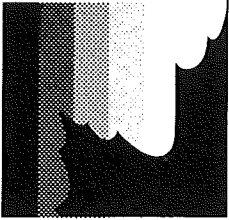


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**SUBMISSIONS ON BEHALF OF FORESTS FOR TOMORROW
TO THE ENVIRONMENTAL ASSESSMENT ADVISORY
COMMITTEE REGARDING ENVIRONMENTAL ASSESSMENT
OF TIMBER MANAGEMENT PLANS**

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INTRODUCTION

This submission by CELA to the Environmental Assessment Advisory Committee (the "Committee") is made on behalf of Forests for Tomorrow (FFT). FFT is a coalition consisting of the Botany Conservation Group of the University of Toronto, the Federation of Ontario Naturalists, the Sierra Club of Ontario, the Temiskaming Environmental Action Committee and the Wildlands League. FFT was formed in 1986 for the purpose of seeking substantive forestry reform in Ontario, and FFT has been an active full-time party in the continuing Timber Management Class Environmental Assessment hearing before the Environmental Assessment Board.

One of FFT's primary concerns has been the adequacy of the Ministry of Natural Resources' (MNR) timber management planning process to identify, analyze and mitigate the adverse environmental impacts associated with timber management activities. In particular, FFT submits that the current process does not adequately address the adverse environmental impacts caused by road building, harvesting, renewal, and maintenance operations. Accordingly, FFT is not surprised that an increasing number of groups and individuals throughout the province are attempting to invoke the Environmental Assessment Act (EAA) as a means of resolving outstanding public concerns about timber management activities within Ontario's Crown forests.

At the same time, FFT has been strongly concerned about the length of time that the Ministry of the Environment (MOE) has taken to

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respond to these requests for environmental assessments of timber management plans. A number of designation requests have languished for years with little or no response by the MOE, and numerous requesters have been left in the dark as to the status of their requests. In the meantime, timber management activities are being approved and implemented in a number of areas covered by designation requests. In FFT's view, this situation undermines the rights of the requesters and makes a mockery of the environmental assessment process, and it must not be permitted to continue.

FFT was therefore pleased to learn that the Minister of the Environment has recently referred three designation requests and related issues to the Committee for its consideration and advice. With respect to each of the issues referred to the Committee, FFT's position is as follows:

1. FFT supports the requests for individual environmental assessments of the timber management plans in question.
2. FFT submits that when future designation or "bump up" requests are made, the MOE should endeavour to make a decision on the request within 90 days of its receipt. When a designation or "bump up" request is made, no timber management operations should be approved or conducted within the area covered by the designation or bump up request until a decision on the request is made by the MOE. The MOE should grant the designation or

bump up request if unresolved public concerns exist about the timber management plan (or a portion thereof), or if implementation of the plan will cause or is likely to cause significant environmental impacts, or if the plan otherwise warrants an individual environmental assessment. Where a designation or bump up request is granted, no timber management operations should be approved or conducted in the area covered by the request until the submission and approval of the required individual environmental assessment.

3. FFT submits that the existing exemption order, MNR-11/9, is inadequate and should be amended to include terms and conditions relating to the following matters:

- clearcut size;
- full-tree logging;
- wildlife management;
- old growth forests;
- access planning;
- watercourse protection;
- integrated pest management;
- provincial guidelines and manuals;
- silvicultural data collection; and
- integrated forest management.

Detailed discussion of each of the above-noted matters is set out below.

ISSUE #1: SHOULD THERE BE INDIVIDUAL ENVIRONMENTAL ASSESSMENTS OF THE TIMBER MANAGEMENT PLANS IN THE FOLLOWING FOREST/CROWN MANAGEMENT UNITS: TIMMINS, MAGPIE, RANGER LAKE, PESHU LAKE AND SUPERIOR?

Before the specific designation requests can be discussed, there are three preliminary legal issues that must be considered by the

Committee:

- i) as a matter of law, can the Minister of the Environment order individual environmental assessments in the face of MNR-11/9?
- ii) what is the relationship between the designation requests and the unapproved Timber Management Class Environmental Assessment?
- iii) if individual environmental assessments are warranted, what is the "undertaking" and who is the "proponent"?

With respect to the first issue, FFT submits that it is clearly open to the Minister of the Environment to order individual environmental assessments notwithstanding MNR-11/9. At the outset, it should be noted that MNR-11/9 (and its predecessors) exempts the undertaking of "forest management", and whether "forest management" is synonymous with "timber management" is an issue of considerable debate. In FFT's view, "timber management" is not the equivalent of "forest management", and it is therefore questionable whether "timber management" is caught or exempted by MNR-11/9. In any event, it is FFT's position that since the Minister and Cabinet passed MNR-11/9 as an order under the EAA, they are free to subsequently revise or amend its content or scope if they so choose. Thus, the Minister could, for example, amend MNR-11/9 itself to state that it does not serve to exempt the plans or activities in question. In the alternative, the Minister could make a separate order which states that notwithstanding MNR-11/9, the plans or activities in question are designated as undertakings to which the EAA applies. In other words, having made the original exemption order, it is open to the Minister to expand it, contract

it, or amend it as she sees fit in the exercise of her statutory discretion.

With respect to the second issue, FFT submits that the designation requests are not related in law to the unapproved Timber Management Class Environmental Assessment. The Class Environmental Assessment is intended as a generic examination of timber management planning issues at the provincial level, and it does not purport to address the site-specific environmental impacts of particular timber management plans. Thus, it cannot be argued that individual environmental assessments would be duplicative of the Class Environmental Assessment, or that the concerns of the requesters can be or have been addressed within the context of the Class Environmental Assessment. In fact, the Class Environmental Assessment document itself clearly recognizes that there are circumstances (i.e. significant public controversy or significant adverse environmental impacts) where the Class E.A. will not satisfactorily resolve the public concerns, and where individual environmental assessment is necessary (see pp. 177-78 of the Class E.A.).

With respect to the third issue, FFT submits the "undertaking" in the instant case may be defined as "timber management" (i.e. access, harvest, renewal and maintenance). If the undertaking is defined in this manner, then identifying the "proponent" is somewhat problematic since the MNR does not generally carry out

these activities on Forest Management Agreement (FMA) units (such as the Timmins FMA, Magpie FMA or Superior FMA) nor does it carry out harvesting on Crown Management Units (CMU) (such as the Ranger Lake or Peshu Lake CMU's). It is FFT's submission that in the case of FMA's, the forestry company may be designated as the "proponent", while in the case of CMU's, the logging contractors may be designated as the "proponent". In the alternative, if the undertaking is defined as the "proposal, plan or program" in respect of timber management activities, then the MNR could be said to be the "proponent" since it must review and approve the plans and issue cutting licences pursuant to the Crown Timber Act. In either case, there is clearly an "undertaking" and a "proponent", and the Minister of the Environment may choose the appropriate definition for each term.

It is FFT's understanding that the MNR and industry representatives have suggested to the Committee that if any of the three designation requests are granted, it will serve as a "precedent" which will encourage more people to request designation or bump up simply for the purposes of delay. It has also been suggested that the requesters have been intractable and have demonstrated no willingness to negotiate or compromise. With respect to the "precedent" argument, FFT simply notes that if this argument were to be given any weight, then no designation or bump up could ever be granted because of the potential "precedential" value of the first request to be granted. Moreover, FFT believes that the

Minister of the Environment is perfectly capable of screening the requests, and FFT is confident that designation or bump up will be granted only in the appropriate circumstances.

With respect to the "delay" argument, FFT submits that this suggestion is completely without foundation in that the requesters consistently have bona fide environmental concerns, and they are attempting to address these concerns through a process which, in law, is available to them. FFT also notes that requests are generally made only after the requesters have participated in the timber management planning process for considerable periods of time to no avail. It should also be recalled that in many instances, the only "delay" has been the lengthy MOE inaction on the requests; moreover, in some cases, there has been no delay in the carrying out of timber management activities in the areas covered by designation requests.

Finally, with respect to the "intractable" argument, FFT submits that the MNR and industry have displayed far more intransigence with respect to the designation requests. In many cases, including those before the Committee, the requesters have offered compromises and have narrowed the scope and content of their original positions. This willingness to negotiate has been met by inflexibility and unreasonable counter-proposals on the part of the MNR and industry. Accordingly, there is considerable merit in the widespread public perception that when push comes to shove, the MNR

will side with industry, and other forest users are expected to "accommodate" industrial demands for timber.

