# Appendix II Statement of Management Objectives Option 2 Procedure

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July 30, 1993

Ministry of Forests Vancouver Region 4595 Canada Way Burnaby, B.C. V5J 1X3

#### Attention: K.J. Ingram, R.P.F. Region Manager

Dear Mr. Ingram,

#### Re: Statement of Management Objectives Options & Procedures for Management Plan No. 7, TFL No. 39

In response to your letter of June 28, I herewith re-submit the Statement of Management Objectives Options & Procedures for Management Plan No. 7 for TFL No. 39. I believe this draft takes into account all of the required revisions to the SMOOP that were identified in your letter. I note that a considerable number of your comments were relevant to other aspects of the Management Plan process than the SMOOP. These were duly noted and will be taken into account at the appropriate stage.

I am currently reviewing the comments/input received from the public in the course of the recently-completed Stage 2 of the public involvement programme for Management Plan No. 7. I anticipate that, as a result of this input, there may be some further modifications to the SMOOP that are warranted.

Some specific comments follow in respect to some of the points made in your letter which were not covered in the SMOOP changes.

• 2.1 Social and economic issues.

We did not imply that guidelines can or should only be evaluated on their economic criteria. In fact, our original draft acknowledged the difficulty in valuing non-timber values. One of our main points in this section is that we will try to "...compare social and economic impacts of various options..." so that these impacts are known when decisions are eventually made on whatever criteria base are deemed to be relevant. We firmly believe that all land management decisions must at least be made in the full knowledge of the social and economic impacts.

- 2.42 Operability
- 4.16 Operability Option

These sections have been revised from the original draft on the basis of the Chief Forester's requirement for both TFL 39 and 44 for analysis of options which reflect inventory attributes to determine economic categories of operability and the possibility of a partitioned AAC based on economic operability and conventional/non-conventional logging methods.

3.2 Spacing of Juvenile Stands

We don't think there is any need "...to use the Timber Supply Analysis to determine if a programme of precommercial thinning is required to meet management objectives. We will endeavour to outline in the Management Plan a profile of the log sizes and quality characteristics anticipated in future yields.

#### 3.5 Enhanced Stocking Standard

The reference to a hemlock, low site stocking standard of 1100 sph was a typographical error. The correct target level was 1000 sph and this has been corrected in the revised SMOOP.

Yours truly,

W.J. Pearson, R.P.F. Region Forester

WJP:crs 9319002

cc: J.N. MacFarlane

ccb:

#### TFL 39 Steering Committee:

J.F. Connor G.W. Griffith J.W. Kumi S.J. Coleman J.E. Mahon C.J. Burrell J.M. Duncan T.R. Holmes

#### MANAGEMENT & WORKING PLAN No. 7 TREE FARM LICENCE No. 39

#### STATEMENT OF MANAGEMENT OBJECTIVES OPTIONS AND PROCEDURES

#### **Introduction**

To be successful, the management and operation of TFL No. 39 must effectively balance human demands from the forest at two broad levels:

- economic; the contribution that management of the TFL makes to the economic welfare of society at the local, regional, provincial, and, even, national and world levels.
- environmental; the measures required to ensure the sustainability of forest values and the integrity of the ecological systems from which these values are derived.

Achievement of a balance in these demands from the forest will dictate the contribution that management of the TFL makes to the quality of life of people who may be affected in terms of opportunities for employment and recreation or aesthetic and spiritual experiences.

The TFL has been in existence since 1961; it is in its fourth decade. During this time, MacMillan Bloedel has managed the Licence for its long term continuance. Harvest levels have been determined in relation to long term forecasts of timber supply over several rotations, reforestation has kept pace with harvesting and been carried out to high standards. During this period, human demands from the forest have changed and evolved as scientific knowledge has increased and as values have changed. As a result, forest management has evolved and been adapted, in cooperation with government regulatory agencies, to respond to these changes. The process continues today and will be reflected in the next Management Plan, the seventh in the history of the TFL.

Accordingly, throughout this Statement we have tried to ensure that both of the broad levels of human demands from the forest - economic and environmental - are accounted for in our objectives, the pertinent issues and the analysis of the Timber Supplies that may be available under the range of scenarios and options that are possible.

#### 1.0 MANAGEMENT, GOALS & OBJECTIVES

#### 1.1 Management Goals

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Three broadly-defined management goals underlie the forest management objectives for the TFL:

- stability of communities and employment where these are dependent on or significantly influenced by management activities on the TFL in the short and the long term.
- protection of the environment to ensure sustainability of forest values, products and uses derived from the forests of the T.F.L.
- continuance, in both the short and long term, of an economically-viable enterprise based on:
  - the maximization of timber values by manufacturing a range of forest products yielding the greatest economic margin.
  - managing second growth forests to yield an optimum economic balance between total usable yields, log quality characteristics, and costs of silviculture. Thus, the future yields from the TFL will yield logs suitable for a full range of solid wood and pulp/paper products.

#### 1.2 Forest Management Objectives

To achieve the foregoing management goals, the following forest management objectives will apply during the term of the Management Plan.

#### 1.21 Timber Management Objectives

- The AAC approved for the TFL will be harvested within the variance limits specified in the Forest Act.
- The harvest of the AAC will be allocated to each of Bk 1, 2, 3&4 combined, 5,6, and 7. The AAC allocation will be substantiated by a Timber Supply Analysis based on the land base in each of the foregoing working circles.
- Where possible, in terms of applicable Integrated Resource management constraints, the timber supply schedule on which management strategies of the TFL are based will be set such that future AACs will not decline by more than 10% in any decade commencing with the current level unless the productive capacity of the License is significantly reduced by reallocation to other land uses. This will apply at the TFL level and for all working circles except Bks 5 and 7. The latter Bks, not directly supporting communities, may exceed the 10% decline per decade in the transition from present harvest levels to Long Run Sustained Yields.

- <u>NB</u> The TFL and Block AACs recommended for approval of the Chief Forester of B.C. will be based on consideration of the following:
  - area net down and/or measures to be taken for environmental protection and sustainability of other non-timber values on the TFL, including:
    - · fish and wildlife habitat
    - terrain stability
    - water quality
    - · recreational values and usage
    - · landscape aesthetic values
    - archaeological, cultural and heritage values
    - problem reforestation areas
  - economic viability of the harvestable land base in the short and long term and in relation to feasible harvest methods.
  - implementation of a forest renewal and tending programme designed to:
    - comply with the basic silviculture requirements specified in the Forest Act.
    - ensure achievement of the future yields projected in the Timber Harvest Schedule which will substantiate the AAC.

#### 1.22 *Range*

Since opportunities for range forage within the TFL area are insignificant or even nonexistent, no range management objectives are stated.

