

**STATE OF ALASKA  
DEPARTMENT OF NATURAL  
RESOURCES  
DIVISION OF FORESTRY**



**FAIRBANKS-DELTA AREA FORESTRY  
PRELIMINARY BEST INTEREST FINDING AND  
DECISION FOR  
HEALY LAKE FIRE SALVAGE**

**April 26, 2016**

## **I. PROPOSED ACTION**

DOF is proposing to offer for sale approximately 452 acres of burned white spruce, birch, balsam poplar, and aspen sawtimber and fuelwood from state lands within the 2015 Healy Lake Fire perimeter, roughly 27 air miles southeast of Delta Junction, Alaska. The volume to be offered totals approximately 510,760 cubic feet (CF). DOF would sell the timber in a combination of competitive and negotiated sales for commercial use. Personal use firewood permit harvests will be facilitated through the commercial operations constructing and maintaining access to the area over the winter season(s).

The management objectives for the proposed timber sales are:

- Harvest the commercial sawtimber and fuelwood before significant loss occurs.
- Return the site to a young productive mixed stand forest to include balsam poplar, birch, aspen, and white spruce.
- Provide timber products for the industry and the state and local economy.
- Provide accessible firewood for the residential heating needs of local residents.

## **II. STATUTORY AND REGULATORY AUTHORITY**

The Division is taking this action under the authority of

- AS 38.05.035(e) Best Interest Finding;
- AS 38.05.110-120 and 11 AAC 71, Timber Sale Statutes and Regulations; and
- AS 41.17.010-950 and 11 AAC 95 Forest Resources and Practices Statutes and Regulations.

## **III. ADMINISTRATIVE RECORD**

The Division will maintain an administrative record regarding the decision of whether or not to proceed with the action as proposed. This record will be maintained at the DOF's Delta Office filed as ADL-420602.

## **IV. SCOPE OF DECISION**

This preliminary best interest finding (PBIF) is step two of a five-step process used to design, sell, and administer timber sales. This PBIF covers the sale of approximately 452 acres of burned timber on state land within the perimeter of the 11,473-acre Healy Lake Fire. The following list summarizes the overall process:

Step 1: Regional planning. The Department of Natural Resources (DNR) develops area plans and state forest management plans to designate appropriate uses for state land, classify the land accordingly, and establish management guidelines for multiple use. These plans determine where timber sales are an allowed use, and what other uses must be considered when designing and implementing sales. Subsequent land use decisions must be consistent with the area plans. The area in this PBIF is covered by the Tanana Valley State Forest Management Plan. The finding also considers the Interagency Wildland Fire Management Plan. There are no Community Wildfire Protection Plans in this area. The proposed area is not within a municipality, therefore no municipal plans apply.

Step 2: Best Interest Finding. A best interest finding is the decision document that:

- Establishes the overall area within which the timber sale may occur,
- Determines the amount of timber that will be offered for sale and the duration of the sale,

- Sets the overall harvest and reforestation strategy for the sale area,
- Determines whether the sale proposal complies with the Alaska Constitutional requirement to manage for sustained yield by evaluating the amount of timber in the sale and the annual allowable cut for the affected area,
- Selects the appropriate method of sale (i.e., competitive or negotiated sale), and
- Determines the appraisal method that will be used to determine the sale price.

The Preliminary Best Interest Finding (BIF) is intended to provide sufficient information for reviewers to ensure that the best interest of the State will be served by the proposed action.

This PBIF covers the decision to sell approximately 452 acres of burned white spruce, birch, balsam poplar, and aspen sawtimber and fuelwood from state lands within the 11,473 acre 2015 Healy Lake Fire perimeter in the form of competitive and negotiated sales for commercial and personal use. After public and agency review of the PBIF, DOF will review comments, make changes as appropriate, and issue a final best interest finding. A person affected by the final decision who provided timely written comment or public hearing testimony on the preliminary decision may appeal it, in accordance with 11 AAC 02.

Because of fire damage and the risk of additional damage from wood boring black-spotted sawyer beetles (see Stand Silviculture section, p. 6), this PBIF determines that these salvage sales are emergency sales with respect to AS 38.05.113(c) as defined by 11 AAC 71.010(d) and must be expedited to avoid loss of market value. Therefore, these salvage sales within the area covered by this PBIF do not have to appear on a Five-Year Schedule of Timber Sales prior to sale. However, whenever feasible, DOF will include sales under this PBIF in the Five-year Schedule for the Delta Area.

