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Forest Harvest Plan

PU082055



**ALBERTA
PACIFIC**
FOREST INDUSTRIES INC



Table of Contents

| | |
|---|-----------|
| 1.0 Introduction | 5 |
| 2.0 General Planning Unit Information /Design Considerations | 5 |
| 2.1 Operating Ground Rules | 5 |
| 3.0 Maps | 5 |
| 4.0 Block Information..... | 6 |
| 4.1 Utilization | 6 |
| 4.2 Field verification | 6 |
| 4.3 Understory Assessment..... | 6 |
| Table 1: Block Summary Table | 7 |
| 4.4 Structure Retention | 8 |
| 4.5 Debris Management..... | 8 |
| 4.6 Camp Location | 8 |
| 5.0 Watercourse Protection | 8 |
| Table 2: Watercourse Crossing Summary..... | 9 |
| 6.0 Road Information | 9 |
| Table 3: Road Attributes..... | 10 |
| 7.0 Land Use Information | 10 |
| Table 4: Land Use Summary Table | 10 |
| 8.0 Integration with Other Forest Users | 11 |
| 8.1 Integration with Other Harvest Operators | 11 |
| 8.2 Registered Fur Management Areas (RFMAs)..... | 11 |
| Table 5: Trapper Areas Table | 11 |
| 8.3 Wildlife Management Unit(s) (WMU) | 11 |
| Table 6: Guide and Outfitters..... | 12 |
| 8.4 Indigenous Groups | 12 |
| 8.5 Other Forest Users..... | 12 |
| 8.6 Forest Aesthetics..... | 12 |

9.0 Species and Areas of Concern 12

 9.1 Woodland Caribou 12

 9.2 Key Wildlife and Biodiversity Zone (KWBZ)..... 12

 9.3 Other Species 13

 9.4 Sensitive Sites 13

 9.5 Forest Health..... 13

10.0 SHS Information / Variance Summary..... 13

11.0 OGR Deviations..... 14

12.0 Validation by Registered Forest Practitioner..... 14

Appendices

Appendix 1- FHP Block Maps

Appendix 2- FHP Overview Maps

Appendix 3- Spatial Harvest Sequence Summary Tables

Appendix 4- Spatial Harvest Sequence Summary Map

Report

1.0 Introduction

Alberta–Pacific Forest Industries Inc. (Al–Pac) has prepared a Forest Harvest Plan (FHP) for the harvest of stands within Planning Unit 082055.

The Planning Unit is located south of Muskwa Lake and west of the Al-Pac Muskwa Tower Road within Forest Management Unit (FMU) S18.

Copies of this Forest Harvest Plan are available on the Alberta–Pacific website, at www.alpac.ca.

2.0 General Planning Unit Information /Design Considerations

This FHP has been validated by a Registered Forestry Professional from Alberta-Pacific.

This FHP includes maps and reports that clearly show and document the planned harvest area boundaries, roads and water crossings within the Planning Unit.

This plan is being submitted for appraisal, for a 5-year FHP approval under the 2022-2023 Alberta-Pacific Annual Operating Plan (AOP).

2.1 Operating Ground Rules

This Planning Unit is designed in accordance with the Timber Harvest Planning and Operating Ground Rules - Northeast Alberta Regional Area-Specific Addendum (OGRs). Alberta–Pacific is requesting certain deviations from the OGRs, due to field verified factors. These requests, along with corresponding information are listed under the section “OGR Deviations”.

3.0 Maps

Individual block maps have been included in the submission package, outlining the information pertinent to these blocks. A Planning Unit overview map and a Spatial Harvest Sequence (SHS) Planning Unit map have been included in the submission package. These maps can be viewed in the *Appendices* of this document.

4.0 Block Information

A *Block Summary Table* has been included below outlining the expected volumes of the harvest area.

4.1 Utilization

Deciduous and coniferous stands will adhere to the 15/10 utilization standard

4.2 Field verification

Field verification was conducted to assess the timber quality, potential sensitive and historical sites, operability of the harvest area, and classification of water courses within the Planning Unit boundary. Where applicable, the findings of the layout team have been noted in the corresponding section of this report.

4.3 Understory Assessment

White Spruce understory within deciduous landbase will be protected utilizing high effort understory protection in stands identified as greater than 600 stems/ha by the Alberta Vegetation Inventory (AVI), as well as any potential areas found to have understory present that is not identified by the AVI. There are no Blocks in PU082055 requiring high effort understorey protection methods. Any deciduous blocks found to have understory amounting to between 400 stems/ha and 600 stems/ha will be protected utilizing the avoidance method.