#### 1.23 Recreation Management Objectives

- To provide a broad range of recreational opportunities appropriate to the diverse areas within the Tree Farm Licence through:
  - identification of the Recreation Opportunity Spectrum (ROS) classes throughout the TFL.
  - identification of recreational features throughout the Licence by means of recreation inventories carried out and periodically maintained according to standards specified by the Ministry of Forests.
  - consideration of recreational values in the planning and conduct of timber management to ensure that timber and recreational values are integrated and coordinated for the greatest combined benefit. This will include the protection of some forest areas which have sufficiently high recreational value that they are best managed solely for recreation.
  - completion of recreational use surveys and recreational analyses in accordance with prescribed procedures to assist in identifying need for recreational facilities.
  - recommendation of appropriate recreational facilities and, as approved and funded by the Ministry of Forests, establishment of these facilities on the Licence.

#### 1.24 Integrated Resource Management Objectives

In addition to the recreational and aesthetic landscape values that occur throughout the TFL in varying degrees of variety and abundance, there is a full range of other non-timber values that occur generally throughout the Licence or only in specific locations.

These include:

- fish and wildlife and their associated habitats.
- · domestic or commercial water supplies.
- natural ecologic systems and associated biodiversity.
- archaeological and cultural values including forest-related features of significance to aboriginal culture.

Forest management objectives for integration of these values in overall management of the TFL are:

- plan timber harvesting in a manner and schedule that protects and conserves important non-timber values.
- carry out inventories of timber and non-timber resources to prescribed standards and as needed to effectively integrate all forest values in forest management planning on the TFL.
- organize forest inventory data (timber and non-timber values) within an efficient Geographic Information System (GIS) that permits and facilitates:
  - harvest planning
  - analysis of options in terms of costs, AAC impacts etc.
  - simple maintenance of the data base to account for new information and/or correction/revision of old data.

#### 1.25 Public Involvement Objectives

A number of interest groups have expressed concerns for the inherent forest values of the TFL and, hence, are concerned with its management and how their interests may be affected. To account for their valid interests in the management of the TFL, the following public involvement objectives will apply:

- ensure that the public is notified of and is provided opportunity to review and comment to Five-Year Harvest Development Plans and Pre-Harvest Silvicultural Prescriptions in a timely and effective manner.
  with regard to Management and Working Plans, proactively seek out and contact a broad cross-section of public interest groups and the public at large to:
  - inform them of the planning process for the TFL and opportunities for public input to the planning process.
  - communicate information about the TFL to the public to better enable them to evaluate management plans and projections and to contribute rational input.
  - solicit information from the public on their opinions, values, concerns and objectives for forest management and account for these in forest management plans to the extent possible, considering that such input is often conflicting.
  - inform the Ministry of Forests of public input received with respect to any of the plans made available for public review.

#### 2.0 MANAGEMENT ISSUES

#### 2.1 Social and Economic Issues

Issues:

- The B.C. forest sector is a large contributor to the overall economic health of the Province. In many smaller communities, including at least ten intimately associated with TFL 39, the forest sector is the dominant employer and contributor to the local economy.
- Historically, a wide range of values has been provided to society by the forest. Over the last few decades demand emphasis for forest resources has shifted. In an attempt to meet these shifts in demand, guidelines for planning forest development and timber harvesting have been developed without research into or explicit understanding of their impacts on harvest levels and the resultant range of economic benefits that society derives from this harvest.
- Ideally, an economic analysis would compare the benefits and cost to society of different forest management options in order to permit the selection of an option that optimized returns to society and protection of its values. Unfortunately, it is difficult to value many of the non-timber values. However, the impacts of different options (various interpretations of guidelines and the like) on timber values and volumes, employment, government revenues, and general economic indicators can be estimated at the local, regional and provincial level.

- MB will compare the social and economic impacts of the various options considered in the Timber Supply Analysis. This will demonstrate to the public and to government decision-makers, the likely impacts on employment, government revenues, and local and regional economies of the harvest schedule changes resulting from the alternative management options.
- MB will use sensitivity analysis to explore the incremental impacts of adjustments to an option where the initial choice seems excessively costly.
- Where consistent with integrated resource management requirements, harvest levels will be constrained in Timber Supply Analyses designed to test proposed management strategies or options to ensure that harvest reductions of more than 10% per decade are avoided unless such reductions are necessitated by timberland reallocation to higher land use. In Bks 5 and 7, the transition to Long Run Sustained Yield is expected to require harvest reductions in excess of 10% per decade.

#### 2.2 Land Base Issues

#### 2.21 Tsitika Watershed - Bk 2

Issue -

The Provincial government has announced an eighteen-month deferral of harvesting in the lower Tsitika pending review by the Commission on Resources and Environment. This was to be accomplished without job loss by "logging around" in the upper Tsitika, a strategy clearly in conflict with the strategy of the Tsitika Watershed Integrated Resources Plan (TWIRP) and which will not be implemented by MB.

Under the Protected Areas Strategy for B.C. a Category 3 moratorium on harvest development has been declared on the lower Tsitika watershed. Decision on land use for this area is scheduled for 1995.

The Provincial government has also approved a five-year moratorium (1992 - 1997) on harvesting in the lower Tsitika pending completion of a sediment budget study in the Tsitika River.

Apart from the Protected Areas Strategy moratorium and subject to a decision on land use for the lower Tsitika the maintenance of the viewscape behind Robson Bight as an aesthetic value associated with whale watching is a concern to some people.

Accessibility of areas in TFL 39 adjacent to the Tsitika watershed but draining directly to Johnstone Strait is a concern if, eventually, access to these areas through the Tsitika watershed is not permitted.

The Tsitika watershed has already been the subject of a harvest moratorium in the mid-1970s and as a result of this previous moratorium the following deletions from the TFL land base took place:

- Schoen Lake park
- ecological reserves
- implementation of the Tsitika Watershed Integrated Resources Plan (TWIRP) which included large amounts of set-asides for deer winter ranges, recreational fishing corridors, etc.

Operations and management of the Tsitika watershed are monitored by the Tsitika Follow-up Committee who approve all operational plans and any changes to the management objectives and strategies in the TWIRP.

Decisions in the mid-1970s were made following a moratorium and major public input which reflected a compromise between wilderness preservation and AAC/employment reduction. An option that should be considered is the return of all or some of this land to the TFL to offset AAC/employment reductions that would ensue from a decision to remove the lower Tsitika from the TFL.

#### Commitment:

•

- The Timber Supply Analysis will include an assessment of the impact on timber supplies and harvest schedules for the following options:
  - a) exclude the lower Tsitika with and without the adjacent areas draining to Johnstone Strait
  - b) exclude the viewscape area above Robson Bight inclusive of the adjacent areas.
  - c) assume re-inclusion in the T.F.L. of ex-T.F.L. areas in Schoen Lake Park, ecological reserves in the upper Tsitika as well as recreational fishing corridors reserved under TWIRP on the basis that, in the event that a decision is made to preserve the lower Tsitika, equivalent values in these areas will now be available in the lower Tsitika.
  - Forest management changes required by evolution of government forest policy, standards will be reviewed and implemented through the Tsitika Follow-up Committee. This will include all resource inventory data in the Tsitika watershed to ensure that they are consistent with the balance of the TFL.

