



THE WILDLIFE SOCIETY

ALASKA CHAPTER

The Alaska Chapter of The Wildlife Society strives to enhance the ability of wildlife professionals to conserve biological diversity, sustain productivity, and ensure responsible use of wildlife resources in Alaska for the benefit of society.



January 17, 2020

Secretary David Bernhardt
c/o Bureau of Land Management, Alaska State Office
Attn: NPR-A IAP/EIS
222 West 7th Ave, #13
Anchorage, AK, 99513-7504

Re: Alaska Chapter of The Wildlife Society Comments on the Draft Environmental Impact Statement for the New Integrated Activity Plan for the National Petroleum Reserve in Alaska

Dear Secretary Bernhardt,

This letter represents the Alaska Chapter of The Wildlife Society's public comments on the Draft Environmental Impact Statement (DEIS) for the new Integrated Activity Plan for the National Petroleum Reserve in Alaska (NPR-A). The Wildlife Society (TWS) was founded in 1937 and is a non-profit scientific and educational association of over 15,000 professional wildlife biologists and managers, dedicated to excellence in wildlife stewardship through science and education. Our mission is to inspire, empower and enable wildlife professionals to sustain wildlife populations and habitats through science-based management and conservation. Our professional membership represents and serves the community of scientists, managers, educators, technicians, planners and others who work actively to study, manage and conserve wildlife and its habitats worldwide. The Alaska Chapter of TWS has about 200 members in Alaska representing wildlife scientists and resource managers including those working for state and federal agencies, Native organizations, universities, non-profit groups and consulting biologists.

These comments focus primarily on the DEIS analysis of impacts to geese and caribou, with some comments on shorebirds. We focus on geese (especially brant) and caribou because those are the species that appear to be the main drivers for development of alternatives B, C and D. Also, there has been a substantial amount of research conducted on geese and caribou in the NPR-A and elsewhere in Alaska, much of it involving members of our professional organization. We also provide comment on many of the proposed required operating procedures in the DEIS.

The welfare of geese and caribou is closely associated with the success of local subsistence hunters. Geese and caribou are critically important subsistence resources for the four communities in the NPR-A and for neighboring communities such as Pt. Hope, Pt. Lay and Anaktuvuk Pass. Subsistence hunting activities may also be an important driver for some aspects of the alternatives, but as professional wildlife biologists, not anthropologists, we do not attempt to address this. The Native people of the NPR-A can and will speak eloquently for themselves.

Impacts to Molting Brant

The DEIS (pg. 3-128) states that 22% of the global population of brant uses the Teshekpuk Lake area during their molt. During this flightless period, brant are especially sensitive to disturbance. A "Goose Molting Area" (GMA) has been defined in which brant and other molting geese receive greater protection than outside that area. Under alternative A, the GMA is closed to leasing and as such provides adequate protection for molting brant and other species found therein. Alternatives B and C also close the area to leasing but allow a pipeline corridor through it to transport oil from potential offshore development to the existing pipeline network. Although there would presumably be little human activity associated with such a pipeline during the period geese are present, such a structure would provide a "perch" for raptors seeking to prey on geese causing geese to cease feeding/resting and to flee onto a nearby lake. As the DEIS states, such disturbance may prevent geese from acquiring sufficient calories to migrate on time in the fall, with a consequent reduction in goose survival. The Final Environmental Impact Statement (FEIS) must estimate the probability that this could lead to a lower goose population or even to local extinction.

Alternative D would open the entire GMA to leasing, although portions of it would allow no surface occupancy within 0.5 miles of molting lakes. Past studies have clearly shown that human activity at much greater distances than this can send molting geese onto the lakes and away from their foraging/resting habitat. Again, the FEIS must estimate the probability that such a scenario may result in goose population reduction. It should not assume that geese can be displaced without consequences.