On this point, it is noteworthy that when members of the public attempt to protect certain areas against the impacts of timber management, they are accused by MNR and industry as trying to lock up public land for selfish single-use purposes. In response, FFT submits that there is no greater selfish single-purpose use of public land than allowing industry to clearcut vast tracts of land, leaving the public with a treeless wasteland that will not have nature forest on it again for at least 80 - 100 years. Protecting an area against large area clearcutting clearly preserves non-timber values and the option of multiple-use for that area; extensive clearcutting in an area does not.

Having determined these preliminary issues, it is then necessary to consider whether designation is warranted in the three cases before the Committee:

a) Timmins FMA (Marceau Lake Cottagers Association)

FFT supports the designation request made by Mr. Grant Tunnicliffe on behalf of the Marceau Lake Cottagers Association with respect to the Timmins Forest timber management plan.

In FFT's view, the Committee must have regard for the following factors in making its recommendation on this request:

- concerns about logging proposals for the Marceau Lake area were brought to the attention of the MNR by Mr. Tunnicliffe in early 1984;
- Mr. Tunnicliffe and other cottagers became formally involved in the MNR timber management planning process in 1987 to pursue their concerns;
- these concerns focused on the ecological impacts of proposed clearcutting; the impacts of clearcutting on non-timber values, features and resources; and the need to establish adequate shoreline and skyline reserves around Marceau Lake;
- despite their continued involvement in the planning process, the cottagers' concerns have not been addressed to their satisfaction by either the MNR or the forest company;
- the cottagers have also pursued their concerns at the MNR District, Regional and ministerial level to no avail;
- during this time, the MNR unilaterally amended the relevant sections of the Timmins District Land Use Guidelines without any public notice or consultation so as to emphasize timber extraction in the Marceau Lake area;
- in March 1988, Mr. Tunnicliffe requested the Minister of Environment to order an individual environmental assessment of the proposed harvest in light of the numerous unresolved issues;
- in March 1990, a hiking/ski trail established and maintained by the cottagers was partially destroyed by clearcutting operations;
- since the request has been filed, no logging operations have been carried out within the cottagers' proposed 500m shoreline reserve; however, the MNR and the company have recently indicated that they have waited long enough, and that operations will proceed shortly;
- significant environmental impacts exist with respect to the timber management plan, and public concerns have not been resolved by the MNR's timber management planning process;
- in the three years since his request was filed, Mr. Tunnicliffe has repeatedly asked the MOE for a decision on designation, but no decision has been made to date.

In light of the foregoing factors, FFT submits that the Committee should recommend that an individual environmental assessment be

ordered by the Minister of the Environment with respect to the Timmins Forest timber management plan.

b) Magpie FMA (Marmac Lodge)

FFT supports the designation request made by Mr. Donald MacLachlan on behalf of Marmac Lodge with respect to the Magpie Forest timber management plan.

In FFT's view, the Committee must have regard for the following factors in making its recommendation on this request:

- in 1987-88, Dubreuil Brothers Ltd. prepared a timber management plan which proposed extensive cutting and road construction in areas used by Mr. MacLachlan and other outfitters to provide quality wilderness vacations;
- a number of these timber management activities were scheduled to occur within a proposed Remote Tourism Preserve that was being considered by the MNR and the Ministry of Tourism and Culture;
- Mr. MacLachlan became formally involved in the MNR timber management planning process in the spring of 1988, when he raised numerous concerns about the impacts of the plan on remote tourism, moose habitat, fish resources, aesthetics, and other non-timber values;
- most of Mr. MacLachlan's proposals to mitigate these impacts were rejected by the MNR and the company, and the resulting allocations and "area of concern" (AOC) prescriptions are inadequate to address the environmental and socio-economic impacts associated with the plan;
- Mr. MacLachlan pursued his concerns at the District level to no avail;
- these concerns have not been resolved by the MNR's timber management planning process, particularly because of the lack of a remote tourism representative on the timber management planning team;

- in March 1989, Mr. MacLachlan requested an individual environmental assessment of the plan in light of the unresolved concerns about the environmental impacts associated with the plan;
- since this request has been filed, no decision has been made by the MOE to date, and timber management activities have commenced in some areas covered by the designation request.

In light of the foregoing factors, FFT submits that the Committee should recommend that an individual environmental assessment be ordered by the Minister of the Environment with respect to the Magpie Forest timber management plan.

c) Ranger Lake CMU, Peshu Lake CMU, and Superior FMA (Megisan Lake Outfitters)

FFT supports the designation request made by Mr. George Nixon on behalf of Megisan Lake Outfitters and other outfitters with respect to the timber management plans for Ranger Lake CMU, Peshu Lake CMU, and Superior FMA.

In FFT's view, the Committee must have regard for the following factors in making its recommendation on this request:

- in 1988-89, the MNR prepared plans which proposed extensive clearcuts and access roads in the Megisan Lake area and other nearby areas used by Mr. Nixon and other local outfitters to provide quality wilderness vacations;
- in early 1989, Mr. Nixon and other outfitters became formally involved in the MNR timber management process to pursue their concerns about the impacts of timber management on the environment and their remote tourism operations;
- on behalf of the outfitters, Mr. Nixon requested that a

roadless no-cut reserve be established in the northeastern corner of the Sault Ste. Marie District, with similar reserves proposed for the Blind River District and the Chapleau District;

- although the reserve proposal was reduced in size by the outfitters in the spirit of compromise, the proposal was rejected by the MNR and forest industry representatives;
- the "area of concern" (AOC) prescriptions developed by the MNR are inadequate to address the outfitters' concerns about the environmental and socio-economic impacts of the plans;
- in light of unresolved concerns about the access proposals, Mr. Nixon requested an individual environmental assessment in March, 1989;
- Mr. Nixon also pursued his concerns at the District and ministerial level to no avail;
- Mr. Nixon's concerns focused on the impacts of harvest on wildlife habitat and old-growth, the potential for increased blowdown, the increased pressure on fish and wildlife resources, the vagueness of regeneration proposals, and MNR enforcement capabilities;
- Mr. Nixon has also retained a forest ecologist who prepared a report recommending the preservation of old growth white pine stands that are present in areas eligible for harvest;
- in January, 1990, Mr. Nixon filed a designation request on behalf of local outfitters with respect to the plans in question;
- significant environmental impacts exist with respect to these plans, and the outfitters' concerns have not been resolved by the MNR's timber management planning process;
- since the request has been filed, timber management operations are apparently proceeding in some of the townships included in the designation request;
- on several occasions, Mr. Nixon has asked the MOE for a decision on designation, but no decision has been made to date.

In light of the foregoing factors, FFT submits that the Committee should recommend that an individual environmental assessment be

ordered by the Minister of the Environment with respect to the timber management plans in question.

The Committee has inquired whether there could be a "halfway point" between rejecting or granting these designation requests, viz., an alternative despite resolution (ADR) mechanism which could settle the dispute, with or without terms and conditions. Although FFT cannot speak for the requesters, FFT would not be averse to the initiation or continuation of formal or informal negotiations during the review of the designation requests. However, FFT submits that the conduct of the negotiations cannot be entrusted to the MNR since the MNR is a party in the dispute (and is not a disinterested actor caught in the middle of the dispute, as the MNR often claims). Accordingly, if ADR is to be employed for these or other requests, then an "outside" facilitator, mediator or conciliator would have to be arranged, with the understanding that the Minister should still make a decision, in writing and with reasons, on the designation requests.

ISSUE #2-- HOW SHOULD THE MINISTER OF THE ENVIRONMENT DEAL WITH FUTURE REQUESTS FOR ENVIRONMENTAL ASSESSMENTS OF TIMBER MANAGEMENT PLANS?

In a pamphlet entitled "Timber Management Planning: Getting Involved Can Make a Difference" (1988), the MNR has specifically advised the public of the potential applicability of the EAA to timber management plans:

If significant issues still exist, Ontario's Environmental Assessment Act provides for further review. The plan, or parts of it, may be referred to the Ministry of the Environment for an individual environmental assessment (p.7).

Similarly, the existing exemption order effectively requires MNR public notices concerning CMU access roads to indicate that the access proposals may be bumped up to individual environmental assessment pursuant to the approved Class Environmental Assessment for Access Roads to MNR Facilities (see Appendix A). In the future, bump up requests will likely be made pursuant to the relevant terms and conditions imposed by the Environmental Assessment Board, and it is noteworthy that a number of the parties in the Timber Management hearing, including FFT and MNR, have proposed somewhat similar bump up provisions.

