United States Department of Agriculture | **Forest Service** | **Alaska Region** | **P.O. Box 21628 Juneau, AK 99802-1628**

File Code: 1570
Date: October 7, 2004

Mr. Buck Lindekugel
Southeast Alaska Conservation Council
419 6th Street, Suite 200
Juneau, AK 99801

Dear Mr. Lindekugel:

Pursuant to 36 CFR 215.17, I have reviewed the administrative appeal record for the Threemile Timber Sale Final Environmental Impact Statement (EIS) and Record of Decision (ROD). The Tongass Forest Supervisor signed the ROD. I have also considered the Appeal Reviewing Officer's (ARO) recommendation (enclosed) regarding the disposition of your appeal (Appeal No. 04-10-00-0012). The ARO recommended that the Forest Supervisor's decision be affirmed.

DECISION

I concur with the ARO's recommendation and I affirm the Forest Supervisor's decision. Your requested relief is denied.

In regard to the road system identified for the Threemile project, based on my review of the EIS, ROD, and project record I find that the roads and road management associated with the Selected Alternative constitute the minimum road system needed for safe and efficient travel and for the administration, utilization, and protection of National Forest System lands.

My decision incorporates, by reference, the entire administrative record, which includes the appeal and project planning records, and constitutes the final administrative decision of the Department of Agriculture [36 CFR 215.18(c)]. The ROD may be implemented 15 days following the date of this decision [36 CFR 215.10(b)].

Sincerely,

/s/ Steven A. Brink
STEVEN A. BRINK
Appeal Deciding Officer

United States Department of Agriculture **Forest Service** **Alaska Region** **P.O. Box 21628 Juneau, AK 99802-1628**

File Code: 1570 **Date:** October 6, 2004

Subject: Threemile Record of Decision and Final Environmental Impact Statement

To: Appeal Deciding Officer

This is my recommendation, as Appeal Reviewing Officer, on the action you should take, as Appeal Deciding Officer, on the pending appeals of the Threemile timber sale project. The following appeals were filed under 36 CFR 215:

#04-10-00-0010, filed by the Sierra Club, the Sitka Conservation Society, and the Natural Resources Defense Council;
#04-10-00-0011, filed by the Cascadia Wildlands Project; and
#04-10-00-0012, filed by the Southeast Alaska Conservation Council.

The decision being appealed is the decision by the Tongass Forest Supervisor to authorize the sale of timber and the construction of roads on Kuiu Island in southeast Alaska, approximately 20 miles southwest of Kake, Alaska.

The decision includes the harvest of approximately 665 acres (about 19.5 million board feet (MMBF) of saw log and utility volume) and the construction of about 4.2 miles of new classified road, 4.2 miles of temporary road, and a land-to-barge type log transfer facility (LTF) at Threemile Arm.

Background

A Notice of Intent (NOI) to prepare an EIS for the Threemile project was published in the Federal Register in March 1999, with a Revised NOI published in June 1999. The Draft EIS was released for public comment in January 2001. On April 23, 2004, the Tongass Forest Supervisor signed the Record of Decision (ROD) for the project. The Sierra Club, Sitka Conservation Society, and Natural Resources Defense Council; Cascadia Wildlands Project; and the Southeast Alaska Conservation Council (SEACC) (on behalf of SEACC and the Organized Village of Kake) appealed the ROD. Greenpeace, SEACC, and the Wilderness Society submitted interested party comments.

My review of these appeals was conducted pursuant to 36 CFR 215.15. The appeal and project records have been carefully reviewed in my consideration of the objections raised by the appellants and their requested relief. I have also considered the interested party comments. The Petersburg Ranger District prepared the enclosed indices of the documentation supporting the decision, which are keyed to specific issues raised by the appellants. My recommendation hereby incorporates the entire administrative record for the project.

The appellants list many interrelated issues in their appeals of the Threemile timber sale project. Although I may not have listed each specific issue, I have considered all of the issues raised in the appeals and believe that they are adequately addressed in the following discussions.

Appeal No. 04-10-00-0010 - Sierra Club, Sitka Conservation Society, and the Natural Resources Defense Council:

Issue 1. Whether the ROD for the Threemile project is consistent with the National Forest Management Act (NFMA) and the Tongass Land Management Plan (TLMP, or Forest Plan).

Appellants assert that the Threemile project is inconsistent with the standards and guidelines of the Forest Plan, and therefore violates NFMA. Specifically, appellants assert that the Threemile project cannot rely on the guidance in the "Powell memos" (April and August 1998 Tongass Plan Implementation Team (TPIT) Policy Papers) as this guidance contradicts Forest Plan heron and raptor survey requirements. Appellants further assert that the Threemile project violates Forest Plan standards and guidelines with respect to wolves, stating that there is no documentation in the project record indicating that surveys for dens were completed; that the Threemile ROD and Final Environmental Impact Statement (FEIS) fail to disclose that wolves are likely denning in the project area; that if any dens do exist they have not been protected as required by the Forest Plan; and that the record does not demonstrate the interagency analysis/communication required by the Forest Plan with respect to potential effects on wolves. Appellants also assert that the Threemile project violates Forest Plan standards and guidelines for the marbled murrelet, as murrelet nest habitat cannot be protected if the Forest Service has not surveyed for nests in the project area. Finally, appellants assert that the goshawk surveys required by the Forest Plan are not in the Threemile project record; thus, there is no way to determine if the surveys were conducted at the appropriate time of year, using appropriate survey methods and qualified personnel.

Discussion

The Forest Plan's standards and guidelines include direction for Wildlife Habitat Planning. Subsection X A 1. provides direction to "[c]onduct project level inventories to identify heron rookeries and raptor nesting habitat using the most recent inventory protocols" [TLMP p. 4-116]. The Tongass Forest Plan Implementation Clarification Papers [decision document 31] provide the "most recent inventory protocols." This direction was later extended indefinitely by the Forest Supervisor's letter to the Tongass Leadership Team dated February 24, 1999 [Appellants' Exhibit 1, p. 7].

Herons

I find no basis for the appellants' assertion that this direction means that "[h]eron surveys are eliminated altogether," or that these protocols are inconsistent with the Forest Plan. Rather, the Tongass Forest Plan Implementation Clarification Papers merely describe the necessary protocols for implementing the standards and guidelines and other provisions of the Plan.

Appellants cite particular heron sightings noted in the project record. Two of these sightings were in the vicinity of Alvin Bay, outside of the project area and approximately 10 miles from

the nearest harvest unit or road construction approved as part of the Threemile ROD. The field notes for one of those sightings state that the wildlife biologist "[v]isited Unit 416-14 looking for a reported heron nest. I was unable to locate it even though I found the area and looked in every tree" ["Goshawk Calling on Kuiu Island," decision document #32, p. 27]. In a third reported sighting, also near Alvin Bay and outside the project area, the same document states "I recommend we drop unit 44, part of 45 and move the road location downhill to protect the heron rookery (this is the first heron rookery located in Southeast Alaska as far as I know)" [Id., p. 17]. None of these units are included in the Selected Alternative approved by the Forest Supervisor. The same document notes a heron sighting near Hiller Cove on September 28, 1994 [Id., p. 36]. The biologist was traveling along the beach conducting a general wildlife survey when the single bird was noted. Because this date is well outside the nesting period, and outside the time period for survey under the protocol (April through July), no follow-up survey for heron nesting was required. As stated in the FEIS, "[i]f any great blue heron rookeries … are identified in the future they will be protected according to the Forest Plan standards and guidelines" [FEIS, p. 2-29]. I believe that the forest has followed appropriate survey protocols for herons.

Raptors

Appellants further assert that "[t]he FEIS and Planning Record also show no indication that surveys for any raptors except the Queen Charlotte goshawk were performed." This is incorrect, as the FEIS describes efforts made to identify and protect raptor nests:

> Since 1992, Forest Service personnel have conducted valley watches, scanning the project area for raptors. Some sightings were reported but no nests were found in the project area. Monitoring will continue during project implementation. If nests are found, the applicable Forest Plan standards and guidelines will be applied. Implementation of the Forest Plan standards and guidelines is expected to prevent any adverse effects on raptors.

[FEIS, p. 3-179]. The FEIS goes on to state:

> The only proposed action near the shoreline is the construction of the [Log Transfer Facility] LTF in Threemile Arm. We have conducted bald eagle surveys in the vicinity of the proposed LTF. All proposed construction is well beyond the 330-foot buffer for all nests, active or inactive, in the area.

[FEIS, p. C-15]. Accordingly, I believe the FEIS and ROD demonstrate compliance with the applicable standards and guidelines of the Forest Plan with regard to raptor survey requirements.

Wolves

Appellants assert that the Forest Plan contains an implicit requirement to survey for wolf dens, and that no such surveys were conducted; thus, the project fails to comply with the Forest Plan. Appellants quote several statements in the project record, including a statement in the biologist's field notes that "Ed Crane joined us for a field day. Everett and I took him around the road system and showed him what we had planned. He agreed with me that there was probably a wolf den in the area of 2 mile on road 6461" [decision document #32, pp. 59-60]. The pertinent Forest Plan requirement is to "[m]aintain a 1,200-foot forested buffer, where available, around

known active wolf dens" [Forest Plan, p. 4-117, emphasis added]. There is no requirement in the Forest Plan to conduct a survey to locate all wolf dens in the project area.

Appellants also assert that "[t]he Threemile ROD fails to disclose that wolves are likely denning within the project area and clearly should such dens [exist] they have not been protected as required by TLMP." From the portions of the project record quoted by appellants, it is clear that information about the likely existence of a den was available to the Forest Supervisor when he signed the ROD, and to the public in the project record. In addition, the project map [FEIS, Figure 2-7] indicates that the nearest timber harvest unit is approximately 2,500 feet from the area noted in the record as the likely location of a den, whereas (as previously stated) the Forest Plan requirement is to maintain a 1,200-foot forested buffer, where available, around known active wolf dens. In my opinion, the Selected Alternative adequately protects wolf-denning habitat. If an active wolf den is identified during additional field work or project implementation, Forest Plan standards and guidelines will be applied.

Appellants also assert that "neither the planning record [n]or the FEIS makes any mention that interagency analysis/communication regarding impacts to wolves from this project occurred as required by TLMP." The requirement cited by appellants is included in the Forest Plan's Standards and guidelines for Wildlife:

> Implement a Forest-wide program, in cooperation with the Alaska Department of Fish and Game and U.S. Fish and Wildlife Service, to assist in maintaining long-term sustainable wolf populations. Where wolf mortality concerns have been identified, develop and implement a Wolf Habitat Management Program.

[Forest Plan, p. 4-116]. The Biological Evaluation included in the planning record includes a reference to a personal conversation with "Crain, Ed. ADF&G [Alaska Department of Fish and Game] Area Habitat Biologist, Petersburg, AK [decision document #33, p. 26]. This is the same person who accompanied the Forest Service employees on the field trip described in the field notes quoted in the appeal. The project record also includes another summary of a conversation between the Federal and State biologists:

> On 12/7/2001, I had a conversation with Rich Lowell, Area Biologist for the Alaska Department of Fish and Game located in Petersburg, Alaska. We talked about the status of the wolf population on Kuiu Island.
>
> Rich agreed with me that the population of wolves on Kuiu Island was stable, and probably increasing. Rich seemed to think that the population of wolves on Kuiu was higher than anywhere else in the area, but he is not sure why. It could be because the black bear population is large and is probably tied to the high beaver population on Kuiu. The deer population, which is normally the wolf's primary prey species, is still rebounding from the die-off in the early 1970's.
>
> Rich agrees with me that the harvest of wolves on Kuiu Island is more opportunistic and probably occurs when hunters are after black bears. There may be an increase in harvest when the Rowan Bay logging camp is in operation, but this camp is currently closed.

> Rich reminded me that Lilly Peacock, a graduate student working on black bears on Kuiu for ADF&G, watched wolves fishing. She observed that the wolves were better at fishing that the black bears and spent much less time successfully fishing than black bears.
>
> The Threemile Area is no exception; Ed Crain (the retired Area Biologist for the Alaska Department of Fish and Game located in Petersburg) and I walked one of the roads in the Threemile Study Area that had an inordinate amount of wolf sign on it. This was during the spring and we theorized that it had to do with a possible denning site in the area.
>
> Rich does not see any reason for concern regarding the wolf population on Kuiu Island for the near future.

[decision document #34, p. 3]. The same document includes an exchange of e-mail messages between the Forest Service biologist and Mr. Lowell, in which the Forest Service biologist asked his State counterpart to "[m]ake sure it [the summary of their conversation] is accurate and let me know if you agree with this," to which Mr. Lowell replied "Jim and I made a few changes. Thanks for running this by me" [Id., pp. 1 and 2].

The Threemile ROD also summarizes several contacts with other agencies, including:

> Personnel from Alaska Division of Governmental Coordination (now the Alaska Department of Natural Resources, Office of Project Management and Permitting), Alaska Department of Fish and Game, Alaska Department of Environmental Conservation, and the U.S. Fish and Wildlife Service visited the project area during the environmental analysis [ROD, pp 10-11].

In summary, I believe the Threemile FEIS, ROD, and project record indicates that the Forest Plan requirements for interagency communication have been met, and that no wolf mortality concerns have been identified for the project area.

Marbled Murrelets

Appellants also assert that "[t]he [Threemile] ROD violates TLMP by not protecting marbled murrelets," arguing that "[b]ecause the Forest Plan provides specific direction to protect such areas, it is implicit that to do so one must first survey for nests." The Forest Plan does not require surveys of a project area to identify such nests.

