



INTEGRATED
LAND-USE PLANNING
AND CANADA'S NEW
NATIONAL FOREST
STRATEGY



July 2004

Report coordinator

Rachel Plotkin

Report authors

Alan Appleby, Anne Bell, Kristin Bingeman,
Brian Churchill, Rachel Plotkin

Development of criteria

Alan Appleby, Anne Bell,
Kristin Bingeman, Rachel Plotkin,
Gaile Whelan Enns

Cathy Wilkinson, Tim Gray, Brad Cundiff, Jerry De Marco,
Lorraine Rekmans, Don Sullivan, Bill Van Geest and Gaile
Whelan Enns reviewed the document at various stages and
provided insightful comments and suggestions. Anne Bell's
editing talents were greatly appreciated.

Thank you to the **Richard Ivey Foundation** for their
generous support of this project.

Cover photo

Inu Nation Environment Office

The Sierra Club of Canada
412-1 Nicholas Street
Ottawa, Ontario, Canada
K1N 7B7
(613) 241-4611

www.sierraclub.ca

PART 2

CASE STUDIES

A: Ontario: Lands for Life

Overview

Ontario's Lands for Life planning process was announced in February 1997. It covered approximately 45% of the province's landbase and stretched from the southern limit of the Canadian Shield to the northern limit of land allocated to industrial logging (roughly the 51st parallel). Included in the planning area were 39 million hectares of crown land, falling within 32 natural regions. 6.6 % of the land was protected in federal and provincial parks, and the rest was licensed for logging, mining, hydroelectric development or aggregate extraction. Home to 48 Aboriginal communities, the planning area overlapped with the traditional territories of the Nishnawbe Aski Nation and Treaty 3 and Treaty 5 Nations.⁹

The objectives of Lands for Life were to complete the provincial protected areas system and to provide certainty about land-use allocations to the logging, mining and tourism industries. A further objective of enhancing sport hunting and fishing opportunities was later added.

To conduct the planning process three regional Round Tables were established in the summer of 1997. After holding public consultations and hearings, the Round Tables developed land-use options early in 1998 and delivered their recommendations later that summer. These were consolidated by the government and posted on the Environmental Registry¹⁰ for a 30-day comment period in the fall of 1998. A record 14,000 comments were received, most of which rejected the recommendations. Criticisms centered on the fact that the Round Tables had not delivered on the objective most widely supported by the public: completing the protected areas system. Instead the Round Table recommended only limited additions to the protected areas system and suggested that existing protected areas could be opened to industrial activity.

As the process was unfolding very poorly, the provincial government entered into private negotiations with three of the largest forestry tenure holders and the Partnership for Public Lands, a coalition of environmental organizations.¹¹

Premier Mike Harris directed those involved to protect 12% of the planning area and to ensure that the establishment of protected areas did not result in reductions of wood supply to industry. These negotiations resulted in the Ontario Forest Accord, announced on March 12, 1999. The Accord included, on one hand, a commitment to add 2.4 million hectares to the protected areas system, and on the other, a commitment to neither increase the cost nor reduce the supply of wood to industry through the creation of these new protected areas.

The final outcome of Lands for Life was *Ontario's Living Legacy Land-use Strategy*, a resource management plan for the planning area based on the Forest Accord as well as other private negotiations and many of the recommendations of the Round Tables.

Assessment based on indicators: Lands for Life planning initiative

Clear Goals and Terms of Reference	Y/N/S	Comments
Environmental, social, cultural and economic objectives are clearly stated.	Somewhat	The objectives were clear, but potentially conflicting, and there was no clear directive that the objectives had to be achieved. Consequently, Round Table members were mired in discussions of whether objectives had to be achieved, rather than ways to achieve them.
The maintenance of ecosystem function, structure, composition and biodiversity is a clearly stated objective and priority of the planning process, and is premised on:		
<ul style="list-style-type: none"> representing the full spectrum of ecosystems, across their natural range of variation, in protected areas, 	Yes	The notion of completing the protected areas system was based on representing the various natural regions.
<ul style="list-style-type: none"> maintaining viable populations of all native species in natural patterns of abundance and distribution (including commitments to wildlife corridors), and 	No	
<ul style="list-style-type: none"> sustaining ecological and evolutionary processes within their natural ranges of variability. 	No	
All participants have agreed to the above objective.	No	
The responsible government body has set clear policy targets which include a requirement to identify and designate protected areas through the planning process.	No	One of the objectives was to complete the protected areas system, but there were no clear policy targets.
The terms of reference contain no restrictions on areas to be protected, and no pre-authorized agreements for timber volumes, roads or other resource allocations.	No	The entire area had already been allocated to logging and there were mining claims throughout.

