



**Forest  
Practices  
Board**

## **Audit of Forest Planning and Practices**

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*Western Forest Products Inc.  
Tree Farm Licence 39 – Block 1*

**FPB/ARC/160**

December 2013

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# Audit Results

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## Background

As part of its 2013 compliance audit program, the Forest Practices Board selected Block 1 of Western Forest Product Inc.'s (WFP) Tree Farm Licence (TFL) 39 for audit. Block 1 lies within the Sunshine Coast district, near Powell River. A map of the audit area appears on page 2.

TFL 39 is made up of five distinct operating areas called blocks. Blocks 2 to 5, which are not part of the audit, are on Vancouver Island and on the mainland coast, northwest of Block 1. WFP manages Block 1 through its Stillwater Forest Operation, which is located in Powell River.

The forest in the southern portion of Block 1 is dominated by second growth Douglas-fir, western hemlock, western red cedar, red alder and amabilis fir. The northern portion of Block 1 contains mixed species of immature to old forest. WFP harvested about 500 000 cubic metres of timber from Block 1 during the one-year audit period.

There is a high level of public use within Block 1 and the surrounding area, including hiking, all-terrain vehicle riding, hunting, fishing, camping, mountain biking and canoeing. There are cabins and float homes on several lakes within Block 1, and most of the 57 kilometre Powell Forest Canoe route is within the TFL. The Sunshine Coast Trail (SCT) is a recreational trail which goes from Sarah Point, north of Lund, to Saltery Bay, south of Powell River, of which approximately 50 kilometres is within the TFL. WFP also manages several public recreation sites in Block 1. The significant public use of Block 1 means there is a high degree of interest in WFP's plans and activities.

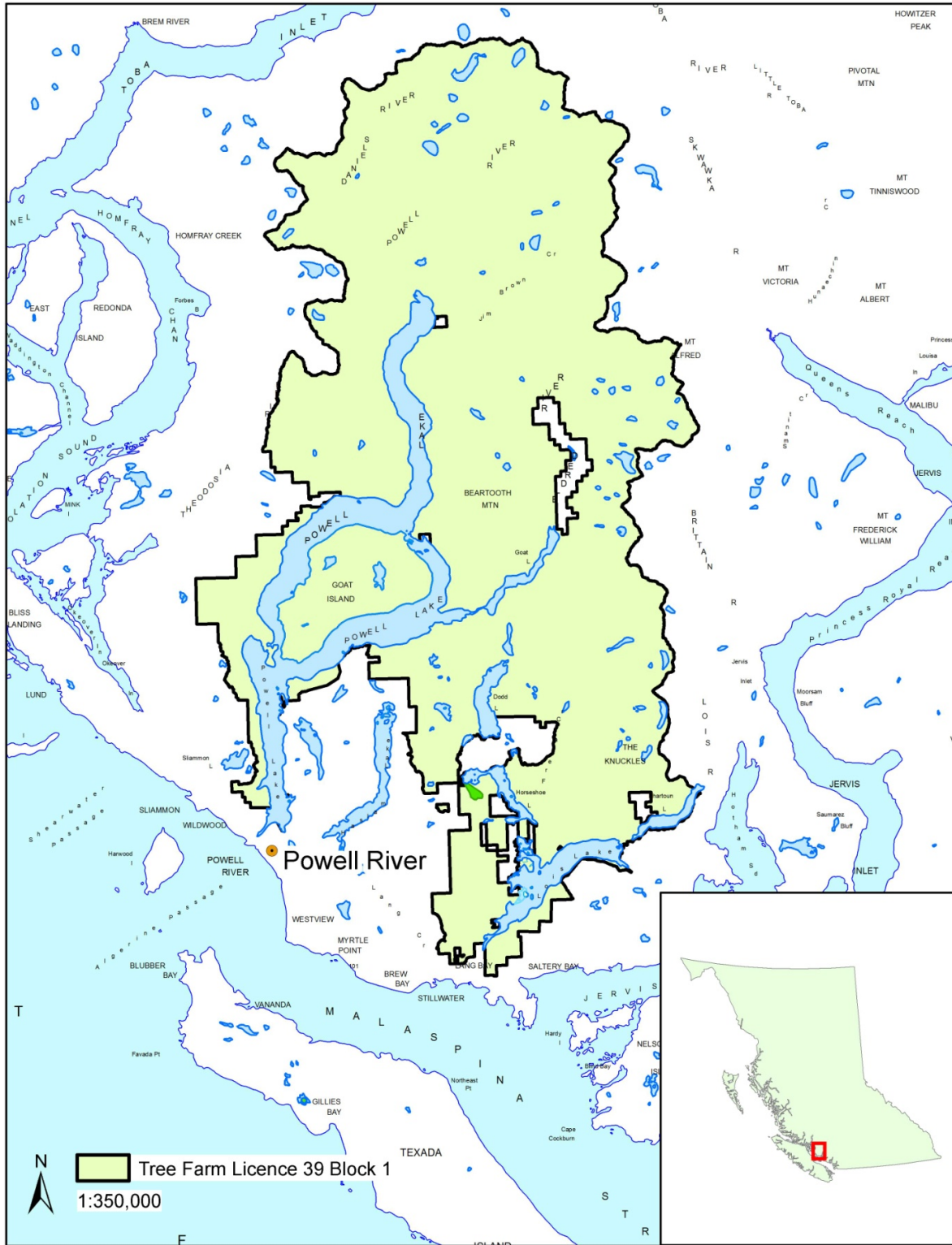
Three professional foresters, a professional engineer and a chartered accountant made up the audit team. Field work was carried out from June 25 to 29, 2013.