The biologist's field notes included in the project record contain several references to marbled murrelet surveys conducted during project planning:

> Bob and I talked… while we sat looking for marbled murrelets flying into the bay that evening. We did not see any murrelets.
>
> * * *
>
> Completed a marbled murrelet survey from the boat this a.m. No birds noted.
>
> * * *

> [C]onducted marbled murrelet survey from the boat tied in Serenity Cove. 3 crows and 2 geese seen, no Mamu [marbled murrelets].
>
> * * *
>
> Alvin Bay Mamu Survey. Started at 0300 and watched until 0500. Saw one Mamu fly into the bay but did not see it go inland.
>
> * * *
>
> 0330 started a marbled murrelet survey…watched for evidence of murrelet nesting…but did not see any activity.

[decision document #32, pp. 18, 19, 23, 28, 54]. I believe the project record demonstrates that a considerable effort was made to survey for marbled murrelets, and that no murrelets were seen flying into the sale area. If a murrelet nest or nests are found during later field work or during project implementation, they will be protected as required by the Forest Plan.

Goshawks

Appellants further assert that "[t]he planning record is missing documents regarding the Queen Charlotte goshawk," and that none of the required surveys are included in the project record "as required." I disagree. The planning record is replete with references to these surveys, summarized as follows:

> During the 1994-1995 field season, we spent 6 to 8 10-day trips to Kuiu Island each year and walked over 300 miles. I had the goshawk caller on every occasion. I did not record the calling unless we had a response. This process also occurred during the 1996 to 1999 field seasons.
>
> Following the demise of the Long-Term Sale, we designed the Threemile Timber Sale using the existing unit pool from the Long-Term units. All these efforts were conducted under the 1992 protocols and we met those by calling [for goshawks] for two consectutive years. Again, in 1998 and 1999 we went back to the Threemile Sale Area and conducted more goshawk calling stations up river valleys and along all the road corridors. We followed and met the modified 1998 protocols. We did not get any response to the calling so I did not fill out any forms and we went ahead with the sale planning.
>
> The goshawk crew called for goshawks in all drainages of the Threemile Sale area again in 2001 without finding any goshawks.
>
> During the current season (2004), the Integrated Resource Inventory crew (IRI) called for goshawks in the Threemile Sale Area following the current Regional protocols. The results are located in the annual report on goshawks, which is just being completed. No responses were recorded.
>
> We will continue to monitor the sale area during implementation and any subsequent location of goshawks will necessitate the implementation of prescribed protective measures

> found in the Forest Plan. The Petersburg Ranger District has implemented these prescriptions before.
>
> * * *
>
> We have followed the Regional protocols for calling goshawks since the 1993 season. We have attempted to locate goshawks all over Kuiu Island from the north to the southern end of the island. While we have located goshawks on the northern, western, and central portions of Kuiu Island, we have not located any on the eastern or southern portions of the island. [The Threemile Arm Timber Sale Area is on the eastern portion of the island.] We continue to look and will follow all Forest Plan standard and guidelines if nesting pairs are located.

[decision document #32, pp. 1-2]. Other documents in the record describe specific goshawk survey activities and results for 2001 and 2004 in the Threemile project area, and in each case, no goshawks were detected [decision documents #39 and 40].

I believe that the project record contains sufficient information indicating that all applicable Forest Plan requirements related to goshawks have been followed.

Issue 2. Whether the Threemile ROD and FEIS adequately disclose the potential effects on marten, and whether the Forest Service can rely on the marten model to predict effects on marten.

Appellants assert that the Threemile FEIS does not adequately disclose the potential effects of the project on marten. Appellants note that the open road density after project implementation will be .36 miles of road per square mile, which exceeds the .2 miles of road per square mile density at which the marten habitat capability model predicts declines in marten densities. Appellants also assert that the marten habitat capability model relied upon by the Forest Service to predict marten habitat capability is not adequate to assess potential effects, as it fails to account for predator densities, prey density, winter severity, and trapping pressure. Appellants further assert that the Threemile project cannot rely on Forest Plan standards and guidelines for marten as the Plan fails to adequately protect marten viability, and that the Threemile ROD and FEIS fail to include critical new information regarding marten and assumptions made in designing the Forest Plan. Finally, appellants assert that there have been no studies to determine if the Forest Plan marten standards and guidelines are being or can be implemented properly, and that the only monitoring conducted to date has indicated that an insufficient number of trees of the correct diameter were retained and a number of trees had been lost to windthrow.

Discussion

Appellants are correct that the FEIS estimates there will be .36 miles of open road per square mile in the Threemile project area following implementation of this project [FEIS, p. 3-14]. The effects of this open road density on marten habitat were considered and included in the model's estimate of marten carrying capacity, which is displayed in Table 3-41 of the FEIS [FEIS, p. 3-172]. The open road density is also described in the subsistence analysis [FEIS, p. 3-131].

Appellants assert that the marten model "is not adequate to access impacts to marten as it fails to account for predator densities, prey density, winter severity, and trapping pressure." The marten model relies on habitat characteristics to evaluate relative differences in habitat capability between alternatives. It is not designed to incorporate non-habitat factors such as predator densities, prey density, winter severity, or trapping pressure. It was designed to capture the effects of timber harvest on marten habitat. The four factors mentioned by appellants would be the same in each alternative, and nothing would be gained by adding these parameters as separate components of the model.

In development of the model, however, prey availability was specifically considered when estimating relative values of stand age, beach fringe, and elevation [Habitat Capability Models for Wildlife in Southeast Alaska, 1993, pp. J8 through J9]. This same document discusses road density (with resultant trapping pressure) effects on marten. The Threemile project's Biological Evaluation [decision document #33, pp. 17-18] also discusses trapping pressure and describes a current study to monitor marten mortality, especially vulnerability to trapping.

I believe that the marten model is used appropriately; that supporting documents describe other factors that may contribute to effects of the project on marten; and that such factors were considered in determining the potential effects of the project on marten. In that regard, the only factor for which the Forest Service has responsibility is management of habitat. Factors such as a severe winter, a dramatic decline in the population of marten prey such as voles, a significant increase in trapping success, or any combination of such events, could result in significant pressure on marten populations. Trapping regulations set by ADF&G would play a key role in mitigating the effects of such factors.

Appellants assert that "[t]he FEIS and ROD also erroneously rely upon the TLMP to protect marten viability and fail to include new critical information from the scientific literature regarding this species." I disagree. Appendix N to the Forest Plan FEIS describes the risk assessment panel process used in 1995 to evaluate Forest Plan alternatives and components of the old growth habitat conservation strategy and marten standards and guidelines [TLMP FEIS, Appendix N, pp. 13-15]. This appendix also describes concerns expressed by individual panelists over certain components of the conservation strategy, including distances between Habitat Conservation Areas (HCAs) (now called old growth habitat reserves), the size of small HCAs, and the usefulness of connecting habitat corridors [p. N-13]. A similar panel was convened in 1997 to evaluate additional Forest Plan alternatives. Based on comments provided by panelists, information drawn from past studies on marten, and information on existing habitat conditions on the Tongass National Forest, the standards and guidelines for marten were further strengthened prior to implementation of the Forest Plan, and must be applied to high value habitat in five biogeographic provinces where risks were judged to be higher due primarily to greater past timber harvest activities in these areas. The Threemile FEIS documents that Kuiu Island is not in a high-risk biogeographic province [FEIS, p. 3-170].

The Robertson, et. al. draft reports referenced by the appellants identify a broad array of unanswered questions regarding marten populations, habitat use, and Forest Plan standards and guidelines for marten conservation. The report points out information needs, but does not provide any definitive answers to these questions.

As appellants note, a monitoring project is being conducted on the Wrangell Ranger District to evaluate the implementation and effectiveness of some of the marten standards and guidelines. In addition, the Alaska Department of Fish and Game (ADF&G) is studying marten abundance and diets in various locations around Southeast Alaska. New information will be thoroughly assessed prior to any changes to approved forest-wide standards and guidelines for marten. In my opinion, the marten model was used appropriately in assessing the potential effects of the Threemile project alternatives on marten.

Issue 3. Whether the Threemile ROD adequately protects bald eagles.

Appellants assert that the Threemile project should not tier to protective measures in the Forest Plan that are unproven, and that the Threemile EIS has not adequately considered the site-specific effects of the project on bald eagles and their nests. Appellants further assert that the Forest Service has failed to follow the conservation measures set forth in the Bald Eagle Conservation Interagency Agreement between the Forest Service and the U.S. Fish and Wildlife Service to survey all shoreline areas affected by road construction, timber harvest, camps, or LTF sites, and that the project record does not demonstrate that all nests within the project area, active or inactive, are properly buffered.

Discussion

The 2002 Memorandum of Understanding (MOU) between the Forest Service and the U.S. Fish and Wildlife Service describes the responsibilities of both parties and the agreed-upon procedures for conserving Bald Eagles. Forest Service responsibilities include, in general, avoiding encroaching on nest trees with land use activities, maintaining perching and winter roost habitat, avoiding blasting near eagle nests, and avoiding helicopter overflights of active nests.

Most eagle nests are along shorelines. The project's wildlife report [decision document #32, pp. 36 and 58] documents that known eagle nests were checked in Threemile Arm on two different occasions. The Forest Service response to the Department of the Interior's comment letter [FEIS Appendix C, p. C-15] states that bald eagle surveys were conducted in the vicinity of the proposed LTF, which is the only activity for this sale that is near the shoreline. It goes on to state that no active or inactive nests were within the buffer limits stipulated in the MOU. I conclude that appropriate surveys were conducted and that eagle nests are adequately protected as stipulated in the MOU. Any previously-unidentified eagle nests discovered during the course of project implementation will be managed in accordance with the MOU.

Issue 4. Whether the Forest Plan conservation strategy adequately provides for the viability of wildlife species within the Tongass National Forest.

Appellants assert that the Forest Plan does not ensure that wildlife viability will be protected, as required by NFMA. Appellants also assert that there has been substantial dispute regarding the adequacy of the Forest Plan conservation strategy, and that the Threemile ROD and FEIS fail to disclose this opposition, in violation of the National Environmental Policy Act (NEPA).

Discussion

In large part, appellants are arguing forest planning issues that are outside the scope of a project level EIS. Forest Service regulations at 36 CFR 219.19 require that fish and wildlife habitat be managed to maintain viable populations of existing native and desired non-native vertebrate species in the planning area. These regulations apply to the development, adoption, and revision of forest land and resource management plans as required NFMA. They do not apply to project level decisions.

The Tongass Land Management Plan (TLMP) is the applicable Forest Plan, and the TLMP administrative record demonstrates that the Forest Plan old-growth habitat conservation strategy provides for viable populations of all old-growth associated species. The Under Secretary of Agriculture's decisions on the appeals of the TLMP ROD and FEIS determined that the Regional Forester's decision was consistent with NFMA.

Appellants' assertions relating to the adequacy of the Forest Plan old-growth habitat conservation strategy and the peer reviewers' criticism of that strategy are nearly identical to those raised in *Natural Resources Defense Council v. U.S. Forest Service*, No. J03-0029 (D.Alaska, decided September 24, 2004). In its decision in that case, the District Court concluded that the Forest Service had "acknowledged th[e] uncertainty [regarding the conservation strategy], considered the available scientific evidence, marshaled the evidence in applying it to the Tongass Plan, and proceeded to choose an alternative that would, in the Forest Service's opinion, best provide for the multiple-use goals mandated by Congress" [September 24, 2004 Order at p. 6]. The Court went on to state that the Forest Service "adequately considered the range of alternatives and adequately justified its decisions sufficient to pass muster under both NEPA and NFMA" [Id.].

The Threemile project is appropriately tiered to the comprehensive landscape old-growth habitat reserve strategy designed for TLMP. This strategy was developed to provide a system of reserves that provide for the viability of species, even with the maximum timber harvest allowed under the Tongass Forest Plan for a full 100 years. Projects consistent with the Tongass Forest Plan, such as the Threemile project, have had their cumulative effects evaluated in the Forest Plan EIS and their effects on the viability of species have been considered in the design of the comprehensive landscape old-growth habitat reserve strategy.

Forest Plan monitoring and evaluation and the five-year review of the Forest Plan required by NFMA provide opportunities to evaluate the effectiveness of TLMP standards and guidelines and to recommend amendments as necessary. At this time, there is no reason to question the effectiveness of the standards and guidelines provided in TLMP, nor the adequacy of the overall old-growth habitat reserve strategy.

Issue 5. Whether the Threemile FEIS adequately considers and discloses the potential effects of the project on deer, and whether the Forest Service can rely on the deer model to predict these effects.

Appellants assert that the deer model is inadequate to accurately predict the potential effects of a project as it relies on data that does not correlate to forest structure; that the model has not had a thorough, independent peer review, although there is significant doubt regarding its reliability

within the scientific community; that there is substantial dispute over the correct values to use for various coefficients the model relies on; and that changes that may have been made to these coefficients at the project level have not been disclosed. Appellants also assert that the analysis in the Threemile FEIS relies heavily on the deer model despite known faults with the model, and fails to use additional methods to assess the potential effects on deer; that the FEIS incorrectly claims that the deer analysis is conservative because the model predicts the "worst case scenario;" and that the FEIS fails to disclose the uncertainties and opposition relating to the deer model. Appellants further assert the statement in the Threemile FEIS that the partial harvest prescriptions for the project will leave understory plants that provide browse for deer is misleading, as the harvest prescriptions for the Threemile units will remove all or at least half of the large trees within the units, making any understory plants that are retained inaccessible to deer in a heavy-snow winter.

Discussion

Several of appellants' assertions regarding the accuracy of the model's predictions, debate within the scientific community, and disclosure of coefficients used in the project analysis are related to the NEPA requirements for: 1) use of best available information [40 CFR § 1502.22] and 2) disclosure of methodology and scientific accuracy [40 CFR § 1502.24]. In my opinion, the FEIS complies with these requirements.

