

APR 8 2010

To All Interested Government Agencies and Public Groups:

Under the National Environmental Policy Act, an environmental review has been performed on the following action.

TITLE:	Finding of No Significant Impact (FONSI) and Environmental Assessment (EA) for the Pelekane Bay Watershed Restoration Project, to support ARRA Grant Award # NA09NMF4630310
LOCATION:	Pelekane Bay, Hawai'i
SUMMARY:	The purpose of this project is to conduct construction, restoration and enhancement activities intended to improve coastal and marine habitat at Pelekane Bay, Hawai'i. The Project will be funded by NOAA through the American Recovery and Reinvestment Act.
RESPONSIBLE OFFICIAL:	Patricia A. Montanio Director, Office of Habitat Conservation National Oceanic and Atmospheric Administration 1315 East-West Highway Silver Spring, MD 20910

The environmental review process led us to conclude that this action will not have a significant effect on the human environment. Therefore, an environmental impact statement will not be prepared. A copy of the FONSI including the supporting EA is enclosed for your information.

Although NOAA is not soliciting comments on this EA or FONSI, we will consider any comments submitted that would assist us in preparing future NEPA documents. Please submit any written comments to the responsible official named above.

Sincerety, Paul N. Doremus, Ph.D. NOAA NEPA Coordinator

Enclosure



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Targeted Supplemental Environmental Assessment (TSEA) for the Pelekane Bay Watershed Restoration Project

Introduction

This document is a targeted supplemental environmental assessment (TSEA) for the National Oceanic and Atmospheric Administration's (NOAA) Community-based Restoration Program (CRP), administered within NOAA's National Marine Fisheries Service under the authority of the Fish and Wildlife Coordination Act, 16 U.S.C. 661, as amended by the Reorganization Plan No. 4 of 1970 and the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006. NOAA is proposing to provide financial assistance to the Kohala Center for a habitat restoration activity entitled "Pelekane Bay Watershed Restoration Project" through the American Recovery and Reinvestment Act of 2009 (ARRA), Pub L. No. 111-5, 123 Stat. 115.

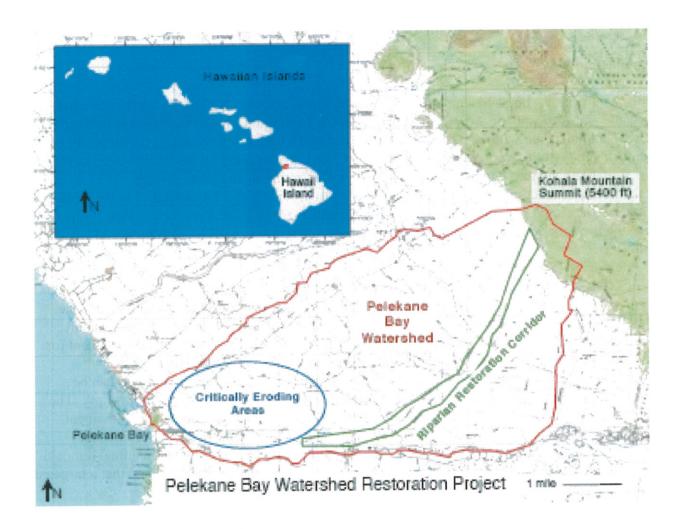
With NOAA's proposed financial assistance (NOAA Award # NA09NMF4630310), the Kohala Center would conduct restoration activities to improve coastal and marine habitat at Pelekane Bay, Hawai'i. The majority of the restoration activities proposed for this site previously have been programmatically analyzed by the CRP in a Programmatic Environmental Assessment for Implementing the Community-based Habitat Restoration Program (2002) and a 2006 Supplemental Programmatic Environmental Assessment (SPEA). These documents can be found at <u>http://www.nmfs.noaa.gov/habitat/restoration/projects_programs/crp/index.html</u>. The programmatic analyses outline the situations under which a tiered environmental assessment, referred to in the PEA/SPEA as a "targeted EA" would be prepared. In this case, since the programmatic documents did not consider the potential impacts of non-native mammal removal as a component of land-based erosion control and restoration, the CRP determined that a targeted EA is warranted.