Table 1: Block Summary Table

This table provides a brief description of the proposed harvest blocks within the Planning Unit. Values rounded to whole numbers

| Deciduous Blocks | | | | | | |
|-------------------------|-----------------------|--|----------------------|---|--|---|
| Source ID | Opening Number | Harvest Season (Frozen/ Non-Frozen) | Area (ha) | Deciduous Volume (m³) | Incidental Conifer Volume (m³) | Total Volume (m³) |
| FC08205512861 | 5050821286 | Non-Frozen | 52 | 13,879 | 2,305 | 16,184 |
| FC08205513701 | 5050821370 | Non-Frozen | 21 | 5,805 | 526 | 6,331 |
| FC08204507021 | 5040820702 | Non-Frozen | 15 | 5,244 | 980 | 6,224 |
| FC08205501551 | 5050820155 | Non-Frozen | 30 | 5,280 | 620 | 5,900 |
| FC08205501751 | 5050820175 | Non-Frozen | 28 | 11,408 | 444 | 11,852 |
| FC08205502991 | 5050820299 | Non-Frozen | 113 | 27,328 | 2,352 | 29,680 |
| FC08204507381 | 5040820738 | Frozen | 25 | 6,236 | 1,674 | 7,910 |
| FC08205514691 | 5050821469 | Frozen | 36 | 9,529 | 3,929 | 13,458 |
| FC08204506291 | 5040820629 | Frozen | 8 | 1,622 | 936 | 2,558 |
| FC08205512421 | 5050821242 | Frozen | 8 | 1,766 | 471 | 2,237 |
| | | Totals | 336 | 88,097 | 14,237 | 102,334 |

4.4 Structure Retention

For Alberta-Pacific and Commercial Timber Permits, an average of 5% representative of all harvested area at the FMU level by stewardship reporting period will be retained. A harvest area may have zero structure but the FMU average shall be 5%. Non merchantable structure is not to be tracked as part of the 5%. Structure retention will be left in the following methods:

- Laid out patches
- Individual trees
- Small clumps left at the operators' discretion

4.5 Debris Management

The Planning Unit is situated within Alberta's Fire Control Zone number 46 as identified by Alberta Agriculture, Forestry and Rural Economic Development (AFRED).

Debris management of the Planning Unit will be accomplished in a manner consistent with the Debris Management Standards for Timber Harvest Operations (AF-FDP-2017-07).

4.6 Camp Location

The companies have identified a camp location for logging operations within this Planning Unit. The campsite will be reclaimed as indicated in Section 2.12.2 of the OGRs.

| Source ID | Opening Number | LATITUDE | LONGITUDE |
|---------------|----------------|-------------|-----------|
| FC08205501751 | 5050820175 | -114.635999 | 56.077729 |

5.0 Watercourse Protection

During the potential watercourses were identified during preliminary planning using wet areas mapping, LiDAR data, aerial imagery, as well as the available AVI data.

Where harvest blocks are in proximity to any potential watercourses, the field layout team conducted field assessments utilizing the methodology and classification standards outlined in Section 2.17 of the OGRs. Any confirmed watercourses have been buffered in accordance with the OGRs Section 2.17.

Any deviations from the OGRs in relation to the watercourse buffers are noted in this report; please refer to the *OGR Deviations* section of the report for further information.

Table 2: Watercourse Crossing Summary

A list of road crossings over field verified watercourses within the Planning Unit.

| Road ID | Crossing ID (Road Crossing Number) | Watercourse Classification |
|----------------|---|-----------------------------------|
| RC08205512861 | 1254 | Ephemeral |
| RC08205512861 | 1261 | Transitional |
| RC08205512861 | 1286 | Transitional |
| RC08205514691 | 1199 | Ephemeral |
| RC08205514691 | 1209 | Transitional |
| RC08205514691 | 1311 | Intermittent |
| RC08205514691 | 1471 | Intermittent |
| RC08205514691 | 1474 | Transitional |
| RC08205514691 | 1481 | Intermittent |

6.0 Road Information

Overview maps have been attached showing roads in accordance with Section 4.1.3.7. of the OGRs; all spatial data requirements have also been included with this submission.

Roads will be constructed, maintained, and reclaimed in a manner consistent with Section 2.15 of the OGRs.

When new access is necessary, reclamation processes will be followed as per applicable legislation. To enable for silviculture activities, all-terrain vehicle (ATV) access may be left throughout the harvest area.

Table 3: Road Attributes

Summary of the proposed in-block roads of the Planning Unit.

| Road ID | Road Classification | Haul Season | Length, m |
|----------------|----------------------------|--------------------|------------------|
| RC08204506291 | Temp | Frozen | 273 |
| RC08204507021 | Temp | Non-Frozen | 1,033 |
| RC08204507381 | Temp | Frozen | 1,523 |
| RC08205501751 | Temp | Non-Frozen | 2,329 |
| RC08205512421 | Temp | Frozen | 669 |
| RC08205512861 | Temp | Non-Frozen | 2,615 |
| RC08205513701 | Temp | Non-Frozen | 1,564 |
| RC08205514691 | Temp | Frozen | 5,582 |
| RC08204506291 | Temp | Frozen | 273 |
| RC08204507021 | Temp | Non-Frozen | 1,033 |
| RC08204507381 | Temp | Frozen | 2,019 |
| RC08205501751 | Temp | Non-Frozen | 2,329 |

7.0 Land Use Information

A search of the Geographic Land Information Management and Planning System (GLIMPS) and Digital Integrated Dispositions (DIDs) yielded active dispositions within the FHP. Any necessary agreements with the disposition holder will be in place prior to the commencement of harvest operations. None of the dispositions within the FHP will restrict harvest operations in the FHP.

