

# Forest Management Guides



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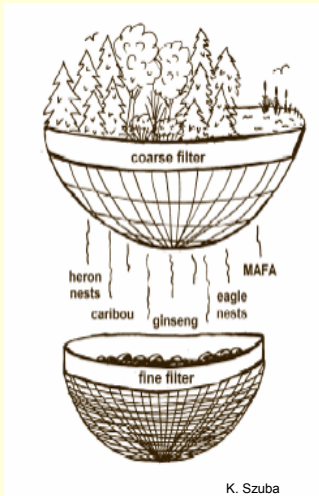
## Objective of Guides

To provide for the sustainability of Crown forests through the maintenance of their long term health

- conservation of biodiversity
- emulation of natural disturbances and landscape patterns
- application of coarse and fine filters

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# Coarse & Fine Filters



K. Szuba

Filter	Landscape	Stand & Site
Coarse Emulate Natural Disturbance	<ul style="list-style-type: none"> <li>• pattern</li> <li>• structure</li> <li>• composition</li> </ul>	<ul style="list-style-type: none"> <li>• pattern</li> <li>• structure</li> <li>• composition</li> </ul>
Fine Habitat	<ul style="list-style-type: none"> <li>• caribou</li> <li>• deer</li> <li>• marten</li> <li>• pileated woodpecker</li> <li>• moose</li> </ul>	<ul style="list-style-type: none"> <li>• aquatics &amp; wetlands</li> <li>• special features</li> <li>• species at risk</li> </ul>

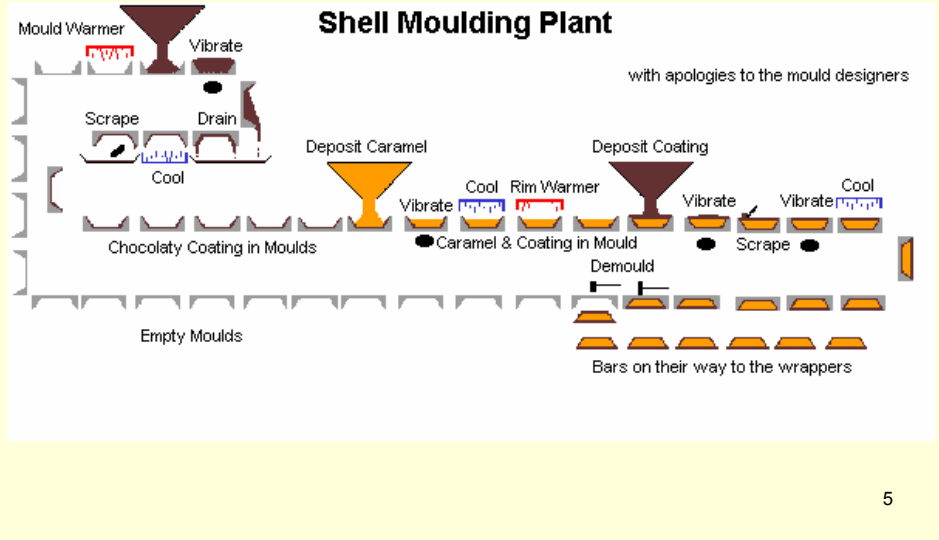
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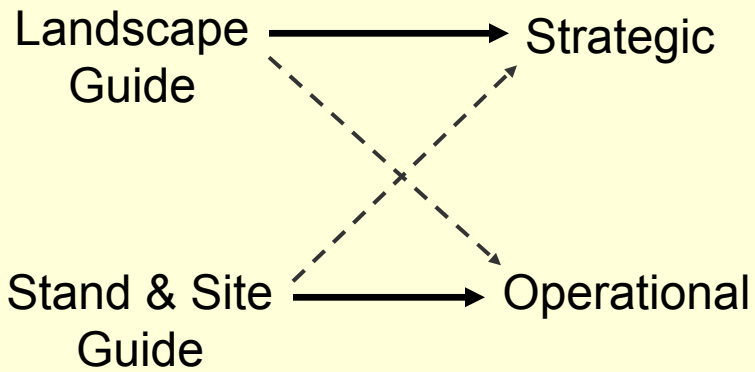
## Primary Principle