#### 2.22 Koeye Watershed - Bk 7

Issue:

Under the Protected Areas Strategy for B.C., a Category 3 moratorium on harvest development has been declared on the Koeye Watershed. A decision on land use for this area is scheduled for 1995.

- The Timber Supply Analysis will include an assessment of the impact on timber supplies and harvest schedules under two options;
  - a) exclusion of the Koeye watershed
  - b) inclusion of the Koeye watershed managed in accordance with the normally-applicable principles of integrated resource management

#### 2.23 Yakoun Lake Basin - Bk 6

#### Issue:

Development of the Yakoun Lake Basin can only proceed in accordance with a Local Resource Use Plan (LRUP). Preparation of this plan, as well as that for the Yakoun River Corridor, was deferred while emphasis was placed on completion of Gray Bay-Cumshewa Head Integrated Resource Management Plan and on completion of a hydrological assessment of the Yakoun River. The G.B.-C.H. Plan took several years to complete and involved a large amount of staff time on the part of forestry and engineering staff at Queen Charlotte Division. Completion of all these plans at the same time was deemed to be impracticable.

Some advocate outright preservation of the area while others are concerned that preservation is not warranted due to the consequent reduction of AAC and associated adverse effects on employment and the economic base for local communities.

- The Licencee will commence preparation of an LRUP for the Yakoun Lake Basin in 1993 with completion scheduled for 1995. The Terms of Reference for the LRUP and the LRUP itself will be developed in consultation and cooperation with the public.
- The Timber Supply Analysis will include an assessment of the impact on timber supplies and harvest schedules under two options:
  - a) exclusion of the entire Yakoun Lake Basin.
  - b) inclusion of the entire Yakoun Lake Basin managed in accordance with the normally-applicable principles of integrated resource management.

#### 2.24 Yakoun River Corridor - Bk 6

#### Issue:

Development and harvesting of the remaining timber in a corridor adjacent to both sides of the Yakoun River can only proceed in accordance with a LRUP. Preparation of this plan, as well as that for the Yakoun Lake Basin, was deferred while emphasis was placed on completion of Gray Bay-Cumshewa Head Integrated Resource Management Plan and on completion of a hydrological assessment of the Yakoun River. The G.B.-C.H. Plan took several years to complete and involved a large amount of staff time on the part of forestry and engineering staff at Queen Charlotte Division. Completion of all these plans at the same time was deemed to be impracticable.

Initially, the primary concern was the impact that logging adjacent to the river may have on the aesthetic environment and vistas available to recreational fishing and canoeing on the river. The LRUP will also account for other integrated resource management concerns to be identified by government agencies and the public.

#### Commitment:

• MB will commence preparation of an LRUP for the Yakoun River Corridor in 1993 with completion scheduled for 1995. The Terms of Reference for the LRUP and the LRUP itself will be developed in consultation and cooperation with the public. The LRUP will be prepared concurrently but separately from that for the Yakoun Lake Basin.

The Timber Supply Analysis will include an assessment of the impact on timber supplies and harvest schedules where a 100 m corridor on each side of the Yakoun River is reserved from timber harvest. The actual strategy for the Yakoun River corridor will be developed as part of the LRUP process.

#### 2.25 Gray Bay - Cumshewa Head - Bk 6

#### Issue:

An integrated resource development plan (IRDP) was prepared, based on extensive public input, for the Gray Bay - Cumshewa Head area of Moresby Island in Bk 6. It took several years to complete and involved a large amount of time on the part of forestry and engineering staff at Queen Charlotte Division. This Plan accounted for recreational and landscape management concerns as well as specific aboriginal concerns on the shoreline from Indian Reserve No. 7 east to Cumshewa Head. In spite of this significant planning effort and the approval of the Plan by the Ministry of Forests, implementation of the Plan is still held up.

#### **Commitment**

• Management of the Gray Bay - Cumshewa Head area will be in accordance with the approved IRDP.

#### 2.26 Land Base Reductions for Integrated Resource Management

#### Issue:

In carrying out Integrated Resource Management (IRM) of the TFL, certain lands will be deemed to be excluded from the harvestable land base due to priority values that are incompatible with harvesting. These include certain areas such as environmentally-sensitive areas (ESA):

- terrain stability
- fish habitat protection
- wildlife habitat
- priority recreation uses
- archaeological sites
- etc.

These areas often overlap and/or are allowed for as factors of specific areas so that it is difficult to state precisely how much of the productive forest land base in the TFL has been excluded from the operable land base for a specific reason. The magnitude of the impact of these set-asides on potential sustained harvest levels is also a concern.

- The Timber Supply Analysis will clearly elucidate the following information:
  - a) area of productive forest land in each category of IRM set-aside (ESA, etc.) deemed not harvestable and thus excluded from contributing to future timber harvests and, hence, the AAC.
  - b) net area of productive forest land deemed not harvestable after accounting for overlap of individual categories.
  - c) net area of operable land base available for future timber production and thus contributing to the AAC.
  - The Timber Supply Analysis will also include an analysis of the option of harvesting all of the IRM set-asides in item a) above. The purpose of this option is to quantify the impact on potential harvest levels due to exclusion of these areas from harvest.

#### 2.3 Integrated Resource Management Issues

#### 2.31 *Recreation & Landscape*

#### 2.31.1 **Recreation/Landscape Inventories**

Issue:

All areas of the TFL are covered by recreation inventories taken as early as 1986. Inventory requirements have changed and these early inventories are inconsistent in their interpretation of recreational importance in terms of recreation significance categories and recreation management classes. In particular, visual (v) features and ratings related to these features are inconsistently treated. Moreover, the inventories need updating to account for potential additions to the inventory.

The TFL is only partially covered by landscape inventories. Pending completion of more formal landscape inventories in corridors of high exposure to public viewing, interim visual quality objectives (VQOs) are being prepared.

- The Licensee will update all recreational inventories on a schedule that will permit Management Plan No. 8 to be based on updated inventories. Thereafter, inventories will be updated at five-year intervals.
- Landscape inventories will be conducted in areas where these inventories are required as agreed by District Managers of the Ministry of Forests. Completion of Landscape inventories will be coordinated with completion of the recreation inventory updates.
- Existing recreation inventories will provide a valuable guide in determining ESAs for recreation and/or visual quality objectives, depending on which is the most appropriate treatment for given areas. The Licencee will identify areas to be considered recreational ESAs and areas for which VQO constraints will apply. After review and approval of MoF staff at the District and Regional level, these data will be accounted for in the Timber Supply Analysis.
- Cave/Karst features of significance in Bks 2 and 4 will be identified in recreation ESAs and will be accounted for in the Timber Supply Analysis.

#### 2.31.2 Recreation Analysis

Issue:

Per the letter of 93.01.11 from K.J. Ingram, Manager, Vancouver Region of the Ministry of Forests, a Recreation Analysis Report is to be completed as part of the requirements for approval of the TFL Management Plan. This analysis includes a description of recreation values, recreation issues, an assessment of recreation demand, and an analysis of options with recommendations.

