangered species. Currently, the burden of proof is on the beast to demonstrate that it is back. The time has come for us to commit to protecting adequate cougar habitat—as the spirit, if not the letter of the Endangered Species Act requires—even if we still don't have irrefutable proof of viable populations of cougars returning to this region.

Current policies permit continued habitat degradation which works to retard the return of viable populations. Ethics and ecology dictate that we commit to habitat protection regardless of the current population levels of this

endangered species. This will accelerate the re-establishment of viable cougar populations. It will provide immeasurable benefits to a wide variety of other species and communities throughout the region.

Cougar Reintroduction & Eastern Cougar Conference

Dear Forum:

Has anybody given any thought to the reintroduction of the panther/cata-mountain/mountain lion/cougar? I don't know how widely it was distributed, but I've seen the hooks on which "the last panther shot in Pelham, Massachusetts" (near Amherst) was hung.

The possibility of reintroducing such large predators and the consideration of why and how they were exterminated raises the question of the indirect effect that animal husbandry has on the environment.

Jim Romer
Unity, NH

Forum Responds: On June 3, 4, and 5, 1994, Cannon University in Erie, Pennsylvania will host an Eastern Cougar Conference. The purpose of the conference is to convene experts and private citizens with an interest in the eastern cougar; the third day of the proceedings will be devoted to discussion of restoration dynamics.

Registration is limited to 300. For more information, please contact:

Jay W. Tischendorf
American Ecological Research Institute—AERIE
PO BX 380
Fort Collins, Colorado 80522
(303) 224-5307

Wolf-Like Creature Shot in Western Maine in Late August

by Stephen Gorman

A "wolf-like" animal was shot by a bear hunter in the Maine woods west of Baxter State Park on August 31. The animal had been seen by campers and state wildlife officials on August 26 and again on August 28. The shooting comes as a surprise to wildlife managers and conservationists as the wolf has been officially extinct in Maine for over a century.

"All outward appearances say it is a wolf" said George Matula, Head of Research for the Maine Department of Inland Fisheries and Wildlife (IFW). "All of its measurements are very wolf-like. The animal is definitely not a coyote. It is a black female weighing 67 pounds—much heavier than any female coyote on record, at least here in Maine."

The animal's head has been sent to the U.S. Fish and Wildlife Service (USFWS) forensics laboratory in Ashland, Oregon. According to Matula, scientists there will examine the animal to make a positive identification and determine whether it is a pure wolf or a wolf-coyote hybrid. A report is due in about a month, he said.

Wolf sightings are on the increase in northern New England. For six months in 1991 a large wolf-like animal was seen repeatedly in the Perry Stream

watershed of northern New Hampshire, where Maine, New Hampshire and Quebec meet. Two winters ago, in a remote area of the Maine woods far from human habitation, Maine wildlife researchers studying pine marten repeatedly came upon *canid* tracks large enough to be those of a wolf. They say there is little likelihood the tracks were made by a domestic dog.

Matula speculates that the animal killed recently is a wolf that migrated to Maine from Quebec. "We are within 100 miles of wolf territory in the Quebec Laurentians" he said. "That's not very far for a young wolf to travel while exploring new territory." Wolves have been known to use huge areas—1,000 square miles and more. The animals may travel up to 500 miles in search of new range.

Matula mentioned that the animal may have crossed the frozen Saint Lawrence River during the winter. The animal might then have traveled through the settled agricultural region

along the river's south shore to the Maine woods.

"If the Canadian wolves knew how much food was available down here, more of them might make the trip" said Matula, citing Maine's abundant deer, moose, and beaver populations that would provide the animals with a healthy food base.

When asked if Maine had a position on the reintroduction of the wolf, a move that is supported by some conservationists, Matula said that any attempts to reestablish the wolf must proceed cautiously. He said his department would prefer to see the animal return on its own, as it may be doing. "All of us would be overjoyed to see it back," he said, "but how much of an effort can we afford to devote to it?" Citing his slashed budget, Matula said that reintroduction raises questions about cost. He also said that private property issues complicate the situation. "There is not much state or federal land in this region" he said.



Lyco—a beta male. Photo by Joni Soffron/Wolf Hollow

Wolf Hollow

Wolf Hollow is a non-profit educational facility that is committed to the preservation of the gray wolf. Visitors are provided with the opportunity to see and hear a live family of wolves in as natural a setting as possible through regular public programs each weekend, with special programs for school and other groups during the week.

Contact: Paul & Joni Soffron, Wolf Hollow, Route 133, Ipswich, MA 01938. (508) 356-0126.

The Endangered Species Act, 'Takings' and Public Property Rights

As the federal Endangered Species Act (ESA) comes up for reauthorization in the next year, we can expect a variety of assaults on it from ecological ignoramuses whose ethical concerns don't reach much beyond their own wallets. Many private landowners, for instance, view the ESA as a "taking" of private property. These "property rights" zealots have effectively poisoned the public discussion over our moral and ecological obligations to species that have been driven to the brink of extinction by ecologically unsustainable practices. The selfish values that have caused the unraveling of entire ecosystems now threaten to undermine the scant legal protections we offer these victims.

The argument of the "property rights" zealots runs like this: "If an endangered species is found on my land, then I can't cut trees, build dams, drain wetlands, build condos, etc..." They call this a "taking" and are pushing legislation to "compensate" such landowners. This argument sounds reasonable, but is it?

Certainly it appeals to anti-environmental "property rights" zealots whose not-so-hidden-agenda includes the dismemberment of all environmental protection statutes. But it also appeals to thoughtful, caring landowners who feel trapped by taxes, unfairly low stumpage prices, landowner liability, and a host of other issues.

What is overlooked is that wildlife belongs to the public, not the private landowner of the habitat it is utilizing. Endangered wildlife belongs to all of us, regardless of whose

land it is found upon. Viable wildlife populations require healthy habitat. Seen in this light, perhaps the "property rights" zealots are onto something. Perhaps there is a "taking" concept implicit in the ESA. Its just not quite the taking the demagogues of selfishness are clamoring about.

Every time a private land owner engages in activities that compromise habitat of any species of publicly-owned wildlife—whether common or endangered—it should be recognized as a private "taking" of public property, and the offending landowner should be required to compensate the public for all damage, restoration and clean-up, as well as paying a hefty fine.

Clearcuts harm habitat for nesting birds, salamanders, squirrels, wolves and soil microbes. Wetlands destruction, river impoundments, and pollution are all takings, and the time has come for the public to exact severe penalties from selfish, short-sighted individuals and corporations that place profits ahead of the welfare of natural and human communities.

Responsible landowners recognize that owning land entails the obligation to protect public values and rights and to manage their land in a manner that promotes the ecological integrity of their land and the surrounding land community. Caring stewards have nothing to fear from the ESA. Irresponsible landowners have been getting away with murder for too long.

—Jamie Sayen

The Maine woods is part of the 26 million acre Northern Forest Lands that stretches across the northern tier of New York, Vermont, New Hampshire, and Maine. The future of the vast region, the largest unbroken stretch of forest land east of the Mississippi River, has attracted the attention of lawmakers and conservationists. Most of the land is currently owned by several large private timber corporations. Portions of these lands in Maine and New Hampshire have already been identified by the USFWS as suitable for the re-establishment and maintenance of viable populations of the eastern timber wolf.

Matula said he does not see any insurmountable problems to reintroduction of the wolf, should the agencies involved decide to make the attempt. "Lessons were learned during the failed Maine caribou reintroduction" he said. "These things can't be rushed. There would be a lot of preliminary work to be done. For one thing, although we assume most people would be against the idea of reintroducing the wolf, we would have to do a thorough job of finding out what the public attitude really is."

Meanwhile, the head of a black, 67 pound wolf-like animal shot in the Maine woods two weeks ago is on its way to the USFWS lab in Oregon. And, according to Maine IFW spokesman Paul Fournier, if the animal proves to be a wolf, "then we will start managing for wolves. We will see if there are any others out there, and start letting people know that the wolves are a protected species."

When asked whether the provisions of the Endangered Species Act protected the wolf on the private property that comprises most of the suitable range in the area, Fournier answered "Yes."

Stephen Gorman is a freelance writer and photographer from Exeter, NH. He is author of *AMC Guide to Winter Camping*. This article first appeared in the *NH Sunday News* on September 14, 1993.

Wolf Restoration Tabloid Available

A highly informative 16-page Wolf Restoration tabloid was produced by *The Northern Forest Forum* and RESTORE: The North Woods in June 1993. It contains articles on wolf ecology, the current status of recovery efforts, and an important guide for activists detailing what you can do to help hasten the return of *Canis lupis* to the Northern Forest region. It is beautifully illustrated with photos and drawings.

Copies are available for \$3 from RESTORE: The North Woods, POB 440, Concord, MA 01742.

1990 Interim Forest Survey of Maine: Bad News for the Industrial Forest

by Mitch Lansky

Introduction

Need for Survey: Representatives from the forest industry and environmental groups have been frustrated by the lack of adequate data about changes in the Maine Woods. It is hard to have a debate on forest policy if you do not know the status of the forest and the direction in which it is changing. Over the last 15 years, the forest has been subjected to such impacts as a major spruce budworm outbreak, massive mechanized clearcuts, herbicide spraying, and residential development. What effect did these impacts have on the volume, species ratio, quality, stocking, age structure, and health and vigor of the forest?

The last complete forest survey by the U.S. Forest Service was in 1980 (published in 1982). The Maine Forest Service did its own Midcycle Resurvey in 1986, but this report focused primarily on the spruce-fir resource. In 1990, the MFS initiated another resurvey, which was finally published in late November of 1993.

Gaps: This latest survey did not attempt to answer all questions. It did not give any estimates of the stocking (degree of occupancy of the land by trees or seedlings) of the current forest. It did not give figures on the percentage of rough, rotten, or dead trees, nor did it attempt to determine the degree of fragmentation of the forest. It did not estimate the rate of growth of different forest types. Indeed, it did not even estimate changes in forest types (past surveys, for example, have shown a decline in the spruce-fir type), though it gave a rough estimate of the percentage of forest in softwood, mixedwood, hardwood, or "regenerating."

Highlights

Landscape: The survey team used

satellite photos and computers to estimate total forest acreage. Despite a boom decade of residential development in the north woods, total forest acreage appears to have increased due to natural reforestation of abandoned farmland. The MFS, however does not fully trust its methodology yet, so it assumed that forest acreage has remained stable over the last ten years.

MFS contractors, using satellite photos, classified 2.4 million acres as "regenerating," but suggested that some of this category actually had considerable wood on it. Indeed, the average acre classified as "regenerating" had 11 cords, whereas the average acre for all forest types had 14.6 cords (down from 17 cords per acre in 1980). Since landowners admitted clearcutting about 1.2 million acres during the ten year period between surveys, this implies that the remaining 1.2 million of the 2.4 million acres "regenerating" averaged 22 cords. That researchers would classify stands with so much wood as "regenerating" seems highly unlikely.

Rotations: The MFS contractors estimated that the rotation for softwoods in Aroostook and Washington Counties was around 40 years. Such a short rotation could have drastic consequences for wildlife dependent on older forest types. This system of estimating, however, is currently very unreliable. Indeed, all of the following statistics are subject to large error factors (some over 30%) and should not be fully trusted as "fact."

Timber Volumes: The MFS estimates that total volume of trees over 5 inches has declined by 15% over the last decade. Most of this decline was with softwoods which were reduced by 22% in just 10 years. Most of the decline in softwoods was due to a drop in spruce-fir, which went down 31% (a drop of 40% for fir and a 24.5% for spruce).

The decline in timber volume is not totally due to the spruce budworm. Indeed, cedar and hemlock declined. The total volume of hardwoods declined by 5%. Tolerant hardwoods (sugar maple, yellow birch, and beech), declined by 15%. White birch volume declined by 16%.

By volume, the most abundant hardwood species is red maple, which is less valuable than the previously mentioned hardwoods. Red maple volume increased by 12%. Aspen, due more to a decline in other species rather than an increase in its own volume, moved up from third place in 1980 to have the second most volume of all hardwoods. In 1959, aspen volume rated sixth amongst the hardwoods. Aspen, like red maple, is one of the least valuable species.

Good News, Bad News

Not as Bad as Expected: Despite this apparent bad news (a decline in the more desirable species, an increase in percentage of less desirable species, and several million acres either bare or too sparse to classify), the Maine Forest Service at its press conference to release the document (see side bar) suggested that the survey contained some good news. "The inventory of fir and spruce," said Tom Doak, director of planning, "appears to have bottomed out sooner and at higher levels than folks originally thought." Doak should have just said fir, (which, apparently, stopped its decline in 1986) because spruce continued to decline.

Lots of Seedlings and Saplings: MFS officials also pointed to the surprising increase in fir and spruce seedlings. Spruce seedlings in 1990, remarkably increased 365% over spruce seedlings in 1980. The rapid increase in spruce seedlings, according to Doak, should allay fears that modern harvesting methods make spruce less able to

compete. Red spruce is more valuable than balsam fir and is also less vulnerable to mortality from spruce budworms.

The regeneration figures, however, are suspect because there was an inadequate sampling of sites due to early snows. In 1980, fir seedlings outnumbered spruce by 4 to 1. Figures from the 1986 Resurvey also showed that fir seedlings vastly outnumbered spruce. Yet for 1991, spruce seedling numbers were 70% of that for fir. Such a drastic change in such a short time period shows the dubious nature of the figures.

The figures for saplings (trees 1 to 4.9 inches in diameter) are consistent with domination of softwoods by balsam fir. Of all softwood saplings, around 60% consists of fir and only around 10% consists of red spruce.

While it is not an impressive accomplishment to have former clearcuts jammed with seedlings and saplings, these younger classes of trees will not have an effect on the timber supply for many decades to come. What is most important is what is available now, and in the next few decades (i.e., our lifetimes). On this level, the survey figures are cause for concern.

Improved Quality?: The MFS also had "good news" about the size of forest trees. Contrary to the belief of many, the survey shows that the average diameter of trees in Maine's forest has been increasing, not decreasing. If this is true, however, the increase in average diameter is not due to better silviculture. It is due primarily to the spruce budworm, which tended to kill slower-growing suppressed trees (which have smaller diameters). The remaining trees thus had a larger average diameter. This led to a greater average diameter for spruce and fir. The average diameter of hardwoods was nearly the same in 1990 as in 1980.

The survey also suggested that the percentage of sawlog-sized timber suitable for lumber has increased for spruce, white pine, hemlock, aspen, and white birch. For all of these species, except white pine, however, the total volume has decreased. There is therefore less volume of quality timber available even though the percentage may have gone up.

The MFS cautions that these estimates of sawlog quality in 1990 may be based on different criteria than in previous years, so the figures may not be truly comparable. Even with these broader standards, the percentage of lumber-quality trees declined for cedar, the tolerant hardwoods, red maple and ash. Since veneer-quality hardwoods are among the most commercially valuable trees, this news is not so good.

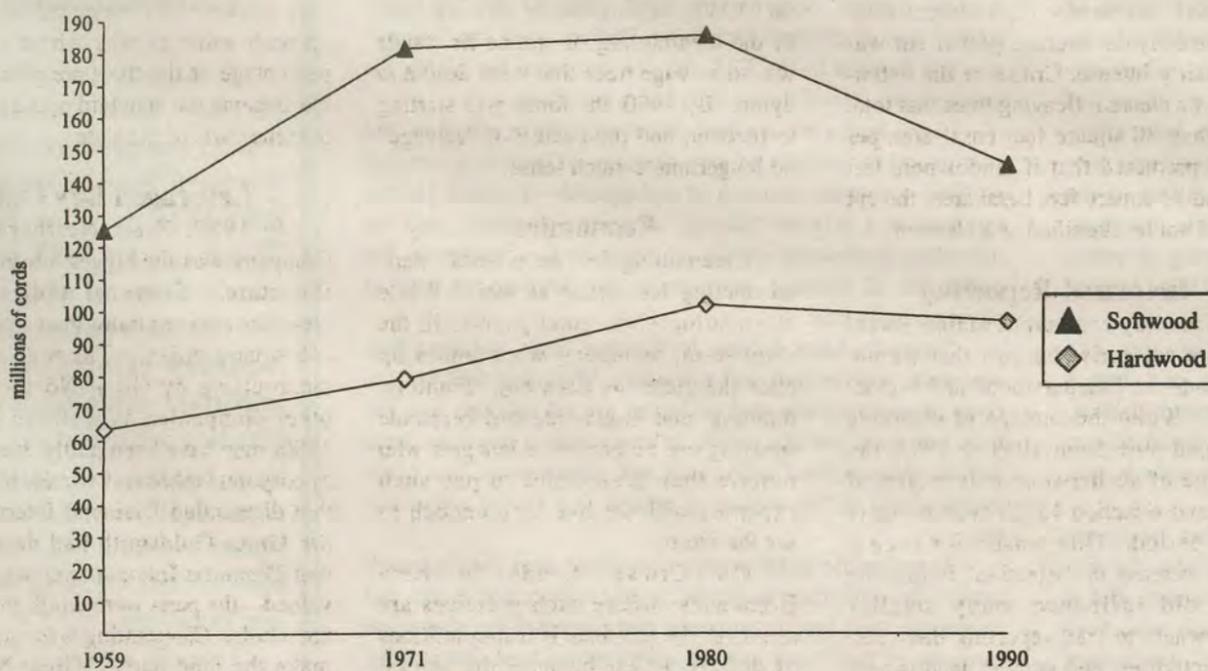
Implications to Timber Supply

Sawlogs: Until the last few years, the spruce-fir sawlog harvest increased. The bad news for this industry is that cut started going down in the late 1980s, and the MFS expects it to continue to decline for decades. Prices for purchased wood should go up (which is good news for landowners).

Pulpwood: There is currently more hardwood than softwood cut for pulpwood—a major shift from decades ago. Indeed, the spruce-fir pulpwood cut has

Continued on Page 12

Net Volume of all Pulpwood Quality or Better Trees
5 inches DBH and up
millions of cords



Note: Pulpwood Quality or Better Trees are trees in which more than 50% of the volume is sound wood and meets at least pulpwood standards.

Maine Forest Service, November, 1993 - Page 32

Source: 1959, 1971 and 1980 USFS Forest Inventories.
1990 Maine Forest Service Forest Inventory

Maine's Forest Practices Act: Is it Working?

by Mitch Lansky

One reason the Northern Forest Lands Council did not directly address forest practices through a separate subcommittee, is, supposedly, because the individual states are already dealing with this issue. Those who support this line of reasoning can point to Maine's 1989 Forest Practices Act (FPA) and 1990 Forest Clearcutting and Regeneration Standards. The Standards, they claim, are working.

Since 1989, when reported clearcuts peaked at 145,357 acres, clearcut acreage has steadily fallen. In 1992, "only" 59,602 acres were reported clearcut—a drop of 59%. More dramatically, clearcuts as a percentage of all cuts went from 44.6% in 1989 to 12.8% in 1992.

How much of this drop, however, is due to the Forest Practices Act? Is management improving? Has the FPA succeeded in fulfilling its mandate?

The Mandate

The FPA mandated that the clearcutting standards among other things "provide a healthy and sustainable forest," and "address adverse impacts on wildlife habitat." The standards, however, theoretically allow landowners to remove most of the volume of timber in a township in a matter of decades. The FPA does not mandate a reduction in clearcut acreage. It only limits the size and distribution of clearcuts. Theoretically, landowners, if they wish, can clearcut as many or even more acres than they did before the rules were passed.

For those who wish to cut as abusively as the law allows, the alternative to clearcutting in cookie-cutter patterns (clearcuts surrounded by buffers) can be heavy partial cuts that degrade the forest. The result in either case would be a forest that is neither healthy or sustainable.

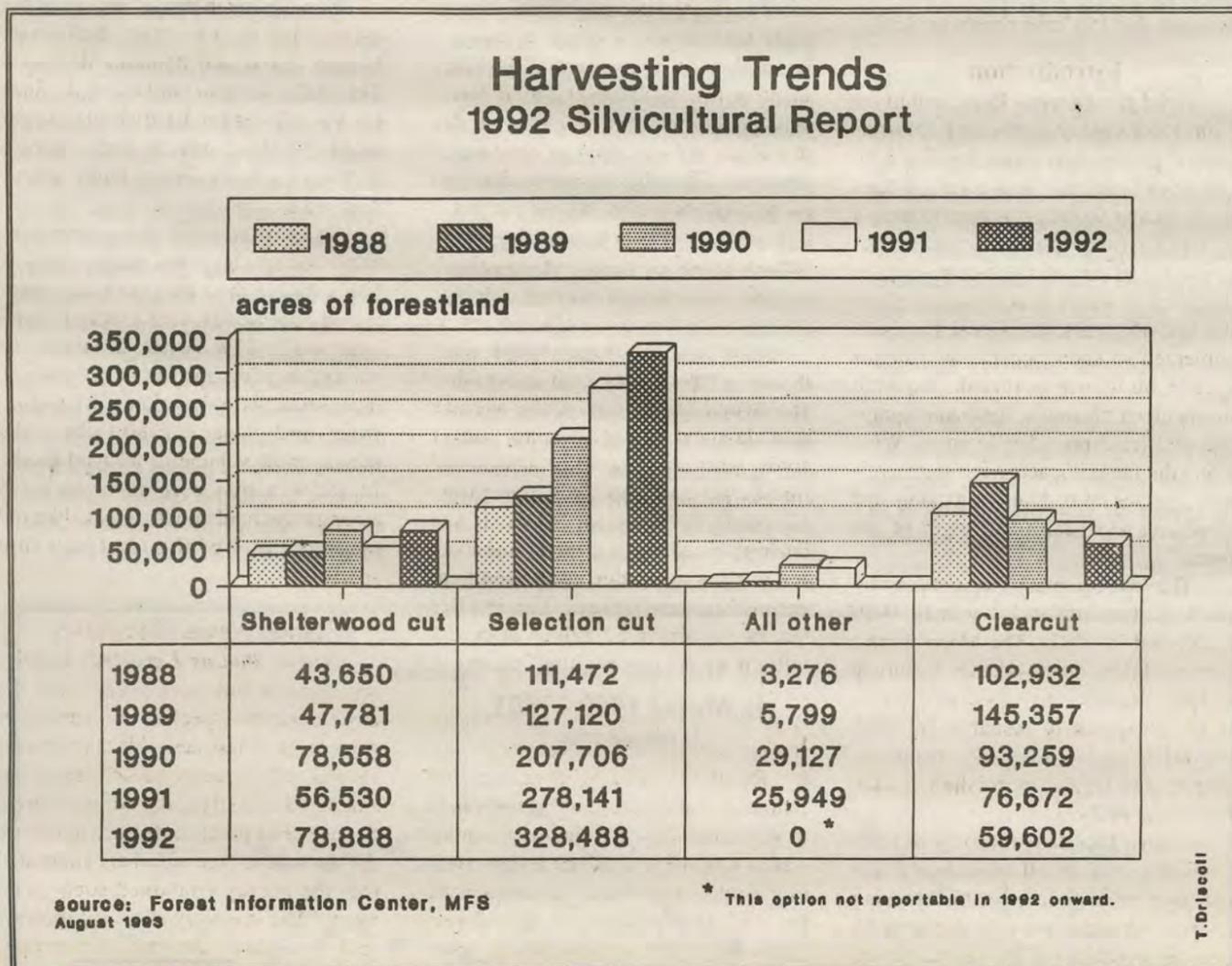
The clearcutting standards provide wildlife with temporary corridors that are only 250 feet wide—all edge, no interior habitat. In ten years, ten-year-old clearcuts can serve as corridors. The regulations may "address" wildlife (by mentioning the issue), but it is hardly ensuring that wildlife or their habitats will be protected.

Post Hoc Ergo Propter Hoc

Just because the FPA was passed in 1989 does not mean it caused the subsequent reduction in clearcutting. Indeed, the rules were not actually put in place until 1991, yet clearcutting in 1990 was down 36% from 1989. There are other factors at work.

Irritation

The rules, however, may have led to some reduction in clearcutting due to the irritation factor. If, according to state definitions, landowners clearcut, they have to deal with bureaucratic hassles. Indeed, for clearcuts over 50 acres, landowners need management plans—not ones that demonstrate best silvicultural practices, but ones that demonstrate how the landowners will conduct the clearcut according to the mandates of the law (i.e., how the clearcuts and separation zones will be



distributed on the landscape).