Past studies have also shown that molting geese will flee onto lakes during aircraft overflights. ROP F-3 requires that lessees must minimize aircraft use in the GMA but does not clarify what "minimize" means in terms of number and routes of flights. It is thus unclear what level of protection this ROP will actually convey. Furthermore, the BLM may state such requirements in its conditions of use provided to lessees and permittees, but in the last 20 years has done little or nothing to monitor this type of activity. This raises concerns about enforcement and the ultimate effectiveness of such aircraft restrictions. The FEIS must discuss the probability that such flights would have population level effects on brant or other molting geese. The additive effects of these impacts on brant would likely mean that Alternative D would not provide adequate protection to prevent brant population reduction or even extirpation in the Teshekpuk Lake Special Area (TLSA), which was initially designated to do just that. Such an outcome would not represent "balance" in use of the land.

On page 3-152, the DEIS states that cumulative "impacts will likely grow ... as infrastructure extends westward from the Alpine Satellites." They would also increase if a community road is built through the TLSA to connect Nuiqsut with Utqiagvik and/or Atkasuk. The DEIS states that such a road would be allowed under all action alternatives. The FEIS must estimate the probability that the resulting impacts of such a road will result in population-level effects on brant.

Impacts on the Teshekpuk Caribou Herd

Alternative A provides protection for the core summer (calving through insect avoidance seasons) habitat of the Teshekpuk Caribou Herd (TCH), by making portions unavailable for leasing. Leasing and infrastructure restrictions in these areas will also convey protections during other seasons, as the area around Teshekpuk Lake is used by at least some of the TCH year-round (Person et al. 2007). Notably, this is also the only alternative in which all roads, including community transportation infrastructure roads, are prohibited north of Teshekpuk Lake. Alternative A also maintains no leasing restrictions further south of Teshekpuk Lake than any of the action alternatives. The DEIS acknowledges that the lands south of Teshekpuk Lake are at high risk for future leasing and development,

increasing the likelihood that maintaining leasing prohibitions in these areas will have tangible benefits for TCH calving and other season habitat protection.

Alternative B also makes the areas around Teshekpuk Lake unavailable for leasing, conveying habitat protections for the TCH. The configuration of these unavailable lands differs from Alternative A, which BLM states is based on recent caribou calving location data that has shown calving further to the west than previously observed. It is unclear, however, whether this altered configuration of leasing restrictions would better protect the TCH in the future. No analysis is done of the expected impacts of raising the southern border nor of extending the western boundary of the area in which leasing is prohibited. This should be completed in the final EIS. Recent work with the Western Arctic Caribou Herd (WAH) shows that while caribou vary their precise calving locations from year to year, they tend to return to the same general area repeatedly (Caribou Trails 2019). The area around Teshekpuk Lake has long been important to the TCH and is likely to remain so in the future if left undisturbed. Alternative B also allows up to two pipeline corridors in the sensitive Teshekpuk Lake area and the possibility of a community transportation infrastructure road north of Teshekpuk Lake. As the DEIS points out, there is a critical movement corridor east of Teshekpuk Lake that could be affected by such infrastructure and associated human activities. The IAP EIS needs a more robust analysis of such potential impacts.

Alternative C makes a much smaller area immediately around Teshekpuk Lake unavailable for leasing compared to alternatives A or B. While Alternative C establishes no surface occupancy and timing restrictions on development activities within the core calving area, as defined by the most recent 50% density contour during calving season, density contours will change repeatedly over the years with the use of newer location data and are not locatable on the ground. At a minimum, such boundaries for protection should be expanded to the nearest township or section boundaries. Even then, Alternative C would have a lower probability of preventing population level effects on the TCH. This is compounded by the possibility of right-of-way access through no surface occupancy areas, which would be allowed under Alternative C. Roads in these areas could have negative effects on caribou during sensitive calving, post-calving, and insect relief periods.

Alternative D makes all of the TCH summer range within the NPR-A available for leasing. A very small portion of it northeast of Teshekpuk Lake would allow no surface occupancy to protect molting geese, and the current 50% calving kernel would be subject to timing restrictions. This alternative magnifies the problems for the TCH described for Alternative C. It is unlikely the TCH would escape population level effects. Alternative D does not represent “balanced” use of the land in the NPR-A from the perspective of the TCH.

