State of Alaska Department of Natural Resources Division of Forestry & Fire Protection NORTHERN REGION FAIRBANKS-DELTA AREA **Draft Forest Land Use Plan** 



# **WOODSTOVE SPRUCE 2025**

# TIMBER SALES

NC-1859-D, NC-1905-D, NC-1916-D, NC-1923-D, NC-1926-D

**June 2025** 

# Abbreviations

AAC	Alaska Administrative Code
ADEC	Alaska Department of Environmental Conservation
ADF&G	Alaska Department of Fish and Game
ADNR	Alaska Department of Natural Resources
AS	Alaska Statute
BIF	Best interest finding
CCF	Hundred cubic feet
DBH	Diameter at breast height (4.5 feet above root collar)
DMLW	Division of Mining, Land and Water
DOF	Division of Forestry & Fire Protection
ETAP	Eastern Tanana Area Plan
FLUP	Forest Land Use Plan
FRPA	Alaska Forest Resources and Practices Act
FYSTS	Five-Year Schedule of Timber Sales
MBF	Thousand board feet
ОНА	Office of History and Archeology
ROW	Right-of-way
TVSF	Tanana Valley State Forest
TVSF MP	Tanana Valley State Forest Management Plan

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# I. Introduction

Project File Number: NC-1859-D, NC-1905-D, NC-1916-D, NC-1923-D, and NC-1926-D.

Division of Forestry & Fire Protection Office: Fairbanks-Delta Area Area Forester: Kevin Breitenbach, Fairbanks-Delta Area Forest Practices Geographic Region (AS 41.17.950): Region III

This Forest Land Use Plan (FLUP) covers proposed forest operations on approximately 43 acres of spruce fuel and sawlog timber from State lands in the Cummings Road East area near the Alaska Highway. It is intended to provide the best available information regarding the proposed harvest of timber, and management of other non-timber uses in compliance with AS 38.05.112 and AS 41.17.060, and must be adopted by the DNR before the proposed activity can occur.

 $\Box$  This DRAFT Forest Land Use Plan is for timber sale(s) which have been determined to be in the best interest of the state pursuant to AS 38.05.035 (e) and AS 38.05.945; This FLUP does not determine whether or not to access and sell timber within the timber sale area, nor the method of sale. Those decisions have been made previously in the Best Interest Finding and are not appealable under this FLUP.

☑ This DRAFT Forest Land Use Plan is for timber sale(s) for which a Preliminary Best Interest Finding is currently out for review. A final best interest finding must be completed prior to adoptions of a final FLUP pursuant to AS 38.05.035 (e) and AS 38.05.945; Woodstove Spruce 2025 Timber Sales PBIF includes proposed timber sales NC-1859-D, NC-1905-D, NC-1916-D, NC-1923-D, and NC-1926-D; and is available on DOF's public webpage: http://forestry.alaska.gov/timber/delta

□ This DRAFT Forest Land Use Plan is for timber to be harvested that does not require a final finding pursuant to AS 38.05.035 (e) and notification under AS 38.05.945.

A draft of this plan was distributed to the Alaska Department of Fish & Game (ADF&G) and the Department of Environmental Conservation (DEC) for their review and comments relevant to the consistency of this proposed project with the statutes governing forest land use plans (AS 38.05.112) and the requirements of the Alaska Forest Resources & Practices Act (AS 41.17) and its Regulations (11 AAC 95).

The public and agencies are invited to comment on specific requirements for harvest, access, and reforestation operations in this draft FLUP. The decision on whether or not to offer timber for sale is made through the best interest finding process, and is not subject to review under the FLUP. Objections or comments pertaining to the draft FLUP must be received in writing by the DOF Fairbanks-Delta Area Office by **4:30PM AKDT Monday**, July 14th, 2025 in order to ensure consideration for review. Comments should be mailed to the State of Alaska, Division of Forestry & Fire Protection, 3700 Airport Way Fairbanks, Alaska 99709, or by email to andrew.allaby@alaska.gov. For more information you may contact the Fairbanks-Delta Area Resource Forester, Andrew Allaby, at 907-451-2603 or at the physical/electronic addresses provided. To be eligible to participate in any appeal or request for reconsideration to the final

decision, a person must be affected by the decision, and must have submitted comment to the preliminary decision during the comment period.

