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December 30, 2024

Objection Reviewing Officer

USDA Forest Service

Northern Region

26 Fort Missoula Road

Missoula, MT 59804

**RE: OBJECTION AGAINST THE CYCLONE BILL PROPOSED
PROJECT.**

1. Name of Objectors

Lead Objector Sara Johnson, Director, Native Ecosystems Council, PO Box 125, Willow Creek, MT 59760; phone 406-579-3286; sjohnsonkoa@yahoo.com.

Mike Garrity, Director, Alliance for the Wild Rockies, PO Box 505, Helena, MT 59624; phone 406-459-5936; wildrockies@gmail.com.

Steve Kelly, Director, Council on Wildlife and Fish, PO Box 4641, Bozeman, MT 59772; phone 406-920-1381; troutcheeks@gmail.com.

ST for

Jason Christensen, Director, Yellowstone to Uintas Connection, PO Box 363, Paris, ID 83261; phone 435-881-6917; jason@yellowstoneuintas.org.

ST for

Kristine Akaland, Senior Attorney, Center for Biological Diversity, PO Box 7274, Missoula, MT 59807; phone 406-544-9863; kakland@biologicaldiversity.org.

Signed for Objectors this 30th day of December, 2024


Sara Johnson

2. Name and Location of Project being Objected to.

Cyclone Bill Project on the Tally Lake Ranger District of the Flathead National Forest.

3. Responsible Official

Bill Mulholland, District Ranger, Tally Lake Ranger District

4. Connection between Previous Comments and Information Provided in the Objection

Native Ecosystems Council, the Alliance for the Wild Rockies, Yellowstone to Uintas Connection, and Center for Biological Diversity submitted scoping comments for the Cyclone Bill project on April 3, 2023. Subsequently, Native Ecosystems Council, the Alliance for the Wild Rockies, and Council for Wildlife and

Fish submitted 30-day comments for the proposed Cyclone Bill project on 9/16/24. In the scoping comments, the following issues were raised: failure to manage for old growth habitat for wildlife, failure to manage snag habitat for wildlife, failure to evaluate adverse impacts of clearcutting on wildlife, failure to complete valid wildlife surveys, failure to meet the 2012 planning rule requirements to provide conservation strategies for Species of Conservation Concern (SCC), failure to manage roads to promote conservation of the threatened grizzly bear, failure to manage habitat for the threatened lynx, including critical habitat, by the current best science, and a failure to define project an cumulative impacts on big game species by the current best science. We also identified a host of violations of the Flathead Revised Forest Plan, violations that require Forest Plan amendments, including destruction of old growth through logging and fuels treatments, and a failure to develop conservation strategies for SCC. Amendments are also needed in order for the agency to implement a valid conservation strategy for a host of wildlife species dependent upon forested snag habitat as well as old growth forests. An analysis is also required in the Forest Plan for the impact of clearcutting of any size on wildlife species, as this is absent in the current FEIS. An amendment is also needed that requires the agency to complete valid wildlife surveys for projects, in order to define "baseline conditions" for wildlife. The agency also needs to amend the Forest Plan so that adverse impacts are prevented on grizzly bears in Zone 1 habitat, as well as demographic connectivity areas.

Once again, in our 30 day comments on the proposed Cyclone Bill project, we requested that the agency provide documentation that logging old growth retains its values to wildlife. We also requested that the agency address ongoing monitoring for wildlife, including those associated with old growth. WE noted also that the Forest Plan Desired Condition (DC) both large and very large trees and for coarse woody debris will be violated, and this should be corrected. We noted that there was no inventory for snags, in spite of an indicated shortage of such in this project area. This baseline information is essential in order for the public to understand current conditions, as well as what to expect with additional treatments. A Forest Plan amendment is required in order for the direction for snags to be changed. This amendment requires that the agency develop a valid

snag management strategy, instead of simply carrying forward the same strategy applied in the previous planning period, where no impacts on wildlife were ever monitored to justify this continued application. We noted that the required surveys for the black-backed woodpecker, flammulated owl, golden eagle and northern goshawks had not been done. This information needs to be provided to the public to demonstrate how these species are being managed in this landscape, prior to a decision being made on this project. We noted that the Forest Plan direction for white-tailed deer is vague, yet "suggests" to the public that key thermal cover will be maintained for this species. Since thermal cover is not actually being managed for as per the current best science, this Forest Plan direction provides false, misleading information to the public as to how the agency is managing this species. There is a similar problem with elk management. Again, the agency is providing false information to the public about how elk will be managed (effects of road, loss of cover, impacts on elk security, increases in elk vulnerability), as none of the current best science is being applied to elk management. By using fake or no science, the agency is concealing significant adverse impacts to elk for this project. The agency is also providing false analysis information on project impacts on grizzly bears, because increases in total roads are being allowed but not accounted for. As well, the agency is providing the public false information on the amount of grizzly bear security that occurs in the project area and bear subunit/unit. As a result, the project and cumulative impacts the project will trigger on this threatened species are concealed from the public. In addition, the agency appears to be relying on an invalid Biological Opinion from the U.S. Fish and Wildlife Service to justify project decisions. The project impacts to the threatened wolverine are being deliberately under-reported by a failure to identify road and total densities as adverse impacts on this species. The agency also failed to evaluate how past and ongoing, planned projects will increase local forest temperatures, potentially exceeding the thermal tolerance for wolverines for portions of the year, making these areas unusable for this species. The agency is also using an invalid BiOp for planning management of lynx habitat. Both the USFWS and the Forest Service have used invalid, outdated science to evaluate current and proposed conditions for lynx. The analysis methods for lynx also do not address the loss of snowshoe hare habitat due to logging and fuels management activities. In addition, the agency is violating Forest Plan direction for maintaining lynx habitat connectivity. In addition, the agency

has failed to monitor the trend of lynx populations in order to demonstrate that the Northern Rockies Lynx Management Direction (hereafter "Lynx Amendment") is promoting conservation of the lynx. The proxy for measuring effectiveness of the Lynx Amendment is invalid, as it measures the exceptions and exemptions allowed in lynx habitat, which has no relevance to population trend. There was also no analysis of project or cumulative impacts on 67 species of western forest birds. This failure includes the lack of analysis of any direct impacts of vegetation treatments on local climate conditions, which will be increasingly adverse due to deforestation effects. These adverse effects will add to other adverse impacts from habitat loss (nesting sites, thermal cover, hiding cover, increased nest parasitism) and direct and indirect killing from cutting down nesting trees and killing birds due to smoke toxicity. The direct effects of climate change need to be evaluated for all wildlife species, not just birds, including the wolverine, and pollinators. The direct impacts of deforestation on almost all wildlife species will clearly be adverse, reducing population potential for almost all species and pollinators, and without such an analysis, the agency is failing to take a "hard look" at the proposed management strategy.

5. Attachments

This Objection includes Appendix A, that has hard copies of 77 publications and/or reports cited in the Objection. Appendix B includes a map of lynx sightings on the Tally Lake Ranger District from 1977-2021, a tabular summary of 8 past recent logging activities on the Tally Lake Ranger District, and project maps and proposed actions for these 8 projects. The Oettiker Project identified in the Cyclone Bill Project EA at pages 80, 83 and 103 was not included.

6. Remedy

Due to the violations of the National Forest Management Act (NFMA), the National Environmental Policy Act (NEPA), the Administrative Procedures Act (APA), the Bald and Golden Eagle Protection Act, the Migratory Bird Treaty Act, (MBTA), and the Endangered Species Act (ESA), that will be discussed below, we

believe that the Cyclone Bill Project needs to be withdrawn. Further action on this site-specific project requires that multiple analyses and amendments are required to the Flathead Revised Forest Plan be completed first. Also, valid BiOp for both the grizzly bear and lynx need to be finalized.

7. Violations of Laws and/or Policies that will occur if the Cyclone Bill Project is implemented

A. The proposed Cyclone Bill Project will trigger violations of the National Environmental Policy Act (NEPA), the National Forest Management Act (NFMA), the Administrative Procedures Act (APA), the Bald and Golden Eagle Protection Act, the Migratory Bird Treaty Act (MBTA), and the Endangered Species Act (ESA).

1. The Flathead Forest Plan does not evaluate or define how proposed vegetation management projects will impact 73 species of birds that inhabit conifer and deciduous/mixed conifer forests on the Flathead Forest, including many species that are identified as a conservation concern.

We estimate that approximately 73 species of forest birds are present on the Flathead National Forest, latilong 2 as per Skaar's Montana Bird Distribution, Fifth Edition, March 1996. These include 44 species that select predominately coniferous forests:

Vaux's Swift, Lewis Woodpecker, Hairy Woodpecker, Three-toed Woodpecker, Black-backed Woodpecker, Northern Flicker, Pileated Woodpecker, Olive-sided Flycatcher, Hammond's Flycatcher, Cassin's Finch, Evening Grosbeak, Gray Jay, Stellar's Jay, Williamson's Sapsucker, Mountain Chickadee, Red-breasted

Nuthatch, Chestnut-backed Chickadee, Pygmy Nuthatch, Brown Creeper, White-breasted Nuthatch, House Wren, Winter Wren, Ruby-crowned Kinglet, Townsend's Solitaire, Hermit Thrush, American Robin, Varied Thrush, Solitary Vireo, Yellow-rumped Warbler, Townsend's Warbler, Wilson Warbler, Orange-crowned Warbler, Western Tanager, Chipping Sparrow, Black-headed Grosbeak, Pine Grosbeak, Dark-eyed Junco, Oregon Junco, Brown-headed Cowbird, Red Crossbill, White-winged Crossbill, Pine Siskin, Boreal Chickadee, and Clark's Nutcracker.

Another 15 bird species are more strongly associated with mixed conifer/deciduous habitats, including in riparian areas:

Dusky Flycatcher, Least Flycatcher, Lazuli Bunting, Red-naped Sapsucker, Downy Woodpecker, Tree Swallow, Cordilleran Flycatcher, Western Wood-Pewee, Veery, Cedar Waxwing, Black-capped Chickadee, Warbling Vireo, Rufous Hummingbird, Violet-green Swallow, and Calliope Hummingbird.

Another 14 western forest bird species are forest raptors, including:

Golden Eagle, Cooper's Hawk, Flammulated Owl, Barred Owl, Northern Goshawk, Red-tailed Hawk, American Kestrel, Sharp-shinned Hawk, Great Horned Owl, Great Gray Owl, Boreal Owl, Northern Pygmy-Owl, Northern Saw-whet Owl, and Northern Hawk Owl.

This brings the total estimated number of western forest birds that will be impacted by vegetation/fuels treatments to $44 + 15 + 14 = 73$ species.

There is no analysis in the Flathead Revised Forest Plan (FRP) on how these 76 forest species will be maintained during the upcoming planning period. The RFP and the associated Final Environmental Impact Statement (FEIS) state that via the

“coarse filter” management approach, viability and species diversity is assured. **No analysis in the FNF RFP was ever provided to support this contention that 73 forest bird species will remain viable as the vegetation management program is implemented on the FNF. This is a conclusion without supporting documentation.**

The coarse filter management regime for the FNF does not include any specific management for 29 forest birds associated with old growth (USDA 2018; USDA 1990):

Vaux’s Swift, Lewis Woodpecker, Hairy Woodpecker, Three-toed Woodpecker, Black-backed Woodpecker, Pileated Woodpecker, Chestnut-backed Chickadee, Red-breasted Nuthatch, White-breasted Nuthatch, Townsend’s Warbler, Pygmy Nuthatch, Brown Creeper, Hammond’s Flycatcher, Winter Wren, Golden-crowned Kinglet, Swainson’s Thrush, Hermit Thrush, Pine Grosbeak, Varied Thrush, Northern Goshawk, Flammulated Owl, Boreal Owl, Saw-whet Owl, Barred Owl, Northern Pygmy Owl, Williamson’s Sapsucker, Red-naped Sapsucker, Vaux’s Swift, and Great Gray Owl.

In fact, the FNF RFP does not require the retention of any old growth, as all old growth can be logged down to several larger trees per acre. The minimum criteria in Green et al. (1991) for most old growth types require only a few large trees per acre. This number of trees would be provided in all commercial types of logging proposed for the Cyclone Bill Project. As per Table 4 in the project EA, a clearcut and seed tree cuts require only up to 20 trees/acre. The stand canopy cover can be reduced down to 5% in a shelterwood cut, and down to 30% in commercial thins, improvement cuts, thin-from-below cuts, and prescribed burning. Thus the stand characteristics can be significantly changed in old growth with any of the proposed harvest methods. The FNF RFP does not evaluate how any of these harvest methods will affect the quality of 29 bird species associated with old growth forests. As such, the agency cannot demonstrate that logging old growth will maintain values for wildlife, and thus, still qualify as old growth habitat. **The FNF RFP provides false information to the public as to how their management of old growth habitat, and the 29 bird species that depend upon this old growth**

habitat, will be managed; there is a failure to disclose old growth forests will be reduced on 1,380 acres with project activities, including burning of 795 acres, logging 272 acres, and understory removal on 313 acres (Appendix A at 36).