The impacts analysis for the TCH in the DEIS needs updating. The 2019 NPR-A oil and gas lease sale greatly increased the acreage leased within the NPR-A, including a substantial area leased to the west of most previous leases. This information is not included in calculations of caribou habitat percentages or numbers of individuals overlapping with lease and infrastructure restrictions. Some of the new leases overlap with areas that would have leasing restrictions under some action alternatives, especially Alternative B. The DEIS states that leasing restrictions and stipulations under the revised IAP will only pertain to new leases, not to those already existing when the IAP is finalized. BLM has made clear in the past that issuing a lease carries with it an obligation to allow development of that lease. This means that the acreages assumed to be unavailable to leasing or with infrastructure restrictions under the DEIS no longer match the conditions within the NPR-A. The EIS must be updated to more clearly reflect the potential impacts in already leased lands and how this alters potential protections for species and habitats under each alternative.

Furthermore, it is surprising that BLM did not attempt a stronger quantification of impacts of the various alternatives on caribou and other species, especially in light of the existence of methods to quantify the range of potential impacts of leasing proposals while accounting for uncertainty in oil and gas development (e.g., Wilson et al. 2013). The reasonably foreseeable development scenarios proposed by BLM do an inadequate job of reflecting future development, such as not accounting for existing or proposed infrastructure in their development

footprints and acreages. BLM should use the best available scientific approaches to inform their comparison of alternatives and include a robust quantification of relative impacts, following Wilson et al. (2013) or a comparable method, in the FEIS. BLM should also provide a quantitative analysis to estimate probabilities of population level effects under each alternative.

The analysis in the DEIS of cumulative effects on the TCH is inadequate. The Arctic Strategic Transportation and Resources (ASTAR) project would likely include an all-weather road to connect Utqiagvik and other North Slope communities to the Alaskan road system. This reasonably foreseeable development would have significant adverse impacts on the TCH, which is an important subsistence resource for residents of the North Slope. This herd calves primarily in the TLSA and also uses this area for insect avoidance during the mosquito season. Both are critical periods in the caribou life cycle. Existing research clearly demonstrates that calving caribou avoid areas within 6 km of roads and that a network of roads and pipelines can hinder caribou movements during insect avoidance. The cumulative effects section of the FEIS must analyze these impacts on the TCH in terms of probability of population level effects.

Impacts on the Western Arctic Caribou Herd

All alternatives protect parts of the Western Arctic Herd's (WAH) summer range by making them unavailable for leasing. Alternative B protects a little more of the calving habitat at its northern extent, compared to Alternative A, but opens the eastern portion of the WAH's insect relief habitat. Alternatives C and D make far less area unavailable for leasing than either A or B. They also open a strip of land along the southern boundary of the Utukok River Uplands Special Area for development. Development in this area could impede the ability of pregnant female caribou to reach the calving grounds, as well as interfere with summer movements to access insect relief and foraging habitat. Such interference could influence herd productivity and body condition, potentially leading to population-level consequences. The FEIS needs to include quantitative estimation using robust scientific methodology to predict the probabilities of population level effects under each alternative. Since the Utukok River Uplands Special Area was designated in this region to protect the WAH, population level effects would violate the intent of Congress in the Naval Petroleum Reserves Production Act of 1976.

The DEIS' cumulative effects analysis is inadequate for the WAH. The DEIS states that additive impacts to caribou from NPR-A leasing would likely be minimal because the Ambler road primarily affects the WAH. The environmental impacts analysis for the WAH is still being revised making it inappropriate to assume a lack of impacts for the WAH. There are a number of reasons for concern about impacts to the WAH from the proposed Ambler road, as well as associated mines in the Ambler Mining District, as we pointed out in our comments on the Ambler Road DEIS. BLM needs to provide a more thorough cumulative effects analysis that fully accounts for the potential impacts of the proposed Ambler road, associated mines in the Ambler Mining District, southeastern NPR-A development, and other potential development in the WAH range, including ASTAR, Red Dog Mine expansion at the Anarraaq-Aktigiruk exploration site to the west of the NPR-A, and the proposed road between the DeLong Mountain Transportation System and community of Noatak currently being considered through the Noatak Planning and Environmental Linkage study.