To avoid such hassles, many landowners are doing what used to be called "commercial clearcuts" (i.e., cutting most of the merchantable wood) but, according to the rules, are now not legally clearcuts. Many heavily-stocked softwood stands, for example, have 150 or more square feet of basal area of trees per acre. The rules state that a cut is not a clearcut if the logger leaves more than 30 square feet basal area per acre. Thus a logger can remove nearly 80% of a stand without technically clearcutting it.

In 1989, when landowners reported that nearly 45% of their cuts were clearcuts, the average removal was 17 cords per acre. After the Forest Practices Act went into effect in 1991, when landowners reported that 17% of their cuts were clearcuts, the average removal was nearly 15 cords per acre. This means the average partial cut was still fairly intense. Critics of the definition of a clearcut (leaving trees that total less than 30 square feet basal area per acre) predicted that if landowners left behind 31 square feet basal area, the cut would not be classified as a clearcut.

Increased Reporting

The only reportable Maine Forest Service categories for cuts that are not clearcuts are "shelterwood" and "selection." While the acreage of clearcuts declined 59% from 1989 to 1992, the acreage of shelterwood cuts increased 65% and selection 158% over the same time period. One reason for such a rapid increase in "selection" is that the FPA did influence many smaller landowners to start reporting their cutting activities, and smaller landowners are not as prone to clearcutting.

Landowners submitted 2,913 reports in 1990, 3,980 reports in 1991, and 4,314 reports in 1992. The increase

in reporting made it appear that the percentage of selection was increasing and clearcuts decreasing much faster than may have been the actual case.

The term "selection," however, is unfortunate. Technically, very few of such cuts are actually selection cuts as defined by foresters, i.e., cuts that deliberately try to create stands that are high quality, well spaced, and have a desired distribution of many age classes. Most cuts reported as "selection" are what had previously been reported as either diameter-limit, or single-species cuts. These are more rules for removing trees than silvicultural methods for tending forests.

The Spruce Budworm

One factor that led to reductions in clearcuts in the 1990s was the collapse of the spruce budworm outbreak in the mid 1980s. Much, but by no means all, of the clearcutting of spruce-fir stands was to salvage trees that were dead and dying. By 1990, the forest was starting to recover, and the excuse of "salvage" no longer made much sense.

Economics

Clearcutting for "economics" started making less sense as well. While clearcutting gives good payoffs in the short-term, managing what comes up after the clearcuts does not. Planting, thinning, and insecticide and herbicide spraying are expensive. Managers who require their companies to pay such expenses will not live long enough to see the returns.

On Crown Lands in New Brunswick, where such practices are standard, the province is losing millions of dollars a year because the annual expenses are greater than the annual stumpage revenues. Such practices are only viable on a large scale with subsidies.

Mechanization

One of the reasons landowners shifted to clearcutting (besides the budworm and short-term economics to pay off the costs of road building) was because of mechanization. Partly to avoid the growing costs of workers' compensation, companies started switching to mechanical harvesters which are both safer and employ fewer workers. Owners of these half-million dollar machines must cut enormous volumes of wood to pay back costs of purchase and repair. The easiest way to cut such huge volumes quickly is to clearcut.

In the 1990s, some landowners discovered that it is possible to do partial cuts with feller forwarders and single-grip harvesters. Indeed, mechanized partial cuts that consist in alternating cleared swaths for the machines to drive on with wider swaths where a certain percentage of the trees are plucked out, has become the standard cutting method in some parts of the state.

Leveraged Buy Out

In 1989, Great Northern Paper Company was the biggest clearcutter in the state. Some of their rolling clearcuts covered more than a township (36 square miles). The high level of clearcutting by Great Northern (and other companies as well) in the late 1980s may have been partly due to fears of corporate takeovers similar to the one that dismantled Diamond International. Sir James Goldsmith had determined that Diamond International was undervalued—the parts were worth more than the whole. Clearcutting was one way to make the land part of Great Northern worth less.

In 1990, Georgia-Pacific succeeded in buying out Great Northern anyway. *Continued on Page 12*

Survey

Continued from Page 10
dropped by 750,000 cords (a 35% reduction) since 1980.

Despite the crash of the spruce-fir wood supply, the MFS offered some hope for the state's paper industry. The mills' wood supply problems can be mitigated through increased use of recycling, substitution of other species (such as hemlock and hardwoods), better utilization (use of smaller diameter wood, plus edgings, sawdust, and shavings from the sawmill industry), and increases in intensive management.

There are problems with this strategy, however. Hardwoods and hemlock are already in decline. Because the spruce-fir sawmill industry is in decline, slabs, edgings, and sawdust will go into decline. Intensive manage-

ment now, even if it works as predicted (which is doubtful), will not produce marketable wood for decades.

Communities and Jobs: The paper industry is in a global recession. The industry in Maine built an overcapacity during the 1980s, and, as supplies start to shrink, it is starting to shut down the less efficient, less cost-effective machines (recent examples are Bowater and S.D. Warren, a division of Scott). These shut downs are a severe blow to timber dependent regions, even though they may make economic sense to the companies.

Each inventory, since 1959, has shown an increase in total wood cut. The increase in volume cut and manufactured has helped to offset job losses due to mechanization. This increase in cut can no longer be sustained. Now the impact of mechanization will be felt full force. Indeed, from 1984 to 1992, full-time woods jobs declined

40%. The impact of such job losses can be severe in remote rural towns with little economic diversity.

Technological Fixes: The timber industry has used its technologies to cut and use lower-diameter, poorer-quality wood rather than to improve the quality and health of residual stands. As spruce-fir declines, mills have used more hardwood and hemlock. As red maple and aspen increased, they have chipped more "junk" for biomass. The timber industry has thus used technology somewhat like the oil industry—to stretch out supplies and reach deeper deposits.

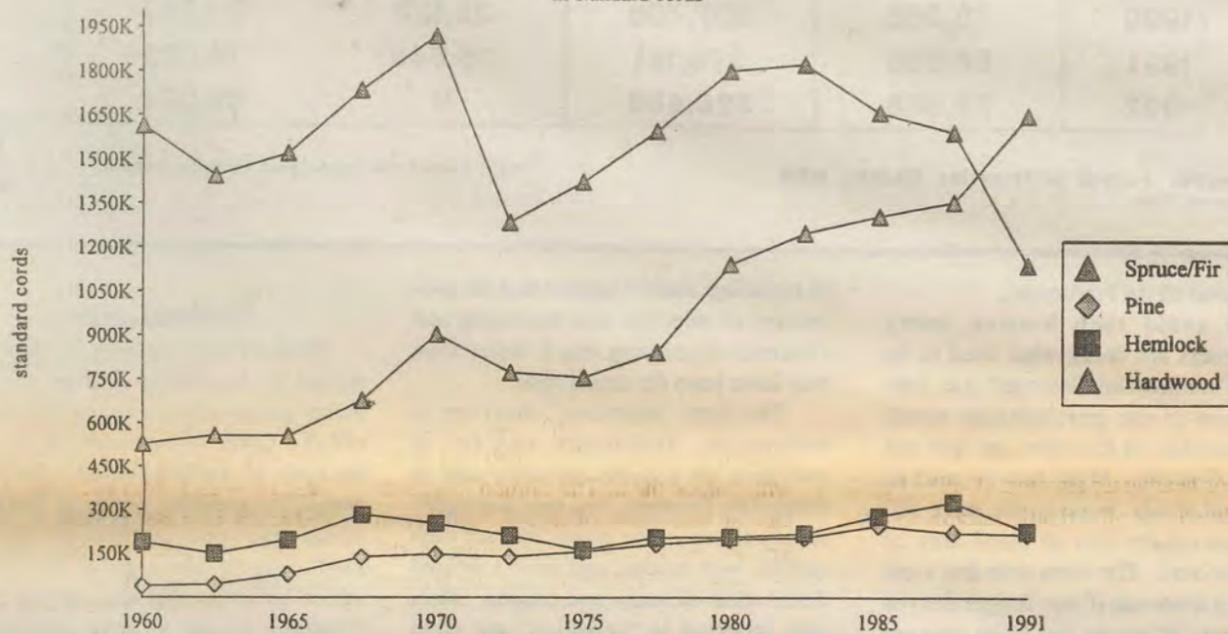
Market Fixes: What is cut in Maine depends on international market forces. We currently have no policy to prevent increased market demand from resulting in a further decline in our forest. The level of cut is based on what the market, not the forest, will bear.

Conclusion

Market forces and technologies are directed more towards the benefit of the corporations that control the resource than towards the forest or the communities that depend on the forest. Mechanization, liquidation of stands, export of raw logs, import of Canadian workers, all may benefit absentee landowners in the short run, but they do not benefit local ecosystems or communities. Markets and technologies alone are a poor substitute for socially- and ecologically-based forest policy.

We can passively watch the future unfold, or we can take action to ensure that other forest values besides marketable fiber are considered. If the Northern Forest Lands Council refuses to directly confront forestry policy in the region, we will have to set up an organization that will.

Pulpwood Harvest Levels by Species in Maine 1960 - 1991
in standard cords



Note: These values include exports, but do not include imports.

Maine Forest Service, November, 1993 - Page 28

Source: Woodprocessor Reports, Maine Forest Service, 1960 - 1991.

Maine's Media Ignores Fate of Industrial Forest

The release of the new forest survey was a major story in itself. It was more than a year overdue. The Maine Forest Service held a press conference to release this statistical snapshot of Maine's most important resource. Only two reporters, one from the *Bangor Daily News* and one from the AP, showed up. The press was given ample warning previous to the press conference.

This lack of interest on the part of the Maine media speaks volumes about why the degradation of the woods can continue. If the inventory of the forest falls and nobody hears about it, does it make a sound?

The Maine Forest Service will be holding hearings on the inventory around the state in early 1994.

—ML

Maine Forest Practices Act

Continued from Page 11
In 1991, the Great Northern Lands were sold to Bowater. Neither G-P nor Bowater clearcut (or sprayed herbicides) to the degree that Great Northern had. This led to reductions in clearcuts for the state.

Timber Supply and the Economy

At the same time that the FPA went into effect, the economy went into recession with severe impacts on the paper industry. During the 1980s, the paper industry had built a global overcapacity. The combination of this overcapacity with an economic slump was especially hard on Maine's paper industry. Many of Maine's paper machines are less efficient than ones recently built in the Southeast, and are thus less competitive. To some extent, demand for wood dropped, and so did clearcutting on company lands. The value of product of the paper industry in Maine has dropped half-a-billion dollars since 1989.

During the 1990s, timberland man-

agers for the paper industry realized that they had overcut in the 1980s. The inventory of spruce-fir fell by around one third in just ten years. Many of the biggest industrial landowners have drastically reduced their level of cut and are purchasing more wood from other landowners. Since industrial landowners were the biggest clearcutters, this reduction of their cut has meant a reduction in clearcutting.

To compensate for the decline in spruce-fir as a source of pulpwood, paper mills have converted to use more hardwoods and hemlock in the pulpwood mix. From 1985 to 1991 (and most of this change was within the last few years), the level of cut for spruce-fir pulp and logs declined by more than 700,000 cords. Paper mills are now using more hardwoods than softwoods. Since most clearcutting was focused on spruce-fir (hardwoods are usually cut by diameter-limit), this led to a major reduction in clearcutting.

Changing Consciousness

The public does not like clearcuts. This is no longer a local issue, it is an international issue, and landowners know it. The struggles over the

clearcutting of old growth in the Pacific Northwest have had an impact on the cutting of second growth here. Satellite and aerial photos have exposed the scale of clearcutting that went on across this continent over the last decade. In just the last few years, the U.S. Forest Service has reduced clearcutting on national forests across the country.

Companies are trying to improve their images. They do not want an enraged public shutting down their operations. Although Maine's Forest Practices Act did not legislate a reduction in clearcutting, it sent a message to landowners that is what the public really wants.

Conclusion

The level of cut is determined by the market, not by the FPA. Maine's forest has been saved in the past by recessions and depressions, rather than regulations. As export markets increase, even local mill capacity is insufficient to prevent decline of the inventory. The limit then comes from increasing prices for scarcer resources. As prices increase, marginal mills shut down. Demand goes to other regions with cheaper trees.

The problem with relying on the "free market" to determine the level of cut is that the market is not completely free. Some large companies have an undue influence over it. It is also so big that local areas, or even whole regions, can become sacrifice zones. Prices can be kept artificially low for years, despite a declining inventory. By the time a shortfall develops, it is too late. Trees do not immediately grow to maturity to meet increased demand. It takes decades for a forest to recover. In the meantime, local mills, as in Montana, where Champion and Plum Creek liquidated much of their old-growth holdings, shut down.

The Forest Practices Act is no substitute for real forest policy. It has not solved Maine's forestry problems. Much of the reduction in clearcutting was coincidental to, rather than caused by, the new standards. The states are not adequately addressing their own forestry problems because forestry is no longer a state issue. It is an international issue. We need a broader perspective, but it has to be one that ensures protection of local forests and local communities.

Why Restore the Wild Atlantic Salmon?

by George Wuerthner

New England's rivers are the heart and arteries that thread the forested body of the land. The flash of a large fish in the depths of a pool quickens the pulse, whether one is a fisher or not. The loss of salmon in our rivers can be likened to the loss we might feel if we no longer heard the song of warblers in our forests. A deadly silence descends upon the land, and we are poorer for this loss.

On September 30, 1993, RESTORE: The North Woods, Biodiversity Legal Foundation, and Jeff Elliott filed a petition with the U.S. Fish and Wildlife Service to list the wild Atlantic Salmon as an Endangered Species throughout its historic range in the United States. This petition represents several real biological, as well as philosophical, concerns.

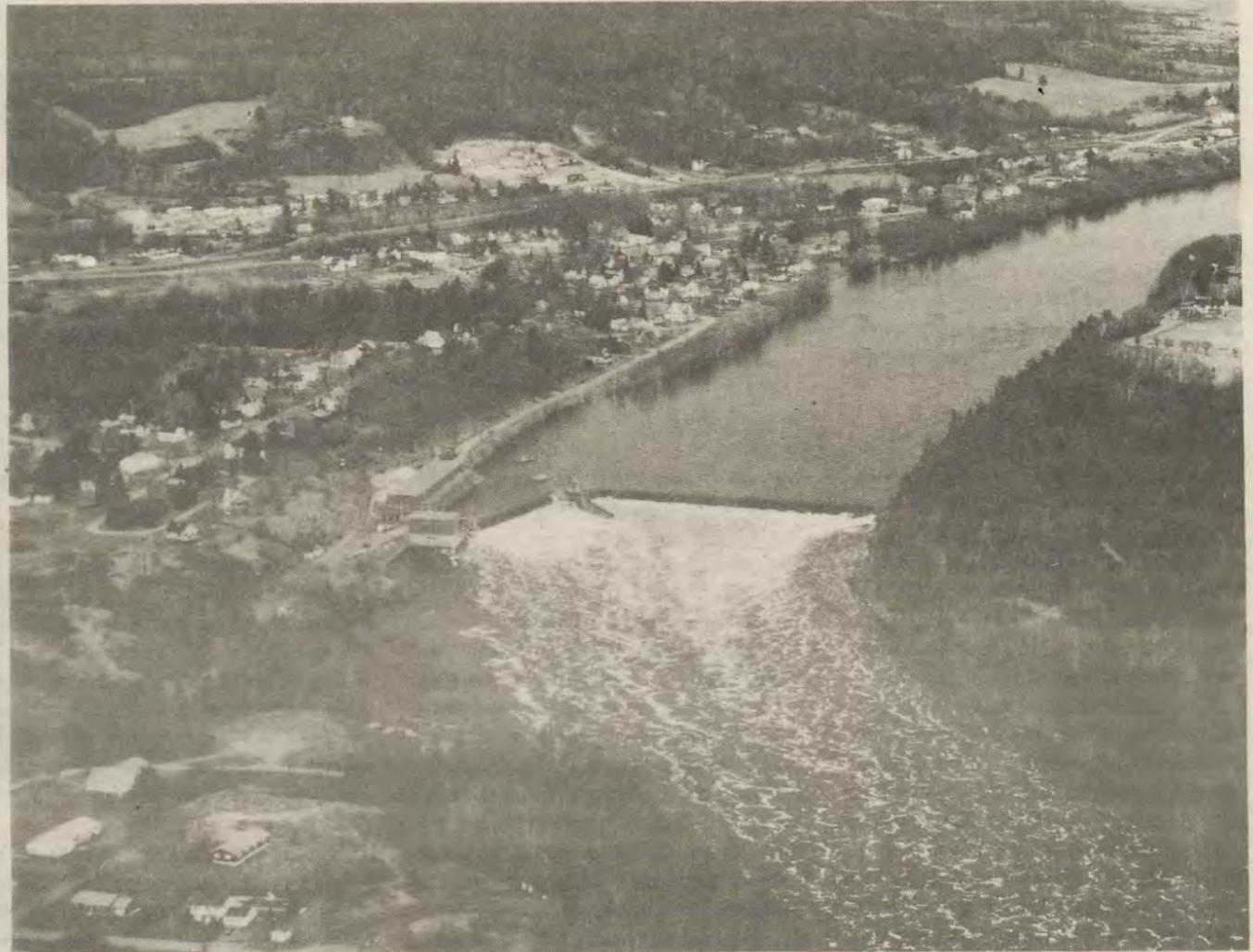
The biological reality is that the salmon is truly endangered. Once hundreds of thousands of these fish jammed New England's major rivers during spawning runs; today this silver horde has dropped to an average of 4,000-7,000 fish across the entire region. Where once 134 Maine rivers supported salmon runs, only 13 do today.

In the few remaining runs, remnant fish populations are perilously close to extinction. Nearly all of the salmon returning to New England rivers today have been released from hatcheries. Recent genetic research on Pacific salmon has shown that individual drainages often have wild fish that are genetically adapted to that particular waterway; some water bodies host several genetic strains. Presumably Atlantic salmon once possessed similar diversity and adaptations to specific rivers. The tremendous biological loss caused by the extinction of many salmon runs cannot be mitigated by hatchery fish.

If the decline in fish stocks is unchecked, a threshold is reached where the likelihood of extinction caused by random events such as drought, a major spill of toxic material, disease or other occurrences exponentially increases. Although the exact minimum number of fish required to maintain genetic vigor is unknown, the most recent estimates from biologists suggest that a minimum of 200 adult salmon is necessary to avoid inbreeding and the deleterious effects of genetic stochasticity.

Nearly all of New England's existing salmon runs are at or below the critical 200 fish level necessary to avoid extinctions and inbreeding regression. The only exception may be runs in Maine's Penobscot River. Other runs, including those of the St. Croix, Kennebec, Androscoggin, Sheepscot, Saco, Merrimack, Connecticut, Denys, and Machias are at or below this critical level. This trend must be reversed. The loss of this genetic diversity represents the greatest tragedy associated with the decline and/or extinction of wild fish stocks everywhere.

There are, however, a number of benefits to restoration of salmon runs beyond preservation of genetic diversity. Re-establishment of abundant fish runs would provide additional food up and down the food web. Young salmon



The Veazie Dam on the Penobscot River, just south of Bangor. It is the first dam Atlantic Salmon encounter on the Penobscot. In the middle of the V-shaped dam is a fish ladder where biologists capture many of the returning salmon and take them to hatcheries. Photo by David Carle

would feed river otter, bald eagle, and other larger fish. Furthermore, the death of some fish after spawning would add to the enrichment of typically nutrient-poor headwater streams. (Unlike Pacific salmon, not all Atlantic salmon die after spawning.)

A viable wild Atlantic salmon recovery would also permit greater sport fishing, and perhaps even greater commercial fishing opportunities. Studies have demonstrated that sport fishing can generate significant dollars for local communities. For example, recent research by the University of Montana Economics Department has shown that sport fishing in Montana is worth more than \$450 million to the state's economy. Another study by the Fish and Wildlife Service in Yellowstone National Park has shown that for every mature wild fish produced is worth more than \$50 in avoided costs—if one presumes you had to produce a fish of similar size in a hatchery in order to maintain fishing opportunities. Whether or not these figures are directly transferable to New England, it is clear that restoration of wild Atlantic salmon offers economic opportunities that are presently not available to the region.

Even fish watching has economic ramifications. More people watch fish in Yellowstone today than come to capture them on hook and line. In some parts of Alaska, salmon viewing on small streams is a major tourist attraction.

If wild Atlantic salmon runs were reestablished in New England to something of their former glory, tourism related to sport fishing and fish watching would become a significant economic stimulus, particularly in the more rural communities where employment options are limited. Salmon restoration

could be a cornerstone to future sustainable human communities.

The concern for wild Atlantic salmon goes beyond the fish and those who pursue them. The salmon is a spectacular barometer of aquatic ecosystem health. Although overfishing in the oceans contributes to the decline of salmon stocks, the loss of river habitat represents one of the greatest threats to the fish's continued existence. According to some estimates, more than 50% of the river habitat is either unavailable or too degraded for salmon. Dams, for example, exact a major toll on fish. Upstream migrations are blocked or thwarted; the smolts migrating downstream must run the gauntlet of turbines that literally chop the fish to pieces. One study found that turbines on just one dam along the Connecticut River killed 27% of the downstream migrating smolts.

Water quality is another problem. New England is blessed with an abundance of fresh water. Unfortunately, perhaps as a result of this abundance, we have squandered this valuable resource, allowing our rivers to be degraded by logging practices, development and agricultural and industrial pollution. Some recent studies suggest that pure, clean, fresh water may become the most valuable natural resource in the world, exceeding the present value of oil and other energy sources. Clean, high quality water is also necessary for salmon survival, hence restoration of salmon requires restoration of water quality.

Destroy the rivers, and you destroy the lifeblood of the landscape. Listing the Atlantic salmon demonstrates a concern for the fish, but also focuses attention on the degraded condition of our rivers. Restoration of regional rivers is

the most important step we can take to improve wild Atlantic salmon stocks. Restoration includes adoption of better forestry and agricultural practices to reduce water degradation, a further reduction in water pollution, particularly from non-point sources, and removal of upstream barriers.

The removal of dams is not infeasible. Although alternatives to hydropower exist, conservation—switching to more efficient lighting and appliances, insulating homes—are often by far the most economical means of obtaining “more” power and reducing consumer demand. If adopted widely, such conservation measures may even permit the removal of existing dams on some rivers, and open up miles of more habitat to salmon.

Some argue that restoration of fish runs is occurring without listing under *Continued on Page 30*

Endangered Atlantic Salmon Tabloid Available

RESTORE: The North Woods recently published an excellent eight page tabloid on the plight of the Endangered Atlantic Salmon. The tabloid contains articles on the life cycle of salmon, the impact of dams on salmon, an assessment of current (unsuccessful) efforts to restore salmon without inconveniencing dam operators, and a petition to US Fish & Wildlife Service to list wild Atlantic Salmon as endangered. This educational tool also tells you what you can do to help restore this magnificent fish. Please send \$2 to: RESTORE The North Woods POB 440 Concord, MA 01742

Professors Seymour & Hunter Respond to Forum Critique of Triad

Ed. Note: In the Winter Solstice 1992 issue of the Forum (vol. 1 #2) Mitch Lansky critiqued "New Forestry in Eastern Spruce-fir Forests: Principles and Applications to Maine" by Professors Robert Seymour and Malcolm Hunter of the University of Maine-Orono. In the Autumn Equinox 1993 issue of the Forum (vol. 2 #1) I reiterated some of Mitch's concerns in "Council Promotes Wrong 'Triad' System." Professors Seymour and Hunter have responded to this latter critique. We print their letter and my response to them.

Dear Jamie:

We were pleased to see in the Autumn Equinox issue of the *Forum* that the "triad" concept is serving its major function: providing a framework for discussion about how to allocate land to our different uses. We are writing to correct some misconceptions that appear in your critique of our model.

1. In our original paper we did not suggest allocating 10% of the landscape to reserves. In various discussions we have mentioned the 10-15% estimate suggested by the World Conservation Union (the international consortium of conservation groups formerly known as the IUCN). We do not know how much is enough; no one does; we're not even sure a "right" answer exists.

2. We do not know how you arrived at the statement: "they would permit

'intensive management' on 30-40% of the region." We proposed that, because intensive production can produce roughly three times as much wood per acre as extensive management in Maine forests, for every acre we shift from extensive management to intensive management we could put three acres into reserves with no net loss in total wood production. So let's assume that 10% is an appropriate target for reserves and that currently about 2% of Maine's forests are in reserves and about 6% in intensively managed plantations. The three to one tradeoff means that to increase the area of reserves from 2% to 10% we would need to increase intensive management from 6% to 8.7%. Obviously, these are rough estimates, but 8.7% is not even close to 30-40%. Incidentally, it would be fairly easy to obtain that 2.7% from sites that were previously used for agriculture.