Clear Goals and Terms of Reference	Y/N/S	Comments
There is agreement that no new major development permits (including for access roads), licenses or increases in tenure will be approved inside the planning area during the land-use planning initiative.	No	New annual work schedules for logging were approved. There was no interim protection for contentious areas.
There is agreement that the planning, development and management of road access will be addressed through the planning process.	No	
If other regulatory reviews/processes that could impact the outcome of the planning initiative are occurring, these are coordinated with the land-use planning process.	No	
The roles and responsibilities of the parties involved in the planning process are clear at the outset.	No	
The concerns of Aboriginal Peoples regarding land stewardship, jurisdiction, treaty and Aboriginal rights are taken into account.	No	
SCOPE		
The boundaries of the planning area are based on natural and cultural landscape features.	No	The planning area was based on existing forestry tenure.
The scale of the integrated-land-use planning process is large enough to encompass whole watersheds, and provide habitat for far-ranging and migratory wildlife species and predator-prey relationships.	Yes	
The process is designed to ensure that cumulative ecological impacts from industrial and recreational activities are taken into account.	No	
The time line for the planning process is adequate and clearly articulated.	No	The timeline was far too short, though it was clearly defined. Even though the planning area covered about 45% of the province, the Round Tables were expected to complete consultations and to table recommendations within approximately eighteen months.
The process is adequately resourced (funding and personnel).	No	The small Ministry of Natural Resources staff was overwhelmed by the task.
The process takes into account all activities potentially detrimental to forest ecosystems (i.e., mining, hydro, oil and gas, forestry).	Somewhat	Mining interests were represented on the Round Tables but not involved in the negotiation of the Ontario Forest Accord. Hydroelectric interests participated in the Round Table process but also were not present in the Ontario Forest Accord negotiations.

Scope	Y/N/S	Comments
The process is designed to result in management guidelines for both protected areas and special management areas.	Somewhat	A new land-use designation was created: Enhanced Management Areas. Covering just over 3.5% of the planning area, Enhanced Management Areas were intended to guide industrial development so that it did not affect identified values (natural heritage, recreation, remote access, etc.). Unfortunately, the government has yet to develop policy or guidelines to ensure that these areas are adequately managed.

STAKEHOLDER AND ABORIGINAL PARTICIPATION

All interested parties are at the table including relevant local, provincial, territorial and federal government authorities, Aboriginal Peoples, local communities, conservation organizations, industry, labour, hunters, trappers and outfitters.	Somewhat	Round Table members represented regional interests (conservation, mining, forestry, tourism, trapping, local government) but were not affiliated with any group. There was one Aboriginal representative on each Round Table, but they withdrew early in the process (one remained as an observer). The Forest Accord negotiations included only logging, conservation and provincial government representatives.
The planning process is led by an independent facilitator with experience in the area and knowledge of local conditions and/or is chaired by an independent chair.	Yes	There was an independent chair for each of the Round Tables.
There are community meetings and information available inside the planning area.	Yes	
There are other public meetings, outside the planning area, in major urban centers, regarding the planning process.	No/Yes	Initially hearings were scheduled only in the planning area, thus excluding 85% of Ontarians. Outcry from environmental organizations later led to a scheduling of hearings in southern Ontario.
An up-to-date registry containing all minutes, presentations and technical information is available to the public	No	According to Ontario's Environmental Commissioner, "the speed and complexity of the exercise resulted in poor access to information and inadequate time for public comment." ¹²
Participants are adequately funded, so they can participate to their full capacity on a timely basis.	No	There was no intervenor funding, so participants had to rely completely on their own resources. This presented a big hurdle for smaller organizations and Aboriginal Peoples.

KNOWLEDGE BASE

Adequate information is provided for the following areas:		
<ul style="list-style-type: none"> ecoregions and degree of representation in protected areas (gap analysis) 	Yes	Both the government and the Partnership for Public Lands provided gap analyses. The maps supplied by the Partnership presented an alternative vision for protected areas establishment.