Impacts on Shorebirds

The NPR-A is an important area for breeding shorebirds from the East Asian-Australasian and Central Pacific flyways. Globally, many shorebird species' populations are declining and the existence of breeding habitat within the NPR-A offsets further declines. However, impacts to shorebird breeding habitat within the NPR-A could reduce or remove these offsets. It is important for the DEIS to address any significant negative global impacts to shorebirds.

The lack of protection stated in the DEIS could negatively impact the Qupaluk East Asian-Australasian Flyway Network Site. The Qupaluk site, located northeast of Teshekpuk Lake, is a part of the East Asian-Australasian Flyway Network Partnership system. This internationally recognized site is important, featuring a significant proportion of the breeding population of Dunlin (*Calidris alpina arctica*), breeding habitat for approximately 30,000 migratory waterbirds, and habitat for threatened Steller's Eider (*Polysticta stelleri*) and Spectacled Eider (*Somateria fischeri*). Surface development here will threaten the integrity of this site. We request that the EIS protect the Qupaluk East Asian-Australasian Flyway Network Site in all action alternatives.

The Teshekpuk Lake Special Area was expanded in 2013 to protect shorebird habitat while continuing to protect waterbird habitat. The move of the Teshekpuk Lake Special Area southern boundary to the north, as described in alternatives B-D, will fail to maintain protection of this habitat for ducks, geese, swans, and shorebirds. Additionally, the existence of new pipelines within the Teshekpuk Lake Special Area will increase the impact predators have on shorebirds and other nesting species, as noted above. Pipelines will provide increased perching and nesting/denning habitat for predators. We request the EIS maintain the Teshekpuk Lake Special Area southern boundary in all action alternatives.

The exemption for allowing community infrastructure development in all action alternatives in the DEIS could negatively impact shorebirds. For example, a new road from Nuiqsut to Utqiagvik will increase human access and potentially increase disturbance to nesting shorebirds and other bird species there. Roads, pipelines, and powerlines may increase shorebird predator presence. Additionally, the installation of elevated power lines may cause an increased strike hazard for birds during low visibility. We request the EIS not allow any potential new roads to be routed north of Teshekpuk Lake in any alternative.

IAP Required Operating Procedures

Regardless of which alternative BLM ultimately selects, there are multiple areas where proposed required operating procedures (ROPs) should be utilized or could be strengthened. Here we review some of these opportunities and make recommendations for BLM to adopt in the final EIS, regardless of which alternative is selected.

- **ROP A-4**
 - Reducing potential for spills of hazardous chemicals is important to maintain a healthy environment. Alternatives B-D restrict the focus of this ROP to just "fuel spills," removing mention of "crude oil, and other liquid chemical spills." The action alternatives also contain less detail than Alternative A about requirements for storage containers, liner material, etc. and restrict requirements to only apply to permittees with an oil storage capacity of 1320 gallons or greater. Furthermore, procedures intended to protect the environment during overland moves and seismic exploration are removed from alternatives B-D. Taken together, these various changes reduce the potential for environmental protection. The language from Alternative A should be applied to the final selected alternative.
- **ROP A-5**
 - This ROP is intended to minimize impacts of refueling on the environment. While Alternative A prohibits refueling and storage of fuel within 500 feet of the active floodplain of waterbodies, alternatives B-D relax this distance to 100 feet. This reduction in protections is not justified. BLM should maintain the language from Alternative A no matter which alternative is ultimately selected.