3. We do not know for certain that plantations are sustainable or that they will produce larger yields than New Forestry systems that mimic natural disturbances over the long-term, but models of sustainable agriculture give us some cause for optimism. There are many places in Europe and Asia where annual crops have been removed for millennia; surely we should be intelligent enough to sustain timber production that removes a crop only once every few decades. Incidentally, spruce plantations in Germany in which yields

from second rotations were less than from first rotations are a frequently cited example of the phenomenon you fear, but in practice they are outnumbered by plantations in which second rotations outproduced first rotations, primarily because of more refined silvicultural practices.

4. We believe that the question of mimicking natural disturbance is not particularly relevant to plantations, any more than it is to potato fields, but it is fundamental to our vision of how most of our forests should be managed—the matrix in which reserves and plantations would be imbedded. These lands are critical to the goal of maintaining biodiversity as David Publicover emphasized in his article ["Unmanaged Land is Necessary to Maintain Biodiversity" *Autumn Equinox 1993*], especially if they were to represent about 80% of our land base per the estimates calculated above. For some of these lands, those in which windstorms and budworm were major disturbance factors, irregular shelterwood cutting with permanent retention of some old trees offers a reasonable method for imitating natural disturbances.

5. You are right that it would not be easy to make a transition from where we are now to a future in which there are many more reserves and a few more plantations providing wood to compensate for the production we forego in reserves. However, the fact that there

are significant areas of forest which have been identified as non-strategic by their owners suggests there is some flexibility. Unfortunately, most of these non-strategic forests are on sites of marginal productivity (e.g. high altitudes, swamps, etc.) and to be truly representative of the array of ecological conditions some reserves on productive sites will be needed. These will be hard to obtain in the short-term except where access is limited.

6. The idea of net wood production remaining the same under a triad model—the fatal flaw in our idea you feel—is a simplifying assumption that we have made, realizing that environmentalists advocate reduction in demand and industrialists advocate increased production. It does not represent our personal preferences. We use it to make the triad easier to understand and to make it more likely that everyone will use the triad model as a framework for their discussion, rather than feeling that the model is stacked against their particular interests.

Sincerely yours,

Malcolm L. Hunter, Jr.
Libra Professor of Conservation
Biology

Robert Seymour
Curtis Hutchins Professor of
Silviculture

Forum Editor Replies

Dear Mac & Bob,

Thanks for your response to the latest *Forum* critique of the Triad. I'll run your letter in the next issue along with a challenge to you and other readers to keep up the discussion on these and other points. I doubt you'll be surprised to find that I remain unwilling to accept Intensive Management (IM)—period. However, the model you propose represents a helpful step in the evolving discussion over forest policy.

Regarding your response to me:

#1. I especially appreciate your explicit acknowledgment that no one knows how much is enough. Our job now is to make sure that "too little" is not ridiculed as "too much."

#2. I wish I'd checked with you before writing the 30-40% figure. It seems to me that in a conversation with Mac in the past year and a half he guessed at some rough percentages, and the 30-40% figure is what I recall. However, I apologize if my memory invented that conversation. And, I am glad that at least I provoked you to explain how you would figure out a percentage for IM.

#3. What are the "more refined silvicultural practices" you refer to in the last sentence? Does this include herbicides?

#4. I see your point about plantations not mimicking natural disturbance regimes any more than potato fields do. I don't much like potato fields that dump tons of pesticides into soils and rivers. I think we have to produce our wood fiber from forests that are as natural as possible. This is another reason I dislike IM.

#5. Excellent point. One of our top priorities should be to begin identi-

fying productive sites that can be incorporated into reserves. Mitch Lansky's concerns that we will have to wait 40 years (while the fruits of IM mature) and then buy recently cut over land for reserves remains unaddressed, and is, I think, pertinent to this point.

#6. Thank you for explaining the rationale behind your assumption. My fear is that this explanation gets lost in the shuffle, and the notion that industry will continue to harvest at existing levels gets the attention. It might be useful to do a couple of additional tests, perhaps involving an economist, in which we: (1) uncritically accept industry's unchecked demand projections for the next 50-100 years, and (2) we stringently reduce demand along the lines I've outlined (using recycling, elimination of wasteful end products, ending raw log exports, and promotion of much, much more value added processing within the region). In the first instance, there probably will be no room for reserves and significantly more than 8-10% of the forest will be under IM. In the second instance, I suspect that we could put 40-50% into reserves, refrain from IM and still provide a decent economy that meets the genuine needs of the local communities. I'm less worried about the needs of the corporate bean counters, the Wall Street gamblers, junk mail aficionados, and Monsanto.

In any case, I wish that you would be a bit more explicit about the possibility for different approaches, depending on whether or not we as a society opt for genuine recycling and secondary and tertiary processing locally, or if we instead choose by default to continue with our slovenly ways.

Sincerely,
Jamie Sayen



Allagash Clearcuts. Large clearcuts are the first step of intensive management. Plantations and herbicide spraying follow. Photo by Stephen Gorman

Clinton Plan Sacrifices Pacific Northwest Ancient Forest Ecosystems

by Jim Britell & Tim Hermach

[Ed. Note: The following comments on the Clinton Forest Plan—"Option 9"—were sent to Robert Jacobs, Interagency SEIS Team Leader (the "team" was composed of representatives from the Forest Service, the Bureau of Land Management, US Fish & Wildlife Service, and university scientists), by Jim Britell, Conservation Chair of the Kalmiopsis Audubon Society, PO Box 1349, Port Orford, OR 97465, and Tim Hermach, Director, Native Forest Council, PO Box 2171, Eugene, OR 97402. The Clinton plan to log extensive portions of the remaining shreds of Ancient Forests on public lands (while failing to provide permanent protection for any of these lands) has successfully divided the environmental groups of the Pacific Northwest. Britell and Hermach have led the resistance to Option 9 and are currently suing the Clinton Administration to block its implementation. While these comments may appear quite technical because they refer to the "Report of the Forest Ecosystem Management Assessment Team" (FEMAT Report), they shed valuable light on the plight of the ancient forests of the Pacific Northwest, and, are instructive for forest defenders throughout North America.]

"Making plans is often the preoccupation of an opulent and boastful mind, which thus obtains the reputation of a creative genius by demanding what it cannot itself supply, by censuring what it cannot improve, and by proposing what it knows not where to find."
(Immanuel Kant)

General Observations on the Plan

If one disregards Option 9, the Report of the Forest Ecosystem Management Assessment Team (FEMAT Report) itself is an excellent case for no more logging on federal lands. For a number of years the Native Forest Council has advocated the abolition of logging on public lands, a position usually referred to as the "zero cut" Option. While we have presented a number of economic arguments to support our position, we have never fully documented the ecological argument for this position. The FEMAT Report, while not disclosing the ecological effects on all species of a "no cut" alternative, does provide enough information to strongly suggest that our alternative may be the best approach to complying with existing National Environmental Protection Act (NEPA) and National Forest Management Act (NFMA) requirements regarding species protection on public lands. We surmise this is true because, although the species viability ratings were not disclosed for this alternative, it is clear that the less logging and the more reserve, the higher the species viability ratings.

If one regresses the data in the Draft Supplemental Impact Statement (DSEIS), implied alternatives appear to the left of Option 1, which we would like developed. Reserve size increases and harvest level decreases as one moves down numerically though the

alternatives—and the species viability increases. If one assumed that the reserve could increase to greater than the sum of federal lands by including private lands and that the harvest could become a minus number by buying back sales and restricting private land logging, then at some reserve size and harvest level we could, at least theoretically, provide for 95% species viability of some greatly increased number of species. We see no reason why these potential alternatives could not be displayed. Moreover, we believe it is a clear requirement of present law to truly disclose a "no change" or "no action" alternative, and that the DSEIS is flawed by its absence.

The following chart shows a regression of the data to determine what Late Successional reserve size might insure a well distributed viability for all the 1100+ species analyzed in the FEMAT Report. A reserve of approximately 13 million acres might provide well distributed populations for all species. This would require all the matrix land in Option 1, and an additional 1.5 million acres of other (State or private) land to also be added.

Problems With The Plan

The Clinton Forest Plan is a wickedly political "attractive nuisance". While ostensibly a pre-decisional document in the form of a Draft Supplemental Environmental Impact Statement (DSEIS)¹, the document actually presents as "science" a decision made months ago that much of the remaining Ancient Forest, roadless areas, and species in the Pacific Northwest must be sacrificed. To package this decision as sound ecological

science it presents data in a way that underestimates the amount of Ancient Forest that will be placed at risk and the benefits of creating reserves, but overestimates the benefits of logging. It arrays data so that it cannot be compared with previous reports, and assumes the success of major projects neither funded nor designed. The process records and meeting minutes are sealed or nonexistent, and the methodology received inadequate peer review. The Plan's technical and legal construction is so weak and species protection so poor it probably wouldn't survive a legal challenge.

Option 9, the preferred Option, trades protection of 60% of the remaining multi-canopy Ancient Forest for clear cutting the other 40%.² If implemented, it will rely on the logging of Ancient Forests for over half the timber volumes projected in the Plan into the indefinite future. The Plan tries to present the continued liquidation of the forests in the Pacific Northwest in the best possible light; nevertheless, the impact of the Plan's annual 1.2+ billion board feet of logging is painfully obvious. Logging abuses on the Northwest's forests are of such magnitude that even the Option 1, which according to the document itself is most restrictive of logging (scientists call this "the big green alternative"), is inadequate to preserve the viability of many species within the forests.

The effects of the preferred alternative are not fully described because the location and magnitude of logging depends on future studies and processes not yet designed. Specifically, the amount and effects of thinning and salvage, and of the roads that will be built are not disclosed. Much of the logging will be done after watershed analysis,

but this is an untried process and the methodology was not disclosed—the chapter on this being merely an encyclopedia of practices, not required procedures.

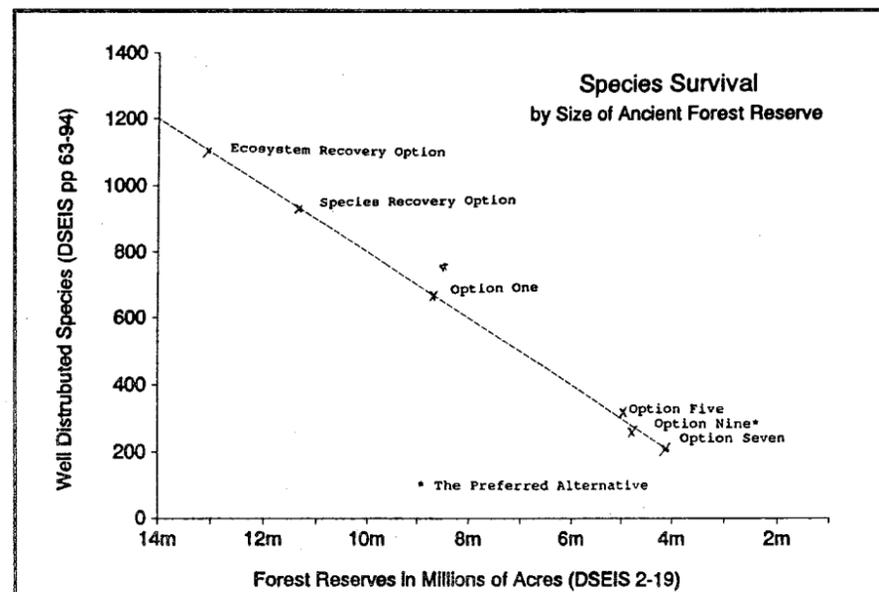
The DSEIS³ states that watersheds will recover under Option 9. But some scientists believe that most, if not all watersheds, are on a downward path and that when normal rainfall resumes, roads and denuded slopes will fail. The Elk River watershed analysis, claimed as a model for watershed restoration, is in fact a highly controversial failure, which many believe was merely justification for logging a fairly intact watershed. A draft watershed restoration guidance document (a companion to the FEMAT Report) is now out for comment and will be published by 11/15/93. It should be obtained by anyone with an interest in watersheds.

The historical pattern of forest planning clearly shows that successive administrations attempt to establish a predetermined level of logging on public land, and then apply endangered species protection to whatever habitat remains; rather than adhere to clear legal mandates by setting aside land for the survival of species and then scheduling any logging on what land is left. This practice is continued in the Clinton Forest Plan. This administration, and the scientific and environmental communities, must face the fact that billions of board feet more of timber cannot be cut in the Pacific Northwest National Forests unless a number of environmental laws are repealed.

Despite 1800 pages we still have no answer to the basic question that should have been asked: what is the maximum amount of species protection that is yet possible on federal lands? The conclusion the data suggests is not even mentioned in the report: except thinning for restoration and fire prevention, further logging of National Forests in the Pacific Northwest should probably be ended; restrictions on private land logging imposed; and timber sales sold but not yet cut repurchased.

As a practical matter, this report may be consigned to the dumpster by a current timber industry lawsuit. The briefs and affidavits filed in that suit allege widespread illegal administrative procedures by the DSEIS and FEMAT teams. Lawyers familiar with the suit say the timber industry case is strong.

The fast track this DSEIS is on guarantees that the public comment period is a sham. A report of a meeting of Forest Service supervisors on 9/1/93 says that the Final SEIS will be filed with the EPA on 11/19/93. How can the team possibly assimilate and weigh the comments that arrive during the legal comment period when the schedule it follows requires that final decisions are made before the comment period ends on 10/28/93? The response of the interagency DSEIS team to phone calls asking that the comment period, which began 7/28/93, be extended because so many people received their DSEIS late or not at all was that the final Record Of Decision must be ready for Judge Dwyer by 12/31/93. It is just one of the plan's many ironies that the interagency DSEIS team feels compelled to bend and break NEPA rules to get the document to Judge Dwyer; yet the reason



*Species survival is highly correlated with reserve size, (FEMAT II-29. $R^2 = .98$) and inversely correlated with volume of logging.

*Options One, Five, Seven, and Nine are detailed in FEMAT.

*The "Species Recovery Option" would combine no logging on public lands with an aggressive restoration program.

*The "Ecosystem Recovery Option" would expand on the Species Recovery Option by extending protective reserves and changes in management to some private lands. Approximately 1.5 million acres of private land need to be placed in reserves.

Yearly probable sale quantities (logging volume) on public lands are:

Option Seven	1.8 bbft
Option Five	1.0
Option Nine	1.2
Option One	0.2
Species Option	0.0

*The Ecosystem Option would entail "negative" public land logging, through repurchase of sold but uncut sales, and purchases of private lands.

Chart Courtesy of David Bayles

they must go before the Judge is because the agencies were found guilty of a consistent pattern of NEPA and NFMA violations.

The whole issue of adherence to NEPA involves the question of species viability, yet DSEIS reviewers have no access to process records or minutes of deliberations, and so cannot know the identity of species viability raters. Since the scientists' individual species ratings are not given, only averages of panels are provided, reviewers do not know the ranges of viability ratings for individual species. Displaying averages leads to some very misleading and overconfident predictions. For example, we are told that the 80% viability rating for spotted owls was an average of four scientists' opinions. One of the raters was an industry scientist who ranked Option 9's ability to protect Northern Spotted Owls at 100%. Two other scientists gave estimates of only 60%. So 80% is just an average of widely divergent numbers. If the divergence in ratings is widespread, this would indicate that the model and methodology are probably flawed and should not be considered as accurate.

No credible peer review of the document was done. One scientist said that the FEMAT research methodology was too poor to be published in a scientific journal. Usually in a scientific process the results and methodology are sent to an independent scientific body or journal who then chooses the scientists who will do the peer review. While the authors can suggest the peer reviewers, they don't actually select them. FEMAT's authors selected the peer reviewers, gave them little or no time to comment, and won't release their comments. This is not a new phenomenon.

The Forest Service and BLM have historically refused to subject the models, methodology and conclusion of their scientific studies to bona fide peer review. It is unlikely the scientific community will ever formally object to this since logging, directly or indirectly, funds much of the "research and science" at state, federal and university level.⁴

While the many process violations of this report are disturbing, it is the substance that is truly appalling. One thing that jumps out of the report is the several thousand viability ratings that show Option 1 protects every species better than Option 9;⁵ but, when the writers rank all the Options together, miraculously, Option 9 does better than Option 1 in terms of the entire ecosystem. How can this be? Is Option 9 a neutron bomb that destroys species without harming the ecosystem?

The key to understanding this plan is to tease out the underlying drivers behind the viability ratings that implicitly or explicitly treat Option 9's high logging levels as a plus for the ecosystem and Option 1's inviolate reserves as bad for the ecosystem. (Option 1 produces the lowest timber volume available for continued cutting and the largest reserves. It is similar to Option 14C in the Gang of Four report, but with better stream buffers.)

One alleged plus for Option 9 was to posit that the forest is so damaged silvicultural restoration is necessary to restore its function. Since the biggest reserves are in Option 1, and they are assumed to be closed to "restoration", this means that even thinning plantations to protect against fire is not possible in Option 1. On the other hand, Option 9 allows "restoration" activities

in reserves.

Another imagined plus, available only in Option 9, is Adaptive Management Areas (AMA's). Now, although AMA's might strike activists as merely turning forests over to the same locals that caused the problems in the first place; the scientists who did the ratings assumed they could somehow trade reduced protection on federal lands in AMA's for increased protections on adjacent private lands. Clearly, Adaptive Management Areas represent the triumph of hope over experience. The Applegate Project, which served as a model for this idea, is still in its honeymoon stage, and hasn't proved anything except that injunctions make the industry sit down and talk. A better model would have been any of the unsuccessful experiments like the Illinois River Basin or the Shasta Costa Roadless Area, or any of the several other community planning efforts that have come to impasse and failure. The sham public participation in this DSEIS/FEMAT process is probably a harbinger of what can be expected in the AMA public participation process.

Another assumed plus for Option 9 is the assumption that long term ecosystem health is contingent on forest ecologist's logging experiments! They appear to have credited in advance the knowledge scientists expect to gain about ecosystems from AMA's and incorporated this dubious rationale into the ratings.⁶ In numerous places in the plan they admit they have very little knowledge about old growth ecosystems and it will be a long time before they acquire it. How many trees will be left standing by the time they acquire this knowledge?

Finally, the ratings assumed that large amounts of money would be forthcoming for restoration and AMA's, and that these experiments would succeed. These speculations were then used to offset the problems Option 9's high logging levels might cause. From a process point of view the report should clearly explain the effect that future funding assumptions had on the ratings. If expected ecosystem funding is delayed or reduced, the numbers in the report will be wrong. Also, if the "experiments" fail the numbers will be off. Viability ratings should not be fluffed up by assuming funding not yet allocated, studies not yet designed, and oversight by agencies not yet reformed.

Further problems include the disturbing reports that Option 1 reserves were deliberately and sloppily drawn to increase the amount of old growth available for logging. Also, Option 9's rankings and ratings were allegedly done at different times and by different people than the other Options.

Once they had claimed such enormous real or imagined benefits for thinning in preserves, silvicultural restoration and AMA's, the proper, logical, and legal action for the scientists who drafted Option 9 would have been to create a new alternative for comparative purposes. That alternative should have presented how various species would fare if all logging of National Forest was stopped, except to convert plantations and fire suppressed stands back to their natural uneven aged condition.

This other alternative could have displayed the effects of no logging at all in National Forests. This would have

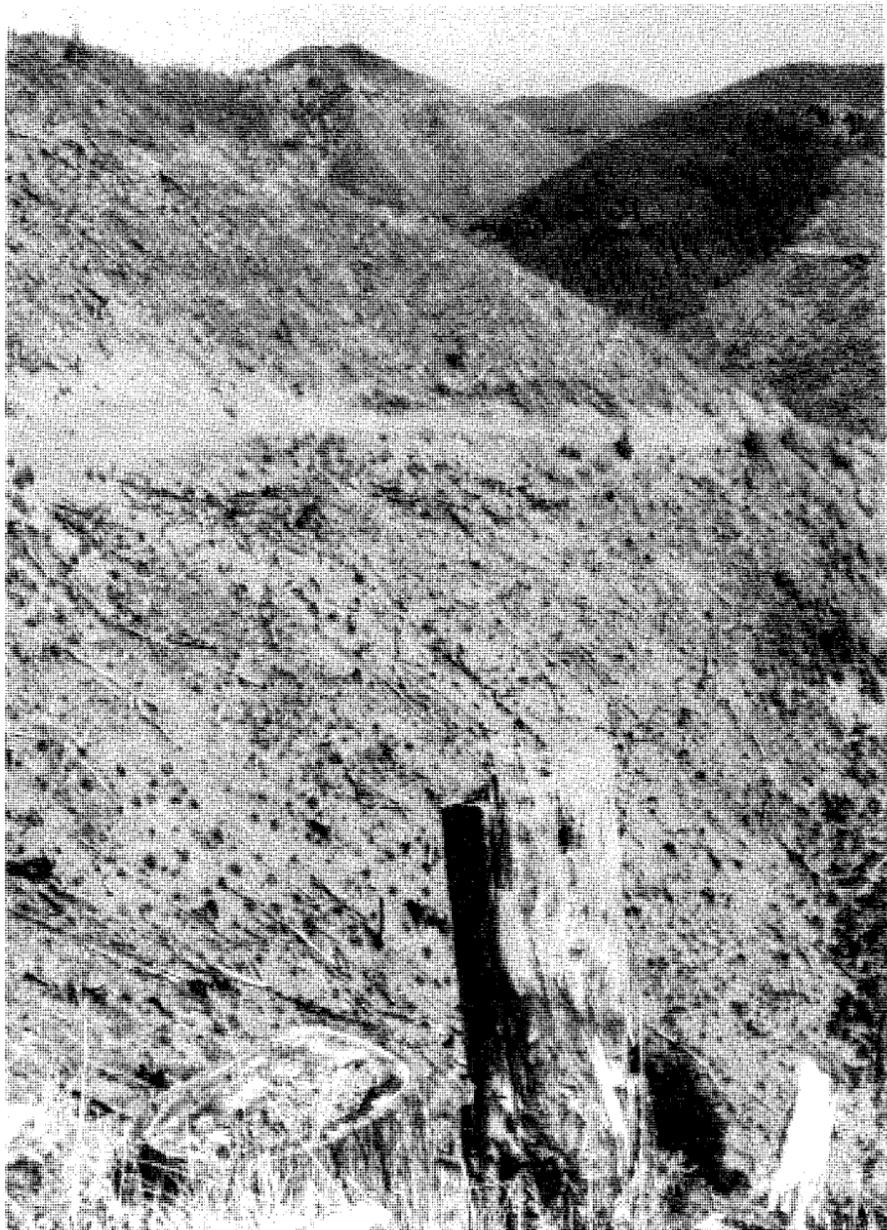
been a more appropriate, not to mention legal, way to satisfy the NEPA requirement that a "no action" alternative be considered in writing EIS's. As it is, the "no action" alternative in the DSEIS (Option 7) assumes implementing existing Forest Plans. This is an oxymoron if there ever was one since the report's analysis shows that Option 7 is devastating for species and doesn't meet NFMA, or NEPA. How could this constitute the alternative that shows the decision maker what the results of "no action" would be?

A Distressing Development

The FEMAT team leaders have said repeatedly that all species cannot be saved. What hats do they wear when they say this: scientist? politician? acting chief of the Forest Service? What assumptions lie behind this? A dangerous threshold is crossed when key scientists, with scant political experience, decide it is politically impossible or too expensive, to save species. These are decisions for politicians and the public to make. Scientists owe it to their fellow citizens to at least lay out an alternative that shows what is possible on public and private lands, especially since the FEMAT report⁷ displays public opinion polls showing that the American public and the citizens of the Pacific Northwest clearly want strong protection for federal forests. The issue is not whether all species can be saved or that some species depend on private land over which the Forest Service has no control: the issue is how much protection can be found for species that depend on federal land.

Confusion has arisen about how many species are evaluated in the DSEIS, and how they fare under Options 1 and 9. Some have said that 1000 species were rated and 100 were put at risk from Option 9. Actually, many thousands of species were rated and Option 9 creates problems for many hundreds of them. Confusion arises because, in the long lists of species, some individual entries are really groups of species. For example, Lichens: table IV-18 rates only 16 Lichens, but these represent 125 different species. Fungi: table IV-17 rates 48 Fungi, but this represents almost 600 individual species. An overall assessment of the Clinton Plan's effect on species needs to be done.