#### Commitment:

 The Licencee commits to completion of the Analysis for the total area of the TFL on the following schedule: Bks 1,2,4,6 1993 Bks 3,5,7 1994

#### 2.31.3 **Cave/Karst Features**

Issue:

Cave/Karst features occur in Bks 2 and 4. Several of these are of major significance. Management concerns centre around prevention of damage to cave entrances, addition of debris to caves, contamination of water, damage to cave structures from road-building activity and control of public access.

Caving interest groups have acknowledged that MB operating staff at Menzies Bay and Port McNeill Divisions (where cave/karst features are known to exist) have a good track record in recent years with respect to protection of these values.

- The Licencee will report all newly-discovered cave entrances to the Recreation Office of the Forest District and adjust operations to ensure the feature is protected. Significant cave features, as defined by the Ministry of Forests, will be protected by a surround of undisturbed timber; less significant features will be protected by a fall away/yard away strategy.
- The Cave Management Guidelines will be followed with respect to surficial management of these features. The Licencee will cooperate with the Ministry of Forests and authorized caving organizations in the management of underground cave features and in public access to these features.
- Appropriate caving interest groups will be given an opportunity to review Five Year Development Plans which cover areas where Cave/Karst features are known to exist; i.e.. Menzies Bay Division in Bk 2 and Port McNeill Division in Bk 4.
- Surface inventories of cave/karst features within areas proposed for logging in Five-Year Development Plans will be carried out and submitted with the Five-Year Plans.

#### 2.32 Wildlife

Issue:

Preservation of critical wildlife habitat is a fundamental concern of Integrated Resource Management. Of special concern are critical habitats for deer and elk in Bks 2 and 4 (northern Vancouver Island), grizzly bear in Bks 5 & 7 (Phillips River and mid coast), and mountain goats in Bk 5.

Habitats for Marbled Murrelet and cavity-nesting birds are also wildlife concerns.

#### Commitment:

- The Licencee will identify, in cooperation with staff of the Ministry of Environment & Lands, critical wildlife habitats for deer, elk, grizzly bear and mountain goats. These will be deemed ESAs for wildlife and deducted from the landbase using an appropriate netdown factor.
- The Licencee will preserve snags and green trees in appropriate locations to maintain future cavity nesting sites where safety considerations permit this and where these are not already provided for in nearby stands not loggable for other reasons.
- The Licencee will comply with the applicable guidelines covering Wildlife Trees and Marbled Murrelet habitat.

#### Issue:

The Ministry of Environment plans to transplant elk from Vancouver Island to Bk 1 south of Powell River. No special areas need be set aside as habitat for these animals at Bk 1 as existing second growth age classes are deemed suitable. Undoubtedly, localized regeneration problems will occur from browsing by these herd animals.

#### Commitment:

The Licencee will cooperate with the Ministry of Environment in their efforts to re-establish an elk population in Bk 1.

#### 2.33 Biodiversity

#### Issue:

The maintenance of biodiversity is commonly cited as a general concern for consideration in forest management strategies. Indeed, this concern is a compelling reason behind recent government initiatives such as the Old Growth Strategy and the Parks/Wilderness projects which have culminated in the Protected Areas Strategy (PAS) and the present government's goal of 12% of the land base in protected areas. Eventually, resolution of the PAS will go a long way towards resolving much of the concerns for biodiversity at the Provincial and Regional level.

At the level of TFL 39, concern for biodiversity is focused on maintenance of ecosystems within each watershed or landscape unit such that all life forms that form a part of these ecosystems are assured of continuance. Various forest management provisions have been advocated by some people for this purpose at the stand and landscape level. These range from retention of snags and green trees at the stand level to establishment of old growth reserves, corridors of old growth or second growth made to mimic old growth through cultural treatments to link old growth reserves and to maintain specified proportions of seral stages in each watershed.

Biodiversity guidelines for coastal forests are in the process of being drafted. Changes to current drafts are likely following expert peer review and analysis of impacts on socioeconomic benefits.

- Biodiversity Guidelines, when approved following confirmation of their scientific validity and appropriateness by expert peer review and with the full knowledge of their anticipated socioeconomic impacts, will be implemented in an orderly manner over the period of MP 7.
- Following completion of all ESA mapping in 1993, and subject to approval and implementation of the biodiversity guidelines now under consideration, the Licencee will commence planning of forest ecosystem networks (FENS) in 1994 for review with MoF and MoEL staff.
- The Timber Supply Analysis for MP 7 will include, at the request of the Chief Forester, an option which assumes that, as a result of biodiversity guidelines, a further 4% reduction in the net operable mature land is required.
- The Timber Supply Analysis for MWP No. 7 will not include analysis of provisions for Biodiversity Guidelines since these are not yet completed nor approved. However, MWP No. 8 will include modeling of biodiversity provisions.
- Since the Biodiversity Guidelines are not yet approved (and may be changed) and since ESA mapping will not be complete until the end of 1993 and FENS cannot be designed until 1994 or later, it will not be possible to incorporate Biodiversity Guidelines in the 20-Year Plan to be prepared in 1993.

#### 2.34 Old Growth

#### Issue:

Preservation of inherent values in old growth timber in the TFL is a concern to some people. On the other hand, others are concerned that old growth preservation may result in unduly limiting the economic and employment opportunities that arise from the TFL.

Under the Protected Area Strategy, certain areas of old growth are being considered for permanent preservation.

Throughout the TFL certain other areas have been identified that will not be harvested:

- inoperable and unmerchantable areas
- ESAs (excluded from operable land base in accordance with "net down" factors used in the Timber Supply Analysis).
- archaeological sites

In addition, a number of other areas have been identified as not to be logged, solely for their old growth values. These include:

- Indian cultural cedar supply areas
- small areas of exceptional old growth timber (diameter, height, age, etc.)

#### Commitment:

Procedures for protecting old growth values will be incorporated in forest management strategies for the Licence when these are finalized and approved through the Old Growth Strategy initiatives of the Provincial government.

Areas of old growth timber will be preserved as needed to protect unique features or where the old growth itself is unique because of size, age, etc. These will normally be mapped as ESAs, most commonly as recreation.

Biodiversity Guidelines, presently under review, deal with maintenance of forest cover by age class within landscape units. The old growth age classes will be managed in accordance to the Biodiversity Guidelines if and when these are finally approved.

#### 2.4 Harvest Practise Issues

#### 2.41 *Clear Cut Harvesting*

#### Issue:

While some people claim that clear cut harvesting is environmentally harmful by any criteria, most scientists, including foresters and ecologists, acknowledge that the clear cut silvicultural system, when properly done with due regard to site-specific conditions, is the most suitable silvicultural system for harvesting the coastal timber of the TFL. The method is agreed to be suitable from the point of view of ecology, production, safety, water management (road density, etc.) and growth potential for future timber crops. Yet it is acknowledged that there are special instances where a modified form of the clear cut system (shelterwood) or the selection silvicultural system (single tree or group selection) may be more suitable to achieve specific goals. These other methods could be used, if practical, to permit harvesting in areas where clear cutting is aesthetically unacceptable or where a residual protection forest is required.