In light of this background, it is not surprising that there is a growing public perception that designation/bump up of a timber management plan is, in fact, available under the EAA. Moreover, there is a legitimate public expectation that designation/bump up requests, if made, will be decided by the Minister of the Environment in a timely fashion, and will be based on rational and cogent grounds. This is not to suggest that all requests should be automatically granted; however, it is reasonable to expect that the requests will be carefully considered on their merits and that decisions will be made in a relatively expeditious fashion.

Nevertheless, given the MOE's rather inexplicable treatment of some recent designation requests, there is considerable public misunderstanding about the designation process, and even more uncertainty about the criteria and timeframes used by the Minister of the Environment to make decisions about requests. For example, one of the first timber management designation requests received by the MOE was made by Mr. Ted Mosquin on behalf of the Canadian Parks and Wilderness Society (CPAWS) with respect to the Lanark CMU. The request was made in February 1988, and was based on the group's numerous concerns about the adverse environmental impacts of timber management activities in certain areas containing ecologically significant values and features. While CPAWS received a letter of acknowledgement from the Minister of the Environment in March, 1988, a decision on the request has never been communicated to the group to date. In the meantime, the MOE's Environmental Assessment Branch advised the MNR that the plan could be implemented notwithstanding the unresolved designation request (see Appendix B). Significantly, FFT has recently been advised by Mr. Mosquin that timber management activities have commenced in some of the most environmentally sensitive areas covered by the request.

This lengthy inaction is to be contrasted with the relative haste in which the Minister rejected a recent designation request made by the Wildlands League concerning logging within Algonquin Park. The group's request was made in March 1990, and in mid-May 1990, the Minister rejected the designation request (see Appendix C). While

the Minister should perhaps be commended for the quickness of his decision, it remains unclear why the Algonquin Park request was rejected in a matter of weeks, while the Lanark CMU request has apparently remained undecided for almost three years.

In addition, the reasons cited by the Minister in his rejection of the Algonquin Park request are equally perplexing. As far as FFT can discern, the request was rejected for three reasons: firstly, that the plan was subject to public comment and was prepared in accordance with the Class Environmental Assessment for Timber Management; secondly, that the Chief Forester for the Algonquin Forestry Authority had corresponded with Mr. Tim Gray of the Wildlands League; and thirdly, that logging was permitted under the 1988 Parks Policy. In FFT's respectful opinion, none of these reasons justify the rejection of the request, principally because they are not relevant or material to the substance of the request, viz. the significant environmental impacts associated with the proposed timber management activities within Algonquin Park. Surely, the MNR's adherence to its own planning process, or the mere fact of correspondence between interested parties, or the existence of certain provisions with the Parks Policy, do not have any bearing on whether the environmental impacts of the proposed logging are significant enough to warrant individual environmental assessment.

On this issue, it is noteworthy that a MNR witness at the Timber

Management hearing indicated under cross-examination by FFT that the MNR would not support a future bump up request where the planning process has been followed (Transcript, page 25,260). Assuming that the MNR will, in fact, adhere to its own planning process, it therefore seems likely that the MNR will oppose all future bump up requests on this ground. Accordingly, FFT submits that adherence to the planning process per se cannot be a determining factor in decisions concerning designation/bump up requests, particularly in light of the MNR's apparent position on this issue.

In FFT's view, many of the above-noted difficulties may be avoided if the Minister of the Environment endeavours to make a decision on designation/bump up requests within 90 days of their receipt (see attached FFT Condition #48). While it would be preferable for the MOE to make decisions on the requests as soon as possible, FFT recognizes that in some circumstances, a longer period of time may be required. At the same time, however, FFT submits that 90 days should be the maximum amount of time required to make a decision on the requests. As a matter of fairness, the MOE's decision should be made and communicated to the requester as soon as possible. In FFT's view, a three month period should be more than adequate for this purpose, particularly when one considers that the MNR only gives the public one month to review entire timber management plans.

While a designation/bump up request is being considered by the MOE, it is imperative that no timber management activities should be approved or conducted within the area covered by the request until a decision is made. Otherwise, the request may be rendered moot by the continuation of operations that may warrant individual environmental assessment before they are conducted. In addition, this prohibition should serve as an incentive for the MNR and the forest industry to settle the outstanding environmental concerns wherever possible so as to allow the continuation of operations without interruption.

Where the Minister decides to reject the request, that decision should be communicated as soon as possible to the requester and the MNR, together with written reasons for the rejection. Similarly, where the Minister decides to grant the request, that decision should be communicated as soon as possible to the requester and the MNR. It is conceivable that the Minister may refer particularly controversial requests to the Committee for its consideration; however, such a referral should not be considered as a final decision on the request, and the above-noted 90 day timeframe and prohibition on operations should still be in effect where the request is referred to the Committee.

FFT submits that the Minister should grant a designation/bump up request if unresolved public concerns exist about the plan, or if the implementation of the plan will cause or is likely to cause

significant environmental impacts, or if the plan otherwise warrants an individual environmental assessment. This latter criterion is intended to provide some flexibility where, for example, new information about a proposed harvesting area is discovered after the approval of the plan, or where hitherto unexpected environmental impacts are detected with respect to timber management plans.

FFT notes that the "unresolved public concern" and "significant environmental impacts" criteria are utilized in a number of approved class environmental assessments (i.e. GO Transit Class Environmental Assessment, and Class Environmental Assessment for Access Roads to MNR Facilities), and FFT submits that these criteria are particularly appropriate in the context of timber management. It is difficult to further define these criteria with any particularity since the level of public concern about a plan, or the significance of a plan's environmental impacts, will vary tremendously across the province, depending on the nature and location of the proposed timber management operations.

With respect to the "public concern" criterion, it is impossible to denote or quantify the number of people with unresolved concerns that would warrant individual environmental assessment. However, "public concern" may be conceptualized as a continuum: at one extreme, there may be large numbers of people across the province with unresolved concerns about a plan (i.e. Temagami), in which

case individual assessment can easily be justified. At the other extreme, there may be situations where one or more local individuals have unresolved concerns about a plan, in which case it may be more difficult to justify individual environmental assessment (although individual assessment should not be automatically excluded merely because only one or more persons have raised concerns). Between these two extremes is a large gray area where the Minister will have to exercise her discretion as to what constitutes a sufficient level of public concern.

This task, however, is made easier by the fact that in most instances, the unresolved public concern will likely focus on the environmental impacts of the proposed operations. This is the second criterion proposed by FFT, and it focuses on the significance of the impacts of the plan on the natural, manmade, cultural, and socio-economic environments. Again, it is difficult to precisely identify the "threshold level" of environmental significance that would warrant an individual environmental assessment. Nevertheless, FFT submits that the following matters could be looked at as indicia of environmental significance in the context of timber management:

Might the proposed timber management activity (i.e. access, harvest, renewal and maintenance):

- conflict with the environmental goals, objectives, plans, standards, criteria or guidelines adopted by the province, MNR Region, or MNR District where the activity is to be carried out?

- have a detrimental effect on any wildlife species, wildlife habitat, or physical features of the environment?
- have effects on an area of 10 hectares or more?
- necessitate the irreversible commitment of any significant amount of non-renewable resources?
- involve timber management operations within or beside old-growth forests?
- pre-empt the use, or potential use, of a significant natural resource for non-timber purposes?
- involve timber management operations within or beside parks or protected areas?
- result in a detrimental effect on air, water or soil quality, or on ambient noise levels for adjoining areas?
- cause significant interference with the movement of resident or migratory fish or wildlife species?
- establish a precedent, or involve a new technology or technique, which is likely to have environmental effects now or in the future?
- have an effect on cultural, heritage or archaeological resources or values?
- be a pre-condition to the implementation of another undertaking?
- generate secondary effects (eg. increased hunting or fishing pressure, or land development) that are likely to affect the environment?
- block or degrade views, or adversely affect the aesthetic image of the surrounding area?
- affect human health (eg. pesticide use)?
- be highly controversial?

If one or more of the above-noted questions can be answered "yes" or "maybe", then the timber management activity likely warrants individual environmental assessment. It is to be noted, however, that the foregoing list is meant to be illustrative only, and it

does not constitute a full description of what may constitute an "environmentally significant impact."

Where a designation/bump up request is granted by the MOE, no timber management activities shall be approved or conducted in the area covered by the request until the submission and acceptance of the individual assessment, and until the undertaking is given approval to proceed under the EAA. This prohibition essentially flows from s.6 of the EAA.