The current best science recommends from 20-25% old growth for the Pileated Woodpecker (Bull and Holthausen), the Northern Goshawk (Reynolds et al. 1992), and for forest birds (Montana Partners in Flight 2000). The RFP claims vegetation management will restore the Natural Range of Variation (NRV). However, the historical levels of old growth in the Northern Rocky Mountains is 20-50% (Lesica 1996). This RNV is not included in the FNF RFP; current old growth on this national forest is only about 9%, or well below the NRV. McKelvey et al. (1999) used techniques similar to those of Lesica (1996) to estimate historical ages of vegetation in the Northern Rockies, and reported that up to 51% of forests could have been over 200 years in age, based on fire return intervals, with a minimum level of these older forests being 13%.

The Cyclone Bill project EA provides false information to the public on current levels of old growth in the project area. The current level of old growth in the Cyclone Bill project area is claimed to potentially be 18%, although no actual surveys were provided. This is stated to be 5,900 acres in the EA at page 20, for the 33,015 acres of public lands in the project area. This level of old growth is not defined by PVTs, as per the RFP. For the warm-dry PVT, old growth is stated to be 9.5% (Table 8 of RFP), and for the cool-moist PVT, it is stated to be 10.9%. It is highly unlikely that the current level of old growth in the Cyclone Bill project area, where 40% of the landscape has been commercially logged, is 18%. **The agency has failed to provide the actual baseline conditions for old growth in the project area.**

The agency needs to provide a valid assessment of current old growth in the project area, a valid assessment of why logging/burning old growth maintains the habitat values for 29 forest bird species, since no such analysis exists in the RFP FEIS. This assessment is necessary in order for the agency to demonstrate they

are adhering to the FNF RFP, which states that old growth forests will be maintained or increased.

The coarse filter regime of the FNF RFP also does not include any valid habitat management for 27 species of western forest birds that require cavities within snags, or nest on top of snags (USDA 2018), including:

Vaux's Swift, Lewis Woodpecker, Red-naped Sapsucker, Hairy Woodpecker, Downy Woodpecker, Three-toed Woodpecker, Black-Backed Woodpecker, Northern Flicker, Pileated Woodpecker, Tree Swallow, Violet-green Swallow, Black-capped Chickadee, Mountain Chickadee, Chestnut-backed Chickadee, Boreal Chickadee, Red-breasted Nuthatch, White-breasted Nuthatch, Winter Wren, Pygmy Nuthatch, Brown Creeper, House Wren, Mountain Bluebird, American Kestrel, Flammulated Owl, Northern Pygmy Owl, Northern Saw-whet Owl, and Great Gray Owl.

The FNF RFP has general direction to maintain some number of snags in Potential Vegetation Types (PVTs), but these can be substituted with green trees. Table 44 at 146 in the RFP for the Salish Mountains GA requires 13 snags per acres over 10 inches dbh, and 2 per acres over 20 inches dbh in the Warm-dry PVT, and 10 snags per acre over 10 inches dbh and 2 per acre over 20 inches dbh in the Cool-Moist PVT. For lodgepole pine, there are 7 snags per acre over 10 inches dbh, and 1 snag per acre over 20 inches, in the lodgepole pine types. These snag "recommendations" differ from those identified for the Cyclone Bill project in the EA at 35. The reason for this difference is not known, but appears to be an invalid change to the RFP.

AS per the cumulative effects summary presented in the Project's Appendix B, there have been 8 past logging projects in this project area, on 13,409 acres. This is 40% of the Forest Service lands in the project area of 33,015 acres. This is likely what the Cyclone Bill project EA at 20 notes that larger sized trees are lacking in

the project area, and areas without any snags exist. Yet there is no inventory provided for the number of snags and their sizes for the 33,015 Forest Service acres in the project area. **Thus the baseline conditions for snags, and the 27 bird species that require snags as habitat, are never provided by the agency.**

The FNF RFP snag direction is invalid, as it has never been demonstrated to ensure viability of 27 snag-dependent bird species. There is first, no actual number of snags required in harvest units. AS such, the number of snags in a harvest unit cannot be used as a “proxy” for bird populations, as green trees can be substituted for snags. Even if the targeted number of snags per harvest unit is actually met, these numbers have no relationship to bird populations. The FNF RFP does not include any analysis as to why targeted numbers of snags, if in fact they are retained in harvest units, will maintain suitable habitat for forest birds that require snags. This snag management strategy was identified as invalid many years ago, including by a Forest Service research article (Bull et al. 1997). Large blocks of undisturbed forests, including those infested with insects, is required to maintain woodpeckers (Goggans et al. 1989), which in turn create needed nesting cavities for other birds (Bull et al. 1997).

It has also become evident in recent research that as few as only 4% of snags are suitable for cavity construction (Vizcarra 2017). Even if snags left in harvest in units could be used by a limited number of forest bird species, due to a lack of thermal cover, hiding cover, and forage (Bull et al. 1997, Goggans et al. 1989), almost none of these snags will actually provide cavities for wildlife. Add to this failure of a bird conservation strategy is the fact that any snags left in harvest units will have very short lives, due to blow-down. And there will be a very limited pool of older trees that can become snags in a harvest unit. For clearcuts, it will be likely 100 years before new larger snags are created. For other types of harvest units, snag recruitment will be very limited, due to the limited pool of larger trees available for snag creation, as well as the reduced mortality of these remaining trees due to forest thinning (reduced competition), and fewer insect and disease problems. **Thus the FNF RFP strategy for maintaining 27 forest birds that rely on snags is simply a smoke-screen that allows the agency to falsely present to the**

public that these 27 forest birds that require snags are actually be maintained, when this is clearly false.

In order for the Forest Service to demonstrate to the public that 27 forest bird species that rely on forested snag habitat for viability are in fact being maintained by the agency, as is required by the NFMA and the MBTA, the Cyclone Bill EA needs to provide a valid baseline inventory of the acres of older forests that contain larger snags, or in fact, provide habitat for these species. What percentage of this suitable forested snag habitat is expected to be required to ensure these species remain occupying this landscape? Is this level being provided, and if not, why aren't significant impacts currently occurring?

1,000 acres). And a Forest Service publication, Bull et al. 1997, noted that most cavity-nesting birds also require forested habitat surrounding a snag. Yet the FNF continues to manage these 25 bird species that depend upon snags with an invalid strategy of protecting no actual number of snags per acre.

The FNF RFP also does not require any conservation measures for a host of western forest birds that require large conifer seed crops for survival and reproduction. The following 22 species of western forest birds use conifer seeds as forage (Smith and Balda 1979; Smith and Aldous 1947; Dobkin 1992):

Clark's Nutcracker, Hairy Woodpecker, Gray Jay, Stellar's Jay, Mountain Chickadee, White-breasted Nuthatch, Red-breasted Nuthatch, Pygmy Nuthatch, Red Crossbill, Pine Siskin, Red-shafted Flicker, Lewis's Woodpecker, Winter Wren, American Robin, Evening Grosbeak, Brewer's Blackbird, Evening Grosbeak, Pine Grosbeak, American Goldfinch, Dark-eyed Junco, Oregon Junco, and Chipping Sparrow.

Benkman (1996) provided extensive documentation and analyses as to how large blocks of older, dense forests are important to provide intermittent large crops of conifer seeds, including for crossbills. These areas of high conifer seed production

have also been noted to be important for the Clark's Nutcracker (Wells 2011), a Species of Conservation Concern (SCC) on the Flathead National Forest. However, the FNF RFP does not require the retention of large blocks of older, dense conifer forests at lower elevations, where they are most productive, for any seed-eating bird species, including the Clark's Nutcracker. The importance of maintaining these blocks of high-conifer seed production was recognized in the Revised Forest Plan for the Targhee National Forest, Process Paper D (USDA 1997).

The failure of the FNF RFP to require any management of 73 species of western forest birds means that the impact of forest management activities on this large suite of forest birds has never been evaluated as per significant impacts, nor defined to the public. It has been recently documented that many species of western forest birds are declining as per Rosenberg et al. (2019) and the North American Bird Conservation Initiative (2022). In addition, there are many species of western forest birds on the FNF that have identified conservation concerns. This includes the following 13 bird species classified as Montana Species of Concern:

Northern Goshawk, Golden Eagle, Brown Creeper, Evening Grosbeak, Pileated Woodpecker, Cassins' Finch, Varied Thrush, Lewis's Woodpecker, Clark's Nutcracker, Black-baked Woodpecker, Flammulated Owl, Great Gray Owl, and Veery.

Of these 13 species, 8 are associated with old growth forests; 6 require cavities for nesting; and 2 require forest stands with high conifer seed production.

Birds with identified conservation concerns also include the following 7 species as per the U.S. Fish and Wildlife Service's Birds of Conservation Concern in geographic region 10:

Calliope Hummingbird, Rufous Hummingbird, Flammulated Owl, Lewis's Woodpecker, Olive-sided Flycatcher, Evening Grosbeak, and Cassin's Finch.

Of these species, the hummingbirds are heavily dependent upon dense understory vegetation; the Lewis's Woodpecker and Flammulated Owl are heavily dependent upon snag habitat and old growth. The Olive-sided Flycatcher is heavily dependent upon stand-replacement fire (Hutto and Patterson 2016). And the Cassin's Finch is heavily dependent upon conifer seeds (Dobkin 1992).

The following species of western forest birds are identified as Priority I level as per Montana Partners in Flight (2000); Priority Level I species require conservation action; there is a clear obligation to implement conservation:

Black-backed Woodpecker, Olive-sided Flycatcher, and Brown Creeper.

Of these species, the Black-backed Woodpecker and Olive-sided Flycatcher are heavily dependent upon stand-replacement fire (Hutto 1995; Hutto and Patterson 2016). Both the Black-backed Woodpecker and Brown Creeper are also both associated with old growth forests, and require snags for nesting.

Priority Level II species of western forest birds are species with a lesser threat but require monitoring to determine actual population status (Montana Partners in Flight 2000), include:

Northern Goshawk, Vaux's Swift, Calliope Hummingbird, Lewis's Woodpecker, Red-naped Sapsucker, Williamson's Sapsucker, Three-toed Woodpecker, Pileated Woodpecker, Hammond's Flycatcher, Cordilleran Flycatcher, Winter Wren, and Veery.

Of these species, the majority (8) are associated with old growth habitat, and 7 are cavity nesting birds.

Priority Level III, are birds where there are indications of local concerns; there are no imminent risks; they may be near-obligates for priority habitats, and include the following species of western forest birds (Montana Partners in Flight 2000:

Sharp-shinned Hawk, Great Gray Owl, Boreal Owl, Rufous Hummingbird, Least Flycatcher, Clark's Nutcracker, Chestnut-backed Chickadee, Golden-crowned Kinglet, Townsend's Solitaire, Varied Thrush, Warbling Vireo, Townsend's Warbler, Chipping Sparrow, Cassin's Finch, and Red Crossbill.

Of these species, 3 are low-density forest raptors; 6 are dependent upon old growth forests; 3 are dependent upon snags for nesting, and 4 are dependent upon conifer seeds as forage.

In summary, there are 33 forest bird species that may occur in the Cyclone Bill project area that have some identified conservation concern, either due to current potential population declines, loss of priority habitat, or simply a need to monitor population levels. Although the Clark's Nutcracker is a FNF SCC, there are no actual on-the-ground measures for even this species. It will be impossible for the FNF, including in the Cyclone Bill project area, to avoid significant adverse impacts on western forest birds. **This severe inevitable impact was never identified the FNF RFP or associated FEIS, and this key information was never disclosed to the public.**

2. The FNF failed to provide the “baseline conditions” for wildlife, in order that comparisons could be made with the “no action alternative” (e.g., project EA at 81 where it is noted that the no action alternative provides the baseline conditions for project assessments; this means the agency failed to take a “hard look” at project impacts to wildlife, and failed to accurately define project impacts to wildlife to the public.

Although baseline conditions were provided in the project EA for most resources, no such baseline information was provided for wildlife. As previously noted, the baseline conditions for old growth, snag habitat, and forest stands with high conifer seed production were never provided for the Cyclone Bill project. No inventory information was provided for 33 bird species with some identified conservation concern. No baseline information was provided for the Clark’s Nutcracker, a SCC. No baseline information was provided for the FNF RFP requirement to complete surveys in or adjacent to treatment units for Bald Eagle, Northern Goshawk, Black-backed Woodpecker, Peregrine Falcon, and Flammulated Owl active nest sites (PDF-WLD-06; PDF-WLD-14). This includes a failure to survey for Bald Eagle nesting sites in prescribed burn unit 501, which is 780 acres. Bald Eagle eaglets have been known to die from smoke toxicity (Defiance Raptor Rescue 2022).

