

## BC Coastal Hem-Fir Initiative – 2012/13

<b>Project Title</b>	Strategic and Operational Tools to Assess Economic Operability of BC Coastal Landscape and Harvest Areas
<b>Project Number</b>	R.06
<b>Project Leader</b>	Mihai Pavel
<b>Project Team</b>	Jack MacDonald
<b>Total Budget</b>	\$50,000

### Need(s)

Previous work in this project developed the NCCruise software program to provide additional data about log grades and values that can be derived from standing timber. NCCruise uses enhanced cruise information and innovative analytic methods. Implementation of the cruising methods and analytic techniques is underway, especially with companies that operate on private land. However, implementation support for companies (including BC Timber Sales) that operate on public land is still required. The proposed work will support implementation of NCCruise on public and private land, and promote its use with government agencies.

### Objectives & Approach

Support operational implementation of NCCruise with training for field techniques and data analysis. Modify input and output sections of program as required to adapt to multiple data loggers.

Meet with government agencies to demonstrate NCCruise and explore its potential as the basis for timber valuation in area-based timber sales.

### Benefits

The NCCruise model will help planners maximize economic margins from forest operations by more accurately predicting log grade distributions and stand values than current techniques, over scales ranging from the individual cutblocks to the landscape level.

- Cooperating company estimated that using NCCruise in its planning process to select the optimal bucking program can improve log value by 1%. If applied to all its harvest volume, this amounts to \$2M per year.

### Project Tasks and Outputs – Current fiscal year

Tasks / Outputs	Expected Delivery Date
Complete the comparison of predicted and as-produced volumes in old-growth cutblock	June 2012
Demonstrate potential for NCCruise in area-based stumpage appraisal.	June 2012
Train three companies in the field and analytic techniques required for NCCruise. Support implementation as required.	March 2013

## Status and Major Accomplishments – Previous year

- Implemented 3P compilation methods in software
- Cruised old-growth cutblock in mainland location using 3P methodology. Cooperating company deferred harvesting the cutblock until 2013 or later for operational reasons.
- Cruised additional old-growth cutblock in Port Alberni area. Falling has started on cutblock and harvesting will start shortly afterwards
- Adapted and used NCCruise in Interior stands that were attacked and killed by mountain pine beetle to more accurately predict the merchantable volume that can be harvested and non-merchantable volume that will not be harvested.

## Performance Measures

Key Success Factor	Key Performance Indicator	Target	How the outcome of the Project supports the Program objectives
Accuracy of volume predictions	Predicted volumes by species and sort match the as-produced volumes in trial cutblock.	Predicted volume of all log sorts within 3% of their as-produced volume.	Improve the ability of the industry to accurately plan their timber-harvesting activities by providing a tool and methodology to accurately predict the value of
Operational implementation	Companies adopt NCCruise for typical operations.	Operational use with three companies with support from FPInnovations. At least one company uses NCCruise without support.	Objective information about the volume, grade, and value of traditional and new products that is developed without using historical grade distributions, is key to identifying the best locations for future timber harvesting to occur.

## Communication Strategy for Information Dissemination

Summary report of volume comparison in the trial cutblock will be prepared and posted on Coastal website. Implementation article will be published in Coastal bulletin. On-site demonstrations will be conducted with coastal companies, BC Timber Sales, and BC Ministry of Forests, Lands, and Natural Resource Operations.

## Collaboration – Research Partners

- Island Timberlands Limited Partnership
- Timberwest Forest Corp.