It has been proposed by the MNR that where a bump up request is granted by the MOE, approval may be given by the MNR to allow activities unrelated to the request to proceed in the normal fashion. FFT agrees in principle with this proposal, but FFT further proposes that the Minister of the Environment should be involved in the decision to grant partial approval, largely because the impacts of timber management activities are often far-reaching and not confined to the actual area of operation. For example, logging operations beside or around an old growth stand may, in fact, adversely affect the old growth values that a requester is trying to protect through a bump up request (i.e. habitat connectivity can be "broken" through forest fragmentation resulting from cutting). Accordingly, the Minister of the Environment should only approve those operations that will not directly, indirectly, or cumulatively impact the subject-matter of the bump-up request.

ISSUE #3-- ARE THE EXISTING TERMS AND CONDITIONS OF MNR-11/9 ADEQUATE TO ADDRESS THE ENVIRONMENTAL IMPACTS OF TIMBER MANAGEMENT ACTIVITIES UNTIL THERE IS AN APPROVED CLASS ENVIRONMENTAL ASSESSMENT?

Beginning in 1976, the MNR has received a continuing series of exemption orders which have served to exempt the undertaking of "forest management on Crown lands" from the application of the EAA. In FFT's view, this has effectively allowed the entire forest industry to hide beyond a governmental exemption, and it has allowed timber management activities to evade the scrutiny of the environmental assessment process for years. The current exemption order, MNR-11/9, was passed in 1985, and it will remain in effect "until a decision on approval is made with respect to the Class Environmental Assessment". It is noteworthy that during the currency of MNR-11/9, approximately 1.2 million hectares of Crown land has been harvested by industry.

The Class Environmental Assessment hearing commenced in May, 1988, and is currently proceeding with the presentation of evidence from FFT, the first party in opposition to present its case to the Environmental Assessment Board. A number of full-time and part-time parties are scheduled to follow FFT, and a series of "community hearings" are also scheduled to occur. After the intervenors have presented their cases, the MNR and possibly the forest industry will have an opportunity to present reply evidence, which will be followed by final argument from the parties. In the result, it is not unreasonable to expect that the hearing will last

until mid-1992 or later.

Given the voluminous nature of the evidence, it is difficult to predict when the Board's final decision will be written and released; however, it is likely that the decision will not be available for a considerable period of time following the conclusion of the hearing. It must be noted that it is open to the board to reject the Class Environmental Assessment and refuse to give approval to proceed with the undertaking. In addition, given the nature of the interests at stake, an appeal to Cabinet is likely to be undertaken by one or more of the parties once the Board has delivered its decision. Further, it is not unreasonable to expect that one or more of the parties may initiate judicial review proceedings following the Cabinet appeal, which could take months or even years to resolve. The significance of this post-hearing activity is that assuming the Board approves the undertaking, the Board's decision may not be effective or implemented for a lengthy period of time, leaving the current exemption order intact and allowing the continued harvest of over 200,000 hectares of Crown forest per year.

In these circumstances, FFT submits that it is imperative that MNR-11/9 be amended to ensure that its terms and conditions are sufficient to protect the environment from the adverse impacts caused by timber management activities. As described below, the existing terms and conditions are inadequate in terms of their

content and application, and they must be substantially strengthened by the inclusion of additional conditions relating to various environmental issues. In FFT's view, the current terms and conditions, which generally require minimal forms of public notice and consultation, must be supplemented by effective and enforceable conditions that lead to substantive environmental protection and sound management of the province's forest resources.

a) Existing Conditions in MNR-11/9

Conditions #1 and #2 of MNR-11/9 require the MNR to "consult the public and government agencies at an early stage of the preparation of forest management plans", and to provide the MOE with a description of the consultation procedure to be used by the MNR. To satisfy these requirements, it is FFT's understanding that the MNR is currently using the unapproved timber management planning process outlined in the Class Environmental Assessment document. FFT submits that it is questionable whether this approach fulfils these Conditions; moreover, it begs the obvious question of whether or not the process actually provides for meaningful participation by the public and government agencies, or of whether or not the process results in adequate environmental protection or integrated resource management.

In FFT's view, the MNR planning process does not provide for sufficient public participation, environmental protection, or integrated resource management, as demonstrated by the growing

number of designation requests, including those being considered by the Committee. The MNR "open houses" are often not well-attended, and many public participants involved in timber management planning exercises have been frustrated by the unwillingness of the MNR to significantly change timber management plans to accommodate public concerns about environmental impacts (see FFT Witness Statement #2). The existing planning process lacks public credibility, and it will not enjoy any public confidence as long as timber extraction remains the MNR's highest priority. For these reasons, the development of an internal MNR approval process is unlikely to generate much public confidence, particularly in light of the requesters' complete lack of success in their informal appeals at the District, Regional and ministerial levels. Accordingly, FFT submits that these Conditions should be substantially revised to achieve these objectives, as described below.

Condition #3 requires the MNR to plan primary access roads on CMU's in accordance with the Class Environmental Assessment for Access Roads to MNR Facilities. Since MNR-11/9 was enacted in 1985, over 10,000 km of access roads have been constructed or reconstructed by the MNR or under cost-sharing agreements with other parties, such as FMA holders. While Condition #3 perhaps represents an attempt to provide an interim solution to the access planning problems, it is unclear why this Condition is limited to CMU's and does not apply to FMA's or Company Units. More importantly, there is some concern over the adequacy of access planning conducted pursuant to this

Condition, as demonstrated by the controversy over the scope and content of the Red Squirrel Road/Pinetorch Corridor environmental assessment. Even a MNR witness at the Timber Management hearing indicated during cross-examination by FFT that the Access Roads Class E.A. was not designed to govern the planning of primary forest access roads (Transcript, p.24,662 ff). Interestingly, during this cross-examination, the MNR was unable to provide any documentation that a primary access on the Red Lake CMU was, in fact, planned in accordance with this Condition, thereby raising questions of MNR non-compliance with MNR-11/9. Given the extensive nature of the current access road network, and given the MNR's apparent intention to increase the amount of access roads in hitherto inaccessible wilderness areas, FFT submits that this Condition should be substantially revised to ensure that the environmental impacts of access roads are properly identified, analyzed, and mitigated, as described below.

Condition #4 requires the MNR to follow minimal public notice requirements with respect to the aerial application of herbicides and insecticides for forest management purposes. Since MNR-11/9 was enacted in 1985, approximately .5 million hectares of Crown land have been treated with herbicides such as 2,4-D and glyphosate, and over 1.5 million hectares have been sprayed with insecticides for forest management purposes. Significantly, Condition #4 is silent on the need to minimize or avoid pesticide use, and it does not purport to address the environmental impacts

associated with pesticide spraying within Ontario's Crown forests. In light of increasing public concerns about the environmental impacts of pesticides, FFT submits that this Condition must be amended to direct the MNR to reduce its reliance on pesticides and to develop and implement non-chemical alternatives to pesticides, as described below.

Conditions # 5 and #6 simply require the MNR to prepare and provide certain records to the MOE regarding timber management plans prepared pursuant to the exemption order. Condition #7 provides that where applicable, other approved environmental assessments shall apply to certain activities related to the undertaking. As discussed above, Condition #8 contains an unfixed termination date for the exemption, viz. the approval of the Class Environmental Assessment. In FFT's view, these latter Conditions are simply administrative in nature, and they do not purport to address the environmental impacts associated with timber management activities.

In light of the foregoing discussion, FFT strongly submits that the existing exemption order is not adequate to address the environmental impacts of timber management. Accordingly, FFT submits that MNR-11/9 must be substantially strengthened and broadened to ensure that timber management activities are carried out in a manner consistent with the purpose of the EAA pending the approval and implementation of the Class Environmental Assessment. This is not to suggest that the Committee or the Minister of the

Environment should attempt to usurp the role of the Environmental Assessment Board, or to anticipate or "second-guess" the Board's decision. Instead, FFT is recommending that the Minister impose general terms and conditions in the exemption order which provide interim environmental protection pending the approval of the Class Environmental Assessment. Ultimately, the Board's decision will supplant the order's terms and conditions through the imposition of more detailed terms and conditions. Nevertheless, it is FFT's submission that it is incumbent upon the Minister to immediately impose terms and conditions which ensure that forestry practices are carried out in an environmentally sound manner until the Class Environmental Assessment is approved. Accordingly, FFT is proposing a number of substantive changes to MNR-11/9, as described below.

b) Proposed Conditions for MNR-11/9

It is FFT's submission that exemption orders under the EAA must contain terms and conditions which ensure that the exempted undertaking is conducted in a manner which contributes to the betterment of the people of Ontario by providing for protection of the environment and wise management of natural resources. In FFT's view, the current terms and conditions of MNR-11/9 do not achieve this objective, and FFT therefore submits that the exemption order must be amended to include provisions relating to the following matters:

- i) clearcut size;
- ii) full-tree logging;
- iii) wildlife management;
- iv) old growth forests;
- v) access planning;
- vi) watercourse protection;
- vii) integrated pest management;
- viii) provincial guidelines and manuals;
- ix) silvicultural data collection and reporting; and
- x) integrated forest management.