- ROP A-8
 - This ROP serves an important role in minimizing human-wildlife conflict with respect to predators. The language under alternatives B-D strengthens and broadens protections to include more species and provide greater specifics. These additions are important and this language should be adopted regardless of the alternative selected.
- ROP B-2
 - Language under alternatives B-D appears to strengthen protection for fish and other aquatic species and should be applied to the selected alternative.
- ROP C-1
 - Addition of specificity and description regarding protection of seals around their lairs and breathing holes provides important improvement of protections and should be incorporated into the final selected alternative.
 - Polar bear protections are more mixed. Under Alternative A, polar bears are not included in the caveat about potential for allowing activities near bear dens if alternative protective measures are approved, while this is relaxed under alternatives B-D. The language from Alternative A should be used to ensure maximum protection of this critical predator. Furthermore, while specificity about activity restrictions around known polar bear dens is improved in the language under alternatives B-D, the comment about restricting timing of activities to limit disturbance is unclear and additional details are needed to provide guidelines for what timing is acceptable.
- ROP C-2
 - The language under alternatives B-D provides important increased environmental protections for winter tundra travel. Specifically, the switch from date-based limits on operations to condition-based limits is an important way to deal with the variability imposed by climate change on the Arctic. In addition, the increased lag time from 1 to 2 years between ice roads being allowed to overlap should help reduce impacts to sensitive tundra vegetation and habitats. These protections and other language should be incorporated into the final ROP, regardless of the alternative selected.
 - We were pleased to see the provision that lessees provide BLM with as-built shapefiles of ice roads, snow trails and ice pads. Temporary winter infrastructure has been difficult to record and analyze in the past but is important for determining the full scope of potential impacts from oil and gas activities. We ask that this provision be maintained in the selected alternative and that the ROP be updated to specify that these data will be made available to researchers upon reasonable request. This will help ensure that the scientific community can access the information needed to evaluate potential impacts on public lands and will avoid unnecessary restriction of data.
- ROP C-4
 - Mention of invertebrates is removed from alternatives B-D and prohibitions on travel are reduced to only “primary” ice roads and snow trails. No explanation is given for these changes, nor does the IAP define what qualifies as primary roads and trails. These reductions in protections could have negative environmental impacts. The language from Alternative A should be applied to the final selected alternative.
- ROP E-6
 - Language here was moved from BMP E-14 but was downgraded to requiring only “at least 1” year of hydrologic and fish data, rather than at least 3 under BMP E-14 for Alternative A. The more stringent requirements of Alternative A should be maintained in the selected alternative.
- ROP E-10
 - Alternatives B-D strengthen requirements to minimize bird collisions. These protections should be included in the selected alternative.

- ROP E-18
 - Alternatives B-D restrict the Objective to only apply to eider nests “within the Barrow Triangle area.” No such restriction was present in Alternative A. The final alternative should remove this narrowing of scope.
 - Timing of ground level activity restrictions is shortened under alternatives B-D, with no explanation given for why the end date is moved from August 15 to July 31. Especially in light of a changing climate and extended summer seasons, it is unclear how such a shift would adequately protect eiders. While a statement is added to the action alternatives about applicants being encouraged to work outside the eider nesting window, this does not convey the same level of protection as ground activity restrictions. Language from Alternative A should be maintained in the final selected alternative to avoid a great reduction in protections for nesting eiders.
- ROP E-23
 - While it is admirable to have a workshop to inform citing of infrastructure in critical habitat, it is notable what parties are not listed. We ask that the list of groups to be invited to participate in such a workshop be expanded to include academics, conservation organizations, and industry, as well as the entities already listed.
- ROP F-2
 - Requirement b states that during design, larger landing strips should be considered to allow the use of larger aircraft. Under BMP F-1 for Alternative A it is explicitly stated that this is to result in fewer flights to the facility. Before such a decision is made, the IAP should specify that a cost-benefit analysis be conducted that contrasts estimated flight numbers and frequency with the acres affected based on different runway length options. This should be used to inform the decision of whether a larger airstrip that can accommodate larger aircraft will reduce or increase net impacts to the environment.
 - In the final EIS, we ask that a requirement be added to this ROP that lessees and others operating aircraft within the NPR-A provide flight line shapefiles and associated metadata, including aircraft type, timing of flight, altitude, etc. to BLM. These data should be made available to researchers upon reasonable request. Such data will enable monitoring and studies of aircraft impact. They can also be used to validate other data sources, such as sound recording data (e.g., Stinchcomb 2017).
- ROP F-3
 - The minimum altitude required for aircraft over caribou winter range is increased in alternatives B-D to 1500 feet, compared to 1000 feet in Alternative A. This should be incorporated into the final selected alternative.
 - The minimum altitude for aircraft is decreased, however, over calving, post-calving and summer ranges from 2000 feet under Alternative A to 1500 feet under alternative B. These are especially sensitive times of the year and the original 2000 foot minimum altitude should be maintained.
 - Alternatives B-D allow deviations from altitude restrictions for flights that require sight of the ground. In some cases, such as wildlife surveys, this is reasonable and justified, however addition of industry engineering surveys and ice road planning flights to the examples of permissible flights seems to greatly expand the possible range of impacts. Additional details and justifications are needed for what kinds of allowances will be granted and how protections for sensitive species and areas will be maintained.
 - The DEIS states that “BLM will provide maps and data of the areas listed above” so that key seasonal habitat can be avoided. Additional details need to be provided about how the locations of these areas will be determined, what data will be used, and how maps will be updated from year to year and even within years as species distributions change.