Knowledge Base	Y/N/S	Comments
<ul style="list-style-type: none"> natural and/or historic range of variability of key ecological processes (fire, blowdown, insect outbreaks, successional patterns, predator-prey dynamics) 	No	
<ul style="list-style-type: none"> comprehensive inventories and distribution maps of natural communities and easily surveyed species groups 	Somewhat	The Forest Resources Inventory was available as were maps of the natural regions. Government foresters and scientists were also available.
<ul style="list-style-type: none"> needs, including habitat range, of individual and focal species 	No	
<ul style="list-style-type: none"> areas of high conservation value (old-growth forests, intact forests, wetlands, areas of cultural significance, critical wildlife habitat, including migratory corridors) 	Somewhat	Through the Forest Resources Inventory.
<ul style="list-style-type: none"> existing forestry tenure applications 	Yes	
<ul style="list-style-type: none"> existing mining claims and mining activity 	Yes	
<ul style="list-style-type: none"> locations of oil and gas deposits 	N/A	
<ul style="list-style-type: none"> boundaries for commercial timber 	Yes	
<ul style="list-style-type: none"> values for remote tourism 	Yes	
<ul style="list-style-type: none"> existing and proposed hydro corridors 	Somewhat	Yes for existing and for some proposed corridors.
<ul style="list-style-type: none"> existing and proposed roads 	Yes/No	Yes for existing. No for proposed.
<ul style="list-style-type: none"> levels of carbon stored in the forest and predicted effects on carbon storage of different management models 	No	
<p>With permission from Aboriginal communities, the traditional knowledge of Aboriginal Peoples is incorporated into the planning process.</p>	No	
<p>Aboriginal Peoples have received adequate support to develop information systems based on traditional knowledge and to map their traditional use and occupancy of the land and resources.</p>	No	
<p>A thorough socio-economic analysis for the planning area has been conducted that examines and predicts the impacts of different management scenarios on levels of employment, traditional Aboriginal activities, recreational activities, tourism and recreation-based businesses, potential non-timber forest-based economies and the costs and benefits of ecological services.</p>	No	Cost-benefit evaluations of land-use options, which would have greatly aided public comment and Round Table decision-making, were never carried out.
<p>All relevant information is provided to participants on a timely basis.</p>	No	

Knowledge Base	Y/N/S	Comments
Pertinent public policies and legislation regarding land-use, land tenure, land rights and land protection are brought to the attention of participants, and access to such policies and legislation is provided.	Yes/No	Yes for the Round Table members. No for the public.
APPROVAL AND IMPLEMENTATION		
The plan and recommendations from the planning initiative are subject to a public review.	Somewhat	The first set of recommendations was posted for public comment and was solidly rejected. The final land-use strategy was posted for only 31 days (an inadequate amount of time, given the complexity of the issues, according to Ontario's Environmental Commissioner). This posting occurred after the government had already announced the major policy decisions, indicating that the public comment period "was only a formality." In addition, some of the major policy decisions regarding protected areas resulted from private discussions with the hunting and mining sectors and were never posted on the Environmental Registry. ¹³
Approval of the plan is contingent upon a collective endorsement by key parties and Aboriginal Peoples.	No	Conservationists did not endorse the recommendations of the Round Tables. The Ontario Forest Accord was endorsed only by those who participated in the negotiations: members of the logging industry, conservationists (Partnership for Public Lands), and the provincial government.
The government is obligated to fulfill the plan, and these obligations are not weakened by discretionary wording.	Yes	The government is obligated to follow Ontario's <i>Living Legacy Land-use Strategy</i> as a high level, but not legally binding, policy document (though it was not obligated to follow the recommendations of the Round Tables).
All comments, including "minority reports" are made public.	Somewhat	The Round Table reports, although not adopted, were made public.
There is a process in place to address situations where the plan contradicts existing rights, land-use, public policy.	Somewhat	The Ontario Forest Accord Advisory Board addresses situations arising from the Forest Accord.
There is a transparent process for making changes to the plan.	Yes	Through postings on the Environmental Registry.
An ongoing and well supported multi-sectoral management committee is established to oversee the implementation of the plan and to deal with amendments and to set up plan review activities.	Somewhat	The Ontario Forest Accord Advisory Board was established to help implement the Accord, monitor results and resolve disputes. Members represent the logging industry, conservationists and the provincial government, but not Aboriginal Peoples, communities, or other industries.
Adequate funding is in place for implementing the plan.	Somewhat	The Living Legacy Trust, a five year, \$30 million fund was set up to compensate logging companies, to improve access for resource extraction and hunting and fishing, to collect data and conduct research and to create employment opportunities. The Living Legacy Trust money has not, however, been used for park regulation. Further, the Land-use Strategy has not been fully implemented (e.g., not all of the protected areas have been regulated) and now that the funding has run out, it is uncertain how the remainder will be funded.