The baseline conditions for 14 species of low density forest raptors in the project area were not identified; this means the agency has not taken a “hard look” at the number of raptor nesting sites that will be destroyed with the proposed project. This means as well that the agency has failed to meet the requirements of identifying cumulative effects as past and planned activities on 14 species of forest raptors.

Without adequate inventories of baseline conditions for wildlife, the agency is not capable of determining if past and planned activities will have significant impacts on forest birds.

3. The FNF is violating the RFP direction to conduct surveys for key habitats of the Peregrine Falcon, Flammulated Owl, Black-backed Woodpecker, Northern Goshawk, Bald Eagle, and the SCC Clark's Nutcracker.

There is no inventory information for the above bird species, inventories that are required to protect active nesting sites. Although there is no specific requirement to identify nesting sites of the Clark's Nutcracker, this SCC would require such protection based on specific habitat management plan requirements for SCC. Hypothetical bird surveys cannot be used to measure impacts as per the NEPA. Hypothetical surveys that have not been done during public involvement also deny the public key information on the management of wildlife in the project area. Not only is the public denied any information on the location and density of these bird species, but the public is also denied any information as to how active nesting sites for these species will be protected, and whether or not these mitigation measures have been effective in the past.

4. The FNF has not ever evaluated the impact of clearcuts, including those over 40 acres in size, on forest birds, including many that have identified conservation concerns; the potential for significant adverse impacts has thus never been evaluated by the FNF.

The FNF RFP does not include any analysis of clearcutting impacts on wildlife, including forest birds. The Cyclone Bill project will have 47 clearcuts, including 20 over 40 acres in size, with a range in size from 5-110 acres. Total clearcut-seed tree cut acres will be 1,882 acres. There is no limit to the acreage of clearcuts that can be created within any given area of landscape. As such, there are no "sideboards" in the RFP to ensure that local impacts of clearcutting do not significantly impact forest birds. These impacts would include a known loss of habitat for the Northern Goshawk, including openings over 4 acres in size (Reynolds et al. 1992), and the Pileated Woodpecker, where severe population declines were documented due to clearcutting (Bull et al. 2007). Both birds are Montana Species of Concern. Clearcuts will eliminate productive conifer seed

resources for up to 100 years for 22 bird species that feed on conifer seeds, including the SCC the Clark's Nutcracker. Another seed-eating bird, the Cassin's Finch, is a Montana Species of Concern. Other seed-eating birds, such as the Red Crossbill, Chipping Sparrow, Evening Grosbeak are also have conservation concerns (Montana Partners in Flight 2000). Clearcutting will eliminate the development of old growth forests for 29 forest bird species for 150-200 years. In addition, clearcutting will eliminate the presence of larger snags for 27 forest bird species that require snags for nesting, including species as the Black-backed Woodpecker, Lewis's Woodpecker, Brown Creeper, Great Gray Owl, and Red-naped Sapsucker that are Montana Species of Concern. In spite of the severe impacts that clearcutting/seed trees will have on all these bird species, the FNF RFP nor the Cyclone Bill project NEPA documents did not evaluate direct and cumulative impacts to these species. **Without "sideboards" to ensure clearcutting does not significantly reduce local distribution of habitat for western forest birds, clearcutting is a violation of the NEPA, the NFMA, the APA, and the MBTA.**

5. The FNF failed to take a "hard look" at management of white-tailed deer and elk winter range; the public is being provided false information that the proposed logging/burning on big game winter range will improve habitat for such.

There are no measurable, valid habitat standards for the white-tailed deer winter range on the FNF. PDF-WLD-12 simply requires that full-crowned tree species, such as Douglas-fir and ponderosa pine, be retained in 50% of the residual stands in winter range to provide "snow intercept." The implication is that "snow intercept" is thermal cover. There is no current science that identified maintaining a few full-crowned trees on big game winter range is adequate to maintain thermal cover. Thermal cover is defined as stands with a 70% or greater canopy cover and at least 40 acres in size (Black et al. 1976). There are expansive impacts on deer-elk thermal cover planned for the Cyclone Bill project. The actual current and planned levels of thermal cover are unknown, even though thermal cover is noted to be the most important factor on big game winter range (Christensen et

al. 1993). The FNF claims that logging and burning big game winter range will benefit big game by increasing forage. However, no monitoring data or published science was provided to substantiate this claim of “habitat improvement” by logging and burning, where big game populations increased due to these activities on key winter ranges. **The actual impact of reducing unlogged forest habitat in key winter range for deer and elk from 92% down to 50% is unknown, due to a lack of analysis based on valid habitat criteria.**

6. The agency has failed to provide a valid assessment of project impacts on elk, so the level of impacts is unknown, including whether or not they are significant; also the public is being provided false information that elk are being proactively managed in the Cyclone Bill project area.

The Salish GA has a DC that habitat security contributes to MFWP objectives for big game populations. However, the FNF definition of elk security is invalid, so security impacts measured in the Cyclone Bill project area are also invalid. The FNF glossary defines elk security as areas at least 250 acres size that have no public motorized activity. Thus logging traffic, and any administrative motorized use in elk security areas does not disqualify these areas as elk security. There are also no required levels of hiding cover, as habitat only has to be a “mosaic” of cover and forage. Thus there are no actual criteria for cover, since anything qualifies as a mosaic. There are 2 published reports or publications authored by elk biologists that identify that elk security areas can have no active motorized routes in them, and need to provide 250 acres of more of hiding cover; cover can be defined either by ground-level or canopy-level cover (Hillis et al. 1991; Lowrey et al 2020). Unless elk security is measured by methods identified in either of these reports, the FNF cannot actually measure current or expected elk security levels in the Cyclone Bill project area.

It is clear that the FNF’s invalid measures of elk security misrepresent current and proposed conditions on this habitat feature. The project EA at 81 states there are 10,044 acres of elk security in the project area, which would at best be 25%

security for 39,799 acres in the analysis. Yet Table 54 identifies hiding cover in this area as only 17%. Since security requires hiding cover by the current best science, it would not be possible that 17% hiding cover provides 25% elk security.

The proposed treatments will affect hiding cover on 12,331 acres, which is at least 30% of the project area. Yet according to the FNF definition of elk security, any type of cover removal does not change current elk security. This in effect means that the agency does not need to measure project impacts on hiding cover to evaluate elk security, which is contrary to the current best science (Hillis et al. 1991; Lowrey et al. 2020).

The agency did not evaluate how the project will impact elk habitat effectiveness (HE), which is the displacement impact of active motorized routes on elk (Christensen et al. 1993). Traffic as low as 2 vehicle trips per 12 hours is noted to displace elk (USDA-MFWP 2013). Thus any roads used for project activities will displace elk. The active motorized route density for the Cyclone Bill project is never provided. However, it will be at least 3.5 miles per section. This is based on Table-4 in Appendix A, where a 41,080 total project area would be 64 square miles; existing roads come to 210 miles, with another 14.4 miles to be added, for a total of 224 active motorized routes during project implementation. This equates to at least 3.5 miles per section, but on Forest Service lands, this would be higher as there are only 33,015 acres of public lands in the project area. The Cyclone Bill project will clearly have significant adverse effects on elk due to extremely low levels of HE. A 3.5 active motorized route density equates to only about 35% HE, while a minimum of at least 50% HE is required to maintain elk use in a landscape (Christensen et al. 1993).

The failure of the FNF to provide a valid analysis of project impacts on elk means the agency is escaping the requirements of the NEPA to determine if significant adverse impacts will be triggered by the project. The agency is also providing false assessment information to the public.

7. The agency has provided a false assessment of project impacts on the threatened grizzly bear; FNF RFP direction allows the agency to create a false impression to the public that management activities are designed to promote recovery of this species.

There is no analysis in the Cyclone Bill project NEPA documents on the active motorized route density in the project area during implementation, and how this would impact the grizzly bear. Although the FNF RFP requires only that roads open to public access be measured in grizzly bear Zone 1 habitat, the agency has never provided any published science or reports that only public use affects grizzly bears, including displacement. By our estimate, the active motorized route density during implementation will be at least 3.5 miles per section, based on information provided in Table 4 in Appendix A. This includes all roads being used for project completion, which will include 210 miles of existing system roads, along with 14.4 miles of new roads. The project area is 41,080 acres, which comes to 64 miles square. Forest Service lands of 33,015 acres (EA 20) would result in an even higher active motorized route density during project implementation.

Bader and Sieracki (2022) provided a measure of grizzly bear mortality and population trend based on active motorized route densities. Table 6 in this report shows that as active motorized route densities increase, survival rate, growth rate and density of bears per 1000km² all decrease. A 100% survival rate and positive growth rate occurs with no active motorized routes. This declines to a 95% survival rate and a static growth trend at one mile per section. At 2 miles per section, the survival rate is 85%, with a negative growth rate. At 2.3 miles per section, the survival rate is 75%, with a rapid decline in the growth rate. The highest active motorized route density provided in Table 6 is 3.3 miles per section, which equates to what will occur in the Cyclone Bill project area. This has a survival rate lower than 75%, with a rapid decline in the growth rate. These adverse impacts on grizzly bears in the Cyclone Bill proposed project are never disclosed to the public in terms of survival and growth rates, which are key factors in assessing project impacts on the grizzly bear, impacts that should be accurately disclosed to the public.

Even if the exact correlation between roads and grizzly bear mortality rates and growth rates are not without some error, including a reduced mortality rate when the public is excluded from roads, the general increasing trend of mortality and population growth rate is supported by the current best science (Proctor et al. 2019; Proctor et al. 2022). The direct effect of human-caused mortality near roads may be somewhat less when the public is excluded, however, the effects of displacement from motorized use during project implementation, and displacement from disturbance in grizzly bear habitat, will counter some of these mortality impacts. AS was noted by Proctor et al. (2022), displacement of grizzly bears from high quality habitat due to roads has population impacts by reducing habitat availability.

The agency noted that the Cyclone Bill landscape occurs in an important connectivity area between the NCDE primary conservation area, and the Cabinet-Yaak Recovery Zone. Yet there was no analysis as to how this connectivity zone is working. The lack of any viable population of grizzly bears in the Cabinet-Yaak RZ was never noted. Management of the connectivity area on the Tally Lake Ranger District is most likely an important factor in the limited ability of bears in the Cabinet-Yaak RZ to grow. Failure of the agency to look at the current effectiveness of this connectivity area is a violation of the ESA as a result. The current proposed management in the Cyclone Bill project area is a clear indication that grizzly bear recovery is not being promoted, in violation of the ESA.

The continued failure of the Cyclone Bill landscape to promote connectivity of grizzly bears between RZs is apparent with the level of security that exists in this landscape. The 3 grizzly bear units that cover this landscape have only 3.9, 5, and 14 percent core habitat (Table 53), when the minimum recommended level is 60% (Proctor et al. 2019; Proctor et al. 2020). It is not even clear if these low percentages of secure area are accurate, as per the FNF RFP, it appears that secure areas can include active motorized routes as long as they are closed to the public. The level of security within the project area is not identified, so the direct impacts of the project on security is never identified to the public. In addition,

only two of the identified security areas in Table 52 meet the minimum recommended size of at least 1200 acres (Id.).

The agency has also provided false information regarding impacts of the Cyclone Bill project on grizzly bears by claiming at 132-133 that there will be no net increase in 2011 baseline conditions. The agency has changed the definition of total roads in the RFP, which also changes how 2011 baseline conditions are measured. Since the RFP, a road that is identified as "impassable," with only the first 50-300 feet actually made impassable to vehicles, no longer counts in the inventory of total roads. However, as per a recent court decision, impassable roads still count in the total road inventory, as they still exist on the landscape. Until the FNF RFP is amended to provide a correct definition of total roads, any analyses of project impacts on grizzly bears will be invalid.

8. The agency's current and planned management of the threatened lynx, including lynx critical habitat, violates a host of laws as well as the FNF RFP; management of critical lynx habitat needs to be stopped until the agency revised the RFP to include the current best science for management, as well as obtain a valid, revised Biological Opinion from the U.S. Fish and Wildlife Service that also is based on the current best science.

The 2017 Species Status Assessment by the USFWS clearly demonstrates that there is no current science that demonstrates that the Northern Rockies Lynx Management Direction (hereafter "Lynx Amendment") promotes recovery of the lynx, including within critical habitat. This documents repeatedly notes that it is "assumed" or "believed" that this amendment promotes lynx recovery. However, no population data was ever provided to supports these suggestions. The validity of the Lynx Amendment is highly questionable as per effectiveness even on the Tally Lake Ranger District. As per Objection Appendix B, sightings of lynx on this district has continued to decline from 1977 to 2021.