Each of these matters is discussed below, together with FFT's recommendations for amendments to MNR-11/9.

i) Clearcut Size

Clearcutting is by far the most common harvesting method in Ontario's Crown forests. For example, in 1988-89, clearcutting accounted for 199,974 ha (94%) of the 213,847 ha cut on Crown lands. However, there currently exist no legislated or enforceable limits to clearcut size in Ontario. While the Timber Management Guidelines for the Provision of Moose Habitat (1988) refer to a 130 ha cut size, it must be noted that these are only "guidelines" and that they do not prescribe an absolute limit on clearcut size in Ontario. It must also be noted that the MNR has recently promulgated an "interim direction" respecting the moose habitat guidelines which effectively increases the cut size to 260 ha. However, nothing precludes a timber management plan from

prescribing a clearcut larger than 260 ha, provided certain documentation requirements are met. In the result, there are no effective or enforceable limits to clearcut size in the province, and large area clearcutting is proceeding apace throughout the boreal forest.

Professor Crandall Benson, a forestry consultant retained by FFT, has documented the existence of massive single clearcuts and "contiguous" clearcuts (i.e. clearcuts that are adjacent to each other) on FMA's and CMU's throughout the province (see Appendix D) for a summary of his findings; see also attached FFT Witness Statement No. 5). For example, using satellite imagery and cutover maps, Professor Benson has identified a contiguous clearcut near Kapuskasing that measures 269,000 ha. Such massive clearcuts can cause a number of significant adverse environmental impacts, including the reduction of species and habitat diversity; adverse impacts on aesthetics and other non-timber values and uses; soil desiccation and/or erosion by water and wind; rutting and compaction by the equipment used in clearcutting; increased windthrow; changes in microclimate; elevation in water tables and increased peak streamflow; site acidification; nutrient losses; inadequate regeneration; decreases in site productivity; and numerous other impacts. Many of the foregoing environmental effects are exacerbated by the manner in which the clearcutting is carried out, such as the practice of leaving inadequate reserves or wildlife corridors, or cutting to shorelines of lakes, streams and

other watercourses.

In light of these adverse impacts, Professor Benson, Mr. George Marek, and other FFT consultants have concluded that Ontario must join other Canadian, American and European jurisdictions in imposing maximum limits on clearcut size. At the same time, these consultants have advocated a move from intensive plantation management to modified cutting and small area clearcutting designed to enhance natural regeneration of cutovers. This "extensive management" approach will avoid the environmental and economic costs of large area clearcutting, which is often part of a "silvicultural package" that requires expensive and risky artificial regeneration and herbicide spraying. In FFT's submission, large area clearcutting poses an onerous and unnecessary ecological, socio-economic and cultural cost to the present and future residents of Ontario, and it is a practice which is clearly not consistent with the purpose of the EAA.

For these reasons, FFT strongly recommends that clearcut limits must be imposed forthwith in Ontario. FFT's proposed limits are contained in FFT Conditions #14 - #15, which have been presented to the Environmental Assessment Board. While the Board will ultimately make a ruling on clearcut size, FFT believes that interim clearcut limits are clearly in the public interest and must be set by the Minister of the Environment. In doing so, the Minister is, of course, not restricted to the limits proposed by

FFT, but it is submitted that she should have regard for these limits as "order-of-magnitude" benchmarks since they were drafted by professional foresters with considerable experience in Ontario's forests. Clearcut restrictions will undoubtedly be vigorously opposed by the MNR and the industry, but the time for their imposition has undoubtedly arrived, and further inaction or delay cannot be justified in light of the overwhelming evidence against the continuation of large area clearcutting.

RECOMMENDATION #1 - The Minister of the Environment must amend MNR-11/9 to include clearcut restrictions for each working group in the boreal and Great Lakes - St. Lawrence forest.

ii) Full-Tree Logging

Full-tree logging refers to the removal of all above-stump tree components (i.e. the trunk, limbs and foliage) from the cutover site. The use of full-tree logging has rapidly escalated in recent years, and the majority of the harvest in Ontario's boreal forest is now carried out by full-tree logging.

There are, however, a number of adverse environmental impacts associated with the practice of full-tree logging in Ontario, particularly on nutrient-poor or acidic soils. For example, Dr. Thomas Hutchinson, a Trent University ecologist and FFT consultant, has concluded that full-tree logging can remove key nutrients (which are largely contained in the tree crown) from the site, including nitrogen, potassium, calcium, and several other nutrients (see FFT Witness Statement #1). In nutritionally moderate to poor

areas, this nutrient depletion can impair a site's ability to regenerate second and subsequent generations of forests. Full-tree logging can also remove potential seed sources from the site (i.e. where the cone-bearing slash is left at the roadside). In addition, the province's naturally acidic soils in the boreal forest can be made more acidic by the removal of tree crowns containing basic cations which tend to buffer the soil.

Mr. Chris Maser, a leading forest ecologist, has also advocated restrictions on full-tree logging (see FFT Witness Statement #6). In addition to nutrient depletion concerns, Mr. Maser has concluded that full-tree logging removes the valuable "biological capital" (i.e. snags, fallen trees, and downed woody material) that is necessary to replenish the soil and the forests over time through decomposition.

In light of these environmental impacts, FFT recommends that restrictions on full-tree logging be imposed in Ontario. In particular, FFT submits that full-tree logging must be restricted to highly productive sites containing relatively deep mineral soil; other restrictions are also necessary with respect to the timing of full-tree logging operations (see FFT Condition # 15 (2)). Again, this matter will likely be dealt with by the Environmental Assessment Board when it releases its decision, but FFT submits that the Minister of the Environment must impose interim restrictions so as to protect the productivity of sites that are

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susceptible to the impacts of full-tree logging. As noted above, several hundred thousand more hectares of Crown forests will be logged by the time the Board's decision is effective, and since full-tree logging will account for most of this harvesting, it is imperative to ensure that site productivity is maintained through the imposition of limitations on full-tree logging.

RECOMMENDATION #2 - The Minister of the Environment must amend MNR-11/9 to impose site and timing restrictions on full-tree logging in the boreal and Great Lakes - St. Lawrence forest.

iii) Wildlife Management

The MNR currently practices "featured species" wildlife management, which means that a single species is directly managed so as to provide socio-economic benefits to Ontarians. Presently, the MNR uses moose and deer as featured species at the provincial level, although certain species, such as bald eagles, may be featured locally in areas where they occur. The MNR claims that by directly managing habitat for moose and deer, habitat is also provided for approximately 70% of Ontario's 309 vertebrates. Unfortunately, the efficacy of the moose and deer habitat guidelines in providing habitat for the 70% (let alone the remaining 30%) has not been scientifically documented and is only now being studied by the MNR and its consultants. Significantly, results from the testing program (referred to by Mr. Rick Laprairie in the MNR's presentation to EAAC) will not be available for at least a decade.

A number of other concerns have arisen in respect of the MNR's featured species approach, including the hypothetical nature of the approach; the exclusion of snag-dwelling species or species which prefer old-growth; the exclusion of other forms of wildlife, such as plants or invertebrates; the inability to protect biological diversity; and the lack of knowledge of the habitat requirements of many wildlife species (see FFT Witness Statement #9). Despite these deficiencies and uncertainties, the MNR continues to use the featured species approach and the habitat guidelines as the primary means of managing the impacts of timber management on wildlife.

In FFT's view, such an approach is clearly contrary to the public interest in that we cannot afford to take chances with the maintenance of biological diversity or the viability of any wildlife species, particularly as the amount of quality habitat is dwindling in Ontario and elsewhere. For this reason, Mr. Maser and FFT's other wildlife consultants have recommended the development of a comprehensive landscape management and planning system that would ensure the survival of all wildlife species by preserving and managing all habitats and ecosystems within the landscape (see FFT Conditions # 25 - 27). Under this approach, all forest stand types and ages will be represented in the forest, and the resultant forest will contain a heterogeneous mix of cuts of varying sizes typical of a natural fire-dominated landscape. Special monitoring and management would be undertaken for vulnerable, threatened or endangered species within the province. It is noteworthy that a

recent MNR-sponsored wildlife workshop is advocating the development of landscape management in Ontario.