Step 3: Forest Land Use Plans (AS 38.05.112). Prior to authorizing harvest of timber on any area greater than 10 acres, the DOF must adopt a site-specific Forest Land Use Plan (FLUP) for the harvest area. DOF will prepare FLUPs for harvest areas within the overall sale area covered by this best interest finding. FLUPs specify the site, size, timing, and harvest methods for harvest unit within the sale area. FLUPs also address site-specific requirements for access construction and maintenance, reforestation, and multiple use management. Draft FLUPs will be based on additional field work, agency and community consultation, and site-specific analyses by the DOF, and will be subject to public and agency review.

Step 4: Timber sales and contracts. Following adoption of the final best interest finding, and completion of the FLUPs, DOF will offer the timber for sale by auctioning competitive sales and negotiating some sales with purchasers. The Division will sign a contract with the winning bidder for each sale. The contract will include stipulations to ensure compliance with the best interest finding, FLUP, and statutory requirements.

Step 5: Sale administration. DOF administers timber sales and conducts field inspections to ensure compliance with the final best interest finding, FLUP, timber sale contract, and applicable laws, including the Alaska Forest Resources and Practices Act and Regulations (AS 41.17 and 11 AAC 95), and forest management statutes and regulations in AS 38.05 and 11 AAC 71.

## V. PROJECT LOCATION, LAND STATUS, AND DESCRIPTION

### A. Location

This PBIF covers 452 acres of burned State land within the 11,473 acre perimeter of the 2015 Healy Lake Fire. The burn area is bounded by the Tanana River (south and west) and Mendas Cha-ag Native Corporation lands (north). The State owns 935 acres in the burn area. The 10,539 acres of Mendas Cha-ag Native Corporation lands, inclusive to the fire perimeter, is excluded from the sale proposal.

The project is located between the Tanana River and Healy Lake within Sections 3, 4, 5, 6, 7, and 8 of Township 12 South, Range 15 East and Section 36 of Township 11 South, Range 14 East, Fairbanks Meridian, Alaska.

This area is found on USGS quads: Mt. Hayes D-2 (see attached maps).

### B. Title status

The timber salvage area is within the TVSF on General Selection land within two townships. There are no title restrictions on the parcels proposed for salvage harvest. The acquisition authority and land classification are as follows;

<b>Township, Range, Meridian</b>	<b>Acquisition Authority</b>	<b>Classification Order</b>	<b>Land Use Plan</b>
T 12 S, R 15 E, F	GS-809	NC-82-065 Forest	TVSF
T 11 S, R 14 E, F	GS-795	NC-82-065 Forest	TVSF

### C. Land use planning, classification, and management intent

The proposed area is within the Tanana Valley State Forest subunit 10C. There are no specific restrictions stated in the TVSF management plan that are applicable to this proposed project. Guidelines for special management zones do apply for the Tanana River including side channels, sloughs, and backwaters. The area is accessed using secondary roads via the Cummings Road. The proposed harvest units are designed to be consistent with the intent of the plan. The area is open to subsurface use and mineral entry.

The Interagency Fire Management Plan includes these lands in the “Full” protection category.

No municipal plans apply – this area is not within a municipality.

### D. Current access and land use:

This area is currently accessed via a winter crossing of the Tanana River in the area of Cummings Landing located at 6 mile Cummings Road. The proposed fire salvage areas are both west and east of the Tanana River.

Recreational use of the proposed timber salvage areas occurs primarily in winter due to seasonality of the access. Winter roads that were constructed during previous harvest activities provide primary access. Residents of the Cummings Road area use the winter road system primarily for snow mobile access of the area.

A few trap lines and recreational trails are within the general vicinity. Local residents and hunters from throughout the state use this area for sport hunting. Sport fishing occurs on Healy Lake and along the Tanana River.

