

VNRC

Published
by the
Vermont
Natural
Resources
Council,
Inc.

Vermont Environmental Report

SIEGE ON OUR SUMMITS:

TECHNOLOGIES PUSH DEBATES ON
LAND USE AND COMMUNITY HEALTH

March
1997


DANFORTH
PEWTERERS

*Celebrating
20 Years of Quality*

ELEGANT
HANDCRAFTED
PEWTER

Oil Lamps
Tableware
Vases &
Candlesticks

In the Marble Works
Middlebury, Vermont
(802)388-0098



Knoll Farm Country Inn

150 acres preserved with
permanent conservation
restrictions through the
Vermont Land Trust.

A unique farm/inn
combination in a
beautiful rural setting,
accommodating guests by
day or week since 1957.

Call or write Ann Day,
Knoll Farm, Bragg Hill Rd.,
Waitsfield, VT 05673
(802) 496-3939

Have You Ever Tried a Ben&Jerry's Peace Pop?

In
5 Euphoric
Flavors



You'll find the same
rich, dense, creamy
ice cream in a Ben &
Jerry's Peace Pop that
you'd find in our pints, only
it comes on a stick and is
drenched in chocolate. And
this year for the first time,
our Peace Pops are packaged
in bags, not individual boxes.

After many
different
designs and
tests, we decided to go

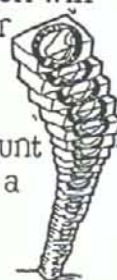


against the
industry
norm and
to package
our Peace Pops in bags.

This one small decision will
reduce waste by over
11 million boxes in
one year's time.

That reduces the amount
of weight going into a
landfill by 165 tons.

Enjoy!



BEN & JERRY'S

VERMONT'S FINEST • ICE CREAM & FROZEN YOGURT™

SALLY GREENE Permit Specialist

*Providing assistance with state
and local land use regulations*

SHREWSBURY, VERMONT
802-492-3497

e-mail: sg_permits@aol.com



VNRC BOARD OF DIRECTORS

OFFICERS

Chair:

Hollis Burbank-Hammarlund, *Newfane*

Vice-Chair:

Mary Ashcroft, *Rutland*

Treasurer:

Mark Schroeder, *Belvidere*

Secretary:

George Little, *Burlington*

MEMBERS

William Amberg, *Halifax*

Paul Bruhn, *Burlington*

Megan Camp, *Shelburne*

Anita Dunlap Childs, *Dummerston*

Alison Clarkson, *Woodstock*

Gail Byers Freidin, *New Haven*

Stephen C. Harper, *Bristol*

Patsy Highberg, *Woodstock*

Allison Hooper, *Brookfield*

Russell Janis, *Brattleboro*

Rep. Carolyn Kehler, *Pomfret*

John Lippincott, *Bellows Falls*

Leonard Wilson, *East Montpelier*

The Vermont Community Foundation
contributed to this publication.

The Vermont Natural Resources Council,
Inc., is a nonprofit environmental
organization founded in 1963 to protect
Vermont's natural resources and environ-
ment for present and future generations
through research, education, and advocacy.

VNRC is the Vermont affiliate of the
National Wildlife Federation.

VNRC membership includes a subscription to the
Bulletin (published three times a year) and the
Vermont Environmental Report magazine
(published twice annually). For an individual
membership, send \$35.00 to VNRC.



*The Vermont Environmental Report is
printed on recycled paper with soy-based ink.
However, please recycle this issue by sharing it
with your family and friends!*

Vermont Environmental Report

Published by the Vermont Natural Resources Council, Inc.

March 1997

TABLE OF CONTENTS

Drowning in the Air Waves:

Vermont Confronts Tower Technology by Will Lindner Page 4

Charlotte vs. the WIZN Radio Tower:

A Test Case for Vermont by Will Lindner Page 14

Alpine Development Squeezing the Bicknell's Thrush by Will Lindner Page 16

Taking the Measure of Aesthetics by Will Lindner Page 18

The Inside Word

More Than Interesting by Acting Executive Director, Stephen Holmes Page 2

Letters to the Editor Page 3

Vermont Perspective

VLS Hosts Conference on EMFs, Microwave Radiation Page 20

Bren's Back ... by Popular Demand: Echoes from our Annual Meeting Page 22

In Memory of Mollie Beattie: Internship Honors Contributions Page 25

VNRC Recommends: The New Wave Page 28

VNRC News and Notes

Fellowship in environmental communications, welcome, conservation plate,
research on current use, and workshops available Page 26

Credits: Cover photograph: White Rocks National Recreational Area by A. Blake Gardner; Pages 4, 5, and 7: Killington site photographs by Jay Maciejowski; Page 8: Berlin Tower photograph by Will Lindner; Page 9: Ascutney site photograph by Jay Maciejowski; Page 12: The Times Argus; Pages 14 and 15: Pease Mountain site and Fournier photographs by Will Lindner; Page 16: photograph by Steven D. Faccio; Page 18: Groton State Forest photograph by Vermont Travel Division; Page 19: Camel's Hump State Forest photograph by A. Blake Gardner; Pages 22 and 23: photographs by Sue Higby; Page 22, bottom: photograph by Jim Shallow; Page 25: Mollie in the Kodiak National Wildlife Refuge, Alaska, photograph by Walter Stieglitz; Page 26: Josephine Albright photograph by Rick Russell; Page 26: photographs by Sue Higby; Back Cover: Photograph by Jim Shallow.

MORE THAN INTERESTING

STEPHEN J. HOLMES, ACTING EXECUTIVE DIRECTOR

After experiencing first-hand the harsh reality of Tibet during her student sojourn there two years ago, my daughter might not care for my use of a Chinese proverb under any circumstance. Her not-so-subtle persuasion has led to "Free Tibet" stickers on our cars and avoidance of the "Made in China" label (Do you have any idea how difficult the latter is?).

But the saying that translates roughly to, "May you live during interesting times," seems appropriate to describe my feelings as Acting Executive Director since last July. Interesting times indeed! In the space of just eight months, it has been my good fortune to witness some of VNRC's most important successes: The precedent-setting explosion removing the Clyde River #11 dam and restoring the waters for salmon spawning; the landmark Water Resources Board decision on the Lamouille River which set the stage for restoring rivers throughout Vermont; and the Vermont Senate's vote to halt herbicide spraying in our forests.

And in the last week of February, with the deceptively simple stroke of a pen, VNRC has helped preserve forever almost sixteen thousand acres of near wilderness surrounding the Somerset Reservoir and other headwaters of the Deerfield River, through an agreement with the State and New England Power Company settling the Deerfield River hydroelectric power case.

All this and the February 5th Vermont Supreme Court decision ruling Vermont's system for funding education unconstitutional. All of a sudden property tax reform is within reach. And who would have dreamed that education finance reform, a fix for current use, a statewide property tax, and the elimination of intercommunity competition for new development (the missing piece of the land use planning puzzle) were all possible this year? Very interesting times!

As we approach the next millennium ("2K" or bust), have you noticed how things and people change, even in Vermont, at a faster and faster pace. Consider the new technologies (and new human behavior patterns) that have emerged in just the last decade or so. Worldwide Internet use jumped from three million to sixty million on-line in the past year. Between 1984, the dawn of the cellular phone industry, and 1995, the number of cell sites in the U.S. grew from 346 to over 19,000, and that number is expected to top 115,000 in a few years. Vermont may need as many as 200 sites to blanket the state with cell-phone coverage.

Vermonters' increasing desire to communicate by car phone is but one facet of a growing public policy debate over how to site the various telecommunications facilities for radio, television, and other uses we see springing up on our mountains.

In this issue of the *Vermont Environmental Report*, Will Lindner helps us draw a bead on the complexities of this debate. His feature story, "Drowning in the Airwaves," focuses on the nature and extent of the telecommunications revolution, including how public health concerns are addressed, how the industry is regulated, and to what level public interest is protected.

Companion stories explore the Town of Charlotte's ongoing struggle over the WIZN radio tower; the implications of development at high elevations on wildlife like the Bicknell's Thrush; and aesthetic impacts of towers and facilities.

P.S. I hope you will read Jim Wilkinson's memoir for Mollie Beattie. The sadness surrounding the loss of our friend and colleague has given way to hope that the things she cared about so deeply will be carried on through the newly created Mollie Beattie Policy Internship. I want to personally thank Jane Difley, Karen Meyer, Beth Humpstone, and Rick Schwolsky for their support and advice, and the Vermont Community Foundation for helping make it possible.

*Interesting
times indeed!
In the space
of just eight
months, it
has been my
good fortune
to witness
some of
VNRC's
most
important
successes.*



VNRC STAFF

Stephen Holmes
Acting Executive Director

Katy Taylor
Membership & Financial Coordinator

Brigid Dunne
Outreach Coordinator

Sue Higby
*Deputy Director for
Membership & Development*

Christopher Kilian
*Water Program Director
& Staff Attorney*

Jim Shallow
Forests & Outreach Programs Director

Julie Sperling
*Southern Vermont
Outreach Coordinator*

PUBLICATIONS

Sue Higby
Editor

Katy Taylor
Copyediting

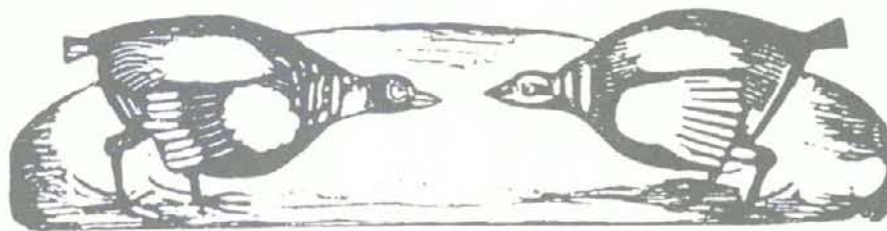
Tim Newcomb
Design

Vermont Natural Resources Council, Inc.
9 Bailey Avenue
Montpelier, Vermont 05602

(802) 223-2328
(802) 223-0287 facsimile
E-mail: VNRC@plainfield.bypass.com

Copyright © March 1997, VNRC

The opinions expressed in the *Vermont Environmental Report* are not necessarily those of VNRC. VNRC reserves the right to refuse advertising that is not in keeping with the objectives of the organization.



HERBICIDES KILL

Thank you for your stand against the aerial spraying of herbicides in Vermont Forests.

I also wish to register my professional opposition to the use of herbicides, especially aerial applications of herbicides, for the manipulation of forest species composition.

Herbicides are biocides; i.e., they are designed to kill living organisms. No amount of laboratory testing can assure their safety even if they are "correctly" applied. The forest environment is subject to wide variations of weather, soil conditions, drainage patterns, species mixes, and wildlife utilization which can not be duplicated in laboratories and can not be adequately evaluated in field testing. Also, little is known about potentially damaging synergistic reactions of herbicides with other pollutants which are already stressing the forest and altering the soil chemistry.

It makes little sense to chance the use of herbicides when it has been clearly demonstrated that forest stands may be managed much more effectively and with much less environmental risk by non-chemical means. Very precise mechanical spacing and species manipulation has been carried out for years in Sweden, a country that depends on its forest resources as a major pillar of its economy while maintaining high environmental standards.

Sweden is a world leader in enlightened forest management and has accomplished much in the management of young forest stands through the use of well-trained crews equipped with safe, efficient clearing saws. Both professional crew trainers and clearing saws are available in the northeastern U.S.

Instituting Scandinavian style mechanical spacing and species selection would not only benefit the environment by reducing risk and tailoring treatments to leave a healthier species mix, but also would

provide good jobs for local people and result in significantly more value per acre as trees reach maturity.

Gerry Hawkes
Woodstock, VT

CHEERS FROM OUR MEMBERS

Ridiculous and wrong! (herbicide spraying)

Diana P. Sidebotham
Putney, VT

Fight back!

Naki Stevens
Washington, D.C.

VNRC does a fantastic job!...I'd really like to see VNRC work more closely with the agricultural sector in Vermont. Thank you!

Alice H. Allen
Wells River, VT



I THINK I LOVE YOU

Many, many warm hugs for not spraying Vermont. Thanks!

Sandy Snyder
Westfield, Vermont

(Received on Valentine's Day—thanks!)

GET IT RIGHT

I was disappointed to see a commonly made error appear in VNRC's 1996 Annual Report, an error which an organization like VNRC should not make if it wants to retain its reputation for technical expertise.

On page 2, column 1, line 6 from the bottom, "annual output of some 1.8 megawatts of electricity ..." probably should have stated, "... megawatt-hours..."

Watts are a measure of the rate of energy flow, also called power, sort of analogous to "miles per hour" in the case of a car. We would not report how many miles per hour a car went during a year, just miles. Similarly, we can only report how many watt-hours (or kilo or megawatt-hours) a facility generated over the course of a year.

Despite this one error, I think VNRC is great.

Roald Cann
Springfield, VT

HATS OFF!

I want to congratulate all the presenters of awards at the Annual Meeting. The tribute to Mollie Beattie was extremely moving. And your acknowledgment of Mark Naud was excellent. He worked very hard on the reclassification of Cold Brook, with excellent results ...

Jeff Eaton
Lincoln, MA

REGION UNITES

I seem to be getting your excellent newsletter, etc., but don't recall ever joining VNRC. So, I've remedied that with the enclosed check.

I am the head of a grassroots open space organization here in Medford, so my interest in VNRC comes from both my interest in the environment (and Vermont's landscape) as well as an "organizational" interest in how you have become successful.

In any event, keep up the good work!

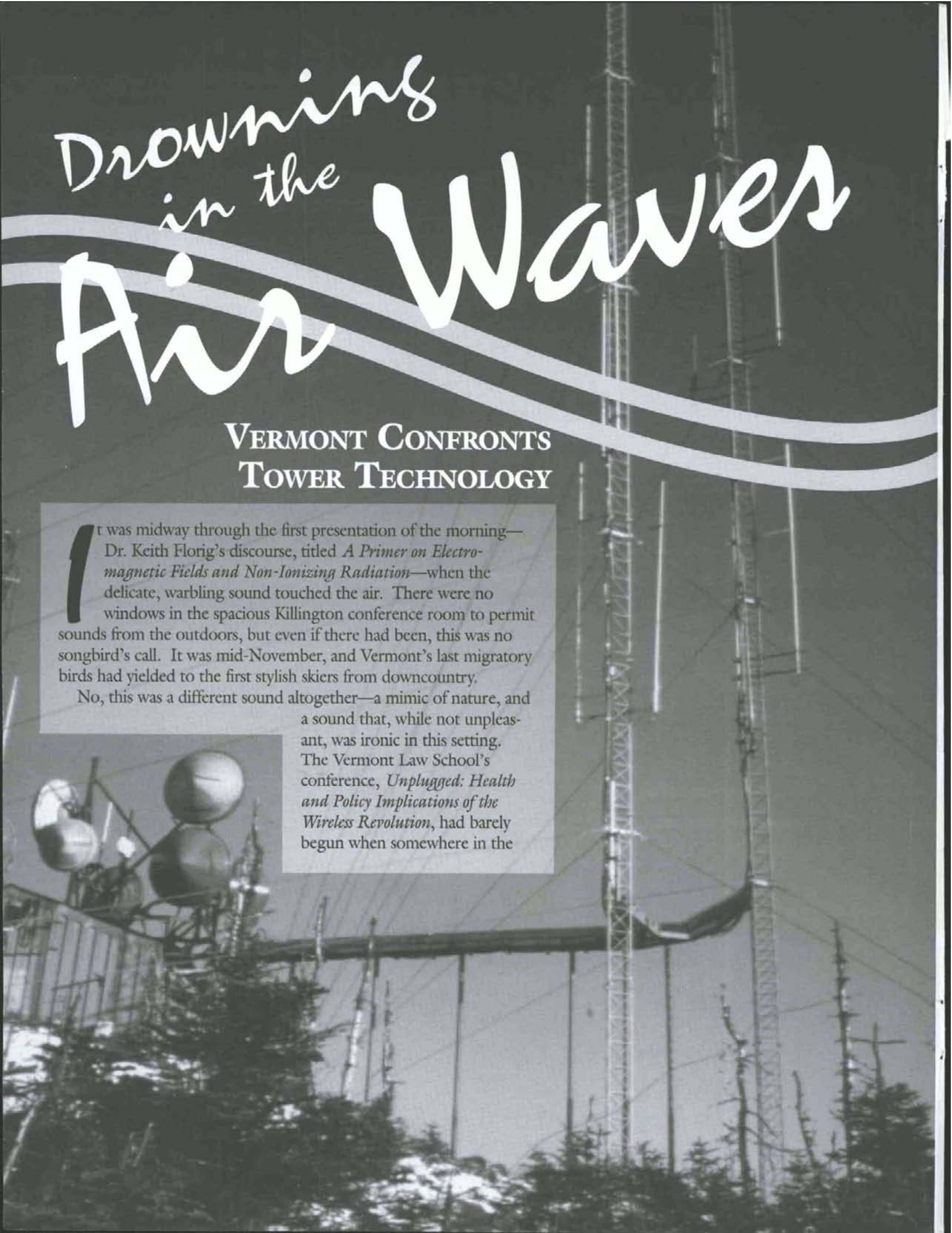
Tom Lincoln
Brooks Estate Pres. Assn., Medford, MA

Drowning in the Air Waves


VERMONT CONFRONTS TOWER TECHNOLOGY

It was midway through the first presentation of the morning—Dr. Keith Florig's discourse, titled *A Primer on Electromagnetic Fields and Non-Ionizing Radiation*—when the delicate, warbling sound touched the air. There were no windows in the spacious Killington conference room to permit sounds from the outdoors, but even if there had been, this was no songbird's call. It was mid-November, and Vermont's last migratory birds had yielded to the first stylish skiers from downcountry.