FFT submits that Minister of the Environment must expedite the implementation of landscape management through appropriate conditions in the exemption order. The featured species approach is not an adequate provincial strategy to protect biodiversity and all wildlife species, and the species that may already be in trouble as a result of timber management activities (i.e. area-sensitive species such as the red-shouldered hawk) cannot afford to wait for the Board's decision.

RECOMMENDATION #3 - The Minister of the Environment must amend MNR-11/9 to require the MNR to develop and implement a landscape management and planning system that will provide for the maintenance of biological diversity and protection of all wildlife species.

iv) Old Growth Forests

In Ontario and elsewhere, there has been an increasing awareness of the need to protect and conserve old growth forests. Old growth forests are diverse and productive ecosystems which contain a variety of ecological, aesthetic, scientific, social and spiritual values, and they serve as repositories for genetic diversity, which can provide ecological resilience against large-scale environmental threats such as global warming (see FFT Witness Statement #6). Accordingly, Mr. Maser has concluded that substantial amounts of commercially available old-growth forests should be set aside and

protected against logging (see FFT Condition #28). He has also concluded that some forest stands should be managed on extended rotations (i.e. past the commercial rotation age) in order to provide old-growth values for the future.

The phrase "old-growth" is somewhat vague, and it must be defined with greater precision. In general, old-growth forests encompass the late stages of stand development, and they are characterized by large live trees, large snags, large fallen logs, and large declining trees. Old-growth stands also possess a number of compositional and functional attributes which vary according to tree species, stand size and type, and location within the landscape.

While the U.S. Forest Service and other resource management agencies are developing old-growth definitions and policies, the MNR does not have any specific policies or definitions in place to require forest managers to protect old-growth ecosystems in Ontario. In the meantime, the province's old-growth forests continue to be accessed and harvested in accordance with the "oldest first" harvesting philosophy. Similarly, in accordance with the MNR's avowed intention to have a "fully regulated" forest with balanced age classes, there is no commitment by the MNR to allow the second-growth forest to live beyond the commercial rotation age into the late successional stages. Accordingly, it appears that old-growth values will soon be lost or degraded for

present and future generations.

For these reasons, FFT submits that the Minister must require the MNR to expedite the development and implementation of appropriate old-growth definitions, objectives, policies, and guidelines. In particular, the MNR should require the alteration of silvicultural practices in order to maintain or establish old-growth values, and should ensure that old-growth values are adequately distributed throughout the landscape with a view to avoiding or minimizing the fragmentation of old-growth forests. Where the objectives for providing old-growth values are incompatible with timber management in a given area, then the forest in question should be classified as ineligible for harvesting.

RECOMMENDATION #4 - The Minister of the Environment must amend MNR-11/9 to require the MNR to expedite the development and implementation of old-growth definitions, objectives, policies, and guidelines in order to protect and conserve old-growth forests within Ontario.

v) Access Planning

The MNR does not have a policy on access roads which identifies areas of the province in which no roads will be permitted or constructed (Transcript, p.21,833). Accordingly, there is nothing to prevent most or all of the remaining remote wilderness areas in Ontario from being accessed if these areas contain merchantable timber. Moreover, at the rate that access roads are currently being built, it is likely that many of these remaining roadless

areas will be accessed in the near future.

There are a number of adverse environmental effects associated with the construction, use, maintenance, and abandonment of forest access roads. These impacts include: the loss, degradation and fragmentation of wildlife habitat; the impairment of water quality and fish habitat by erosion and sedimentation of road materials; blockage or interruption of fish and wildlife movement; overexploitation of fish and game resources; loss or degradation of remote wilderness values; impacts on remote tourism operators; impacts associated with roadside spraying of herbicides; and numerous other significant effects. In FFT's view, these potential effects explain why many of the most contentious land use conflicts (i.e. the Red Squirrel Road in Temagami) involve disputes over proposed forest access roads.

In FFT's view, however, the MNR's access planning process, as set out in the Timber Management Class Environmental Assessment, is inadequate to deal with these environmental impacts, largely because the MNR only requires an operational analysis of the proposed road corridor (i.e. effectiveness of access, cost of access, "accommodation" of preliminary areas of concern) rather than a true environmental analysis of the road (i.e. assessment of the full range of environmental effects, cost-benefit analysis, adequate consideration of alternatives, including the null alternative).

In light of the foregoing discussion, FFT submits that the Minister of the Environment should require the MNR to immediately conduct an evaluation of all remaining roadless wilderness areas with a view to identifying areas which shall remain roadless and be managed as wilderness (see FFT Condition #32). In addition, FFT submits that the Minister should require the MNR to ensure that access roads and landings are located, constructed, used, maintained and abandoned in a manner that is consistent with the protection and long-term sustainability of forest resources, features, and uses (see FFT Conditions #33 - 36). To achieve this objective, the MNR should be required to conduct a detailed environmental analysis of alternative road corridors, including a cost-benefit analysis and an assessment of all environmental impacts that will be caused or are likely to be caused by the access proposal.

RECOMMENDATION #5 - The Minister of the Environment must amend MNR-11/9 to require the MNR to:

- immediately carry out an evaluation of the remaining roadless areas within each management unit with a view to identifying areas that shall remain roadless and managed as wilderness; and
- conduct an environmental analysis of alternative road corridors, including a cost-benefit analysis and an assessment of all environmental impacts associated with the access proposal.

vi) Watercourse Protection

Forests play an integral role in the maintenance of healthy watersheds and the protection of water quality and aquatic habitat. However, timber management activities, particularly harvesting, can

cause a number of adverse impacts upon the hydrologic cycle and the aquatic environment. These impacts include: elevation of watertables; increased water yield and peak streamflows; increased turbidity; erosion and sedimentation; increased input of organic debris; nutrient leaching; increased stream acidity and water temperature; runoff or seepage of fuel and oil from forestry equipment; and numerous other significant effects. Accordingly, it is imperative that timber management activities be planned and conducted in a manner which prevents or minimizes these potential impacts on water quality and quantity.

However, many waterbodies and watercourses have not be adequately protected against the above-noted impacts of timber management. For example, in many instances, clearcutting has occurred up to the shoreline of lakes, rivers and streams despite the provisions of the Timber Management Guidelines for the Protection of Fish Habitat (see FFT Witness Statements #2 and #5). In other cases, where shoreline reserves have been established, these reserves are inadequate to protect against the impacts of timber management, and in some instances, the reserves have been infringed or ignored by logging operators. Small headwater areas and small-order streams often receive little or no protection under timber management plans. Similarly, access roads and watercrossings have caused serious erosion and sedimentation problems in many areas.

These occurrences are, in part, attributable to the lack of

effective and timely monitoring and enforcement activity by the MNR. At the same time, FFT submits that some problems are attributable to the general inadequacy of the MNR's policies, guidelines and manuals related to watercourse protection. For example, it must be noted that the efficacy of the MNR's Fish Habitat Guidelines is only now being scientifically tested to determine if the guidelines are effective. Until the results of this study are available, FFT submits that the Minister of the Environment must impose interim measures which require the MNR to ensure that all streams, streambanks, shorelines, rivers, wetlands, lakes and other watercourses are not adversely affected by timber management activities (see FFT Conditions #37, #69, #72, and #76). In particular, the MNR should be required to take all necessary steps to ensure that the above-noted impacts on water quality and quantity are prevented or minimized.

RECOMMENDATION #6 - The Minister of the Environment must amend MNR-11/9 to require the MNR to take all necessary steps to ensure that all watercourses and riparian areas are not adversely affected by timber management activities. In particular, the MNR shall ensure that timber management activities do not cause or contribute to:

- changes in water temperature, yield, quality or acidity;
- blockages or impairment of watercourses;
- deposits of substances or materials which adversely affect water quality or fish habitat; or
- results in any other deleterious impact on water quality or quantity.

vii) Integrated Pest Management

In Ontario, there are a number of insecticides available for timber management purposes: aminocarb (Matacil); carbaryl (Sevin); fenitrothion (Sumithion, Folothion); and Bacillus thuringiensis (B.t.). In most instances, these insecticides have been applied aerially by fixed-wing aircraft. As a matter of policy, since 1985 only B.t. (a biological insecticide) has been sprayed in Ontario's forests, although the MNR and the industry have made it clear at the Timber Management hearing that they want to retain the option of using chemical insecticides in the future.