Discussion

To properly assess the outcomes of the Lands for Life process from a conservation perspective it is extremely important to remember that the entire forested landbase (crown land) in the planning area had already been allocated to industry. In other words, every newly created protected area constituted a “clawback” from industry. Indeed, most of the areas protected as an outcome of the Lands for Life process were slated for logging within two to fifteen years after the process completion.¹⁴ In this light, the outcome – 2.4 million hectares withdrawn from industrial development – was remarkable. It constituted the largest increase ever in Ontario’s protected areas system.

Significant progress was made in terms of representing forest types in protected areas, and many sites of high ecological value were protected, including thirty-six river corridors as waterway parks. And for those natural regions not fully represented, one of the most innovative and promising outcomes of the planning process was the development of the Room-to-Grow mechanism, whereby increases in wood supply are to be shared between industry and the protected areas system. This means that when wood becomes ‘available’ (e.g., through technological changes or mill closures) and forest tenure is reallocated, some forests will be designated for protection in regions not yet fully represented in the protected areas system. It also means that industry and conservationists will continue to work together on protected areas establishment. (It is important that Aboriginal Peoples also be party to these negotiations; government commitment to meaningful consultation, however, has yet to be demonstrated.)

Another promising outcome was the government’s commitment to conduct integrated land-use planning prior to forestry tenure allocations in the northern boreal forest (i.e., north of the Lands for Life planning area). The provincial government has since initiated the Northern Boreal Initiative, and Aboriginal Peoples and conservationists are playing key, active roles in this land-use planning process.

Success in meeting ecosystem-based management objectives

Despite these results, Lands for Life was far from an ideal integrated land-use planning process. Although the Partnership’s work to identify protected area candidates was based on gap analysis of ecological representation, in the end, the process was framed by the commitment to protect 12% of the region, a significant yet arbitrary percentage. Further, beyond these representation targets, there was no comprehensive approach to setting or addressing conservation objectives. Seventy per cent of the planning area is now designated for general use and there is no coordinated management regime to maintain ecosystem integrity.

Ultimately, the long-term viability of the core protected areas will depend upon approaches to land-use management outside those areas. Unfortunately, while Lands for Life did result in the creation of 86 new Enhanced Management Areas (open to

industrial use but intended to maintain natural heritage, recreation, tourism and other forest values), they covered less than 4% of the planning area. There has been little progress to date in determining how these areas might contribute to conservation objectives as no management policy or guidelines have been developed.

It is highly unlikely that viable populations of all native species will be maintained in natural patterns of abundance and distribution in the planning area. The Forest Accord did nothing to address road development or resource extraction methods such as clear-cutting.¹⁵ With such a high percentage of the land-base allocated to industrial development, wide-ranging species such as woodland caribou and wolverines are particularly vulnerable.

Stakeholder and Aboriginal participation

As a public process, Lands for Life was deeply flawed from the outset. There was very little public awareness that the process was ongoing, and initially only input from within the planning area was invited. This situation left out the vast majority of Ontarians until significant protest from environmental organizations forced the government to schedule hearings in southern Ontario. Further, the Round Tables were skewed to mining and logging interests and included no scientists or provincial conservation organizations. Aboriginal Peoples withdrew early in the process, alleging that their concerns about land stewardship, jurisdiction and treaty and Aboriginal rights were being ignored.¹⁶ The intent to base decisions on consensus fell apart, and there was no mechanism in place for resolving disputes. Not surprisingly, the recommendations of the Round Tables failed to reflect the public will and were overwhelmingly rejected by the public.

The Ontario Forest Accord negotiations represented a last ditch effort to rescue the initiative. These were private and excluded key parties other than the government, logging industry representatives and the Partnership for Public Lands. Consequently, the conservation organizations forming the Partnership have been left with a mixed and difficult legacy including: deep-seated mistrust on the part of Aboriginal Peoples who are opposed to the imposition of protected areas in their traditional territories; multiple disputes with the mining sector over the inclusion of mining claims and patents inside protected areas and over the acceptability of mining activity in parks; and difficult relations with some other environmental organizations concerned about the lack of consultation with Aboriginal Peoples and about the implications of tradeoffs with industry.