No, this was a different sound altogether—a mimic of nature, and a sound that, while not unpleasant, was ironic in this setting. The Vermont Law School's conference, *Unplugged: Health and Policy Implications of the Wireless Revolution*, had barely begun when somewhere in the



Charlotte Vs. THE WIZN RADIO TOWER: *A Test Case for Vermont*



But Pease Mountain and Jones Hill lie in the other direction, east of the well-traveled thoroughfare. Despite their modest height (the mountain is 784 feet above sea level, the hill 653 feet), they form somewhat of a geological aberration in the low-lying Champlain Valley. Departing Route 7, Church Hill Road winds quickly into the trough created by the two humped hills. It is on the rise to the north—Jones Hill—where Holly Fournier lives with her husband and two-year-old son.

Virtually at eye level from their driveway, across the small valley and about two-thirds of the way up Pease Mountain, stands the Fourniers' nemesis: An FM transmission tower owned by the Burlington-based radio station WIZN. Holly Fournier has testified that in her home and office (she is part-owner of an investment firm and works above the garage, where she listens for her child's waking cries with a baby monitor), her electronic equipment experiences repeated interference and malfunctions. Her computers and phone system, her TVs, stereo receivers, and clock radios, her postage meter, and the baby monitor at times behave erratically, and at times don't behave at all. The culprit—WIZN's transmitter—stands resolutely across the little valley beaming the disruptive signals that cause these episodes of radiofrequency interference (RFI) day and night.

Holly and her family are not alone. In an informal survey that she and her

neighbors Mary Beth Freeman and Elaine Ittleman conducted a year ago, 88 Charlotte residents and businesses reported electronic interference, ranging from the annoying, to the troublesome, to the bizarre ("singing" toasters—the WIZN signal apparently being picked up by utility lines and delivered into homes through the electric wires).

The owner of a local energy-systems business claims that RFI disabled a series of telephone answering machines, impairing communication with his customers, until he gave up and contracted with an answering service at considerable cost. A local veterinarian complains of problems with her pager and with a heart-monitoring device she uses for sick animals. The pastor of the Charlotte Congregational Church, which is nestled along the road that separates the mountain and the hill, reports interference problems with the public address system, with headsets worn by parishioners who are hard of hearing, and other electronic devices.

The Charlotte Central School, around to the east of Pease Mountain and out of the line of sight of the WIZN tower, contains an investment by the community of some \$400,000 in computers and other educational technology. The school board says the equipment, and thus the curriculum, are plagued by malfunctions and down time. It blames the broadcasting tower.

Pease Mountain and Jones Hill represent high ground in Charlotte. To the west of Route 7, as it proceeds southward in Chittenden County toward Middlebury and Rutland, Charlotte spreads out like an extended hand toward Lake Champlain. The roads are flat and the fields are fertile.

The few tribulations tower projects faced on their way to approval resulted in attempts in the Legislature last winter to deplete the limited powers Act 250 has in this regard.

facilities should be located," says Holmes. "That's where we started on this whole debate, and that's what we'll continue to press for."

Gerald Tarrant, a former DPS commissioner and now a Montpelier-based attorney who represents both broadcasters and citizens groups in siting-related disputes, believes a solution to the conflicts in Vermont could be found if the Environmental Board had legislative authority to require applicants to file a comprehensive "master plan" outlining their objectives in the state. Such plans are often requested when developers apply for Act 250 permits for commercial development; they enable district commissions to examine projects for their overall environmental and municipal impacts, avoiding the faulty assessments that can result from piecemeal evaluation. If master plans were required, they could also eliminate machinations that enable companies to wiggle through the Act's 10-acre loophole.

Furthermore, Tarrant believes that a legal opening for towns to exercise authority over microwave facilities lies in the federal requirement that they meet FCC regulations. The agency does not have the means to monitor its many thousands of licensees, which means that if one operates out of compliance, citizens might suffer for years until the renewal date rolls around.

Rather than leaving that to chance, Tarrant suggests the state could levy a fee on all such facilities, and with the funds thus generated equip some company or public servant with devices for checking—at the behest of municipalities—the exposure to radiation of residents, businesses and institutions.

"I think such a system could work well and be in everyone's interest," Tarrant says. "It could provide reassurance to local citizens and help tower owners by removing an issue, a concern, that could cause them difficulties down the road."

And crucially, Tarrant believes a comprehensive Vermont system of master plans

and fees for transmission applicants would complement, not violate, federal law.

"That's the key," he says. "It's not preemption. It would dovetail with federal regulation, not thwarting the goals of the Telecommunications Act but giving Vermonters an avenue of protection they want and need."

WHEN PUBLIC INTERESTS COLLIDE

If anyone is getting a taste of the complexities and clashing public interests regarding microwave towers, it's Public Service Commissioner Richard Sedano. For in addition to its other provisions, H.795 required Sedano to study the public health and radiofrequency interference issues and report to the Legislature.

That put his department smack in the middle of issues that have stumped many a scientist and regulator to this point. A perfect example is the collision of exposure and aesthetic considerations.

"At our public hearings in Hinesburg and Rutland," says DPS Telecommunications Planner Bill Shapiro, "engineers testified that the higher the tower, the more likely it is that transmissions will go over people's heads and have less potential health impact. On the other hand, the higher the tower is, the more it conflicts with aesthetic concerns that people have."

Nor does co-location—the mitigating effort summoned in Windham County's regional plan—provide a simple solution.

"If you add up all the frequencies and all the impacts, the effects of radiation from several users joined at one location could exceed the FCC's exposure limitations," Shapiro explains. Also, clumping more dishes and antennas together can transform a relatively unobtrusive spire on a hilltop into something truly unsightly.

Sedano, however, accepted the challenge handed his department.

"We're used to facing tradeoffs, not only of competing public goods but of competing public bads," he says. "We know we're not going to invent any science here. We'll

talk about what people think the science is. But the science is inconclusive. That uncertainty will of necessity make more modest the force of whatever we will have to say." (The study, titled *Radiofrequency Radiation: Health Effects and Interference*, was ready for the lawmakers when they returned to Montpelier on January 7; however, early review of the report suggests more work is necessary.)

No such uncertainty pertains to Sedano's view of the state's role as a landowner in the communications tower marketplace.

"We're not after the money, but one of my strong convictions is that the state shouldn't subvert the market," says the commissioner. "The companies are going to pay somebody. If state land or property provides the best site for them, and if it works well for us, then we should offer it at a fair rate."

He extends the same advice to Orange County's Sheriff Frank, who is troubled by the prospect of co-location requirements forcing companies to request space on the county's new tower on Mt. Pleasant.

Says Sedano: "Tell the sheriff if he's in a position to make a buck on this for the taxpayers, he should."

It's clear, after all, that there are a lot of bucks to be made from the very salable commodity of microwave communication. Vermont's challenge will be to craft effective responses to the pressure that telecommunications companies are applying on our municipal and natural resources as the companies expand—and to craft those responses quickly—before the industry's build-out in this state is a done deal.

FOR MORE INFORMATION:

VNRC is publishing a comprehensive paper on the issues of tower siting and electromagnetic fields in Vermont, which will be available in late Spring, 1997. Please call VNRC at (802) 223-2328 if you are interested in ordering a copy.

"At our public hearings, engineers testified that the higher the tower, the more likely it is that transmissions will have less potential health impact.

On the other hand, the higher the tower is, the more it conflicts with aesthetic concerns people have."

— DPS Telecommunications Planner Bill Shapiro

radio waves emanating from radio towers will not be considered air pollution."

Several parties saw the danger from such a sweeping exclusion. Zahner advised the Senate Natural Resources Committee that review of projects by Act 250's district commissions "is consistent with the FCC's policy that local and state authorities share a role in ensuring a community's health, safety, and welfare. The Legislature should not deny local review in those rare instances where a licensee may not comply" with the FCC's standards.

VNRC's Stephen Holmes saw the bill as another attempt to slice off a chunk of Act 250's authority.

"There's a statutory link between Act 250 and the state's municipal and regional planning law," Holmes explains. "Act 250 can employ the standards used in those public planning processes, and Title

24, Section 4407 says that municipalities are empowered to regulate noise, vibration, smoke, dust, odor, heat, cold, dampness, electromagnetic disturbance, etc.

"That legislative effort was driven by Stokes Communications, which was seeking to strip jurisdictional oversight completely out of Act 250. The Legislature was right to reject it."

Still, the Spaulding bill passed the Senate before fading in the House.

Another defeated Senate bill, S.209, would have overridden municipal zoning laws.

"The intent was that if you don't make provisions in zoning to allow cellular facilities, you have to treat them as a conditional use in any district," says Holmes. "Any district! It appeared that the cellular industry was mounting a full-court press, trying to make the most of a pro-

business Legislature."

A third bill, however, was successful, and its ramifications are of some concern to VNRC.

H.795 promotes the use of state-owned property (lands and buildings) for siting wireless communications facilities. Holmes says the bill in its original form would have created a closed bargaining process enabling the secretary of administration to make decisions about public lands without public scrutiny. But conservationists and consumer advocates won certain modifications. In its final version, the bill calls for creation of a group drawn from the public and private sectors—including consumers—to review contracts between the state and facilities owners.

"We still believe the state needs a comprehensive siting policy that will make it a leader in determining how these

SHADES OF THINGS TO COME *continued from page 11*

concern that microwave transmissions from the hilltop would endanger their health. VELCO's lawyer reminded them that there were 67 such towers in Vermont, with no reported public health consequences. Fifteen years later, with microwave transmission stations employed by town rescue units, county sheriff's departments, countless business interests of all descriptions, and three cellular telephone companies, those 67 towers seem a pittance.

In the end, the decision on the Sheffield project was based on aesthetics. In fact, when the district commission rejected VELCO's proposal by a vote of 2-1, it was the first time a major project in Vermont had been turned down for an Act 250 permit

solely on aesthetic considerations.

But like many conflicts, this one ended in compromise. VELCO appealed the decision to the state's Environmental Board, and the board handed the company a permit. However, it reduced the height of the tower from 105 feet to 76 feet, and scaled down the dishes from 10 and 8 feet in diameter to 8 and 6 feet. The tower, according to one long-time participant in the annual Bread and Circus Pageant, is visible from the amphitheater, but unobtrusive.

Hopefully, time has also healed the schism between citizens in Sheffield, who were barely speaking to each other when that conflict was at fever pitch.



"VNRC believes Vermont needs a comprehensive siting policy that will make it a leader in determining how these facilities should be located.

That's where we started on this whole debate, and that's what we'll continue to press for."

— Stephen Holmes, VNRC Acting Executive Director

balked at installing shields to prevent the red, airplane-warning lights from being seen from the ground. The ruling drew the ire of the Stokes Corporation, which later became active in seeking legislation to weaken Act 250's role in tower siting.

Criterion 10 was the basis for the board's rejection of a proposed 110-foot communications tower on Bemis Hill in Rockingham. The decision turned on the regional plan's specific instruction that developers first seek to "co-locate" new facilities at existing transmission and

receiving stations. The Environmental Board has not promoted co-location as an antidote to proliferation. But the regional plan's clear language bought the Windham County town at least a temporary reprieve from another new Erector-set tower on its horizon.

Microwave towers have fared well under Act 250. In January 1996, Environmental Board Administrator Michael Zahner wrote to a legislative committee: "Over the past five years, 32 Act 250 permits were issued for broadcast and communications

towers . . . Clearly, Act 250 has not impeded [their] construction."

But the few tribulations such projects faced on their way to approval resulted in attempts in the Legislature last winter to diminish the limited powers Act 250 has in this regard. Specifically, three bills were proposed, each meeting resistance from VNRC.

Sen. Jeb Spaulding, D-Washington, himself a former radio station owner, sponsored S.329, which would have provided that, "for purposes of Act 250,

SHADES OF THINGS TO COME

How A Tower Proposal Divided a Vermont Town Fifteen Years Ago

At the time, it would have taken some prescience to know how common the story would become. But in 1984, when a group of more than 100 citizens from the northeastern Vermont towns of Sheffield, Wheelock, Lyndon, and Glover mounted an organized opposition to a microwave communications tower proposed by the Vermont Electric Power Company (VELCO), the debates over this new technology were in their infancy.

Yet all the elements that in the ensuing 15 years have become focal points when citizens and communities contend with microwave facilities sprouting upon their hilltops, were there in the conflict that was waged before the District 7 Environmental Commission.

Primarily, though, the case turned on the issue of aesthetics—which was heightened in the Sheffield tower case by the proximity of the proposed site to the natural amphitheater in Glover where the famed Bread and Puppet Resurrection Circus is held every summer. The 105-foot tower, rising 60 feet above the treeline and sporting a pair of metal dishes 10 feet and 8 feet in diameter, would have been visible to the gathered thousands two miles away as they sat on the slopes watching the pageant. Not lost on anyone was the irony that the story line in that visually dramatic event frequently depicts conflicts between a simple agrarian life and a combative

technological world.

Looking back, the Sheffield story provides an interesting perspective on events in Vermont as they developed through the 1980s and 1990s. The case caused bitter divisions in Sheffield as combatants brought different aesthetic values—grounded in very different lifestyles—to the table. This was a year before the Environmental Board's Quechee decision, which introduced some consistency to questions of aesthetics in Act 250 deliberations. In Sheffield, the lack of such standards added fuel to the fire, ensuring that the disagreements would take an unfortunate personal turn.

Interesting, too, is that VELCO wanted the Sheffield site as one of three tower stations it would build in the Northeast Kingdom to monitor and control power flows over the new transmission-line corridor carrying electricity from Hydro Quebec to the grid that supplies power for New England. Much of the support expressed for the Sheffield tower was rooted in economic considerations: Hydro Quebec power promised to be plentiful, reliable, and inexpensive. Now, in 1997, Vermont utilities are trying to renegotiate their Hydro Quebec contracts because the Canadian power has risen above market prices.

People opposed to VELCO's project also expressed

continued on next page

It falls to the Federal Communications Commission (FCC) to protect the population from such exposure. But Hutchins says the FCC has been hampered by trends since the Reagan years to downsize government.

be well below those used in Europe) go into effect, exposure that is currently legal will become illegal—even though, obviously, the physical response between tissue and microwave won't be any different.