We can tell from even a cursory review that there is no question that Option 9 is much worse for all Ancient Forest dependent species than Option 1. For example, 46 species of Lichens, which show over a 50% chance of surviving in a well distributed fashion under Option 1, have less than a 50% chance under Option 9. 62 species of Fungi have a better than 50% average of surviving well distributed under Option 1, but less than 50% under Option 9. 71 species of Mollusks drop from better than 50% under Option 1, to less than 50% under Option 9. And we are not talking about marginal changes. These Mollusk ratings are typically about 70% under Option 1 versus about 30% under Option 9. Not only these species that scientists call "low lifes" are affected, most fish ratings drop from 80% under Option 1 to 65% under Option 9. So the specific question is not whether we can save all species, but why can't we try to save the ones we still have?



Olympic National Forest. Photo by Elizabeth Feryl

The answer appears to be that the Forest Service views forests as merely an agricultural commodity, the extraction of which is hindered by inconvenient rules on endangered species. The Forest Service receives the bulk of its money for administering programs, everything from restoring fish runs to training staff, from cutting trees—they know it and so does everyone else. Some may assert that there's much we don't know about these forests and that if scientists can't do logging experiments the ecosystem is put at mortal risk, but we now know enough to know that deforestation is bad for many species. The real threat to our forests is that our leading scientists still refuse to say so.

How Did The Clinton Forest Plan Go Off Track?

The problems with this DSEIS began at the forest summit when historian Kimbark MacColl was asked by the White House to tone down his prepared opening remarks because they were too critical of the timber industry. If the summit had been a real hearing that followed the rules of evidence, the anguished and heartbreaking testimony about mill closures would have been followed by cross examination. We would have learned the real reasons the mills closed; e.g. that the mill in Arcata was replaced by one in Chile.

That Dillard, Oregon, where the heartbreaking pictures of a displaced timber family were taken, is a town dominated by Roseburg Forest Products, a company that exports wood chips to Japan.

That Pacific Lumber and Shipping, whose representative Mr. Spence was very impassioned about the need to resume federal log sales in the Gifford Pinchot National Forest where his company is a major buyer, is a major exporter of timber.

The Mayor of Hoquiam, Washington said the largest mill in her town closed because of injunctions over federal timber, but a Washington State government report concluded that: "lack of investment in new equipment was the prime cause of the closure."

If we allow the issue of timber "harvest" to devolve from science to essentially a welfare issue, to be decided on the basis of human need, then we need to apply the standards of proof and evidence that any welfare office would apply. We would not allow a welfare claim on the basis of photographs and anecdotes, but that is exactly what the Clinton Plan does.

Many activists hoped that the unraveling of the forest ecosystem created by the collusion of the timber industry, federal land managers and local politicians would finally be exposed at the summit for the whole country to see. Alas, it was not. Of course, sometimes it's best in public policy debates to accept the fact that mistakes were made and go forward without assessing guilt. But this is practicable only when the parties have genuinely agreed on a new path. From observing the timber industry public relations during and after the conference it's hard to see where they admit they have made mistakes. And if the Forest Service has changed their approach to forest management since Clinton's election, it certainly has not been visible on



Gifford Pinchot National Forest. Photo by Elizabeth Peryl

the ground. This is not surprising because the current process holds thousands of timber and Forest Service families hostage to timber cutting. As a local ranger recently said to her staff, "If you want to keep your jobs you better start making stumps".

The new administration is willing to acknowledge that the forest problem is about more than just spotted owls, but is no more willing to publicly surface the underlying issues than its predecessors. They repeat the same old canards: "Maybe people did some bad things in the past, but we have to go forward." "Guilt is everywhere and nowhere." "Preservationist and devastationist arguments are equally valid." "Both sides are equally guilty of extreme demands." Except of course, large employers like Weyerhaeuser who are senior members at the table are to be treated with utmost respect.

Other Issues

One of the less examined aspects of the Clinton Forest Plan is a program of economic development to ease the transition of rural communities impacted by the so called "timber crisis". The intent is to fast track the awarding of hundreds of millions of dollars to rural counties and communities in the Pacific Northwest.

Rural development means condo's, docks, RV parks, dams, gas lines, water mains, paid staff for the chamber of commerce and generally increasing the population of rural areas—all projects that benefit the right wing leadership of rural areas, not unemployed timber workers. Projects envisioned as "infrastructure development" may well do more damage in the floodplains and estuaries of Northwest rivers than Forest Service clear cutting has ever done in the head waters. Even more ironic and tragic, the prime beneficiaries of these projects may well be the same individuals and companies who have profited from exporting logs from private land. Just as sending food to third world countries for starving children usually means enriching the local warlords; so too, money sent to rural areas primarily benefits the rural oligarchy. It

is ironic that a Democratic administration would develop a pork barrel program whose prime beneficiaries are its most virulent adversaries.

Additional Points

1. Are reserves for Martens, Pileated woodpecker and other late-successional species already in the Forest Plans canceled and returned to the matrix?⁸

2. How much of the volume of 1.2 billion comes from Ancient Forest in the short term and long term?⁹

3. Who paneled which Options, especially Option 9? When and how did they do it? Were the ratings changed? Many tables imply a level of accuracy that simply does not reside in the data.

4. The legal basis of this Plan needs to be analyzed, especially the possibility that the ratings in Option 9 were artificially inflated by assumptions of unrealistic future funding.

5. Are the Option 1 reserves drawn to include more non-ancient forest and cut over areas than one would expect, thus artificially reducing the land base and the volume available in this Option? Further, the agencies are now in the process of "revising" the reserve boundaries so maps included with the DSEIS are not final.

6. The FEMAT Report¹⁰ takes shots at scientists who advocate policy. Since this report is essentially a political document, not a scientific one, this is the pot calling the kettle black.

7. Because of the internal logic of the Plan, and the way thinning is credited as a big "benefit", advocating changes in these Options is very complicated. If Option 1's reserves could be entered for thinning, its viability ratings would increase. If Option 9 was only "improved" by making its preserves inviolate, its ecosystem viability ratings would fall. If all the changes were made to Option 9 that some activists suggest, the result would be to convert Option 9 to Option 1.

8. The Clinton Plan increases agency discretion about where and how to log, despite a long track record of abuse of any discretion that has ever

been granted.

9. The Plan avoids preserve protection in favor of complex procedural prescriptions that require careful monitoring, despite clear evidence that the agencies are institutionally incapable of monitoring themselves.

10. The volume mills claim they need to avoid shutdown can be found on the Pacific Northwest export docks, where the equivalent of 9 billion board feet of logs, chips and pulp is exported yearly.

11. The Clinton Forest Plan is not science. It is a template for the destruction of most of the Pacific Northwest's remaining native forests - and will demoralize forest activists around the world.

A Final Note

The political process must reflect balance, as must a person or an ecosystem, but that does not mean that every part of the system must itself be in balance or take a balanced position. It is the overall system that must have balance. If you wish to balance a teeter-totter and a big fat person is sitting at one end, you will not create balance if you sit in the middle. You must sit far out at the other end. Powerful forces want it all, and are getting it.

Footnotes

¹ The DSEIS includes the *Forest Ecosystem Management: An Ecological, Economic, and Social Assessment*; the Report of the Forest Ecosystem Management Assessment Team (FEMAT Report). Option 9 of the DSEIS is the preferred alternative.

² The DSEIS classifies as late successional forest trees 21 inches and up. The amount of multi-story late successional forest is shown in table IV-10 as 4.5 million acres, and the report says that 20% of this is in the matrix (open for logging). But what activists think of as Ancient Forest - 36" dbh and larger multi-story canopy—constitutes only 2.5 million acres. The real question is what percent of that is in the matrix? Data currently being compiled will probably show 30-40% of the true Ancient Forest in the matrix. Another reason for the 20-40% discrepancy is that the grids used to calculate the amount of late successional forest were 40 acres in size and thus may have overlooked smaller stands and left them in the matrix. In any case, the estimates in the DSEIS are clearly labeled "error prone", and "non-field verified". At this point, the 10 year old debate about what data base to use in calculating the amount of Ancient Forest, where it is, and how to define it is still unresolved. Until mutually agreed upon numbers are developed, the best estimate is that from 20-40% of the remaining Ancient Forest is at risk under this plan.

Continued on Page 18

Oregon Native Compares Northern Forest Issues With Fight to Save Pacific Northwest Old Growth

As a native Oregonian now ensconced in the relative security of the Adirondack Park, I have read the last seven numbers of the *Forum* with growing approval of a coherent ethic of healing—and just as I have read the *Forest Voice* and *Forest Watch* (publications of the Native Forest Council and Cascade Holistic Economic Consultants respectively) with growing dismay at the story of escalating conflict and unabated attrition in the mountains of my youth. But I am also struck by a growing sense of irony that however different the cultures and ecologies of the two regions may appear to be, the northern forests of New Hampshire, Maine, Vermont and New York and those of the Cascades and Rockies only occupy two different periods of the same old historical cycle: after and before the obvious end of unsustainable resource exploitation.

The circumstances “after” include forests so decimated and watersheds so damaged and local economies so impoverished after the capital and jobs have moved elsewhere that no sane person could deny that serious wrong has been done, that behavior must change. Whereas these are the circumstances that enable the *Forum* plausibly to ask, “can the environmental community and the timber industry work together for sustainable natural and human communities in the northern forests?” there is simply too much valuable, “unprotected” old growth timber remaining in the West (at least 3% of the pre-settlement stands) for industry’s appetite to diminish, and the only way to protect any of it is by repetitive, rear-guard litigation.

And this litigation must be waged against not just the industry itself, but against the Federal Government that is its staunch ally because the last fragments of merchantable old growth remain on National lands as publicly-owned timber that has long been sold below cost by the Forest Service and BLM to enrich private interests (and by the way to sustain local economies . . . for as long as trees remain to be cut, that is.) Even the option of litigation diminishes as the Clinton Administration and Congress threaten “sufficiency legislation” to suspend their own environmental protection laws in order to maintain a level of cutting that their own agencies and scientists have determined is unsustainable.

Clinton Plan

Continued from Page 17

³ DSEIS Chs. 3&4, Pgs 48,49

⁴ The FEMAT Report was prepared under the supervision of Jack Ward Thomas [Ed Note: Recently Dr. Thomas was appointed as the new Chief of the US Forest Service] and Jerry Franklin, two scientists whose pioneering work is largely responsible for there being any Ancient Forest left to fight about. We owe them a lot. While they displayed the 10 Options, they did not select the preferred Option. Neither has publicly endorsed Option 9. Since the deliberations of this team are sealed, it is not possible to know how the team could have such good people and such a bad result.

⁵ These viability ratings express in percents the likelihood for survival of over one thousand species under the 10 DSEIS Options. For example, the Silver Haired bat has a 53% likelihood of surviving across its range under Option 9 and 98% under Option 1. Some species are so dependent on private land or so rare that apparently nothing land managers do with federal lands alone can save them now.

⁶ DSEIS Chs. 3&4, pg. 40-46

⁷ FEMAT Report ch. VII, pgs 29-31

⁸ FEMAT Report ch. III, pg. 23

⁹ FEMAT Report ch. VI, pg. 9

¹⁰ FEMAT Report ch. VII, pg. 112

In such a climate to ask the *Forum*’s above question is as plausible as walking into the middle of a barroom brawl with the gently reasonable suggestion that folks really ought to be kinder to each other.

Whereas the Northern Forest Lands Council’s “Findings and Options,” for all their timidity and evasions, still represent the beginnings of a constructive regional dialogue, the “Unified Reserve System” (Option 9) that emerged from Clinton’s Northwest “Timber Summit” last August is a politically expedient imposition rather than a long-term rationally negotiated solution precisely because there are still immense profits to be had—and some jobs that can be maintained—for perhaps another decade. So now every interest group in that benighted region laments that the baby was cut in half, that whatever futures exist within their separate purviews have all been unconscionably compromised.

In the miraculously resilient forests of the Northeast where virtually no uncut or roadless areas remain, the *Forum* can persuasively argue the need for a network of large, buffered, connected and unmanaged reserves to protect ecological integrity. But the current solution for the remnants of slower-growing native forests on the steep slopes and unstable soils of the Northwest rejected all of the options presented by Jack Ward Thomas the eminent Forest Service wildlife biologist who also insists that an interconnected network of unmanaged old growth and riparian reserves is necessary to preserve the ecosystem of temperate forests.

Thomas, whose writing in the ‘70s first popularized the term “ecosystem management,” believes that “old growth represents a unique community of plants and animals . . . No one has produced an old growth stand through forest management.” Instead, the Clinton administration endorsed the more utilitarian option of Jerry Franklin, a forest ecologist who believes that “old growth

is [not] much more important or better than later stages of a mature forest in providing services to the environment . . . If we are good with our forest management we can perpetuate some of the characteristics of old growth without actually perpetuating the old growth forest.”

The choice appeared clear to Clinton’s mediators between the eight options offered by the philosophical heir of Aldo Leopold, conservatively intent upon saving all the pieces, and the single option of Gifford Pinchot’s ideological descendant, invincibly optimistic about the unproved ability of scientific management to manipulate incompletely understood ecological systems. The choice was particularly clear when the alternatives endorsed very different levels of cutting (see *Forest Watch* 14:1 July ‘93; Alexander Cockburn in *The Nation* 23/30 August 93 p. 199, & *Wild Forest Review*, November 1993).

So the “integrated management” of Franklin’s preferred Option 9 calls only for “reserves” that will be open to salvaging and thinning. Under this plan fully forty percent of the remaining five million acres west of the Cascades is scheduled to be cut with none of the other sixty percent inviolate; moreover there will be increased cutting on the eastside forests, more intensive cutting on the already-decimated “matrix” lands between the so-called “reserves,” no prohibition on clearcutting in roadless watersheds or ban on raw log exports, and relaxed restrictions on cutting private lands. Those who are willfully ignorant of the past are indeed condemned to repeat its errors.

The Northwest has much to learn from the history of the Northeast. I imagine that if the citizens of Roseburg, Oregon could trade places for six months with folks in Rumford Maine they might realize their own future and shape it to their children’s benefit. But life is just not that wonderful. People only seem able—as enough New Yorkers did in the Adirondacks of the

1890s—to see the future in the present savaged landscape, and if they are students of human nature then they prescribe by constitutional covenant the commercial exploitation of some public lands.

Because my cynicism only seems confirmed as I learn to wear the bottom of my trousers rolled, I do not believe that biological integrity can be adequately protected by conservation easements or by existing-use zoning or even by full-fee public acquisition alone. History shows that they can be too readily subverted by the predictable avarice of special interest-driven legislation and too readily endured by a citizenry who have relinquished the control over their own destiny that is their birthright. I do believe, however, that the travails of both human and non-human citizens are tragically intertwined and my intuition tells me that the ways in which we treat the land are historically intertwined with the ways in which we treat one another by class, race, gender, and even age as communities, as families, and as neighbors.

—Michael Wilson

Michael Wilson is Assistant Director of Sagamore Historic Great Camp in Raquette Lake, NY in the heart of the Adirondack Park.

Stay Informed

Two first-rate publications are essential reading to remain abreast of the unfolding tragedy in the Pacific Northwest:

Forest Voice

Native Forest Council
POB 2171
Eugene, OR 97402
Membership: \$25/year

Wild Forest Review

Save the West, Inc.
3758 SE Milwaukie
Portland, OR 97202
\$25/year (11 issues)



Olympic National Forest, Hood Canal Ranger District. Photo by Elizabeth Feryl

Old Growth in the East: An Extraordinary Reference Tool

It is common knowledge that we have cut down over 99.9 percent of the old growth of the Northern Appalachians (compared with Brazil's cutting of perhaps 30 percent of its rain forests). What is not common knowledge is that there remain pockets of old growth scattered throughout the region that range in size from an acre to 5,000 and even one 50,000 acre tract in the Adirondacks.

In *Old Growth in the East: A Survey*, Mary Byrd Davis has performed heroic service by assembling the most exhaustive and detailed descriptions of all known old growth stands east of the Rockies. This extraordinary work is the product of a dedicated detective, and if it is already somewhat out of date, that is *only* because old growth sleuths such as Mary Davis and Robert T. Leverett have already uncovered additional old growth stands since this book was published in August 1993.

Leverett's excellent Foreword, "Eastern Old Growth: A New Perspective," traces the demise of the original eastern forest, discusses how much old growth remains and the thorny issue of defining old growth; he describes some old growth characteristics such as: old trees, downed logs and standing snags, undisturbed soils, representative species distribution, and absence of human intervention. He then describes how an old growth sleuth can recognize old growth and discover additional tracts. He concludes with an assessment of the value of eastern old growth.

The remainder of the book is the survey of old growth region by region and state by state. Each state receives an introductory note, followed by descriptions of every known stand of old growth. Davis provides extensive scientific documentation along the way.

If you have any interest in Eastern old growth, this book is a must. With proper study, you can discover additional old growth stands for the second edition.

Old Growth in the East: A Survey is available for \$20 (postpaid) from the publisher: Wild Earth, POB 455, Richmond, VT 05477.

Below, we offer selections from five Northern Appalachian states.

—Jamie Sayen

Maine

Big Reed Forest Preserve

North-central Maine (Piscataquis County)

Some 5000 acres acquired by The Nature Conservancy in two transactions. The Conservancy's Keil Stockwell says that "most" of the acreage is old growth. The 5000 acres, which surround Big Reed Pond, constitute a natural mixed mosaic of the forest types in Maine, including spruce-fir, northern hardwoods, cedar swamps, and rich woods. In having the whole range in one area, the site is unique, according to Lissa Widoff, who helped the Conservancy make its purchase. She feels that Big Reed Pond is "definitely the largest" mid-to low-elevation old growth in the state, and that it is probably virgin (1990). Cogbill reports that the "area has a documented history showing only spotty removal of scat-

OLD GROWTH IN THE EAST

A SURVEY

Mary Byrd Davis



Foreword by Robert T. Leverett

tered pine and cedar 110 to 70 years ago."

"The nature of the original landscape" in the Northeast "can perhaps best be seen" at the Preserve, according to Cogbill. The forest is approximately 45% softwoods, 25% hardwoods, 25% mixed woods, and 5% cedar swamps. Spruce and Sugar Maple are dominants. The area has suffered major disturbances, including a widespread fire in 1816, insect infestation in 1805-10 and 1916-21, a hurricane in 1815, and more recent blowdowns. Thus the forest illustrates that "northern forests were always extensively disturbed" (Cogbill 1993b).

During the last five years, the land around Big Reed Preserve has been logged by the company that owns it. According to Cogbill, whether or not any old growth was cut is unclear (1993a).

Massachusetts

Cold River Watershed (Berkshire County)

•**West of Black Brook.** Between 150 and 200 acres of outstanding old growth dominated by Eastern Hemlock, Red Spruce, and northern hardwoods in Savoy Mountain State Forest. Trees that have become old and large include Eastern Hemlock, Red Spruce, White Ash, Yellow Birch, Sugar Maple, and Red Maple. Hemlocks date to 400 years. In addition to the primary acreage, the area offers at least another 200 acres of secondary old growth.

Marginal old growth exceeds 500 acres.

•**East of Black Brook.** Between 30 and 50 acres of Eastern Hemlock and northern hardwoods in Mohawk Trail State Forest. The old growth runs in an irregularly shaped band below the summit of the ridge. Red Spruce is present as a minor component. Like Cold River West, this tract contains large old trees. The area has excellent examples of old-growth Sweet Birch. Secondary old growth adds another 50 to 75 acres. Marginal old growth has not been determined.

New Hampshire

Nash Stream Forest, northern New Hampshire (Coos County)

Almost 8000 acres of high-elevation spruce-fir forest, the bulk of which has never been harvested. The forest is part of a 40,000-acre property acquired through a joint effort in which the state of New Hampshire, the federal government, and the Trust for New Hampshire Lands participated. The state now owns Nash Stream Forest and the state's Bureau of Forestry manages it; but the US government holds a conservation easement, which the White Mountain National Forest administers. Within Nash Stream Forest, on upper Sugar Loaf Mountain, are several hundred acres of old-growth northern hardwoods. This site is the only old-growth hardwood stand in the 40,000 acre purchase (Miner 1993).

New York

Five Ponds Wilderness, west-central Adirondacks

•**Southern Five Ponds Wilderness** (Herkimer and Hamilton Counties). The largest known contiguous tract of unlogged forest in the Northeast. Acreage figures differ. For example, George Davis describes as old growth the southern half of this Wilderness: 47,326 acres in Herkimer County; J. Roman describes 20,000 hectares or 49,421 acres in Herkimer and Hamilton Counties, and quotes the Commissioners of Fisheries, Game, and Forest writing in 1896 of a purchase of 50,125 acres (1980).

Roman, who studied the area for a 1980 doctoral dissertation, described four forest communities: poor fen, rich fen, upland conifer, and upland mixed. In the poor fens are Black Spruce, Red Spruce, Tamarack, and Balsam Fir. Red Spruce and Balsam Fir are almost the only trees in the rich fens. Upland conifer stands are dominated by White Pine, "some of which are huge and form a super-canopy." (Pine Ridge, south of High Falls, and Five Ponds and Cranberry eskers are outstanding for their pines.) Among the upland mixed communities are beech-maple mesic, hemlock-northern hardwood, and spruce-northern hardwood forests. Fire and storms have disturbed the area as have outbreaks of spruce budworm and beech scale.

The state bought the Webb Tract to settle a claim for damages brought by a land owner who charged that construction of a dam on the Beaver River had prevented his shipping and therefore selling the timber on his land. Later the Adirondack Park Agency combined the tract with 12,000 acres in St. Lawrence County to form Five Ponds Wilderness Area (Leopold et al. 1988, Roman 1980, Jamieson 1993).

Vermont

Green Mountain National Forest

•**The Cape**, also known as Lookoff Mountain, eastern Vermont (Rutland County). A 285-acre proposed Research Natural Area with old-growth, rich northern hardwoods forest. The location is a ridge top and a steep slope that faces west. On the ridge top the dominant species are American Beech, Sugar Maple, and Yellow Birch. Red Spruce and Yellow Birch dominate the upper slopes; Sugar Maple, the middle and lower slopes. The last are covered with deep soils and wildflowers.

•**White Rocks**, eastern Vermont (Rutland County)

Approximately 270 acres of Red Spruce on steep talus slopes. Trees are up to 25 inches in diameter, though most are 6 to 11 inches in diameter. Ages range from 145 to 155 years. *Significant Ecological Features of the Appalachian Trail Corridor* describes the site as old-growth (Nongame 1991), but the Vermont Natural Heritage Program says that more research is needed to determine the site's status (Marshall 1993).

Sears Island Woodchip Port Will Degrade Forest & Marine Ecosystems

by Ron Huber

International wood traders have big plans for Maine; they hope to move into large scale hardwood woodchip exporting before local communities and environmental activists can organize to stop them.

Transportation and international trade interests, combined with the wood product industry, have been having an extraordinary impact on hardwood ecosystems in the southeastern United States. Now they are promoting the export of hardwood chips from a wide swath of Maine. With large amounts of unprocessed softwood logs already going overseas or simply crossing the border into Quebec, exports of chipped beech, birch, maple, cherry, oak, and other hardwoods will dramatically increase stresses upon the economy and ecosystems of the Northern Forest.

The new plan calls for the creation of chippermills to liquidate hardwoods in two zones in Maine: a 40 mile swath along the Bangor & Aroostook Railroad, from Fort Kent south to Millinocket, and, south of Millinocket, the area within a roughly 75 mile radius of Sears Island, with Jay and Cherryfield representing western and eastern limits respectively.

Woodchips from the Fort Kent to Millinocket corridor would be transported via rail; those in the Jay to Cherryfield zone would travel by truck. Their common destination would be the

proposed cargoport on Sears Island, at the head of Penobscot Bay, where they would be offloaded into cargo ships for transport to Europe and Asia.

In the southeastern United States the international traders have found that obtaining access to American hardwoods is easy. The exporters simply outbid traditional buyers by offering slightly better prices to woodlot and forest owners for ALL their hardwoods at once. With selling decisions largely up to private woodlot owners, the siren song of quick money for "junk" hardwoods has fallen upon willing ears across the southeastern states of Alabama and Georgia.

But as foresters and local economies are painfully discovering in the south, this sort of operation quickly denudes the surrounding region of both mature and younger hardwood forests leaving local sawmills, furniture and pallet makers, and other "value-added" businesses largely out of a resource base.

