## National Park Service

U.S. Department of the Interior

Katmai National Park and Preserve Alaska

## Finding of No Significant Impact

Naknek Lake Sand Removal

April, 2007

Recommended:

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| Ralph Moore | Date |
| Superintendent |  |
| Katmai National Park and Preserve |  |



# FINDING OF NO SIGNIFICANT IMPACT 

Naknek Lake Sand Removal<br>Katmai National Park and Preserve, Alaska<br>April, 2007

The National Park Service (NPS) has prepared an environmental assessment (EA) to evaluate a proposal to remove up to 200 cubic yards of sand from the shore of Naknek Lake in Katmai National Park and Preserve (KATM), Alaska. The sand is needed for a leach field rehabilitation project at Brooks Camp.

The NPS has selected Alternative B, the preferred alternative, "Sand Removal from Naknek Lake Beach" that would remove up to 200 cubic yards of sand from the beach along Brooks Camp, with mitigation measures.

The NPS received no substantive comments on the EA and no additional information has been added to the EA. Thus no errata sheet has been prepared.

## ALTERNATIVES

The EA evaluated two alternatives: Alternative A - the "No-Action" Alternative and environmentally preferred alternative; and Alternative B - "Sand Removal from Naknek Lake Beach" and NPS preferred alternative.

## Alternative A: No Action (Environmentally Preferred Alternative)

Under this alternative, no sand would be removed from the Naknek Lake, Brooks Camp shoreline. No sand of suitable quality and quantity would be available to complete the leach field rehabilitation project. This alternative represents a continuation of the existing situation and provides a baseline for evaluating the changes and impacts of the proposed action alternative.

## Alternative B: Sand Removal from Naknek Lake Beach (NPS Preferred Alternative)

Under this alternative, the NPS would excavate up to 200 cubic yards of native material (sand) from below the ordinary high water line ( $\mathrm{OHW} \mathrm{)} \mathrm{of} \mathrm{Naknek} \mathrm{Lake} \mathrm{along} \mathrm{the} \mathrm{Brooks} \mathrm{Camp} \mathrm{beach}$, campground and the leach field driveway (EA, Figure 4). Excavation would occur in late spring when lake water levels are very low and the proposed project site is dewatered. Specifically, the NPS KATM maintenance personnel would use a tracked front-end loader to scrape off an approximately six-inch layer of sand within a rectangular area of approximately 360 feet by 30 feet. The front-end loader and a fiveyard dump truck would access the excavation site along the lake shoreline. The sand removed from the lake shore would be deposited directly into the dump truck and hauled approximately 200 yards to the upland area of the existing leach field, across the previously hard-packed leach field driveway, oriented perpendicular to the beach. The sand would be stockpiled adjacent to the leach field and placed in a $40-$ foot by 40 -foot area lined with geo-textile fabric. Using a JD 670B grader, maintenance personnel would re-grade the excavated area to match, as much as possible, the natural contour of the beach per guidance in NPS Special Directive 91-6 (EA, page 10).

Work would be accomplished during two days in late spring 2007, between early April to May when the shore is exposed and dry. As soon as the Naknek Lake beach is free of ice and aircraft beach landings
could safely occur, park personnel would access the Brooks Camp site and begin heavy equipment mobilization and operation. During winter, some heavy equipment is kept in storage in maintenance yards on the south side of the Brooks River. This equipment would be operational by approximately mid April, to coincide with State permitted, annual Brooks Camp septage hauling and floating bridge installation activities. The lake sand removal project would be one of the first tasks to be performed when the maintenance crew arrived at Brooks Camp, to ensure completion during extreme, low, lake water levels. No work will be performed until archeological clearance is obtained. All work would be accomplished with park labor, equipment and materials. As every year, springtime Brooks Camp start-up maintenance tasks would be prioritized and staged, according to existing weather, lake and ground conditions that can vary widely each year.

## PUBLIC INVOLVEMENT

The EA was issued for a 30-day public comment period beginning March 2, 2007 and ending March 31, 2007. Copies of the EA and a distribution cover letter were mailed or emailed to 56 federal, state and local government agencies, tribal entities, interest groups and individuals. This included three interested Native groups and the Brooks Camp concessioner. In addition, the EA was posted for public viewing on the NPS Planning, Environment and Public Comment (PEPC) national website during the public review period.

The NPS received six written comments about the EA, including a letter from the Alaska Coastal Management Program (ACMP), the State of Alaska ANILCA Implementation Program, the Bureau of Land Management (BLM) Anchorage Field Office, the Bristol Bay Borough, the National Parks Conservation Association (NPCA) and the U.S. Army Corps of Engineers (COE). The ACMP agency review participants agreed with the NPS Negative Determination and analysis that the proposed project would not affect the land or water uses or natural resources of the coastal zone. The State ANILCA program had no comments. The BLM hoped that the project is successful and provides improved visitor servicés and increases the adequacy of the existing wastewater system at Brooks Camp. The Bristol Bay Borough Coastal Coordinator supported the proposed project, as it is the best solution and stated that without the project, detrimental effects would occur to the watershed. The NPCA understood the urgency to fix the septic system, agreed with the EA that the impacts from using sand from Naknek Lake are nominal and supported the preferred alternative. The COE concurred that it does not regulate the proposed activity.