It is generally agreed that the Telecommunications Act language cited above removes one aspect of tower regulation from the arsenal of citizens who would mount localized protests: RFR from wireless communications facilities. The Act is silent about RFR from other facilities, such as broadcast towers, and it does not specifically address the jurisdictional boundaries over RFI (interference). So lawyers in the employ of citizens or companies must piece their legal arguments together by finding continuity in the language of disparate federal regulations and case law.

And what of other public concerns, such as aesthetic objections to constructing ungainly, Erector-set towers, festooned with clumsy disks and antennas, against a beautiful skyline? Companies can and do argue that these concerns clash with Congress' goal of providing Americans unimpeded cellular access.

FCC's DOCTORS ARE OUT

The scientific community, which has been divided for nearly 20 years over the public health relevance of low-frequency power lines, has similarly not reached consensus about public dangers posed by these higher-frequency facilities. Microwave transmissions are within the non-ionizing spectrum, meaning that under normal circumstances—that is, outside of their direct beam close to its source—they do not heat body tissue. But is there a danger from long-term, nonthermal exposure?

That uncertainty is just one of the conflicts Vermont faces in an era in which the telecommunications industry has convinced Congress to write into law the doctrine that every cellular-phone-toting American has an inalienable right to be free from "dead spots" along the nation's

highways and byways. As the citizens of Charlotte, Vermont, have discovered, broadcasting towers can pose unexpected interference problems, causing or contributing to the malfunction of electronic devices that households, offices, and schools in other communities take for granted. (See "Charlotte Vs. The WIZN Radio Tower," page 14.)

Altogether, these health, safety, nuisance, and aesthetic concerns present Vermont with perhaps the most complex menu of environmental dilemmas its citizens have ever encountered—a jolt from the 21st century as the chickens hatched by 20th century inventions come home to roost.

"Radiofrequency emissions may be more nefarious than smokestack emissions because you can't see them," says Mark Hutchins, an engineer and consultant from Brattleboro who specializes in helping broadcasters overcome problems related to interference and facility siting. "The commercial FM band is within the human resonance range," he says, which means that human tissue absorbs its radiation. But because the penetrating radiation bypasses the normal pain mechanisms, our bodies don't feel the heat and pull away from it.

It falls to the Federal Communications Commission (FCC) to protect the population from such exposure. But Hutchins says the FCC has been hampered by trends since the Reagan years to downsize government. Under the Environmental Protection Act, the FCC is responsible for establishing exposure standards, but it has never pretended to expertise in health and safety or environmental matters. Other agencies, like the Occupational Safety and Health Administration (OSHA) and the Environmental Protection Agency (EPA), have not had the funds to support studies that might provide objective government standards.

So the FCC has adopted guidelines from organizations that some observers consider suspect because they are linked to commercial and/or military interests. For years,

the EPA considered those American National Standards Institute (ANSI) and International Electricians and Electronics Engineers (IEEE) standards to be seriously flawed. In August, the FCC adopted new standards from the National Council of Radiation Protection and Measurement (NCRP), which Hutchins and others believe will be an improvement when they take effect some time in 1997.

But remember—the standards are for exposure, *not* emissions. A licensee might simply be required to post signs or erect fences to keep the public at a distance.

And, Hutchins says, even the new NCRP standards calculate only for thermal exposure. Questions about long-term, low-level exposure remain unaddressed.

EXAMINING THE STATE'S ARSENAL

In Vermont, district environmental commissions have sought to apply three of Act 250's 10 criteria to cellular services projects: Criteria 1 (air pollution), 8 (aesthetics), and 10 (conformance with town and regional plans). Opponents of the radio tower in Charlotte are adding other criteria to this list, pertaining principally to the town's wish to protect its investment in educational technology at the Charlotte Central School.

The "air pollution" cited in Criterion 1 is RFR and RFI. The industry argues that since Act 250 does not define air pollution, and Vermont's Agency of Natural Resources includes neither RFR nor RFI in its regulations, there is no basis for examining projects under this criterion. But the federal EPA, guided by the Clean Air Act, has stated in the context of occupational exposure that RFR is a form of air pollution. On this point, Vermont's public planning law concurs.

The Environmental Board has applied its "aesthetics" criterion to at least two tower projects on the basis of their incompatibility with their natural surroundings. One was an existent 180-foot radio tower in Randolph owned by Stokes Communications Corporation, where the owner had

And what of other public concerns, such as aesthetic objections to constructing ungainly, Erector-set towers festooned with disks and antennas, against a beautiful skyline? Companies can and do argue that they clash with Congress' goal of providing Americans unimpeded cellular access.

roads, power lines, and other necessary infrastructure.)

"If the Rinkers decision holds up," he says, "it could serve other companies as a manual on how to get past Act 250."

But Stanak also believes the key to making Act 250 effective in these projects is getting the public sector involved.

"The process only works to the extent that the parties participate," he says. "A lot of the heavy hitters—regional planning commissions and state agencies—aren't even coming to the table. They're nonentities."

Parties that do come to the Act 250 table find considerable disagreement about the state's statutory or regulatory jurisdiction over microwave facilities. In a memorandum to the Environmental Board filed for the Rinker decision, Atlantic Cellular argued that Congress gave the FCC authority to regulate broadcast facilities in the 1934 Communications Act, and the FCC had since extended that authority to cellular service. The policy of the FCC is to facilitate seamless nationwide cellular service, Atlantic contended, and to that end FCC procedures preempt state law.

But federal preemption is a point of contention that has, if anything, been exacerbated since last February, when Congress passed the Telecommunications Act of 1996, a sweeping update of the 1934 legislation.

At first glance, the act appears to give fresh blessing to state and local authority. Section 704, dealing with siting policy, states: "Except as provided in this paragraph,

nothing in the Act shall limit or affect the authority of a state or local government or instrumentality . . . regarding the placement, construction, and modification of personal wireless service facilities." But the paragraph "provides" as follows: No state or local action can "have the effect of prohibiting the provision of personal wireless services," or "regulate the placement, construction, and modification of personal wireless service on the basis of the environmental effects of radio frequency emissions if such facilities comply with the [FCC's] regulations concerning emissions."

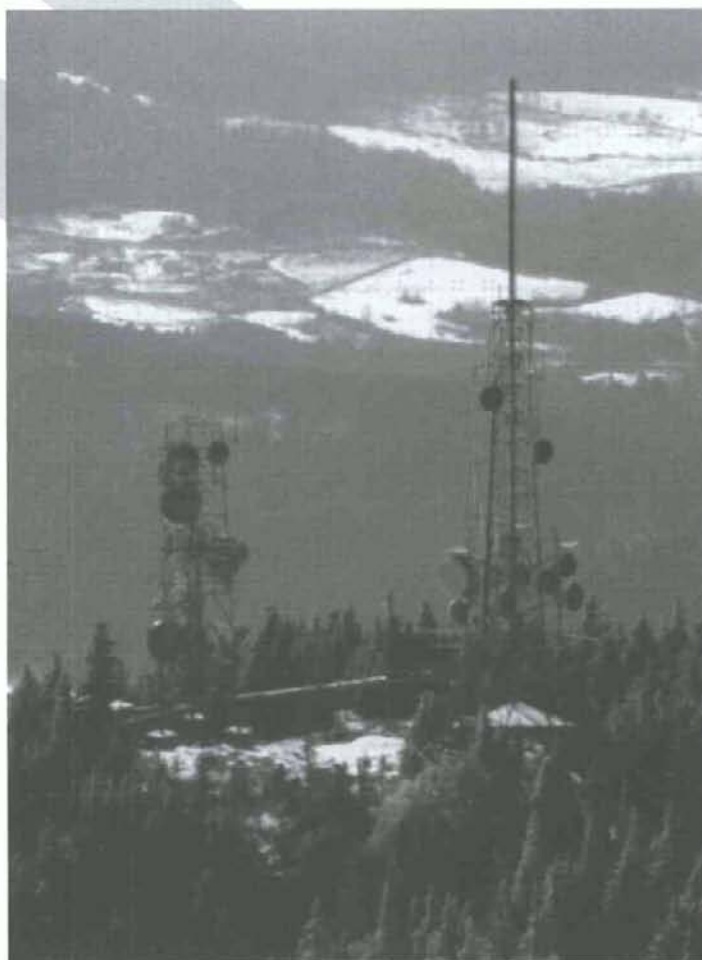
It's a lawyer's treasure-trove, posing a knot of conflicting interpretations for the

courts to untie.

Consider, first, that the subject matter is divided into two categories: Think of them as broadcast towers, which beam the signals to your car radio at drive time, and cell-phone towers, which make possible the "personal wireless service" addressed above in the Telecommunications Act. The technology used for both kinds of towers can produce two effects that neighbors and/or municipalities might find worrisome: Radiofrequency radiation, known as RFR, and radiofrequency interference, or RFI.

(For licensing purposes, the FCC considers RFI to be interference of one radio signal with another station's signal—a sort of traffic jam of the airwaves, which the agency is supposed to police. For lay people, however, RFI also refers to the unfortunate effect microwave signals can have on household, business, medical, and institutional electronic devices. It might cause them to malfunction—i.e., garage doors that don't open on electronic command, or open at the wrong times in response to some other signal—or it could cause the equipment to become damaged or disabled.)

Adding to the confusion that ensues when people wade into this morass of slippery but important distinctions is the difference between *emissions* of RFR and *exposure* to it. FCC law applies to exposure, not emissions; it attempts to limit the risk to employees and the general public from getting too close to broadcast transmitters. Recently, the agency's exposure standards have shifted; when new standards (which will still



"The process only works to the extent that the parties participate. A lot of the heavy hitters—regional planning commissions and state agencies—aren't even coming to the table. They're nonentities."

— District Environmental Coordinator Ed Stanak

up on existing towers. Support for that view—in spirit if not in letter—is echoed by a surprising source.

No. . . . Atlantic Cellular emphatically does not favor a "co-location" requirement; the company's attorney and representative, Holly Ernst Groschner, says providers must have flexibility in siting to serve their "cells"—the small, geographically congruent groups of customers served by each network of facilities. But the Colchester-based company claims a low-profile siting policy. Of the 40 facilities it has installed during its seven years in Vermont, Groschner says only three have involved the construction of new towers. The rest have attached to existing structures, including towers, buildings, water tanks, and silos.

Groschner touts Atlantic Cellular's local roots, and says the company believes the key to success for any

business in Vermont lies in limiting the impact of its activities on the environment—even though that can mean deploying a greater number of discretely-sited facilities in order to serve a cell. "When I drive to work, I would rather see more sites that are proportional to the Vermont landscape than great monoliths to human technology that distort the viewshed," she says.

In fact, the industry's trade association trumpets the purported environmental advantages of cellular technology. It claims

that those advantages, as well as economic concerns, are motivating developing countries to skip land-based communications entirely.

"Wireless phones replace a system that requires millions of trees to be cut down for the poles, and tons of copper to be mined for wire. Most developing countries . . . are now going

directly to wireless so they will not have to string thousands of miles of wire across their landscapes," writes CTIA vice president Tim Ayers. That argument, however, is undermined by the fact that telephone wires usually piggyback on electric utility poles, and that fiber optics are replacing traditional cable for many phone services.

THE PREEMPTION CHESS GAME

Whatever its merits, co-location—that is, combining microwave equipment on the same structure, even when the owners are competitors—is not written into Vermont law.

In fact, very little is written into statute or regulation pertaining to microwave communica-

tions. The district commissions and the Environmental Board controlling Act 250 are feeling their way through a tangle of issues, and at least one district coordinator believes the commissions are being outgunned by the corporate interests promoting facility siting.

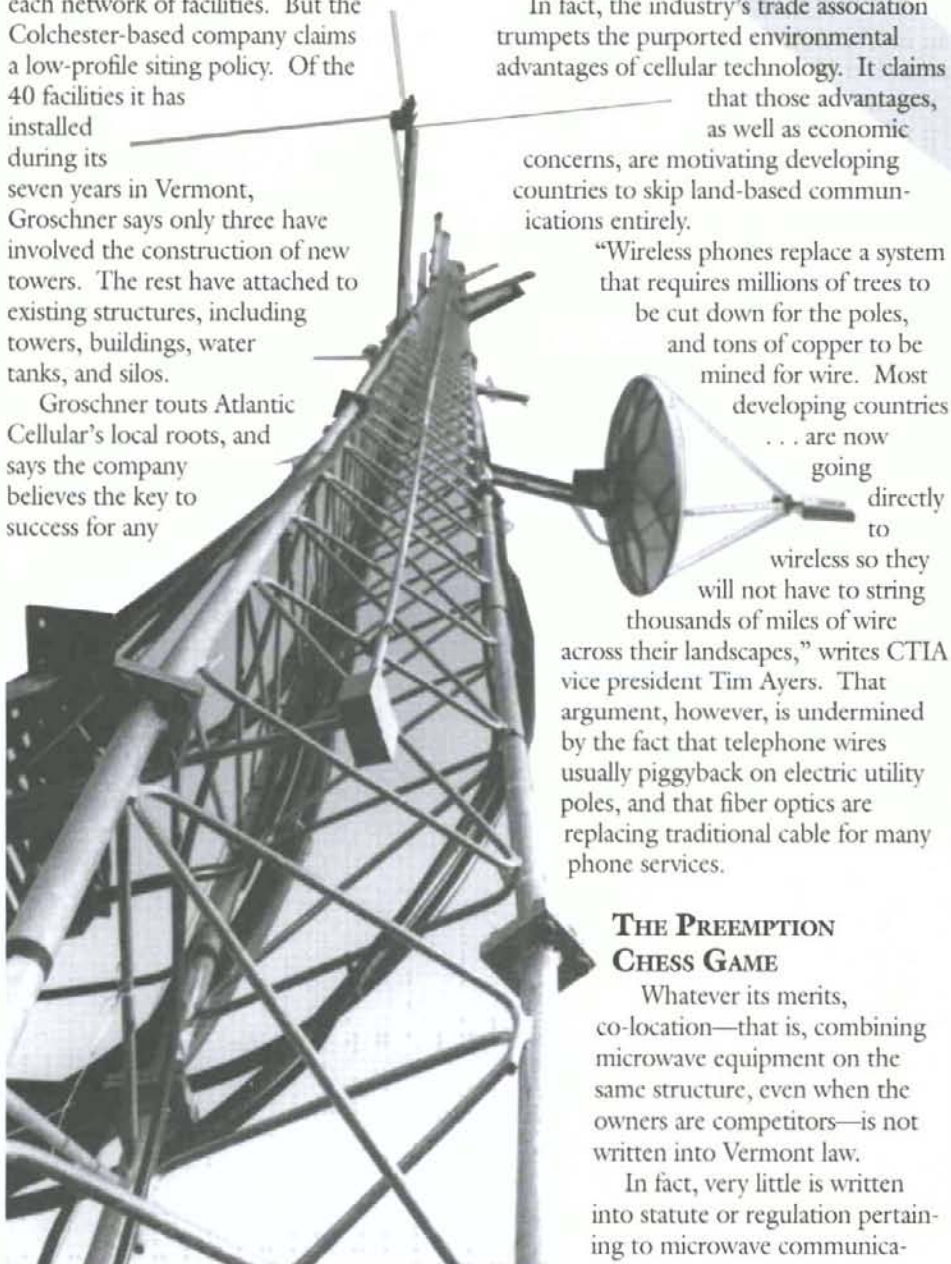
"The bigger law firms are way out in front, finding loopholes and coaching companies to thread the needle through the Act 250 process," says District 5 Coordinator Ed Stanak.

He points to a project on Mount Irish in Berlin, where Atlantic Cellular erected a 130-foot telecommunications tower (presumably, one of its three construction sites) on a parcel of land owned by Rinkers Communications, a local paging and answering service based in Barre. In 1980, Rinkers bought a tower erected at that location 25 years earlier by a company for radioing its truckers. Those were the early days of wireless communication, and Act 250 didn't exist then either. Projects were grandfathered into the act when it took effect in 1970.

Originally, Rinkers leased the land that held the tower. Later, in a complex series of events, Rinkers purchased 28 acres of the land, replaced the original tower, and leased space on it to Atlantic Cellular.