This ongoing decline of lynx sightings on the Tally Lake Ranger District during the last several decades is consistent with ongoing habitat declines in this landscape due to logging and fuels projects. As we have noted in Table 1 of Appendix B for this Objection, there have been a total of 154,093 acres on this district impacted by recent activities. This does not include older projects, as Oettiker and several other projects identified at 103 in the Cyclone Bill EA, Appendix B. A summary of 8 recent, ongoing or planned projects on this district includes 42,043 treatment acres, or 65.7 square miles. This is 27% of this larger landscape. It also includes 100.4 miles of new road construction, both temporary and permanent. These impacts are shown in a figure provided in Appendix B of timber harvest areas in this landscape. This figure includes all past activities, and shows that almost the entire area of the district, most of which is lynx critical habitat, has been logged in the past. Given that the Lynx Amendment promotes logging instead of lynx recovery, it is no wonder lynx sightings in this landscape have declined.

The Lynx Amendment has no actual requirements for population monitoring, which is inconsistent with planning direction. Instead, the FNF uses a “proxy” for lynx populations, which is the acres of exceptions and exemptions allowed in the Lynx Amendment within the WUI. To date, there has been no correlation ever established between 6% exceptions/exemptions and lynx population trends. This is an arbitrary proxy that has never been validated. And as demonstrated on the Tally Lake Ranger District, even though this 6% proxy has never even been met since the amendment was implemented, lynx sighting are declining. This alone indicates that the 6% proxy has no actual validity.

The Lynx Amendment does not require any measures of project impacts on populations of snowshoe hares, a key prey species for lynx. For the Cyclone Bill project, hare habitat will be eliminated at least temporarily on 12,331 treatment acres. This is at least 30% of the landscape. With a conservative estimate of a hare home range of 25 acres, this means that 536 home ranges of hares will be destroyed. This does not include the additional fragmentation impacts that will be created (Lewis et al. 2011; Walker 2005). There is no analysis in the Lynx Amendment FEIS that a loss of 30% of the hare home ranges in a landscape

promotes recovery of the lynx, including in critical habitat. The 30% allowance of openings in lynx habitat is based on Brittell et al. (1989). However, these recommendations required that natural openings be included in the 30% loss of hunting habitat. IN the Cyclone Bill project area, 12% of this landscape is already open (EA 81). This would require the Lynx Amendment to subtract out existing openings, reducing the recommended 30% down to 18%. This correction is never made in the Lynx Amendment, however. In addition, Brittell et al. (1989) notes that these were just recommendations, and that monitoring was required to determine how effective they actually were in conserving lynx.

In fact, monitoring has shown that the Brittell et al. 1989 recommendations are in fact flawed. The current best science, completed with extensive radio-telemetry on breeding female lynx, shows that suitable breeding habitat contains only 4-5% openings, not 30% (Holbrook et al. 2017a; Holbrook et al. 2019; Kosterman et al. 2018). Within the Cyclone Bill LAUs, current openings are stated to be 12%. With added openings from clearcuts, seed trees and group selections, openings will increase to 6.6% plus the existing 12% comes to 18.8% openings, which is over 3 times the level found in productive lynx breeding habitat (Id.). The percentage of existing and planned openings for the project area is never actually provided for the Cyclone Bill project, which are direct impacts. Only cumulative impacts as per the LAUs are provided, which wash out the direct impacts.

In addition to the failure of the Cyclone Bill project to identify the direct impacts on new openings on lynx and lynx critical habitat, the agency also did not evaluate how the project will affect mature forest habitat. Mature forest habitat has been defined for lynx as follows by Holbrook et al. 2017a: mid-seral stands at least 40 years in age, a medium dbh of 10 inches, a median canopy cover of 56%, and median tree height of 65 feet, 217 trees per acre over 5 inches dbh, 1500 trees per acre under 5 inches dbh, and a median basal area of 140 feet per acre. As is shown in the Cyclone Bill project EA at Table 4, even the canopy cover in logged and burned treatment units will almost always fall below the medium canopy cover in lynx mature forests, including prescribed burning. In addition, all the proposed treatments will remove understory trees, which have a relatively high

density in defined mature habitat for lynx. So all of these treatments on 12,331 acres, or 30% of the project area, will remove lynx mature forest habitat. It is unknown what the current or remaining level of mature forest habitat for lynx is, or if these current or proposed levels meet the recommended 50% as per the current best science (Holbrook et al. 2017a; Holbrook et al. 2019; Kosterman et al. 2018).

As is noted in the Cyclone Bill NEPA documents, the agency does not define lynx habitat and critical lynx habitat by the current best science. For example, the current best science has very specific definitions of 4 types of lynx habitat: sparse, stand initiation, advanced regeneration, and mature (Table 2 in Holbrook et al. 2017a). Instead of these habitat definitions, the FNF uses the following definitions for lynx habitat: early stand initiation, stand initiation, multistory, and other (stem exclusion). These are defined in Table 42 of the project EA, page 69. They are also defined for critical habitat, which includes matrix habitat (Table 43). Even though these definitions are not consistent with the current best science, the agency continues to use these terms (outdated by over 20 years) to evaluate impacts on lynx and lynx critical habitat. This is a means of the agency to escape the requirements of the NEPA and the ESA, to use the current best science in evaluating project impacts on threatened species.

Although the Lynx Amendment uses the 30% opening criteria for managing lynx habitat (Lynx Amendment ROD at 9 and 16, the FNF did not use other recommendations in Brittell et al. (1989). For example, Brittell et al. (1989) recommends that habitat management for lynx occur on every 640 acres, to ensure habitat is well distributed. Along with this, it is recommended that openings by clearcutting be limited to 20-40 acres. If this 640-acre management regime were applied to lynx habitat by the current best science, this would limit the acreage of clearcutting to 5% per square mile, which would be 32 acres. The acreage of clearcuts per square mile in the Cyclone Bill project area is unknown. However, with 1,882 acres of clearcuts planned, including up to 110 acres, the local impacts of clearcutting would greatly exceed those as per Brittell et al. 1989.

Even if the Brittell et al. 1989 recommendations for up to 30% openings per square mile were applied to the Cyclone Bill project, this would limit clearcuts per square mile to 192 acres. The amount of clearcutting per square mile for this project is unknown.

In addition to further degrading lynx productive breeding habitat in the Cyclone Bill project area, the agency will violate FNF RFP direction to “maintain connectivity” of lynx habitat in vegetation treatments (standard ALL S1). The current best science defines good habitat connectivity in lynx breeding habitat as roughly 70%. The 4-5% openings and 226% sparse forests, which are avoided, would leave roughly 70% habitat connectivity (Holbrook et al. 2017a; Holbrook et al. 2019; Kosterman et al. 2018). This would be provided by roughly 20% regenerating forests, and 50% mature forest (Id.). There is no analysis in the Cyclone Bill project that defines either current or proposed habitat connectivity for lynx in this critical habitat. Regardless, it will be decreased by at least 30% on 12,331 acres of proposed treatments, as all these areas will be converted to sparse forests which are avoided by lynx for many decades (Holbrook et al. 2019). The current best science has identified that high habitat connectivity is a key defining feature of productive lynx breeding habitat (Holbrook et al. 2017a; Holbrook et al. 2018; Holbrook et al. 2019; Kosterman et al. 2018).

The impact of 3.5 miles of active motorized route on the lynx was never evaluated for the Cyclone Bill project. Squires et al. (2010) noted that low road activity, under 8 vehicle trips per day, was tolerable to lynx, but higher levels will occur with the proposed project. IN addition, cover will be removed along roads, which will make them even more unsuitable for lynx use.

The BiOp for the FNF RFP is invalid regarding lynx because it is not based on the current best science. The USFWS measures proposed management of lynx habitat on the FNF by the Lynx Amendment, as well as by their own definitions of lynx critical habitat. These definitions are extremely vague, and provide no actual measures of lynx habitat as per the current best science.

9. There is no analysis of project impacts on the wolverine in regards to road densities and increased temperatures to be triggered by deforestation.

The wolverine is noted to be sensitive to heat stress (e.g., Parks 2009; Copeland et al. 2010). Yet there is no analysis in the Cyclone Bill project as to how the proposed deforestation program will reduce habitat quality for the wolverine. The estimated time period when the project area becomes unsuitable for wolverine due to increased temperatures in the spring, summer and fall was never addressed. Thus the agency has failed to take a “hard look” at project impacts on this threatened species. The agency also failed to evaluate the road impacts on this species. The recommended level of active motorized routes to promote wolverine habitat is only 1 mile per section (Scrafford et al. 2018; USDA 1992). The active motorized route density for the Cyclone Bill project will be up to 3.5 or greater miles per section. This is based on a project area the size of 41,080 acres, or 64 square miles, when actual Forest Service acres are noted to be 33,015 acres, which is only 51.6 square miles. There is considerable science published that identifies roads as an adverse impact on the wolverine (Scrafford and Boyce 2018; Scrafford et al. 2018; Fisher et al. 2013; Stewart et al. 2016). Yet the FNF completely ignored this impact for the Cyclone Bill project.

10. The FNF failed to evaluate the impacts of the proposed varying levels of deforestation on direct changes in local climates/weather on wildlife, including the above mentioned wolverine, but western forest birds.

The agency proposed to reduce vegetation on 12,331 acres in the project area. These vegetation reductions are defined in Table 4 of the project EA, which shows the reduction in canopy cover that will occur with various treatments. The most extreme deforestation will occur in clearcuts/seed tree cuts, but other levels of forest thinning will also change local weather/climatic conditions within affected stands. And there will be cumulative effects on forest stands which are not going to be thinned, due to “vegetation breeze.”

One of the most sensitive species to hotter weather and increased winds is the western bumble bee. This species crosses miles of terrain from their nests to forage (High Country News 2024), so will be vulnerable to increased wind speeds that will occur in openings as well as thinned forests. In addition, increased heat may hamper the bee's sense of smell, making it more difficult for them to locate flowers (Tomma 2024). Even with ongoing impacts of climate change, temperatures across Montana are not only increasing, but this process will continue. As noted in a Montana Outdoors article (2023), Montana can expect up to five weeks of above-90-degree days each year; the greater rate of change will be at higher altitudes; total precipitation in western Montana has decreased by 0.9 inches; by mid-century, computer models predict a 4-degree temperature increase in western Montana, with 10 to 15 additional days of 90-degree-plus temperatures.

This ongoing increase in temperatures is widely noted in the U.S. Just a few examples include an article in the Bozeman Daily Chronicle (2024) on a week of extreme temperatures in Nevada, with a record of most consecutive days over 115 degrees set; this was the most extreme heat wave for record keeping since 1937. Temperature increases ranging from 4-15 degrees above normal have been reported across the U.S. (Forest News 2021), and temperatures records for heat have been broken in many areas across the U.S., including in California, Nevada and Oregon (The Week 2024). High heat levels have resulted in recommendations for folks to avoid adverse health effects (Landeau 2023).

The current ongoing increases in heat due to climate change will be exacerbated by deforestation. Temperature increases of up to 4-18 degrees within clearcuts may occur, with these increased heat effects moving out across a landscape in a process called vegetation breeze (Knoss 2016). One factor that is lost with deforestation is the transpiration of water via trees, which provide cooling effects within forests (Milman 2024). Forest cover changes create shifts in biophysical processes; locally, at all latitudes, forest biophysical impacts far outweigh CO₂ effects, promoting local climate stability by reducing extreme temperatures in all seasons and times of day; changes in maximum temperature are driving

extinction, not maximum temperature; deforestation is associated with an increase in the maximum daily temperatures throughout the summer at higher latitudes; biophysical effects of forests moderate local and regional temperature extremes such that extremely high days are significantly more common following deforestation at mid to high latitudes; deforestation also has increased the frequency and intensity of hot dry summers two to four fold; local increases in extreme temperatures due to deforestation are of comparable magnitude to changes caused by 0.5 degrees C of global warming; forests provide local cooling during the hottest times of the year; forests are critical to adapting to a hotter world; forests also minimize risks due to drought associated with heat extremes; continued deforestation could severely stress remaining forests by warming and drying local and regional climates; forests above 50 degrees north provide essential local climate stabilization benefits by reducing surface temperatures during the warm season as well as periods of extreme heat or drought; they also reduce extreme cold; the role of forests in local climate mitigation has been ignored; deforestation must be considered in addition to its effects on atmospheric CO₂ (Lawrence et al. 2022).

The FNF in the Cyclone Bill project failed to address the above impacts of deforestation, or as well, how these changes in local climatic conditions will affect wildlife. These impacts will include a lack of physiological tolerance to higher temperatures, which would trigger heat-avoidance behavior; other impacts could include decreases in food availability, including a loss of pollinator species that impact food (Cahill et al. 2012). Temperature may exceed the physiological tolerance of a species; increased air temperatures may decrease activity times and increase energy maintenance costs, leading to death from starvation. Id. Table 2 of this report includes a summary of 11 examples of proximate causes of wildlife declines from adverse climatic conditions; one bird species, the grey jay in Canada, declined due to warm autumn temperatures which caused rotting in hoarded food. Another potential impact of increased adverse local climatic conditions, including heat, is potential reduced long-term fitness and thus population persistence due to increased early-life heat exposure (Eastwood et al. 2022).