In an editorial entitled "Seeing past chipmill propaganda", *The Chattanooga Times* a major Tennessee daily warned: "Chipmill operations recently proposed for Tennessee would destroy the forests that protect the region's river watershed from siltation, that nurture wildlife, that cleanse the air of pollution, that provide scenic beauty, recreation and hunting, that draw tourists, that provide hundreds of local companies saw timber for thousands of jobs, that give this region its essential

character.

"All this would vanish for just a handful of mill jobs on the river for woodchips that would be largely sent overseas, not to value-added manufacturing jobs in the United States. The woodchips would supply high tech plants abroad, the Tennessee Valley's resources used to produce higher quality goods to sell back to the U.S. market."¹

It is likely the same enticements of quick money for "junk hardwood" will be offered here for the wholesale removal of what the Maine Forest Products Council calls "underutilized" hardwood species.

Much of the hardwood forests of Maine are held by timber giants such as Bowater, which told the Maineport Council ("wise use" group for the project), "We have increased our production in Maine and as a company we have an aggressive goal for exporting. These circumstances offer considerable opportunity for Searsport."² These companies have historically viewed hardwoods as a problem more than a resource, using herbicides and burning as management tools.

A well-established international market for woodchips means that by the end of the decade, 600,000 TONS of chipped Northern Forest hardwoods could pour onto Sears Island annually by truck and train, thence via flotillas of cargo ships to the markets of Europe and Asia.³ This could require the felling of up to 62,000 acres per year, according to TAGER, a southeast organization that opposes the siting of chip mills in Tennessee, Alabama and Georgia.⁴

Supporters of the woodchip export proposal include Maine Governor John McKernan, the Maine Department of Transportation, the Bangor-Aroostook Railroad, the Bangor Investment Corp. (an arm of the Ameskeag Corp., makers of Cannon towels) and the Maine Forest Products Council.

The Maine Dept. of Transportation (MDOT), eager for a new port and increased railroad and highway construction is the state's lead agency for the project.

A Maine government source says the state's natural resource agencies, the Department of Environmental Protection and the Department of Marine Resources, have been muzzled by the governor. No employee of these agencies may make any public statements concerning the project without the governor's explicit permission.

Interestingly, rather than coming from forest conservation advocates, opposition to the proposed woodchipping of Maine has come from groups and agencies concerned about the negative effect the cargoport would have on marine and estuarine fish and shellfish in Penobscot Bay.

Regional officials of the EPA Army Corps of Engineers, National Marine Fisheries Service and US Fish and Wildlife Service are on record as staunchly opposed to the creation of the Sears Island port:

EPA: "The aquatic impacts associated with MDOT's two preferred "minimum impact" alternatives are severe, and either alternative would cause or contribute to significant degradation of waters of the United States in violation

of Section 230.10 (c) of the guidelines."⁵

Army Corps of Engineers: "The resources on Sears Island are of exceptional value and the potential impacts of the project are considerable. It is questionable whether functional replacement [of wetlands] in this case, is practical or even possible."⁶

National Marine Fisheries Service: "Both of the designs proposed by the Maine Dept. of Transportation would require extensive dredging and filling of valuable aquatic ecosystems, including eelgrass meadows, shellfish beds and shallow subtidal flats.

"The values of these habitats as foraging, shelter and nursery areas for marine species have been documented in great detail over the past two years. . . . In our judgment, the marine impacts of the project alone justify a finding that the project would cause 'significant degradation' and is thus ineligible for a Section 404 permit."⁷

US Fish & Wildlife Service: "The potential adverse impacts to fish and wildlife resources and their habitats associated with the Sears Island project are extremely serious . . . after 12 years of studying the environmental impacts associated with this project, we believe the time has come to be forthright with the MDOT and advise them that those impacts are unacceptable and violate the Clean Water Act Section 404 (b) (1) guidelines."⁸

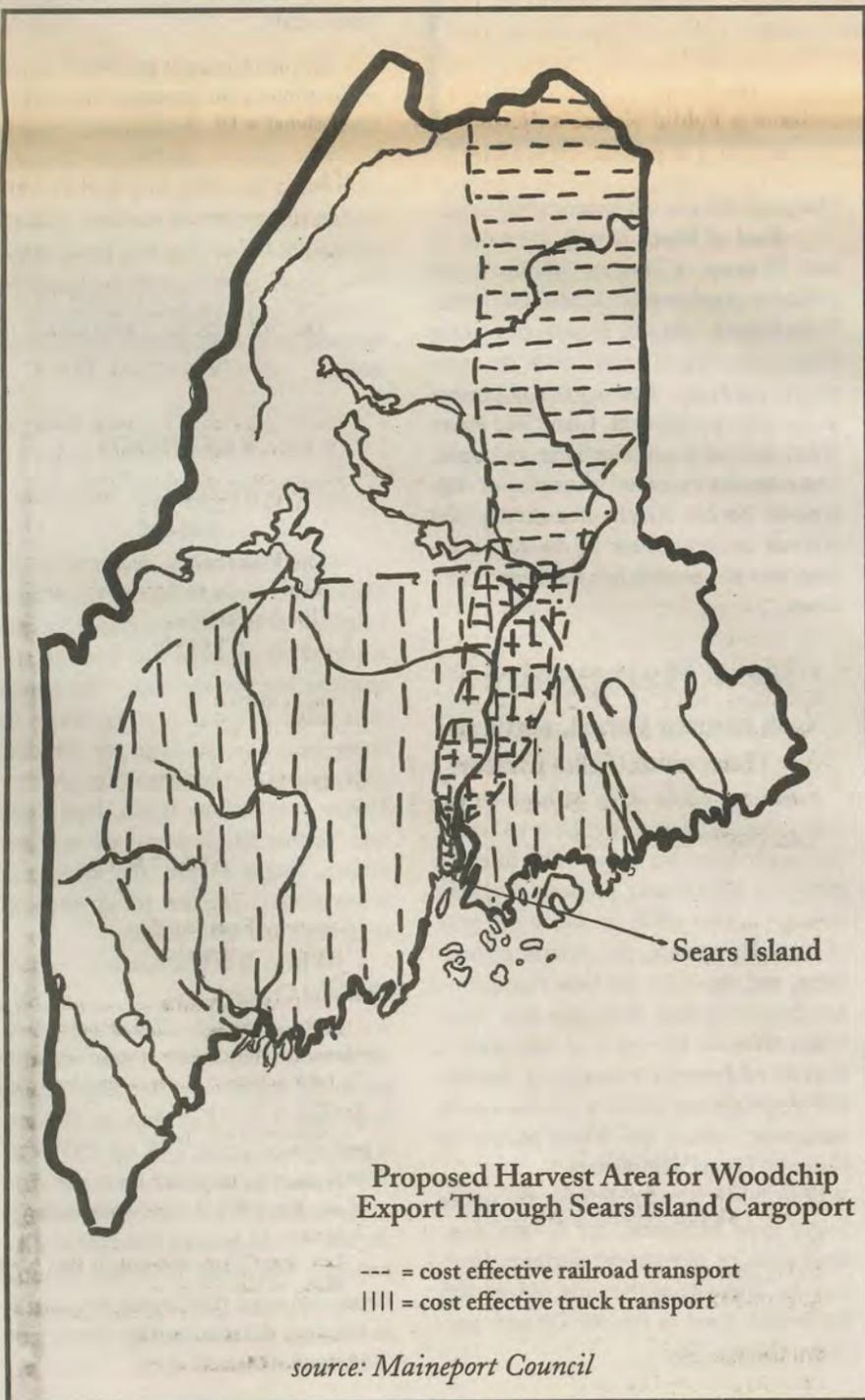
The agencies' concerns appear to be well founded. A Department of Marine Resources study in the early 1980s revealed that Penobscot Bay contains important spawning and nursery areas for the zooplankton, fish and shellfish of the Gulf of Maine. The fertile region at the head of Penobscot Bay in the vicinity of Sears Island contains a wide variety of marine habitats. Clam flats and submerged eelgrass beds may be found alongside deep (to 400') waters.

More than three dozen marine species, including copepods, shrimp, cod, haddock, flounder, mackerel, squid, smelt and herring, use the waters of this area to spawn and/or nurture their fry and juveniles.⁹

Sears Island is itself free of human habitation or structures except for a partly paved road that punches through part of its northwestern quarter, a short stone jetty on the western side of the island and a transmission tower on its southern end. Spruce and fir forest covers most of the island's 946 acres, with the rest a mosaic of hardwoods and wetlands. Vernal pools, streams, and freshwater wetlands are found throughout the island's forest, within which a host of migratory songbirds take up residence at varying times of the year.

For more than ten years, the Sierra Club has been throwing legal roadblocks in front of the project, to protect the island and Penobscot Bay. The Sierra Club appealed Army Corps of Engineers permits granted to the Maine Dept. of Transportation and successfully pressed for an EIS; and it uncovered major flaws in the commissioned EIS that nearly led to the disbarment of Normandeau Associates, the state's consultant that prepared it.

The EPA sought a grand jury inves-





Aerial view of Sears Island from the southwest looking northeast courtesy of the Environmental Air Force. Photo by Bill Siliker, Jr.

tigation in 1992 into the possibility that the MDOT and its consultants had deliberately covered up the presence of wetlands on Sears Island to get the necessary permits. The investigation was "throttled"¹⁰ by then-U.S. Attorney Richard Cohen after Senator William Cohen's and Rep. Olympia Snow's offices complained about delays in the project. The statute of limitations to prosecute ran out in December 1992.

The Natural Resources Council of Maine, on the other hand, has been conspicuously silent. The group "has no position" on Sears Island port proposal, according to NRCM's communications director, who said her personal impression was that local citizens were in favor of the project.¹¹

The Maine DOT is presently finalizing a Supplemental EIS to determine the impact the proposed port would have on more than two hundred acres of wetlands on the island.

Governor McKernan wrote the Corps in September saying that damage to the island and its surrounding waters would be an acceptable price to pay for the facility, provided that port development be followed by "mitigation."¹²

But officials of the aforementioned resource agencies point out that there has never been a successfully created artificial wetland, sea grass bed, or clam flat in New England. Not one.

The Corps of Engineers, the lead agency, is itself showing little enthusiasm for the project. Moreover the EPA has VETO authority over the Corps' decision in this case and Doug Thompson, New England regional director of the EPA, has been giving this project a big THUMBS DOWN.

Sensing the possibility of defeat, proponents of the port have begun to lash out against what they call "an EPA Boston Region One office run amok." Stet Hills, Chairman of the Maineport Council, said of the regional EPA staff, "Reasonableness and fairness no longer

exist and these staff should be removed."¹³

Frustrated woodchipping proponents have also been trying to go over the heads of regional EPA officials. In June, Governor McKernan wrote to EPA Administrator Carol Browner asking for "a fair and impartial evaluation of the new Sears Island Alternatives."¹⁴

In late September, Senators George Mitchell and William Cohen of Maine hosted a meeting in Washington DC in which proponents of the woodchip port met with headquarters staff of the EPA and the Corps of Engineers.¹⁵ The chippermill proponents appear to hope that political pressures can force an override of the regional agencies' recommendations.

In November 1993 the Coastal Waters Project petitioned the New England Fishery Management Council to comment on the SEIS and make recommendations to the Army Corps of Engineers as to the project's potential impact on cod, flounder and other species under Fishery Management Council jurisdiction.

According to the Maineport Council the current project schedule is as follows:

- 9/30/93—Draft Supplemental Environmental Impact Statement (DSEIS) circulated to federal agencies.
- 11/29/93—Section 404 permit application filed with Army Corps of Engineers by MDOT.
- 12/17/93—Federal Highway Administration ruling on DSEIS.
- 1/17/94—Public hearing on DSEIS.
- 1/31/94—DSEIS comment period ends.
- 4/25/94—Federal Highway Administration ruling on Final EIS.
- 6/6/94—FEIS comment period ends.
- 6/20/94—Federal Highway Administration Record of Decision.
- 7/20/94—Army Corps of Engineers Record of Decision.¹⁶

WHAT YOU CAN DO:

*Write the Federal Highway Administration (Address below) to get on the notification list for the availability of the Supplemental Environmental Impact Statement and to be notified when public hearings on the SEIS will be held. Testify!

The Corps of Engineers will also issue a Public Notice soliciting comments on the project since a Corps permit is required. To receive a copy of the Corps' notice, contact William Lawless at the Corps address below.

*Write Letters to: editors, the EPA, the Corps of Engineers, the National Marine Fisheries Service, USF&WS, Senators George Mitchell & Bill Cohen, Reps. Olympia Snowe & Tom Andrews.

*Urge the Natural Resources Council of Maine to be more active in the fight to protect Sears Island. Up to now the Maine chapter of the Sierra Club has been the only consistent voice of public opposition to the project. The NRCM has the resources and contacts to mobilize public opinion against the project should it decide to do so. Contact NRCM at 271 State St., Augusta, ME 04330 (1-800-287-2345).

***For more information on how to stop the Sears Island Cargoport, contact:**

Coastal Waters Project
POB 1811
Rockland, ME 04841
207 596-7693.

Ken Cline
Sierra Club of Maine
207 288-3381

Addresses

Federal Highway Administration
Edmund Muskie Federal Building
Rm 614
40 Western Ave.
Augusta ME 04330

William Lawless
Chief Regulatory Division

US Army Corps of Engineers
424 Trapelo Road
Waltham MA 02254

Senator George Mitchell/William Cohen
US Senate
Washington DC 20510

Rep. Tom Andrews/Olympia Snowe
US House of Representatives
Washington DC 20515

The following regional offices of these agencies oppose the cargoport. Drop them a line. Express support for protection of Sears Island and its terrestrial and marine inhabitants:

Paul Keogh, Acting Regional Administrator
U.S. Environmental Protection Agency
J.F. Kennedy Federal Building
Boston, MA 02203

Richard Roe, regional director
National Marine Fisheries Service
One Blackburn Drive
Gloucester, MA 01930

Ronald Lambertson
US Fish and Wildlife Service
300 Westgate Center Drive
Hadley, MA 01035-9589

References

- ¹ Chattanooga Times, 12/19/92.
- ² Maineport Chronicle, vol. 1 #1.
- ³ Ibid.
- ⁴ Denny Haldeman, TAGER, personal communication.
- ⁵ Letter From EPA region 1 to ACE 8/18/93.
- ⁶ Letter from ACE to Governor McKernan, 8/25/93.
- ⁷ Letter from National Marine Fisheries Service to ACE, 8/26/93.
- ⁸ Letter from USF&WS to ACE, 9/2/93.
- ⁹ National Fisherman Magazine, 1/83.
- ¹⁰ Portland Press Herald, 11/28/93.
- ¹¹ Judy Berk, NRCM. Personal communication, 10/31/93.
- ¹² Letter from Governor McKernan to ACE, 7/26/93.
- ¹³ Maineport Chronicle op. cit.
- ¹⁴ Letter from Governor McKernan to ACE 9/3/93.
- ¹⁵ Portland Press Herald, 9/26/93.
- ¹⁶ Maineport Chronicle, op. cit.

Democracy, Ecology & Growth-At-Any-Cost Economics

by Andrew Whittaker

The people of the Northern Forest face the choice of dedicating resources to either fueling further economic growth along conventional lines or building economies that respect natural inherent limits to growth. It is apparent that our continental and global politics are wedded to a path that in this region might mean, for instance, the fiber forest that exports hardwood chips. It is also evident that proponents and practitioners of local economics continue to struggle with the hurdles and challenges of an approach still in its problematic infancy.

In his *Inquiry Into the Human Prospect*, first published in the early 1970s, the economist Robert Heilbroner posed himself the question: "Is there hope for man?" For Heilbroner, the mass of doubts and loss of faith inspiring the question pointed to the central issue of whether humanity was in fact capable of dealing with the environmental limits to economic growth: both the explosive growth of human numbers and steady depletion of natural resources. Behind the compounding threats of "obliterative weapons," the "civilizational malaise" of material culture—capitalistic as well as socialistic, and the triumph over spirit of the scientific-technologic, Heilbroner saw our challenge to survival as, in essence, an *environmental* problem.

Champions of local economies may be disturbed by Heilbroner's dismissal of small-scale approaches to the new realities. He reluctantly concludes that burgeoning problems will, after a grace period ending soon after the turn of the century, invalidate the notion of unlimited economic growth and require the drastic action of large, centralized, and not necessarily democratic, government. Other agents will not be equal to the task.

Heilbroner's view of what survival for us and the planet necessitates is twofold. Economic rationalism, by which disregard for present and future "others" is justified in favor of current consumption, must go. Growth economics, which command ever more resources to provision an exponentially expanding population, must be replaced by either benign growth or stationary, redistributive systems. For a variety of reasons, Heilbroner does not think that the vested interests of commerce will awaken to the needs of the planet or humanity.

Very little has happened since the 1970s to encourage a more optimistic view. Leadership in the developed world is not focused on the environment; it is focused on fostering trade and the mobility of capital, acting at the behest of powerful corporations independent of loyalty to individual nations or local communities. Natural resource conservation is still viewed as ancillary to and dependent on economic growth. Environmentalists are seen as impediments and not guardians of wealth. All the trends Heilbroner identified as fueling his despairing question remain: Is there hope for man?

Is There Hope for Business?

In his latest book, *The Ecology of Commerce*, businessman Paul Hawken phrases the question of whether we can save the planet as, Can we save business? With a full catalogue of institutionalized, industrial malfeasance that threatens to swamp the planet in toxins and eliminate life forms, Hawken is every bit as jaundiced as Heilbroner but feels nevertheless that business, not government, must be the primary agent of change. Government has a role, true: it must force business to fulfill its true role of service to the people and obedience to biology.

"Good markets make good farmers," we used to say, and the truth has not changed except insofar as we seek to prove the opposite case. Bad markets make for poor commerce, says Hawken, as he illustrates how the externalization of production costs onto the environment has created artificially cheap and therefore popular products. Mispricing is a form of toxicity: any time an organism receives bad information, says Hawken, it is being poisoned. The solution is to force the internal-

ization of production costs. Doing so will, in his view, address the challenges identified by Heilbroner: creating a regard for future generations and replacing the growth mentality with a true development ethic.

The Timber Industry

How would the timber industry of northern New England respond to Hawken's proposed twenty year phase-in of green fees that would incorporate the full environmental costs of production into the prices of furniture, pallets, chips or toilet paper? What would the market forces that favored least cost production create in the place of present industry? Will green fees work?

First, there is the question of who identifies externalities. Who is to decide that a clearcut represents a taking from the future? Whose input will bring the voice of the spring peeper into the pricing of products that ruin its environment? Clearly, in proposing that "political, environmental, and business communities—everyone—...join in incorporating external costs into the market system," Hawken is calling for a reinvigorated democracy willing to inform itself and re-form commerce on an ecologic basis.

In *Beyond the Beauty Strip*, a critique of forest management in the Maine woods, Mitch Lansky out-



lines many of the costs presently avoided by the timber industry. He also outlines many avenues for greater citizen input and has, in conversation, suggested the implementation of local forest councils that would synthesize these many points of view and provide the anvil for hammering out agreement on what best represents the public interest. Such councils, if not subverted by various profit interests, would be one means of identifying and bringing true costs into product pricing.

Lansky points out that externalities are indeed a factor in encouraging destructive forest practices, such as herbicide spraying, and irresponsible papermaking, reliant on organochlorines. His analysis suggests several ways in which cost internalization may not work: how do we quantify the value of components in a biologic system where everything is important? Most of Lansky's proposals center on "shortening the lines of awareness and responsibility." In order for green fees to work, the process of determining and monetarizing impacts and setting fees at a level high enough to encourage innovative response in a sustainable direction would have to receive continuing feedback. Is the process working? What changes could make it work?

The idea of a green fee is to encourage industry toward a certain goal, sustainability. While some believe that mandating this goal directly is the best strategy—as Barry Commoner favors the outright ban

of dangerous chemicals—Hawken argues that market mechanisms are our best hope for encouraging least-environmental-cost production. As Hawken argues, the ability to evolve is a necessary ingredient in the taxation of externalities, and the implication is that in order to evolve, a vision of sustainability must be agreed upon at the outset.

To this end, *The Ecology of Commerce* also advocates re-newing the chartering of companies, subject to public review. In return for the life granted them by public consent to their operations, corporations would have to meet the needs of the public—and not merely those expressed in the marketplace. Land holding timber companies would have to earn their legal protection as incorporated entities by safeguarding public health, wealth and welfare. Repeated offenses would result in revocation of license to operate. Likewise, manufacturers would have to meet basic requirements in order to satisfy public review.

To businesses, Hawken concedes the point that this sounds like the ultimate hell of over-regulation. However, he says, it is up to business to realize that over-regulation is the net result of bad corporate behavior and that further bad behavior will merely invite more regulation. The solution is to set simple ground rules, easy to adhere to, but inviolably protecting the common good.

With commercial character thus amended toward basic goodness, it is up to green fees, progressively phased in over a twenty year period, to impel business toward green behavior. With each year, a paper-maker might be faced with rising procurement costs for spruce-fir or other virgin pulp, a steepening energy bill, and discharge taxes on various effluents (for the sake of argument, we'll concede that outright bans on more toxic substances have been accepted as part of corporate chartering). Change to cleaner methods will have been thus made a necessary prerequisite of achieving a competitively priced product, or, put another way, remaining in business.

It is hard to predict what low-cost production methods might be. Companies intent on avoiding change will argue that the paper industry will leave northern New York and New England under the added strictures of green fees, but let us suppose that the new methods of taxation and regulation are universal. For instance, the price of paper products from Siberia would, in order to reach our markets, have to reflect the costs to the environment there—and today that price would be prohibitive, were the accounting procedure to reflect the reality of millions of acres being clearcut and the existence of such species as the Siberian tiger threatened. Prices of pulp from the Southern states would have to reflect the biologic costs of plantation silviculture. The necessary change from today's situation would be that industry, although it might fold, could not flee to an area willing to sell itself cheap. Thus, we see that green fees require the very thing presently weakened by NAFTA and GATT: the sovereignty of the environment over considerations of trade.

Could New England business re-invent the paper trade? Steepening of energy taxes would create incentive for the kind of industrial ecology envisioned by Hawken. A paper producer might integrate with other industries, sharing not just energy or waste heat but waste products as well. A central defect in production systems today is that we depart from nature's model in which the wastes of one organism feed another. Reusable, non-toxic wastes could lead to efficiencies of co-production that would help defray rising energy costs. The price of such innovation is the political will to impose the energy taxes in the first place.

One obvious and under-employed strategy would be increased utilization of sawmill, agricultural and urban wastes in paper-making. For instance, a major problem on farms today is disposal of plastic used to ensile corn and grass. Salesmen have been known to say that the plastic can be burned safely. A better alternative would be a local product made from organic fiber that would end its life being returned and recycled at the mill that first made it. Such cycling is an essen-

tial component of an industrial system that, as Hawken puts it, looks to mimic natural systems.

Another aspect of steeper energy prices is that production becomes cheaper with proximity to the market as well as to material inputs, reflecting lower transport costs. The Northern Forest's proximity to large urban markets suggests a natural role as supplier of forest goods; what is unnatural is the level of demand placed by those markets on the forest. If green fees should succeed in protecting natural forest ecosystems by reducing demand to a point where truly surplus forest fiber could feed a paper industry then, on the other hand, that industry would not have to compete with an invasion of distant producers either avoiding environmental costs or utilizing the hidden subsidies of cheap energy (i.e., interstates). There is no avoiding the fact that in New England energy is relatively dear, but as Japan has demonstrated, this is no insurmountable obstacle to least-cost production.

The Past

Creative taxation in the past could have perhaps prevented the common boom-bust pattern of the Northern Forest sawtimber industry. Thirty years ago a veneer mill sawing old growth yellow birch employed hundreds on a site barren today—barren not because of tariffs or other trade barriers but because there is no more old growth yellow birch.

If the cost of sustaining the harvest of such timber had been reflected in its price, then businesses, reacting with cost-avoidance rationality, would have geared to extracting maximum value from a limited resource. Instead, producing for a commodity market and pretending the resource was unlimited eventually extinguished the enterprise. Perhaps the mill could have employed 50 people indefinitely rather than 500 for a short term. But no market mechanisms existed to cultivate a sustaining operation.