Then, two things happened: Atlantic decided to build its own tower on Mount Irish, and Rinkers sold off all but five acres of its property to a private couple, reducing its holdings to less than the 10 acres that trigger Act 250 review. The Environmental Board last May held that Rinkers' divestiture of land was not related to its later deal with Atlantic, and that the five-acre tract put the project below Act 250's threshold.

Stanak believes the board applied rules that pertain to municipal, not private, developments, and that the total of "involved land" for the Mount Irish site warranted the board's full consideration. (The term "involved land" refers to the sum of land that contributes to and makes a project viable; that is, not only the acreage upon which the development is situated, but, for example, easements for access



*All this growth is taking place in an industry
virtually unregulated by the state.*

carry nuclear power produced at the Vermont Yankee plant in Vernon northward to Brattleboro, then continue on to Cavendish before turning westward and extending to Rutland. Except for the population centers at each end of this 79-mile length, these 345 kV lines also traverse a fairly low-density region. Much more of Vermont, some 370 linear miles, is serviced by 115 kV transmission lines. More common still are the smaller 34.5 kV and 46 kV lines, which service substations that reduce the voltage further for transport via distribution lines to residences and businesses (where the current is reduced again to "service voltage"—120 to 240 volts—by the transformers you can see mounted on your roadside utility poles).

A reasonable conclusion, then, would be that if there is a health threat from power line EMFs, the dispersed residents of Vermont are relatively safe from it.

'CELL DIVISION' IN VERMONT

No such asylum extends to radiofrequency radiation. Broadcast facilities blanket the state (AM and FM radio—plus television, where digital, high-definition technology will soon erupt in a demand for a whole new generation of transmission facilities). And microwave transmissions in Vermont are now the province of hospital emergency rooms, sheriffs' departments, and local rescue operations, as well as private paging services and point-to-point voice, video, and data transference related to business activities.

Most important, the cellular phone companies have Vermont squarely in their sights.

"The cellular telephone business is growing very fast here," says Commissioner Richard Sedano of Vermont's Department of Public Service. "Customers want this service."

Three companies are licensed to operate in the state. Atlantic Cellular (d/b/a Cellular One) serves all of Vermont, and Bell Atlantic NYNEX Mobile (BANM) serves all but the two southernmost counties, Bennington and Windham.

US Cellular operates only in those counties.

"Atlantic Cellular says they have on the order of [40] sites at this point," says Sedano, "and they feel that will be more than half the sites they're eventually going to need. BANM has 15 to 20 sites, and they'll probably need about that many sites again."

An emerging technology called personal communications systems (PCS) will add even more towers to the Green Mountains. PCS is a digital, rather than analog, system and requires more transmitting facilities per



area served. Sprint, the long-distance telephone company, recently purchased at auction the higher-frequency PCS band widths for Vermont from the FCC. It plans to begin deploying its Vermont system in 1997.

(And what about the FCC auctioning band widths—which as natural phenomena would more appropriately seem to be the government's to oversee as a public trust, rather than a commodity to sell to commer-

cial bidders? Suffice it to say that, according to the Washington, D.C.-based Resources for the Future, auctions of certain portions of the spectrum have brought the FCC \$20 billion in revenues since 1993; that can buy a lot of deficit reduction.)

All this growth is taking place in an industry virtually unregulated by the state. The Public Service Board requires only a Certificate of Public Good, which addresses the benefits to Vermonters of the services to be rendered, not an accounting of the health and safety implications of a project.

And there are the municipal users. The Orange County Sheriff's Department owns a Rohn 45 tower that Sheriff Sam Frank has been trying for six years to have erected somewhere. Finally, construction has begun on Mt. Pleasant in Williamstown.

"Every time we thought we had a location, someone would put up a stink—a 'not in my backyard' type of thing," says the sheriff. "We could have taken land by eminent domain but we chose not to, both for financial and public relations reasons."

From a distance, says Frank, the 180-foot tower will look like a needle in the sky.

"In this terrain there are a lot of mountains, and radio communications for us is extremely bad," Frank explains. "That's why we need the tower. This is not a pleasure thing. It will help us for law enforcement, fire and ambulance, and rescue operations."

"Actually," Frank says, "I could use four towers for four locations, and even that wouldn't give us 100-percent coverage. That's just the way Vermont is. There are a lot of what we call dead spots. But we'll just do the best we can with what we've got."

With so many different entities now involved in wireless communications, it's hard to predict how many towers there eventually will be. Some people expect 200 more facilities in Vermont before the build-out is complete.

There is an interest in some quarters in reducing that number by requiring companies and municipal services to double

*We know enough science to get us our inventions, but not enough to know,
until too late, what we have wrought.*

to be told again in the proliferation of technologies that, as author Blake Levitt said, have "altered the electric field of the world without [our] knowing the consequences."

But we will know the consequences in time, for as Dr. Paul Heroux, a research scientist from Quebec, pointed out, a body of evidence is accumulating day by day.

"In the future, you will all be using . . . cellular phones," he told his audience, "and that may solve the research problem."

"Oh, I see," said VNRC's Acting Executive Director Steve Holmes, nudging his neighbor in the audience. "The bodies of evidence will be us."

THE GREAT POWER LINE DEBATE

For years, the greatest public health concern in this realm has centered on the electromagnetic fields (EMFs) created by electric power lines. The live wires that extend into nearly every corner of human habitat have been connected, at least epidemiologically, to elevated rates of childhood

leukemia and brain tumors. Several studies in the U.S. and Europe have identified an occurrence of leukemia in children who live near complexes of power lines that is one and one-half to three times higher than in children farther removed from the overhead pulse of electricity.

million), microwave ovens produce an energy field at frequencies in excess of one gigahertz (GHz, or "billion") to excite the molecules in food and make it hot. It is high frequency energy waves—and in particular the "ionized" ranges used in X-rays and radiation therapy—that alter matter, including human tissue. In the U.S., power lines operate at 60 Hz. If you pick up a downed transmission wire, you'll get electrocuted, not irradiated.

Efforts to ascertain whether power line EMFs pose a danger have produced no absolute verdict—although the latest such study, published in October by

the National Academy of Sciences (NAS), makes some claim to doing so. The NAS committee reviewed 500 EMF studies performed over 17 years and came down on the side of absolving power lines. The news media ran with the committee's majority report: "Panel Sees No Proof of Health Hazards from Power Lines," trumpeted *The New York Times*; "Study Clears Magnetic Fields as Cancer Cause," echoed *The Rutland Herald*.

But like a Supreme Court decision, there were dissenters among the panelists. Statements found in the bowels of the report were far more equivocal.

"Overall, the data from published studies (of residential magnetic field exposure and cancer) support an argument for an increased risk with higher exposure levels; however, the anomaly between measured magnetic fields and wire codes in different cities severely weakens this interpretation" (NAS Report, page 163); and "(T)he most recent studies have increased rather than diminished the

likelihood of an association between occupational exposure to electric and magnetic fields and cancer,

but they have failed to establish an association with a high degree of certainty" (NAS Report, page 169).

Earlier studies had implicated power line EMFs in elevated cancer statistics in Denver, Los Angeles, Rhode Island, Sweden, Mexico, Greece, and other locations. In New York and Connecticut, too, they were thought to be complicit in cancers afflicting children and adults employed by electric utilities. The NAS could not explain away the higher statistics found in a dozen or so studies of the issue.

To the extent the connection applies, it is transmission lines rather than the lower-power distribution lines that concern public health advocates. Vermont's population is small and relatively scattered, so there are fewer high-kilovolt (kV) transmission lines running through our state.

The most powerful lines, 450 kV, traverse 52 miles of the Northeast Kingdom, delivering Hydro Quebec power to Vermont and to the cities of southern New England. From Norton through Lewis, Bloomfield, Brunswick, Ferdinand, and Granby on south to Waterford, the lines travel through some of Vermont's most sparsely populated towns. According to Ed Congdon of the Vermont Electric Company, Vermont's main transmission entity that is owned in partnership by most of the state's electric utilities, the lines travel almost exclusively through rights-of-way blazed through forest lands owned by the paper companies that dominate land ownership in the Kingdom. Congdon said the 450 kV lines miss villages and settled areas altogether.

The next most powerful transmission lines are in the southern counties. They

*Clearly, the cell-phone has arrived.
Congress and the Vermont Legislature both passed laws
in 1996 to encourage the wireless communications industry, metaphorically
watering the mountaintops where new facilities will sprout.*

audience someone's cellular phone went off. It was followed soon by another, and then a third cell-phone signal. On the perimeter of the audience, all through the two-day conference people could occasionally be seen huddled against the walls for privacy, holding the portable, pocket-sized telephones to their ears, the slender antennas extended alongside their heads to catch the invisible signals.

Much of the conference time was devoted to the question of whether radiofrequency radiation, the energy waves that carry the signals for cellular phones, endanger the health of their users. And here were the conferees, many of them, keeping tabs on their responsibilities elsewhere by means of the same apparatuses.

Clearly, the cell-phone has arrived. And there will be no cramming this genie back into its bottle. The U.S. Congress and the Vermont Legislature both passed laws in 1996 to further encourage the wireless communications industry, metaphorically watering the mountaintops where new towers for microwave transmitting and receiving facilities will sprout.

In fact, some Vermont senators last year had overreached themselves, seeking to provide nearly carte blanche for communications companies to set up their towers with diminished opportunity for residents to challenge them. Even in a state tethered to the interests of tourists—which includes their expectation of up-to-date links to their homes and offices far away—that was too much. The Senate bill died in the House, VNRC helping see to its demise.

These Vermont actions were mere skirmishes in a growing

regulatory war with fronts all over the United States. For when it comes to the broadcast and telecommunications industries, Vermont isn't the "bad guy" that supporters of economic progress at any environmental price often make it out to be. Nor is Act 250 particularly a villain—no more so than the planning commissions and zoning boards that have been the forums in other states for citizens to make their concerns known about telecommunications towers and the cryptic science that surrounds them.

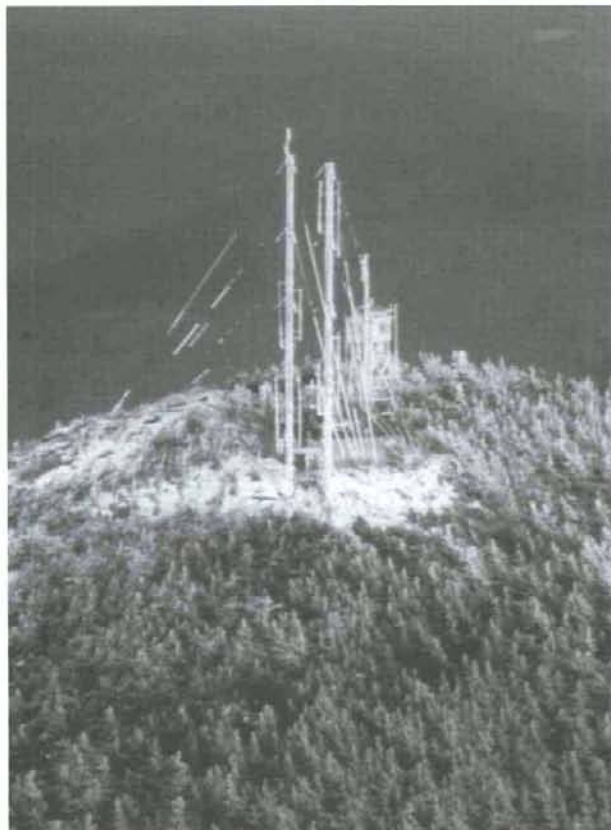
But such citizens have not fared well. That is because:

- (1) Local governments are constrained in some respects under federal laws that bequeath authority to the Federal

Communications Commission (FCC); in other respects, local officials such as zoning board members may have more power than they realize, but to wield it effectively they'll need to develop means, for example, to test whether licensed facilities in their towns continue to operate in compliance with FCC standards;

- (2) Industry giants like NYNEX, with seemingly limitless funds and political clout, are the major players in the burgeoning wireless communications industry; and
- (3) Citizens challenging the industry are standing in the tide of technological progress. Unarguably, people want their cell-phones and pagers. The Cellular Telecommunications Industry Association (CTIA), tallying its expansion in 1995, claimed a 40-percent annual growth that had brought the total number of wireless customers in the United States to 33.8 million at the end of that year, with revenues of \$19 billion. Citizens also want the other benefits of cellular technology, including access to 911 services from their cars and the best communications possible for police, ambulance, and rescue squads. And they want the entertainment choices offered by the newest TV and radio systems.

Yet, as scientists, advocates, and attorneys pointed out at the Killington conference, technology, driven more often than not by financial opportunism, often outpaces our understanding. We know enough science to get us our inventions, but not enough to know, until too late, what we have wrought. It's an old story, perhaps



Not lost on these residents, business owners, and town institutions—the church, for example, has at times served the community as a kindergarten—are the public health implications of the interference they experience in their equipment.

“Our bodies are electrical fields,” Holly Fournier points out. “Interference is a byproduct of radiation, so what’s going on with this electrical equipment is an indication of what’s going on in our bodies.”

A CAULDRON OF ISSUES

Charlotte has become synonymous in Vermont with all the troubles, doubts, fears, and frustrations citizens have begun to feel toward communications towers of all sorts. It is Vermont’s highest-profile case of interference, and the symbolic connection Fournier draws to the unresolved public health issues surrounding microwave technology makes Charlotte’s predicament all the more compelling. For even though you can’t see the seemingly random signals that have caused a chaos of electronic interference in that town, the annoying results in Charlotte are tangible—more so than the invisible radiation that people in other places suspect is threatening harm to their bodies and brains.

Charlotte is an important case for other reasons, as well. It is there that crucial issues of local and federal jurisdiction are being played out—and where determinant decisions may be made concerning Act 250, zoning, and the proper province of the Federal Communications Commission (FCC).

Fournier and Freeman are the primary forces behind Citizens for the Appropriate Placement of Telecommunications Facilities, a citizens group with 200 members formed to find some way to rid the town of its plague of RFI. “We’re not trying to run WIZN out of business, but we want them to find a more appropriate location for the tower,” says Fournier.

The siting of the structure, most agree, is the primary problem.

“It’s too low on the hillside,” Fournier says, meaning that the signals beamed from its 199-foot tower do not sail harmlessly over her home on Jones Hill but carom closer to the ground and thus to people’s real and personal property. (The topmost acreage on Pease Mountain is owned by the University of Vermont and is off limits to the station.) Some people also believe WIZN’s 50,000-watt signal is stronger



Activist Holly Fournier, a primary force behind local citizen’s group.

than it needs to be to serve its licensed area.

The station’s personnel insist they are fully in compliance with FCC standards. They have made efforts to appease the town’s citizens, replacing damaged equipment in some cases. But the ultimate remedies would be either to raise the tower significantly—sections can be added or removed from these structures—or to dismantle it. With a small airstrip located nearby, with a 200-foot height limit placed by the Federal Aviation Administration on unlighted towers, and with certain opposition from the Zoning Board of Adjustment, adding further height to WIZN’s facility is out of the question.

Another factor is the sharpening animosity toward the station expressed by local officials, who are grating over assurances by the broadcasters in 1987 that the transmitter would cause no problems and that WIZN would take care of any that did arise. The Charlotte Select Board, in a November 1996 letter, forthrightly told WIZN Station Manager Arthur LaVigne: “Simply put, your presence is not desired” in Charlotte. This, despite the fact that in addition to a microwave antenna for

cellular phone service owned by Bell Atlantic NYNEX Mobil (BANM), the tower also hosts communications equipment for the town’s fire and rescue company.