Even though the Cyclone Bill project will increase adverse local climatic conditions for wildlife, these impacts are never identified nor addressed by the agency. This failure to take a “hard look” at what are likely severe impacts on wildlife, including forest birds and the wolverine, violate numerous laws. This failure also results in a significant misrepresentation of the projects purposes and needs, to increase “resilience” of forests and reduce fire. The public is never told what the wildlife costs to managing for timber production and reduced fire will be.

11. There is no analysis of the cumulative impacts of the proposed Cyclone Bill project on wildlife.

There are approximately 33 forest bird species that have some identified conservation concern. There are a host of adverse impacts to these species that in combination were never assessed by the agency. These include direct mortality from destruction of active nests, and/or trampling of newly-fledged birds. There will be a loss of suitable nesting sites on 30% of this landscape, as well as hiding cover, resulting in increased predation. There will be massive fragmentation of the forests, increasing cowbird parasitism on songbirds (Robinson et al. 1992). There will be a massive loss in thermal cover, which will make all birds more vulnerable to extreme weather events, including heat, wind and precipitation. There will be a huge loss in forage, as conifer seeds are reduced or eliminated across the landscape. There will be bird mortality created from toxic smoke, which is known to be highly toxic to birds, especially nestlings like eaglets (Defiance Canyon Raptor Rescue 2022). Severe weather events where forage and thermal cover are lacking has been shown to result in massive mortality of songbirds (D’Amassa 2020; USGS 2020). Due to deforestation and degraded climatic conditions in the Cyclone Bill project area due to various levels of deforestation, all these impacts will add to the unavoidable reduction in songbird productivity due to increases in adverse climatic conditions. As noted previously western forest birds are declining (Rosenberg et al. 2019; North American Bird Conservation Initiative 2022). The Cyclone Bill project is a clear example of how the Forest Service is completely ignoring their public and legal responsibilities to manage for western forest birds.

Appendix A for the Objection filed against the Cyclone Bill Project on the Flathead National Forest by NEC, AWR, and Y2U on December 30, 2024.

Appendix A contains relevant portions of literature and/or reports cited in the Objection, including:

Bader, M. and P. Sieracki. 2022. Grizzly bear denning habitat and demographic connectivity in Northern Idaho and Western Montana. *Northwestern Naturalist* 103-209-225.

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Appendix B for the Objection filed against the Cyclone Bill Project by NEC et al. on December 30, 2024.

Appendix B contains the following information.

-map of lynx sighting on the Tally Lake Ranger District from 1977 through 2021.

-map of timber harvest areas on the Tally Lake Ranger District as per the present time.

-Table 1 providing a summary of acres of past, ongoing or planned timber harvest/fuels/burning treatments in lynx habitat on the Tally Lake Ranger District, along with new road construction. Table 1 is provided below.

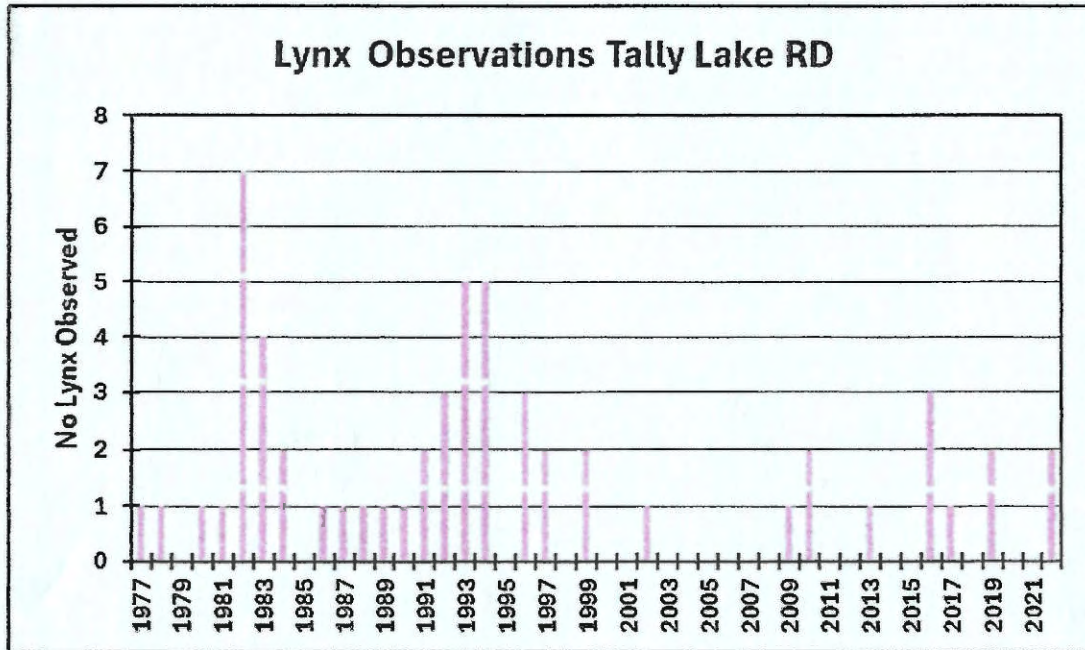
-project summaries for proposed treatments and road construction for 8 projects recently implemented or are being planned on the Tally Lake Ranger District; all except the Jackknife Project are in Lynx Critical Habitat.


Table 1: Summary of more recent logging/fuels/burning projects on the Tally Lake Ranger District; * indicates the project is located in lynx critical habitat.


1. Jackknife Project; treat 1,490 acres within a 2,071 acre project area; construct 1.4 miles of new temporary road.
2. Salish-Good Project*; treat 8,795 acres within a 56,000 acre project area; construct 3 miles new temporary road and 33.8 new system road.
3. Flathead Fuels*; treat up to 1,784 total acres, including within the Good Creek-Greg Creek area; construct no new miles of road.
4. Round Star Project*; treat 9,519 acres within a 22,074 acre project area; construct 3.4 new temporary roads, 20.8 new system roads.
5. Cyclone Bill Project*; treat 14,532 acres within a 40,880 acre project area; construct 3 miles new temporary roads, 14.9 miles new system road.
6. Stovepipe Project*; treat 7,277 acres within a 32,400 acre project area; construct 3.3 miles new temporary road, 15.9 new system road.
7. Flathead Fuels Project*; treat up to 1,784 acres north of Ashley Lake;
8. Lemonade Salvage*; treat 250 acres in a 668 acre project area; construct 0.5 miles of new temporary road.

The total area impacted is 154,093 acres, or 240.7 square miles. The total area that is being, or will be treated with logging, fuels, and burning treatments, will be 42,043 acres, or 65.7 square miles. This is 27% of this landscape being treated within these project timelines. The acreage to be treated in the Flathead Fuels along Good/Greg Creek, and Ashley Lake, is estimated to be another 1,177 acres, or 66% of the stated 1,784 total acres to be treated.

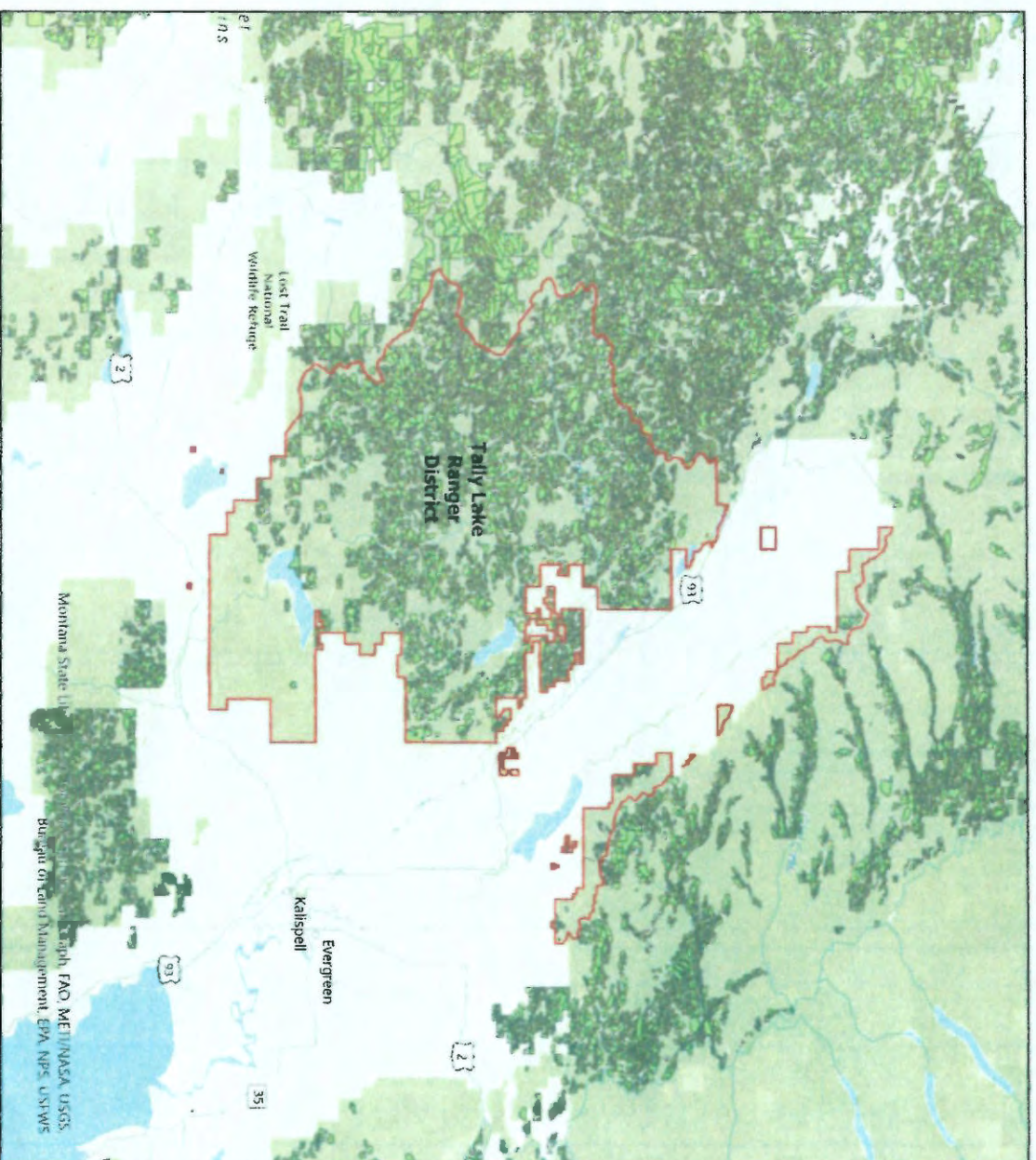
The total miles of new temporary roads already or to be constructed is 14.6 miles. The total miles of new system road to be constructed, or has been constructed, is 84.64 miles; these roads will remain permanently on the Forest Service road system. The total new road construction would be 100.4 miles.



 Lynx Obs Flathead NF.jpg
1.6MB

 Tally Lake RD Obs.jpg
1.2MB

Timber Harvest



Legend

- Tally Lake RD
- Activity_TimberHarvest



Sept 21 = Thurs.

in Salish Good PA

September 5, 2023

Public Scoping Notice for Flathead Fuel Break Project

Dear Interested Party,

Flathead Fuels - 1,784

The Flathead National Forest requests your comments on the Flathead Fuel Break Project. This project will create a total of 1,784-acres across three fuel break to address hazardous fuel conditions adjacent to roads in the Good Creek, Ashley Lake, and Lion Hill areas to benefit nearby homes and communities.

A fuel break is defined as a natural or man-made change in fuel characteristics that can affect fire behavior such that a fire can possibly be more readily controlled. The intent is to reduce wildfire spread and intensity and to reduce the risk of uncharacteristic wildfire on Federal land or catastrophic wildfire for nearby communities. Treating these areas now would increase the effectiveness of suppression efforts and help maintain the safety of these communities and area resources should we experience a wildfire event.