There is considerable public concern about the environmental effects associated with the aerial application of chemical insecticides in Ontario. In particular, there is concern that these insecticides will lead to undesirable toxic effects upon non-target organisms, including humans. This is particularly true where the insecticide is applied aerially, which allows the substance to be transported via different pathways (i.e. drift, runoff, leaching, ingestion, inhalation, dermal exposure, etc.) into the soil, surface water, groundwater, vegetation and animal tissue.

There is similar public concern about the ever-increasing use of herbicides for the purposes of timber management. In Ontario, a number of herbicides are available for use in the province's forests: glyphosate (Roundup, Vision); 2,4-D; hexazinone (Velpar);

simazine (Princep, Simadex); and picloram (Tordon 101). Over 90% of the area treated by 2,4-D and glyphosate is sprayed from the air, while the remaining herbicides are applied on the ground. Herbicides are often applied after harvesting as a form of site preparation (i.e. to kill competing "undesirable" species, or to "dry up" a site prior to a prescribed burn), and for tending purposes after planting to "release" seedlings from competing vegetation. In some instances, a sizeable time lag may occur between harvesting and planting, and many sites may receive more than one herbicide application. In 1988-89, over 71,000 ha of Crown land were sprayed for tending purposes, largely on FMA lands.

In light of the concerns and uncertainties associated with the use of insecticides and herbicides (particularly 2,4-D -- see FFT Witness Statement #8), FFT submits that the Minister of the Environment should immediately require the MNR to develop and implement "integrated pest management" (IPM) program (see FFT Condition #63). This IPM program should include a policy objective of reducing and keeping pesticide use in Ontario's forests to an absolute minimum. In particular, the Minister should require the MNR to use non-chemical alternatives, where feasible, for site preparation and tending purposes. However, where a herbicide application is the only feasible alternative, the herbicide should be ground-applied only. The Minister should also prohibit the use of 2,4-D and all chemical insecticides for timber management purposes within Ontario's Crown forests.

RECOMMENDATION #7 - The Minister of the Environment must amend MNR-11/9 to require the MNR to immediately develop an integrated pest management (IPM) program that shall reduce the use of pesticides for timber management purposes. In particular, the IPM program will:

- require the use of non-chemical alternatives where feasible;
- require the ground application of herbicides where a herbicide application is the only feasible alternative; and
- prohibit the use of 2,4-D and all chemical insecticides for timber management purposes.

viii) Provincial Guidelines and Manuals

Over the years, the MNR has developed a number of guidelines and manuals to assist forest managers in making decisions with respect to access, harvest, renewal and maintenance operations. In theory, these various documents are presently being used within the timber management planning process. However, in FFT's view, many of these documents require updating in light of new scientific information, while several others require revision to ensure that they are consistent with the principles of integrated resource management and ecologically sustainable forestry. At the same time, the MNR needs to develop a number of new guidelines and manuals on a variety of topics related to forest management, including forest fragmentation, biological diversity, old-growth ecosystems, roadless area evaluations, protection of areas adjacent to parks and other protected areas, and habitat management guidelines for owls, herpetiles and uncommon botanical species (see FFT Condition #64). Accordingly, FFT submits that the Minister must require the

MNR to update, revise and expand the list of guidelines and manuals.

RECOMMENDATION #8 - The Minister of the Environment must amend MNR-11/9 to require the MNR to update, revise and expand all guidelines and manuals used in timber management planning to ensure that they reflect the best current understanding of the principles of integrated resource management and ecologically sustainable forestry.

ix) Silvicultural Data Collection and Reporting

Under the Crown Timber Act and the MNR Timber Management Planning Manual, there are a number of provisions which require licencees and the MNR to collect and report data concerning past and planned silvicultural operations. However, in many instances, critical silvicultural information is either not collected, or it is collected but not stored in an easily retrievable or understandable format, or it is collected and properly stored but is not made available to the public (see FFT Witness Statement #5). Given that the Crown forests are a publicly owned resource, the public is entitled to a full and understandable accounting from the MNR as to how effectively (or ineffectively) the forests are being managed by the MNR on behalf of Ontario residents.

Accordingly, FFT submits that the Minister of the Environment should require the MNR to immediately improve its silvicultural data collection and reporting methods and programs (see FFT Conditions #66, #67, #81, #82, and #83). Priority should be given

by the MNR to the collection and reporting of data relating to survival and stocking assessments, silvicultural effectiveness, timber management expenditures, and similarly important information.

RECOMMENDATION #9 - The Minister of the Environment must amend MNR-11/9 to require the MNR to immediately improve its data collection and reporting programs relating to the MNR's management of timber and non-timber resources on Crown land. In particular, the MNR shall ensure that this data is fully collected; systematically stored; easily retrievable; available and understandable to the public; and kept up to date.

x) Integrated Forest Management

Although MNR-11/9 exempts the activity of "forest management", the MNR has submitted for approval an application entitled "timber management". Undoubtedly, this wording change has resulted in part from the failure of MNR-11/9 to define what is meant by "forest management". It is important to note that this wording change is not merely a matter of semantics; instead, it represents a substantive change in management philosophy and planning processes, and it has generated endless hours of argument at the Timber Management hearing. As noted earlier, forest management is not synonymous with timber management, since the latter primarily focuses on the extraction of the timber resource for industrial purposes, while the former entails the integrated or holistic management of all timber and non-timber resources for the benefit of all forest users (see FFT Witness Statement #10).

Because the Minister of the Environment identified the exempted activity as "forest management", FFT submits that it is incumbent upon the Minister to ensure that the MNR does, in fact, carry out "forest management". Accordingly, FFT submits that the Minister must not change the exemption order to "timber management"; instead, she must define forest management in the exemption order by setting out the essential elements of forest management. While the Minister should refrain from dictating what the "forest management" planning process should look like, FFT submits that it is in the public interest for the Minister to outline the basic elements of integrated forest management in the exemption order (see FFT Condition #92).

RECOMMENDATION #10: The Minister of the Environment must amend MNR-11/9 to define "forest management" as the integrated management of all forest resources in an ecologically sustainable manner that optimizes benefits through the:

- determination of the production levels that are possible for each resource in the management unit;
- determination of the production levels desired by the users of the forest resources in the management unit;
- determination of the management procedures which will maximize user satisfaction or minimize user dissatisfaction; and
- determination of the allocation of management procedures to optimize the production of all forest resources for the management procedures selected.

CONCLUSIONS

FFT welcomes this opportunity to provide the Committee with its

views on the important issues referred by the Minister of the Environment. In particular, FFT strongly believes that these referrals offer the Minister an excellent opportunity to ensure that timber management activities are carried out in an ecologically sustainable manner pending the approval of the Class Environmental Assessment. Accordingly, FFT submits that the Minister should act on the following recommendations:

1. The Minister of the Environment must amend MNR-11/9 to include clearcut restrictions for each working group in the boreal and Great Lakes - St. Lawrence forest.
2. The Minister of the Environment must amend MNR-11/9 to impose site and timing restrictions on full-tree logging in the boreal and Great Lakes - St. Lawrence forest.
3. The Minister of the Environment must amend MNR-11/9 to require the MNR to develop and implement a landscape management and planning system that will provide for the maintenance of biological diversity and protection of all wildlife species.
4. The Minister of the Environment must amend MNR-11/9 to require the MNR to expedite the development and implementation of old-growth definitions, objectives, policies, and guidelines in order to protect and conserve old-growth forests within Ontario.
5. The Minister of the Environment must amend MNR-11/9 to require the MNR to:
 - immediately carry out an evaluation of the remaining roadless areas within each management unit with a view to identifying areas that shall remain roadless and managed as wilderness; and
 - conduct an environmental analysis of alternative road corridors, including a cost-benefit analysis and an assessment of all environmental impacts associated with the access proposal.
6. The Minister of the Environment must amend MNR-11/9 to require the MNR to take all necessary steps to ensure that all watercourses and riparian areas are not adversely affected by timber management activities. In

particular, the MNR shall ensure that timber management activities do not cause or contribute to:

- changes in water temperature, yield, quality or acidity;
 - blockages or impairment of watercourses;
 - deposits of substances or materials which adversely affect water quality or fish habitat; or
 - results in any other deleterious impact on water quality or quantity.
7. The Minister of the Environment must amend MNR-11/9 to require the MNR to immediately develop an integrated pest management (IPM) program that shall reduce the use of pesticides for timber management purposes. In particular, the IPM program will:
- require the use of non-chemical alternatives where feasible;
 - require the ground application of herbicides where a herbicide application is the only feasible alternative; and
 - prohibit the use of 2,4-D and all chemical insecticides for timber management purposes.
8. The Minister of the Environment must amend MNR-11/9 to require the MNR to update, revise and expand all guidelines and manuals used in timber management planning to ensure that they reflect the best current understanding of the principles of integrated resource management and ecologically sustainable forestry.
9. The Minister of the Environment must amend MNR-11/9 to require the MNR to immediately improve its data collection and reporting programs relating to the MNR's management of timber and non-timber resources on Crown land. In particular, the MNR shall ensure that this data is fully collected; systematically stored; easily retrievable; available and understandable to the public; and kept up to date.
10. The Minister of the Environment must amend MNR- 11/9 to define "forest management" as the integrated management of all forest resources in an ecologically sustainable manner that optimizes benefits through the:
- determination of the production levels that are

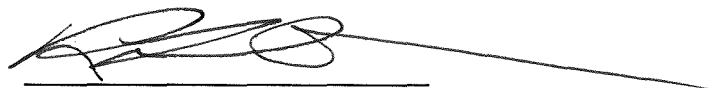
possible for each resource in the management unit;

- determination of the production levels desired by the users of the forest resources in the management unit;
- determination of the management procedures which will maximize user satisfaction or minimize user dissatisfaction; and
- determination of the allocation of management procedures to optimize the production of all forest resources for the management procedures selected.