After public and agency review of the draft FLUP, the DOF will review comments, make changes as appropriate, and issue a final FLUP. An eligible person affected by this decision, and who provided timely written comment or public hearing testimony to the department, may appeal the decision to the DNR Commissioner per AS 44.37.011 and 11 AAC 02.

 $\boxtimes$  Other Documents are referenced in this FLUP. This timber sale is designed to be consistent with the management intent of the following documents:

2025 Tanana Valley State Forest Management Plan Update

The administrative record for these sales is maintained at the Division of Forestry & Fire Protection Fairbanks Office filed as NC-1859-D, NC-1905-D, NC-1916-D, NC-1923-D, and NC-1926-D.

#### A. Legal description

The proposed sales are located approximately 28 miles southeast of the Delta Area Forestry office in the Cummings Road area north of the Alaska Highway at milepost 1392. The proposed sales are accessed via a forest road spur from the east side of Cummings Road 5.0 miles from the Alaska Highway.

- NC-1859-D / Cliffhanger #3 (18.3 acres) is within Sections 1 & 12, T12S, R14E, Fairbanks Meridian
- NC-1905-D / Woodstove Spruce #2 (3.6 ac) is within Section 6, T12S, R15E, F.M.
- NC-1916-D / Woodstove Spruce #3 (13.1 ac) is within Section 6, T12S, R15E, F.M.
- NC-1923-D / Cummings 5 Mile Spruce (3.5 ac) is within Section 7, T12S, R15E, F.M.
- NC-1926-D / Woodstove Spruce #4 (4.9 ac) is within Section 6, T12S, R15E, F.M.

The sales are accessed primarily by existing all-season roads within TVSF, but new spur roads will need to be constructed to access NC-1859-D and NC-1916-D.

See also maps in Section VI.

#### **B.** Operational Period

Approximately 3 years from the "Effective Date" on the signed contract. Timber contracts administered by the Fairbanks office generally have a 3-year operational period terminating on May 31 of the third year.

#### C. Timber Disposal

- $\boxtimes$  Timber will be sold and will have a contract administrated by the State.
- □ Timber will be available to the public; permits obtained by the public will be issued by the State.
- $\Box$  Other

#### **D.** Objectives and Summary

- Provide the raw material for the industry to produce timber products providing benefits to the state and local economy through employment opportunities.
- Harvest the commercial timber before a significant decrease in merchantability occurs due to age, wildfire, or forest health issues, and return the site to a young productive mixed stand forest.
- Provide sawlogs and firewood for building and heating needs of interior Alaska communities.
- Promote multiple use management that provides for the production, utilization, and replenishment of timber resources while perpetuating personal, commercial, and other beneficial non-timber uses of the forest resources.

# II. Affected Land Owners/Jurisdictions

#### A. State

Access Easement	Harvest	Written Representative Approval
$\boxtimes$	$\boxtimes$	
	Easement	Easement Harvest

Land Owner Representative:

# **III.** Harvest Methods, Silvicultural Actions, and Management of Non-timber Resources

Forest operations will be designed to:

- Protect fish habitat and water quality in compliance with the best management practices in 11 AAC 95.260-.370,
- Manage for the other land uses and activities identified in AS 41.17.060 and the Best Interest Finding for this timber sale, and
- Ensure prompt reforestation and maintenance of site productivity in compliance with AS 41.17.060(c) and 11 AAC 95 .375-.390.

Harvest and Silvicultural Methods:

- The silvicultural actions are described in this document, and no prescription was written or is necessary.
- □ A silvicultural prescription has been written and is attached to this document in Appendix B.

#### A. Timber Stand Description and History

The proposed sale areas are of a similar mature spruce forest type with minimal hardwoods. The stands have a high density of stems with a 70%+ closed canopy, an average age of 104 years at breast height, and a site index of 75-80 feet tall at 100 years age. Recon plots resulted in basal area estimates of 100 ft<sup>2</sup> of spruce sawlog, with an average DBH of 11 inches and average height of 75 ft, and 40 ft<sup>2</sup> of spruce fuelwood, with an average DBH of 8 inches and average height of 65 ft. Minimal rot or form defect was observed, and the stand appeared healthy. Small components of black spruce are present in the understory. Senescing aspen is a minor component, and significant amounts of downed aspen and spruce logs are present. The understory is mostly moss with few vascular plants. A few small to medium-sized sales have taken place in this stand over the past decade.