MB has carried out a number of operational trials of selection harvesting in both second growth and old growth and is gaining experience in how and where this method can be carried out. Of particular interest is the Montane Alternate Silviculture System (MASS) project started in 1992 on private MB forest land south of Campbell River. It is a cooperative project carried out by government (Federal and B.C.) and MB (Menzies Bay and Woodlands Services Divisions). The project is intended to explore the silvicultural and ecological results in old growth montane forests from a variety of silvicultural systems and variants ranging from clear cutting to selection cutting.

This experience will be invaluable in adapting to harvest options where clear cutting is not an acceptable option.

- Clear cutting will be the normal silvicultural system for harvesting but the Licencee will be alert to adopting other methods of harvesting in those instances where clear cutting is not acceptable and where alternative silvicultural systems are feasible and economic.
- Size of clear-cut openings and the scheduling of harvest adjacent to clear-cut openings will be managed in accordance to the Coast Harvest Planning Guidelines of the Vancouver Forest Region. These call for an average opening size of forty hectares but a larger average opening size is acceptable where other resource values are not compromised and where positive benefits would accrue from an increased opening size (e.g. windthrow management). These guidelines also call for deferral of clear cutting on adjacent openings until "free-to-grow" has occurred. Free-to-grow is defined as conifer regeneration having reached a stage where it is at least 50% higher than competing vegetation and there is no probability that it can be overtopped by competing vegetation. Other factors than free-to-grow may also apply in determining when adjacent openings may be harvested. These include wildlife cover and/or forage strategies, hydrological constraints on rate of harvest in community watersheds and visually-effective green-up.

#### 2.42 **Operability**

#### Issue:

The land base on which the AAC and harvest schedule approved for the Licence is based must exclude all lands which are not physically possible to log or which are not likely to ever be logged for economic reasons. In addition, a Ministry of Forests policy calls for exclusion of timber not economically harvestable under the best economic conditions of a recent economic cycle. This contrasts to the Licencee's position that all timber that is likely to be operable within a rotation should be included in the land base on which the harvest schedule is based.

Because of access difficulty or environmental sensitivity, certain areas can only be logged by methods which do not necessitate road construction or which lift logs clear of sensitive areas. Unconventional logging systems that serve this purpose include helicopter, balloon and long-line cable systems. All three systems have been used increasingly in TFL 39 within the period of Management Plan 6.

Economic viability of these methods depends on roads being available at the closest feasible location. Therefore, implementation of these methods will logically be delayed in some locations until the road system needed for adjacent conventional logging is in place.

An operability survey was carried out on Bks 1 to 5, and 7 in 1992 to identify physically inoperable areas. The remaining operable area was further classified as operable by conventional or nonconventional methods. An equivalent survey was previously completed for Bk 6 for use in Management Plan No. 6.

- The Timber Supply Analysis will be based on the operable land base only and the timber supply schedule will be summarized according to its source; i.e. areas classed as harvestable by conventional or unconventional methods.
- Inventory attributes (species and vol/ha) will be used to simulate three classes of current economic operability: uneconomic, marginally economic and economic. These will vary by the two classes of logging method (conventional and unconventional).

- The Timber Supply Analysis will include analysis of the following operability options:
  - conventional logging methods in economic timber only,
  - all logging methods on both economic and marginally economic timber,
  - all operable timber including currently uneconomic.

The latter option will serve to quantify the cost of adopting the MoF view of operability, should future market conditions permit the current uneconomic forest profile to be economically harvested.

- The economic operability criteria and mapping showing economic timber classes and areas of conventional and nonconventional logging will be reviewed and approved prior to inclusion in the Timber Supply Analysis.
- The Timber Supply Analysis will include analysis of an option where timber deemed to have a negative conversion return is excluded from the operable land base. This option will be compared to the previous option where all operable forest land regardless of conversion return is included.

It must be stressed, however, that this procedure is designed solely to develop one estimate of uneconomic timber in the TFL for Timber Supply Analysis purposes. The economic classification for a given stand will depend on actual, not average, costs and prices and these will vary with slope and roughness of terrain, haul distance and other factors.

#### 2.43 Harvest Profile

•

The Ministry of Forests have expressed concern that the entire profile of forest types in the net operable inventory should be harvested. That is, the most difficult, costly and least valuable timber types should not be deferred in favour of more attractive stands. On the other hand, there is a long history of increasing economic attractiveness of timber stands with the passage of time as timber values increase and logging methods become more effective and efficient.

It is not feasible to reconstitute the forest inventory in areas already logged in order to evaluate the extent to which recent logging history has matched the profile of the available forest inventory.

#### Commitment:

• Prior to preparation of MP No. 8, the Licencee will prepare a five-year (1992-1996) analysis of timber inventory harvested cf. timber inventory available to quantify the extent to which the timber profile is reflected in the areas actually logged. Parameters will be volume by species, area by SI class and harvest class (conventional or unconventional).

It is anticipated that normal integrated forest management constraints and various operating guidelines will play a greater role in dictating where harvest may occur than harvest profile considerations.

#### 2.5 Forest Planning Issues

#### 2.51 Forest Inventory

Issue:

The mature timber inventory of the TFL was based on samples and forest typing established in 1961 - 1964. The accuracy of the forest inventory has been monitored by comparing the inventory volumes compiled for logged areas over the years with actual timber production as measured by log scale for hammer marks originating in the TFL plus residue as measured annually since the inventory was re-compiled to Close Utilization standards in 1967.

Results of the comparisons show that in the period 1967 to 1990 the aggregate scaled log production and sampled residue applicable to AAC was within two percent of inventory depletion, a totally acceptable result.

However, the concern is during this period the trend has gone from inventory being less than production to greater than production.Part of the problem may be technical monitoring of production and the inherent sampling variances in forest inventory and residue estimating. It is also likely that due to broad stratification of forest types in the inventory and, due to logging logistics, the better portions of each strata are logged before the worst, resulting in the present inventory overstating the actual inventory.

However, because the trend has been from underestimating to overestimating actual aggregate production plus residue, the concern is that the present forest inventory may actually be an over-estimate of remaining production. It should be noted an inventory over-estimate of this nature does not enter into the calculation of LRSY and is self-correcting over time as Timber Supply Analyses (AAC determinations) are recalculated at successive 5-year periods using forest inventories which have been depleted for previous harvesting.

Actions taken to date:

The inventory was re-compiled to the end of 1988 to exclude inventory samples within logged areas. In addition, 95000 ha of operational curise inventories were added to the inventory to strenghten the inventory for these areas.

The net effect of these two actions was to reduce the inventory by 2.5%.

#### Commitments:

• In the Timber Supply Analysis, inventory volumes will be arbitrarily reduced by a further 5%.

Accuracy of the inventory will be reviewed further in 1993 and, in consultation with appropriate staff in the Ministry of Forests, decisions will be made on steps needed to further improve its accuracy. These will be completed in time for use in Management Plan No. 8.