Additional information about the Board's compliance audit process is provided in Appendix 1.



Examples of reforestation, multiple use and management for visual quality within Block 1

# Map of Audit Area



## **Audit Approach and Scope**

The Board conducted a full scope compliance audit, in which all harvesting, roads, silviculture, protection activities and associated planning done between June 1, 2012, and June 28, 2013, were included. These items were assessed for compliance with the *Forest and Range Practices Act (FRPA)*, the *Wildfire Act (WA)* and related regulations.

The Board's audit reference manual, *Compliance Audit Reference Manual, Version 7.0, September 2012*, set out the standards and procedures that were used to carry out this audit.

## **Planning and Practices Examined**

### **Objectives Set By Government**

Within TFL 39 Block 1, old growth management areas, ungulate winter ranges, wildlife habitat areas and visual quality objectives have all been established.

Government objectives set out in FRPA and the *Forest Planning and Practices Regulation (FPPR)* also provide strategic and operational guidance to WFP's operations in TFL 39 Block 1.

### **Operational Planning**

WFP's 2006 forest stewardship plan (FSP)<sup>i</sup>, covering its Mid-Island, Stillwater and Port Alberni Operations, was extended in 2011 and remains in effect until January 2017. This FSP provides the link between FRPA objectives and forestry activities for TFL 39 Block 1 through the establishment of measurable and verifiable results and strategies to achieve these results. Auditors reviewed the FSP to ensure it meets FRPA requirements. Site plans were also evaluated both in the office and on the ground to ensure that they accurately identified site conditions and applied the appropriate standards.

### **Timber Harvesting**

WFP harvested timber from 45 blocks, covering 1273 hectares, during the audit period. Auditors examined 44 of those cutblocks as part of the audit. Approximately one-third of the harvest blocks were yarded by helicopter, with the remainder of the logging split between ground-based and cable systems.

### **Road Construction, Maintenance and Deactivation**

WFP is responsible for maintaining approximately 1154 kilometres of road permit roads and 135 structures (bridges and engineered culverts), of which auditors examined 465 kilometres and 66 structures respectively.

The licensee also built 35 kilometres of road, 2 bridges and 3 engineered culverts (less than 2000 millimetres diameter). The auditors assessed 24 kilometres of the new road and all of the new structures.

## **Silviculture Activities and Obligations**

Twenty-seven blocks were declared free growing during the audit period and auditors examined five of these. Regeneration records were examined to determine if regeneration obligations were met.

WFP planted 731 hectares on portions of 30 blocks during the audit period, using mostly Douglas-fir and western red cedar. Auditors examined 171 hectares on 4 blocks for planting practices and compliance with seed transfer guidelines.

WFP manually (cutting or girdling) or chemically (individual tree basal bark application) brushed portions of 46 blocks during the audit period and 4 were examined on the ground.

## **Fire Protection**

Fire hazard assessments and abatement activities were assessed on 52 blocks in the harvesting population.

Three active harvest operations and two active road building headings were assessed for fire preparedness according to the WA.

## **Findings**

The audit found the planning and forest activities undertaken by WFP on TFL 39 Block 1 complied with the requirements of FRPA, WA and related regulations.