**Effective**  
and  
**Efficient**

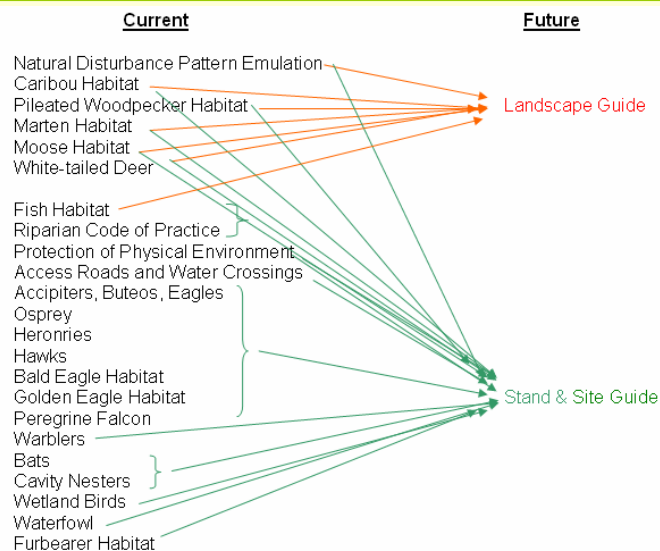
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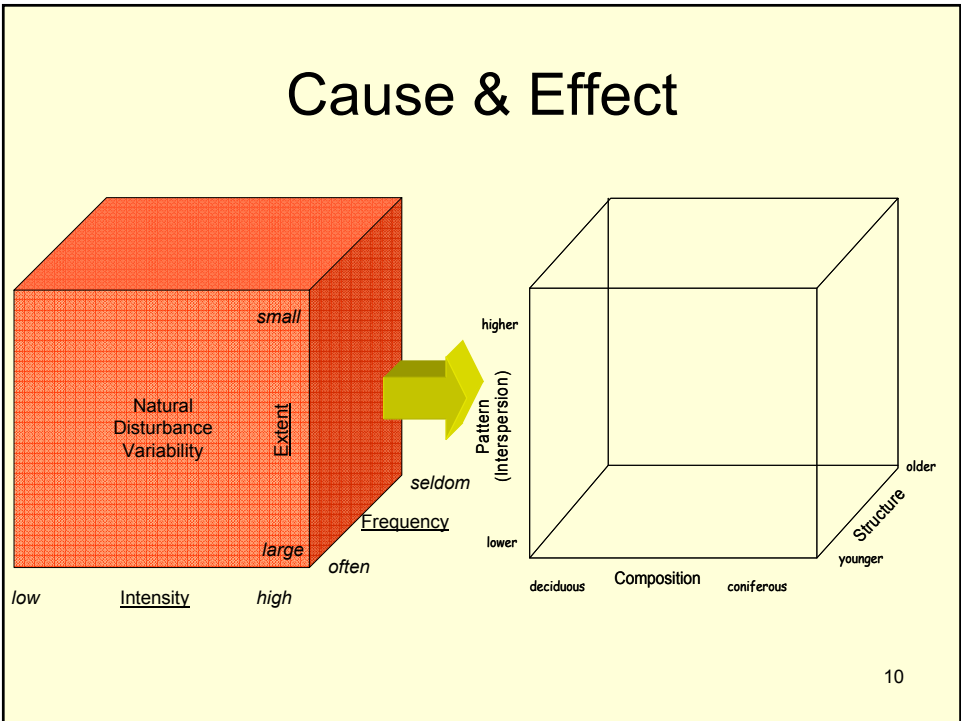
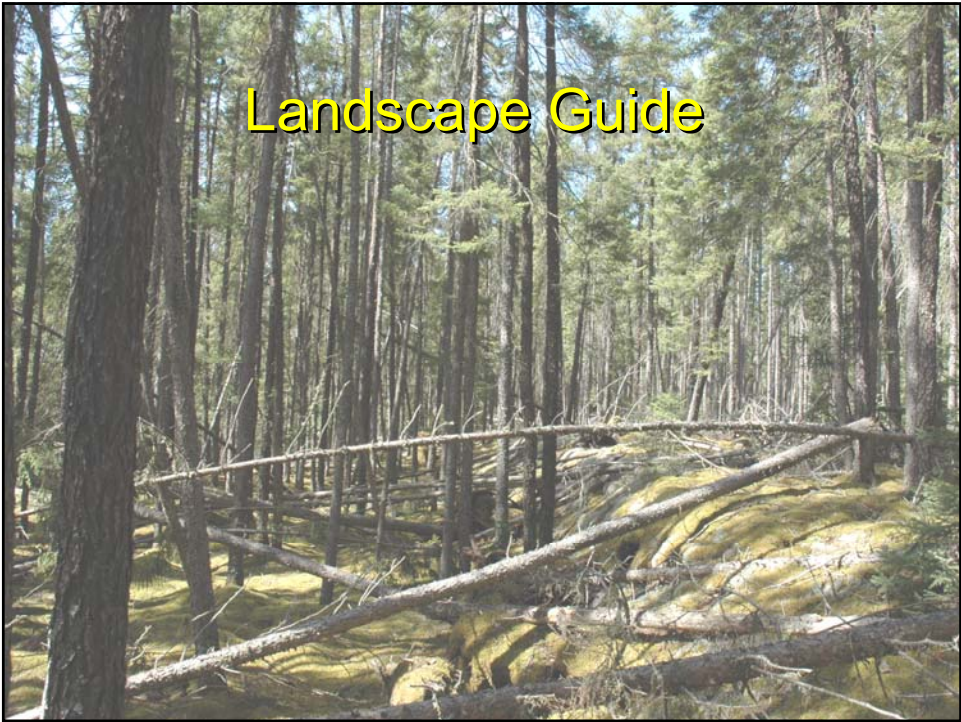
# Science into policy