#### 2.52 Environmentally Sensitive Area (E.S.A.) Mapping

#### Issue:

E.S.A. mapping has been carried out on parts of the TFL but is not complete. In the previous Management Plan, net downs for E.S.A.s for soils and fisheries were based on extrapolation from areas which have been mapped. For Management Plan No. 7, the concern is that the AAC determination should be based on complete mapping of E.S.A.s over the entire TFL and not on unverifiable extrapolations.

#### Commitment:

- In 1992, the Licencee started completion of mapping of all E.S.A. areas in the TFL. The project will be completed in 1993 in time for use in evaluating and determining the AAC to approve for the Management Plan period.
- For É.S.A.s in the fisheries class 2 (Ef<sub>2</sub>) an extrapolation process will be applied in the Timber Supply Analysis. That is, the occurrence of Ef<sub>2</sub> areas will be extrapolated to fisheries sensitive streams on the basis of their occurrence on a sample of fish streams where Ef<sub>2</sub> areas have been mapped. Procedures will be subject to approval of the Forest Service in consultation with other appropriate Federal and Provincial agencies.
- For E.S.A.s in the soils category (Es), an interim extrapolation procedure will be used in the Timber Supply Analysis to enable this study to be completed while the soils mapping is being completed. However, prior to approval of the AAC, the Forest Service will be provided with a completed inventory of soils mapping as well as an assessment of the accuracy of the interim extrapolation. The AAC, prior to final approval can be adjusted, as necessary, to reflect any significant inaccuracy. Procedures will be subject to approval of the Forest Service.

For all other E.S.A. categories, the Timber Supply Analysis will be based on complete E.S.A. mapping.

#### 2.6 Reforestation & Silvicultural Issues

#### 2.61 Reforestation

Issue:

Reforestation is an obligation of the Licencee under the Forest Act and the Licence Agreement. Reforestation standards and stand tending treatments will affect the growth rates and eventual yields of second growth stands.

#### Commitment:

The Licencee will reforest all harvested areas to standards which meet or exceed the Ministry of Forests Basic Stocking Standards. These will be specified in the Management Plan.

The Timber Supply Analysis will include assessment of increased growth rates/yields that are achievable from improvement in stocking uniformity and densities as well as intensive silvicultural treatments.

#### 2.62 Use of Herbicides

Issue:

On a small proportion of highly-productive sites, the suppressive effects of brush or weed tree species are important factors in the effectiveness and costs of reforestation.

Application of herbicides has proven to be a cost-effective method of brush control. However, in spite of stringent regulations regarding personal and environmental safety, herbicide use often generates public concern.

#### Commitment:

The Licencee will only apply herbicides on the TFL where essential to meet reforestation obligations and only where non-herbicide methods would not achieve the required results, even at higher cost.

The Licencee will consider reduced stocking standards on affected areas, subject to always achieving minimum stocking, as an alternative to herbicide use. This option will be considered in relation to actual expressed concerns in local areas.

#### 2.7 Forest Health Issues

#### Issue:

At present, there are no forest health issues that are of major consequence. However, there are a number of aspects of forest health that must be accounted for in the management of the TFL to ensure that forest health is maintained or that forest health problems are discovered and acted upon. These include but are not limited to:

- prevention and control of fire
- outbreaks of defoliating insects/detection, salvage
- outbreaks of bark beetles/detection, salvage
- cone insects/seed collection
- balsam woolly aphid/management of areas planted Abies in susceptible zones and control of Abies seedling movement to aphid-free zones.
- white pine blister rust/measures taken to preserve resistant strains or prevent infection during spacing operations.
- root rots in second growth/stumping and other measures to prevent infection in new stands.
- ambrosia beetles/measures to reduce susceptibility of log inventories to damage, and reduce beetle populations in areas where susceptible logs are concentrated (e.g. dryland sorts).
- Sitka Spruce weevil/planting restrictions and measures taken to control populations or prevent damage.

#### Commitment:

Management Plan No. 7 will include details of operational activities and procedures the Licencee will undertake to:

- ensure the continued health of the second growth component of the forest,
- identify locations, severity and extent of losses due to forest health problems,
- limit losses from forest health problems and/or to salvage losses that occur,
- prevent and control forest fires.

#### 3.0 MANAGEMENT OPPORTUNITIES

#### 3.1 Conversion of Alder Stands

The Licence contains significant areas of alder which predate its granting. The alder is particularly significant in Bk 1 (7000+ ha) and Bk 2 (2000+ ha). A significant proportion of these areas are convertible to conifer and, during the last few years, alder conversion has been accomplished at both our Kelsey Bay and Stillwater Divisions.

#### Commitment:

The Licencee will continue to carry out a programme of alder conversion in accordance with the following criteria:

- alder log prices permit logging at break-even or better.
- conversion to conifer is ecologically and environmentally sound.
- site preparation, reforestation and brush control is economically and environmentally feasible.

The Timber Supply Analysis will include analysis of options for alder conversion over the next twenty years that reflect:

- a) current historical experiences,
- b) accelerated rate of deciduous conversion based on estimated potential convertible area.

#### 3.2 Spacing of Juvenile Stands

Benefits from spacing can accrue from the following:

- earlier occurrence of merchantable diameters, which is significant in relation to strategies for commercial thinning.
- increased diameters at final harvest age.
- minor increases in maximum mean annual increment (m.a.i.).

These benefits will result in higher future timber values and be reflected in higher future stumpage rates. Thus, the benefits will accrue to the Crown as owner.

#### Commitment:

The Licencee will continue to implement incremental spacing programmes on Crown land where the direct costs are funded by the government.

The Timber Supply Analysis will include analysis of options for spacing that reflect:

- a) continuance of spacing at historical levels,
- b) increased spacing treatment to reflect a more intensive level of incremental silviculture.

Candidate stands for such programmes will be limited to those which show a positive economic benefit following analysis of anticipated growth benefits, costs and product values.

#### 3.3 **Fertilization**

The purpose of forest fertilization is to increase future wood supply and value by:

- aerial application of nitrogen to older second growth to improve volume and value prior to harvest.
- aerial application of nitrogen and phosphorous to correct nutritional deficiencies in stands exhibiting signs of nutrient deficiencies.
- aerial application of nitrogen and phosphorous to enhance commercial thinning opportunities potentially feasible ten to fifteen years after fertilization.
- application of nitrogen to individual seedlings at the time of planting in heavy salal areas in order to accelerate crown closure and, thus, reduce growth-inhibiting salal competition.

A number of operational fertilization trials and projects have been carried out on the Licence since early 1968 when an aerial application of urea was completed on about twenty-eight hectares at Kelsey Bay.

#### Commitment:

- The Licencee will cooperate fully in implementing aerial fertilization programmes on Crown land in the TFL where the direct costs are government-funded.
- The Licencee will include fertilizer application to planted cedar seedlings on salal sites where this treatment will likely show significant growth gains through reduction of competitive impacts from salal.

#### 3.4 **Pruning**

Pruning has the potential to:

- increase first-log value
- extend the time for ungulate forage production effectiveness by retarding crown closure

Increased values will be reflected in stumpage costs at the time of harvest.

#### Commitment

The Licencee will cooperate fully in implementing pruning for either of above purposes where the direct costs are government-funded.