The deer model uses the volume-stratum map, in addition to snow-level, elevation, and aspect, to predict winter habitat capability for deer [Forest Plan FEIS, p. 3-366]. ADF&G biologists have funded and conducted studies and published several papers in peer reviewed journals over the past 20 years on how deer interact with their habitat. These studies have shown that timber volume is a good predictor of winter deer range, and ADF&G has argued that low elevation, high volume old-growth timber stands be conserved. This research was considered and used in the development of the deer model and is in the project record [see, for example, Schoen and Kirchoff, 1990, referenced in decision document #49, p. B-60]. Research has also demonstrated that the volume stratum map is a statistically valid method of stratifying the forest for timber volume [decision document #46]. It is reasonable that the deer model used the volume-stratum map, since it was the only statistically valid map available at the time and it utilized ADF&G's research findings on deer habitat selection and timber volume. Nonetheless, during the Threemile analysis, a new map was being researched to better evaluate forest structure. This map is undergoing peer review and has not been tested for its utility for evaluating deer habitat, whereas timber volume has been extensively evaluated. A method that utilizes tree diameters and tree densities may better discriminate forest structure and timber volume. That method is in its final evaluations now and could be evaluated for use in updating the deer model.

Appellants also assert that the reliance of the Threemile FEIS on the deer model was inappropriate, that the characterization in the FEIS of the model's outputs was incorrect, and that the FEIS did not disclosure the uncertainty of those outputs. I disagree. Several statements in the Threemile FEIS acknowledge the concern about confidence in the model. In brief: the word "theoretical" was used to indicate uncertainty; the model was evaluated by field surveys; the model represents just one tool in project level analysis; models are best used to make relative comparisons between alternatives rather than actual population predictions. Any changes in the model will be the result of field observations, thorough analysis, and peer review [FEIS, pp. 3-128, 3-166, 3-169, and 3-176].

Appellants further assert that the FEIS discussion of the effects of partial harvest is misleading. I disagree. The appeal generally does not question the results of the model. Nor have appellants disagreed with the way a specific area on the map published in the EIS was scored. The model gives the highest scores to low elevation high volume old-growth stands and the lowest scores to non-forest and aging clearcuts, a point that did not create controversy. There is an exception, however; the appellants questioned the Forest's judgment about the value of winter range that has had a partial harvest prescription applied. The Forest gave partial cuts the same value as clearcuts, but stated that this was a "worst case" assumption. There is some optimism that some partial harvest prescriptions can conserve forest structure [see Deal and Tappeiner 2001, and Deal 2001, cited in decision document #38, p. 47] and may improve habitat values [see Doerr 1995, cited in decision document #38, p. 47]. Deal and Tappeiner (2001) state that "[s]ilvicultural systems based on partial cutting can provide rapidly growing trees for timber productions while maintaining complex stand structures with mixtures of spruce and hemlock trees similar to old-growth stand" [Id.]. The idea that partial cutting may provide some benefit to deer and other wildlife is not an unsupported supposition. Given that these papers are in the project record, the Forest's approach was reasonable and not arbitrary.

ADF&G (Person and Kirchhoff) evaluated the deer model and reported their results at the 2000 Annual Meeting of the Alaska Chapter of the Wildlife Society in Juneau. They compared model results with their pellet data set and reported a significant positive relationship (regression) between deer model scores and pellet densities. This is mentioned in the Tongass National Forest Annual Monitoring and Evaluation Report for FY 2000 [decision document #22]. This is where ADF&G suggested that the Forest Service should use 100 deer per square mile in its NEPA effects analyses instead of the 125 deer per square mile multiplier currently used.

Given that the deer model is used to evaluate relative differences between alternatives and not provide absolute numbers, in my opinion, use of the deer model is reasonable. The deer model is the best available means of estimating the effects of project alternatives on deer populations.

Issue 6. Whether the Threemile FEIS adequately considers the effect of windthrow in its analysis of the project's effects on wildlife.

Appellants dispute the statements in the Threemile ROD and FEIS that the project is designed to mimic natural wind disturbances, asserting that the size of the harvest units appear to mimic rare, larger-scale "catastrophic" windthrow events rather than the more common, low-intensity wind disturbances. Appellants assert that the Threemile FEIS fails to consider the extent of windthrow present in the beach fringe, project area, and on Kuiu Island as a whole, and the susceptibility of the area to frequent, catastrophic wind events in its analysis of the project's potential effects on deer, marten, bear, and other wildlife.

Discussion

I disagree with appellants' assertions. The silvicultural prescriptions for the timber harvest units discuss how harvest in specific units mimics stand replacing disturbance events [decision document #56, Attachment A]; the FEIS discusses the relationship between timber harvest and the natural disturbance ecology of the region [FEIS, pp. 3-58 to 3-72]; and one of the research papers included in the project record, "Windthrown or clearcut – what's the difference?"

[decision document #51] considers and scientifically compares clearcuts and windthrow. The Wildlife Specialist Report in the project record [decision document #38] discusses environmental consequences of partial cutting on various wildlife species, particularly deer. Within the framework of the overall conservation strategy, Forest Plan standards and guidelines will adequately support the viability of these species. For these reasons, I believe the FEIS and ROD adequately consider the effects of windthrow.

Issue 7. Whether the Forest Service has met its wildlife monitoring obligations under the Forest Plan, as required by NFMA.

Appellants assert that the Forest Service has continually failed to implement the Forest Plan wildlife monitoring strategy, and that to date, the Forest Service has not attempted to evaluate population trends for any management indicator species (MIS) on the Tongass National Forest. Appellants also assert that the Threemile project cannot rely on the Forest Plan monitoring strategy to protect species viability when that strategy has not been implemented. Appellants further assert that it is illegal for the Threemile FEIS to not address the site-specific effects of the project on MIS species, particularly the brown creeper and hairy woodpecker, and that the Forest Service has not demonstrated that collecting the monitoring information required to adequately assess the potential effects on these MIS species is not possible.

Discussion

I disagree with appellants' assertions that the Tongass has failed to meet its responsibilities to acquire and analyze actual and trend population data for MIS, and that no attempt to evaluate population trends for any wildlife species has been reported. The requirements for MIS monitoring are contained in the 1982 Forest Service Regulations implementing NFMA:

> Population trends of the management indicator species will be monitored and relationships to habitat changes determined. This monitoring will be done in cooperation with State fish and wildlife agencies, to the extent practicable.

In keeping with this direction, the Forest Plan requires monitoring to answer the following question: "[a]re population trends for Management Indicator Species (MIS) and their relationship to habitat changes consistent with expectations?" [Forest Plan, p. 6-14.] The sampling methods to be employed are described as follows:

> Measure habitat changes (see Biodiversity Monitoring, item #2). Use the most recent version of the interagency habitat capability models (other sources may be used if they better reflect habitat change) to estimate change in the relative habitat values for each MIS since the start of plan implementation. Compare population trends for MIS (gathered as described below) with habitat changes. *Evaluate approximately every five years for consistency with plan expectations* [Id., emphasis added].

The Tongass National Forest Annual Monitoring and Evaluation Report for Fiscal Year 2002 (the most recent annual report available, which covers the five-year period after adoption of the

Forest Plan) includes a 15-page description of efforts conducted in compliance with this direction. The most pertinent portions of that description follow.

> A brief summary of the habitats used by the 13 wildlife MIS, population status and trends, and the general management trends on the Tongass National Forest (Tongass) that influence habitat capability for these species [is provided below]…. In addition, determinations of 1) the relationships that existed between changes in habitat capability and MIS population changes and… 2)…if the habitat and population information is consistent with expectations in [the] Forest Plan is also addressed. Various techniques were used to infer trends in habitat capability by assessing changes in important habitats. Each species summary was examined to determine its value of that species as an MIS. This evaluation was based on the quality and quantity of existing data available for that species, the magnitude of the management issues associated with the species, and the cost and feasibility of gathering additional data. For many species we acknowledge that linking population changes to management activities id difficult to implement (Landres et al. 1988, Mladenoff et al. 1997), that our analyses could likely only detect dramatic changes in populations, and that we were unable to definitively determine whether changes in the population was due to human caused habitat change.
>
> * * *
>
> Of the 5.5 million acres of productive old growth on the Tongass National Forest in 1954, about 1.3 million acres are tentatively suitable forested lands (Tongass ROD, 1997 p. 7). Of these acres, about ½ million acres are available for timber harvest over the 100-year timber rotation. Assuming maximum levels of allowable timber harvest ([an average of] 267 million board feet/year), this equates to an annual harvest of about 8,250 acres. About 16,472 acres have been harvested on the Tongass during the 5-year period (1998 through 2002) since implementation of [the] Forest Plan. This amount of harvest equates to 3294 acres annually, less than half the maximum rate allowed in the Forest Plan. The majority of this harvest occurred in [Game Management Units] 2 and 3, particularly in [three specific] ecological subsections. The number of acres harvested in the last 5 years equates to a very small percentage, generally < 1% of the forest in these subsections (Nowacki et al. 2001). Therefore, reduction of old growth habitat to date has been less than projected in the Forest Plan Final Environmental Impact Statement (USDA FS 1997).

[decision document #20, pp. 2-161 and 2-162, 2-164 and 2-165]. The monitoring report demonstrates that population and habitat data have been collected and evaluated, and that trends have been identified to the degree possible, as has the relationship between changes in habitats and changes in populations. These results have been reported in summary in a monitoring report covering the fifth year after adoption of the Forest Plan. A report specifically written to address MIS is in progress and is expected to be available soon. Accordingly, I believe that the requirements of the NFMA regulations and the Forest Plan with respect to MIS monitoring have been met.

Appellants also assert that the Threemile FEIS illegally ignores potential effects on the brown creeper and hairy woodpecker. I disagree. Appellants quote sentences out of the Wildlife Specialist Report to support this assertion. More complete excerpts are as follows:

> **Hairy woodpecker (*Picoides villosus*)**
>
> The hairy woodpecker is an uncommon, permanent resident in Southeast Alaska…. Work is being conducted elsewhere on the Tongass National Forest to determine the status of this species as a Management Indicator Species (MIS). The hairy woodpecker will not be discussed in depth in this document because of the difficulty in monitoring this species, their low densities, cryptic behavior, seasonal movements and large year-to-year fluctuations in their populations.
>
> **Brown creeper (*Certhia familiaris*)**
>
> Its preferred habitat is composed of mature forests (>30,000 Mbf) consisting of western hemlock/Sitka spruce stands…. As with the hairy woodpecker, work is being conducted elsewhere on the Tongass National Forest to determine the status of this species as a Management Indicator Species (MIS). The brown creeper will not be discussed in depth in this document because of the difficulty in monitoring these species, their low densities, cryptic behavior, seasonal movements and large year-to-year fluctuations in their populations.

[project document #183, p. 10]. The FEIS also discusses MIS for the Threemile project, and how they were chosen:

> The Forest Plan identified thirteen Management Indicator Species for the Tongass National Forest. Some of these species do not occur within the Threemile Project Area. Species not affected by the proposed activities will have their habitat needs protected by standards and guidelines, or can be represented by other Management Indicator Species. Table 3-38 displays the Management Indicator Species used for the Threemile Project Area analysis.

[FEIS, p. 3-164]. The species selected include the Sitka black-tailed deer, selected because it is an important subsistence species; marten, because it needs low-elevation, high volume old-growth; black bear, due to a concern for the sustainability of the high sport hunting harvest; and wolf, because it is a predator tied to a prey base.

There is no requirement for Forest Plan MIS to be evaluated by every project analysis. Moreover, as discussed above, the Forest Plan monitoring for MIS is being conducted as required. Consequently, I believe the project's treatment of brown creeper and hairy woodpecker is appropriate. For the same reasons, the appellants' assertion that the Threemile FEIS does not demonstrate that the brown creeper and hairy woodpecker cannot be monitored is moot—they are being monitored, but as part of the Forest Plan monitoring program instead of in conjunction with the planning of the Threemile project.

Appellants further assert that the Threemile project cannot rely on the Forest Plan's monitoring strategy to ensure wildlife viability because that strategy has not been implemented. I disagree. As described above in the discussion of Issue 4 regarding wildlife viability, this requirement applies only to forest plans, (not to project level decisions), and the District Court's decision in *Natural Resources Defense Council v. U.S. Forest Service* upheld the validity of the Forest Plan's conservation strategy in meeting viability requirements. In addition, as described above

in this section, the Forest Plan monitoring strategy has been implemented. Thus, this assertion is without foundation.

Issue 8. Whether the unit cards in the Threemile ROD and FEIS provide adequate information to insure that wildlife populations are protected.

Appellants assert that the unit cards do not provide any specific information regarding the type, size, and spacing of live trees that will be left to protect cavity nesters, red squirrels, marten, and other wildlife species as intended by the Forest Plan.

Discussion

Each unit card [FEIS Appendix B] describes the stand treatment to be applied to the specific stand. Where treatment is "Partial Cut by Diameter Limit," reserve trees are specified. Stand size, shape, and relative placement are displayed in a map for each unit. Silvicultural treatments are further described in the Silvicultural Resources Report [decision document #56, pp. 21-22]. The Forest Plan standards and guidelines provide an overall conservation strategy for wildlife and generally address landscape-level treatments, not (with one exception) stand-specific prescriptions. The exception, a stand-specific prescription for marten, describes canopy and snag retention in high value marten habitat, standards that do not apply in this project area.

The Wildlife Specialist Report [decision document #38]and FEIS [pp. 3-169 through 3-180] analyze and describe the potential effects of the alternatives (including the Selected Alternative) on a variety of wildlife species, including deer, black bear, red squirrel, amphibians, marten, and wolf. In my opinion, the unit cards, in concert with the effects determinations in the Wildlife Specialist Report and FEIS, provide adequate information to ensure that wildlife populations are protected.