Another of Hawken's ideas is for the establishment of public utilities specifically designed to protect the restoration of degraded resources. He uses Pacific salmon as an example; here in the Northern Forest we might use spruce-fir or yellow birch. The utility would collect a fee from the harvest of such trees across a designated area. Note that, with green fees, the costs of such harvest would have to be reflected in the price. Value-added industries rather than commodity based ones would be the more natural purchasers of the higher-valued timber. The utility could maximize its revenue only by increasing the capital store. Profits beyond the utility's guaranteed 10 or 12% would therefore be plowed into restoration projects.

Here the problem is the potential creation of so many TVAs running roughshod over ecologic and community concerns in pursuit of their goal. But the idea of utilities could be useful in other areas, such as procurement of pulp. A pulp utility, faced with high procurement costs for forest fiber, would be an effective scavenger of the wider market, creating incentives for recycling and creating genuinely re-usable products.

Conclusion

Will green fees create the ecology of commerce envisioned by Hawken? Hawken rightly argues that only business can do the job of production and distribution. He identifies the ethical lapses and pricing deficiencies that make the present market one lacking in ecologic outcomes. If the alternative to enlightening business is the iron mandates of government envisioned by Heilbroner, we are probably better off attempting to avert environmental catastrophe by attempting the reform of business.

Certainly Hawken's broad outline for change is open to criticism—particularly in the realm of *how* recalcitrant business is to be brought to the table. As he himself opines, "If DuPont, Monsanto, and Dow believe they are in the synthetic chemical production business, and cannot change this belief, they and we are in trouble."

Green fees are not a simple fix in themselves. One area Hawken overlooks is the question of external benefits. Consumers seem to express only so much willingness to pay extra for such things as locally-produced food, or to institute property tax reform where this would relieve land based family farms from financing the (consumerist-oriented) education sys-

tem—despite the many and potential benefits of local agriculture. Why would consumers swallow the implementation of much more comprehensive taxes on bads?

But the key element in Hawken's vision isn't actually the green fee or the public charter for that matter. Rather, it is that he, unlike Heilbroner, does see a central role for democracy in defusing the inevitable crunch as resources dwindle and population explodes. Heilbroner's feeling is that the vested interests won't change because they simply lack the flexibility to do so. Government will have to play a dictatorial role, he concludes reluctantly, simply because the time will be

too late and it will have to mandate changes or watch society self-destruct.

Hawken's alternative is for citizens to first act more as "customers" and less as "consumers"—knowledgeable of their environment and the costs of destroying it through mindless consumption. The demand for high-information, low-impact products will be facilitated by market mechanisms capturing the costs of degradation, but citizens must step beyond mere marketplace environmentalism and inform business of its wider responsibilities to society. If this alternative is to prove the best, the people must speak and business must listen.



Measuring Our Ecological Footprints

A new tool for measuring consumption is being developed at the University of British Columbia by Mathis Wackernagel with the Task Force on Planning Healthy & Sustainable Communities. In a draft handbook, the authors outline a method by which they arrive at an estimation of land required by a given population to support current consumption. This they term "Appropriated Carrying Capacity" (ACC) or, more poetically, the Ecological Footprint.

The key concept in ACC accounting is that consumption requires land. Individual acts of consumption and aggregate consumption by populations appropriate land from the finite amount of ecologically productive land available.

Developing concrete ACC figures for specific populations, at the very least, promises to raise awareness that we are consuming past the Earth's capacity to sustain current lifestyle. To cite two examples the authors offer: the Lower Fraser Valley of British Columbia—based on the average Canadian's requirement for 4.8 hectares of land, and a population of 1.7 million—appropriates an area twenty times larger than itself; Holland similarly requires an area 15 times its size to fuel current consumption.

The finite availability of productive land means that as some consume more, others—those in poorer nations—must consume

less. The alternative, "growth philosophy" behind most recent trade initiatives holds out for the myth that an expanding world population will, with capital and technology, be able to live like British Columbia and Holland do.

Determination of ACC, on both broad population levels and for comparing specific economic development proposals, promises to give the planning community a useful tool in propelling society toward sustainability. Where is the fat in our ACC budget? (Energy consumption clearly stands out as the major component in developed economies' greediness.)

The ethical implication is that we must live within our means not only because in the long term we have too, but also because consumption *here* means deprivation *there*. Conversely, degrading our own carrying capacity to participate in the worldwide exchange of carrying capacity is rational only so long as we continue to believe in the infinite availability of resources—or magic of technology.

Another consideration raised by awareness of the gross appropriation of carrying capacity by the developed world is that of regional boundaries and the extent to which a given population is justified in stepping beyond native carrying capacity to raid someone else's. Today this process is invisible, enabled by trade, the terms of which are all

in favor of the wealthy.

A further step for the ACC project will be analysis from the production perspective. How much carrying capacity are the Northern Forests giving up, for instance, by producing for commodity pulp, paper and biomass markets so that our economy may in turn trade for the material goods that degrade other regions' carrying capacity?

The overall direction suggested by ACC analysis is a shift away from global trade in carrying capacity and toward at least some level of local sufficiency. If we appropriate only what is in our backyard, and at the most, trade with other regions similarly attuned to natural limits, then we can begin to base individual and social action on ecologic integrity.

A copy of the discussion draft of ACC is available from: The Task Force on Planning Healthy and Sustainable Communities, Department of Family Practice, The University of British Columbia, 5804 Fairview Avenue, Vancouver, BC, Canada V6T 1V3. Send \$5.35 to this address and ask for "How Big is our Ecological Footprint: a Handbook for Estimating a Community's Appropriated Carrying Capacity" by Mathis Wackernagel with Janette McIntosh, William Rees and Robert Woollard.

—Andrew Whittaker

Hamlet Stewardship in the Adirondack Park

by Claire L. Barnett

[Ed Note: The following article is reprinted from *Wilderness & People: The Future of the Adirondack Park* published this fall by The Association for the Protection of the Adirondacks, 30 Roland Place, Schenectady, NY 12304. It is available for \$9.95. The publication is the result of a conference held at Sagamore Historic Great Camp in honor the Adirondack Park Centennial in the fall of 1992. It contains nine papers on a diverse array of subjects, including recreation, education, forest resource management, recreation, ecological issues, the future of the Park and the following paper on hamlet stewardship.]

I have a very difficult task ahead which is to talk to you about hamlets, about stewardship and about hamlet stewardship in the Park. Unlike the previous topics, there is no deep, rich body of literature or research to draw upon. In the least, I hope I can begin to develop in all of you an awareness of a few issues and make some suggestions of topics which should be explored in far greater detail by thoughtful people.

First I will try to tell you what a community is, then I will try to describe stewardship of a community and then outline what the results, or the vision, of such stewardship might be at some time in the future. But to do this, first I must share with you two brief stories, which in my own mind accurately set the stage for this departure from traditional thinking about the Adirondacks.

One View of the Adirondacks: Industry

Seven years ago this fall, I attended the annual meeting of a statewide organization in Corning, the New York State Economic Development Council, where I was one of only a half-dozen women among perhaps two hundred men. I was being graciously introduced by one of the good old boys to another good old boy some twenty years his junior, as the new young member from the Adirondacks. The junior boy said, "Oh, how beautiful the Adirondacks is. How much the wife and I have enjoyed our summer weekends there." But with some concern he asked, "But what in the world do you do there all year?" The senior boy switched into industrial recruitment mode: "We have the finest labor force, the best industrial sites, some up and coming sports facilities, and timber and mineral reserves of interest." That was and still is one view of the Adirondacks.

Just two years ago, I was in another conversation with another professional and I said there was very little information about communities in the Park. He replied that there was in fact lots of information about plant and animal communities. I had to explain that I meant human communities.

Technocratic View of Environment

This all or nothing view of the Park as nature labeled "environment" is an easy one to maintain. It seems very simple to me to simply set aside vast tracts of relatively untouched land, label it Forest Preserve, call that "environment" and call the job done. I think the environmental movement nationally lost the greater picture when this hierarchical,

technocratic view of environment prevailed. The debate should be "How society should live, what, how much, and in what way it should produce and consume," not to mention how we dispose of what we consume. As a result, all of us are disconnected from the natural resources which sustain us on this planet.



Photo by Linda Champagne

Concern for Future Generations

For me environment has always been, and has recently become intensely so, an ecology issue. "Ecology is very much a motherhood issue. . . because women . . . can never put themselves far away from the health of the body, the care of the young, the concern for future generations." Our own child's disability is the direct result of a DDT and a solvents poisoning and we have therefore mastered the lesson the hardest way possible of what happens when we separate and set aside people from that which is "environment." We do so at our own peril. As just one animal species on earth we are neither exempt from nor immune to the multiple subtle and/or lethal impacts of pollution. How we choose to lead our lives, purchase, consume and dispose, can and does have a profound influence on our own health and that of the ecosystem.

So Close to Nature

So Close to One's Work

Years ago, when I listened to the industrial recruitment pitch on the Adirondacks, I realized that it contained none of the reasons why I enjoyed living here, which to me is in fact how any company would be recruited anyway. I suggested that I liked living year-round in the Park because one was always so close to nature, so close to one's work (you can never escape the results, good or bad, of your best intentions) and so deeply integrated into real life. One is never far from birth, death, good times and bad, or life's little mysteries in a small hamlet. Why are the elementary school children hyperactive when the wind blows? Why are they noisy before an electrical storm?

I suspected that many other women shared my view of the wholeness of life here and so when I took on this assignment, I decided to ask other women, women who had raised children in the

Park, were leading full lives, and were also enjoying their grandchildren, what they felt a community was, what were the essential features of a community, what makes community stewardship. I am grateful to them for their time and for their thoughts and I only wish that we could develop the themes further: Micki Hall, Lil Richardson, Bev

What is Stewardship and How Does One Find It or Create It?

Stewardship is a contribution to your community without any expectation of a reward or a return. You do it because you will leave the place better than what it was. Being able to take care of more than just your own needs, however, implies that you are healthy and that you have income or a job or a way of living. When the local factory job in Willsboro is lost and the mother starts working part-time at the mall in Plattsburgh, more is lost to the community than just the factory wages: the local job kept someone close to her children, close to school, close to day care, and then she had energy left over for community events. People who commute distances to work often don't have the stamina to participate in community life anymore, nor can they be part of the volunteer ambulance or fire department. Stewardship is also an attitude in life that you are treating other people well and you can't do that if you're unhappy. Taxpayers are not stewards, because its not enough to just pay your taxes. You have to be involved and make some other kind of contribution to community life.

As one feminist writer noted, "Women have an evolutionary inheritance that includes skills of intimacy, inclusiveness, cooperation, mutual support, persuasion and compromise. . . We know how to forge networks. . . and bring imaginative solutions to human problems." Another writer discussing "connectedness" observed, "in traditional societies it is gifts that bond people to one another and make society work. The rich person is the one who has accumulated the largest network of friends." This is sometimes described as the moral economy: The economy of obligations and duties.

What Is the Difference Between Any Community & an Adirondack Hamlet?

Having the Park as a wonderful place to visit should enhance everything we want to do for our children growing up. You think of the mountains, the lakes and the people. People like to live here because they know that people won't ever be right on top of them. There's a lot of privacy even with the sharing. The Adirondack community is already defined because of where it is. All these places have a common history starting about 100 years ago, at least in the higher elevations of the park. One of our problems now is that we have so many taxpayers who are not stewards or who are not in any way involved with the community or who don't even care to become informed about community concerns. The Adirondack community is shaped by the state land protection patterns and rules, as well as by the Forest Preserve. We are not industrial, not big time industrial, and that means we will rely on tourism and logging. That changes your expectations. We have to do a really good job educating our children because some of them will want to leave the area after they graduate and they will need skills. And they have to be healthy.

Encompassing Vision The Whole Park

So for me the encompassing vision

MacIntyre, Susie Frenette, Ruth Hart, Barbara Parnass—thank you.

What Is a Community?

Seeing familiar faces, security for your children, a place where you are safe enough not to need locks and keys or burglar alarms, an attractive setting for raising a family. It is a place of people connections, and where people share.

Is This the Essential Element, the Sharing With Others?

We're a community when we start to share and do more for others or for the good of the community than for ourselves, when we have or take responsibility for something more than just our own lives or our own personal concerns. A community is like a family and leadership is essential to a family just as it is to a community. Communities and families also need trustworthiness. These qualities are learned by example.

You know you're in a community when the place looks cared for. Does it have a park, a playground, places to meet or to sit and talk? Does it have a school or a church? Are the buildings used and attractive or are they empty most of the time or in disrepair? But if the reason that a place is in disrepair is because there has been poor health or a great loss, that's understandable. You can look to see if anyone has put out flowers as a way to see how people treat their environment, and look to see if the streets and buildings are clean. You can talk to the shopkeepers to see what the place is like, but they need to be real people, in real stores, not just anybody in a franchise or outlet who doesn't know that place or have any opinions or know anyone in town. It's also the mix of ages, having children and grandchildren around that helps keep a community alive and active because children always have ideas and are asking questions.

is *The Whole Park*, not just the Forest Preserve, its management, and the emotional response to being alone in the wilderness. What I feel we risk by not collectively holding a whole Park vision is a further perpetuation of our alienation from the land and from each other, and the loss of opportunity to find out how human communities are supposed to live close to and with Nature, to consume, to dispose.

In the 100 years of the Park, there have been many areas which have never been lived in, and where people were never expected to live. And one must also recognize that there are places which have been communities since before the first Blue Line was drawn. The house I live in is about as old as the first Blue Line, yet it is 100 years younger than some of the neighboring farms of the Champlain Valley. In terms of state policy, then, it can be debated endlessly whether people were ever intended to live here, but in point of fact, people do. That is reality. So any local or state policy must approach the issues of environmental and social justice with delicacy.

The Roaring '80s

Rich Richer, Poor Poorer

The world has changed dramatically since The Temporary Study Commission, especially rural America as represented by the private lands and hamlets of the Park. In 1970 there was no Pyramid Mall in Plattsburgh, no Aviation Mall in Glens Falls. There was strip development, but the outlet malls and franchises had not yet totally stripped our smaller cities and villages of their commercial and retail services. Many small hotels and motels and rental cottages were still popular retreats and functioning independent businesses. The Great Camps and great timber companies were largely intact. The Roaring '80s had not yet left the rich richer, the poor poorer, emptied the family farms, and imprinted short-term bottom line philosophy on corporate owners.

Today there is little or nothing one local government acting alone can do to save its community's income base derived from tourism, logging, farming or retail. This is a rural economic dislocation, aided and abetted by federal policies in agriculture, transportation, personal and corporate income tax, health, etc.

In the fall of 1989, in an effort to restore hamlet retail/commercial viability and boost tourism, I directed a series of Main Street revitalization conferences around the Adirondacks. Because it was grant-funded by economic development programs the turnout was terrific. We surveyed the 200 attendees and found out their concerns about their communities. The 120 returned surveys came from housing, tourism, business people, from local government officials, from planning board members.

Losing Their Communities

Fifty percent said that low or no growth was what they personally wanted for the place in which they lived, and the smaller the place the more conservative they were about adding to the population. Smaller towns not only had no staff, but often they had no infrastructure to accommodate growth. When asked to cite the top two problems facing their towns, respondents named sewer, water, affordable housing, the lack of zoning and planning, overdevel-

opment, too rapid growth, landfills, and the lack of viable downtown businesses. They were losing their communities. Lots of taxpayers, but no stewards. The National Trust for Historic Preservation coordinates a revitalization program designed to help in this situation and overwhelmingly the survey respondents, some 80 to 90 percent, felt that such an approach would help their communities.

Take an Adirondack Tour

What would such stewardship efforts result in with efforts undertaken by Adirondack local governments, the private sector and major state agencies? Take an Adirondack tour. Drive from one hamlet to another. Think about what you see from your car and what you can purchase in these small hamlets when you stop. And recall the grandmothers. Here are a few items to get you started:

Historic Markers: Can you see them? Can you read them? Are there pull-overs? Are you driving the historic Northwest Bay Road cut between Lake Champlain and Saranac Lake?

Architecture: Does it respect the history of the hamlet and the region? Think of the new business in Keene: a bank, a garden center and a Stewarts. One of them clearly forgot where it was and failed to leave the community as a whole better off for its efforts. Is there a "hamlet guide," a student earning community credits, who can tell you about the history of the place?

Schools: Is there a school? Or are children being bussed 90 minutes each way to learn biology, environmental science, and history sitting in an urban classroom? Where would you rather learn natural sciences—indoors in Glens Falls or outdoors in Newcomb?

Recreational access: Where are the beaches? The trails? The historic walks? Are the improved paved access

areas operated by local governments and/or the local private sector or is the community still trying to get the attention of the New York State Office of Parks and Recreation or the New York State Department of Environmental Conservation in Albany? Are there public restrooms near trailheads?

Stores: Do they carry local products? Take the challenge: Try the Department Store in Speculator, the Marina in Westport, Howard Johnson's in Lake Placid and count the locally produced, value-added products and souvenirs. Are the notecards, soaps, herbs, wooden toys and potpourris from the Adirondacks or from Wyoming, Maine and California? Is the maple syrup from Vermont? When most farms in the Champlain Valley have sold out of dairy why is the butter from Wisconsin: what are the real barriers to creating a sustainable natural resource-based economy?

Roadways: Are there scenic pullovers? The only scenic pull-off I know of along Lake Champlain is, in fact, the driveway of an 80-year old grandmother down the street from me in Westport. Another grandmother I know opened up her own garden to walkers when a condo development cut off the lake view from the sidewalk. Are there bike lanes? With the same amount of asphalt and just slightly narrower driving lanes, couldn't we have biking lanes throughout the Park? Wouldn't this relieve ORDA (Olympic Regional Development Authority) from seeking to pave part of the Forest Preserve? Imagine 25 years from today: New York State Department of Transportation's stewardship is now a national example of enlightened operations with natural landscaping, no salt, bike lanes, pullovers, wooden bridges—all at the scale of the hamlet, not the scale of the

Interstate.

Railroads: East of Old Forge, along the shores of Lake Champlain, there is a functioning rail line between New York City and Montreal: Fort Edward, Whitehall, Ticonderoga, Crown Point, Port Henry, Westport and so on up the line of historic communities, historic depots, fabulous views and Park access. Imagine the results of a linked series of community development/historic preservation projects along the line. Then link this to the Hudson River Greenway.

Health: Are the people you see in the stores and on the streets healthy? Do they have access to reliable primary care? Is there a continuum of care, especially for the fragile elderly or the teenage mothers? Why not? What are the barriers? Is the emergency squad technically proficient?

Department of Environmental Conservation (DEC): Has there been a steady reduction in toxics in household and commercial use? Is there recycling that small communities can actually afford to carry out despite the fact that they will never achieve economy of scale? Imagine in 25 years' time both New York State DEC and New York State Department of Health, because of their unique and innovative approaches to environmental health and primary care, now being invited to national symposia to discuss how they achieved a healthy rural population. Imagine that local fish and game can now be eaten weekly, even by pregnant women.

A Whole Park Vision: In the last two years, what have our children learned about the Park? Have they learned about rural economies, about health care, about education? Have they heard only adult men talking at each other about the land, land detached and disconnected from any other discussion? As one grandmother I know put it so well, "I used to tell my third graders, there's a big difference, boys and girls, between talking and listening."

The Moral Economy

Listen to the grandmothers. Locate the moral economy of duties and obligations within yourself and within the organizations you belong to and become an advocate for a whole Park approach to the Adirondacks, an approach which will make sense emotionally, intellectually, environmentally. All of the pieces interact: Forest Preserve, back country, countryside, hamlets. Reconcile the two domains of the two old opposing views: one, that the economy was detached from and unrelated to the landscape; the other, that the environment is only the pristine wilderness. In neither old view were the voices of women often heard. "Women have always been catalysts and agents of moral change. . . . Now we are challenged to move beyond time, class . . . to the issues of the survival and flourishing of life." How will we rise to the opportunity? How will we listen? How will we reach and hold a consensus? Can we rethink the domestic agenda of the Adirondack Park? When will we learn how to live lightly on the planet? Can we have "environment" and social and economic justice? The hamlets of the Adirondack Park provide us with an unprecedented opportunity to find out.

Claire Barnett is an economic and community consultant from Westport, NY.



Wilderness As Commodity

Will Real Estate Development Benefit Adirondack Residents?

by Martin Manjak

The genius of the market is its protean ability to commoditize anything. The items need not even be tangible to be subject to mass marketing technologies. Everything from shoes to sex, pretzels to prestige can be produced, packaged, marketed, and owned—for the right price.

Entire cultures can be expropriated, divorced from the lived experience that generated them, and put to the service of fashion, hair products, sports equipment, or any one of a number of commodities that seek to transfer the values associated with cultural artifacts to the products themselves.

What I believe is happening in the Adirondacks, and to a lesser extent throughout the Northern Forests, is that for the first time wilderness itself is being commoditized, transformed into an object of desire that, for the right price, can be possessed—not by just a few intrepid individuals, but by significant numbers of the general population.

When Georgia land speculator Henry Lassiter remarked that now everyone can own a piece of wilderness, he was setting the stage for a marketing campaign that would attempt to “package” the experience of wildness. While dude ranches and white water rafting tours have been selling the concept of adventure in the wild for generations, Lassiter was the first promoter on the scene to sell the *wild* itself for mass consumption. In his vision, large contiguous areas of open spaces would be parceled out into small scale lots.

Ownership would be fragmented into hundreds, perhaps thousands of pieces as each prospect would be sold on the notion that he or she would possess their own, individual wilderness.

Not, of course, to be confused with their neighbor's wilderness situated several hundred feet away across the property line.

This concept breaks from the traditional attitude towards undeveloped areas. In the past, landscapes were viewed with an eye as to what value could be extracted from them, either on or beneath their surface. Now, it is the landscape or the view itself that is seen as a source of commercial value. Like so many objects in our culture, it is being promoted as a source of intangible benefits. Wilderness is being touted as a source of freedom, beauty, isolation, status, spiritual regeneration. There is no doubt that wild, open spaces do encourage, if not actually provide, some of these blessings. What is objectionable is the notion that they can be had by some for a fee, and simultaneously denied to others who can't afford the asking price. Part of the cache of owning a unique landscape is its exclusivity. After all, what's the point of paying big bucks for your own piece of paradise if any Tom, Dick, or Harriet can hike across it and enjoy the same benefits for free.

As was pointed out by Mark Lapping in his article “Second Chance Wilderness” (*Forum* vol. 1 #4), the desire to own a second home in the country is symptomatic of the failure of our first homes to satisfy fundamental spiritual, aesthetic, and psychological needs. What is ironic is that the growing desire to address this sense of emptiness could foster the type of development that destroys the very connections with nature we seek.

The market, poised like a spider to respond to the slightest vibration in its web of demand, is only too eager to supply our needs, both real and contrived. If a demographically significant portion of the populace believes it can find solace in back-country second homes, then the commercial ventures necessary to satisfy that need will

spring to life, regardless of the legitimacy of such beliefs or the harm they could perpetrate to the very wilderness sought as refuge. And a market that combines both high margins and volatility (two features that certainly characterize the real estate industry) will inevitably attract unscrupulous operators.

The question that faces Adirondackers and to one degree or another the rest of the Northern Forest community is: Do you want the commercial real estate market to be the driving and determining force in shaping the future of the region?

It might be worthwhile considering a brief history of capitalism's relationship to natural resources before answering. One of the salient features of that relationship is struggle for control of those resources.

The cardinal rule that has emerged from this struggle, whether it applies to oil fields in the Middle East, or the forests of Maine, is that indigenous control will not be tolerated.

Capitalism's advance was largely tied to its ability to exploit natural resources regardless of their location or the political and cultural entities that presided over them. Control over locally produced resources was wrested away from the hands of those who lived on or near those resources. From the gold of Central and South America, to the spices of the Far East, to the fur trade in the North Country, a struggle was waged (in most cases a violent one) to gain control over these resources. The end result was that the winners enjoyed immense profit at the expense of local inhabitants.

(Residents of the NFL need look no further than the pervasive practice of exporting raw timber to Canada or the Far East to gain an understanding of the experience of indigenous peoples in seeing their resources expropriated and sent overseas for the benefit of foreign enterprise.)

If we use these models as an example of what might happen in the case of wilderness as a resource/commodity, we can reasonably conclude that the current attempts to develop the Adirondacks will not benefit, as a whole, native Adirondackers. The more likely scenario is that a few well-connected individuals, willing to sell their birthrights, will collaborate with developers to make themselves wealthy at the social, cultural, and economic expense of their neighbors.