Political will

Clearly, Lands for Life demonstrates the way that political will can determine the outcome of a land-use planning process. In the first place there was no solid political commitment to the goals of the process. There was confusion about whether the targets were firm and consequently the Round Tables seriously entertained op-

tions that would have greatly reduced the level of protection in existing parks and would have made only small additions to the protected areas landbase.

In contrast, the government was obviously determined to ensure that the Ontario Forest Accord negotiations resulted in a publicly acceptable solution. A provincial election was imminent and the government was well aware of the Partnership's ability to mobilize its supporters.¹⁷ The Premier therefore gave a clear directive that the parties were able to carry out in a few months time.

Other insights

The Forest Accord was possible because conservationists and industry realized that they had a lot to lose if they could not come to agreement. Walking away from the process would have left all of the issues unresolved, dooming the parties to continued, costly site-by-site battles over protected areas. Some members of the forest industry recognized the risk of increased market pressure as a result of environmental campaigns if the Round Table recommendations were implemented. In turn, some conservationists were motivated to try to reach an agreement because of the near impossibility of starting the planning process over again in order to arrive at an acceptable solution. They were therefore willing to compromise. Working with forest industry analysts, the Partnership was able to identify ways to make up for wood volume lost to protected areas and to demonstrate how protected area targets were compatible with maintaining wood supply to industry. It was this expertise that opened the door for bargaining and put conservationists on equal footing with industry and government in the negotiations.¹⁸

Endnotes

- ¹ See the case study of the Eastern Scotian Shelf Integrated Management initiative by the National Round Table on the Environment and the Economy, http://www.nrtee-trnee.ca/eng/programs/Current_Programs/Nature/Case-Studies/Essim-Case-Study-Complete_e.htm
- ² National Round Table on the Environment and the Economy (NRTEE). *Securing Canada's Natural Capital: A Vision for Nature Conservation in the 21st Century*. Ottawa, 2003. p.45.
- ³ Canadian Boreal Initiative, www.borealcanada.org
- ⁴ *Canada's Forests At A Crossroads: An Assessment in the Year 2000*, Global Forest Watch Canada.
- ⁵ Committee On the Status of Endangered Wildlife In Canada, Summary report, 1999.
- ⁶ "Canadian species at risk according to degree of forest dependence," Natural Resources Canada, <http://mmsd1.mms.nrcan.gc.ca/cfs/bio/species-e.html>
- ⁷ Boreal Songbird Initiative, www.borealbirds.org
- ⁸ NRTEE, pp. 45, 47.
- ⁹ References for this case study: John Cartwright, "Environmental Groups, Ontario's Lands for Life Process and the Forest Accord," *Environmental Politics*, 12:2, Summer 2003, pp.115–132; Tim Gray, "Lands for Life: The Good, the Bad, and the Future," *Wildland News*, Summer 1999, pp.1, 4-5, 12–15; National Round Table on the Environment and the Economy, "Lands for Life Process, Ontario – NRTEE Conservation of Natural Heritage Case Studies," http://www.nrtee-trnee.ca/eng/programs/Current_Programs/Nature/Case-Studies/Lands-for-Life-Case-Study-Brief_e.htm
- ¹⁰ Ontario's Environmental Bill of Rights requires that government ministries post notices on the Environmental Registry regarding environmental legislation and policies that they are drafting and provides an opportunity for public comment, <http://www.eco.on.ca/english/publicat/usrguide.pdf>
- ¹¹ World Wildlife Fund Canada, the Federation of Ontario Naturalists, and the Wildlands League chapter of the Canadian Parks and Wilderness Society formed the Partnership for Public Lands. Its goals, supported by many other environmental organizations, were to raise awareness about Lands for Life and the need for more protected areas and to put forward a conservation perspective at the Round Table hearings.
- ¹² Environmental Commissioner of Ontario. *Changing Perspectives: Annual Report 1999–2000*, p.62.
- ¹³ Ibid.
- ¹⁴ Tim Gray, p.13.
- ¹⁵ Clear cutting remains the most popular harvesting method in Ontario, with more than 90% of forested areas cut each year being clearcut. (<http://www.wildlandsleague.org/forestpractice.html> accessed 22/03/04).
- ¹⁶ NRTEE case study.
- ¹⁷ See Cartwright, p.118.
- ¹⁸ Ibid.
- ¹⁹ East Side Lake Winnipeg Broad Area Planning Initiative Phase Preliminary Discussions Final Report – Executive Summary http://www.gov.mb.ca/conservation/eastsideplan/pdf/executive_summary.pdf
- ²⁰ <http://www.gov.mb.ca/conservation/eastsideplan/bibliography/index.html#ecology>
- ²¹ Peckett, M. K. 1999. *Ecoregion 90: a social and economic description*. Winnipeg: Manitoba Dept. of Natural Resources.
- ²² East Side Lake Winnipeg Round Table Terms of Reference <http://www.gov.mb.ca/conservation/eastsideplan/pdf/terms-of-ref.pdf>
- ²³ 'Next Steps: Priorities for Sustaining Manitoba's Forests' (March 2002) <http://www.gov.mb.ca/conservation/forestry/reports/prioritiesdoc.pdf>
- ²⁴ Ibid.