The legal effort to bring about a solution is being waged at almost every conceivable level, including the town zoning board, the District 4 Environmental Commission, the Vermont Environmental Board, the state’s Environmental Court, and federal district court. Issues include:

- A contention that the tower was erected at the wrong location (even though a zoning official was on hand when the stakes were driven), and therefore violates regulations separating commercial and residential zones. The station and its engineering consultants firmly dispute the allegation.
- Whether the FCC, which licenses broadcasters, has exclusive jurisdiction over the regulation of RFI. WIZN, citing federal law and the Telecommunications Act of 1996, contends that it does, and they convinced the Zoning Board the town was powerless in this regard. But Gerald Tarrant, the attorney representing the citizens group, submitted a motion to federal court that asserted: “The Town of Charlotte is not preempted from exercising reasonable oversight and control over radio and cellular services that cause pervasive, harmful interference to . . . its citizens.” Local authority is preempted regarding the siting of facilities for personal wireless services, but as for broadcast facilities, Tarrant has said, the FCC’s intent is that “you can’t have a radio station that conflicts with another radio station . . . The FCC does not (monopolize the law) in terms of toasters and computers and garage door openers. I believe if you read the Telecommunications Act properly, it preserves state and local authority” over such RFI issues.
- Act 250 permits, both for the BANM antennas that were added to WIZN’s tower in 1991, and for the tower itself. BANM applied for and received a land use permit from the district commission, but tower opponents now want the permit revoked, claiming the company neglected to notify adjoining property

owners (who are automatically parties to hearing proceedings under the law) of impending review of the project. WIZN never did receive an Act 250 permit to construct the tower, based on the premise that the site was less than the statutorily required 10 acres. More recently, though, District Environmental Coordinator Lou Borie ruled that the full project totals 17 acres in "involved land," and he ordered WIZN to apply belatedly for a permit. That set off a string of appeals and motions before the commission and the Environmental Board. Given the circumstances that have developed in the ensuing 10 years, a hearing now would be far more contentious than in 1987. The commission, the board, the radio station, and the citizens group are maneuvering, with the citizens laying the groundwork for party status on issues new to the Act 250 process as it has related to

tower projects in the past—particularly concerning the town's investment in its schools.

'ELECTRONIC ABUTTERS'

In terms of precedent, then, as the state adjusts to the new realities of the 1996 Telecommunications Act and the proliferation of broadcast and cellular towers in communities everywhere, a lot is riding on the multifarious Charlotte/WIZN legal proceedings. Interesting new concepts could come out of it—that is, if imagination and a concern for the public interest can gain a foothold over partisanship and the narrow, inflexible view.

For example, an idea floated by broadcast consultant Mark Hutchins of Brattleboro is the concept of *electronic abutters*, which would be a new category of statutory participants in Act 250 proceedings. Hutchins explains that the

RFI problems in Charlotte were eminently predictable, and thus avoidable had the proper science been applied.

"It would have been much better, early on, to have the larger group of people affected by (the development) involved. Instead, we're nit-picking over issues of involved acreage. In the case of WIZN, what we have is an involved village."

Charlotte, in all its legal and regulatory manifestations, will be a test case for the way Vermont responds to a 21st century technological and cultural challenge. And in a sense it will be a test of our mettle: Can we learn from the dispute, and enable policy to evolve relative to siting, land use, and other considerations inevitably linked to transmission towers?

Or will heels be dug in and no quarter given, dooming all sides to trench warfare over Vermont's high ground—one green hill and one mountain peak at a time?

ALPINE DEVELOPMENT SQUEEZING THE BICKNELL'S THRUSH

Our high-elevation mountaintops in Vermont aren't what they used to be. Acid precipitation and cloud water pollution have corrupted the soil and stunted the red spruce and balsam fir that dominate those subalpine peaks.

Humanity has intruded more directly at these elevations, too. Ski resorts have carved great swaths though the woods and planted gondola terminals and restaurants near the once-remote summits. Even activities with more benign environmental purposes, such as wind-power installations and backpacking trails and shelters, have encroached

upon lofty heights that people once admired from afar.

Add now to these intrusions transmission and communications towers, which began to appear in the middle of the century (WCAX built its first tower on

Mt. Mansfield in 1953) but are proliferating as telecommunications technology expands in Vermont.

The world, then, must seem quite different to a Bicknell's thrush. For the mountaintops that are being altered—in some cases radically, in some a little at a time—are the thrush's summer habitat. Its winter range is, if anything, even more threatened. Much of the Caribbean rainforests have been clear-cut or burned as human populations grow in Haiti and the Dominican Republic, where the Bicknell's is known to migrate. (This songbird had its moment of glory in December, 1995,

when a research biologist netted a Bicknell's thrush in the Dominican that he had captured and banded earlier that year on Mt. Mansfield—a most improbable occurrence reported widely in the media.)

Christopher Rimmer, a Vermont Institute of Natural Science (VINS) biologist who is leading a comprehensive research project on the Bicknell's thrush, wrote in the April, 1993, issue of *Bird Observer*: "At both ends of its migratory spectrum, Bicknell's thrush may be



Chris Rimmer tags a Bicknell's Thrush on Haystack Mountain.

facing significant habitat degradation. The ingredients for a population free fall appear to be present."

VINS categorizes the Bicknell's thrush as "at risk."

"It's not specifically endangered or threatened," Rimmer explains. "It was listed as a federal Category Two species, meaning that it might warrant listing but there was not enough information on the bird. But that federal category has now been eliminated."

The thrush was first recognized by E.P. Bicknell in New York's Catskill Mountains in 1881. The first comprehensive study of the bird and its habitat was performed by a researcher named George Wallace in 1939. His work has provided VINS with some historical context for gauging the health of the Bicknell's thrush population. Ornithologists know, for example, that Mount Greylock in Massachusetts was once an important northern habitat for the thrush, but its population had begun declining there by the 1940s and it has since vanished from that location. Populations in Canada's Maritime provinces have also declined significantly.

Rimmer began his research on the Bicknell's thrush in 1992. He reported survey results the following year confirming that the thrush thrived on Vermont's highest peaks (above 915 meters in elevation), where it was found on 74 percent of the mountains that were studied. There were fewer sightings on lower elevations—single pairs, or a small number of pairs, were found on many of those locations. But on Mt. Mansfield, the state's tallest mountain, there were estimated to be as many as 250 pairs.

Mt. Mansfield seems to host Vermont's largest seasonal population of the Bicknell's thrush. It returns from the Caribbean just before the snow melts in late May and builds its nests of twigs and moss in the stunted evergreens, typically filling the nests with three or four bluish, speckled eggs.

But Mt. Mansfield is also a peak that is spiked with communications towers of various kinds. Television stations WCAX, WVNY, and Vermont ETV have facilities there, along with radio stations WEZF and Vermont Public Radio. The University of Vermont and the Mt. Mansfield Corporation, too, have facilities at the summit. What's more, the mountaintop is earmarked for further development in coming years. The Fox network, reportedly

planning a Vermont studio, has the summit in its sites, and all the TV stations are likely to duplicate their broadcast facilities during a multi-year transition period as digital, high-definition television is introduced in the state.

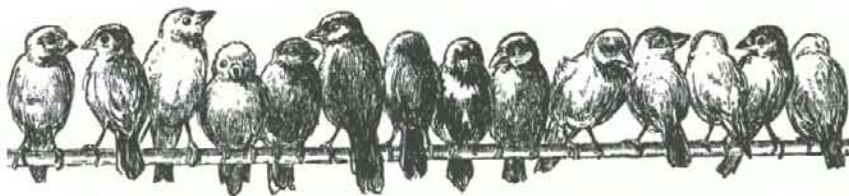
"We don't know to what extent the transmission towers specifically are impacting on the Bicknell's habitat," says Rimmer, "but we list them as one of a series of potential threats. It's clear that every time one of those things goes up a piece of habitat is lost. It is a fragmentation of the habitat. Our concern is the cumulative effect of all these impacts—communications towers, windmills, ski trails. Mountain biking has also surfaced as a new concern."

In some places, towers endanger birds in a more direct way. The birds actually collide with the structures in flight. Frequently the victims are migrating species, and most commonly, for some reason, it is the lighted towers that claim the greatest number. Rimmer cites studies

in south Florida that have shown hundreds of birds killed night after night from these collisions.

"Over the last two autumns, in 1995 and 1996, we've searched in the mornings around the WCAX tower. We've only found three birds, and they weren't Bicknell's thrushes. Perhaps that tower may not be a significant threat of mortality, but we can't extrapolate to assume that the towers in Vermont don't pose such a threat. It's a concern that we have."

Primarily, though, VINS' concern is for degradation of the territory that remains for this migratory thrush with an affinity for Vermont. High-elevation forests are a rugged environment, anyway, where severe weather and other natural conditions increase mortality among all native species. The last thing the Bicknell's thrush needs, as its range is squeezed by humanity's relentless expansion, is the disruption brought by more towers, with their attendant service roads and utility rights-of-way, on Vermont's subalpine peaks.



LINK UP WITH THE CONSERVATION NETWORK!

Join a team of informed individuals who make a difference for environmental protection.

Name _____

Mailing Address _____

Town _____

State _____ Zip _____

Phone (w) _____ (h) _____

Occupation _____

Fax _____ E-mail Address _____

Areas of Concern:

☐ Forest Protection

☐ Transportation

☐ Water Resources

☐ Act 250/Project Regulation

☐ Wildlife

☐ Property Tax

☐ Land Protection

☐ Land Use Planning

☐ Tower Siting

☐ Other _____

Please return this form to:

The Conservation Network, VNRC, 9 Bailey Avenue, Montpelier, VT 05602.

For more information, call Brigid Dunne at (802) 223-2328.

E-mail: VNRC@plainfield.bypass.com

TAKING THE MEASURE OF

Aesthetics

"I'll take six pounds of aesthetics, too, please," says the customer to the store clerk.

"Certainly," the clerk responds. "What kind would you like? We've got some lovely 16th century sonnets; we have serenity derived from contemplation by a peaceful river; we have some wonderful vistas . . . views of the Green Mountains at sunset. There's aroma of gardenias over there, and we might have a little massage therapy left.

"Or would you like the Chopin?" she continues. "We're having a special on the Chopin this week."

"Oh, I'll take the views," the customer says eagerly, smiling as she opens her purse. "How much?"

"The views are \$2.99 per pound," the clerk answers, plunging a stainless steel scoop into the bin of dramatic mountain tops framed in azure sky and wispy, roseate clouds. "Paper or plastic?"

Would that it were so easy! We can quantify much of what we hold valuable in life, but our aesthetic pleasures generally escape such precise bookkeeping. Of course, there is the price of a novel, a pair of concert tickets, or airfare to the Bahamas; but the grander things—the gifts derived from nature and the effect they have upon the human heart—seem almost impossible to tally, even more so because we do not all hold them in the same esteem.

Increasingly, though, it matters what value we put upon them. That's because the world and its beauties are finite, while the appetites of burgeoning humanity seem infinite. Thus we have divined systems that attempt to translate aesthetics into practical, universal terms, and in some respects to affix monetary value to their importance to us.

In Vermont, for example, Act 250 seeks to protect and preserve the aesthetic of unencumbered beauty. Criterion 8 of that law requires that a development project "Will not have an undue adverse effect on the scenic or natural beauty of the area." Yet aesthetics prove slippery, the meaning of *undue* and *adverse* shifting with

the eye of the beholder. A microwave transmission tower erected on an otherwise undisturbed peak might be offensive to one viewer, a thing of beauty to others (technology buffs, or people with investments in the cellular communications industry), or an unnoticed irrelevance to someone else. How, then, to apply the law?

In more practical terms, such a tower might lower the value of a person's property. If the house was built to take advantage of a lovely view that adds to the property's



worth, what is the impact on the owner's investment when a company plants a 180-foot tower, dangling dishes and antennas, directly in the line of sight?

Vague and disputable as these concepts may seem, there are people who are wrestling with them, trying to give form to the commerce and legalities that surround them. The quantification of visual aesthetics is evolving. We do not have a formula for determining exactly how much the tower on the horizon subverts the homeowner's investment, or whether the impact of the tower will be *undue* in everyone's eyes, but the sheer expansion across our landscape of wireless communications towers and TV and radio broadcast facilities may bring us closer to consistent reckonings.

HOW MUCH IS THAT VISTA IN THE WINDOW?

First, though, a body of data is needed, and in the realm of real estate Vermont is a difficult place to accumulate it. Economics professor Myrick Freeman of Bowdoin College in Maine observes that sophisticated statistical analyses have been performed and published which

measure the effects on property values of many environmental factors.

"In the literature where these things have been studied, effects can be found," Freeman says. "They're predictable."

But he adds, with Vermont in mind: "I'm not aware of studies looking at rural locations. In rural areas the number of properties is small, which undermines the statistical validity of any results that might be found. Also, rural properties tend to demonstrate a great deal of heterogeneity." The wide variety of property sizes, uses, levels of maintenance and other variables in a place like Vermont makes it difficult for economists to establish categorical definitions of properties.

"The studies are mostly done in urban areas," Freeman concludes.

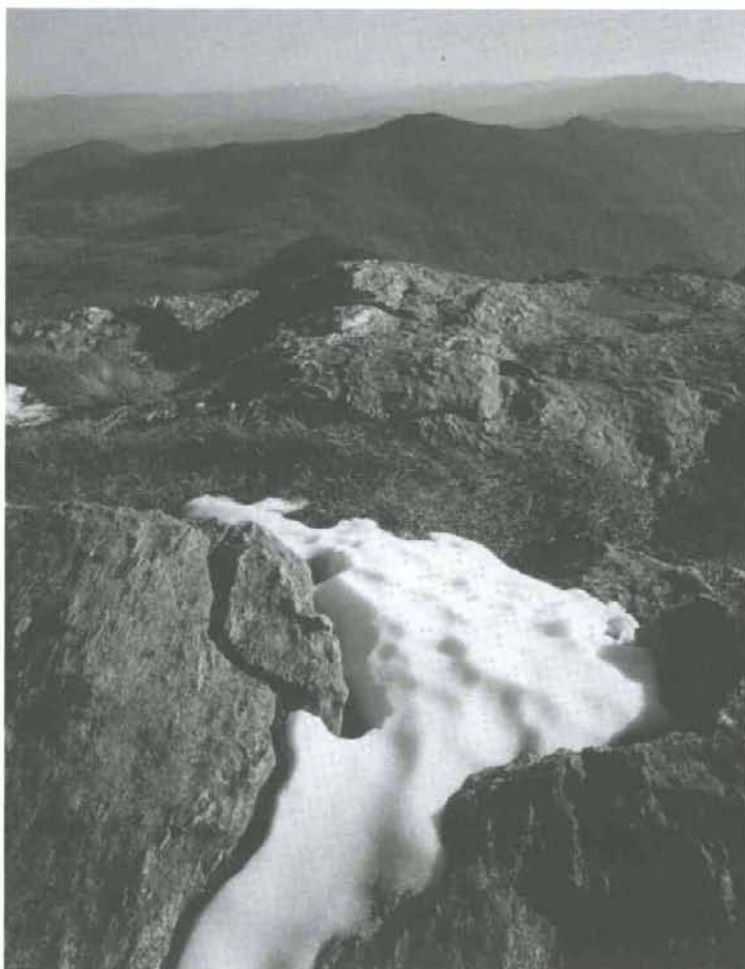
Frank Bredice provides a less academic perspective but reaches the same conclusion.

Bredice, a professional real estate appraiser based in Montpelier, says the key to establishing consistent readings for any impact upon property value—whether it's the difference between a one-car and a four-car garage, or a home with a pristine view of rolling hills contrasted with another whose views are encumbered by cell-phone facilities—is finding "paired sales."

"You find houses that are the same in every other respect," he says (including having been purchased by new owners), "and you subtract the value of one from the value of the other. That way you get a market-oriented adjustment for that factor. That's the best way to quantify the economic impact" of the smaller garage or the visible tower.

Like Freeman, Bredice says the data are limited in this state because "you don't have 40 or 50 [comparable] properties to deal with."

Still, Bredice ventures this observation: "It's a pretty good truism that the higher the value [of a property] the more of an



effect there is from positive or negative variables. In a ski-area property with a great view, an aesthetic intrusion may well have a more marked impact."

Then there is the human variable. Real estate agents say that a view—be it a sweeping view of the Worcester range or the more proximate view of the disheveled yard of the neighbors across the road—matters more to some buyers than others.

"A tower in the distance . . . ?," says Barbara Leber of Millette Real Estate in Montpelier. "It could be an issue with somebody. But they may overcome it if it's the only negative."

More common in her experience is the effect on property salability from utility poles.