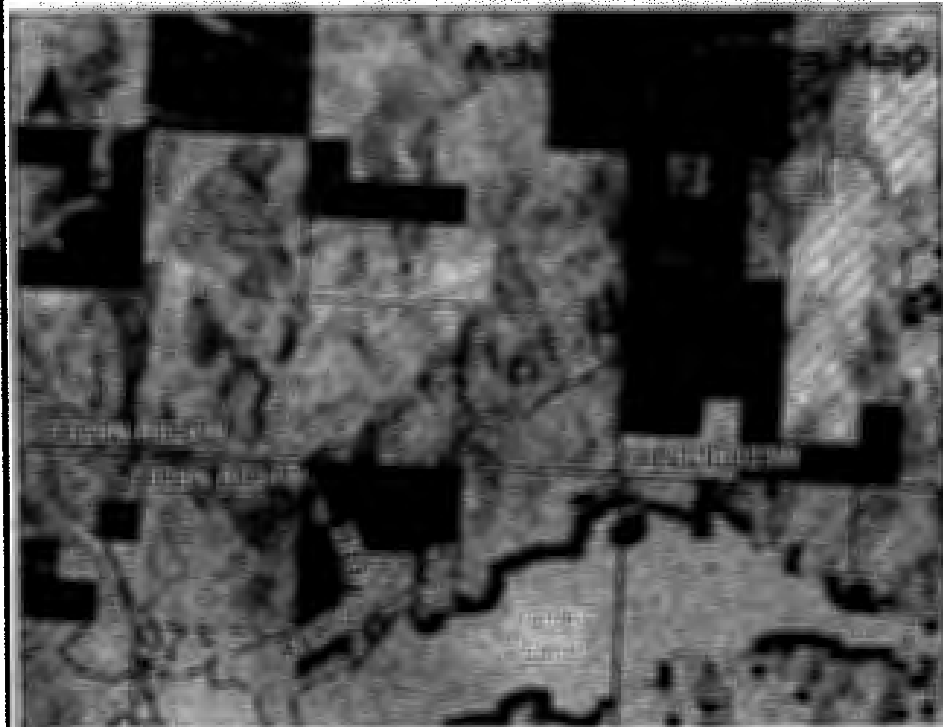
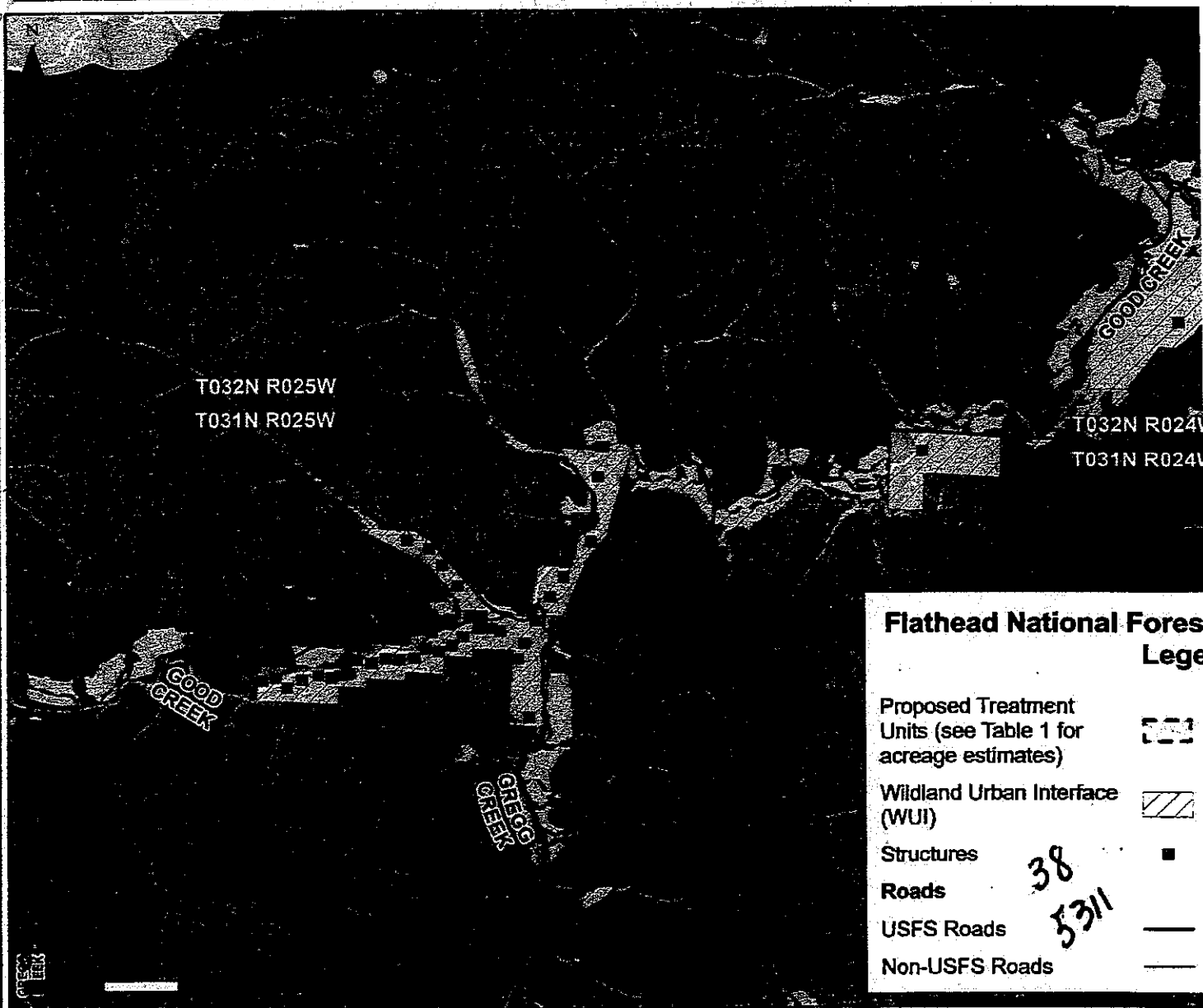
The Flathead Fuel Break Project is being proposed under Section 40806 of the Bipartisan Infrastructure Law of 2021. This law authorizes the construction of linear fuel breaks adjacent to existing constructed linear features, such as a road, trail, powerline, or similar feature. Fuel breaks may be up to 3,000 contiguous acres and a maximum width of 1,000 feet. Projects which fall under Section 40806 are excluded from documentation in an Environmental Assessment (EA) or Environmental Impact Statement (EIS).

The Flathead National Forest wants to hear from you. We request your input on this project during this 14-day public scoping period. Comments are most helpful when they provide specific information on the project, proposed activities, and/or resources of concern in the area. We also welcome information on additional locations within the project area that may benefit from the construction of fuel breaks.

To provide electronic comments and learn more about the Project, and to learn more about the Project's location, purpose and need, and proposed actions, please visit the project website at: <https://www.fs.usda.gov/project/flathead/?project=64699>. The "Get Connected" menu on the right side of the page provides an option to comment as well as an option to subscribe to email updates.

Please submit your written comments by **September 21, 2023**. Your comments should include your name, address, email address, telephone number, and (if applicable) the name of the organization you represent.





LAU = Upper Canyons
ON!

250 CC .5 new

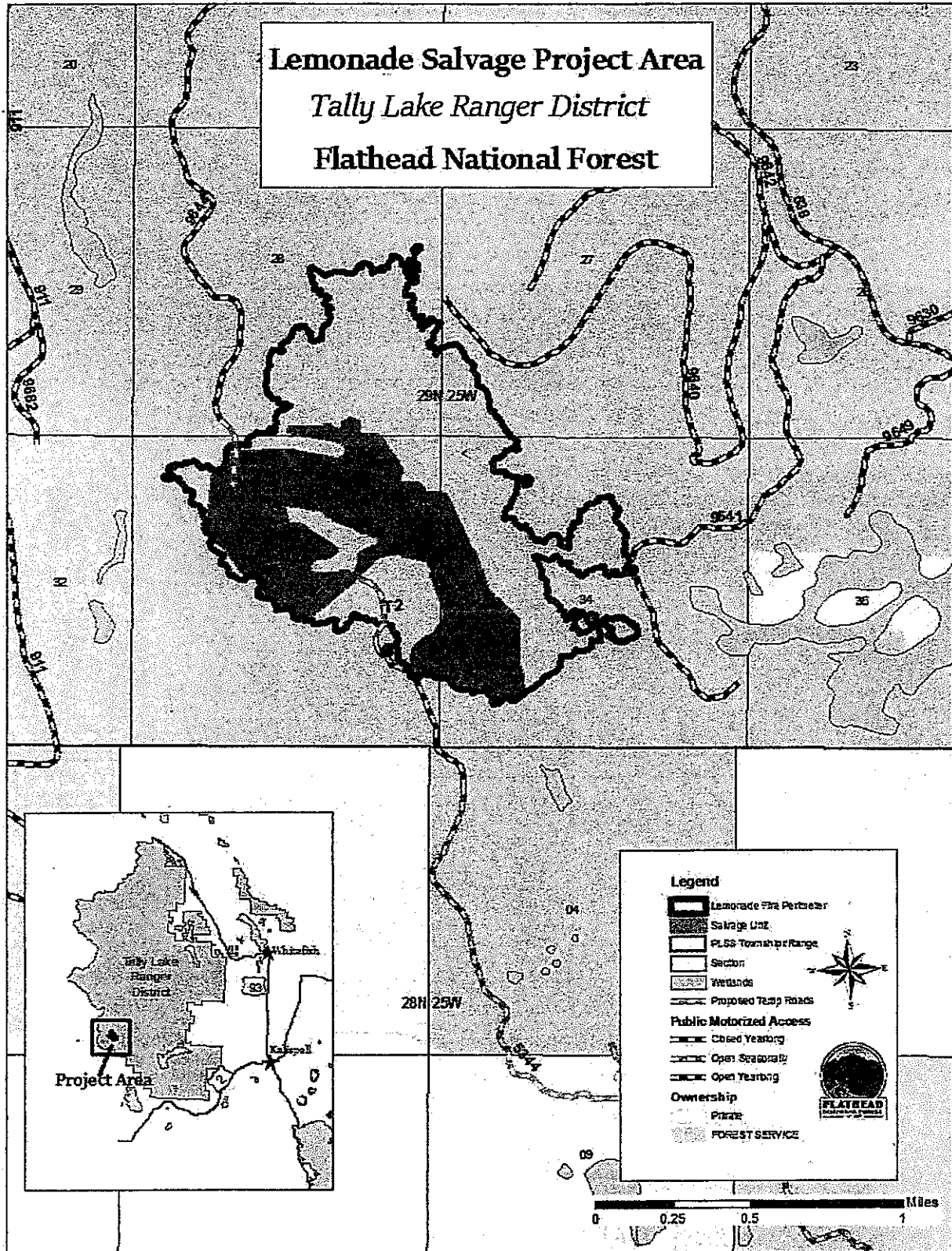


Figure 1. Project Map

occupied but outside MZone!
is FP with security
NO Salvage Good

Obj = 6/2020

Salish Good Resource Management Project

PA = 56,000

Salish-Good

Introduction

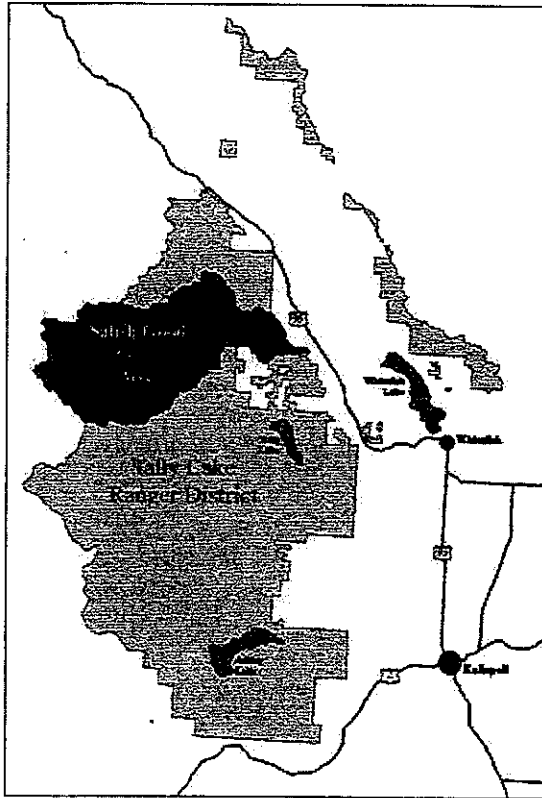
LAH = Lower Good + Upper Good,
CH

The Tally Lake Ranger District (District) of the Flathead National Forest (Forest) proposes vegetation management, prescribed fire, and transportation management activities within an approximately 56,000 acre¹ project area as part of the Salish Good Resource Management Project (Salish Good Project). The District prepared this environmental assessment (EA) to determine whether effects of the proposed activities might be significant and require preparation of an environmental impact statement, in compliance with the National Environmental Policy Act (NEPA) and other relevant Federal and State laws and regulations. Additional documentation is available in the project file. The responsible official for this decision will be the Flathead Forest Supervisor.

Project Location

The project area is approximately 20 miles northwest of Whitefish, Montana, and is within Flathead County. The project area is west of Highway 93 (Figure 1).

Figure 1. Project vicinity map



$$\log 5868 = 0.768$$
$$0.768 - 2.927 = -2.159$$

$$Rds - new perm 33.8 / 34$$
$$.24$$
$$37$$

new perm

Land ownership within the project area is 92 percent National Forest System (NFS) land (51,340 acres), three percent State (1,735 acres), and five percent private (3,070 acres). Proposed activities would only occur on NFS land. Approximately 43 percent (24,140 acres) of the project area is within the wildland-

¹ Note: Acres, miles, and percentages referenced throughout this document are approximate due to rounding, small errors introduced by GIS data analysis, or small data differences between databases.