## **E. Background and description of proposal**

1. Background: The Healy Lake Fire burned 11,473 acres of state and native corporation land east of Delta Junction in the summer of 2015. Following the fire, DOF reviewed existing land use plans, considered markets for the burned timber, and designed this proposal to salvage as much timber as possible from state land within the burn perimeter, while protecting the fish, wildlife, and water resources, and avoiding impacts to local access, recreation uses and archaeological sites.
2. Timber volume and sustained yield: The project area has an estimated volume of 510,760 cubic feet of white spruce, birch, and aspen sawtimber and fuelwood on approximately 452 acres of land. The Delta Area Annual Allowable Cut (AAC) is calculated at approximately 5,000 acres of harvest annually. The Sustained Yield (SY) volume is calculated at over 5,200,000 cubic feet annually. Harvest duration for this proposal is expected to occur over a 10 year period. This action alone or in combination with timber sales (proposed or sold) will not exceed the Delta AAC or SY volume due to the proposed harvest duration or anticipated sale schedule.
3. Harvest unit design: Unit size is anticipated to range between 0.5 acres and 100 acres. Sale unit boundaries will be located along the fire perimeter and naturally occurring vegetative type changes within the burn. A 330-foot buffer, external to the fire perimeter, may be harvested to include fire damaged timber or to provide strategic management options to minimize pest or windthrow mortality.

The sale areas will be designed to encourage harvest of all species and sizes of burned trees within the designated harvest units. All harvests, commercial and personal use, shall be managed on the landscape with the intent to minimize impacts to the designated uses listed in the Tanana Valley State Forest Management Plan. Harvests will be subject to the Forest Resources and Practices Act and regulations.

4. Reforestation: Passive, natural, reforestation will be used due to expected recolonization of the area by hardwood species. Birch is expected to establish in the upland locations and aspen and balsam poplar will recolonize the lowland and moist sites. White and black spruce will naturally regenerate as well, but due to their initial slower growth these trees will remain in the understory until they reach adequate size and are able to compete with the hardwoods. This methodology has been proven to be a successful burn area reforestation strategy in the Delta area as evidenced on the Carla Lake, Gilles Creek, and Camp Creek fires.

Supplemental planting of burn areas is typical where inadequate seed banks are known to exist or a species conversion is used in order to mitigate an areas fuel hazard rating. Neither of these needs exist in the proposed area.

5. New access design and construction: Roads constructed during timber harvest operations are designed and utilized as temporary access routes to conduct specific silvicultural ac-

tivities on the land. Ancillary use of the roads by the general public occurs, but must be managed as a matter of safety during silvicultural operations or to protect the resource values of the area. Proposed forest access roads will initially be constructed to a secondary winter road standard. The roads will be constructed by removing the trees and vegetative mat. Roads will be constructed using cut and fill excavation with earth moving equipment producing running surfaces 12-16 feet wide.

Proposed road locations are generally on flat and/or rolling topography with low potential to erode during spring break-up and rainy weather. Roads will be built and maintained consistent with the best management practices in the Alaska Forest Resources and Practices regulations (11 AAC 95) and Tanana Valley State Forest Management Plan (Appendix A).

Timber sale contracts will require measures to prevent erosion including installation of water bars, sediment barriers, fiber mats, and placement of culverts where needed. The proposed access routes do not cross any streams, but will cross seasonal drainages. Culverts, rolling dips or water bars will be placed or constructed where necessary to prevent erosion.

Secondary access roads that could be used for future harvests of unburned timber will be maintained as inactive roads following initial harvesting. These roads will be closed to highway vehicles at the beginning of the road and maintained to prevent erosion. Any roads that will not be necessary for future timber sales will be permanently closed after reforestation efforts are completed. Road maintenance and road closure actions will be conducted consistent with the best management practices in the Forest Resources and Practices regulations.

DOF proposes to extend access by constructing spur roads from the existing winter roads. The attached map shows approximately 3 miles of preexisting road and 4 mile of proposed new road. It's doubtful that all areas will be accessed and harvested.

Preliminary information regarding the burned area indicates access development for harvesting on terraces north and east of the Tanana River. Final mainline road locations will be determined after further ground and aerial reconnaissance associated with specific FLUP(s) development. Access will be designed and operated to not hinder the use of any public trail easements.

6. Appraisal method: The units will be a mix of commercial timber sales and private personal use cutting areas. Commercial sales will be based on transactional evidence and market demand and DOF will apply a value for those products. Personal use cutting will utilize the existing Delta Area Firewood Online Permitting System. DOF will appraise the timber value in compliance with 11 AAC 71.092.