Development of back-country for second homes or condominiums, which is, in essence, the fragmentation of large, ecologically contiguous tracts of wilderness into small, private parcels, will result in increased inaccessibility of these areas for native inhabitants. Absentee owners anxious to protect their privacy and landscape are not likely to respect traditional practices governing access to these areas. (This conflict has already entered the punctured-tire and shots-from-the-bushes phase out West, where long standing traditions of public access to and across private lands are being challenged and denied by new, non-native owners of existing ranches.)

Without appropriate safeguards, the market will quickly respond to the demand for shorelines and back-country subdivision. That process is already in its incipient stages in the Park. The prospect of a full scale, mass marketing assault on Adirondack wilderness should give everyone with a stake in preserving open spaces pause for thought. As for promises of local prosperity resulting from natural resource developments, history offers an unambiguous lesson of exploitation.

The siren song of real estate development is more likely to sound a death knell for the spirit of the Adirondacks. If native Adirondackers believe that the only way they can survive in their homeland is to commoditize, commercialize, and develop it, they will one day discover to everyone's horror that their home doesn't exist any more. The landscape that nurtured and defined their lives will have been degraded, transformed into the hideous homogeneity that marks every other manufactured community in this country.

When the landscape goes, buried under the assault of condos, resorts, and second homes, the indigenous culture it supported will die, too. When Native Americans lost their land, they often lost their cultural and individual identities. Likewise, when the wilderness of the North Country disappears, the qualities that distinguish Adirondack residents from the rest of the nation's urban/suburban inhabitants will disappear as well.

When the land goes, everything goes: culture, history, memory, identity. In essence, if Adirondackers allow the Park to be developed out of existence, they will be eradicating themselves in the process. It is a Faustian bargain at best to sell your birthright to maintain your presence. You can keep your house, but still lose your home. And history has demonstrated little regard for the dispossessed.

Martin Manjak lives in Albany.



Follansby Pond, one of the endangered jewels of the Adirondacks. Will it remain Wilderness or will condos mar its shores?
Photo by Nancie Battaglia

Wildlife & Wilderness: A History of Adirondack Mammals

Wildlife & Wilderness: A History of Adirondack Mammals, by Philip G. Terrie, Purple Mountain Press, Fleischmanns, NY, 1993, \$14.50 pap.

This is a wonderful book—wise, full of important information, and brimming with delicious quotations from early explorers, hunters, trappers, and biologists. If true wilderness is to return to this region, wolves, cougars, lynx, wolverines, moose, and the other wild natives of the Adirondacks and Northern Forests must return. Phil Terrie, a professor of English and American Culture Studies at Bowling Green University, understands this and presents an irresistible case for real wilderness, not manipulation of forests in the name of deer management.

Moose, not white tail deer, Terrie writes, are the true symbol of Adirondack wilderness. It was only after Euro-American civilization had cut down the native forests, over-hunted and trapped native species, and persecuted native predators into oblivion that deer populations swelled. In the ancient Adirondack forests, deer were not common due to deep snow, lack of edge and early successional habitat, and the presence of moose, wolves, and cougars.

Terrie provides us with a succinct history of the demise of wilderness in the Adirondacks. Without romanticizing Native American culture, he notes that native peoples understood the role of wildlife in supporting their lives, that they co-existed respectfully with native species, and that they neither hunted species to extinction, nor altered the environment so severely that it could no longer support viable populations of native species.

He points out that this region of North America was not opened by European religious or colonizing

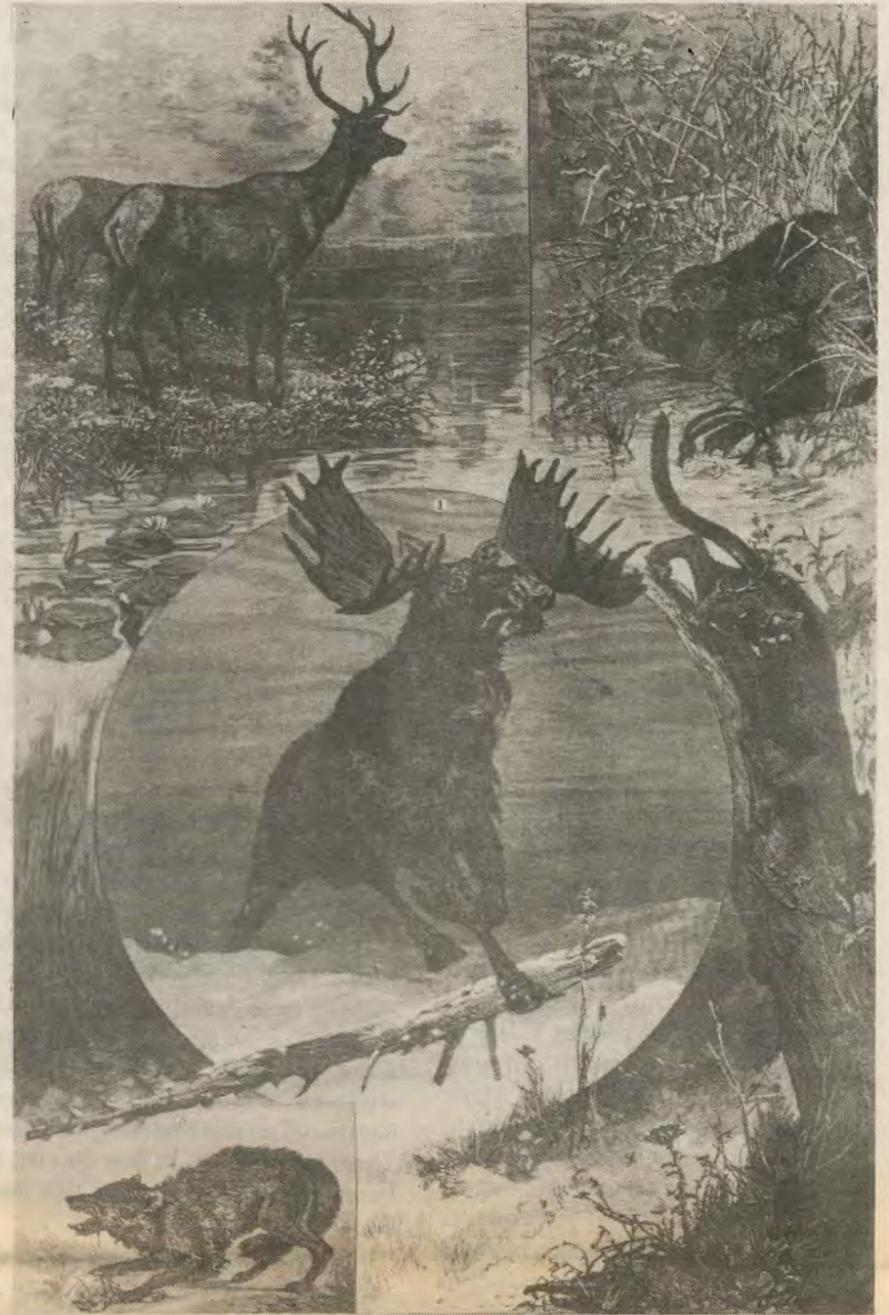
efforts, but by the dream of accumulating quick fortunes trafficking in the pelts of wild animals.

His accounts of early white hunters, both contract and "sport" are especially insightful: "As the first sportsmen prepared to make the journey north to the Adirondack wilderness, the wildlife community was changing, but sportsmen, preoccupied with deer, seldom noticed. Beaver were few and hard to find. The large predators, the wolf and mountain lion, were declining in numbers and range, and the moose would be gone by the time of the Civil War. But the major change—at least as far as the sportsmen were concerned—was the slowly increasing quantity of deer. And as long as the deer appeared to be plentiful, other animals seemed equally so." (page 59)

These white hunters brought none of the woodcraft or respect of the native hunters: "Throughout the literature of sport in the Adirondacks in the nineteenth century, it was not the killing or even the waste that startles. It is the lack of dignity, denied to both the hunters and the hunted."

Terrie traces the history of wildlife—read: "deer"—management in the Adirondacks from the 1880s through the 1950s in the context of the maturing "Forever Wild" State Forests in the Park. He quotes a 1919 Report of the Conservation Commission that candidly acknowledged that the commission practiced "economic biology." (Note: the NY Department of Environmental Conservation still does engage in such ecologically destructive, economically-motivated activities as pond poisoning, euphemistically called "pond reclamation".)

Ironically, Terrie notes, the Forever Wild Clause of the New York State Constitution halted the anthropogenic



"Evicted Tenants of the Adirondacks"—Daniel Beard, *Harpers Weekly*, Feb 28, 1885

activities on state lands that promoted the expanding deer herd and began a natural ecological restoration process that started to recover habitat suitable for wolves, cougars and moose. Today, deer hunting on managed private lands is superior to hunting on maturing Forever Wild State Forests.

His treatment of the extirpation of native predators is as instructive as it is distressing. Nearly every town in the region had a bounty on cougars and wolves, but even without bounties, "trigger-happy" hunters eagerly shot one whenever their paths crossed.

"The state established bounties on wolves and mountain lions in 1871," Terrie writes on page 76, "intending to eliminate both species. The wolf and mountain lion were not long for the Adirondacks, but that the bounties alone were responsible for their extirpation is unlikely. Rather, survival simply became more and more difficult as their natural habitat was destroyed. Disease may also have been a factor as distemper and rabies, introduced by domestic animals, spread to wild canids and cats."

Ironically, at a time the state legislature was persecuting native predators, it attempted to restore beaver, moose, elk (although probably not native to the Adirondacks). The catch is that these species were all valued for trophies or trapping. "The primary predator, man," Terrie dryly notes, "remained uncom-

fortable with the idea of predation."

Regarding current efforts to "restore" moose who are already re-inhabiting the Adirondacks in growing numbers of their own accord, Terrie urges caution: "Much as I want to see a thriving moose population in the Adirondacks, I have reservations about reintroduction. We should remember what happened with the elk and moose the last time we tried something like this. We may not have all the information we need. Snatching an animal from its home and plopping it down in an unfamiliar place is an act of anthropocentric cruelty. Do the proposed benefits, which are by no means certain, justify taking chances with the lives of healthy moose? All signs are that the moose are here to stay. Perhaps we should leave them alone and hope for the best." (page 155)

The concluding chapter speaks eloquently and affirmatively about what true Wilderness is, and how society should manage humans, rather than continue to manipulate nature. (See "Excerpts from *Wildlife & Wilderness*" on this page.)

Phil Terrie loves the natural, wild Adirondacks. He sees it with the eye of the poet, and he reports with the skill of a great historian. This small book is a gem, and is indispensable reading for anyone interested in wildlife, wilderness, the Adirondacks, or sharing this gorgeous region with all native species.

Excerpts from *Wildlife & Wilderness*

Wilderness is more than uncut trees. It is also wildlife habitat, and a forest without its indigenous wildlife does not deserve to be called wilderness. Often we think of wilderness as the place where certain activities are not allowed—snowmobiling, for example—or where certain structures are not permitted, such as ranger stations or fire lookout towers. In this sense, wilderness appears to be defined negatively, as the opposite of more settled or managed areas. A different, more positive way to think about wilderness is in terms of wildlife populations. Do indigenous species live there, including, or even especially, the big predators? Have certain species become over-represented? What can be done to restore original populations? The extent to which a wildlife community manifests human interference in the environment measures the extent to which it fails to satisfy wilderness criteria. Can an Adirondack Forest Preserve without eastern timber wolves legitimately be called wilderness? Without mountain lions? Without a viable, reproducing moose population? Above all, will state policies aim to promote deer for hunters, or will they move toward restoration of the wildlife community of two centuries ago? (page 147)

...[We must return], where it is scientifically and morally sound, those species formerly indigenous, [restore] the historical relations between competing or conflicting species, and [encourage] a wildlife community that reflects the conditions of the early nineteenth century.

Conservationists in the Adirondacks have come a long way in the last century. Moving from a utilitarian concern about watershed to an interest in wilderness for its recreational and spiritual attributes, they now advance the concept of the ecosystem, the preservation of which must become our ultimate goal. In wilderness we have a special kind of ecosystem, one where natural processes govern, and where management is largely passive. Any ecosystem that does not support indigenous species in a reasonable approximation of their relative numbers at the time before white contact simply fails the wilderness standard. In the Adirondacks, the key missing element is an ecosystem sufficiently extensive to support these original inhabitants. The big predators, eastern timber wolves and mountain lions, need wild country in large chunks. The state must consolidate and expand the Forest Preserve. (pages 160-161)

Forestry Conflicts Are About Basic Values

by David Orton

Forestry conflicts are about clashes in basic values.

The 1993 book, *The Pesticide Hazard*, which looks at international trends in pesticide use, and is put out by the British organization The Pesticides Trust, states that globally, pesticides are responsible for 20,000 deaths and 3 million cases of acute poisoning annually. This book notes that the burden falls particularly on agricultural workers and rural communities. This community of Scotsburn is a farming and forestry community. The last time I looked it up, there were about 150 pesticides licensed for use on "crops and orchards." The pulp culture in our province wants "agro-forestry", and consciously uses modern industrial farming as a model.

Every political party in Canada, whether Liberal, Conservative, or New Democratic, when in political power, allows the forest industry to clear cut and forest spray. Government publications state that clearcutting makes up 90% of the cutting in Canada. All of us know that here in Nova Scotia, spraying is closely associated with this type of cut.

What are the basic similar values or assumptions which our political parties share with the forest industry? If we want to stop forest spraying or clear cutting, it is these values which must change. If we want a truly sustainable society, where we do not destroy our ecology or our communities—and a society which has social justice at its core, then shared values which promote this end are crucial. A sustainable forestry needs a sustainable society.

There are two basic values (which I consider evil), that are destroying our environment and society itself, and they permeate and shape forestry. These are:

1-The assumption that the economy has to grow; and

2-A human-centered ethics, where nature is seen as a "resource" solely for human use.

THE ECONOMY HAS TO GROW: This is the view that we need

more "development" and more consumer goods. The "good life" is to be a consumer. Our destiny is seen as "fitting" into a global capitalist economy. This is what I call the mentality of paving over the universe.

Pictou Forest Owners, has a slogan which they proudly exhibit: "Good Forestry is Good Business." The 1986 Provincial Forest Policy, spoke of "A doubling of forest production by 2025." Today in Nova Scotia, about 80% of production is in pulpwood, the least valuable use of wood. We have a "pulp culture" in our province. It is interesting, that the article in today's paper about Stora possibly closing their mill (a blackmail attempt to get environmental concessions and more government funds), states that if Stora stays, they need to build a second newsprint machine to increase capacity—that is, they have to grow. The same Stora article states that the fate of the mill will be decided at a meeting held in Germany, not in Nova Scotia. Pulp and paper multinationals in N.S., like Stora, Scott, or Bowater, look at the world with global, not national interests in mind. N.S. is a feedlot for these three pulp and paper mills. These companies think globally not nationally. We must reorient to think locally. Localism, not globalism!

The growth philosophy runs into the fact that *we live in a finite world*. There are limits to everything. At existing levels of growth, we already have enormous environmental problems. Thus, for example, carbon dioxide in our atmosphere has increased 25% since the industrial revolution.

A good example of limits is the situation with minerals in Canada: "At current production levels, estimated reserves of conventional petroleum will be depleted within 14 years. The estimated reserve life of natural gas is 27 years. Canada's coal reserves could last another 70 years. The reserve lives for other minerals range from 20 to 30 years." (*Human Activity and the Environment 1991, p.174, Statistics Canada*)

Reorienting to limits rather than growth, means accepting the need to

reassess our lifestyle and live much more simply.

We are trying to control nature for growth, instead of adjusting to nature's natural laws. This "control" in forestry means that the "Demands for forest protection will increase." (see "Forest Spraying: A Gathering Storm", by D. Orton, *Canadian Dimension*, October 1990). Thus: chemical pesticides plus biological controls like viruses, fungi, and nematodes, plus the release of genetically altered organisms, for "forest management" purposes. When problems come up, we look for fixes. For example, the use of nematodes (a broad spectrum biological control) against the spruce debarking weevil, which is now taking place in Pictou County. We have discovered that one of the nematode sites is a recent Scott clearcut on the McBeth Road near Scotsburn. The forest industry does not want to look at the actual clearcutting itself—the weevils are attracted to the large areas of wood residues on cutover sites—as the reason for the problem.

There is lots of environmental double speak. We have "Vision", Monsanto's forestry herbicide, which poisons plants and kills them. Or we have the term "sustainable development" which, from the 1987 Brundtland Report, says we can have more growth and still protect the environment. This term has replaced sustained yield in forestry.

HUMAN-CENTERED ETHICS: This second value or assumption says that human interest is *above* every other interest. *Humans see themselves as apart from nature, not as part of nature.* This human-centered view of the world shapes our society and industrial forestry. The language used in forestry shows this. For example, hardwood trees, from a pulpwood perspective, are "weed" trees. Or trees are described as "over mature", meaning they should have been cut, no matter what the ecological functions played by such trees.

We routinely give ourselves the right, as in clearcutting or spraying pesticides, to make life and death decisions

about other plant and animal species. *Yet if we see ourselves as part of nature, then we are part of the forest.* We then are destroying ourselves when we destroy the forests. Those who profit economically from the existing forestry situation tend to deny that there are fundamental problems. A number of these people do not appear to care.

Conclusion: A sustainable holistic forestry, an end to clearcutting—using single tree selection, group selection, small patch cutting, or some combination of these methods—and ending pesticide use, means a new Land Ethic. (See Aldo Leopold, *A Sand County Almanac*, 1949). It also means moving away from an endless growth mentality. A new Land Ethic means our boundaries of ethical discussions (e.g., what is right and wrong) are enlarged to include, not just humans, but soils, waters, plants and animals. *We have to change basic values.* There are no jobs on a dead planet.

David Orton & Helga Hoffmann of the Green Web in Saltsprings, Nova Scotia, are two of the most effective and dedicated forest defenders in eastern Canada.

Champion Pledges to Practice Sustained Yield in New Hampshire

According to public relations spokespeople for Champion International Corporation, the owner of 190,000 acres of timberland in northern New Hampshire will be scaling back its harvests to sustainable levels.

Among the reasons cited by the company and the press for this shift is both an admittedly excessive rate of harvest over the past decade, prompted by salvage cutting in response to the spruce budworm, and poor public relations emanating from Montana, where, activists contend, Champion has engaged in liquidation cutting.

The company seems also to be responding to the possibility that the New Hampshire legislature may eventually develop statewide standards for logging practices and mounting evidence presented by such organizations as the Appalachian Mountain Club that northern New Hampshire has been over-cut. The NH Legislature has commissioned a study by UNH of satellite-generated data to determine whether over-cutting has occurred; the AMC and Dartmouth have already concluded from available data that there is "cause for concern," according to AMC Research Director Kenneth Kimball. Of particular concern is high elevation cutting where, until recently, cuts have been of limited scope.

Meanwhile, Champion has focused on the aesthetic concerns that they feel are prompting the attention to their cutting practices and downplayed other implications of over-harvesting. As one Champion manager has been heard to say, "Trees grow, what else is there for them to do?"

—A.W. from a NH Sunday News Nov. 7 1993 article by Roger Talbot, "Champion Cuts Timber Harvest."



Pesticides Used in Forestry in Nova Scotia, 1993

by Helga Hoffmann

One of the main reasons for gathering here tonight, is to give us all an opportunity to express our concerns about forest spraying. I want to provide a glimpse as to what this entails, why we have reasons for being concerned.

At present, there are no insecticides being sprayed in forest operations. We are pleased that no spraying against the spruce budworm, with *B.t. (Bacillus thuringiensis variety kurstaki)* is taking place.

There are five herbicides approved for use in forestry this year (or six if you go by trade name). These are: **Glyphosate-Vision; Hexazinone-Velpar L & Pronone; Simazine-Princep NT; Triclopyr-Release; 2,4-D (ester)**

All these herbicides are approved for ground application, and *Vision*, *Velpar L* and *2,4-D* are also approved for aerial application.

The main herbicide being used, according to the spray permits we have seen, is *Vision*. You will see these names used interchangeably, for example: *Vision*, *Roundup*, *Glyphosate*. What does this mean?

Vision and *Roundup* are both trade names for the same product. It used to be called only *Roundup*, but now they call it *Vision* when it is used in forestry. *Glyphosate* is the active ingredient. It makes up 41% of the total product. The other 59% are said to be "inerts." (All pesticides have a large part of "inerts." *Velpar L* for example is composed of 25% hexazinone as active ingredient, and the rest are "inerts.")

What are these "inerts"? Are they unimportant fillers, as the name seems to imply? The pesticide manufacturers do not want to reveal what the "inert" ingredients are, claiming they are trade secrets. Monsanto, the manufacturer of *Vision*, did not willingly provide the information about the additives, and today still only talks about a surfactant and water making up the other 59% of the herbicide *Vision*. The knowledge about the chemical composition of the surfactant surfaced in a letter written in the medical journal *The Lancet* (Feb. 6, 1988) by Japanese physicians. They had investigated a series of 56 cases of *Roundup* poisoning in Japan, mostly suicides or attempted suicides, involving nine fatalities. They reported that the name of the intentionally-added secret ingredient, the surfactant, is POEA or polyoxyethyleneamine. It makes up 15% of the total mixture. Tests done show that POEA is three times more acutely toxic than *glyphosate* itself.

In addition to intentional additives, there are usually contaminants present. In *Vision*, these contaminants are isopropylamine (3%), N-nitrosoglyphosate (0.1 ppm), and 1,4 dioxane (0.035%). N-nitrosoglyphosate is a by-product of the manufacture of *glyphosate*. About 65% of N-nitroso compounds are associated with stomach cancer.

The contaminant 1,4-dioxane was only discovered when knowledgeable people on the Pacific Northwest, upon reading the letter in *The Lancet*, realized that POEA could have 1,4-dioxane as a contaminant, and got the necessary lab tests done independently. The tests



Drawings on pages 28 & 29 are of clearcuts on the Keppoch Plateau on Cape Breton Island. Between 1985-1990 7,500 acres of mixed hardwood and softwood (yellow birch, maple, spruce, fir) were cut. The entire area was planted with Black Spruce and sprayed with herbicides to kill hardwoods. Artist Suzy Restino writes: "Keppoch is a Gaelic word meaning 'fertile ground.'" Today these plantations "look as desolate and barren as when they were first cut."

confirmed their suspicions. According to the U.S. Environmental Protection Agency, 1,4-dioxane is a probable human carcinogen. The *Journal of Pesticide Reform* has had several articles dealing with inerts in *Vision* (see particularly "Glyphosate" by Caroline Cox, in the Summer 1991 issue, and "Roundup, *Vision*, POEA, and 1,4-Dioxane: Why Full Formulations Are the Problem," by Mary O'Brien, in the Winter 1990 issue).

And then, there are the breakdown products. One of the breakdown products of *glyphosate* is aminomethylphosphoric acid (AMPA), and this in turn breaks down to formaldehyde, a known cancer-causing substance.

Company literature also informs us that "a defoamer can be added." Other than all of the already mentioned chemicals, one could imagine that other "inerts" of known or unknown toxicity could surface in the future.

A few things come to mind, looking at all of these chemicals. First, whether they are in small or large amounts, the fact they are present, but not accounted for, is reason for concern. Secondly, looking at data provided to residents living near spray sites (see "Technical Reference, herbicide: "Glyphosate", a joint report of the Canadian Pulp and Paper Association and the Forestry Canada, Forest Pest Management Institute, 1993), it can be very confusing to figure out which product they are talking about when giving acute or chronic toxicity test results. Sometimes they mention *Vision*, other times *glyphosate*, and still at other times a third product (*Ezject*) is mentioned.

There is very little detailed information provided on chronic toxicity, even if one wanted to trust their reports. Look at examples of cancers that are now showing up in farmers. For 20 to 30 years they have been spraying 2,4-D, and they were assured it is safe. Now, we are seeing more and more evidence that it causes cancers of the blood and

lymph systems, among others. Recently studies have shown that farmers also have an increased incidence of prostate cancers. One study I have come across, "Mortality among Forest and Soil Conservationists" in the *Archives of Environmental Health* March/April 1989, discusses how foresters and forestry workers also had a higher cancer rate, often related to the duration of employment.

There is no mention of immunity problems. Today there are more and more cases of environmental hypersensitivities, often related to exposure to chemicals. The best known example from Nova Scotia is without doubt, the case of the employees at the Camp Hill Hospital, where many are now permanently disabled. Many other people have stories to tell about exposure to

pesticides and subsequent hypersensitivities.