Issue 9. Whether the Threemile FEIS adequately considers and discloses the potential effects of the project on resident and non-resident species of birds.

Appellants assert that the Threemile FEIS does not adequately consider and disclose the potential effects of the project on indigenous populations of birds, including MIS species. Appellants further assert that the Forest Service failed to coordinate with ADF&G on issues affecting wildlife, particularly birds, and that comments from ADF&G suggest that the Forest Service has neglected to consider MIS and other bird species in planning the Threemile project.

Discussion

The Threemile FEIS and supporting documents consider the potential effects of proposed management actions on a wide variety of bird species. The FEIS [pp. 3-141 and 142] addresses potential effects on the northern goshawk, osprey, Peale's peregrine falcon, and trumpeter swans. In addition to the bird species addressed in the FEIS, the Biological Evaluation for this project also addresses the potential effects on Kittlitz's murrelet [decision document #33, pp. 6, 11, 16, 19, and 23] and marbled murrelet [pp. 8, 9, 13, 17, and 21]. The report "Neo-tropical Birds of Concern on the Tongass National Forest" [decision document #57] discusses 36 additional bird species and summarizes the anticipated effects of management activities on these species and their habitats.

Four MIS (deer, marten, black bear, and wolf) were selected for detailed analysis in the Threemile FEIS [p. 3-164]. Project planners are not obligated to select bird species as MIS. Marten were selected due to the species dependence on low-elevation, high volume old-growth [FEIS, p. 3-164], and in my opinion adequately represent effects on this habitat type.

The project record contains multiple references to wildlife coordination with ADF&G, including consultation on adjusting and enlarging the small old-growth reserve in Value Comparison Unit 419 [ROD, Appendix 1], joint field visits to the project area [decision document #37], telephone conversations regarding wildlife populations [decision document #34], and more formal correspondence [FEIS, Appendix C-59]. Forest Service biologists and their ADF&G counterparts have a long history of working cooperatively on a wide variety of projects and issues, including preparation of this FEIS and the Forest Plan.

I conclude that the project record adequately considers bird species, that selection of MIS was within the discretion of project planners, and that Forest Service and ADF&G staff do now and will continue to coordinate and work cooperatively on a wide variety of wildlife-related projects and issues.

Issue 10. Whether the economic analysis completed for the Threemile EIS is adequate.

Appellants assert that the Threemile FEIS fails to include an adequate economic analysis for the project that considers the full range of financial costs and benefits. Asserting that the economic analysis must consider both market and non-market values, appellants state that the Threemile FEIS fails to fully disclose the natural resource benefits associated with unlogged forests or the direct, indirect, and cumulative socio-economic costs of the project. Appellants assert that NFMA includes a specific management objective to maximize net public benefits, and that the Forest Service should have prepared a cost-benefit analysis for the Threemile project that quantitatively estimates the costs and benefits of the project with respect to non-market resources.

Discussion

Appellants assert that the economic analysis conducted for the Threemile EIS is inadequate because it does not examine a full range of costs and benefits of the project, including both market values and non-market values and costs. Appellants suggest that NEPA, the Multiple-Use Sustained Yield Act (MUSYA), the Resource Planning Act, and NFMA require analysis of non-market goods and services when evaluating management alternatives. I disagree. There is nothing in NEPA, other statutes related to project-level planning, or Forest Service regulation or policy on project planning that requires the agency to quantify, in monetary terms, all of the costs and benefits associated with non-market impacts. In fact, under most planning and project conditions, all costs and benefits cannot be monetarily valued.

This view, that neither NEPA, MUSYA, NFMA, nor NFMA's planning regulations require a quantification of non-market values in monetary terms, was recently upheld in a decision dated September 14, 2004 by the United States District Court for the Western District of Washington [*Forest Conservation Council, et al., v. United States Forest Service*, No. C02-1293C]. In that decision, the Court held that "under the MUSYA, NFMA, and NEPA, [the United States Forest

Service] enjoys broad discretion as to the manner in which it conducts the required economic analysis under the Planning Regulations" [Id., p. 24]. The Court further held that:

> [E]ven if USFS had assigned monetary value to the non-timber resources and had found that value to exceed the projected value of the harvested timber, USFS might not have changed its decision to authorize the particular volume of the timber sales due to competing purposes of the sales such as improving the forests' quality, "securing favorable conditions of water flows, and … furnish[ing] a continuous supply of timber for the use and necessities of citizens of the United States." 16 U.S.C. § 475. In fact, according to the MUSYA's express mandate, those purposes are superior to administering the national forests for such uses as outdoor recreation advocated by Plaintiffs. *See* 16 U.S.C. § 528.

[Id., pp. 24-25]. While the Forest Service is not required to quantify the non-market benefits and costs associated with every timber sale, it is required to "insure that unquantified environmental amenities and values [are] given appropriate consideration in decisionmaking along with economic and technical considerations" [42 USC 4332(2)(B)]. The Threemile FEIS analyzed the potential effects of the project on "unquantified environmental amentities and values," such as deer hunting and subsistence, recreation, the Camden, Rocky Pass, and East Kuiu Inventoried Roadless Areas, other wildlife, fish habitat and water quality, wetlands, and heritage resources [FEIS, Chapter 3].

Accordingly, I believe that the economic analysis contained in the Threemile FEIS and ROD meets all applicable legal requirements.

Issue 11. Whether the clearcutting prescriptions included in the Selected Alternative are consistent with NFMA.

Appellants assert that the clearcutting prescriptions included in the Selected Alternative, which are directly related to maximizing dollar returns or timber output, violate NFMA.

Discussion

Section 6(g)(3)(F)(i) of NFMA requires that the Forest Service:

> [I]nsure that clearcutting, seed tree cutting, shelterwood cutting, and other cuts designed to regenerate an even-aged stand of timber will be used as a cutting method on National Forest System lands where -- for clearcutting, it is determined to be the optimum method, and for other such cuts it is determined to be appropriate, to meet the objectives and requirements of the relevant land management plan.

In addition, the Chief's directive of June 4, 1992 on ecosystem management limits clearcutting to areas where it is essential to meet Forest Plan objectives and involves one or more of the following circumstances:

1. To establish, enhance or maintain habitat for Endangered, Threatened, or Sensitive species.
2. To enhance wildlife habitat or water yields, or to provide for recreation, scenic vistas, utility lines, road corridors, facility sites, reservoirs, or similar development.

3. To rehabilitate lands adversely impacted by events such as fires, windstorms or insect or disease infestations
4. To preclude or minimize the occurrence of potentially adverse impacts from insect or disease infestations, windthrow, logging damage or other factors affecting forest health.
5. To provide for the establishment and growth of desired trees or other vegetative species that are shade intolerant.
6. To rehabilitate poorly stocked stands due to past management practices or natural events.
7. To meet research needs.

In part, many of appellants' concerns with respect to clearcutting relate to forest planning issues that are outside the scope of a project-level EIS. The Under Secretary of Agriculture's decision on the appeals of the 1997 TLMP ROD and FEIS affirmed the Regional Forester's decision with respect to the clearcutting issues raised, stating "[t]he 1997 Forest Plan is consistent with NFMA with regard to silvicultural methods analyzed and selected... The FEIS adequately addressed the cumulative effects of clearcutting ... on the various resources for the Tongass National Forest." [April 13, 1999 decision, p. 22]. Appendix G of the TLMP EIS describes the silvicultural systems available; provides a comparison of the systems and the anticipated results of each, along with key site and stand conditions found on the Tongass National Forest; and then identifies the most appropriate systems for given combinations of these factors. As stated in Appendix G, certified silviculturists usually make the site-specific project level selection of silvicultural systems, which are then evaluated through the NEPA process [TLMP EIS, Appendix G, p. G-1].

For the Threemile project area, clearcutting (an even-aged management method) was selected for use on 351 acres to preclude or minimize the occurrence of potentially adverse impacts from windthrow. It will be applied where windthrow potential is moderate to high. Clearcutting will also be used to minimize mistletoe infestations, logging damage or other factors affecting forest health. In the Threemile project, the clearcut prescription is applied primarily to existing even-aged and multiple cohort stands of windthrow origin. Specific information and rationale for use of this prescription is shown on the unit cards attached to the ROD, in the project planning record, in Chapter 3 of the FEIS, and the rationale is summarized in the ROD and in the silvicultural prescriptions. Where used, this prescription has been deemed optimal related to site-specific considerations as described above [ROD, p. 14].

In my opinion, the Forest Supervisor's conclusion that clearcutting is the optimal method of harvest is reasonable and supported by the documentation of the site-specific stand characteristics for the harvest units and the analysis in the project record.

<u>Issue 12</u>. Whether the public investment and financial efficiency analyses conducted for the Threemile FEIS are adequate.

Appellants assert that the Threemile ROD and FEIS fail to disclose the public investment costs that have been or will be necessary to prepare, offer, and administer the Threemile timber sale, and that the Forest Service failed to respond to comments requesting that this information be included in the FEIS. Appellants also assert that information regarding the costs the Forest Service will incur, compared to the expected revenue of the sale, indicates that the Forest Service will lose $754,823 by selecting Alternative 6, and that this is not disclosed in the Threemile FEIS, in violation of NEPA. Appellants also assert that the project costs identified in the

Threemile project record are outdated and dramatically understate actual Forest Service expenses. Finally, appellants assert that the expected bid price stated in the Threemile FEIS is inaccurate, that the Forest Service is offering sales below fair market value.

Discussion

Appellants' assertion that the Threemile FEIS and ROD violate NEPA because they do not disclose public investment costs is incorrect for two reasons. First, NEPA requires disclosure of effects on the human environment, not of the administrative costs of managing the Threemile Arm project area. The task for the agency is to weigh the economic and other benefits of the Threemile project against its *environmental* costs. The Forest Service is not required to consider, as part of the NEPA process, the administrative costs of preparing EISs, sale layout, and sale administration.

Second, even though NEPA does not require it, the administrative costs of implementing timber harvest activities on the Tongass National Forest have been disclosed. The Threemile FEIS tiers to the 2003 TLMP Supplemental EIS for Roadless Area Evaluation for Wilderness Recommendations (SEIS): "[t]he SEIS provides updated inventory information and this project also tiers to SEIS instead of providing duplicate information [Threemile FEIS, p. 1-7]. The SEIS displays the administrative costs of timber harvest "[b]ased on per [thousand board feet] MBF planning and support charges: $41 for NEPA preparation; $23 for sale preparation; $9 for sale administration; and $28 for engineering support" [SEIS, p. 3-299]. In addition, as the appeal points out, the project record includes a comparison of estimated project revenues and costs [project document #343].

Appellants' assertion that the FEIS includes no response to their comment on this point is also incorrect. A lengthy quotation from appellants' comment letter on the Draft EIS is included in the appeal. That quote omits the conclusion of the paragraph from the DEIS comment letter:

> A more detailed financial analysis should be presented *of road closure* (emphasis added). Does harvest truly facilitate closure of roads, does it pay for it and are the costs discussed above reflected in the analysis[?] Would the Apricot Creek Harvest pay for closure of roads along all of south side?

[FEIS Appendix C, p. C-53]. The Selected Alternative excluded all harvest units on the south side of Threemile Arm, including the Apricot Creek area [ROD, p. R-25]. In addition, the FEIS includes a response to the specific request described above: "[t]he costs of closing roads are included in the financial analysis of each alternative" [FEIS Appendix C, p. C-58].

Appellants also assert that the FEIS includes no financial efficiency analysis as required by Forest Service Handbook (FSH) 2409.18; that the analysis contained in the project record shows the project will lose over $750,000; and that "the failure to disclose that fact in the FEIS violates NEPA."

FSH 2409.18 provides extensive guidance on how to conduct financial analysis of a proposed timber harvest project during NEPA analysis:

> Complete a financial analysis of each timber sale project alternative at Gate 2 [during NEPA analysis].
>
> * * *
>
> The information is used to select the most efficient alternative that achieves the desired objectives and improves the financial position of the timber sale program.
>
> * * *
>
> The analysis basically compares estimated Forest Service direct expeditures with estimated financial revenues.

[FSH 2409.18, pp. 6-7]. There is no requirement in the Handbook to include this information in the NEPA document. In compliance with the Handbook, the Addendum to the Timber Economics Resource Report referred to by appellants demonstrates that, according to the agency's NEPA Economic Analysis Tool (NEAT), Alternative 6 (which became the Selected Alternative) would receive the highest bid value of all action alternatives, and the greatest estimated net revenue of all the alternatives, even though that return would be a loss of approximately $755,000 [project document #343]. The FEIS explained in further detail that these estimates are useful for comparative purposes only:

> The discussion of economics for the Threemile Project Area is based on the use of the Forest Service timber NEPA economic analysis tool to compare the relative value of the alternatives. This comparison can only be used for relative values and not for exact monetary values. Some of the factors that influence the cost of timber harvest are presented.
>
> * * *
>
> The projected harvest volume, costs and expected bid values are estimates and not definitive figures. For this analysis, timber values were taken from the NEAT system. These estimates are useful for comparing the alternatives but actual values will probably differ from final appraisal due to more accurate cruise information… Competitive bidding will determine the actual value.

[FEIS, pp. 3-20, 3-26, 3-27]. Appellants assert that the project costs estimated in the Threemile project record, as well as the similar estimates contained in the SEIS and used in annual budget allocations on the Tongass National Forest, "dramatically understate actual Forest Service expenses." They also assert that several Annual Monitoring and Evaluation Reports of the Tongass National Forest demonstrate that these cost estimates are incorrect.