The public comments received did not change the conclusions in the EA about the environmental effects of the action. No substantive comments were received, thus no errata sheet has been prepared.

## DECISION

The NPS decision is to select Alternative B, "Sand Removal from Naknek Lake Beach" along with the mitigating measures.

## Mitigating Measures

The following mitigation measures apply to the selected Alternative B, "Sand Removal from Naknek Lake Beach".

Cultural Resources. Ground disturbance will be restricted to active beach deposits below the OHW line of Naknek Lake. Consultation has taken place with interested Alaska Native groups to identify and evaluate any ethnographic resources, sacred sites and traditional, cultural properties that might be affected
by this undertaking. Should previously unknown cultural resources be identified during project implementation, work will be stopped in the discovery area and the NPS will perform consultations in accordance with 36 CFR 800. The resources will be evaluated to determine if they are eligible to be listed on the National Register of Historic Properties. If proposed excavation locations cannot be adjusted to avoid adversely affecting eligible cultural resources, the NPS will execute a Memorandum of Agreement (MOA) with the Advisory Council on Historic Preservation and the Alaska State Historic Preservation Office that will incorporate comments from consulting parties. The MOA will specify measures to minimize or mitigate adverse effects. Furthermore, as appropriate, the NPS will abide by provisions of the Native American Graves Protection and Repatriation Act of 1992. Any artifacts recovered from park property at the project site will be accessioned, cataloged, preserved, and stored in compliance with the NPS Cultural Resource Management Guidelines.

Beach Vegetation. As USGS hydrologist Janet Curran recommends (EA, Appendix C), "...disturbing beach vegetation should be avoided as this could destabilize beach forms or generate shoreline erosion. Excavation should also avoid disturbing the area immediately adjacent to the upland, again to minimize the potential for erosion." Thus, as much as possible, maintenance workers will avoid disturbing vegetated areas and incorporate Best Management Practices (EA, Appendix D) to control erosion.

Steller's Eiders. Per guidance from the U.S. Fish and Wildlife Service, Ecological Services office, if Steller's Eiders are seen in the area, the project will not proceed while they are present.

Exotic Species Management. During transport of personnel into the park and equipment mobilization and operation, efforts will be made to avoid the introduction of non-native species into the area. The lake sand material source is inside the park and is expected to be devoid of vegetation. Even so, KATM personnel have consulted with the Exotic Plant Management Team at the NPS Alaska Regional Office as to what project-specific actions should be taken. Park staff will verify that the sand material site is free of target invasive species prior to its use.

Site Rehabilitation. After the sand is removed, park maintenance personnel will use a JD 670 B grader to backfill adjacent sand into the depression, returning the surface to a more natural and smooth appearance.

## Rationale for the Decision

The selected Alternative B best satisfies the purpose and need for the action. It satisfies the need to obtain sand material, of adequate quantity and quality, for the rehabilitation of the existing Brooks Camp leach field. As described in the Environmental Assessment, Rehabilitation and Replacement of Brooks Camp Facilities and FONSI of August 2006, the leach field system has failed and requires rehabilitation for successful operation. Alternative B also indirectly satisfies the primary Brooks River area purpose statements and protects the Brooks River Area significant resources from potential wastewater contamination. Alternative B would allow the park to provide a reliable leach field operation in compliance with State wastewater and public health regulations. For visitor-related services, the NPS could continue the Katmailand concessions contract without risk of failing to provide basic sanitation services.

Alternative A is the environmentally preferred alternative, because it would cause less damage to the biological and physical environment. For the visitor experience, however, in the short-term, this alternative would result in minor, negative, indirect impacts if the leach field malfunctioned during the visitor season, resulting in temporary, alternative wastewater system services, water conservation measures and Camp closures by public health officials. In the long-term, negligible, indirect impacts to quality and extent of visitor services would be expected since the park would be expected to adequately resolve the wastewater problems within one visitor season.

Under Alternative A, without a suitable material source for the proposed project, it would not be possible to rehabilitate the leach field. Both park and concessioner operations at Brooks Camp, highly dependent on the wastewater system provided by the leach field, would be detrimentally affected without adequate sand material stockpiled in time for the autumn 2007 rehabilitation project. Park management operations would be negatively impacted with increasing visitor dissatisfaction and resulting public relations problems. Thus, Alternative A was not selected for implementation because it would not satisfy the purpose and need for the action.

The park dismissed four material source alternatives in the EA. Per guidance and analysis followed in Special Directive 91-6, outside park sources from local contractors were evaluated and determined to be "totally impractical" from park budget $(\$ 150,000)$ and logistics aspects. The alternative to purchase sand from nearby private landowners was dismissed because the sale of sand, both above and below the OHW, is prohibited by the terms of the 1998 Conservation Agreement (EA, page 16). The alternative to use an in-park source from the proposed construction site of the Brooks Lake maintenance facility was ruled out due to the unavailability of sand material until late summer of 2007. This delay would have made it impossible to transport the material during high lake water levels and high visitor use activity in the Brooks Camp area without significant traffic disruptions for park and concessioner operations, visitors, and bears. The sand must be stockpiled in spring so that extraction and transport activities avoid the busy summer Camp season with bear use and visitor traffic. Another in-park source alternative, the "Moraine" gravel pit, was dismissed because this material did not meet the engineering specifications required for the leach field rehabilitation.