GB- Salish OCA , Swift Creek- Stillwater OCA

h

or retaliation for prior civil rights activity, in any program or activity conducted or funded by USDA (not all bases apply to all programs). Remedies and complaint filing deadlines vary by program or incident.

Persons with disabilities who require alternative means of communication for program information (e.g., Braille, large print, audiotape, American Sign Language, etc.) should contact the responsible Agency or USDA's TARGET Center at (202) 720-2600 (voice and TTY) or contact USDA through the Federal Relay Service at (800) 877-8339. Additionally, program information may be made available in languages other than English.

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Appendix A. Details of the Selected Alternative

Vegetation treatments, which include commercial harvest, noncommercial treatment, and prescribed burning, would occur on approximately 8,795 acres under the Selected Alternative. Other activities include transportation management, aquatic habitat and watershed improvements and access management which are summarized in Table 2 below.

Table 4. Selected alternative summary of activities

Commercial vegetation treatments	Acres
Clearcut	1,940
Seed tree	1,670
Shelterwood	148
Individual tree selection	25
Thinning	2,085
Total commercial vegetation treatments	5,868
Noncommercial vegetation treatments	Acres
Prescribed burning	707
Hardwood release	67
Understory removal	66
Precommercial thinning – chainsaw felling	1,921
Mechanical precommercial thinning – excavator	166
Total noncommercial vegetation treatments	2,927
Transportation management	Miles
Maintenance and BMPs	138
Non Haul Maintenance and BMPs	17
Temporary road construction	3.0
NFS road construction – closed to public motorized access	33.8
NFS road construction – open to public motorized access	0.24
Roads open year-round to be closed to public wheeled motorized use	0.45

Round Star: Proposed Action

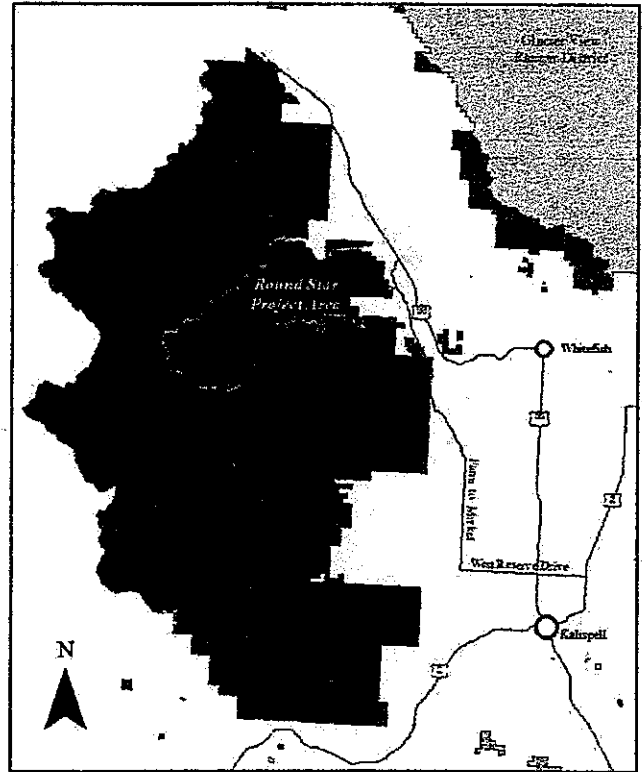
Project Area

The Round Star Project is located on the Tally Lake Ranger District of the Flathead National Forest. The project area is approximately 28,300 acres, and is located northwest of the Flathead Valley, 13 miles west of Whitefish Montana. The project area is located on the north side of the Star Meadow area (Figure 1).

Land ownership within the project area is approximately 78 percent National Forest System (NFS) land, 15 percent private, and seven percent State-owned lands. All proposed activities would occur on National Forest System lands.

Approximately 87 percent of the project area, 24,687 acres, is located within the wildland-urban interface, established by the Flathead County Community Wildfire Protection Plan (2021).

Figure 1. Vicinity map



The Flathead National Forest 2018 Forest Plan

The 2018 Flathead National Forest Land Management Plan (forest plan) provides an integrated set of management direction that is intended to provide for the social, economic, and ecological sustainability and multiple uses of the Forest's lands and resources. The forest plan was developed under the 2012 planning rule (36 CFR 219) to guide collaborative and science-based revision of forest plans that promote the ecological integrity of National Forests, while considering social and economic sustainability (USDA Forest Service 2018, p. 1).

The forest plan divides the Forest into six geographic areas to provide management direction that reflects community values and local conditions specific to an area. The Round Star Project is within the Salish Mountains geographic area. More information on the Salish Mountains geographic area is on pages 130-139 of the forest plan.

Management Area Direction

The forest plan designates areas with similar management needs and desired conditions into sixteen management areas. The Round Star project area is divided into the management areas (MA) displayed in Table 1 below. More information on these management areas is on pages 106-110 of the forest plan.

PA ~~24,687~~ 28,300

$$\text{Total} = \text{Log} = 6,660 = 9,519 \text{ ac}$$

 Other = 2859

LAL = Evers Reid + Sheppard CH

Obj Cyalone Bill

- new perm = 21 mi

- CB = Salish MA, Summit Cr - Stillwater CA

Table 2. Summary of proposed activities.

Proposed vegetation treatments	Acres
Commercial thin	3,530
Seed tree	1,370
Clearcut	681
Shelterwood	519
Improvement cut	508
Hardwood release	51
Total proposed commercial treatment	6,660 ✓
Precommercial thin	2,492 ✓
Hazardous fuels treatment	220
Prescribed burning	133
Post and pole	14
Total proposed noncommercial treatment	2,859
Proposed road management	Miles
NFS haul routes to receive BMPs	71.0
Temporary road construction	3.4
System road construction closed yearlong	20.8
Roads changed from open yearlong to seasonally open	1.5

Proposed Vegetation Treatment Descriptions

Commercial thin and improvement cut are intermediate treatments that retain a generally well stocked stand composed of the healthiest trees with large, well-formed crowns. The objectives of these treatments are to improve forest growth and resilience by reducing overall stand density for the commercial thin units or improving species composition and structure for the improvement cut. Leave tree selection would favor early seral and fire-tolerant species, including ponderosa pine, western larch, western white pine, and Douglas-fir on most sites. These trees would then have more growing space, light, nutrients, and water to allow them to develop into large trees more rapidly with improved insect, disease, and fire tolerance. These treatments would achieve fuels reduction and timber production objectives by reducing tree densities and ladder fuels and allowing for more vigorous growth of preferred species.

Clearcut, seed tree, and shelterwood are regeneration treatments that would alter the forest from a mature tree class to a seedling stage. The objective of these treatments is to regenerate preferred tree species such as ponderosa pine, western larch, and western white pine, while also reducing fuels and creating patch sizes consistent with natural disturbance regimes. All seed tree and shelterwood harvest stands would be reforested by a combination of natural regeneration or planting of desired species, while clearcut stands would generally be reforested by planting. In addition, broadcast burning, slashing, piling, and scattering non-merchantable trees and brush, and site scarification could occur to prepare the site for planting or the seedbed for natural seeding. Shelterwood harvest is planned where existing overstory trees are needed to be retained to provide for shading and protection of the newly established seedlings. Each of these treatments would retain existing overstory trees and down wood, where available, for long term stand structure and snag replacements. Thirty-six units, alone or in combination, would be over 40 acres, (2, 5, 6, 7, 12, 13, 15, 16, 20, 23, 25, 29, 30, 33, 35, 49, 57, 60, 62, 63, 64, 65, 69, 74, 85, 86, 88, 90, 93, 94, 100, 115, 116, 123, 124, and 130) but none of the units exceed maximum opening sizes identified in Table 21 of the forest plan.

Jackknife: Proposed Action

Project Information

The Jackknife project is located on the Tally Lake Ranger District of the Flathead National Forest. The 2,071-acre project area is northwest of the Whitefish, approximately one mile west of the community of Olney.

Land ownership within the project area is approximately 93 percent National Forest System (NFS) land and 7 percent private lands. All proposed activities would occur on National Forest System land. The project area is located within the wildland-urban interface, established by the Flathead County Community Wildfire Protection Plan (2011).

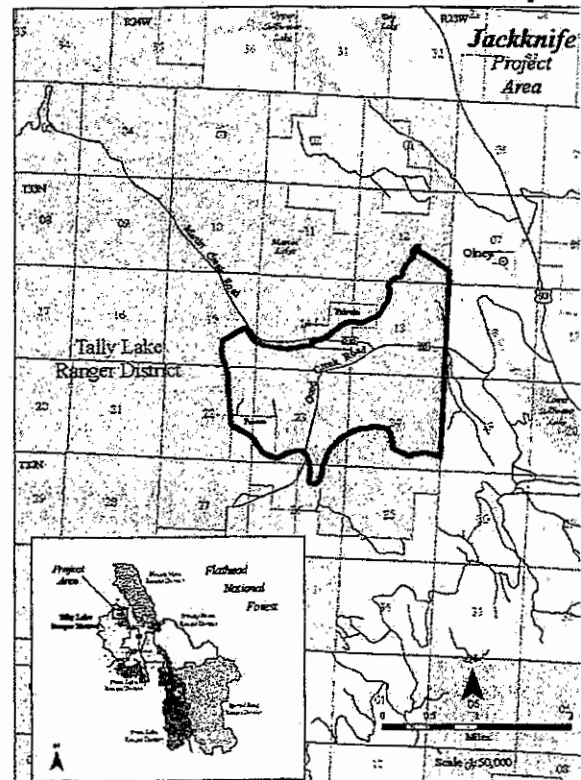
The 2018 Flathead National Forest Land Management Plan ("Forest Plan"; USDA Forest Service 2018) provides an integrated set of management direction that is intended to provide for the social, economic, and ecological sustainability and multiple uses of the Forest's lands and resources. The plan was developed under the 2012 planning rule (36 CFR 219) to guide collaborative and science-based revision of forest plans that promote the ecological integrity of national forests while considering social and economic sustainability (USDA Forest Service 2018, p. 1).

The Forest Plan divides the Forest into six geographic areas to provide management direction that reflects community values and local conditions specific to an area. The Jackknife Project is within the Salish Mountains geographic area. More information on the Salish geographic area is on pages 130-139 of the Forest Plan.

Management area direction

The Forest Plan designates areas with similar management needs and desired conditions into sixteen management areas. The Jackknife project area is entirely the management area (MA) displayed in Table 1 below. More information on these management areas is on pages 106-110 of the Forest Plan.

Figure 1. Vicinity Map



LAL= ~~Upper~~ ~~Griffin~~ Martin
Stillwater

for lower tree densities and reducing surface fuels within the wildland-urban interface. It is also desired to locate and maintain fuel breaks across the forest and improve egress access to and from adjacent private lands to create an environment that is safer for firefighters should a wildfire start (FW-DC-FIRE-01, 02, and 07 and FW-DC-TE&V-13).

Improve the diversity and resilience of vegetative communities.

To improve the diversity and resiliency of the project area, vegetation treatments are needed to reduce moderate and high-density forest conditions with focus on timber productivity and fuels objectives in the wildland urban interface. In addition, treatments are needed to increase presence of ponderosa pine, western larch, and western white pine and maintain and increase the presence of large and very large size classes of trees by maximizing the retention and resilience of individual large trees and recruiting stands for the future. This would maintain relatively low levels of insect and disease activity and resulting fuel loads in the wildland urban interface and riparian management zones (FW-DC-TE&V-07, 08, 11, 13, and 21 and FW-DC-RMZ-01).

Proposed Action

The proposed action is a set of management actions to meet the purpose and need for action as described above. Table 2 provides a summary of the components of the proposed action. Following the table is more information related to these components.

Table 2. Summary of proposed activities.

Proposed vegetation treatments	Acres
Commercial thin and Improvement Cut	1,201
Seed tree	17
Shaded fuel break	16
Total proposed commercial treatment	1,234
Precommercial thin	185
Understory thinning	69
Plant Trees	2
Total proposed noncommercial treatment	256
Proposed road management	Miles
NFS haul routes to receive BMPs	9.0
Temporary road construction	1.4

Proposed Vegetation Treatment Descriptions

Commercial thin and Improvement Cut are intermediate treatments that retains a generally well stocked stand composed of the healthiest trees with large, well-formed crowns. The objective of these treatments is to improve forest growth and resilience by reducing overall stand density for the commercial thin units or improving species composition and structure for the Improvement Cut. Leave tree selection would favor fire-tolerant species, including ponderosa pine and western larch. These trees would then have more growing space, light, nutrients, and water to allow them to develop into large trees more rapidly with improved insect, disease, and fire tolerance. These treatments would also achieve fuels reduction and timber production objectives by reducing tree densities and ladder fuels allowing for vigorous growth of preferred species.

$$\log = 4,950$$

$$NE = 2,327 \Rightarrow 7277$$

- OK
part.