## **Operational Planning**

WFP's FSP and site plans were consistent with FRPA requirements. The site plans are thorough and detailed and each refers to applicable FRPA objectives. For each of the relevant objectives, the site plans detail the result and/or strategy that WFP has in place to address the objective. Site plans accurately identified and prescribed practices for resource features, including streams, wetlands, wildlife habitat, cultural heritage features and recreation trails.

Planning for visual quality management was also well done, and included digital terrain modelling and other tools to help develop long term, multiple pass harvesting plans for visually sensitive areas.

WFP maintains open communication with the public. Auditors were particularly impressed by WFP's practice of posting an "Operational Information Map" on its website<sup>ii</sup>. The map shows the location of active road building and harvesting, and where it plans to work in the future, among other things. The map is updated regularly and provides an easy way to see what activities may be happening in a particular area of interest. In addition, WFP arranges field visits with interested members of the public whenever a planned cutblock might potentially impact the Sunshine Coast Trail.

## **Timber Harvesting**

Harvesting was conducted in accordance with requirements of legislation and site plans. Soil disturbance was well managed and within FRPA limits, and natural drainage patterns were maintained. Prescriptions for stream protection were well-executed in the field, and included leaving appropriate buffers, which were commonly wind-firmed, fall away/yard away and post harvest cleaning. Wildlife tree patches were retained as planned and were situated to protect resources such as streams.

Harvest and silviculture audit samples included several recently harvested blocks with a visual quality objective (VQO) of partial retention. The auditors found that WFP's harvesting and road building met the VQOs. In addition, to minimize the impacts of post-harvest blow down on visual aesthetics (and on other values), wind firming treatments were commonly carried out.

## **Road Construction, Maintenance and Deactivation**

No concerns were identified with road or structure construction, maintenance or deactivation.

Road construction was generally well done and seasonal deactivation after harvesting was effective. A number of new crossings showed good sediment control practices, such as settling ponds adjacent to the channels along ditches.

Road inspection tracking and documentation was very thorough and there was evidence that identified issues were appropriately addressed.

Inactive roads had been seasonally deactivated, for the most part. Drainage patterns were maintained and road prisms were stable.

## **Silviculture Activities and Obligations**

There were no issues identified with brushing and planting activities or with the achievement of regeneration and free-growing obligations.

WFP established ecologically appropriate species mixes on harvested sites in a timely manner and met government seed use and transfer requirements. Brushing is only required on a small portion of the harvested area and, where necessary, was done in a timely manner and achieved the desired results. WFP met its free-to-grow obligations and reported them to government within the required time frames and maintained accurate records of silviculture obligations, activities and accomplishments.

## **Fire Protection Activities**

All of the active operations audited were found to be adequately prepared and met the requirements of the WA.

No concerns were identified with respect to hazard assessments and abatement activities. In general, logging slash was piled and burnt (or is planned to be burned) or left scattered in the blocks in a manner that minimizes the risk of wildfire.

WFP has installed an automated system that sends the information from its weather stations, including restrictions on high risk activities, to its employees and contractors each day during fire season, via email. This system was demonstrated to the auditors and appeared to be working well.

## **Audit Opinion**

In my opinion, the operational planning, timber harvesting, road construction, maintenance and deactivation, silviculture and fire protection activities carried out by Western Forest Products Inc. on Tree Farm Licence 39 Block 1, between June 1, 2012, and June 28, 2013, complied in all significant respects with the requirements of the *Forest and Range Practices Act*, the *Wildfire Act* and related regulations, as of June 2013.

In reference to compliance, the term “in all significant respects” recognizes that there may be minor instances of non-compliance that either may not be detected by the audit, or that are detected but not considered worthy of inclusion in the audit report.

The *Audit Approach and Scope* and the *Planning and Practices Examined* sections of this report describe the basis of the audit work performed in reaching the above conclusion. The audit was conducted in accordance with the auditing standards of the Forest Practices Board. Such an audit includes examining sufficient forest planning and practices to support an overall evaluation of compliance with FRPA and WA.



Christopher R. Mosher CA, EP(CEA)  
Director, Audits

Victoria, British Columbia  
December 5, 2013



# Appendix 1:

## Forest Practices Board Compliance Audit Process

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### Background

The Forest Practices Board conducts audits of government and agreement-holders under the *Forest and Range Practices Act* (FRPA), section 122 and the *Wildfire Act* (WA). Compliance audits examine forest or range planning and practices to determine whether or not they meet FRPA and/or WA requirements.

### Selection of auditees

The Board conducts about eight or nine compliance audits annually. Most of these are audits of agreement holders. The Board also audits the government's BC Timber Sales Program (BCTS). This section describes the process for selecting agreement holders to audit.