The ARRA provides that "[a]dequate resources within this bill must be devoted to ensuring that applicable environmental reviews under the National Environmental Policy Act are *completed on an expeditious basis and that the shortest existing applicable process under the National Environmental Policy Act shall be utilized.*" Pub. L. 111-5, § 1609(b) (emphasis added). In accordance with CEQ guidance, as clarified, concise EAs may be used by federal agencies when there is consensus that there are not unresolved conflicts concerning alternative uses of available resources. In these cases, NOAA may consider the proposed action and proceed without consideration of additional alternatives. Accordingly, the analysis in this targeted EA provides a description of the baseline environmental conditions at the site for use in comparing impacts of the proposed action with the no-action alternative, and specifically analyzes the proposed goat eradication measures.

Purpose and Need for Action

The area to be affected is a portion of the Kohala Watershed Management Area (WMA), on the Northwestern shore of the island of Hawai'i. This roughly 64,000 acre watershed area is managed by the Kohala Watershed Partnership (KWP), led by The Kohala Center and is identified in the map below:

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The baseline condition at the site is described here, with specific discussion of conditions that are attributable to over-grazing by feral goats. This baseline condition is presented for comparison with the portion of the proposed action that calls for eradication of the feral goat population.

Pelekane Bay is currently subject to the detrimental effects of sedimentation originating from the lower sections of the Kohala Watershed. Sedimentation affects nearshore coral reefs in a variety of ways.^{19, 21} It diminishes the reproductive ability of coral reefs by reducing the viability of both coral and reef-fish larvae by hindering successful embryo fertilization at the onset of spawning.^{1, 7, 15, 16, 20} Sediments also degrade coral reef habitat which can reduce the settlement and growth of post-larval coral recruits once reintroduced to the nearshore reefs.^{7,10, 15, 16, 17, 20} Sediment can also acts as a vector for bacterial, pathogen, and toxicant introduction on reef systems. This can result in the introduction of disease, smothering (*i.e.* lack of light allowed to photosynthetic reef organisms), and anoxicity (lack of oxygen for coral animals).^{11, 13, 14} Evidenced by the presence of small, steep-sloped watersheds immediately adjacent to nearshore coral reefs, sedimentation is a prominent threat to reef systems in Hawai'i.

Lower sections of the watershed, where intended restoration is to take place, harbor populations of native species and some documented traditional-Hawaiian archaeological sites which have been degraded by poor land use and management, invasive, non-native plant species, and feral, non-native goats.

Goats in particular have been well-documented as primary factors influencing erosion.^{2, 5, 6, 18} As intensive grazers of vegetation, goats denude groundcover which facilitates the loss of top soil during regular rain events.^{2, 4, 5, 6, 18} Moreover, native vegetation in Hawai'i has not evolved to tolerate grazing, browsing and trampling by terrestrial mammals making it especially susceptible to goat and other feral ungulate impacts.^{3, 4, 8, 12} As non-native species to Hawai'i, no predators exist for goats aside from humans.

The overall goal of the KWP is to restore the coral reef habitat of Pelekane Bay by significantly reducing land-based sediment inputs originating from lower portions of the Kohala WMA. The proposed restoration of the area will consist of:

- Maintaining existing ground cover in watershed to prevent actively eroding areas from expanding by constructing 20 miles of goat-proof fence in high priority sections of the watershed; eradicating goats within the watershed; implementing grazing best management practices; reducing fuel load by prescribed grazing; and controlling fire-adapted invasive weeds.
- Restoring native vegetation to eroding and important areas of the watershed by using native *pili* grass bales and erosion control fabric to establish vegetation at 100 critically eroding sites in lower watershed; controlling invasive weeds within 400 acre riparian corridor; and collecting, propagating and out-planting 100,000 native trees, shrubs and grasses for the riparian corridor.
- Reducing sediment transport and storage in drainages and mitigating head-cutting gullies by constructing sediment check dams in 50 gullies; and stabilizing gullies with erosion control fabric and planting.
- Monitoring impacts of watershed restoration on the coral reef environment of the bay by monitoring in-stream and near-shore water quality by field testing; monitoring sediment accumulation at check dams; monitoring stream flow and stream sediment loads with auto samplers; monitoring coral health in Pelekane Bay by benthic surveys; and monitoring out-plantings, including survival and growth at the restoration site.