## Guide Revision





## Emulating Natural Disturbances & Landscape Patterns

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Forest Harvest pattern to maximize edge for moose habitat



Forest Harvest Pattern Emulating fire size & shape

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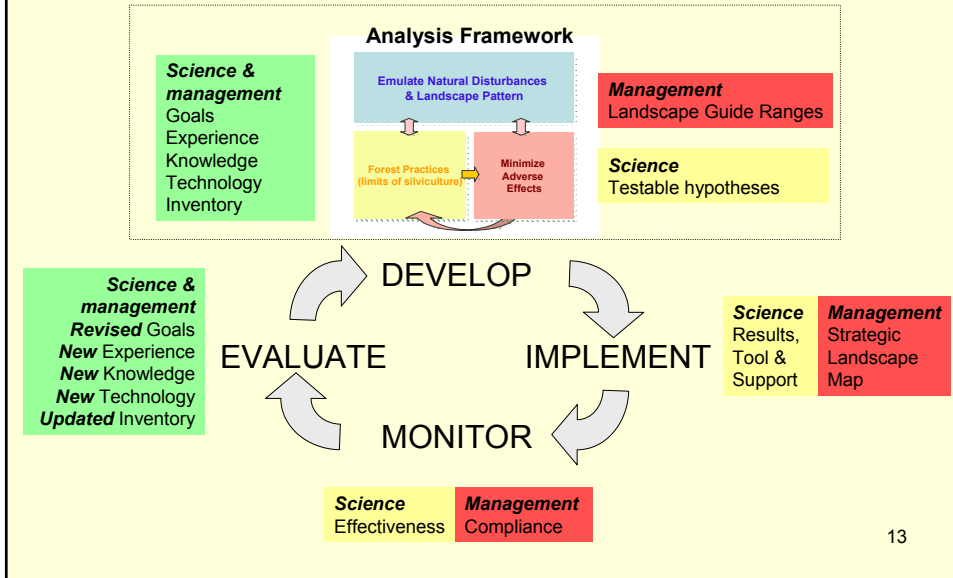
## Science & Stakeholders

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- To improve effectiveness and efficiency:
  - Development team:
    - Wildlands League
    - Ontario Federation of Anglers & Hunters
    - Ontario Forest Industries Association
  - Boreal & GLSL Science Teams
  - Technical review/advice from PFTC
- Strong science products
  - Transparent, peer-reviewed & published
- Thorough investigation of effects
  - Current management guides
  - Impact of landscape guides