## F. Resources and management

1. Timber stand composition and structure: The forest stands to be salvaged were a mixture of fully mature white spruce, aspen and birch 31% sawtimber and 69% poletimber prior to the 2015 fire. There were some stands of young white spruce, birch, balsam poplar, and aspen, but most of the burned area had mature forested stands. An estimated 57% of the stands were composed of hardwood species, 33% spruce, and 10% mixed spruce hardwood. The forested stands surrounding the proposed project area comprise a variety of stand mixtures including mature white spruce, black spruce, birch, and aspen.
2. Stand silviculture: The fire burned from June 16<sup>th</sup> through August 23, 2015. White spruce damaged by fire before August attracts infestations of the large white spotted sawyer. These are large black flying insects with a small white patch on the back behind the head and long black antenna. They are common in the Tanana Basin during July. The beetles can be easily heard boring holes to lay larvae that will hatch next summer. White spruce with large beetle infestations will be riddled with 3/8" sized holes in the wood, devaluing its marketability by fall of the next year. Due to the late fire occurrence, damage from these boring insects may be minimal in 2015 but damage is certain in the summer of 2016, reducing the white spruce to fuelwood use exclusively.

A mature stand of burned spruce or mixed spruce and aspen/birch typically reforests to aspen or birch as the primary species after the fire. Birch and aspen stands typically recolonize burned areas within 4-6 years. The mechanics of how white spruce reforests after a fire are not well understood. In this fire, there were many proposed salvage areas that had a low intensity ground fire or "under burn" and some that burned intensely with crown fires.

3. Topography and Soils: The proposed project area is on the flood plain and uplands that extend from the 1,000-1200 foot elevation in the Tanana River drainage to 1,750-foot elevation ridge tops. Slopes within the project vary from flat to 40% with the average being about 2%. Soils are sandy loess loams near the surface over glacial till and gravels that start about 0.5-2 feet below the surface.
4. Agriculture: Agricultural lands and uses occur on private lands south of the salvage area. There is no current agriculture activity in the area and activities in the sale units are not expected to affect these agricultural uses.
5. Wildlife habitat and harvest: Most common species of wildlife that are normally found in interior Alaska forests inhabited the area prior to the fire. Large animal species may be displaced from the burn areas until sufficient hiding, thermal cover and sufficient browse is available. Timber harvest in burn areas is not expected to diminish available cover for these species. There is a potential for moose forage on hardwood regeneration in fall (leave stripping) and winter (browsing), which in extreme cases can accelerate or facilitate transition from hardwoods to conifers possibly reducing biomass yield in the short term. Timber harvest may reopen areas for hunting access as most of the burn areas are covered by wind blowntrees.

Small animal species typically recolonize a burn area quickly. Long-time trappers have stated that some of the best trapping can occur in burn areas, especially for lynx and fox

due to the resulting high vole populations. Grouse and other birds use new growth in the burn areas for food and habitat as well.

Hunting and trapping occur in the area. Active trap lines are located in the vicinity of the proposed salvage areas. Historically, there has been significant hunting activity in the area due to relatively high moose density and close proximity to Delta Junction.

6. Fish habitat and harvest, water resources, and water quality: The proposed sale will be designed and managed to protect fish habitat and water quality in compliance with the Forest Resources and Practices Act and regulations (AS 41.17 and 11 AAC 95) . A 100 foot buffer will be maintained along sloughs and channels of the Tanana River, a Type III-A waterbody, with the intent to maintain a short and long term source of large woody debris.
7. Recreation, tourism, and scenic resources: General recreational use of the proposed timber salvage areas is low or non-existent during the summer months due to the seasonality of the access. Winter recreational use of the area is low to moderate. Access to the project area is available due to winter roads that were constructed during previous harvest activities. Local residents use the winter roads by snow mobile.

Multiple trap lines and recreational trails are within the general vicinity. If any trails are encountered during road construction contractors will provide for trail crossings as well as post warning signs along the road.

There is no known tourism in the proposed salvage area.

8. Cultural Resources: DOF has been working with the State Historic Preservation Officer (SHPO) to identify and avoid known cultural, historic or prehistoric sites in planning the proposed access routes and salvage areas. If additional archaeological sites are identified, proposed salvage areas and road locations will be appropriately adjusted to avoid conflicts. If any historic or archaeological sites are encountered during road construction or harvest activities, DOF will immediately inform SHPO and take action to protect the findings.
9. Subsurface Resources: There are no mining claims in the proposed project area.