"I've seen people look at land that has wires across it and they won't even consider it," says Leber.

Her experience is borne out nationally, and it may be simply because the century-old electric utility industry has had time to develop more case law. Whether the reason

is aesthetics or human health—people worry about the health effects of microwaves, but similar concerns about electromagnetic fields (EMFs) from high-voltage transmission wires have resulted in significant litigation—the deleterious effect of utility equipment on property values has been affirmed, at least in the courts of New York.

Attorney Michael Rikon of New York City argued and won the 1993 case, *Criscuola v. Power Authority of the State of New York (PASNY)*, before that state's Court of Appeals. Overturning the decisions of lower courts, the Appeals Court ruled that the claimants were entitled to compensation from PASNY because its transmission lines (erected on the Criscuolas' property under the doctrine of eminent domain) had prevented them from selling an otherwise viable chunk of real estate.

Importantly, the court did not make a scientific determination on the validity of public fears about electromagnetic

fields. The perception of danger, the court said, was enough: "Whether the danger is a scientifically genuine or verifiable fact should be irrelevant to the central issue of market value impact."

The Criscuola ruling has had limited impact thus far, even in New York. But attorney Rikon, speaking in November at the Vermont Law School's conference at Killington on "Health and Policy Implications of the Wireless Revolution," said it gave weight to the intertwined concerns about safety and aesthetics regarding EMFs.

"The science is all very interesting," Rikon shrugged, "but I don't care. What matters is that the public is greatly concerned. I know from realtors that they'll show a home with a power line running across the property and the people won't even get out of the car."

The EMF debate, with its property value implications, seldom rises in Vermont to the pitched level it has attained in states where high-voltage lines are prevalent. But

the point is that property values are a gut-level issue everywhere; factors that threaten our lifestyle flexibility (the ability to buy and sell) and our investments in real estate could loom like great, dark shadows on Vermont's horizon.

RECKONING THE LANDSCAPE

Real estate is one domain in which we seek to define and quantify aesthetics. Public policy is another.

The primary vehicles for protecting our scenic resources in Vermont are town and regional plans, Act 250, and, increasingly, local zoning ordinances. These can reinforce one another; Criterion 10 of Act 250 requires developments, including tower projects that come before the district commissions and Environmental Board, to conform with "duly adopted local or regional plan(s)." In practice, says Richard Brooks of the Vermont Law School, zoning often is included in that prescription.

"Recent cases allow zoning, rather than a town plan, to be used in determining what a community's aesthetic policies are,"

Brooks explains, "rising out of situations where there was discrepancy between zoning and the plan, which can create a problem for the developer."

Thus, Act 250 offers two routes for considering aesthetic impacts—Criteria 8 (cited above) and 10. Yet in any case where those impacts are evaluated, there is a need for standards, drawn as objectively as possible, to be brought into play.

Several Vermonters have sought to do this. They include Jean Vissering of East Montpelier, a landscape designer, consultant, and part-time instructor at the University of Vermont; Elizabeth Courtney, former chair of the state Environmental Board and principal author of the book *Vermont's Scenic Landscapes: A Guide for Growth and Protection* (published in 1991 by the Agency of Natural Resources); the late Norman Williams, who chaired the committee supervising Courtney in that project and who was a national authority on land use law; and Project Coordinator Gina Campoli of the Agency of Natural Resources.

Vermont's Scenic Landscape is a colorful, 80-page book with beautiful photographs, maps, and designs. It was created for the purpose of putting clear language and concepts around the challenge of defining our aesthetic resources in Vermont, the better to preserve them. Guided by Williams' vision, the book is an underused resource in itself, awaiting the attention of local boards seeking tools that can help them protect the things they love most about their towns.

Primarily, says Campoli, Act 250 deliberations on aesthetics are guided by the so-called Quechee Decision of 1985. The decision addressed the critical but vague terms of Criterion 8, blazing a trail for later decisions to follow.

The accepted measure, after Quechee, for determining whether a proposed development is "adverse," is to decide whether it would be in harmony with its surroundings. A tower on the horizon is clearly not in harmony and is therefore *adverse*, but the next question is whether its impact is *undue*. The answer depends on

VLS HOSTS CONFERENCE ON EMFs, MICROWAVE RADIATION

A cavernous conference room and dining area at Killington ski resort, where the thud of ski boots and schuss-booming braggadocio more commonly fills the air, resounded for two days in November with complex and sometimes contrasting scientific and legal pronouncements on the subjects of electromagnetic fields and radiofrequency radiation.

The Vermont Law School hosted a conference November 15-16, 1996, that attracted approximately 150 scientists, lawyers, state and federal regulators, educators, representatives of the cellular and broadcast industries, public interest advocates, and citizens personally affected by the spread of microwave technology. The event drew speakers and audience members from places as near as Charlotte and Montpelier, Vermont, and as distant as Poland and the San Juan Islands of Washington

State. It was titled *Unplugged: Health and Policy Implications of the Wireless Revolution*.

Presentations on the first day centered on scientific inquiry. The conference followed by two weeks the release of a study by the National Academy of Sciences (NAS) that was reported in major news media to have determined that populations face no health hazards from the electromagnetic fields (EMFs) created by electric power lines. Power lines have been implicated, primarily through epidemiological evidence, in cases of leukemia in children.

But Dr. Keith Florig of Carnegie Mellon University in Pittsburgh said the NAS study was far from conclusive in dismissing such evidence. Florig said the NAS had misled the public by issuing a press release that stated, "No adverse health effects [are] seen from residential exposure to electromagnetic fields," while the executive summary

of the report said: "An association between residential wiring configurations and childhood leukemia persists in multiple studies, although the causative factor . . . has not been identified."

Scientists were no more certain about health risks possibly posed by radiofrequency radiation (RFR) from cellular towers used for microwave communications, which are proliferating across the landscape. Acknowledging the inability of researchers to resolve questions related to EMFs and RFR, Florig said it was his belief that "the tools of science are not [yet] up to this task."

On the second day, legal and regulatory issues were debated. Lawyers discussed strategies for advancing lawsuits related to personal injury or loss of property value related to electric power lines, and for defending corporations from such suits. Later in the day, speakers and members of the audience probed U.S. case law and the

three questions:

1. Does the project violate a written community standard intended to preserve scenic beauty (i.e., Windham Regional Plan, which led to the initial Act 250 rejection of the Bemis Hill tower)?
2. Would the project's impact be offensive to the average person? Campoli says Act 250's district commissioners are deemed "average people," and the verdict rests on their sensibilities.
3. Has the applicant taken steps to mitigate the adverse impact? If not, that can be reason enough to reject.

While this test provides some measure of aesthetic impact, Vissering, landscape designer and consultant, says "some of the general approaches I use in normal development projects don't always apply to communications towers."

Recently, though, Vissering was hired by Atlantic Cellular Company and the Mt. Anthony Preservation Society to help site a microwave tower near Bennington. The company paid for Vissering's services, for it was in the interests of Atlantic Cellular to

see the facility installed without challenge, but also in the Society's interest to lease the land so it could obtain capital to use for preserving more vulnerable acreage.

The planning exercise brought many issues into play, Vissering says.

"We looked at where the tower would be seen from . . . and it could be seen from the Bennington Battle Monument. So a site was chosen below the ridge line, just barely above tree level."

Another visual blight associated with towers is the utility company right-of-way, a wide swath cut up the forested slope to run power lines for the equipment at the top. "That almost creates more of an impact than the tower itself," says Vissering. At Mt. Anthony the offense was avoided by using a ground-level electric cable.

The height of the tower presented another visual problem until Atlantic Cellular offered to remove a section of the structure. "They seemed sensitive to the aesthetic issues," Vissering says.

Indeed, the inherent aesthetic problem with communications towers is their need

for altitude so they can transmit their signals to customers throughout the "cell," or to relay to towers serving adjacent cells.

"That's one of the key issues—the fact that they're located on ridge lines, which are highly sensitive areas, visually," says Vissering. "Especially the horizon line. Anything that breaks up that line tends to become a focal point."

Violating hilltops, if only by adding an unnatural visible element to them, strikes at the core of something vital to humanity, she says. Vissering traces the importance to modern people of certain kinds of terrain to early human and societal development—peaks that provided a view, perhaps, of invading clans; grasslands with their host of prey; the shared edge of forest and meadow, from which primitive people could peer to decide whether they could safely emerge into the sunlight.

"We have a real spiritual connection with hilltops," Vissering notes. "They tend to be almost sacred ground. Building something jarringly out of character upon them seems almost like a sacrilege."

Telecommunications Act of 1996 to determine the boundaries of federal, state, and local jurisdiction over broadcast and cellular towers. Gerald Tarrant, a former commissioner of the Vermont Department of Public Service and an attorney active in tower-related cases, summed up the complexity of the scientific and legal issues. "We have gone from the invisible to the abstract," Tarrant said.

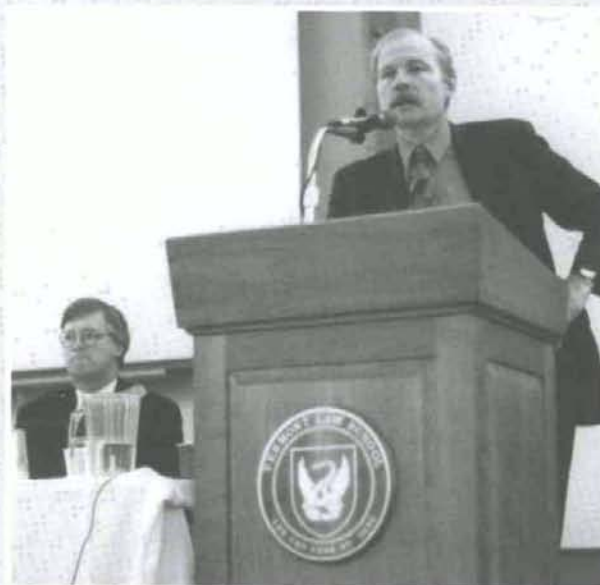
By far the most fervent testimony came on the second day of the conference, from advocates and citizens who were engaged in legal wranglings, primarily with the cellular industry. Their attestations amounted to a mini-rebellion in an otherwise staid and stolid conference.

In her lunch time address, science journalist and author Blake Levitt said, "We are dramatically altering the electric field of the world without knowing the consequences," and accused the industry of "arrogance" and "bullying." Cathy Bergman, of the EMR Alliance in New York, blasted cellular companies for employing federal trade laws to sue municipalities trying to reject tower sitings. She defended communities who had the

"audacity" in this modern world to choose to be "dead spots" (unreachable by cellular telephones). Other speakers also related their frustrations dealing with companies erecting towers close to their properties or with the Federal Communications Commission (FCC) for failing to respond to their concerns.

Patrick Parenteau of the Vermont Law School, host of the event, announced that NYNEX had been invited to participate on a conference panel but did not attend. The FCC, however, was represented by two speakers.

Pat Parenteau of Vermont Law School fields questions during the conference as Gerald Tarrant looks on.



Echoes from our Annual Meeting

Bren's Back ...

BY POPULAR DEMAND

At the request of our members, the following is Bren's keynote speech from the VNRC Annual Meeting in September, 1996.

It is a privilege today to be speaking to an annual meeting of the Vermont Natural Resources Council (VNRC).

During the past few years we have been having some great annual meeting speakers and talks: Former Governor, now U.S. Ambassador to Switzerland, Madeleine Kunin in 1992, Carol Browner of the U.S. Environmental Protection Agency in 1993, Pat Parenteau from the Vermont Law School in 1994, and last year down in Brattleboro, W.D. Wetherall, angler and writer, with his poetic description of the Connecticut River.

Today is different in the sense that I'll be speaking as a *staff-alumnus*, having retired this past July after four years on VNRC's staff, directing our Northern Forest Program. To the best of our knowledge of the present group at VNRC, I'm the first ever to "retire straight from active duty." Social Security, a couple of small pensions, and a family farming operation beckoned. So out I went, I hasten to add, reluctantly, much as I looked forward to retirement, because, as you will hear me say today, I have seldom worked in a better place, or with finer people, or simply had as much fun at a job.

Because of my recent staff role (after, incidentally, being on and off the VNRC board periodically since, I believe it was, sometime around 1967), I'd like to make this time a sharing amongst the "VNRC family," all of us members, board officers, staff, and guests. I'd like, for the staff, to share some of the great

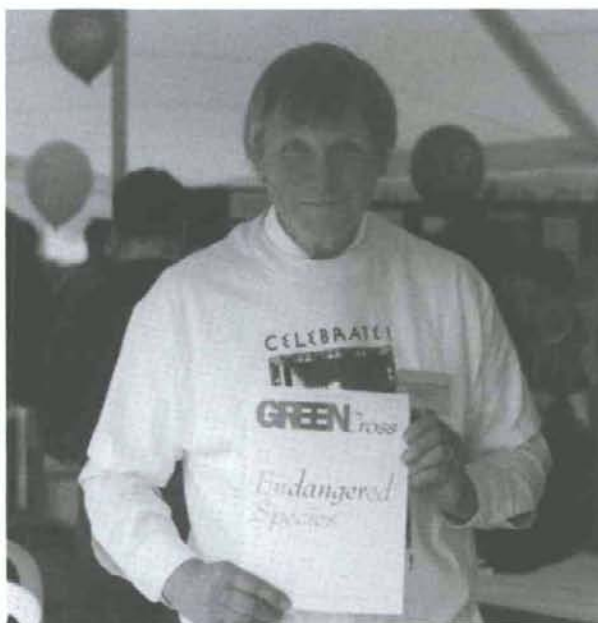
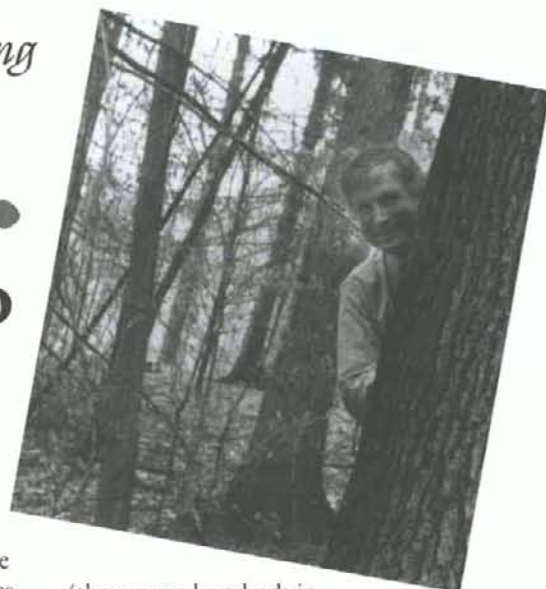
experiences of the past four years or so, and to also look ahead, (and in this election year do so without reference, insofar as possible, to *bridges* either to the past or future. Two other political figures are taking care of that currently at the national level.)

As some of you know, I am in my 12th year of being pastor to St. Mark's Episcopal Church in Groveton, New Hampshire. It's a parish in a community of paper mill and woods workers. They supported my full-time work with VNRC, they are my touchstone in many ways with very important parts of the world of working people.

It was such a privilege a year ago this fall to have VNRC send me to MIT to attend an international meeting of environmental journalists: Television-radio-print reporters who specialize in environmental coverage for the media. The main speaker one noon

(there were hundreds in attendance—and these are hard-bitten reporters for the most part—you don't fool them) was E.O. Wilson of Harvard, the famous biologist and author. I somehow managed to get a seat right up front, and even though it was mealtime, there was not a pin drop nor a dessert spoon clatter, as Wilson led off his talk in his quiet unassuming way. What he said was: "We are five years away from entering the century of, the millennium, of the environment"... and then the key phrase followed "*whether we like it or not!*"

That's the broad picture. There we sat in Cambridge at MIT, with a collapsed North Atlantic fishery just a few miles to the east, stressed air and water. Still, despite real progress to our west and all around, and the earth's forests, including even our own New England forest not too many miles north, being in many areas mined and liquidated, if not just over-cut. And over it all hung Wilson's key words "*whether we like it or not.*" It makes you wonder, when, in the words of one state of Maine journalist just this week, they hear over in Augusta, (and in Washington we might add)... "The steady drumbeat of anti-environmental fervor at the state house..." (Haven't we been hearing recently similar drumbeats from some quarters of own state house in Montpelier?) It made me realize that all of us face environmental consequences, even those who





All aboard ... to learn about sustainable forestry.

organization. Vermont's VNRC was one of the earliest. It's at this point too that I wish to say about some

other groups and some other people: Trout Unlimited, Vermont Audubon, VPIRG, Vermont Land Trust, and American Rivers: "Thanks: It is good to be working with you in this cause!"