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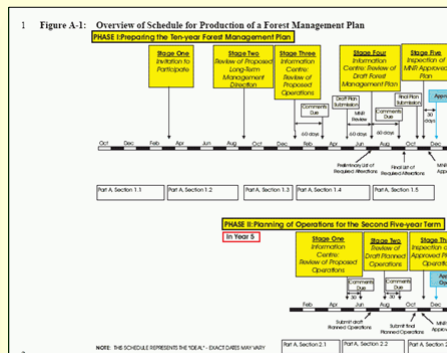
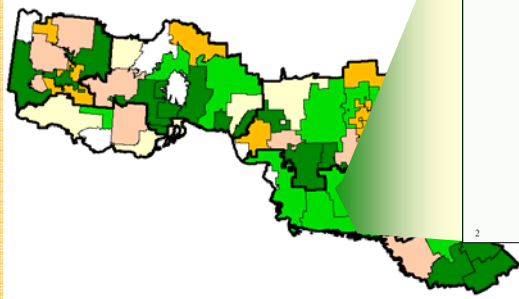
# The Landscape Guide



## New Approach 2 Scales of Direction

Landscape

FMP

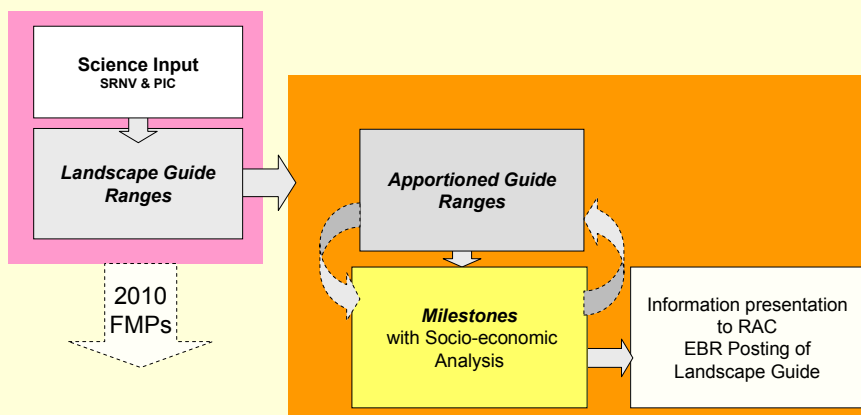


# Landscape Guide New Approach

- Ecosystem Management
  - Manage the entire landscape mosaic
  - Directs biodiversity conservation
- Recognize Ecological Variability
  - Emulate natural disturbance and landscape patterns to conserve biodiversity
    - e.g. caribou habitat, large old forest patches
    - Not land use planning
- Adaptive Management
  - Science, policy & management partnership
  - Simplest set of rules + Effectiveness monitoring

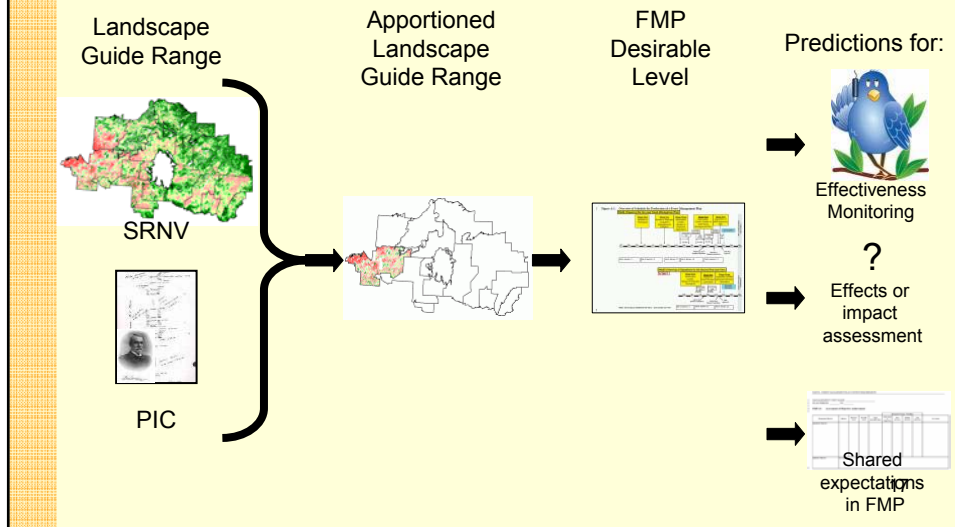
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# Landscape Direction Setting