## **G. Costs and benefits**

No significant negative economic effects are anticipated upon the timber markets, local or regional, as result of this proposed action. Salvage of the proposed timber volume may provide a short-term benefit to the local economy due to the availability of low-cost fuel for home heating and jobs in timber harvesting.

Public use firewood demand on this area is expected to be quite high during the winter access period. The Division will continue to issue general use permits and designate areas for personal use sales within the salvage area boundary. Commercial timber salvage harvest operations will provide winter road maintenance facilitating public access to the salvage areas. DOF will need to monitor firewood harvesting operations because of the strong possibility of illegal harvesting. DOF may have to close roads that are shared by commercial and personal use sales with temporary gates to prevent unauthorized harvest.

## **VI. PUBLIC REVIEW**

The public and agencies are invited to comment on this Proposed Best Interest Finding. Objections or comments pertaining to the proposed action must be received in writing by the DOF Fairbanks Area Office **by 4:30 PM on Friday May 27, 2016**, in order to ensure consideration for review. Comments should be mailed to the State of Alaska, Division of Forestry, Fairbanks Area Office, 3700 Airport Way, Fairbanks, Alaska, 99709 or by email to [paul.keech@alaska.gov](mailto:paul.keech@alaska.gov). Fairbanks Area Office phone number is 907-451-2600. To be eligible to appeal the final decision, a person must have provided written comment by **4:30 PM on Friday May 27, 2016**.

## **VII. PUBLIC NOTICE**

This PBIF will be publicly noticed in compliance with AS 38.05.945. Notice will be posted on the Alaska Online Public Notice System (<http://aws.state.ak.us/OnlinePublicNotices/>) the Forestry Timber website (<http://forestry.alaska.gov/timber/delta.htm#contract>), and the Delta Wind newspaper.

A person is eligible to participate in any appeal to the final finding if s/he has submitted comment to the preliminary finding and decision during the comment period.

If you have any questions, please contact Paul Keech, Fairbanks-Delta Area Forester, at [paul.keech@alaska.gov](mailto:paul.keech@alaska.gov) or 907-451-2601.

## **VIII. ALTERNATIVES AND DISCUSSION**

There are four possible alternatives to consider for this project area. A discussion of each of the four alternatives follows. All alternatives are consistent with the area plan and applicable statutes and regulations.

### **A. Conduct the project as proposed:**

This alternative meets the objectives for timber salvage prior to loss of economic value, returning the site to a young productive mixed forest, providing commercial timber products. It will also provide fuelwood to the local area and commercial dry firewood to the Delta/Fairbanks markets. Additional employment opportunities will occur associated with salvage operations saw milling and value-added processing.

### **B. Modify the project by making it smaller or larger**

The estimated volume and acreage of timber to be salvaged from the Healy Lake Fire Salvage as stated in this Best Interest Finding is designed to accommodate the existing market in the vicinity of Delta Junction as well as provide commercial fuelwood to the Fairbanks area. There is little opportunity to increase the size of the proposed project because most of the commercial sized timber was included in this proposal. Some commercial stands were left out of the proposal due to access development costs. Decreasing the size of the project would potentially waste valuable timber that was burned that could be used in the local economy in the next 1-10 years.

### **C. Defer the project to a later date:**

Deferring harvest to a later date would result in lost timber value. Burned timber degrades rapidly due to subsequent infestations of insects, sap rot, wind throw and checking. The value of the timber could drastically decline within the next 12 months for both the industry and the State. Access to the salvage area is only during the winter months; delaying this project would not allow the timber industry to utilize the available sawtimber and the local area residents would not have access to firewood that is in extremely high demand.

## **IX. RECOMMENDATION AND PRELIMINARY DECISION**

After due consideration of all pertinent information and alternatives, the DNR has reached the following Preliminary Decision: To offer for sale approximately 452 acres of fire salvage timber to provide sawtimber, fuelwood and personal use firewood to Delta Junction and the surrounding area as proposed in Alternative A and described in this PBIF. The DOF finds that this preliminary decision satisfies the objectives stated in this document and it may be in the best interest of the State to proceed with this action under its authority of AS 38.05.035(e) (Powers and Duties of the Director) & AS 38.05.110-120; 11 AAC 71 (Timber Sale Statutes and Regulations).