I disagree with all of these assertions. These same issues are currently being litigated before the United States District Court for the District of Alaska in a case brought by several parties,

including one of the current appellants, regarding the Woodpecker timber sale project. The Government's opposition brief filed in that case points out that:

> The question of how to calculate public investment in a timber sale is complex and necessarily imprecise…. Moreover, predicting the administrative costs of a particular timber sale is extremely speculative until that sale has been completed. For example, the agency cannot know beforehand whether the project will be litigated, whether a supplemental EIS will be necessary, or whether there will be unusual complications in the administration. Indeed, until the timber is actually cut and measured, it is not possible to know exactly how much timber will be harvested.
>
> * * *
>
> The Forest Service has used those average budget estimates in other circumstances as well, including the present net value analysis in the 2003 SEIS on the TLMP revision…
>
> * * *
>
> Contrary to plaintiffs' allegation, … the agency has *not* recognized that the budget figures are outdated or inaccurate. The 1998 and 1999 Annual Monitoring Reports … questioned whether the budget estimates were lower than unit costs in that year, but could not determine whether the higher costs were "a one-year occurrence or a trend… In subsequent reports, the agency concluded that available data did not permit a comparison with the budget figures because of a change in accounting categories.
>
> Far from recognizing that the figures are incorrect, the Forest Service continues to use those figures for a variety of purposes, including the making of budget requests… This use demonstrates the Forest Service's confidence in the figures, and provides an additional verification of them…
>
> Rejecting the Forest Service's time-tested figures, plaintiffs take another approach. Rather than taking a long-term view based upon completed contracts for which hard figures are available, plaintiffs look to the report produced yearly by the Forest Service of actual expenditures from budget items that include the administrative costs of the timber sale program. They then divide those expenses by the actual harvest of that year… That approach is misleading for two reasons. First, delays between expenditures and actual harvest due to litigation, plan revision, and similar circumstances in recent years makes a same-year comparison between expenses and harvest inappropriate. Second, the budget line items used in plaintiff's calculations include many Forest Service activities not related to timber sales.
>
> The timber sale process is a multiple year process, and there is no expectation that expenditures and actual harvest will occur in the same year… Since 1998, there has hardly been a time during which the timber sale program has not been restricted by litigation and other unusual circumstances.
>
> * * *

> [E]ach of the budget line items used in plaintiffs' calculations includes many Forest Service functions in addition to timber sales… For example, the "road maintenance" line item includes maintenance after completion of the sale when the road is left open for other management purposes. The "planning/inventory/monitoring" line item includes forest plan level monitoring and inventorying unrelated to timber sales.
>
> Under these circumstances, it was certainly reasonable for the agency not to use plaintiff's flawed methodology.

[decision document 60, pp. 16-22].

Finally, appellants assert that the bid prices contained in the project record are inaccurate. As discussed above in this section, the FEIS states that these values are estimates and not definitive figures, which will be determined through the competitive process. In my opinion, this disclosure meets NEPA's requirement to use the best available information, and disclose the limitations of such estimates. For the same reasons, I also disagree with the related assertion by appellants that, because the NEAT model estimates receipts based on past experience, the FEIS does not demonstrate that the agency will meet regulatory requirements to receive fair market value for the timber to be sold. The NEAT model merely estimates revenues to be received years later; the appraisal process conducted after the NEPA process determines fair market value, and market conditions at the time timber is offered for sale determine amounts actually bid.

For the foregoing reasons, I believe the financial efficiency analysis contained in the Threemile project record and FEIS meets all applicable requirements.

Issue 13. Whether the market demand analysis in the Threemile FEIS is adequate.

Appellants assert that the FEIS relies on outdated market demand information, that the Forest Service has failed to disclose changed market conditions and update the market demand projections, and that the Forest Service failed to respond to comments on this issue.

Discussion

Appellants' assertions on this issue relate largely to forest planning issues that are outside the scope of a project level EIS. These assertions related to market demand analysis are nearly identical to those raised in *Natural Resources Defense Council v. U.S. Forest Service*, No. J03-0029 (D.Alaska, decided September 24, 2004). In fact, appellants refer to Plaintiff's briefing in that case "[f]or further explanation of these issues."

In its decision in that case, the District Court concluded that "[i]t is impossible to know for certain what market for forest products will exist during the life of the forest plan. The Forest Service must plan for all eventualities whether likely or not. The Court is satisfied that the Forest Service has done so" [September 24, 2004 Order at p. 6].

The Threemile project is appropriately tiered to the market demand analysis conducted for the Forest Plan. The procedure for meeting market demand and scheduling environmental analysis of timber sales on the Tongass National Forest is explained in detail in a 19-page appendix to the

Threemile FEIS [Appendix A]. The recent decision from the District Court upheld that process [Id.]. I find no reason to change that outcome through this appeal.

Appellants also assert that the Forest Service failed to respond to their comments on this issue. Appellants submitted a 13-page comment letter on the Draft EIS. That letter included an extensive discussion of economic issues that concluded with a request to include a more detailed financial analysis of road closure [FEIS Appendix C, p. C-53]. The Forest Service responded to that specific request. In my opinion, that response was adequate.

Issue 14. Whether the Threemile project is consistent with the Clean Water Act (CWA) and NEPA.

Appellants assert that the timber harvest and road construction activities authorized in the Threemile ROD will violate the State of Alaska's water quality standards for turbidity and sediment, in violation of the CWA. Appellants also assert that the analysis in the Threemile FEIS regarding turbidity is inaccurate and misleading, and that neither the ROD nor FEIS discuss the potential violations of the sediment standard, in violation of NEPA.

Discussion

Section 313 of the CWA and Executive Order 12088 require the Forest Service to comply with all Federal, State, and local requirements relating to the control and abatement of water pollution [33 U.S.C. 1323(a)]. Section 319 of the CWA and Executive Order 12372 require that Best Management Practices (BMPs) be consistent with the State's Non-Point Source Pollution Control (NPS) program, and that they be used to mitigate the effects of land disturbing activities. The Memorandum of Agreement between the Alaska Department of Environmental Conservation (DEC) and the Alaska Region of the Forest Service recognizes that the Forest Service's BMPs are consistent with the State's NPS program.

Appellants assert that the Threemile project will violate Alaska's Water Quality Standards (WQS) found at 11 AAC 70.020. Specifically, appellants assert that implementation of the Selected Alternative will result in violations of the turbidity standard found at 18 AAC 70.020(b)(12) and the sediment standard found at 18 AAC 70.020(b)(9); thus, the project violates the CWA and the FEIS violates NEPA. As I understand it, this assertion is based on the fact that these provisions of the WQS do not specify whether or not the controlling measurements of turbidity and sediments are to be taken 48 hours after an action such as installation of a culvert is taken.

On this question, I believe that provisions of the Alaska Forest Practices Regulations [11 AAC 95] are controlling. Under the Alaska Forest Resources and Practices Act [FRPA, AS 41.17.010], DEC has the authority to approve regulations promulgated under the FRPA. Upon approval, such regulations "establish the non-point source pollution requirements under state law and sec. 319 of the Clean Water Act" for forestry activities [AS 41.17.010(6)].

In keeping with the review process mandated by the Coastal Zone Management Act, the Alaska Coastal Management Program (ACMP) and DEC's NPS program, several State agencies reviewed the Threemile EIS for consistency with the ACMP. As part of that review, DEC reviewed the EIS for consistency with State nonpoint source pollution control requirements.

Results of that review are contained in a Final Consistency Finding from the Alaska Division of Governmental Coordination (DGC), which states that

> The Alaska Departments of Environmental Conservation, Fish and Game, and Natural Resources have reviewed your proposed activity. Based on that review, the State concurs that this proposed project is consistent with the ACMP to the maximum extent practicable.

[project document #169, p. 2]. No mention is made in DGC's finding of any water quality concerns or any potential violations of the WQS.

In addition, *Alaska's Nonpoint Source Pollution Control Strategy* (September, 2000), published by DEC (see http://www.state.ak.us/dec/water/wnpspc/pdfs/NPSstrat-appendixFINAL.pdf), states that the Forest Practices Regulations have been approved by DEC:

> In July 1993 the State promulgated revised regulations required by the 1990 revision of the Alaska Forest Resources and Practices Act (FRPA). The changes incorporated recommendations of the statewide Forestry Steering Committee. The revised regulations specify both administrative procedures and environmental standards for timber harvest activities on private, state and other public lands. The Forest Resources and Practices regulations were promulgated by [the Alaska Department of Natural Resources] and approved by DEC. DEC had approval authority of the regulations since provisions of the FRPA and the regulations establish the State's nonpoint source pollution control requirements under state law and Section 319 of the Clean Water Act for forest practices activities.

[Id., Volume 2, p. 7]. The Alaska Forest Practices Regulations provide that the term "degradation of water quality" excludes "changes that are temporary," and further provide that temporary "means 48 hours or less" (11 AAC 95.900(20)) [decision document #69].

The FEIS characterized the effects of the project on water quality, and compliance with State Water Quality Standards, as follows:

> Some short-term sediment increase is expected when new [stream] crossings are constructed. State Water Quality standards require that the duration of turbidity increases be limited to 48 hours during culvert installation. Monitoring has shown that when proper installation techniques are used this standard can be maintained (Monitoring and Evaluation Reports, 1999a and 2000b).

[FEIS, p. 3-87].

Based on the foregoing analysis, I believe the FEIS and project record demonstrate that the Threemile project complies with all applicable State nonpoint source pollution control requirements. Thus, there is no violation of CWA or of NEPA.

<u>Issue 15</u>. Whether the Threemile ROD and FEIS adequately analyze the potential effects of the project on the inventoried roadless areas within the project area and their potential for future wilderness designation.

Appellants assert that the rule temporarily exempting the Tongass National Forest from the provisions of the Roadless Area Conservation Rule (Roadless Rule) is unwarranted and illegal, and that the Threemile project will prejudice the final decision on whether to permanently exempt the Tongass, and other forests, from the Rule. Appellants also assert that the Forest Service decision in the Forest Plan to allow entries into roadless areas was illegal, referencing various appeals of the Forest Plan. Appellants also assert that the Forest Service lacks an adequate rationale for entering the roadless areas within the Threemile project area, and that the Forest Service should have considered in detail an alternative that did not involve activities in the roadless areas. Appellants further assert that the Threemile EIS does not adequately disclose the effects the new roads within the roadless areas will have on the maintenance of existing roads and the associated effects of failing to maintain existing roads. Finally, appellants assert that the Threemile ROD and FEIS fail to adequately consider and disclose the potential direct, indirect, and cumulative effects of the project on the future wilderness potential of the roadless areas affected by the project.

<u>Discussion</u>

In large part, appellants are arguing forest planning issues that are outside the scope of a project level EIS. As explained in the December 30, 2003 Federal Register notice [68 FR 75136] that announced the Final Rule and Record of Decision to temporarily exempt the Tongass National Forest from the provisions of the Roadless Area Conservation Rule, the unique situation of the Tongass has been recognized throughout the Forest Service's process for examining prohibitions on activities in inventoried roadless areas. The process for developing the Roadless Rule included different options for the Tongass at each stage of the promulgation of the Rule and the environmental analysis process associated with that Rule. At each stage, the option of exempting the Tongass from the Rule's prohibitions was considered in detail. Given the uncertainty about the implementation of the Roadless Rule due to various lawsuits, the U.S. Department of Agriculture decided to adopt the temporary exemption for the Tongass, initiated pursuant to a settlement agreement with the State of Alaska. This allows the Tongass to continue to be managed pursuant to the 1997 Tongass Land Management Plan (TLMP), as readopted by the 2003 Record of Decision for that Plan.

Appellants assert that the Threemile ROD will prejudice the Forest Service's forthcoming decision about whether to reinstate the Roadless Rule on the Tongass or exempt the Forest permanently. I disagree. The Threemile FEIS and ROD and the Advanced Notice of Proposed Rulemaking [ANPR, 68 Federal Register 41864] regarding a permanent exemption for both the Tongass and Chugach National Forests have separate utility. The July 15, 2003 ANPR sought comment on whether both national forests in Alaska should be exempted permanently from the prohibitions of the Roadless Rule. The Threemile ROD has separate utility in providing timber to meet market demand and in preventing socioeconomic dislocation in Southeast Alaska, while protecting forest resources, regardless of whether the agency ultimately decides to exempt both national forests from the prohibitions of the Roadless Rule on a permanent basis. The Forest Supervisor's decision in the Threemile ROD does not prejudice the ultimate decision on the

ANPR. An action prejudices the ultimate decision on a proposal when it tends to determine subsequent development or limit alternatives. The Threemile ROD does neither.

Appellants assert that the Forest Service lacks an adequate rationale for entering the roadless areas within the Threemile project area, and that the Forest Service should have considered in detail an alternative that did not involve activities in the roadless areas.
Regulations implementing NEPA at 40 CFR 1502.14 state that agencies shall "[r]igorously explore and objectively evaluate all reasonable alternatives, and for alternatives which were eliminated from detailed study, briefly discuss the reasons for their having been eliminated."
The Council on Environmental Quality (CEQ) has clarified these regulations, stating that "[w]hat constitutes a reasonable range of alternatives depends on the nature of the proposal and the facts in each case" [CEQ's Forty Most Asked Questions #1(b)].

As stated in the FEIS, the Threemile project alternatives were designed to both meet the purpose and need for the project and to provide a different response to the significant issues identified for the project [FEIS, p. 2-5]. The purpose and need for the Threemile project is stated on page 1-2 of the FEIS:

> The purpose and need for the Threemile … project is to respond to the goals and objectives identified by the Forest Plan. The Forest Plan goals and objectives applicable to the project area include:
>
> - Manage, from suitable lands made available for timber harvest, the timber resource for production of saw timber and other wood products…
> - Seek to provide a timber supply sufficient to meet the annual market demand for the Tongass National Forest and the demand for the planning cycle.
> - Provide diverse opportunities for resource uses that contribute to the local and regional economies of Southeast Alaska.
> - Support a wide range of natural-resource employment opportunities within Southeast Alaska's communities.