There also, most importantly, is our national affiliate, the National Wildlife Federation, and its regional head, Monty Fischer, who used to head VNRC! There is our congressional delegation, thank heavens, especially during these past two years with the attacks in Congress on, in some cases, a 100 years of conservation progress in this country—thank goodness for Patrick Leahy, Jim Jeffords and Bernie Sanders. And here at home, thanks to governors all, Phil Hoff, Deane Davis, Tom Salmon (remember his "Vermont is not for sale?"), Dick Snelling, Madeleine Kunin,

and the land protection efforts of Howard Dean. Thanks to people like Jeffrey Amestoy, our Attorney General, a staunch supporter of the environment. And special thanks to those stalwarts in our own legislature, who and it's a tiring battle, hold forth common sense against that recent drumbeat of "anti-environment" from their fellows.

VNRC staff get the facts on issues affecting our resources, and present them forcefully and fairly in the proper arenas of decision, whether it's public opinion or a committee of the legislature. If eternal vigilance is the price of liberty, then eternal, or almost eternal work is the price of maintaining the wise use of Vermont's great resources. This is a hard-working staff, I assure you! The lights burn early and at times far into the night, for countless hours.

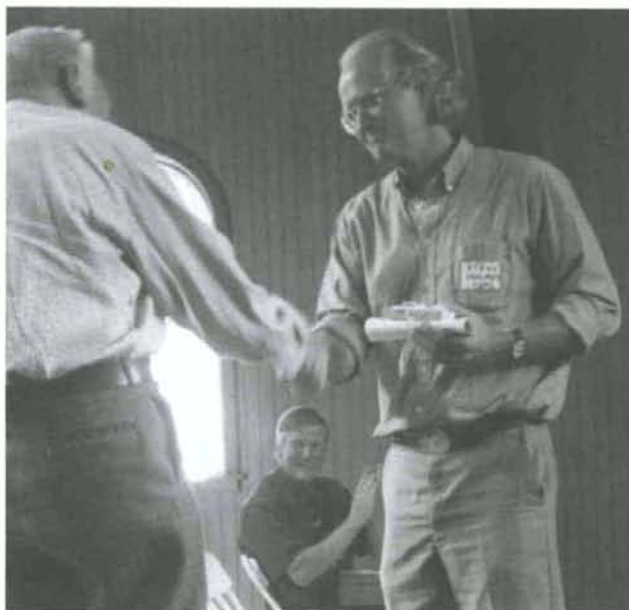
Brigid—on outreach to all of you, to let



you know what we are doing and where we need your help, sometimes on very short notice; Chris—on the water program; Jim—on forests and lands; Steve—on land-

use, Wal-Marts, and riding herd on a myriad of other policy issues. Sue—on keeping us funded, and on our all-important communications, including the *Vermont Environmental Report*, and the VNRC *Bulletin*. Kimberly, and Stacie are the backbone of all of us, keeping us fed and watered as support staff. I can tell you one of the very special things these past four years when I worked on the Northern Forest nearly 100 miles from VNRC's home base was the support that all of these people gave me.

Bren applauds the well-deserved honors bestowed on Dr. George Humphreys by Steve Holmes.



might blame everything on "an environmentalist plot." We all face the consequences of a degraded world.

I will say, it's determination here in this tiny corner of the earth called Vermont, to fight that degradation that drives VNRC, and has so for the thirty-three years of its existence. *That* is the essence of the organization to which we belong and whose annual meeting we attend today. If there is a text for the Vermont sermon, or a motto in addition to VNRC's own ("Promoting the Wise Use of Vermont's Natural Resources since 1963") it would most certainly be Aldo Leopold, a professional forester who in the 1930's and 40's was scorned by some of his fellows for being too visionary, not practical ... out of touch.

In that closing chapter of his *A Sand County Almanac* (just a while ago, I learned that Mollie Beattie held this book as she was sworn in as Fish and Wildlife Service Director), Leopold wrote: "A thing is right when it tends to preserve the integrity, stability, and beauty of the biotic community: It is wrong when it tends otherwise."

That, in essence, describes the work of the staff at VNRC. They (we!) try to represent the natural resources of this state of Vermont in their protection, their use, and the stewardship of them for the future. We are not unique in this; many states have at least one statewide private conservation

We've done a lot in Vermont, in a small state, without huge amounts of money around. I believe we are poised to enter the century and millennium of the environment of E.O. Wilson well-prepared. (Just think, if 30 or 40 years ago we had stripped it all, liquidated it, polluted it, and paved it, all in the name of "progress," where we would be today? Not in a very good position at all, I guarantee.) During these past four years I was privileged, in addition to northern forest work at home, to represent VNRC in places that did not have a Democrat Phil Hoff or a Republican Deane Davis or a Bob Stafford or a Pat Leahy during those years. I traveled to Virginia twice; I met with folks from Alabama, Louisiana, Texas, Arizona, New Mexico, Washington, Oregon, where people of good will are fighting for their environmental future.

I got heavily into examining and confronting the Wise Use movement and the Property Rights movement. There were, and are, some legitimate issues here, to be sure, in balancing individual freedoms to do as we please with land, and I trust that a free and open democracy can hammer out fair solutions on such issues as zoning and regulation. But talk to environmentalists like ourselves here from Arizona or Montana or Virginia. What a sobering wakening as to what they face: Including fire bombings of U.S. Forest Service ranger district offices and, indeed, of federal conservation personnel's private property.

And do be not fooled, as my colleagues from the west and south would point out to me. These are not just "grass-roots citizens" movements, not just small ranchers and farmers. Here's just a partial list of the real backers, financial backers, behind some of the western wise-use activity: It's a list provided to us by the Montana AFL-CIO of contributors to

something called the *Western States Public Lands Coalition*:

NERCO Minerals Co. and NERCO Inc., \$100,000; Cyprus Minerals, \$100,000; Chevron U.S.A., \$45,000; Hecla Mining Co., \$30,000; Bond Gold Corp., \$30,000.

And here, in Vermont, we must beware too. Our very success in areas of land and forest and water conservation means that in a shrinking world we become all the more attractive for the sharp money, the speculator, the forest liquidator. That's why we need a VNRC. To keep a sharp eye and keep us all informed as to what is going on. That's what VNRC, with your support, can and does provide.

"Provide." Recall Robert Frost, Vermont's poet laureate? In a very different context he writes:

*No memory of having stored
Makes up for later disregard
Or keeps the end from being hard*

*Better to go down dignified
with boughten friendship at your side*

*Than none at all. Provide, Provide!*¹

And then, on a famous recording by Frost in which he reads this poem, at the end, "Than none at all. Provide, provide" in sotto-voice he adds, "And I always like to say: Or someone will provide for you!" And indeed *they* will provide for Vermont, if we lower our guard.

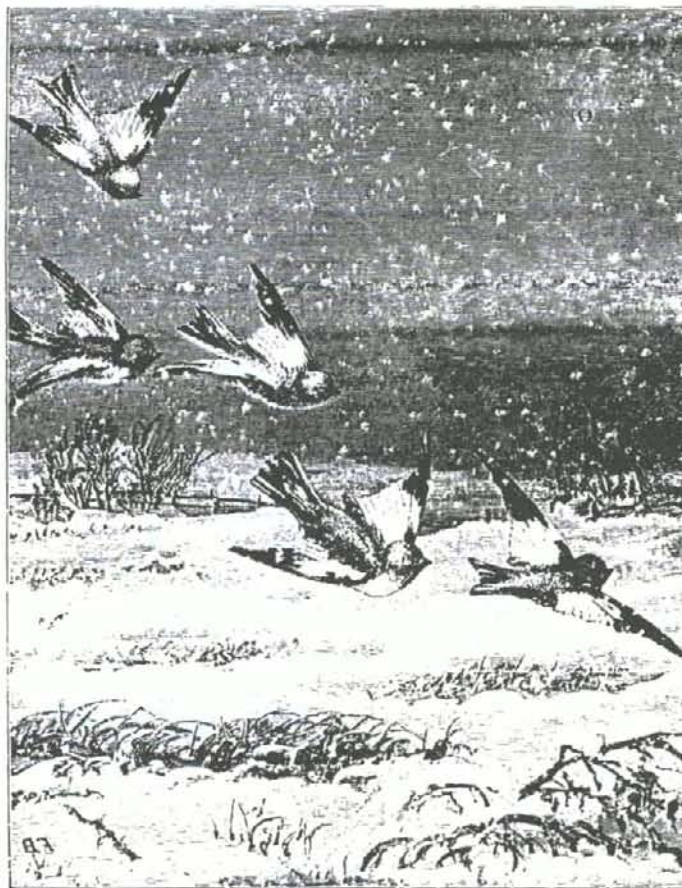
Just one example: As Jim and I got into this whole issue of forest herbiciding on a massive scale we were first told, "It must be all right because no one protests in other states where it is done." (Not only is that not true, what difference should that make to us?) Then we learn that almost all of the data, including much of EPA's on the chemical formulations to be used come from the manufacturer, the Monsanto Chemical Company.

All too eager to *Provide, Provide*: Bovine Growth Hormone, genetically engineered potatoes, and now glyphosate herbicides, all for Vermont.

Well, Monsanto, and whomever else, VNRC will be there too, to provide data and opinion, along with, hopefully, a strong Vermont Agency of Natural Resources, free to be the stewards they are charged by law to be; with our own National Wildlife Federation, with other statewide and regional and local citizen groups. We'll keep telling the truth as we see it. When we are wrong, we'll say so, we are not infallible.

We'll keep providing. VNRC will be here for another thirty-three years and beyond that, into that new century and millennium. It has been a grand four years for me, and I wish many, many more of them to these great people, my—and your—colleagues!

¹ *Complete Poems of Robert Frost*. Holt, Rinehart, and Winston, 1962, p. 404.



IN MEMORY OF MOLLIE BEATTIE

1947—1996

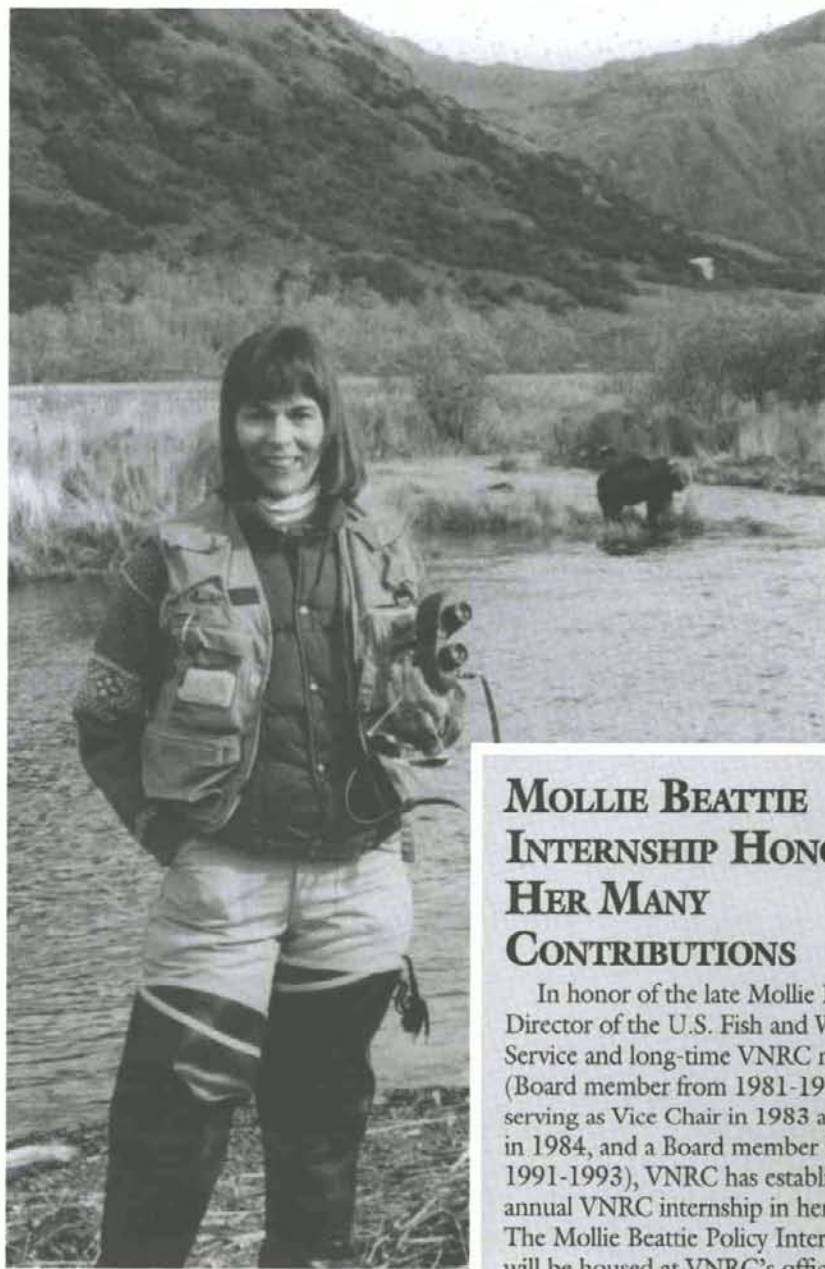
Webster defines "memoir" as "a report on an event of significance." This memoir is a personal observation on the life of Mollie Beattie, an event of great significance.

Mollie has been proclaimed as a scholar, a forester, a writer, a philosopher, all that and more. She was known as a friend, a public servant, a leader. In all of these roles Mollie's time with us was lived to the fullest, with vitality, commitment, and serenity.

Others have written or spoken of her career in public service to Vermont and to the nation. Her political savvy and integrity brought professional respect as well as outstanding accomplishments. The great courage of her final year has been cited as she fought, and at least accepted death with confidence, peace, and encouragement for others. Not only at death's door was courage so evident. Her professional standards and personal values demanded courage, confidence, and determination in reaching the goals she set for herself.

Mollie recognized the importance of maintaining a strong, healthy persona—physically, mentally, and spiritually. Not a selfish concern for her ego, but the pragmatic acceptance that thus only could she give the most of her life. Carlyle wrote that "Life is a little gleam of Time between two eternities." Mollie's life was a great burst of light in that time allotted her. We have been blessed by it.

She had one unusual and wonderful attribute—of an unconscious but strong sense of personal presence; not one of power or command, but a presence which, of itself, demanded attention, and got it. Hard to describe, but easy to recognize when you were exposed to it. Yet there were occasions when, while looking directly at you, she would transcendently leave you, dreaming or thinking of some secret, transmundane reality, some mystic other world that only she could know, and could not share. Then, with a glance and a grin she would return her attention to you.



At the end Mollie could have assured us, "I own only my name. I've only borrowed this dust." (Stanley Kunitz) Mollie's dust has returned to the earth from which it evolved. But her name will live long in our memories. May those memories serve to guide, strengthen, and encourage us in our lives of service.

James E. Wilkinson
Retired Commissioner
Department of Forests, Parks & Recreation
(Jim served from 1976 to 1979; Mollie became Commissioner 3 years after Jim retired.)

MOLLIE BEATTIE INTERNSHIP HONORS HER MANY CONTRIBUTIONS

In honor of the late Mollie Beattie, Director of the U.S. Fish and Wildlife Service and long-time VNRC member (Board member from 1981-1984, serving as Vice Chair in 1983 and Chair in 1984, and a Board member from 1991-1993), VNRC has established an annual VNRC internship in her name. The Mollie Beattie Policy Internship, will be housed at VNRC's offices and will be awarded on a competitive basis by VNRC for an internship in land use, water, or forest policy.