Due to the importance of the issue of "inerts", we want to show you tonight a video of a CBC Marketplace program dealing with this topic, which was first shown on December 29, 1992. Please remember that when people go to the store to buy a pesticide, they may not know what the inerts are, but they do have a choice whether or not to spray. We residents in the rural areas don't even have this choice. We insist that we want to have adequate information and the right to choose whether or not the spraying will take place. We want the right to **INFORMED CONSENT**.

Helga Hoffmann works with the Green Web in Saltsprings, Nova Scotia.

Maine's Mt. Blue Coalition Fights for Park

So you think the northern forests of Maine are an untrammelled wilderness? Here are some facts to ponder. Ninety-eight percent of Maine is "forested," making Maine the most wooded region in the United States, yet over 50% is owned by multinational paper companies. Less than five percent of Maine is owned by the public. The one percent of Maine's land that is in park and reserve land status remains unprotected from the timber industry.

In 1984, the people of Maine overwhelmingly voted for a referendum outlawing commercial cutting in state parks, but the law excluded all existing deeds and contracts. In 1967, the state of Maine deeded stumpage rights to 1160 acres of the 5000 acre Mt. Blue State Park to Timberlands, Inc. for a thirty year period. In a shady exchange, Timberlands gave the state 17 acres on Webb Lake. The State recently reported Timberlands violated the original deed and management plan, yet the fundamental issue remains that timber companies should get out and stay out of Maine's dwindling public lands.

After ignoring the deed since 1972, Timberlands began cutting again in 1992. One hundred people organized to stop the cut in Mt. Blue State Park. Numerous tactics ranging from meetings, lobbying and education to non-violent citizen blockades (35 arrests resulting in all charges dismissed) have brought the issue to the forefront of the forestry debate in Maine. The deed expires in 1997, when the state will inherit a scathed and unsightly park checkerboarded with clearcuts. Maine forests are already stripped of their original diversity, thanks to the multinational timber companies.

We call upon the people of Maine, the United States, and the world to help protect the public land remaining in Maine, the paper plantation state.

Natalie Springuel & John Clark
Mt. Blue Coalition

Aerial Photographs Reveal Beauty, Degradation & Sadness of America

Look at the Land: Aerial Reflections on America,

Photographs by Alex MacLean,
Text by Bill McKibben, Rizzoli,
New York, \$50.

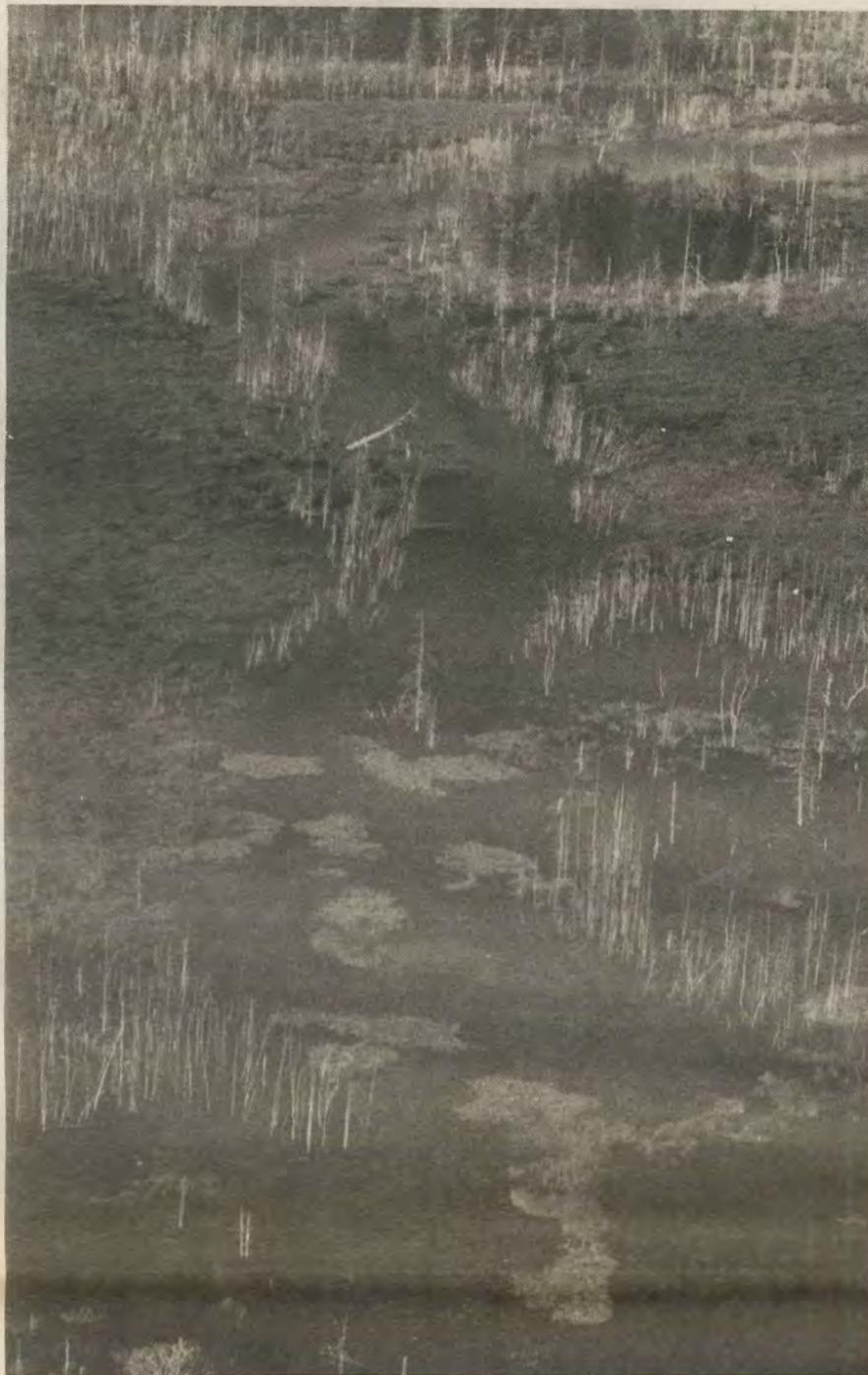
"Flying in Alex MacLean's Cessna 182 is like snorkeling off a tropical reef. He lingers over scenes, gliding low to find new angles, teasing out beams of light. Vanished is the flatness from thirty thousand feet—when you're only five hundred or a thousand feet above the ground, the earth's surface rolls, swales, buckles, folds, twists. The curve, the warp, the bend—it is hallucinatory, sexy, entrancing."
—from Bill McKibben's "Introduction" to *Look at the Land*

Aerial photographer Alex MacLean is one of the true heroes of the Northern Forests. Late in 1989 his photos of massive industrial clearcuts in northern Maine redefined the terms of the debate over the future of the Northern Forests. Throughout that year, a handful of us had attempted to persuade the Northern Forest Lands Study (NFLS) to address the issue of clearcuts and forest practices. It refused, and industry stonewalled. It was easy for defenders of unsustainable forestry to characterize its critics as misfits, fringe kooks, "environmental extremists" and the like. But when we began showing Alex's color slides of clearcuts at NFLS public hearings, we achieved instant credibility with a shocked and outraged public.

Although we failed to persuade the NFLS, or later, the Northern Forest Lands Council, to honestly study forest practices, Alex's photos put them on the defensive. Today, only the most selfish and backward troglodytes of the timber industry still insist there's no problem.

Alex has just released a stunning coffee table book of aerial photographs of the lower 48 states. Even at \$50, the book is a bargain. It contains nearly 200 pages of awe-inspiring photographs of: the San Andreas Fault, patterns created by agricultural fields at the edge of Montana cut-banks, dendritic drainage patterns of river systems, pollution from leaking chemical tanks and coal-fired power plants, ecological successional patterns in beaver ponds, and suburban sameness and sprawl, sometimes to the very edges of the desert.

Bill McKibben, author of *The End of Nature* and *The Age of Missing Information*, has written six short, med-



*"A freshwater wetland in central Maine: the dead trees suggest that the area has been markedly altered by beavers damming a stream and flooding the land." From *Look at the Land*, by Alex MacLean & Bill McKibben.*

itative, lyrical essays to introduce various sections of the book. The essays transport you into Alex's Cessna as photographer and writer muse over the scale of things, the force of gravity, the sadness and loneliness of modern America.

"And since he has trained his camera specifically on America, we can see the remarkable inefficiencies, the absurd excesses of our vanguard consumer culture. The long rows of individual backyard swimming pools—the streets where each half of a duplex has its own swimming pool—sum up more powerfully than a hundred jeremiads the posterousness of our life-styles. And the

sadness, too—not until you see the world from above is it possible truly to comprehend the isolation of Americans, one from the other."

MacLean's photos of development at the Arizona desert's edge, of the North River in North Marshfield, Massachusetts in fall, summer, and winter, and a stunning photo of ice cracking from a large pond in eastern Massachusetts that looks as if it belongs on a microscope slide, offer us, McKibben suggests, "a sense of the flow of time... the wash of change."

Photographs that capture the raw geologic beauty of this continent remind us, says McKibben, that "our purchase

on the edge of this curve [Earth] is tenuous." Photos of the San Andreas Fault and the patterns of natural erosion of rivers teach us lessons on a scale that eludes us on the ground. The caption on one of my favorite river photographs reads: "A dendritic, or tree-shaped, drainage pattern, seen from twenty-five hundred feet, incises the earth's crust in western Missouri. The erosion gullies will continue to extend and branch out, tracing the path of the drainage back to its source, as long as there is uniform soil and an upslope on which to continue."

For a section that documents the seepage of a chemical tank into the Detroit River, huge clearcuts from Maine to Washington State, and agricultural erosion, McKibben observes: "It is paradoxical, but you almost need to leave the ground in order to comprehend the force that normally holds you there. The work of gravity on a large scale is immediately apparent from the air, its relentless downward pull shaping every inch of the landscape."

It may seem strange to wax ecstatic over photos of landfills and suburban sprawl; they are appalling sights and ecological catastrophes. Yet MacLean is no mere photographer—he is an artist. There is beauty, sadness, and much invaluable visual information in these photographs. The contrast between a polluted river in Savannah and the successional stages of a beaver pond in Maine is stark, but it conveys the essence of the conflict tearing apart the fabric of our society—that (barely) subconscious understanding that industrial civilization is fundamentally incompatible with biological diversity and the evolving dance of life.

In the end, the viewer/reader of this book is smitten by the indescribable beauty of the land and the unbearable sadness of its human inhabitants. "Consider only those places where our economy and technology are working as they are intended to work," McKibben challenges us. "We live in strange clusters, utterly unconnected with the topography (a change from the time when human settlements followed the logic of the land). Clearly, access to a cul-de-sac, that bulbous, slightly obscene marker of our civilization, is more prized than access to a stream. Our homes tell us nothing about our physical surroundings—we look out on mirrors of our economic status."

And finally, "...there is scant sense of public life here."

—Jamie Sayen

Restore Salmon

Continued from Page 13

the Endangered Species Act, so why seek protection under federal law?

If listed, federal funds may become available for research, enforcement, and habitat enhancement programs. Listing sometimes forces coordinated management efforts between agencies. Cooperation between local, state, and federal agencies is sometimes enhanced, eliminating duplication of process and research.

However, the most important reason for listing is that it provides LEGAL protection otherwise not afforded the fish. Any federal action that might affect wild Atlantic salmon status must be reviewed. Reauthorization of dam permits, for example, would be

subject to review regarding effects on salmon recovery. Although state wildlife agencies have the authority to manage fish harvests, they don't have authority over habitat. Habitat loss and degradation is one of the major factors affecting salmon recovery. With listing, it is possible, after thorough public review and scrutiny, to require mitigation or even termination of activities that negatively affect salmon. Thus if it can be demonstrated that an industrial polluter or a particular logging operation is destroying salmon habitat, mitigation measures may be LEGALLY required.

Recovery of wild Atlantic salmon is an opportunity to bring about the ecological restoration of New England's rivers. Listing permits us to go beyond existing populations and consider restoration of runs in rivers where salmon no longer exist. In many cases this will first require restoration of the river ecosystem

itself. This is RESTORE's agenda: to bring about the ecological recovery of the northern forest landscape.

Just as the wolf is a barometer of wildlands quality in forested landscapes, the salmon is a measure of aquatic ecosystem quality. A river that will support salmon will also support many other living creatures such as aquatic invertebrates and plants. If we can successfully restore wild Atlantic salmon over most of its former range in New England, we will be that much closer to bringing about the ecological restoration of the North Woods, enhancing not only the quality of the landscape, but enriching the quality of our lives.

*George Wuerthner is an ecologist, photographer, prolific writer and avid fisherman. He is author of *The Maine Coast*, published by American Geographic Publishing, 1989.*

NH Landowners Alliance: Untainted Drinking Water is not a Property Right in New Hampshire

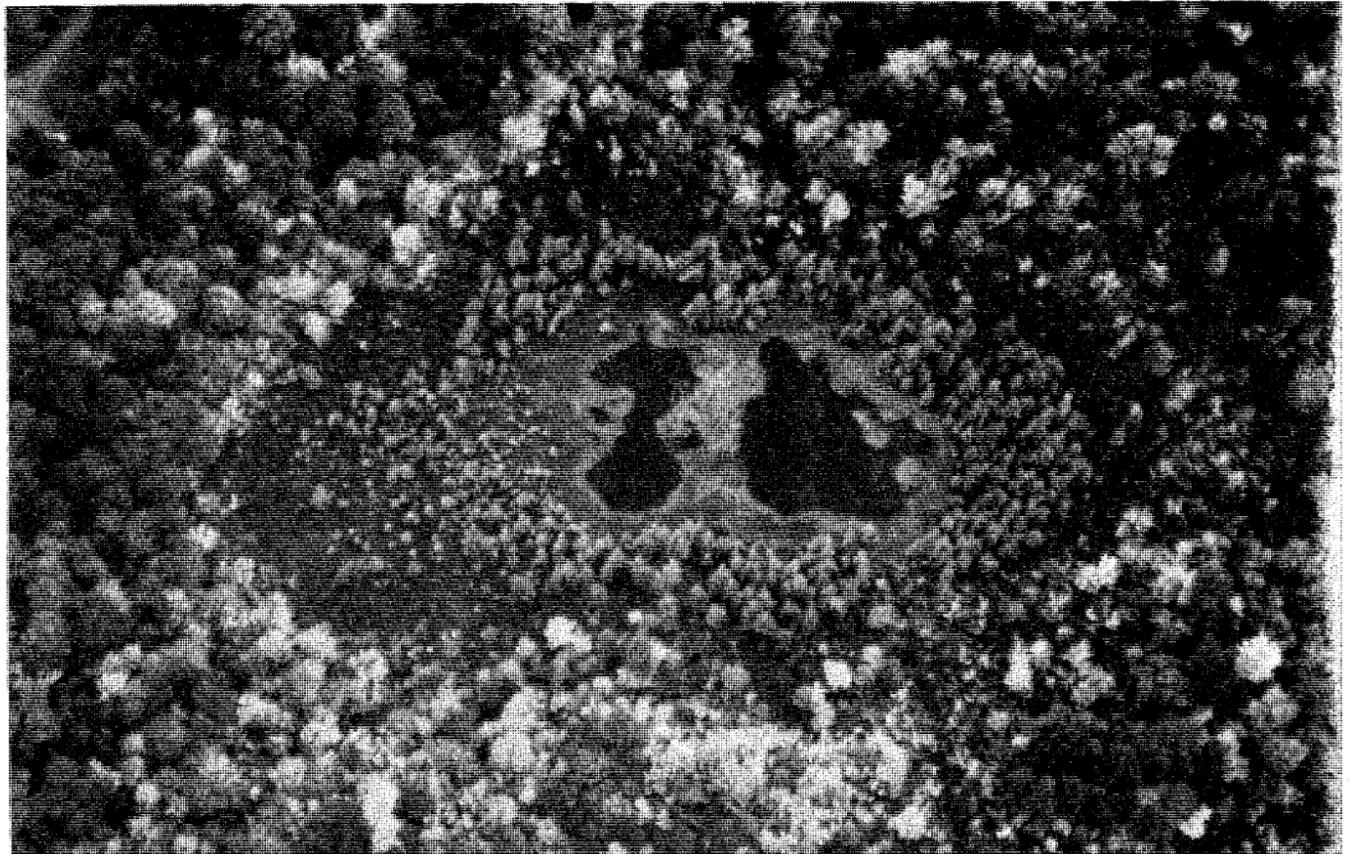
by Jamie Sayen

Is there a property "right" more basic than the right to drink unpoisoned well or spring water on your own land? Apparently the "property rights" zealots of the Granite State—the New Hampshire Landowners Alliance (NHLA)—believe that the "right" to spray poisons on your land that taint your neighbor's drinking water is a greater right.

In August, I learned from neighbors in Stratford Hollow that Boise-Cascade planned an aerial spray of Roundup on its 73-acre plantation. Numerous abutters objected strenuously, pointing out that the spray would enter the hydrologic cycle, affect drinking water, and the health of children, cows and wildlife in the neighborhood.

Boise-Cascade, headquartered in far-away Boise, Idaho, turned a deaf ear to local concerns. They care about corporate profits, not community health. After all, it was their uncaring forest management that created the problem by clearcutting the tract three years ago. Subsequently, BC imported migrant laborers to plant commercially desirable species that are not genetically native to the tract. Since plantations are expensive, unnatural ecological nightmares, they require intensive management—read: "herbicide spraying"—so that the seedlings are not outcompeted by sunloving early successional species native to that tract that naturally regenerate right after a disturbance, whether natural, or un-natural.

This ugly story gets an uglier twist from recent legislation—promoted by the ultra-right-wing, "property rights" Farm Bureau—passed by the New Hampshire Legislature that denies towns the right to restrict pesticide use within their borders. The state's regulations override all town ordinances not in existence prior to August 1993. The whole process for the Stratford Hollow spray operation is suspect. Regulations for notification of abutters and public



"East of Albany, in New York's Hudson River valley, a progression of vegetation advances toward the center of a naturally dying pond in clearly visible concentric circles known as succession belts. The vegetation will eventually consume the pond." This photo, from Alex MacLean & Bill McKibben's book *Look at the Land*, is even more striking in color

hearings were ignored by Boise and not enforced by the State.

Not surprisingly, the state's regulations are pesticide user-friendly. Isn't it extraordinary that the "Live Free or Die" state which boasts of "local control" that locals have no control over the quality of the water in their own wells?

Early in September, BC thumbed its nose at protesting neighbors and sprayed the tract. Apparently the spray was not a complete success and will be repeated one or more times.

At about this time, I contacted Cheryl Johnson, President of New Hampshire Landowners Alliance (NHLA), because I believed that this was a genuine property rights issue which we could fight together. She said she would take my request to her board. Several weeks passed, and still I had not heard from Cheryl. I called her again,

"property rights" zealots, and other opponents have failed to raise a single ecologically valid or constructive objection to the establishment of large reserves.

We need constructive critics who can challenge us to develop strategies that adequately, effectively and equitably address all the thorny ecological, economic, political and social issues confronting us. Such critics help us to identify the roadblocks to achieving our goals; they do not heap obstacle after obstacle in our way in a desperate effort to deny the inevitable.

We believe our vision for the future of the Northern Forests—large publicly-owned ecological reserves, a diverse, locally controlled economy based upon ecologically sustainable activities, and a regional democracy that genuinely respects the needs of current and future generations of all species native to the region—is scientifically sound and ethically compelling. If it is politically unrealistic under the current political regime, then it is time to change such an ecologically unsustainable "political reality."

—Jamie Sayen

and she said the NHLA board was meeting that week. Several more weeks passed, and still there was silence.

In October at the Northern Forest Lands Council NH Citizens Advisory Committee, I asked Cheryl if NHLA could help my distressed neighbors. "Didn't you get our letter?" she asked. No, I answered (and as of late December, I still have not received any letter from Cheryl or NHLA).

"No. We have a policy of not getting involved in disputes between landowners," Cheryl informed me.

So, there you have it. NHLA has poisoned public debate over the protection of the Pemigewasset River. It has misrepresented the activities of the Northern Forest Lands Council. It has spewn forth false, misleading and inflammatory charges against environmental groups. And, in general, it can

consistently be found opposing environmental protection efforts—all in the name of "property rights."

The NHLA will wage war with the environment and the truth to promote the selfish, economic dreams of its members, but won't lift a finger to protect my neighbors' children from industrial toxins.

Clearly, the "property right" zealots from New Hampshire, the NHLA, do not believe that untainted well water is a property right.

Illustration Credits

Mast, p. 2, 20, 21—Rachel O'Meara;
Cover Map—Jon Luoma; p. 25—
David Utterback; p. 28, 29—Suzy
Restino

Change Reality

Continued from Page 2

and is investing more in competing regions than in the Northern Forest region?

This may be the last chance for the timber industry to play a meaningful, constructive role in determining the future of this region, but first it must stop fighting lost battles. Ecologically-appropriate forest practices regulations will be enacted with or without industry participation in the process. The public will acquire large tracts of land for newly-established large ecological reserves whether industry likes it or not.

A handful of responsible individuals in the timber industry recognize this; they are clearly making a good faith effort to address ecological reality. But, until a majority of the voices of the timber industry join these progressive leaders, industry risks dealing itself out of the debate over the region's future.

The only guarantee in life is change. Dramatic changes are occurring. Gone are the days when we could ignore the physical and ecological limits of the natural world.

Thus far, timber industry critics,

SUBSCRIBE TO THE FORUM

*A one-year subscription to the Forum costs \$12 (US) or \$20 (Canadian) for six issues.

*We will send you a freebie if you can't afford to pay on the condition that you become actively involved in the search for sustainable natural and human communities.

*We urge our more affluent subscribers to send us \$24 or more to sponsor a freebie.

*Please consider becoming a lifetime subscriber with a donation of \$1000 or more.

**Enclosed is \$_____ to cover _____ subscription(s).

**_____ I can't afford a subscription right now, please send me a freebie. I promise to roll up my sleeves and get to work on behalf of the Northern Forest Communities.

**_____ Here's some extra cash to cover the cost of freebies.

**_____ Enclosed is \$1000 (or more). Please sign me up as a lifetime subscriber.

Name _____

Address _____

Town _____

State _____ ZIP _____

Contributions to the Forum are tax-deductible. Please make checks payable to Earth Island Institute and send to:

The Northern Forest Forum, POB 6, Lancaster, NH 03584

CLEARCUT

THE TRAGEDY OF INDUSTRIAL FORESTRY



Near Tofino, British Columbia. Photo by Garth Lenz, 1992

"For forestry to have a future, the future must have a forest." —David Brower

Important New Book!
Available in January 1994

*Help Distribute CLEARCUT
& Get a Free Copy for Yourself*

The publishers of CLEARCUT want to get this extraordinary coffee-table book that documents "the failure of industrial forestry" into the hands of as many community leaders and policy makers as possible. If you are willing to commit to delivering at least five copies of CLEARCUT to local politicians, community leaders and other important opinion molders, Contact:

CLEARCUT 415 771-1102

CLEARCUT: The Tragedy of Industrial Forestry is a 300 page exhibit-format style book that comprehensively documents the destruction wrought by industrial forestry through over 100 stunning, full-page, color-images of some of the most horrific clearcuts in North America. Accompanying this pictorial indictment are over a dozen essays by leading ecologists and activists explaining the myths and failures of today's dominant forest-management practices while outlining ecosystem-based solutions.

Co-published by Sierra Club Books and Earth Island Press and edited by Bill Devall, the book's contributors include David Brower, Chris Maser, Colleen McCrory, Reed Noss, Mitch Lansky, Dave Foreman, & Herb Hammond.

The book's purpose is to serve as an organizing tool for forest activists to highlight local, national, and international problems. Local coalitions of citizens are invited to present *CLEARCUT* to the press, legislators, public agency officials, timber industry executives, and others who influence forest policy.

Rainforest Action Network, The Sierra Club, and Canada's Future Forest Alliance are joining together in a continent-wide campaign to distribute over 12,000 copies of the book in the first quarter of 1994. Copies of *CLEARCUT* will be provided at no charge to activists who agree to present the book face to face to community leaders and policymakers.

Activists across Canada and the U.S. are using *CLEARCUT* to educate the public on the extensive devastation of our forests. We are demanding policymakers adopt a profoundly different set of principles based on respect, integrity, and stability for forests and forest communities. Every person involved in forest preservation is encouraged to participate in this effort to alert the public with images that speak for themselves.