The significant issues identified for the Threemile project are also stated in the FEIS, and the potential effect of the project on those portions of the Inventoried Roadless Areas (IRAs) within the project area is identified as a significant issue. The FEIS indicates that the Forest Plan allocated the portions of the IRAs within the Threemile project area to development land use designations, and that all of the action alternatives will affect at least one of the IRAs by reducing its size slightly [FEIS, p. 2-14]. However, each action alternative provides a different response to the issue, as discussed on page 2-14 of the EIS and outlined in Table 3-17 [p. 3-48]. Alternative 1 was expected to have the least impact, as it proposed no roads within the IRAs and included the least amount of acres to be harvested (252 acres). Alternative 2 included 1.44 miles of road construction and the harvest of 376 acres within IRAs, Alternative 3 included 4.07 miles of road construction and the harvest of 572 acres within IRAs, and Alternative 4 included 7.78 miles of road construction and the harvest of 605 acres within IRAs. All three of these alternatives avoided road construction within the East Kuiu IRA. The FEIS acknowledges that Alternative 6 is expected to have the greatest impact on IRA acreage, with the construction of

7.78 miles of road and the harvest of 621 acres; however, this alternative avoids all road construction and timber harvest within the East Kuiu IRA [FEIS, p. 2-14]. The ROD indicates that the most public concerns were expressed for the proposed harvest activity in the East Kuiu IRA, particularly the Apricot Creek area [ROD, p. R-9].

The FEIS also discusses the alternatives considered but eliminated from detailed study, and these included an alternative that would have limited harvest to the existing road system and completely outside the IRAs. As discussed in the FEIS, this alternative was eliminated from detailed study for two reasons:

- Due to previous harvest in the Threemile project area, further timber harvest along the road system at this time does not meet Forest Plan standards and guidelines for visual quality.

- Timber sale planning on Kuiu Island must consider the cost of mobilization of equipment to a remote setting. Since these costs are high, in order to be economically feasible timber sales must be large enough to recover the costs of mobilization. This would not be possible with an alternative that harvested only along the road system.

[FEIS, p. 2-35]. The Forest Supervisor acknowledged the alternative that would have avoided harvest and road construction in the IRAs and the reasons for it having been eliminated from detailed study [ROD, p. R-9]. The Forest Supervisor also stated that he believed his decision balances the need to provide industry with a supply of timber while affording a great amount of consideration of and protection to roadless areas. I agree. Given the purpose and need for the Threemile project, the need to provide a timber supply from the Tongass sufficient to meet market demand, sale economics, and Forest Plan visual quality standards and guidelines, the range of alternatives considered in the Threemile EIS constitutes a reasonable range of alternatives, and the Forest Supervisor adequately considered the potential effects of these alternatives on those portions of the IRAs within the project area, as discussed in the paragraphs below.

In compliance with Forest Service regulations, policy, and procedures, the potential wilderness values of roadless areas throughout the Tongass National Forest were thoroughly inventoried and evaluated at the forest planning level, as discussed in the TLMP Supplemental EIS for Roadless Area Evaluation for Wilderness Recommendations [TLMP SEIS, February 2003].

With regards to appellants' assertions regarding whether the Forest Service adequately considered the potential effects of building the new roads within the Roadless Areas on the maintenance of existing roads, see Issues 1 and 3 of the Cascadia Wildlands Project appeal, below, for a complete discussion of these issues. In my opinion, the alternatives considered for the Threemile project constitute a reasonable range of alternatives, and the Threemile EIS and project record demonstrate that the effects of the road construction activities associated with the Selected Alternative have been adequately considered and disclosed.

The roadless area analysis for the Threemile project was based on the 2003 Roadless Inventory conducted for the TLMP SEIS. The Threemile project area includes portions of three

inventoried roadless areas – Camden, Rocky Pass, and East Kuiu. The TLMP SEIS considered the wilderness potential of these areas:

> Camden
> The roadless area is natural appearing, but the western side of Port Camden is influenced by developments on adjacent lands. The natural integrity and apparent naturalness of the area is high. The natural integrity of the portion east of Port Camden is outstanding and the apparent naturalness is very high when rated separately. The western area has moderate natural integrity and apparent naturalness when rated separately. The opportunity for solitude is very high and the opportunity for primitive recreation is outstanding in the roadless area. None of the roadless area landscape is considered distinctive for the character type from a scenery standpoint. The area has good cultural, historic, and recreational values. There are no other ecologic, geologic, or scientific features of significance in the area.
>
> Rocky Pass
> The area is natural appearing. The natural integrity is very high and the apparent naturalness is outstanding. The opportunity for solitude is very high and the opportunity for primitive recreation is outstanding. Approximately 9 percent of the landscape is considered distinctive for the character type from a scenery standpoint. The area has very high cultural, historic, and recreational values. The area is prized for its geologic diversity, and is a prime area for rock hounds to visit.
>
> East Kuiu
> The area is mostly unmodified. The natural integrity is outstanding and the apparent naturalness is very high. The opportunity for solitude is very high and the opportunity for primitive recreation is outstanding. Approximately 10 percent of the landscape is considered distinctive for the character type from a scenery standpoint. The area has important cultural and historic values.

[TLMP SEIS, Appendix C, pp. C1-394, C1-406, and C1-431]. As stated in the Threemile EIS, the 1997 TLMP allocated approximately 80 percent of the Camden Inventoried Roadless Area to the timber production and modified landscape LUDs; approximately 7 percent of the Rocky Pass Inventoried Roadless Area to the timber production, modified landscape, and scenic viewshed LUDs; and approximately 64 percent of the East Kuiu Inventoried Roadless Area to the timber production and modified landscape LUDs [Threemile EIS, pp. 3-35 to 3-37]. The remaining acres were allocated to LUDs that generally do not allow timber harvest and road construction [Id.].

The Threemile EIS identified the potential effects of the project on the Inventoried Roadless Areas as a significant issue, and discusses the affected environment and the potential effects of the project on the Roadless Areas on pages 3-34 to 3-48. Among other topics, it describes the proximity to wilderness and other inventoried roadless areas; the proximity to non-National Forest System lands that could be developed; the amount of human disturbance; and the biological, historical, recreational, and research values of the Roadless Areas [pp. 3-38 to 3-46]. The EIS and ROD indicate that the areas that contain the highest roadless area values for resources other than timber management will be retained in the Selected Alternative. For the Camden Inventoried Roadless Area, these include the isthmus between Port Camden, the Bay of

Pillars, and Threemile Arm; the waterfowl hunting area at the head of Port Camden Bay; and the fossil site located on the eastern shore of Port Camden [EIS, p. 3-47; ROD, p. R-9]. For the Rocky Pass Inventoried Roadless Area, these include Rocky Pass; land otter habitat; and sport fishing streams [ROD, p. R-9]. The Selected Alternative avoids any timber harvest and road construction in the East Kuiu Inventoried Roadless Area, so its roadless area values and wilderness characteristics will remain unaffected by the Threemile project decision.

The EIS indicates that 39,345 acres of the Camden Inventoried Roadless Area will remain roadless after the timber harvest proposed under the Selected Alternative, and that 78,111 acres of the Rocky Pass Inventoried Roadless Area will remain roadless. The Selected Alternative includes the harvest of 292 acres and the construction of 4.76 miles of road within the Camden Inventoried Roadless Area, and the harvest of 329 acres and the construction of 3.02 miles of road within the Rocky Pass Inventoried Roadless Area. All of the timber harvest and road construction is along the edge of the roadless area boundaries, adjacent to the existing road system, and all of the roads will be closed after harvest operations are completed [ROD, p. R-6; EIS, p. 3-48]. Considering both the road construction and the timber harvest included in the Selected Alternative, less than 3 percent (1,050 acres) of the Camden Inventoried Roadless Area (40,395 total acres) will be affected, and less than 2 percent (992 acres) of the Rocky Pass Inventoried Roadless Area (79,103 total acres) will be affected [EIS, p. 3-48]. Based on the analysis in the EIS and project record, the Forest Supervisor concluded that the activities associated with the Selected Alternative will not significantly affect the wilderness character of these Roadless Areas or their eligibility for inclusion in the National Wilderness Preservation System [ROD, pp. R-6, R-9].

In my opinion, the Forest Supervisor adequately considered the potential effects of the Threemile project alternatives on the Inventoried Roadless Areas within the project area. The EIS and ROD indicate that the Selected Alternative will have a minimal overall effect on these Roadless Areas (less than 3 percent of Camden; 2 percent of Rocky Pass; and no affect on East Kuiu), and that the most important roadless area values of the Camden and Rocky Pass Inventoried Roadless Areas will be retained.

Appeal No. 04-10-00-0011 –Cascadia Wildlands Project:

<u>Issue 1</u>. Whether the Threemile EIS includes an adequate range of alternatives.

Appellants assert that road management alternatives were not properly developed, and that there in no indication that appropriate resource specialists were involved in road management decisions. Appellants also assert that the EIS failed to consider alternatives with additional road closures, in violation of NEPA, Forest Service regulations at 36 CFR 212.5(b), and Forest Plan transportation standards and guidelines. Appellants further assert that the EIS should have considered additional road maintenance as part of the alternatives considered for the project.

<u>Discussion</u>

Road development and access were identified as a significant issue, including the extent to which the project should build new roads, upgrade existing roads, close roads, maintain roads, and allow the use of roads. In addition to these five decision components, three units of measure were identified, including miles of new road constructed, miles of existing road placed in storage after completion of the project, and road density [FEIS, p. 1-18]. Table 2-7 [Id., p. 2-27] shows the range of outputs from the six alternatives considered in detail, including 0 to 4.2 miles of new and temporary roads, 0 to 11.4 miles of roads to be placed in storage after harvest, and 9.1 to 20.5 miles of road to remain open after harvest (with the highest amount representing the existing condition).

Chapter 2 of the FEIS [p. 2-5] explains how a range of management strategies was used to respond to the issue and how roads to be closed were identified. In Alternatives 1, 2 and 3, harvest unit locations were placed to facilitate closure of existing roads [pp. 2-7 – 2-9] which reduces maintenance costs, and Alternative 1 would not construct any new roads. Alternative 4 was designed to be the most economical with the minimum roads needed [p. 2-10], Alternative 5 is no action and would not close any roads or remove any culverts or bridges, and Alternative 6 (the preferred alternative in the Draft EIS and, with some modifications, the Selected Alternative in the ROD) was designed to incorporate conventional logging systems and the associated roads needed.

Chapter 3 [p. 3-6] refers to the forest-scale and Kuiu Island road analyses, showing the tiered, science-based system of analysis. Each alternative's effects related to roads are described and compared, and cumulative effects are discussed on pp. 3-17 and 3-18. Page 3-28 discloses that closing roads will result in long-term cost savings because road maintenance will be eliminated for closed roads, and that a range of 0 to 11.4 miles of existing roads could be closed in the various alternatives considered in detail.

FEIS Appendix B [pp. B-79 to B-105] describes the road management objectives and how handbook direction is implemented (FSH 7709.55). It defines and describes in some detail several criteria used, including: general design, maintenance, operation, and site-specific design. Beginning on page B-81, the results of the field inventories are described. Each road is mapped and a road card contains the specific management direction, including specific mitigation measures. This information is summarized in Appendix 2 of the ROD and made specific for the Selected Alternative.

The ROD [p. R-4] explains that the 4.2 miles of new roads and 8.3 miles of existing roads will be placed in the minimum maintenance level 1 to reduce costs. The Kuiu Island Road Analysis, under "What's Next," discloses the limited road maintenance funding and deferred maintenance situation on Kuiu Island [decision document #24, pp. 22-23]. The cover page of this document lists the team that prepared it. The FEIS [pp. 4-16 to 4-18] describes the experience of the entire project interdisciplinary team. Between these two sources, it is evident that the Road Analysis was prepared by an analysis team led by a Civil Engineer with 20 years of experience, and included a Soils Scientist with 36 years of experience, a Recreation Biologist with 21 years of experience, and so on. All relevant specialists were included. In addition, the project record includes documentation that all relevant specialists were involved in the decisions on closing particular roads on Kuiu Island, and the reasons for these decisions [decision document 21].

These documents were available in the project record. By proposing to close existing roads in all action alternatives, the Threemile project team was attempting to reduce the maintenance backlog and meet the minimum road system identified for the island.

Appellants assert that 8 surface erosion problems identified in the Kuiu Island Roads analysis are not addressed. These sites appear to be similar (although not exactly the same) to the fish passage barriers identified on the map in Appendix B [p. B-89], with detailed information regarding information collected to date. Page B-95 describes development of an erosion control plan. The ROD further specifies that all soil exposed during maintenance shall be seeded [ROD Appendix 2, p. 2-51].

Based on my review of the FEIS, ROD, and project record, I believe that a range of reasonable alternatives was developed in response to the significant issue concerning roads and their effects, including the amount of roads to be closed and the level of road maintenance. The direction in the Forest Plan and FSH was followed. All appropriate specialists were involved. While appellants would like to see more roads closed and no roads built, the decision maker and public had a full range of alternatives with which to consider the effects and evaluate the trade-offs of more or fewer roads.

My review of the FEIS, ROD, and project record also leads me to conclude that the project meets the intent of 36 CFR 212.5(b). The analysis described above is sufficient to support a finding that the Selected Alternative incorporates the minimum road system needed for safe and efficient travel and for administration, utilization, and protection of National Forest System lands, as required by that regulation. However, the specific finding required is not included in the project documentation. I recommend, therefore, that you include such a finding in your appeal decision, based on the analysis contained in the record.