This document specifically focuses on goat eradication activities and their potential environmental impacts, as all other above-listed activities are analyzed in the NOAA CRP's PEA/SPEA.

Alternatives Considered

No Action

I.

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The project area's existing condition is ecologically unstable and significantly degraded. Taking no action would result in continued erosion and adverse effects from feral goats in the Kohala Watershed, and continued harm to the coastal and marine habitats. The proposed restoration action is to halt the erosion and sedimentation effects of goats in the Kohala Watershed, especially within the lower portions of the watershed most heavily populated by goats, and along riparian corridors where sedimentation can most immediately be mitigated by other restoration measures (e.g. out-planting native plant species). If no action is taken, adverse impacts will continue to occur in the project area.

The NOAA-preferred restoration action is to fence the watershed to halt the free movement of goats into and out of the Kohala Watershed followed by eradicating all goats within the watershed via shooting and trapping methods.

II. Preferred Alternative - Description of Proposed Action

Under the preferred restoration action, ungulate fencing and eradication would be completed to protect the Kohala Watershed. First, twenty miles of goat-proof fence will be constructed to halt the free movement of goats into and out of the watershed. Fencing will be at least 6 feet high along the entire perimeter and would prevent against the crossing of goats either by going over it or underneath it. After the fence is installed, goat eradication will commence, and consist of the systematic deployment of hunters in the watershed using firearms and traps to exterminate goats. Traps will be 'baited' with water, one of the most effective attractants for goats. Traps will be checked daily and trapped goats will be disposed of quickly, *i.e.* humanely. The final stages of goat eradication will include assistance from spotters (individuals) in helicopters who can more effectively locate the last remaining goats in the watershed. No shooting will take place from the helicopter. Hunting will be ground-based only, and consistent with state hunting safety procedures and regulations. Hunting efforts will be coordinated to ensure the safety of other individuals who may access the watershed for various reasons during the eradication effort.

Eradication of goats in the watershed would completely meet the proposed action's purpose of halting the adverse effects of sedimentation and erosion created by the goats

Environmental Effects

Impacts of the No Action Alternative

Under the no-action alternative, NOAA would not fund the proposed project. The need for coastal and marine habitat restoration at the project area is great, and this project responds to those needs and meets important priorities of the CRP. This alternative would not contribute to fulfillment of the CRP's purpose and need, or to the purpose of the ARRA.

Impacts of the Preferred Alternative

Environmental impacts for the restoration alternative from fencing installing and goat eradication will include the mortality of non-native goats, reduced sedimentation of the watershed, and improvement to habitat condition for native vegetation and corals. Short-term impacts to site vegetation and to airborne noise levels would occur during goat eradication, as a result of increased presence of hunters on the property and the use of helicopters to aid in sighting goats

in support of ground-based hunters. These short term impacts and future temporary indirect impacts associated with any future fence maintenance activities would be minor in nature. Overall the proposed eradication of goats as part of the restoration effort would provide long-term environmental benefits to the human environment.

There are potential impacts to the Hawaiian Hoary Bat, which have been addressed via a formal consultation with the USFWS. Additional detail on the consultation is below.

There will be no impacts to either public health or safety. Goat eradication procedures will follow all state laws and regulations in regards to safe hunting practices. All hunters will have current state hunting licenses and use only registered firearms. The landowner, Parker Ranch, currently has a hunting program that includes liability releases and training. Hunting efforts will be coordinated to ensure the safety of other individuals who may access the watershed for various reasons, such as other restoration activities, during the eradication effort. A safety protocol for wildlife handling is in place. Goat meat will be offered to local community members in good faith but only when it is fresh and cleaned at the discretion of the KWP staff.

Unique characteristics of the area will not be affected by these activities. Consequences to the environment will include both beneficial and negative impacts, but the overall net result will be beneficial once goats have been removed.