#### 3.5 Enhanced Stocking Densities

Merchantable growth rates (and harvest yields) of second-growth stands are increased when reforestation is:

- rapidly achieved and height and diameter variances are small due to a narrow age range
- uniformly distributed to maximize site utilization
- complete to eliminate gaps in stocking.

Merchantable growth rates also increase with increasing initial stocking densities up to certain limits beyond which over-density tends to decrease merchantable yields. MB's target stocking standards are in the following range:

	<u>SI 15-21</u>	<u>SI 24+</u>
D-fir, pine, cypress	800 sph	1000 sph
hemlock, fir, spruce, red cedar	1000 sph	1200 sph

By contrast, Forest Service stocking standards for the Vancouver Forest Region call for a target on most sites of 900 sph, regardless of species and Site Index. These initial stocking densities in combination with uniform distribution provide high growth rates and also permit further yield gains from commercial thinning operations should these be economically feasible at the appropriate stage in future stand development. The yield gains are derived from the utilization of trees otherwise lost to mortality. Low stocking densities not only reduce merchantable yields but also eliminate potential opportunities to increase total yields through commercial thinning operations.

- The Licencee will reforest harvested lands as rapidly, completely and to the highest stocking densities that are practicable and achievable up to the MB Target Stocking Levels. In most cases, this will be to higher stocking levels than the target and minimum stocking levels specified by the MoF.
- The Timber Supply Analysis will include options that enable comparison of harvest schedules sustainable under enhanced stocking densities cf. the Ministry of Forests' reforestation targets.

## TIMBER SUPPLY ANALYSIS

#### 4.1 Analysis Scenarios

4.0

#### 4.11 AAC Rationale for MP No. 6

#### Purpose:

To document changes in timber supply that result from the use of:

- forest inventory statistics updated to Dec. 31, 1990 cf. Dec. 31, 1984 in MWP No. 6 (including Amendment No. 1 covering addition of TFL 7 to TFL 39, Bk 2).
- YXeno growth model cf. MB Natural Stand Yield Tables as used in MWP No. 6.

#### Procedure:

In the AAC Rationale scenario, all of the management and harvesting assumptions used in MWP No. 6 will be applied to the updated forest inventory (Dec. 31/91). Yields will be derived using the YXeno Yield Model at stocking levels equivalent to those assumed in MWP 6.

Quantification of the impacts resulting from changes to the harvest schedule will be measured through calculations of LRSY and harvest levels.

To permit a valid comparison with Management Plan No. 6, the initial AAC in the AAC rationale for MP No. 6 is assumed to be 3 883 000 m<sup>3</sup>, not 3 818 000 m<sup>3</sup> (the Chief Forester's decision in this Plan was to reduce the AAC by 65 000 m<sup>3</sup> from that supported by the AAC rationale in MP No. 6).

#### 4.12 Silvicultural Scenarios

#### 4.12.1 Silviculture Bench Mark Scenario

#### Purpose:

To document the timber supply that will result from a silviculture programme that is based on the basic silviculture required of Licencees under Sec. 129.3 of the Forest Act; i.e. Vancouver Region reforestation standards.

#### Procedure:

Using the land base now included in the TFL and assuming that the recommended Integrated Resource Management assumptions apply to the total landbase in the TFL, a scenario will be analyzed which shows timber supplies resulting from applying "basic" silviculture to Ministry of Forests standards. This scenario will provide a bench mark on which to assess changes in timber supplies due to carrying out a silviculture programme with an incremental component and/or standards which vary from that of the Vancouver Region of the Ministry of Forests.

#### 4.12.2 Incremental Silviculture Scenarios

#### Purpose:

To document changes in timber supply resulting from a programme of enhanced stocking densities and incremental silviculture.

#### Procedure:

The following options will be analyzed and compared to the Silvicultural Bench Mark scenario to determine resultant increases in timber supplies over time:

#### 4.12.21 Status Quo Option

The silvicultural programme is assumed to be equivalent to actual silvicultural performance in the period of MWP 6, considering estimated actual stocking densities at establishment, and actual annual levels of spacing, and conversion of deciduous stands to conifers.

#### 4.12.22 Enhanced Silviculture Option

An enhanced silviculture programme will be assumed that is based on:

- stocking densities higher than MB targets on some areas through increased planting, fill planting and/or site preparation.
- increased area spaced
- increased area of deciduous stands converted to conifers.

The landbase and all other management assumptions will be identical to the Silviculture Bench Mark scenario.

#### 4.13 Land Base Scenarios

#### Purpose:

To document changes in Timber Supplies that result from additions or deletions to the TFL and/or the operable land base due to exercise of options that have the effect of altering the operable land base of the TFL.

#### Procedure:

Each option will be assessed in terms of:

- impact on LRSY
- impact on proposed AAC and future harvest schedule

Each option will be analyzed on the basis of the status quo silvicultural option; i.e. actual silvicultural performance levels.

Options to be analyzed include:

#### 4.13.1 Lower Tsitika Watershed (Bk 2)

- deletion of lower Tsitika
- deletion of lower Tsitika plus adjacent areas draining directly to Johnstone Strait but logically accessible through the lower Tsitika.
- deletion of lower Tsitika plus adjacent areas but with reinclusion of Ecological Reserves and recreational fishing corridors no longer needed because these values are represented in the lower Tsitika plus re-inclusion of part of the present Schoen Lake Park on the basis that the original decision of the 1970's is being re-visited.

#### 4.13.2 **Koeye River (Bk 7)**

- deletion of the Koeye watershed, a candidate for preservation under the Protected Areas Strategy.

#### 4.13.3 Yakoun Lake Basin (Bk 6)

- deletion of the entire Yakoun Lake Basin. This area is currently under a harvesting moratorium pending completion of a LRUP.

#### 4.13.4 Yakoun River Corridor (Bk 6)

deletion of a 100-metre corridor adjacent to each side of the Yakoun River.

#### 4.14 Full Operable Land Base Option

#### Purpose:

To document the total impact on potential timber supplies over time that results from constraining forest management by applying Integrated Resource Management principles.

#### Procedure:

The full operable land base of the TFL will be analyzed to determine resultant available timber supplies over time. No landbase reductions or harvest constraints will be applied to account for ESAs, landscape management or other integrated resource management concerns.

All other assumptions will be identical to the Status Quo option which will be the basis for comparison in determining total impact due to Integrated Resource Management.

#### 4.15 Biodiversity Option

Biodiversity Guidelines, currently in draft form and unapproved, could impact timber supplies if they are required to be implemented. The Chief Forester has said that implementation of Biodiversity Guidelines might result in reduction of the net operable mature timber by 4%.

#### Purpose:

To measure impact, attributable to implementation of Biodiversity Guidelines, on timber supplies, resulting from an across-the-board reduction of net operable mature timber.

#### Procedure:

In this option, after all other reductions to mature timber are made to account for inoperable, uneconomic, reservations for other purposes, and ESA net downs, the remaining mature timber (as classified in the MB Forest Inventory for TFL 39) will be reduced by 4% in both area and volume. The analysis will be based on the status quo silvicultural option; i.e. actual silvicultural performance levels.