<u>Issue 2</u>. Whether the Threemile EIS and project record accurately discloses the cumulative road miles and maximum road density.

Appellants assert that the EIS includes misleading information about the amount of roads in the project area after project implementation, and that the EIS and project record fail to disclose the cumulative road miles and road density.

Discussion

The FEIS states that "[t]he *open* road density within the project area would be reduced from 0.55 to 0.36 mile per square mile" under Alternative 6 [p. 3-14, emphasis added]. It also explains that Alternative 6 will place 8.3 miles of the existing 20.5 miles of open permanent roads into storage; that all 4.2 miles of new permanent roads constructed will be put into storage; and that all 4.2 miles of temporary roads will be decommissioned with drainage structures removed [Id., pp. 3-13 and 3-14].

The primary reason open roads are counted--and not roads that have been closed, put into storage, or decommissioned--is that the concern over road density stems from issues raised about additional mortality of wildlife species such as bear, deer, and wolves that can result from increasing access for hunters and trappers through road construction. These concerns were raised during the development of the Forest Plan, and led to the development of standards and guidelines such as those discussed under Issue 1 of the Sierra Club et al. appeal that seek to limit the density of open roads in areas where wolf mortality concerns exist and where road access has been identified as a significant factor in such mortality. There is no reason to be concerned about the density of roads in the Threemile Project area that do not provide additional access to the area.

In addition, closing roads removes the sediment-producing effects of vehicular travel. Putting roads into storage—or decommissioning them—further reduces potential adverse effects on watershed conditions by removing or bypassing culverts, thereby returning the drainage patterns to natural conditions. This too supports the analysis of road density that counts only open roads in the computation.

In my opinion, this analysis is not misleading. In view of the analysis described in the discussion of Issue 1 above, the effects of roads of all types are adequately disclosed in the FEIS.

Issue 3. Whether the Threemile EIS adequately considers road maintenance concerns.

Appellants assert that the EIS fails to consider the road maintenance backlog facing the Forest Service, both forest-wide and on Kuiu Island and within the Threemile project area. Appellants also assert that the EIS fails to disclose a large number of maintenance problems related to stream crossing structures and erosion, and includes incomplete and misleading information relating to fish passage barriers in the project area. Appellants further assert that the EIS fails to adequately consider the potential effects of the road maintenance concerns that are disclosed. Finally, appellants assert that the EIS ignores funding shortfalls for road maintenance needs, and fails to consider the potential effects of the project on the maintenance backlog and its direct and cumulative effects on the environment.

Discussion

As discussed above under issues 1 and 2 of this appeal, the FEIS identified road maintenance as part of the road development and access management issue. Harvest units were located under Alternatives 1-3 so as to facilitate closing roads, which reduces maintenance needs. All alternatives included road reconstruction to repair or replace drainage structures and reconstruct fill slopes in several locations [FEIS, p. 3-9]. All new permanent roads constructed under the

Selected Alternative will be put into storage, and all temporary roads will be decommissioned. Miles of open road under the Selected Alternative will be reduced from 20.5 to 12.2, and nine culverts will be removed from fish streams [FEIS, p. 2-27]. Road maintenance concerns were clearly considered. All of the components of the Selected Alternative described above serve to reduce maintenance needs; for example, putting roads into storage moves them to Maintenance Level 1, the lowest level [ROD, pp. R-4, R-7, R-8].

The Kuiu Island Roads Analysis included in the project record adds additional information on the effects of closing or storing roads on future maintenance needs, stating that "[a]nnual road maintenance funds are not expected to be sufficient to keep all of the forest roads on the island fully maintained *if kept open"* [decision document #24, p. 16, emphasis added]. This analysis also shows that average annual maintenance costs for Maintenance Level 1 is estimated to be $169 per mile, compared to $806 and $1,138 per mile for Maintenance Levels 2 and 3, respectively [decision #document 24, p. 28]. By moving over 8 miles of open road into storage, the Selected Alternative will reduce overall funding required for future road maintenance needs, even with the construction of new roads (all of which will be in Maintenance Level 1 following completion of timber harvest). The net effect of the project, therefore, is to reduce the existing road maintenance backlog, not add to it.

Appellants further assert that the FEIS does not adequately disclose problems with stream crossing structures and fish passage. I disagree. The FEIS describes the ongoing Road Condition Survey program, concerns identified through that program, steps included in the project to deal with those concerns, and that further evaluation of potential concerns outside of the project area is needed [FEIS, pp. 3-16 and 3-17]. In addition, the FEIS states that "no new proposed roads will cross fish bearing streams" and that road closures in the Selected Alternative will result in fish passage being restored on two Class I stream crossings and seven Class II stream crossings [FEIS, pp. 3-13 and 3-14].

Based on my review of the FEIS, ROD, and project record, it is my opinion that the Threemile project will improve existing conditions relative to road maintenance and fish passage in the project area. No additional analysis is needed to support the Forest Supervisor's decision.

Issue 4. Whether the EIS contains adequate information on the conditions of the roads within the Threemile project area.

Appellants assert that the Threemile EIS depends on road condition surveys that are incomplete and/or outdated, and that the analysis of the potential effects of the project is therefore inaccurate.

Discussion

As discussed under previous issues for this appeal, the FEIS describes the Road Condition Survey program. The project record includes the survey data and dates they were collected [decision document #27]. The Kuiu Island Road Analysis shows that temporary roads were surveyed in 2001 [decision document #24, pp. 19-20]. One road in the project area was surveyed this year [decision document #25]. The ROD states that "[a]ll of the accessible classified roads on [Kuiu] island were driven in 2001" [ROD Appendix 2, p. 38].

Based on the foregoing information, I believe the road condition surveys contained in the Threemile project record and referred to in the FEIS and ROD provide adequate information to support the Forest Supervisor's decision in the ROD.

Issue 5. Whether the Threemile EIS adequately considers the potential effects of road management on the watersheds within the project area.

Appellants assert that the FEIS fails to consider the effects on fisheries and watershed, both from the existing roads within the project area and from the action alternatives considered in the FEIS. Appellants also assert that the FEIS fails to disclose the actual effects of fish passage barriers, and that the misleading analysis of road density has also corrupted the watershed analyses completed for the project area. Appellants further assert that the FEIS fails to disclose the potential effects of road management on non-fish bearing streams, and that the ROD, FEIS, and project record fail to address the 525 non-fish bearing stream crossings that are likely to have maintenance issues relevant to watershed, wildlife, fisheries, economic, and silvicultural concerns, as well as likely effects on downstream watersheds resulting from increased sediment and blowouts.

Discussion

Many of these assertions are similar to those already discussed in previous issues contained in this appeal. I incorporate those discussions here. Fish passage concerns will be reduced by the Threemile project. Road density issues were correctly interpreted and displayed. Road maintenance problems will be reduced. In addition, regarding watershed effects, the FEIS states that:

> Drainage structures in streams along the closed road segments would be removed. Cross drain culverts may be bypassed with trenches dug along the side of the culverts. This would permit culverts to be re-used if the road is needed in the future. Two Class I streams [i.e., streams containing anadromous fish] and seven Class II streams [those with resident fish] would be returned to natural conditions after drainage structures are removed along stored roads. On roads that remain open within the project area and along the access route to Rowan Bay, drainage structures that may act as barriers to fish passage would be replaced to provide fish passage.
>
> * * *
>
> Alternative 6…will put into storage 8.3 miles of existing road and remove 6 culverts on fish streams restoring natural drainage to 2 Class I streams and 7 Class II streams.

[FEIS, pp. 3-14, 3-92]. Extensive additional analysis of the potential effects of the road aspects included the Selected Alternative is presented in the FEIS [pp. 3-6 to 3-18], along with the potential effects on watersheds and fisheries [pp. 3-74 to 3-92].

Based on my review of the project record and the discussion of all of the above issues of this appeal, I conclude that the analysis of the potential effects of the proposed road activities on watersheds and fisheries contained in the Threemile FEIS, ROD, and project record meets all applicable requirements.

<u>Issue 6</u>. Whether the Threemile EIS adequately discloses the potential effects of the project on wolves.

Appellants assert that the EIS fails to adequately consider the potential effects of the project on wolves, as the analysis relies entirely on the deer model and misleading road density information. Appellants also assert that the EIS fails to disclose relevant information about the presence of wolves in the project area, and fails to disclose the fact that outfitter-guides use the project area for wolf hunting and that the project is likely to increase wolf hunting and trapping in the area by providing increased access to areas currently used by wolves. Appellants further assert that the Threemile project violates TLMP standards and guidelines for the protection of wolves, including those relating to road density, integrating wolf habitat management program recommendations in the development of road management objectives, and protecting known active wolf dens.

<u>Discussion</u>

Some of these assertions are similar to those related to wolf surveys, the presence of wolves, and compliance with Forest Plan standards and guidelines for wolf den protection and wolf habitat management that are discussed above under Issue 1 of the appeal filed by the Sierra Club et al. I incorporate that discussion here by reference, which adequately responds to the related assertions in this appeal. Some of the specific assertions made in this appeal, however, warrant further discussion.

I disagree with appellants' assertion that the EIS fails to adequately consider the potential effects of the project on wolves. The FEIS clearly discloses the reasons for wolf decline in Southeast Alaska, and why Kuiu Island wolf populations are stable. A conversation between Forest Service and ADF&G biologists is documented in the project record [decision document #030], in which both agreed that the Kuiu Island population of wolves was probably increasing, and that there was no reason for wolf viability concerns in the Threemile project area. The FEIS also discloses the effects of activities in Wildlife Analysis Area 5018 that will likely cause a reduction in deer populations, and that any reduction in the deer population may have a short-term spatial reduction in wolves in that area. However, because timber harvest is not allowed on 65 percent of Kuiu Island, viability of wolves is not a concern. Moreover, as previously discussed, the FEIS discloses that the density of open roads in the project area following completion of the project will be 0.55 mile per square mile [FEIS, p. 3-177]. This far exceeds the Forest Plan's guidance (which only applies where wolf mortality concerns have been identified, and where road access has been determined to significantly contribute to wolf mortality—neither of which apply to the Threemile Project area) that "[o]pen road densities of 0.7 to 1.0 mile per square mile may be necessary to reduce mortality to sustainable levels" [Forest Plan, p. 4-116].

Forest Plan standards and guidelines clearly state that known active den sites will be checked during spring-time to determine whether they are active, and topographic and spatial buffers protecting dens will be employed during road construction. The project record indicates that no wolf dens were noted during field reconnaissance. The road density standard did not apply to this project since discussions with ADF&G (including a site visit) concluded that wolves were secure. As discussed in Issue 1 of the Sierra Club et al. appeal, the ROD and project record indicate that interagency discussions were held with USFWS and ADF&G.

I also disagree with appellants' assertions that the FEIS misleads the public in discussing road densities and the potential effect on wolves. The road density assertion is discussed above under Issue 2 of this appeal, and I incorporate that discussion here. In addition, the discussion of Issue 1 of the Sierra Club, et al. appeal deals in part with requirements for an interagency Wolf Habitat Management program in areas where wolf mortality concerns have been identified. I incorporate that discussion here as well. As previously discussed, no wolf mortality concerns have been expressed in the Threemile project area. On the contrary, interagency consultation has revealed agreement that the wolf population is probably increasing. Road access has not been determined to significantly contribute to wolf mortality. Indeed, the FEIS states that "[e]xcessive wolf mortality due to hunting and trapping does not seem to be a problem in the Threemile Project Area" [p. 3-177]. Therefore, the open road density objective of 0.7 mile per square mile does not apply to the Threemile project area. The FEIS also states that "[r]oad densities and hunting access by vehicle would be reduced" [p. 3-17]. For all these reasons, I believe the effects of road management on wolves are properly disclosed in the FEIS.

Based on my review of the Threemile FEIS, ROD, and project record, the Threemile project complies with all applicable direction related to protection of wolves and wolf habitat.

Appeal No. 04-10-00-00012 – Southeast Alaska Conservation Council:

<u>Issue 1</u>. Whether the timber volume authorized for harvest in the Threemile ROD is needed to meet annual market demand on the Tongass National Forest and demand over the planning cycle.

Appellants assert that the Forest Service misinterpreted the demand projections prepared by agency economists during the Forest Plan revision process, and that this error was incorrectly used as the basis for the allowable sale quantity (ASQ) established in the 1997 Forest Plan and caused the agency to allocate more land for timber production than was necessary to meet demand projections. Appellants also assert that the agency compounded this error by incorporating these projections as an integral component of the timber sale procedures used to set the annual Tongass timber program offer levels. Appellants further assert that the Forest Service violated NEPA by relying on an incorrectly inflated market demand projection and by failing to disclose and evaluate changes in current timber market conditions. Finally, appellants assert that the Forest Supervisor's conclusion that there is currently a market demand for timber, a limited supply of timber from other sources, and an under-utilized mill capacity in the region is arbitrary as it runs counter to evidence before the agency, and that the agency's estimate of installed mill capacity and utilization rates over-estimates mill consumption by at least 43 percent.

<u>Discussion</u>

I believe these issues are dealt with adequately in the discussion of Issue 13 of the appeal filed by Sierra Club, et al., above. Additional comments are worthwhile, however, regarding the assertions in this appeal that the agency's estimates of mill capacity and utilization rates are inaccurate. Among the documents in the project record used as a basis for these calculations is a recent publication of the Forest Service's Pacific Northwest Research Station, *Estimating Sawmill Processing Capacity for Tongass Timber* [decision document #25]. This report describes standard procedures for estimating mill capacity. These estimates are regularly updated, based on information gathered directly from producers in Southeast Alaska. Some of the procedures used in developing these estimates differ somewhat from practices employed in reports from other sources, including some of those cited by appellants. It is difficult to identify exactly how appellants' figures for capacity of certain mills were calculated, but it appears that a mixture of estimates from different sources using different methods was used, instead of the standardized methods mentioned above. Regarding utilization rates, the report cited above estimates that mills in Southeast Alaska utilized an average of 17.36 percent of their capacity in 2000, and only 8.75 percent in 2002 [Id., p. 7]. In my opinion, the Forest Supervisor's findings relating to market demand, limited alternative supply, and underutilized mill capacity are not arbitrary.