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## Integration with FMP Process Increased effectiveness & efficiency

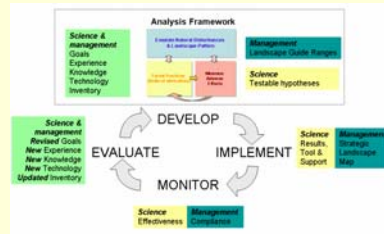


## Guide Organization

- Guide
- Guide Appendices
- Science and Information Packages
- Ontario's Landscape Tool

# Landscape Guide

- Describes:
  - Development
  - Rationale
  - Implementation steps
  - FMP Application
    - Documentation requirements
  - Effectiveness monitoring approach

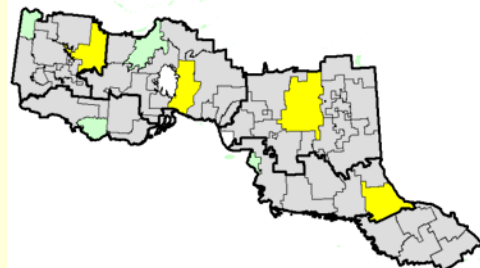


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# Landscape Guide Appendices

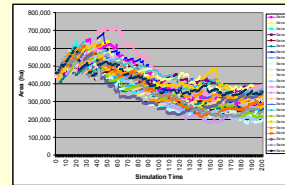
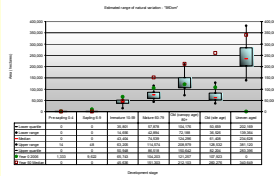
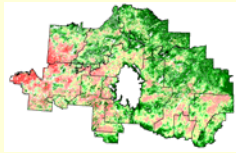
- Landscape Direction by Landscape Guide Region
  - Landscape guide ranges
  - Apportioned landscape guide ranges
  - Milestones
    - Impact assessments

} Methods documented

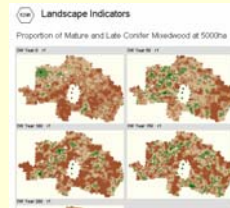
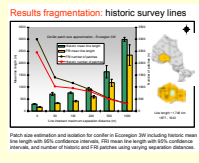


# Science & Information Packages

- Contains all inputs, assumptions, data sources and rationale used to develop SRNV

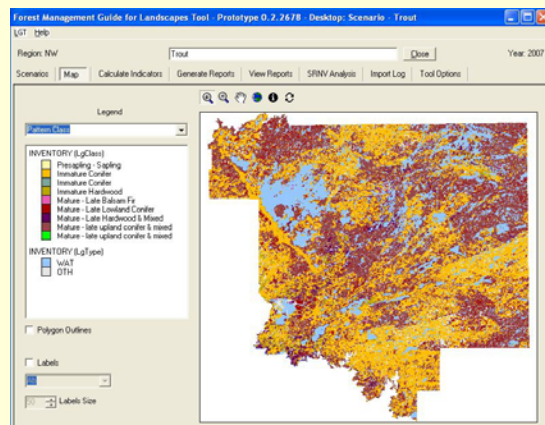
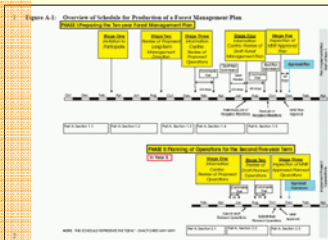