#### **B.** Timber Harvest Activities

Timber Harvest Activities are displayed in Table 1.

Unit ID	Acres	Topography	Silvicultural Action	Logging Method
NC-1859-D	18			
NC-1905-D	4			
NC-1916-D	13	Flat	Clear cut	Ground based, whole tree harvest
NC-1923-D	4			
NC-1926-D	5			

#### **Table 1. Timber Harvest Activities**

#### C. Site Preparation

- Site preparation will not be necessary. There is either sufficient residual stocking, or because there has been sufficient soil disturbance by logging/fire to forego scarification.
- □ Site preparation will be implemented and described in Table 2:

#### Table 2. Site Preparation

Unit ID	Acres	Site Preparation Method	Date of Completion		

#### **D.** Reforestation

Season of harvest:

- $\Box$  Winter harvest only
- □ Non-winter harvest only
- $\boxtimes$  All-season harvest

⊠ Clearcut

Partial Harvest relying on residual trees to result in a stocking level that meets standards of 11 AAC 95.375 (b)(4). Stocking levels will be calculated using data for the number of residual trees collected during DOF regeneration surveys and populate the following Table 3:

Average DBH (Diameter at breast height)	Residual Trees (Trees/acre)	Minimum Stocking Standard (Trees/acre)	Percent Stocking
≥9"		120	%
6" to 8"		170	%
1" to 5"		200	%
Total Residual Stocking			0%

#### Table 3. Stocking Level Requirements

Seedlings Required:

Percentage Under stocked = 100 - Total Residual Stocking %Percentage Under stocked =  $100 - \underline{0\%} = \underline{100\%}$ 

Seedlings/ Acre Required = Percentage Understocked/100 x 450 Seedlings/ Acre Required = 100%/100 x 450 = 450

 $\Box$  Artificial regeneration

□ Seeding: Species and source of seed (general vicinity location of seed source)

□ Planting: Species:\_\_\_\_Date of proposed planting: \_\_\_\_\_

Source of seedlings (location of seed source): \_

⊠ Natural regeneration: provide known information on the following indicators of suitability for natural regeneration. If a box is checked "no," please explain/describe the condition. N/A means "not applicable."

Yes No <u>N/A</u> <u>Unknown</u>

Seedbed and soil conditions suitable for natural regeneration

	$\boxtimes$		Moss layers are shallow ( $\leq 4$ ") or absent.
			Note: While the proposed areas have established moss layers,
			experience on nearby recent sales have shown that mechanical
			harvest and sun exposure is expected to provide sufficient
			receptive seedbeds.
$\boxtimes$			Where birch or spruce regeneration is targeted, exposed
			mineral soil will exist on at least 25% of the harvest area and is
			well-distributed across the unit
			Note: Harvest activities are expected to provide sufficient receptive
			seedbeds.

		$\boxtimes$		Where aspen regeneration from suckering is targeted, root damage will be minimal and soil exposure will encourage warming.
Yes	<u>No</u>	<u>N/A</u>	<u>Unkno</u>	<u>wn</u>
Seed/	vegetativ	ve repro	duction	sources available
$\boxtimes$				Exposure to prevailing winds, if known
$\boxtimes$				Adequate seed trees exist within 3 tree heights of the reforestation site for spruce or within 2 tree heights for birch
			$\boxtimes$	Where spruce regeneration is targeted, large seed crop in year prior to harvest or current year
				Where vegetative reproduction is targeted the harvest area contains sufficient, well-distributed paper birch, aspen, balsam poplar, western black cottonwood, red alder, or other species known to regenerate vegetatively as approved by the Division [paper birch, quaking aspen].
Yes	No	N/A	Unkno	wn
	etition a			
				<i>Calamagrostis</i> (bluejoint grass) is not visually evident. If <i>Calamagrostis</i> is visually evident, describe abundance and distribution. <u>Note</u> : <i>Calamagrostis</i> coverage of more than 1-2% distributed across the site indicates that grass coverage may expand rapidly after harvest without treatment.
$\boxtimes$				<i>Equisetum</i> (horsetail) is present prior to harvest
				The site is not currently subject to intense herbivory due to peaks in the hare cycle, dense moose populations, or scarcity of browse in the surrounding landscape.
	$\boxtimes$			Existing stands are not infested with bark beetles (Dendroctonus or Ips)
				Where spruce regeneration is targeted, harvest areas are free of known incidence of <i>Onnia tomentosus</i> root rot. <u>Note</u> : <i>tomentosus</i> can kill regeneration of spruce and, to a lesser degree, pine and larch. If <i>tomentosus</i> is present, describe the extent of the problem in the notes box below. Design reforestation to minimize continuation or spread of the disease