<u>Issue 2</u>. Whether the Threemile EIS adequately considers and discloses the potential effects of the project on subsistence users, and whether the Forest Supervisor's conclusion that the significant restrictions on the subsistence use of deer are "necessary" is supported by the record.

Appellants assert that the Threemile EIS and project record fail to evaluate the effects of chronic low deer populations within the customary and traditional deer hunting areas near Kake, the ability of Kake residents to safely hunt deer, and the cumulative effects of poor and dangerous

weather conditions and increased fuel prices on the ability of local hunters to obtain deer to feed their families and elders. Appellants further assert that the Forest Supervisor's conclusion that the significant restrictions on the subsistence use of deer are "necessary" is arbitrary because the Forest Supervisor failed to consider accurate timber market demand information and failed to balance the need to supply timber with the need to maintain the cultural, spiritual, and economic values of customary and traditional uses of the natural resources of the project area by residents of Kake and SEACC members.

Discussion

Section 810(a)(3) of ANILCA requires that no use or occupancy of lands under Federal jurisdiction can significantly restrict subsistence uses until the Federal agency determines that:

> (A) such a significant restriction of subsistence uses is necessary, consistent with sound management principles for the utilization of the public lands, (B) the proposed activity will involve the minimal amount of public lands necessary to accomplish the purposes of such use, occupancy, or other disposition, and (C) reasonable steps will be taken to minimize adverse impacts upon subsistence uses and resources resulting from such actions.

The EIS identifies deer as an important subsistence resource for the communities of Kake, Petersburg, Point Baker/Port Protection, and Wrangell, and indicates that Kuiu Island currently provides 2.6 percent of the deer harvested in Game Management Unit 3 [EIS, p. 3-127]. Deer hunting was not identified as a significant issue for the Threemile project, but the EIS indicates that deer habitat was considered when designing the project alternatives:

> The project alternatives call for both clearcut and partial timber harvest prescriptions that are designed to mimic natural disturbance events. Alternatives were developed that selected harvest units in areas with lower deer winter range values to mitigate the impacts on the deer population. Areas designated for non-harvest like stream buffers, beach fringe, and Old-growth Habitat, will help maintain huntable deer populations.

[EIS, p. 3-128]. The potential effects of the Threemile project on subsistence is discussed in Chapter 3 of the EIS [pp. 3-124 to 3-132]. Based on the analysis in the EIS, the Forest Supervisor concluded that the Selected Alternative did not present a significant possibility of a significant restriction on the subsistence use of wildlife (other than deer), salmon, other finfish, shellfish, marine mammals, plant foods, and personal use timber resources. The Forest Supervisor did conclude that there may be a significant possibility of a significant restriction on the subsistence use of deer for all of the alternatives, including the no-action alternative [ROD, p. 17].

The EIS displays potential reductions in the habitat capability of deer in the project area by alternative over 100 years [FEIS, p. 3-170]. The EIS states that the implementation of the Selected Alternative by itself does not present a significant possibility of a significant restriction of the subsistence use of deer. The possibility of such a restriction exists when the Selected Alternative, together with other past, present, and reasonably foreseeable future actions, are considered in a cumulative manner and in relation to the projected demand for deer forest-wide [ROD, p. 17].

In accordance with Section 810 of ANILCA, the Forest Supervisor determined that the actions involved in the implementation of the Selected Alternative are necessary, consistent with sound management of public lands, and strike the best balance between meeting the needs of the public and protecting forest resources [ROD, p. 17]. Appellants challenge this determination, pointing to their assertions relating to market demand and stating that the restriction of subsistence use is not necessary as the project is not needed to meet market demand.

Appellants' argument is similar to those raised in *Hoonah Indian Association v. Morrison*, 170 F.3rd 1223 (9th Cir. 1999). In *Morrison*, the 9th Circuit held that the word "necessary" does not have the affect of prohibiting timber sales that affect subsistence uses and are not required by law. A significant restriction of subsistence use might not be necessary to achieve compliance with law, yet necessary to conform to "sound management principles" for the "utilization" of public lands. The "utilization" to which "sound management principles" refers to is multiple, and includes outdoor recreation, range, timber, watershed, wildlife and fish, and wilderness. The Threemile project is a timber sale project. The Forest Supervisor was required to consider the potential effects of the project on subsistence, but is not precluded from selecting an alternative that may cause a restriction of subsistence use if he determines that the actions involved are "necessary, consistent with sound management principles for the utilization of the public lands."

The Threemile project is a necessary component of the Tongass timber management program designed to implement the Forest Plan and to meet the requirements of the Tongass Timber Reform Act (TTRA) related to seeking to meet the market demand for timber from the Tongass National Forest. The Forest Supervisor considered Forest Plan and TTRA direction, and well as other laws and direction relating to management activities on National Forest System lands, and concluded that the Selected Alternative provides the best mix of resource uses and opportunities to meet these needs [ROD, pp 17, 19]. Moreover, I disagree with appellants' assertions related to market demand, for reasons discussed in Issue 1 of this appeal and Issue 13 of the Sierra Club, et al. appeal above. The market demand aspects of the subsistence issue are dealt with adequately in those sections.

Therefore, the Forest Supervisor's conclusion that the significant restriction of subsistence use is necessary is reasonable and consistent with applicable law and policy direction.

<u>Issue 3</u>. Whether the economic analysis conducted for the Threemile EIS is adequate.

Appellants assert that the Threemile EIS fails to compare the economic benefits of the project with the economic costs associated with the adverse environmental effects of the project, particularly the significant possibility of the significant restriction of the subsistence use of deer in the project area. Appellants also assert that the financial efficiency analysis conducted for the Threemile project is inadequate as it fails to include a full discussion or estimate of the public costs of planning and administering the project; provides no information on the practice of pre-roading deficit timber sales; ignores the economic impacts on the commercial Dungeness crab fishery in Threemile Arm; and fails to comply with Forest Service Handbook direction or the EIS's description of the required financial efficiency analysis. Appellants further assert that the Threemile EIS fails to disclose the stumpage values and other data that were used for the NEPA Economic Analysis Tool (NEAT) analysis conducted for the project. Appellants further assert that it is unreasonable for the Forest Service to rely on the economic efficiency analysis conducted for the Forest Plan instead of using updated information available in the 2003

Supplement to the Forest Plan EIS, and that tiering to either analysis in the Threemile EIS is inappropriate as it fails to examine the site-specific factors relevant to the project, particularly those relating to the economic value of project area lands to local communities for future recreation and tourism opportunities. Finally, appellants assert that the ROD's statement that the project provides positive economic returns is inaccurate and unsupported by the record, as the agency's own analysis indicates that the net revenue for the Selective Alternative is estimated to be negative.

Discussion

Appellants assert that "the FEIS fails to compare [the project's] supposed economic benefits with the economic costs associated with the expected adverse environmental effects," especially potential subsistence effects. This assertion involves issues very similar to those described above in the discussion of Issue 10 of the appeal filed by Sierra Club, et al., relating to the quantification of non-market values. As discussed in that section, there is no requirement to attempt to quantify non-market values in monetary concerns.

With regard to appellants' assertions related to the potential effects on subsistence uses, see the response to Issue 2 above. In my opinion, that discussion adequately responds to the subsistence-related assertions in this issue.

Appellants also assert that the economic analysis in the FEIS inadequately considers economic effects on the crab fishery in the area of the proposed LTF. In its comment letter on the DEIS, the Department of the Interior recommended that the LTF be changed to a barge design to minimize bark deposition [FEIS Appendix C, p. C-6]. Bark deposition is widely believed to adversely affect habitat values, and such effects would be avoided by employing a barge LTF. The Forest Service complied with this request [FEIS Appendix C, p. C-15]. Moreover, the dive survey conducted for this LTF did not indicate that the area was particularly good habitat; species abundance and diversity was low [project document #328, p. 7]. Accordingly, I find nothing in the project record to suggest that any significant effect on the crab fishery will result from the Threemile project, so it would be speculative and inappropriate to attempt to quantify any economic effects on that fishery.

Appellants' assertions about public investment and financial efficiency analysis are very similar to those raised by Sierra Club et al., and described above in the discussion of Issue 12 of that appeal. I believe that discussion is sufficient to address the issues raised in this appeal regarding public investment, financial efficiency analysis, consistency with FSH direction, disclosure of net revenue effects of the decision, and compliance with NEPA.

Issue 4. Whether the cumulative effects analysis conducted for the Threemile EIS is adequate and consistent with NEPA and ANILCA.

Appellants assert that the Threemile EIS fails to provide adequate site-specific information about the location of the Kuiu, Bayport, and East Alecks I and II timber sales, all of which enter the Port Camden or East Kuiu Inventoried Roadless Areas (IRAs), and that it fails to adequately evaluate the cumulative effects on the subsistence, commercial, and recreational use of fish and wildlife and the roadless area values of the project area. Appellants further assert that the Bayport and East Alecks I and II sales will result in cumulative effects on the Apricot Creek

watershed that are not disclosed in the Threemile EIS, and that the EIS fails to consider the cumulative effects of other timber sale projects within the traditional territory of OVK members, particularly the Fanshaw timber sale project.

Discussion

The assertions on this issue are similar to those discussed above under Issue 15 of the appeal filed by the Sierra Club, et al. I incorporate that discussion here. Moreover, the assertion regarding analysis of potential effects on subsistence opportunities is adequately dealt with in the discussion of Issue 2 of this appeal. Finally, the assertion related to the adequacy of the analysis of cumulative watershed and fisheries effects contained in the Threemile FEIS is discussed above in the response to Issue 5 of the Cascadia Wildlands Project appeal, and I incorporate that discussion here as well.

Regarding the Kuiu timber harvest and road management project, the Threemile project record contains a scoping letter for the Kuiu project that describes the Value Comparison Units (VCUs) included in the Kuiu project area, and none of them are in either the Port Camden or East Kuiu IRA, as appellants assert [decision document #41, p. 3]. The statement in the FEIS that the Kuiu project will not affect IRAs in the Threemile project area is accurate [FEIS, pp 3-51 and 3-52].

With respect to the Bayport, East Alecks I and East Alecks II projects, there is not yet any proposal for those projects as that term is defined in the Council on Environmental Quality's NEPA regulations, because the agency is not yet actively preparing to make a decision on one or more alternatives nor can the effects by meaningfully evaluated [See 40 CFR 1508.23]. Indeed, there has not been a Notice of Intent to prepare an EIS on any of these projects.

Effects of future projects on IRAs and on resources outside the Threemile project area are appropriately examined during the project-planning process for those projects, in which appellants will have the opportunity to participate.

For the foregoing reasons, I believe the analysis contained in the Threemile FEIS of cumulative effects of the Selected Alternative meets all applicable requirements.

Issue 5. Whether the temporary roads authorized for the Threemile project qualify for an exemption under Section 404 of the Clean Water Act (CWA).

Appellants assert that the Forest Service has not demonstrated that the construction of the temporary roads authorized for the Threemile project comply with the Corps of Engineer's regulations for the exemption of temporary roads from the requirements of Section 404 of the CWA as the Forest Service has not committed to removing the fill from these temporary roads as required by Corps' regulations.

Discussion

Appellants are correct that construction of temporary roads must comply with BMPs specified in 33 CFR § 323.4(a)(6), and that the last BMP states that "[a]ll temporary fills shall be removed in their entirety and the area restored to its original elevation" [33 CFR § 323.4(a)(6)(xv)]. The decision whether to interpret this BMP to require the removal of the entire prism of any temporary road built on wetlands under the Threemile ROD will be up to the U.S.

Army Corps of Engineers (Corps). In its comment letter on the Threemile Draft EIS, the Corps made no mention of any concern regarding this provision [FEIS Appendix C, pp. C-79 and C-80]. In addition, the location of temporary roads will be determined by the timber operator who purchases the sale, subject to contract provisions that require compliance with all applicable laws and regulations. Thus, it is not possible to determine for certain at the NEPA stage of the process whether any temporary roads will be constructed on wetlands. The question of whether the Corps will require the operator to remove such temporary fills is, therefore, premature. It is my understanding, however, that in some cases the Corps has determined that the removal of the entire prism of temporary roads from wetlands would do more harm than good, and has not required it. In any case, all temporary roads constructed under the Threemile ROD will be subject to the Corps' interpretation regarding removal of temporary fills.
For these reasons, I believe the assertion made by appellants on this issue are not warranted and require no remedy.

Recommendation

In my opinion, the analysis in the Threemile FEIS and project record is sufficient to support the Forest Supervisor's decision with respect to all the issues raised in these appeals. Based on my review of the FEIS, the ROD, and the project record, and all the discussions above of each specific appeal issue, I believe the FEIS and ROD meet all applicable requirements of law, regulation, and policy. All of the required findings are included, except for the finding related to the minimum road system that is required by 36 CFR § 212.5(b), as discussed above under Issue 1 of the appeal filed by the Cascadia Wildlands Project.

Because the analysis in the FEIS and project record fully support the minimum road system finding, I believe the appropriate remedy for this technical oversight would be for you to include in your decision language that tracks the exact provisions of this regulation. I will prepare the appropriate language for your consideration.

/s/ Cherie Shelley

CHERIE SHELLEY
Appeal Reviewing Officer

Enclosures