VNRC thanks the Vermont Community Foundation for its generous support in making this internship possible.

Interested applicants should contact Steve Holmes at VNRC, (802) 223-2328 for further information. Due date: Letter of interest and resume by April 15, 1997, for summer 1997 internship.

ALBRIGHT INTERNSHIP IN ENVIRONMENTAL COMMUNICATIONS

Longtime VNRC member and visionary philanthropist, the late Josephine P. Albright, bequeathed a significant gift to VNRC's endowment last year. The Ivan L. and Josephine P. Albright endowment will support an annual internship in environmental communications at VNRC in honor of Josephine's contributions to journalism and her family's journalism legacy.

Interested applicants should contact

Sue Higby at
VNRC at
(802) 223-2328
for further
information.
(Due date:
Letter of interest
and resume by
May 1, 1997.)

*Josephine Albright,
July 1995*



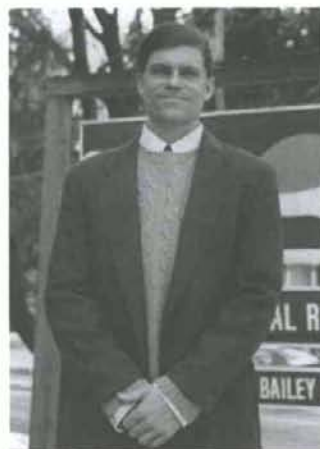
A TREMENDOUS LITTLE GATEWAY

Burlington possesses a new "Gateway to the City" that is named for VNRC Board member George Little and his wife, Elaine. The Burlington Community Land Trust dedicated a new park in August, 1996, at the corner of Bright St., N. Winooski Ave., and Archibald Street. It welcomes visitors with green space, benches, and a bulletin board signed in six languages of the past and current immigrants to the Old North End. What a tribute to the community leadership of George and Elaine!

WELCOME JOB HEINTZ AND DAVID MCLEAN!

Job is working at VNRC on his Vermont clerkship, to complete his legal education that began at the Vermont Law School. Recently, Job consulted for The Forum for Protection of Public Interest (Pro Public) in Kathmandu, Nepal, which pursues government and industry accountability on environmental protection, social

Job Heintz



welfare, and consumer protection. Job organized and funded the public interest law firm at Pro Public in 1994.

Dave is VNRC's Legislative Intern for this session, following a 2-year stint as a teacher at Sterling College (his alma mater), where he taught forest policy, woodlot management, and outdoor skills. He will be tracking current use, aerial spraying of chemical herbicides, and heavy cutting, and conducting research on the potential effects of a moratorium on ground- and aerially-applied herbicides.



*David
McLean*

SAY IT - AND SAVE IT - WITH YOUR NEW PLATE

Vermont's new conservation license plate should be appearing on vehicles statewide by early April. The new plate features a striking color image of Vermont's endangered peregrine falcon against green mountains with blue at the bottom representing our waters.

Conservation plate revenue will help the Vermont Fish & Wildlife Department's Nongame and Natural Heritage efforts, such as improving and protecting nesting sites for common loons and peregrine falcons, gathering information about natural communities and species that are not



hunted and fished, improving wildlife viewing areas, and taking inventories of bluebirds, turtles, and butterflies.

Funding from the plate will also help provide grants to community groups and local governments for watershed projects that may include monitoring and improving water quality in lakes, ponds, and rivers, as well as protecting lake shorelines and stream banks.

Applications are available from Vermont Fish & Wildlife, 103 South Main St., Waterbury, VT 05671-0501 or call (802) 241-3700.

WE WILL REMEMBER FERDINAND BONGARTZ

Ferdinand "Nundy" Bongartz died on February 5, 1997, following a long illness. A respected and cherished environmental leader in Vermont, Nundy will be remembered for his principled stands during his tenure on the state Environmental Board, the town Planning Commission, and other municipal bodies.



CURRENT USE PAPER AVAILABLE

VNRC commissioned a white paper, *Running with the Land: The Past, Present, and Future of Vermont's Use Value Appraisal Program*, to provide the public and decision makers with an historical and future-oriented look at property taxation and the Use Value Appraisal Program—or Current Use program—in Vermont, along with alternative strategies used in other states. This paper was authored by Rebecca A. Basch, Tufts University, on December 1, 1996 (50 pp.). If you are interested in receiving a copy of the white paper, send \$3.00 for postage/handling to VNRC.



SAVE ENERGY—AND MONEY

The Vermont Fuel Buyers Group (VFBG) is a new organization committed to reducing the cost of fuel and promoting energy efficiency for Vermont consumers. VFBG negotiates a lower price for heating fuels by pooling consumer buying power. Any household or business in Vermont is welcome to join VFBG. Call Ezra Millstein at (802) 658-6060, ext. 21, in the Chittenden County area; otherwise, call (800) 639-6069, ext. 21 for more information, E-mail: ezra@veic.org.

WORKSHOP GIVES VOICE TO NATURE

VNRC is collaborating with the Vermont Institute of Natural Science (VINS) on a workshop at VINS in Montpelier on April 2 (6:30 - 9:00 PM) and April 6, 1997 (10:00 AM - 4:00 PM).

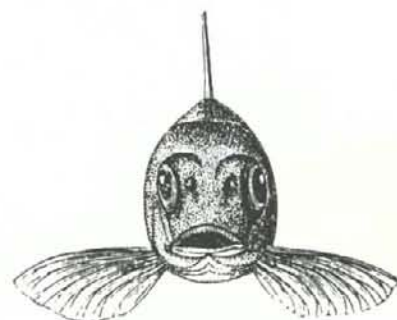
By tapping into our relationship with the natural world, we can gain confidence and clarity with which to articulate our

appreciation and concern for the environment. Reading and reflecting on the writings of Terry Tempest Williams and other nature writers, we will explore our personal motivations, inspirations, and land ethics. During the first evening, there will be a keynote talk and discussion with John Elder, professor of English and environmental studies at Middlebury College. Participants will be supported in using writing as a tool for creative expression and affecting positive change.

Leader: Virginia Farley,
Champlain Valley Director of the
Vermont Land Trust;

Register: By March 24, 1997; call VINS:
(802) 457-2779

Fee: \$25 per person



HOLD THAT DATE!

*May 14th Conference to
Examine Watersheds*

VNRC, along with partners National Wildlife Federation and Conservation Law Foundation, is convening a conference to look at opportunities for addressing water quality on a watershed basis. Call us if you are interested in finding out more.

Time: May 14, 1997
Place: Noble Hall at Vermont College,
Montpelier
Contact: Jeff Meyers at (802) 223-2328



*Uniting the freshest
local ingredients with
the Old-World Art of
Cheesemaking.*

Websterville, VT • (800) 884-6287

THE NEW WAVE – A NEW AGE FOR ENVIRONMENTALISM

How can we know where we are going if we don't know from whence we've come? I'm an Earth Day graduate and I've been volunteering and working professionally in the environmental movement ever since. When I took on my present assignment, I went looking for some new perspectives on the grassroots element of the environmental movement. Among the half dozen books I read, I discovered Mark Dowie's *Losing Ground*, a must read for anyone wondering how to forge their next environmental campaign.

Dowie divides the movement into four waves. The first began over a hundred years ago with the establishment of the great national parks. It was marked by the conservation philosophy of wealthy, white males interested in saving the wilderness for their sporting interests. Rachael Carson launched the next wave with the publication of *Silent Spring*, opening our eyes to how we were poisoning not only the fish and fowl, but ourselves as well. Marked by efforts to negotiate, the third wave brought national environmental leaders and

corporate heads to the table of give and take. Many believe the movement was losing its edge. Dowie believes we are in the beginnings of the fourth wave which he describes as follows:

"...a massive swell of new environmental passion is gathering force. Democratic in origin, populist in style, untrammelled by bureaucracy, and inspired by a host of new ideologies—the fourth wave should crest sometime early in the twenty-first century ... part wilderness preservation, part toxic abatement, part ecological economics, part civil rights, part human rights, part secular, part religious, and parts of many ecologies ... it will be very American ... multiracial, multiethnic, multiclass, and multicultural. It also contains many traits that characterize the American Revolution—dogged determination, radical inquiry, a rebellion against economic hegemony, and a quest for civil authority at the grassroots."

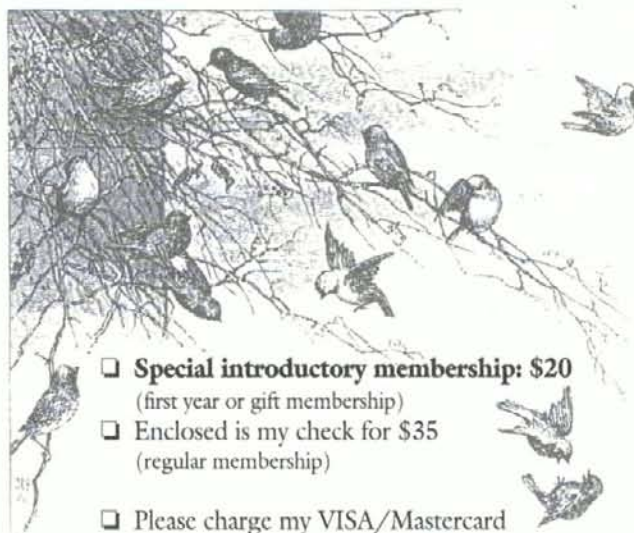
VNRC members are activists by nature, but there is *so much more* each of us can do. Unleash our passions and organize around eco-friendly projects at the

community level and see what happens. Six months ago, the Forest Resources Advisory Council was leaning toward allowing the spraying of herbicides on our northern forest. Today, a spraying ban is within reach because of the tremendous partnership between the Vermont Citizens Forest Roundtable, an ad hoc group of committed citizens in northern Vermont, and the established environmental groups VNRC, the Sierra Club, and the Audubon Society. Is this the fourth wave unfolding in Vermont? Judge for yourself and read the book.

Dowie, Mark. *Losing Ground: American Environmentalism at the Close of the Twentieth Century*. Cambridge, MIT Press, 1995.

Cheryl K. Fischer lives in Montpelier and administers the New England Grassroots Environmental Fund, a small grants program that makes \$500 to \$2,500 grants to local, grassroots groups across northern New England.

VNRC IS A VOICE FOR VERMONT'S FUTURE



- ☐ **Special introductory membership: \$20**
(first year or gift membership)
- ☐ Enclosed is my check for \$35
(regular membership)
- ☐ Please charge my VISA/Mastercard

Card # _____

Expires ____/____

Signature _____

VNRC membership includes:

- Access to environmental information and resources
- VNRC publications: 2 issues of the *Vermont Environmental Report* and 3 issues of the *Bulletin*
- Announcements of local events and meetings
- Invitation to annual members meeting
- Opportunity to join conservation network
- Discounts on publications and events

Name(s) _____

Address _____

City _____

State _____ Zip _____

Return the completed form or call VNRC at 802-223-2328 right away!
Send to: VNRC, 9 Bailey Avenue, Montpelier, VT 05602



Hemmings Motor News

FINEST FULL SERVICE FILLING STATION

216 Main Street, Bennington, Vermont
Directly Across From The Paradise Restaurant/Motor Inn



Hemmings Sunoco Filling Station is open 7 am - 10 pm Daily. You'll find genuinely friendly *Finest Full Service*, an exciting selection of automobilia, gifts, HMN products, Vermont products, travelers' necessities, health food, junk food, snacks & beverages of all kinds, and a *FREE Vintage Vehicle Display*.

Hemmings Motor News

"the national bible" of the collector-car hobby since 1954
Publishing Offices: 1-800-CAR-HERE

GREENSBORO GARAGE



Quality Sales and
Service for Over
20 Years

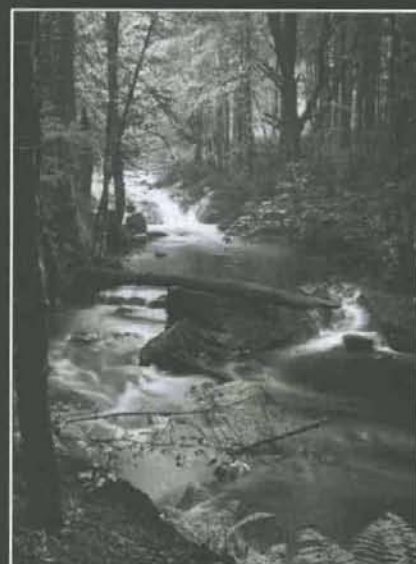
P.O. Box 116
Greensboro, Vermont 05841

Main Street
Greensboro, VT 05841
533-2221 533-7110

Route 15
Hardwick, VT 05843
472-6555

"Imported Cars Are Not Foreign To Us"

Discover Vermont Woodlands



A thriving forest is
home to a fabulous
variety of trees,
plants, wildlife
and people...

Just like Vermont
Woodlands Magazine

Subscribe today
\$18/year
for 4 issues

PO Box 471
Corinth, VT 05039-0471
800 290 5232

16,000 ACRES OF FOREST AND SHORE LANDS PROTECTED IN SOUTHERN VERMONT

"...the VNRC has won permanent development protection for the thousands of acres of New England Power land that surround the two hydroelectric dams, which are located in the towns of Whitingham, Wilmington, Searsburg, and Somerset."
(Rutland Herald - February 26, 1997)

With the stroke of a pen, VNRC has completed one of the largest land protection agreements in recent Vermont history, assuring protection of the headwaters of the Deerfield River for future generations.

At a press conference on February 26, 1997, Gov. Howard Dean, flanked by VNRC Acting Executive Director Steve Holmes, New England Power Company Vice President Lawrence Bailey, and Agency of Natural Resources Secretary Barbara Ripley announced the settlement between VNRC and NEPCO by which the power company has agreed to permanent conservation easements on the 16,000 acres around Somerset and Harriman Reservoirs and other Deerfield shore lands, and VNRC will drop its appeal of a state water quality certificate necessary for relicensing the hydroelectric project.

Under the terms of the agreement, the state has an option to purchase the Somerset Reservoir dam and the Searsburg dam and generating facility, along with the lands associated with these northern sections of the project.

In a separate agreement with VNRC, the state has committed to diligently pursue the option to purchase and has agreed to manage Somerset Reservoir water levels and upper Deerfield River flow levels in order to substantially enhance aquatic habitat. Somerset Reservoir is a remote high mountain valley lake that supports nesting areas for the endangered common loon.

"We'll have the opportunity of turning

Somerset Reservoir into a stable, more naturally fluctuating lake. I consider this one of the most outstanding projects the State of Vermont has ever undertaken in the field of water resource management," said Secretary Ripley.

Reflecting on the more than five years of work by VNRC, Steve Holmes said: "This is an extraordinary accomplishment.

VNRC's strategy on the Deerfield has been to protect as much as possible of the watershed's ecosystem. Our objectives have been to permanently protect the land and to improve water quality. We now have protected forever 16,000 acres of near wilderness land, and we have set the stage for stabilizing water levels in Somerset Reservoir and returning natural river flows to the Deerfield headwaters."

"Chris Kilian (VNRC's Water program Director and staff Attorney) and I have been working on this project since 1991, when we both started at VNRC. Without Chris's hard work and professionalism on the legal and technical aspects of the case, I don't think we would have gotten so far," concluded Holmes.



Governor Dean announces the agreement between the New England Power Company and VNRC that will permanently protect 16,000 acres of forest land and undeveloped shore land along two of the largest bodies of water in Vermont. (From left to right, Lawrence E. Bailey, Vice President and Director of Generation Operations for New England Power Company; Gov. Dean; Barbara Ripley, Secretary of the Agency of Natural Resources; and Steve Holmes, VNRC Acting Executive Director.)



Vermont Natural Resources Council
9 Bailey Avenue
Montpelier, Vermont 05602

E-mail: VNRC@plainfield.bypass.com

Non-Profit Org.
U.S. Postage
PAID
E. Barre, VT
Permit No. 2

MS. LAURA MEDALIE
U.S.G.S.
PO BOX 628
MONTPELIER VT 05601-0628