#### 4.16 **Operability Option**

Purpose:

To document the contribution to harvest schedules from various economic and logging method (conventional and unconventional) profiles.

To quantify potential increases to timber supplies should future market conditions permit the current uneconomic forest profile to be economically harvested.

#### Procedure:

The Timber Supply Analysis will include the following options:

- include only stands that are economically loggable using conventional methods,

- include stands which are loggable by conventional and nonconventional methods and which are not uneconomic; i.e. excludes only uneconomic and physically inoperable,
- include all physically operable stands.

All other assumptions will be identical to the status quo silvicultural option.

The parameters of economic operability will be subject to review and approval of the Region Manager.

#### 4.2 Analysis Information

The procedures to be used in the Timber Supply Analysis are currently being developed in conjunction with staff of the Ministry of Forests. Similarly, much of the data needed to carry out the analysis is still being acquired for addition to the GIS data base.

The analysis procedures are scheduled to be completed and approved for use by March 31, 1993. These will include:

- procedures for determining the net operable land base; i.e. area reductions to be applied for
  - physical and economic operability
  - future roads
  - ESAs
  - deciduous stands
  - other timber reservations
- timber inventories and adjustments needed to reflect unusable or unrecoverable portions, waste and breakage, etc.
- yield tables for future yield forecasting for each silvicultural option.
- harvest priorities and constraints
  - restrictions due to visual quality objectives
  - stand selection criteria in absence of other applicable constraints.

Data collection, ready for use in the Timber Supply Analysis, will be completed by May 31, 1993. This will include:

- operability inoperable, conventional and unconventional logging assessment.
- operability economic and uneconomic
- ESA mapping
- Visual Quality Objective mapping

#### 5.0 PUBLIC INVOLVEMENT PROCEDURES FOR MP 7

#### 5.1 **Objectives**

- To identify forest management issues relevant to the TFL that may be of public concern over a broad cross-section of public interest.
- To provide an opportunity for the public to provide input in matters that affect planning of operations on the TFL.

Prior to completion of the Timber Supply Analysis a data package containing all of the data and procedures to be used in the Timber Supply Analysis will be submitted for the prior review and approval of the Ministry of Forests.

#### 5.2 **Preliminary Public Notification**

Advertisements were prominently published in local and regional newspapers in two consecutive weeks in August, 1991 to advise the public that MP No. 7 was to be prepared and that public input was invited. Newspapers and communities in which the advertisements appeared were:

- · Queen Charlotte Observer (QCI)
- · Coast Mountain News (Bella Coola)
- Powell River News (Powell River)
- · North Island Gazette (Port Hardy, Port McNeill)
- Courier/Upper Islander (Campbell River)
- Mirror (Campbell River)
- Sun (Vancouver)
- Province (Vancouver)
- · Times Colonist (Victoria)

In addition and at the same time, these advertisements were posted as public notices in various public places (post offices, libraries, etc.) in local communities.

#### 5.3 Three-Stage Public Involvement

A commonly-heard complaint is that public input is sought at the plan review stage instead of prior to plan presentation. To address this concern, a three-stage public involvement programme has been prepared; one which allows for public input prior to plan preparation, at the analysis design stage and, finally, at the plan review stage prior to authoritative approval.

#### 5.31 *Information Sessions*

This stage, completed during 1992, was for the purpose of informing the public about TFL 39; what it was, where it was, the planning process that was applicable, and opportunities for public involvement. Its purpose was also to discuss issues and take public input as well as to answer questions when directly posed.

Two kinds of information sessions were held:

- a) In response to written invitations, meetings with specific interest groups having a stake in the management of the TFL were held.
- b) In response to advertisements and notices, the public were invited to attend open houses where they were afforded the opportunity to view informative wall poster displays, read information brochures and discuss specific topics with MB staff in attendance.

In both cases, questionnaires were provided to participants and these were collated.

Summaries of public feedback were prepared for:

- Bk 2 Campbell River, Sayward and operations at Menzies Bay, Kelsey Bay and Eve River Divisions.
  Bk 6 - Queen Charlotte Islands
- Open House Vancouver
- Open House Victoria

Although open houses and consultation meetings were held at Powell River and Port McNeill, no summaries were prepared since virtually no substantive feedback was obtained in these locations.

Copies of the summaries were mailed to all public participants and are appended hereto.

## 5.32 Review of Statement of Management Objectives Options & Procedures (SMOOP)

The SMOOP document will be prepared in brochure format and mailed to all who participated in Stage 1.

By advertising, public notice, and mail-out to previous participants, the public will be invited to attend an Open House/Forum in local communities, Vancouver and Victoria.

The primary purpose will be to review issues identified to date and discuss how these are proposed to be handled. Further input will be received and collated.

The format is intended to be as follows:

- open house with wall displays, posters, draft SMOOP copies.
- attendance by MB and MoF personnel.
- evening forum with moderator.
- public invited to make presentation on their concerns, issues and recommendations.
- all written presentations accepted, whether or not orally presented.

All input will be documented and provided to the Ministry of Forests and will be considered for possible revision of the SMOOP.

#### 5.33 Review of Draft Management Plan

Following review of the draft Management Plan with the Ministry of Forests and revision as required, the Management Plan will be available for examination by the public at advertised Open Houses in local communities, Vancouver and Victoria.

The MWP and map atlases will be on display for examination, a summary of the Plan will be available in brochure format as a take away, and a questionnaire for feedback will be distributed to all attendees. Notes will be taken of concerns expressed in discussions with individuals and written submissions will be collated.

#### 6.0 SCHEDULE

The following Schedule is proposed to complete the balance of the Management Plan.

· Information Package for use in Timber Supply Analysis

	<ul> <li>Procedures/Assumptions         <ul> <li>completion</li> <li>approval, subject to amendment on approval of SMOOP</li> </ul> </li> </ul>	March 31/93 April 30/93
	<ul> <li>Data Base</li> <li>completion</li> <li>approval, consistent with SMOOP</li> </ul>	May 31/93 June 30/93
•	Stage 2 Public Involvement	
	<ul> <li>Complete Open House/Forums to review SMOOP</li> </ul>	April 30/93
	<ul> <li>Prepare summary of Public Input on Review of SMOOP for submittal to MoF</li> <li>Amend SMOOP per Public Input</li> </ul>	May 31/93 May 31/93
	SMOOP Approval	June 30/93
	Submit 20-Year Plans to District Managers	Sept. 30/93
	Submit Timber Supply Analysis	Sept. 30/93
	Submit Draft Management Plan	Sept. 30/93
	Complete Stage 3 Public Involvement - Open House Reviews of Draft Management Plan	Nov. 30/93
•	Government Agency reviews of draft Management Plan provided to Licencee.	Nov. 30/93
•	Revisions to draft Plan and Report on Public Review of draft plan submitted to MoF	Dec. 15/93
•	Approval of MP by Chief Forester	Dec. 31/93