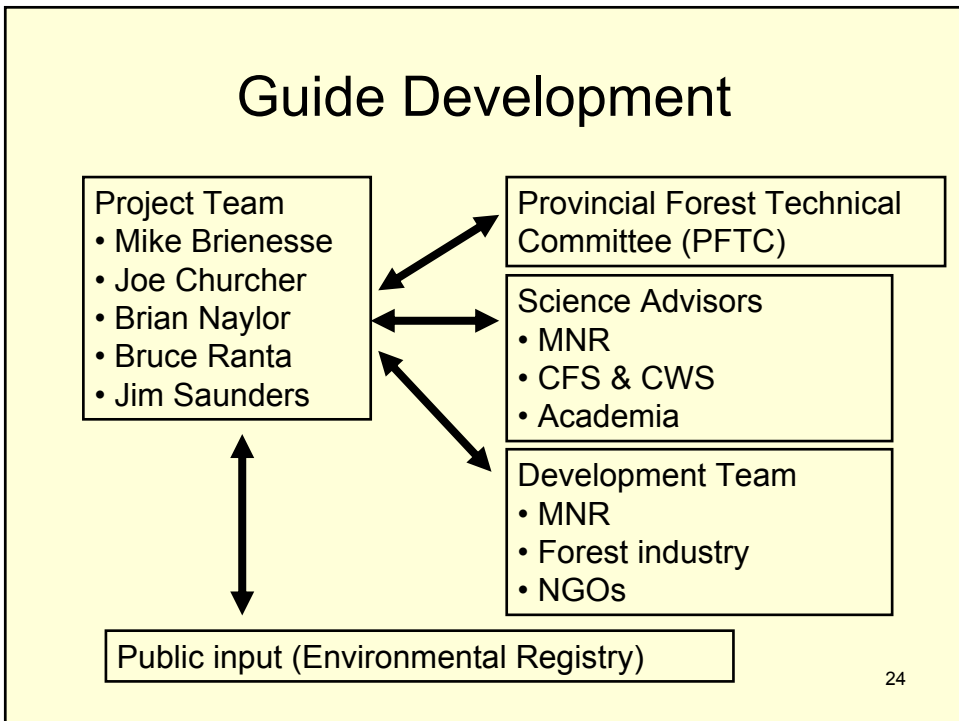
Development Stage	Forest Type	Area (ha)	Age Class	Notes
...	...	...	...	...



# Ontario's Landscape Tool

- Used to complete all analysis requirements during FMP application of landscape guide





# Content

<b>Sections 1 &amp; 2</b>	Introduction & implementation
<b>Section 3</b>	Conserving biodiversity-- management at the stand, multi-stand, & meso-landscape scale
<b>Section 4</b>	Conserving biodiversity - management of site specific habitats
<b>Section 5</b>	Operational considerations
<b>Section 6</b>	Salvage
<b>Section 7</b>	Effectiveness Monitoring
<b>Background and Rationale – appendix on CD</b>	

## Section 3: Conserving Biodiversity

### ***Management at the stand, multi-stand, & meso-landscape scale***

- Uncommon forest types
- Shape of the harvest area
- Wildlife trees & downed wood
- Fine filters for specific wildlife (caribou, moose, deer, etc)



## Section 4: Conserving Biodiversity

### *Management of site specific habitats*

- Streams, lakes, & wetlands
- Bird nests
- Dens and hibernacula
- Calving areas
- Moose aquatic feeding
- Species at risk



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## Section 5: Operational Considerations

- Roads
- Water crossings
- Rutting and compaction
- Erosion
- Nutrient loss
- Loss of productive land
- Hydrological impacts



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## Section 6: Natural Disturbance Salvage

- Consider landscape objectives
- Describes how other sections apply
- Assumes appropriate decisions on the amount of area to be salvaged have already been made



## Next steps

- Complete landscape guide region work
- Incorporate review comments
- Continue with pilot testing
- Continue with socioeconomic analysis
- EBR posting for Aug-Sep and Sep-Oct
- Develop training and implementation tools
  - both guides will apply to 2011 planning teams
- Final products this calendar year



## **CFSA - Section 2**

(1) In this Act, “sustainability” means long term Crown forest health.

(2) For the purpose of this Act and the regulations, the sustainability of a Crown forest shall be determined in accordance with the Forest Management Planning Manual.

(3) The Forest Management Planning Manual shall provide for determinations of the sustainability of Crown forests in a manner consistent with the following principles:

1. Large, healthy, diverse and productive Crown forests and their associated ecological processes and biological diversity should be conserved.
2. The long term health and vigour of Crown forests should be provided for by using forest practices that, within the limits of silvicultural requirements, emulate natural disturbances and landscape patterns while minimizing adverse effects on plant life, animal life, water, soil, air and social and economic values, including recreational values and heritage values.<sup>32</sup>