- ²⁵ Other conservation organizations and groups are represented on the Stakeholder Advisory Committee (members of this committee are expected to participate as an official representative of their group or organization).
- ²⁶ Prior to the ESPI, a First Nation Protected Areas Memorandum of Understanding (MOU) was developed as part of the PAI. The MOU explicitly reaffirms and upholds Aboriginal and treaty rights within protected areas and outlines specific procedures for consultation and consent from affected First Nations.
- ²⁷ A land-use category under the provincial Parks Act does allow the designation of access areas within parks (These access areas are not considered protected).
- ²⁸ The need for a management framework that addresses both protected areas and Special Management Areas has been identified by the Senate Subcommittee on the Boreal Forest, the National Round Table on the Environment and the Economy, and by the conservationists, Aboriginal communities, industries and environmental organizations supporting the Boreal Framework, which calls for large-scale protected areas and 'world-leading ecosystem-based resource management practices and state of the art stewardship practices in the remaining landscape.' For more information, see: http://www.nrtee-trnee.ca/eng/programs/Current_Programs/Nature/Nature-SOD-Report/intropage_e.htm, Senate Subcommittee on the Boreal Forest. "Competing Realities: The Boreal Forest at Risk", (Sub-Committee on Boreal Forest of the Standing Senate Committee on Agriculture and Forestry, June 1999). <http://www.parl.gc.ca/36/1/parlbus/commbus/senate/com-e/bore-e/rep-e/rep09jun99-e.htm>. www.borealcanada.ca.
- ²⁹ The Boreal Standard was collaboratively developed by stakeholders from four chambers: Aboriginal, economic, social and industrial. Comparable certification systems for other industries have yet to be developed and endorsed by conservation and Aboriginal communities. To view the standard, visit: http://www.fsccanada.org/boreal/pdf_document/Boreal_3.doc
- ³⁰ Senate Subcommittee on the Boreal Forest. "Competing Realities: The Boreal Forest at Risk", (Sub-Committee on Boreal Forest of the Standing Senate Committee on Agriculture and Forestry, June 1999). <http://www.parl.gc.ca/36/1/parlbus/commbus/senate/com-e/bore-e/rep-e/rep09jun99-e.htm>
- ³¹ Securing Canada's Natural Capital: A Vision for Nature Conservation in the 21st Century.
- ³² National Forest Strategy action item 8.3.
- ³³ Personal communication, Len Moores, Director of Ecosystem Health, Forestry, for the Department of Natural Resources in Newfoundland and Labrador. 2004.
- ³⁴ Personal communication, Robert Gagnon, Service de l'aménagement forestier Direction des programmes forestiers. 2004.
- ³⁵ Personal communication, John Dojack, Acting Director, Forestry Branch, Manitoba. 2004.
- ³⁶ Personal communication, Hugh Hunt, Executive Director, Resource Stewardship Branch, Saskatchewan. 2004.
- ³⁷ Personal communication, Darren Tapp, RPF, Alberta Sustainable Resource Development, Strategic Forestry Initiatives. 2004.
- ³⁸ Ontario Ministry of Natural Resources. *Ontario's Living Legacy Land Use Strategy* (Toronto: 1999), pp. 25-26.