The park eliminated three transportation alternatives in the EA. The alternative to transport sand from a source south of Brooks River by 40 round trip truck crossing of the Brooks River was dismissed because of the high probability of damage to the sensitive Brooks River stream bed. Similarly, an option to transport sand across a temporary, modular floating bridge across the river was ruled out due to the unreasonable cost of $\$ 120,000$ and potential, major impacts to river resources such as soils, vegetation, wetlands, fish habitat and visitor trail systems. A third alternative to construct an ice road between the Brooks River bulkhead and the beach opposite the leach field was dismissed due to the extreme variability and unpredictability of weather conditions and lake freeze conditions each winter/spring, as well as mobilization of pumping equipment and permitting challenges associated with a contracted, ice road construction in a remote location.

## Significance Criteria

Alternative B, the preferred alternative, will not have a significant effect on the human environment. This conclusion is based on the following examination of the significance criteria defined in 40 CFR Section 1508.27.
(1) Impacts that may be both beneficial and adverse. A significant effect may exist even if the Federal agency believes that on balance the effect will be beneficial. Alternative B will have no impacts on air quality; visual quality; soundscape; wilderness; floodplains; soils and vegetation; geomorphology; terrestrial wildlife; wilderness; threatened, endangered or other special status species; subsistence; local economy; minority and low income populations; land use and access; and ANILCA Section 1306. Impacts to water resources; fisheries; wetlands and cultural resources will vary from none to a negative, negligible level. Impacts to the visitor experience will range from none to a positive, minor level.
(2) The degree to which the proposed action affects public health or safety. Employee and visitor safety and health will be indirectly improved, by providing adequate sand material for the rehabilitation of the leach field, which will, in turn, allow the wastewater system to meet acceptable regulatory standards.
(3) Unique characteristics of the geographic area such as proximity to historic or cultural resources, park lands, prime farmlands, wetland, wild and scenic rives, or ecologically critical areas. The sand removal project, as well as the leach field rehabilitation are located within the Brooks Camp National Historic Landmark.
(4) The degree to which effects on the quality of the human environment are likely to be highly controversial. The EA analysis and public comments do not indicate that any effects presented in the EA are controversial.
(5) The degree to which the possible effects on the human environment are highly uncertain or involve unique or unknown risks. The EA analysis and public comments do not indicate that any effects are highly uncertain or involve unique or unknown risks.
(6) The degree to which the action may establish a precedent of future actions with significant effects or represents a decision in principle about a future consideration. The proposed action does not establish a precedent for future actions with significant effects or represent a decision about a future consideration. This action is a one-time sand removal operation.
(7) Whether the action is related to other actions with individually insignificant but cumulatively significant impacts. Significance exists if it is reasonable to anticipate a cumulatively significant impact on the environment. Significance cannot be avoided by terming an action temporary or by breaking it down into small component parts. The proposed action will not act in conjunction with other actions to produce cumulatively significant impacts.
(8) Degree to which the action may adversely affect districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places or may cause loss or destruction of significant scientific, cultural, or historical resources. Alternative B will comply with Section 106 of the National Historic Preservation Act. Mitigation measures will be employed and project activities will be monitored by archeologists.
(9) The degree to which the action may adversely affect an endangered or threatened species or its habitat that has been determined to be critical under the Endangered Species Act of 1973. The project is expected to have no effect on known federal or State-listed threatened or endangered species, federal candidate species or State-listed species of special concern within the project area. Since Steller's eiders (Polysticta stelleri), listed as threatened under the Endangered Species Act in 1997, may be present in the area, as a mitigation measure, if Steller's Eiders are seen in the area, the project will not proceed while they are present.
(10) Whether the action threatens a violation of Federal, State, or local law or requirements imposed for the protection of the environment. Alternative B does not violate any federal, state or local environmental protection laws. In fact, it will indirectly correct current problems with wastewater management under state and federal regulations.

## FINDINGS

The levels of adverse impacts to park resources anticipated from the selected alternative will not result in an impairment of park resources that fulfill specific purposes identified in the establishing legislation or that are key to the natural or cultural integrity of the park.

The selected alternative complies with the Endangered Species Act, the National Historic Preservation Act, and Executive Orders 11988 and 11990. There will be no restriction of subsistence activities as

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| Naknek Lake Sand Removal EA |  |  |

Naknek Lake Sand Removal EA
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documented by the Alaska National Interest Lands Conservation Act, Title VIII, Section 810(a) Summary Evaluation and Findings.

The National Park Service has determined that the selected alternative does not constitute a major federal action significantly affecting the quality of the human environment. Therefore, in accordance with the National Environmental Policy Act of 1969 and regulations of the Council on Environmental Quality (40 CFR 1508.9), an environmental impact statement is not needed and will not be prepared for this project.

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