In addition, the Division finds that salvage sales within this area are emergency sales with respect to AS 38.05.113 (Five-year Schedule of Timber Sales) as defined by 11 AAC 71.010(d). These sales must be expedited to avoid loss of market value of timber that has been damaged by fire. I find that this proposed action may be in the best interest of the State, and approve it to proceed to public notice.

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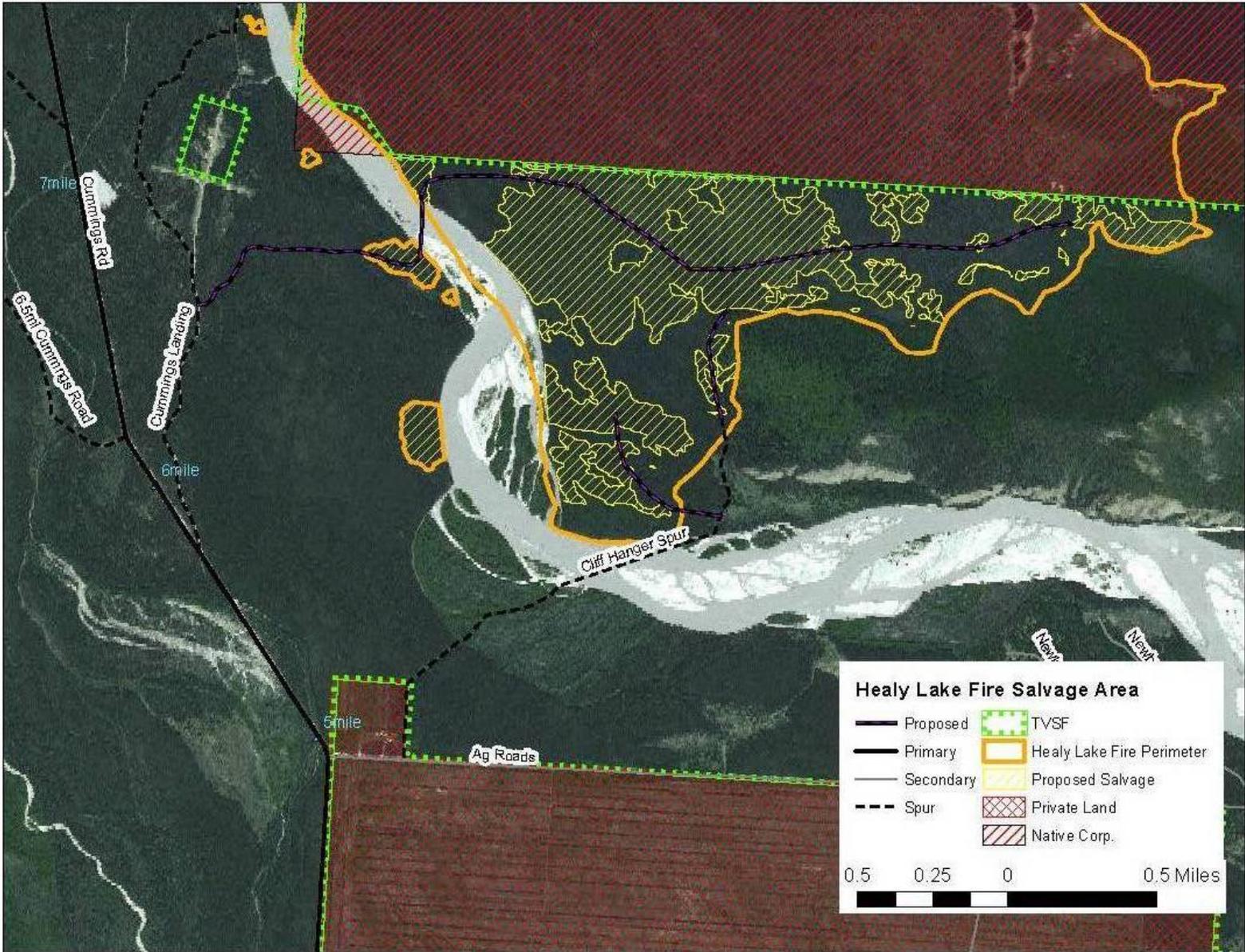
John "Chris" Maisch, Director  
Alaska Division of Forestry