Table 4: Land Use Summary Table

Active dispositions in the Planning Unit

| Disposition Number | Disposition Holder | Disposition Type |
|---------------------------|---------------------------|-------------------------|
| LOC190452 | Turnstone Energy Inc. | LOC |
| LOC790230 | West Fraser Mills Ltd. | LOC |

The FHP design incorporates pipeline crossings, for temporary roads. The agreements will be in place prior to the construction of these crossings.

8.0 Integration with Other Forest Users

8.1 Integration with Other Harvest Operators

This FHP is not an integrated between the FMA and a CTL holder.

8.2 Registered Fur Management Areas (RFMAs)

Notification letter were sent to RFMAs within the FHP who will be affected by operations. A request was made by the RFMA 2296 holder to add a protective buffer to a traditional use trail leading to their cabin on the south side of Muskwa lake. Due to this request, there is a 50-meter buffer on either side of the trail (100m total buffer size) bordering Block FCo8205502991 (5050820299) and Block FCo8205501551 (5050820155).

Table 5: Trapper Areas Table

| RFMA ID | Notification Method |
|----------------|----------------------------|
| 2134 | Letter |
| 2296 | Letter |

8.3 Wildlife Management Unit(s) (WMU)

Planning Unit is located within WMU 542 . The Guides and Outfitters operating within this unit have been sent notification, via registered mail, on the FHP design, as well as a timeline for the commencement of harvest operations. Any requests from Guides and Outfitters have been considered, and, where possible, the harvest design has been planned to accommodate the request. A table with the active Guides and Outfitters in the WMU is included below.

Table 6: Guide and Outfitters

| OG Company | Date | Contact Method |
|--------------------------------|-------------|-------------------------|
| Wide North Outfitters Ltd. | Jul-20 | Registered Mail |
| Blue Bronna Outfitting | Jul-20 | Registered Mail |
| Northern Adventure Hunts | Jul-20 | Registered Mail |
| Huellbusch | Jul-20 | Registered Mail |
| Three Rivers Adventures | Jul-20 | Registered Mail |
| Northern Edge Outfitting Ltd | Jul-20 | Registered Mail |
| Grizzly Mountain Outfitters | Jul-20 | Registered Mail |
| North Alberta Outfitters | Jul-20 | Registered Mail / Email |
| Northern Wilderness Outfitters | Jul-20 | Registered Mail |

8.4 Indigenous Groups

During the General Development Plan (GDP) process, Alberta – Pacific conducts consultations with indigenous groups every year. There have not been any site-specific issues identified prior to FHP submission.

8.5 Other Forest Users

There are no known forest user groups operating within the Planning Unit area.

8.6 Forest Aesthetics

As outlined in Section 4.2.2.1. of the OGRs, Alberta – Pacific follows the objective to mitigate the impact of timber operations on the visual quality of the forest landscape.

This FHP is not adjacent to any parks or recreational areas, and no other aesthetics concerns have been noted to date by other forest users.

9.0 Species and Areas of Concern

9.1 Woodland Caribou

Planning Unit 082055 is partially located within Woodland Caribou Range; however there are no proposed blocks, roads and crossings within the Nipisi Caribou range in this FHP submission.

9.2 Key Wildlife and Biodiversity Zone (KWBZ)

Planning Unit 082055 is not located within a Key Wildlife and Biodiversity Zone; all operations will be consistent the OGRs.

9.3 Other Species

All known sensitive wildlife sites have been buffered in accordance with Section 2.8.9 of the OGRs.

Block FCo8205514691 (5050821469) was buffered 200m due to proximity to a known trumpeter swan lake. The block will contain retention to minimize the line-of-sight within 200-500 meters of the lake.

9.4 Sensitive Sites

A review of the block design and landscape of the FHP was completed by professional archaeologists. Any sites identified as being of high historical significance (historical resource sites) have been removed from the harvest design.

Upon completion of cutblock and road layout, a second review of the harvest blocks, and temporary roads is completed to identify potential conflicts, and to determine if any further changes are required to the Planning Unit.

There were no signs of rare plants, including signs of terrestrial lichen found within the Planning Unit.

If any sites are identified post submission, Alberta – Pacific will take the appropriate action to protect these sites.

9.5 Forest Health

During the field verification, a team evaluated the current state of the forest health in the FHP area, as outlined in Section 2.19 of the OGRs.

If any sites are identified post submission, Alberta – Pacific will take the appropriate action to address these concerns as per Section 2.19.1 of the OGRs.

10.0 SHS Information / Variance Summary

Variances from the Spatial Harvest Sequence (SHS) within the Planning Unit boundary are shown in Appendix 3 - *Spatial Harvest Sequence Summary Table*.

11.0 OGR Deviations

There are no OGR deviations currently requested in Pu082055.

12.0 Validation by Registered Forest Practitioner

This plan is being prepared and submitted on behalf of Alberta-Pacific Forest Industries Inc.

ALBERTA-PACIFIC FOREST INDUSTRIES INC.



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