Stovepipe: Proposed Action

Project Area

The Stovepipe project is located on the Tally Lake Ranger District of the Flathead National Forest. The approximate 32,400 acre project area is northwest of the Flathead Valley on the east side of Reid Divide and south and east of Tally Lake. It includes primarily the Lost Creek and Cliff Creek drainages (Figure 1).

Land ownership within the project area is approximately 60 percent National Forest System (NFS) land and 40 percent private or State-owned lands. All proposed activities would occur on National Forest System land. The project area is located within the wildland-urban interface, established by the Flathead County Community Wildfire Protection Plan (2011).

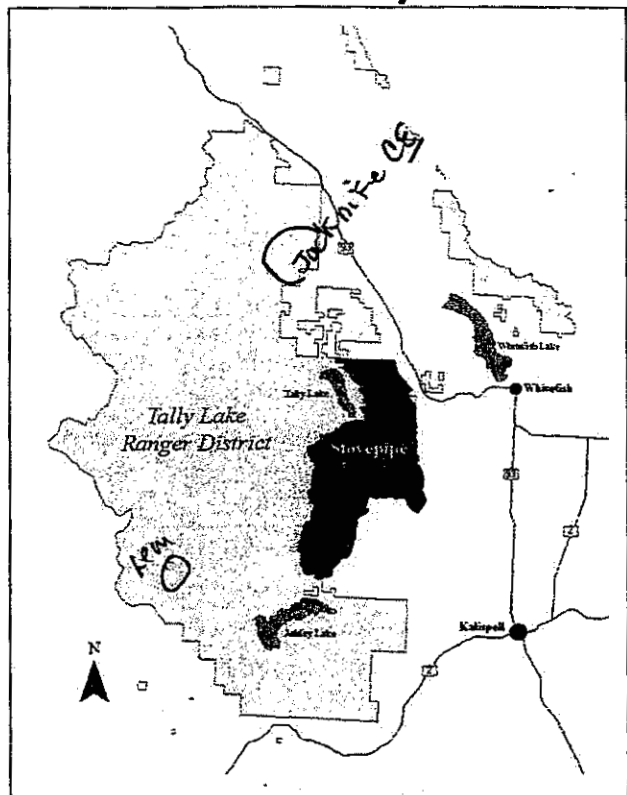
The Flathead National Forest 2018 Forest Plan

The 2018 Flathead National Forest Land Management Plan ("Forest Plan"; USDA Forest Service 2018) provides an integrated set of management direction that is intended to provide for the social, economic, and ecological sustainability and multiple uses of the Forest's

lands and resources. The plan was developed under the 2012 planning rule (36 CFR 219) to guide collaborative and science-based revision of forest plans that promote the ecological integrity of national forests while considering social and economic sustainability (USDA Forest Service 2018, p. 1).

The Forest Plan divides the Forest into six geographic areas to provide management direction that reflects community values and local conditions specific to an area. The Stovepipe Project is within the Salish geographic area. More information on the Salish geographic area is on pages 130-139 of the Forest Plan.

Figure 1. Vicinity map



$$PA = 32,400$$

$$16,289 \text{ bc}$$

$$\text{add } 15.9 \text{ perm}$$

$$3.3T$$

6/3/26
Obs = 7/12/26

Management area description

The Stovepipe project area is located within the Salish geographic area of the Flathead National Forest. The project area is primarily composed of National Forest System land and includes the Lost Creek and Cliff Creek drainages. The project area is located within the wildland-urban interface, established by the Flathead County Community Wildfire Protection Plan (2011).

PA in Salish Geog Area

Contribute to continued timber production and economic sustainability.

Vegetation treatments in the project area could produce a variety of timber products while contributing to ecological sustainability and vegetation desired conditions. Production of timber contributes jobs and income to local communities. Forest conditions on timber production lands are maintained to provide sustainable regularly scheduled timber harvest. Active management of timber production lands results in resilient conditions with less potential for loss of timber to natural disturbances (FW-DC-TIMB-01, 02, 04, and 07).

Proposed Action

The proposed action is a set of management actions to meet the purpose and need for action as described above. Table 2 provides a summary of the components of the proposed action. Following the table is more information related to these components.

Table 2. Summary of proposed activities.

Proposed vegetation treatments	Acres
Commercial thin	4,175
Seed tree	503
Clearcut	220
Shaded fuel break	52
Total proposed commercial treatment	4,950
Precommercial thin	940
Understory removal	299
Hazardous fuels treatment	360
Prescribed burning	573
Shaded fuel break	155
Total proposed noncommercial treatment	2,327
Proposed road management	Miles
NFS haul routes to receive BMPs	77.0
Temporary road construction	3.3
System road construction closed yearlong	14.1
System road construction open yearlong	1.8
Decommissioning	1.0
Roads changed from open yearlong to closed yearlong	2.6

3.3
14.1
1.8

Perm = 15.9

Proposed Vegetation Treatment Descriptions

Commercial thin is an intermediate treatment that retains a generally well stocked stand composed of the healthiest trees with large, well-formed crowns. The objective of this treatment is to improve forest growth and resilience by reducing overall stand density. Leave tree selection would favor fire-tolerant species, including ponderosa pine, western larch, western white pine, and Douglas-fir on most sites and would emphasize retention of full crowned species on important white-tailed deer winter range by emphasizing increased retention of Douglas-fir canopy to provide snow intercept conditions. These trees would then have more growing space, light, nutrients, and water to allow them to develop into large trees more rapidly with improved insect, disease, and fire tolerance. Commercial thinning would also achieve

Cyclone Bill Project Proposed Action

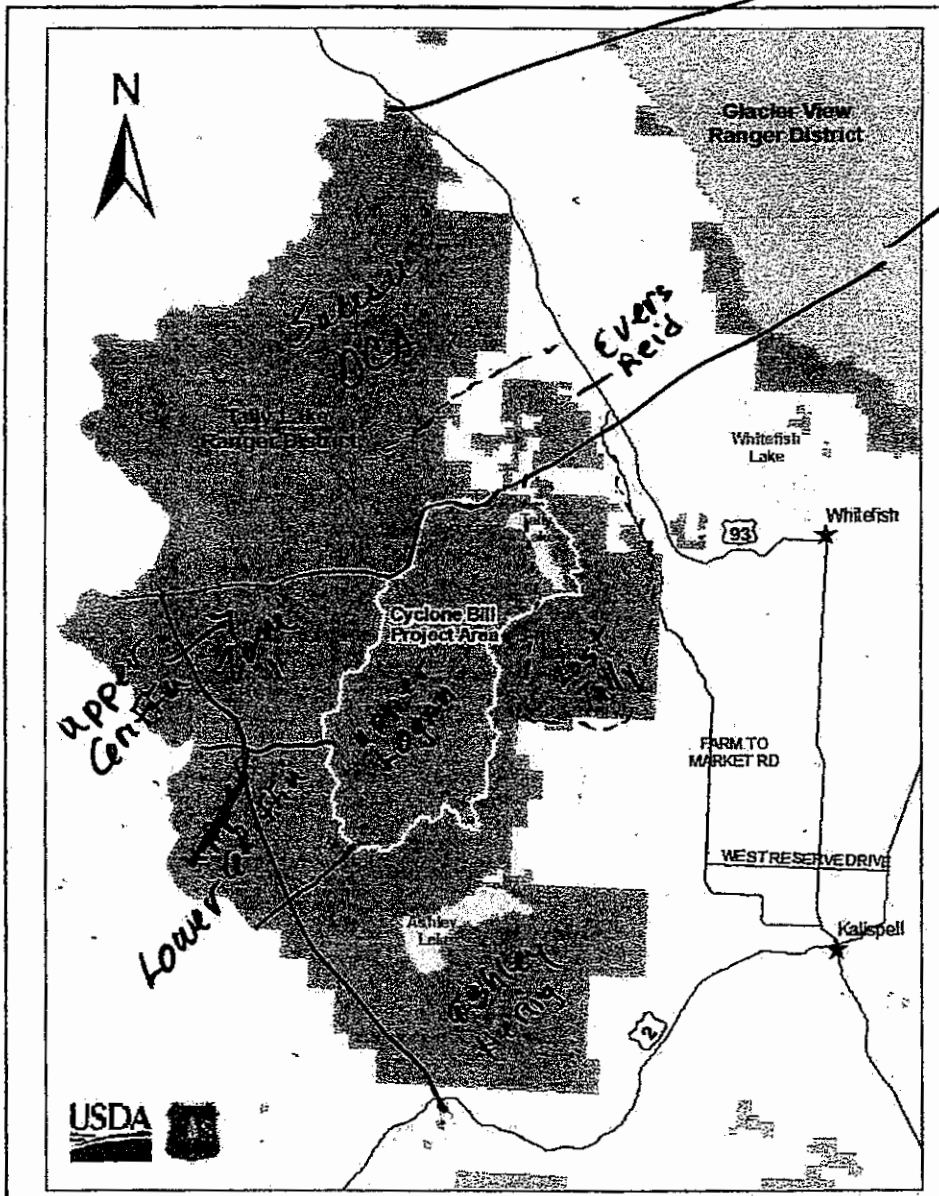


Figure 1. Project vicinity map

also
Switz Cr -
Still water
Con Area

CH-
LAKS
Upper Logan

PA = 49,880'

Log = 9,694

US = 4,838

Rds: 3 T
14.7 new P
~15 mi

LAK = Upper Logan

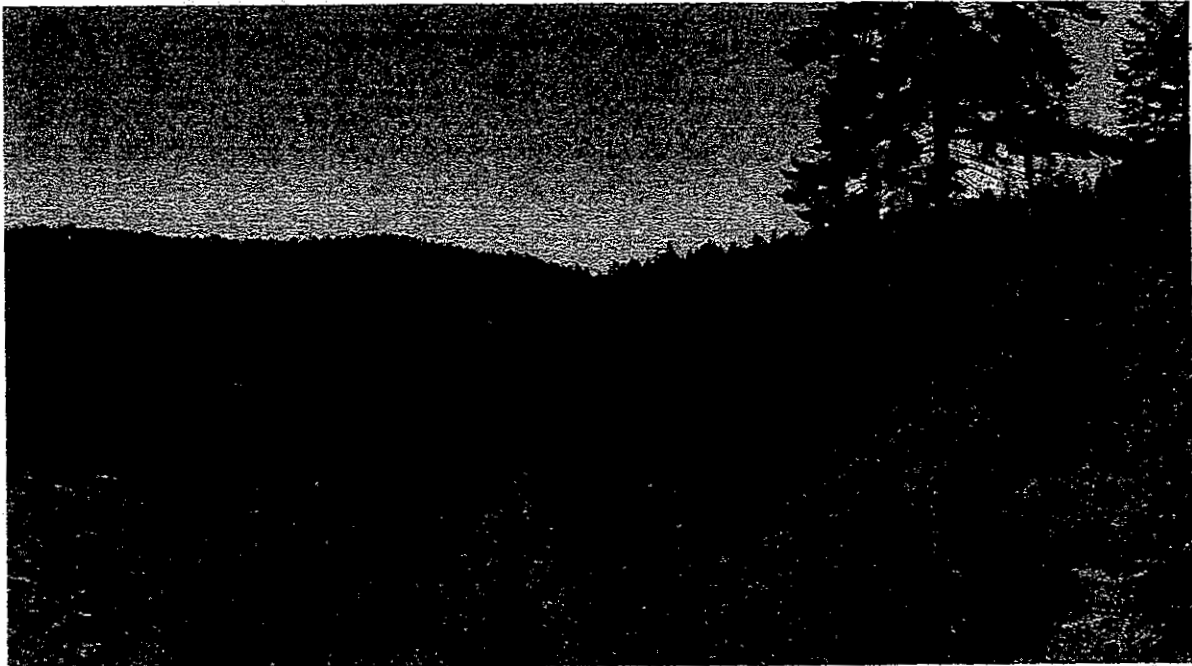


Figure 4: Previous harvest has resulted in even aged stands, continued development of these stands towards larger size classes can be accelerated by thinning.

Proposed Action

The proposed action is a set of management actions intended to meet the purpose and need for action as described above. The tables below provide a numerical summary of the components of the proposed action.

Table 1. Summary of vegetation management activities

Proposed vegetation treatments	Acres
Commercial thin	3,956
Improvement cut	1,097
Shelterwood	2,359
Seed tree	1,299
Clearcut	597
Group selection with matrix thinning and retention patches	386
Total proposed commercial treatment	9,694
Thin from below	3,541
Prescribed burning with understory slashing	1,297
Total proposed noncommercial treatment	4,838

Table 2. Summary of road management

Proposed road management	Miles
National Forest System haul routes	210
County road used for haul routes	32
Temporary road construction	3.0
New system road construction (to be closed yearlong)	14.7
New system road construction (to be open seasonally)	0.2
New system road construction (to be open yearlong)	0.3
Existing system road to be converted from open yearlong to gated/closed yearlong	0.5
Existing system road to be converted from seasonally open to gated/closed yearlong	0.3