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Date

## **X. ATTACHMENTS**

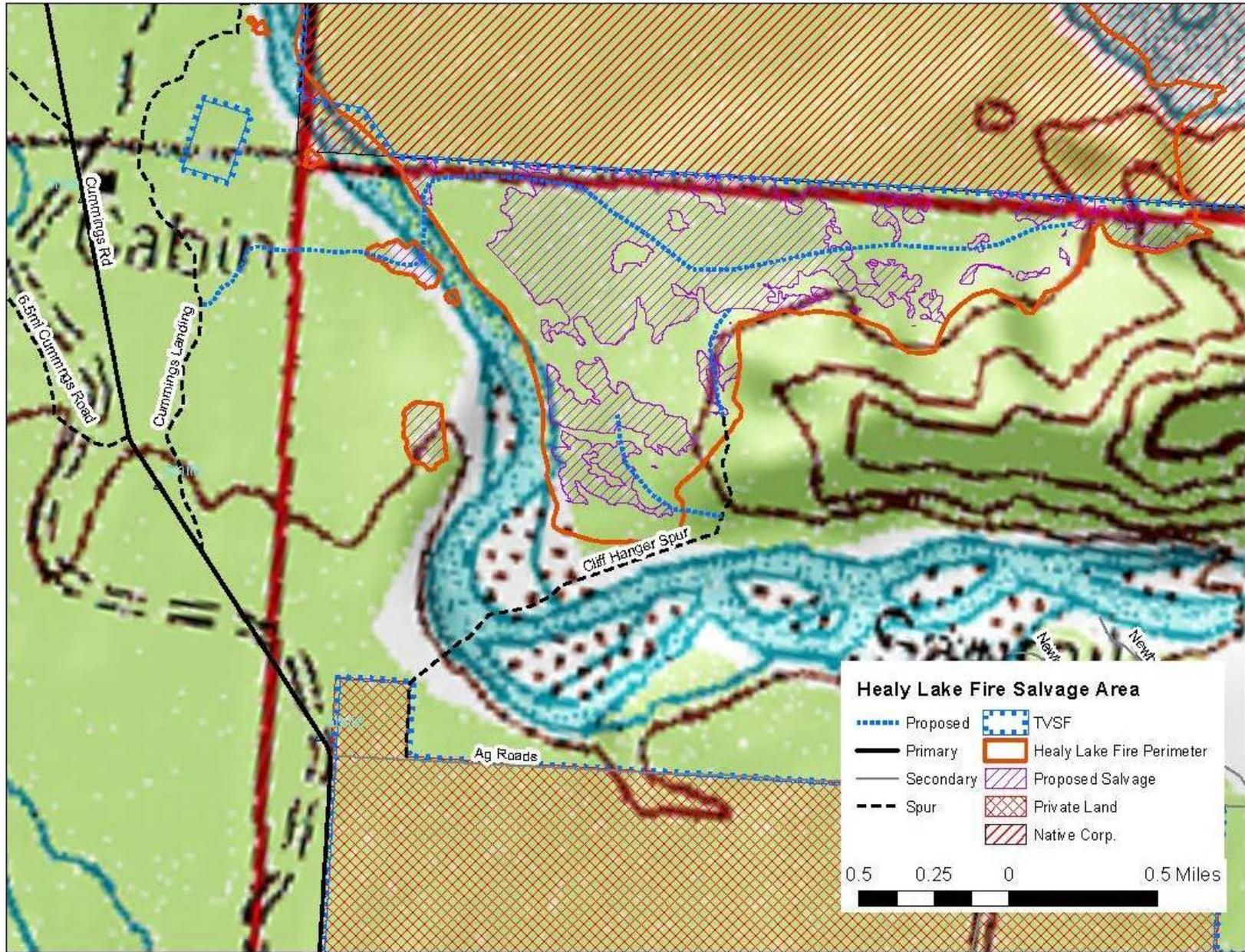
Maps: Spot Imagery and Topographic  
Appendix A: Tanana Valley State Forest Road Specifications



**Healy Lake Fire Salvage Area**

— Proposed	TVSF
— Primary	Healy Lake Fire Perimeter
— Secondary	Proposed Salvage
- - - Spur	Private Land
	Native Corp.

0.5    0.25    0    0.5 Miles



**Healy Lake Fire Salvage Area**

- Proposed
- Primary
- Secondary
- Spur
- TVSF
- Healy Lake Fire Perimeter
- Proposed Salvage
- Private Land
- Native Corp.