□ Landowner requests an extended period for natural regeneration under 11 AAC 95.375(d)(6)

#### E. Slash Abatement

- □ Potential for insect infestations caused by slash accumulations exists. Slash abatement for controlling infestations will be implemented as required by 11 AAC 95.370.
- $\boxtimes$  Lop and scatter slash; accumulations will be kept to less than 2 feet in height.
- $\Box$  Slash will be disposed of by the operator  $\boxtimes$  Slash will be disposed of by the State
- $\Box$  Other method of slash disposal:  $\Box$  removal off site  $\boxtimes$  crushing or grinding  $\Box$  burning
- $\boxtimes$  Burn permits necessary from DOF and DEC to be acquired.
- $\boxtimes$  The operator will contact the DOF local area office prior to ignition of debris.

#### F. Timber Harvest—Surface Water Protection

- $\Box$  There are no streams or lakes abutting or within a harvest unit.
- Known surface waters and protection measures are described in Table 4 below.

Unit	Waterbody Name	AS 41.17.950 Classification	ADF&G AWC #	Required Riparian Protection	Site-specific actions to minimize impacts on riparian area
NC-1905-D	Tanana River	III.B	334-40-11000- 2490	No harvest within 100' of ordinary high water mark	No harvest operations within 100' buffer

 Table 4. Protection for Known Surface Waters

Surface waters listed above were reviewed by the Department of Fish and Game:

- $\boxtimes$  During the timber sale planning process
- $\boxtimes$  During the agency review conducted for the Best Interest Finding for this sale
- $\boxtimes$  During the drafting of this Forest Land Use Plan
- □ Stream Crossings (Title 16) Permits are needed per ADF&G Division of Habitat

Surface waters listed above were reviewed by the Department of Environmental Conservation:

- $\boxtimes$  During the timber sale planning process
- During the agency review conducted for the Best Interest Finding for this sale
- ☑ During the drafting of this Forest Land Use Plan

Non-classified surface waters are subject to applicable BMPs in 11 AAC 95.

Notes: The Tanana River is the nearest catalogued anadromous waterbody, and is categorized under FRPA as a Type III.B. waterbody (glacial, with resident fish). There are no known perennial streams impacted by the sale areas or the access roads

#### G. Wildlife Habitat

- ⊠ Wildlife species and allowances for their important habitats were addressed in writing by the Department of Fish & Game during the Best Interest Finding review.
- $\boxtimes$  Wildlife species and allowances for their important habitats were addressed in writing by the

Department of Fish & Game during the drafting of this Forest Land Use Plan.

Silvicultural practices to be applied to minimize impacts to wildlife habitat or wildlife management:

- $\boxtimes$  Timber retention concentrations of timber surrounding harvest units, or interspersed within harvest units to provide cover.
- Snag Retention- snags or isolated trees left for cavity nesting species.
- ⊠ Large Woody Debris concentrations of downed timber or logging debris interspersed within harvest units to provide cover left on site.
- $\Box$  Other actions

Notes:

#### H. Cultural and Historical Resource Protection

- ☑ This project was reviewed by the State Historic and Preservation Office (SHPO).
- $\Box$  No artifacts have been reported within the project area(s).
- □ Known or likely sites have been identified and a mitigation plan is in place. (Describe the mitigation actions.)

#### I. Other Resources Affected by Timber Harvest and Management

□ There are other resources and areas of concern besides surface water, fish habitat, and wildlife habitat that may be affected. Mitigations actions were addressed in the Best Interest Finding.

#### Table 5. Other Affected Resources / Areas of Concern

Impacted Resource Reviewing Agency		Impact/ Mitigation Actions

□ There are no affected resources or areas of concern other than surface water, fish habitat, and wildlife habitat, which are addressed in this Forest Land Use Plan.