To begin with, auditors randomly select an area of the Province, such as a district. Then the auditors review the forest resources, geographic features, operating conditions and other factors in the area selected. These are considered in conjunction with Board strategic priorities (updated annually), and the type of audit is determined. At this stage, we choose the auditee(s) that best suits the selected risk and priorities. The audit selections are not based on past performance.

For example, in 2010, the Board randomly selected the Mackenzie district as a location for an audit. After assessing the activities within that area, we discovered that a large licensee had recently closed operations due to financial problems. As the Board has expressed concern in the past about financially strapped companies failing to meet outstanding obligations, such as reforestation and road maintenance, and we knew that some of the licence area is very remote, the new licence holder was selected for audit.

For BCTS audits, a district within one of the 12 business areas within the province is selected randomly for audit.

### Audit Standards

Audits by the Board are conducted in accordance with the auditing standards developed by the Board. These standards are consistent with Canadian generally accepted auditing standards. The standards for compliance audits are described in the Board's *Compliance Audit Reference Manual*.

### Audit Process

#### Conducting the Audit

Once the Board randomly selects an area or district and determines the scope of audit to be conducted and the licensee(s) to be audited, all activities carried out during the period subject to audit are identified (such as harvesting or replanting, and road construction or deactivation activities). Items that make up each forest activity are referred to as a population. For example, all

sites harvested from the timber harvesting population and all road sections constructed from the road construction population.

A separate sample is then selected for each population (e.g., the cutblocks selected for auditing timber harvesting). Within each population, more audit effort (i.e., more audit sampling) is allocated to areas where the risk of non-compliance is greater.

Audit fieldwork includes assessments of features using helicopters and ground procedures, such as measuring specific features like riparian reserve zone width. The audit teams generally spend one week in the field.

## **Evaluating the Results**

The Board recognizes that compliance with the many requirements of FRPA and WA is more a matter of degree than absolute adherence. Determining compliance, and assessing the significance of non-compliance, requires the exercise of professional judgment within the direction provided by the Board.

The audit team, composed of professionals and technical experts, first determines whether forest practices comply with legislated requirements. For those practices considered to not be in compliance, the audit team then evaluates the significance of the non-compliance, based on a number of criteria, including the magnitude of the event, the frequency of its occurrence and the severity of the consequences.

Auditors categorize their findings into the following levels of compliance:

*Compliance* – where the auditor finds that practices meet FRPA and WA requirements.

*Not significant non-compliance* – where the auditor, upon reaching a non-compliance conclusion, determines that one or more non-compliance event(s) is not significant and not generally worthy of reporting. However, in certain circumstances, events that are considered not significant non-compliance may be reported as an area requiring improvement.

*Significant non-compliance* – where the auditor determines a non-compliance event(s) or condition(s) is or has the potential to be significant, and is considered worthy of reporting.

*Significant breach* – where the auditor finds that significant harm has occurred, or is beginning to occur, to persons or the environment as a result of one or many non-compliance events.

If it is determined that a significant breach has occurred, the auditor is required by the *Forest Practices Board Regulation* to immediately advise the Board, the party being audited, and the Minister of Forests, Lands and Natural Resource Operations.

## Reporting

Based on the above evaluation, the auditor then prepares a draft audit report. The party being audited is given a draft of the report for review and comment before it is submitted to the Board.

Once the auditor submits the draft report, the Board reviews it and determines if the audit findings may adversely affect any party or person. If so, the party or person must be given an opportunity to make representations before the Board decides the matter and issues a final report. The representations allow parties that may potentially be adversely affected to present their views to the Board.

The Board then reviews the draft report from the auditor and the representations from parties that may potentially be adversely affected before preparing its final report. Once the representations have been completed, the report is finalized and released: first to the auditee and then to the public and government.

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<sup>i</sup> A forest stewardship plan (FSP) is a key planning element in the FRPA framework and the only plan subject to public review and comment and government approval. In FSPs licensees are required to identify results and/or strategies consistent with government objectives for values such as water, wildlife and soils. These results and strategies must be measurable and once approved are subject to government enforcement. FSPs identify areas within which road construction and harvesting will occur but are not required to show the specific locations of future roads and cut blocks. FSPs normally have a term of five years.

<sup>ii</sup> WFP's Operational Information Map is available at <http://www.westernforest.com/wp-content/uploads/plans/Stillwater%20Operational%20Information%20Map.pdf>