- ROP H-5
 - The requirement to make summary reports and data from studies on BLM lands publicly available is important to advancing scientific knowledge and public understanding of publicly-owned lands. We appreciate inclusion of this in alternatives B-D and ask that this be included in the final selected alternative.
 - While it is reasonable that exceptions can be granted to public availability of data in the case of sensitive data, we ask that the language of the ROP be updated to state that if such exceptions are granted it should be made clear to the public what data are being withheld, what justification is given for data being withheld, and what the process is for appeal or request for reasonable use of restricted data. This will strike an appropriate balance between protecting sensitive information and enabling inquiry.
- ROP M-1
 - Language is strengthened here under alternatives B-D and should be incorporated into the selected alternative.
 - There is an opportunity to provide critical data that can inform studies of road impacts on caribou. We ask that the ROP be updated so that monitoring is required, not optional as in M-1e, and that monitoring include records of traffic numbers on road segments to enable better studies of road and vehicle activity impacts on caribou and other species. Previous work has shown that traffic level affects the impacts of roads on species such as caribou (e.g., Leblond et al. 2013). It is rare that such data are collected in a proactive manner. The revised IAP provides an excellent opportunity to collect such information and enable studies.
- ROP K-3
 - Protections for waterbodies and riparian areas in alternatives B and C should also be applied to alternatives A and D to reduce the likelihood of negative environmental impacts in sensitive areas.
- ROP K-5
 - Language under Alternative B prohibits leasing within 1 mile of the coast and extends the buffer around walrus areas. These protections will play an important role for protecting species and habitat for caribou, shorebirds, and other species and should be extended to apply to all alternatives and be included in the final selected alternative.
- ROP K-7
 - As is pointed out above, allowing community infrastructure projects in sensitive areas for geese and caribou could have severe negative impacts. The exception for such projects should be removed from this ROP.
- ROP K-8
 - The stipulations for Alternative B that prevent new infrastructure should also be applied to Alternative A. This will not only protect brant habitat, but also will provide protections for caribou during various seasons.
- ROP K-9
 - As we point out above, there are grave concerns about the effectiveness of the protections for alternatives C and D. These alternatives are likely insufficient to avoid negative effects for the TCH. There are also some concerns for Alternative B, especially with regards to allowing community transportation infrastructure in sensitive areas, permitting pipeline corridors through otherwise closed areas, and the effects of the most recent lease sale on efficacy of protections.
 - As noted under ROP E-23, we ask that the list of groups to be invited to participate in a workshop to identify the best corridor for potential pipeline construction be expanded to include academics, conservation organizations, and industry.

- ROP K-14
 - Under the action alternatives, the northern portion of the Utukok River Uplands Special Area is added to the region where leasing is prohibited to protect WAH calving. This should also be applied to Alternative A and should be included in the final selected alternative.
 - Reductions in size of the no leasing area in alternatives C and D is of great concern, including removal of restrictions along the southern NPR-A boundary. Development in this area could hinder caribou access to calving grounds and summer movements and should be prohibited in the final EIS.
- ROP K-16
 - In principle this deferral of leasing around Nuiqsut is admirable, however, the observation that nearly the entire deferred area is already leased makes the protections conveyed by this ROP negligible. The EIS should have a more complete discussion of what protections would actually be provided given the current state of leases in the area.

Thank you for considering our comments on the NPR-A IAP/EIS. We appreciate the opportunity to provide input and hope that our expertise and perspectives will be duly considered and incorporated into the final EIS.

Sincerely,



Nathan Svoboda
President
Alaska Chapter of The Wildlife Society

References

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