Notes:

# IV. Roads and Crossing Structures

#### A. Road Design, Construction, and Maintenance

Roads will be designed, constructed, and maintained to prevent significant adverse impacts on water quality and fish habitat (AS 41.17.060(b)(5)), and site productivity (AS 41.17.060(c)(5)). Roads will comply with the best management practices in the Forest Resources and Practices Regulations (11 AAC 95.285 - 95.335).

Roads or other means required for the access and removal of this timber from the harvest area(s) or unit(s) are listed in Table 6

Road ID	Segment	Harvest Unit	Mile/ Station	Road Class	Maximum Grade %	Constructed By	Maintained By
Cummings Road	1	All	4.9	Non- FRPA	2%	State	Residents
Cummings 5-Mile Forst Road	2	All	1.9	Secondary	2%	DOF	Operator
NC-1667-D Spur	3	NC-1859-D	0.6	Spur	2%	DOF	Operator
NC-1859-D Spur	4	NC-1859-D	0.1	Spur	2%	Operator	Operator
NC-1916-D Spur	5	NC-1916-D NC-1926-D	0.2	Spur	8%	Operator	Operator

Table 6. Road Construction and Use

Notes: Existing roads are listed as DOF-constructed and must be maintained as part of these timber sales. Any new road construction to access the proposed harvest areas will be constructed by the Operator to the standards set out in AFRPA and the 2016 DNR-DOF Road Standards.

\*Note: Roads must be less than 20% grade per 8 AAC 61.1060 Additional Logging Standards

#### B. Side Slopes / Mass Wasting

For slopes over 50%, identify indicators of unstable areas (landslide scars, jack-strawed trees, gullied or dissected slopes, high density of streams or zero-order basins, or evidence of soil creep). Attach location specific road design that potentially mitigates identified areas of unstable soils.

Maximum percent side slopes: <u>10%</u>

 $\boxtimes$  Maximum percent side slopes are  $\leq 50\%$ 

 $\Box$  Maximum percent side slopes are >50%

- $\Box$  There are no indicators of unstable areas where roads will be constructed
- □ Indicators of unstable areas were identified and will be mitigated by actions indicated below.
  - □ Full benching will be constructed to help ensure slope stability
  - □ Full benching is not required for roads in this project
  - □ End hauling will be implemented to help ensure slope stability
  - $\Box$  End hauling is not necessary for roads in this project.

#### General Erosion Control:

□ Grass seeding	$\Box$ Erosion control mats	□ Wattle	$\Box$ Waterbars
□ Other:		□ Not applicable	

#### **C.** Crossing Structures

Are you removing or replacing drainage structures?  $\Box$  YES  $\boxtimes$  NO

 $\boxtimes$  No crossing structures are needed within the project area.

□ Crossing structures will be placed along access roads as described in the table below:

#### Table 7. Required Drainage and Crossing Structures on Known Surface Waters

Road ID	Segment	Mile/ Station	Bridge Length (ft.)	Structure Type	AS 41.17.950 Stream Classification	ADF&G AWC Number	Duration of crossing structure in place

#### **D.** Road Closure

Roads constructed for the timber sale that are left open will be subject to maintenance standards under 11 AAC 95. 315. Otherwise, roads constructed for the timber sale will be closed, subject to standards under 11 AAC 95.320.

#### **Table 8. Road Closures**

Road ID	Segment	Unit	Closure Type All Season/Winter	Estimated Closure Date	Projected Road Use after Timber Harvest

#### E. Material Extraction

- $\boxtimes$  There will be no material extraction sites in the project area.
- □ Material extraction and associated overburden disposal will be located outside of riparian areas and muskegs. Material extraction and disposal will be located as shown on the

operation map, in a manner that prevents runoff from entering surface waters.  $\hfill\square$  Other:

#### F. Other Resources Affected by Roads or Material Extraction

List resources other than water, habitat or cultural resources potentially impacted by road construction, and indicate how impacts will be mitigated. Other affected resources could be, but are not limited to mining claims, scenic areas, recreational trails, etc.

#### Table 9. Other Affected Resources

Impacte	d Resource	<b>Reviewing Agency</b>	Impact / Mitigation Actions

# V. Approvals

This Draft Forest Land Use Plan has been reviewed by the Division of Forestry & Fire Protection and provides the information necessary for public and agency review of the project described in this document.

Kevin Breitenbach Area Forester Fairbanks-Delta Area	Date
Regional Forester Kevin Meany Northern Region	Date

#### VI. Appendix: Sale maps