In this way, the Minister can protect the forests of today, and can secure the future of the forests for tomorrow.

All of which is respectfully submitted.

February 15, 1991



Richard D. Lindgren

Counsel for Forests
for Tomorrow



Ministry of
Natural
Resources

| | | | |
|---|--|---|-------------------------------|
| Subject REFERENCE TO "BUMP-UP" PROVISIONS IN PUBLIC NOTICES - TIMBER MANAGEMENT PLANNING | | Bulletin No. Br. Alpha Code PS4.03.34 | Consec. No. by Fiscal Year |
| Compiled by - Branch PLANNING AND ENVIRONMENTAL ASSESSMENT BRANCH | Section ENVIRONMENTAL ASSESSMENT | Date Issued May 3, 1988 | Page 1 of |

While we are currently following the planning requirements of the Class EA for Timber Management in the preparation of new Timber Management Plans (TMPs), that Class EA does not yet have any "legal" status under the EA Act because it has not yet been approved. Our current "legal" obligations under the EA Act are spelled out in the Interim Exemption Order MNR-11/9.

The Class EA provides a mechanism, termed "Bump-up", which permits interested external participants to request individual EA treatment of a TMP, a part of a TMP, a major amendment to a previously approved TMP, an annual District insect/disease pest control program, or a specific project in an annual District pest control program. The Class EA further requires that the final public notice, which advises interested external participants that an MNR-approved TMP, major amendment or annual District pest control program is available for inspection, clearly indicate that a final opportunity to request a "Bump-up" is available.

Because the Class EA has not yet been approved and the Interim Exemption Order MNR-11/9 does not include "Bump-up" provisions, the requirement to refer to "Bump-up" in the final public notice does not yet apply. Therefore, as a general rule, no mention of "Bump-up" should appear in those final public notices. (Refer also to separate Bulletin PS 4.03.37: Amendments to Timber Management Plans and Old-Style Forest Management Plans and Operating Plans.)

There is, however, one important exception. If the TMP is a plan for a Crown Management Unit, and a new primary road proposal is part of the TMP, Condition #3 of Interim Exemption Order MNR-11/9 requires application of the Field Environmental Planning Procedure (FEPP) in MNR's approved "Class EA for Access Roads to MNR Facilities" in the planning of that primary road. That approved Class EA also contains "Bump-up" provisions, and therefore, the final public notice required for a road proposal planned in accordance with that Class EA must include a description of the final opportunity for "Bump-up" (Refer also to separate Bulletin PS 4.03.36: Timber Management Planning (Primary Roads) - Crown Management Units).

NOTE: In recent discussions with the Environmental Assessment Branch of the Ministry of the Environment during the preparation of the Government Review of the Class EA for Timber Management, MNR has made a commitment that a standard wording of provisions for "Bump-up" will be included in all future public notices related to the preparation of Timber Management Plans, plan amendments, and the annual planning of protection operations. This requirement, however, will not apply until approval of the Class EA is obtained; the appropriate standard wording will be provided to all field offices at that time.



Ministry of the Environment
Ministère de l'Environnement

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Toronto (Ontario)
M4V 1P5

323-4630

March 11, 1988

MEMORANDUM

TO: Mr. L. Douglas
Director
Planning and Environmental Assessment Branch
Ministry of Natural Resources

FROM: Brian R. Ward
Director
Environmental Assessment Branch

RE: IMPLEMENTATION OF THE LANARK CMU
TIMBER MANAGEMENT PLAN

As you are aware, this Branch is currently investigating a designation request from the Canadian Parks and Wilderness Society for the above plan.

Our preliminary review of this matter indicates that your Ministry has complied with the applicable terms and conditions of exemption order MNR-11/9, and after consultation with our Legal Services Branch, it is our opinion that you may proceed with the implementation of this plan on April 1, 1988, notwithstanding the ongoing investigation into the designation request.

It should be understood, however, that this letter does not prejudice any future decision of the Minister on amending the exemption order as it relates to the Lanark CMU Timber Management Plan.

If you have any questions or require any further information, please contact Wes Green at 323-4550.

ORIGINAL SIGNED

bcc: Minister's Office
Deputy Minister's Office
Jan Whitelaw -
Premier's Office
C.E. McIntyre
D. Guscott (SE)
B. Ward
EA File No. NR-CL-05

Author: Wes Green
W.O. #: 02M1944/02M1945

MAR 22 1988

Dr. Ted Mosquin
President
Canadian Parks and Wilderness Society
P.O. Box 279
Lanark, Ontario
K0G 1K0

Dear Dr. Mosquin:

Thank you for your letters of February 3, and 5, 1988 requesting a designation of the proposed MNR Timber Management Plan for the Lanark Crown Management Unit.

I have instructed my staff to investigate this matter and report back to me. I will then review the information before making a decision on whether to designate the proposed undertaking subject to the requirements of the Environmental Assessment Act or not.

Thank you for your interest in this matter.

Yours sincerely,

ORIGINAL SIGNED BY MINISTER

Jim Bradley
Minister

cc: The Honourable Vince Kerrio
Minister of Natural Resources

Office of the
MinisterMinistry
of the
Environment135 St. Clair Avenue West
Toronto, Ontario
M4V 1P5
416/323-4359
04M0311*rec'd May 23/90**Copy of our rejection*

May 16, 1990

Mr. Kevin Kavanagh
President
Algonquin Wildlands League
517 College Street
Suite 406
Toronto, Ontario
M6G 4A2

Dear Mr. Kavanagh:

Thank you for your letters of March 27 and April 12, 1990, requesting an environmental assessment of the Algonquin Provincial Park timber management plan.

After a careful review of your submission, I have decided that an individual environmental assessment of this timber management plan is not warranted. I note that the proposed timber management plan was the subject of several information sessions and there was an opportunity for public comment on the plan. The timber management plan has been prepared in accordance with the Class Environmental Assessment for Timber Management. I understand that Mr. Carl Corbett, Chief Forester for the Algonquin Forestry Authority has recently corresponded to Mr. Tim Gray of the Wildlands League regarding the interpretation of MNR data and information on several specific concerns. With regard to the compatibility of logging in Algonquin Provincial Park, this activity has been determined to be a permitted use in Algonquin through the Parks Policy announced in May of 1988.

Thank you for bringing your concerns to my attention.

Yours sincerely,

Jim Bradley
Minister

cc: The Honourable Lyn McLeod
Minister of Natural Resources

FFT Witness Statement No. 5, Forest Management Plans:
Contiguous Cutovers

| Management Plan | Size (hectares) |
|-------------------------------------|---|
| Domtar-Armstrong: | 8,500 - 50,000 |
| Matawin-Dog River: | up to 11,000 |
| Gordon Cosens: | up to 269,300 (20,000 within last 10 years) |
| English River: | 5,000 - 55,000 |
| Longlac Forest: | N/A |
| White River: | N/A |
| Spruce River: | 20,000 |
| Black Sturgeon: | N/A |
| Bright Sands: | N/A |
| Kiashke: | N/A |
| Hearst: | up to 6,000 |
| Kapuskasing Crown Management Unit: | up to at least 15,000 |
| Wawa Crown Management Unit: | up to 4,000 |
| Fort William Crown Management Unit: | 4,000 ha |
| Red Lake Crown Management Unit: | N/A |
| Temagami: | up to 1,000 ha |
| Latchford: | N/A |
| Minden: | N/A |