Impacts to the human environment that could be highly controversial will be negligible. Ecologically, there is no benefit from feral goat populations existing in the Hawaiian environment, in terms of positive impacts to either the terrestrial watershed or adjacent coastal and marine habitats. In terms of social controversy, some concerns were raised about the prospect of eradicating pigs in the Kohala Watershed during a public review process under State auspices. In some Hawaiian cultures pigs are considered to be a traditional deity, and are also a supplementary food source for low income residents (both of Hawaiian and non-Hawaiian descent). However, these concerns are not likely to arise with goats since they are not held in esteem as a cultural resource or significant supply of food.

There are no uncertain, unique, or unknown risks to these planned activities. The need for feral ungulate control and removal (including eradication programs on islands) has become socially recognized, and well-vetted resource management methods and practices have been used throughout the United States. As such, this action would also not establish a precedent for future actions with significant impacts or represent a decision in principle about a future consideration.

This activity will not be in violation of any Federal, state, or local law for environmental protection. An environmental assessment for the Kohala Watershed Partnership was prepared for the state of Hawai'i with a finding of no significant impact in 2008.

There is no risk of introducing or spreading non-indigenous species as a result of this activity. On the small chance that a species otherwise absent from the watershed could be introduced on hunting gear or boots, hunters will be directed to clean their gear before hunting commences in the watershed. Overall, the project results in the removal of a non-indigenous species in a localized area.

There are no other known, unrelated projects planned or identified in the project area, which would have reasonably foreseeable cumulative adverse impacts. Any negative impacts caused by the proposed action would be only temporary, as well as generally only minor in terms of spatial extent. If other unrelated projects are planned in the future within the spatial vicinity of the proposed action, then any cumulative adverse impacts could be considered at that time.

Agencies and Persons Consulted

The State of Hawai'i Historic Preservation Division has been consulted. They have provided concurrence that no cultural or historic sites in the watershed will be adversely affected by these activities. If anything the removal of goats from the area would serve to benefit these sites by alleviating them of the impacts of goat trampling.

NOAA conducted a formal section 7 consultation with the U.S. Fish and Wildlife Service (FWS; Pacific Region in Honolulu, Hawai'i), regarding potential impacts to federally listed threatened and endangered species. The FWS issued a Biological Opinion (BO) on February 5, 2010, for potential take of the Hawaiian Hoary Bat (Ōpe'ape'a) *Lasiurus cinereus semotus* via entrainment on the barbed wire strung along goat-proof fences as part of this project. The BO included an Incidental Take Statement (16 bats, over 20 years) with reasonable and prudent measures, terms and conditions, and conservation recommendations.

Due to poor bat foraging habitat the likelihood of bat take is low, however a formal consultation was deemed necessary to manage for and mitigate the potential fatalities over the next 20 years of the life of the fence line. NOAA and the FWS cooperatively developed the mitigation measures, which include a total of 8,800 audio-visual bat deterrents that will be installed along the fence line to discourage bat flights near the fence lines. These deterrents will be placed along half of the total fence lines implemented for this project to experimentally discern the effectiveness of the deterrents. The audio-visual deterrents were conceptualized with assistance from the U.S. Geological Survey (USGS), from studies of Hawaiian Hoary Bats on the Big Island. The objective is to allow bats to detect the fence line acoustically and/or visually. In addition to the deterrents, the recipient has agreed to coordinate with USGS to further monitor any potential bat populations that might use the area with acoustic detectors. Monthly fence line monitoring for signs of bat use and/or mortality is also an agreed component of the BO. The completed BO is attached as an addendum to this document.

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Finding of No Significant Environmental Impact for the Pelekane Bay Restoration Project

NOAA's National Marine Fisheries Service (NMFS) has prepared a concise and timely targeted supplemental environmental assessment (TSEA) for a restoration activity proposed to be funded through the American Recovery and Reinvestment Act as well as directed congressional appropriations through the NOAA Restoration Center.

The proposed action is a project entitled "Pelekane Bay Restoration Project," undertaken by The Kohala Center, Inc. This project will restore fisheries habitat in Pelekane Bay by reducing sedimentation inputs from 1450 acres of adjacent watershed on the northwest coast of the island of Hawai'i. The TSEA assesses the potential environmental impacts of this project that pertain to goat eradication activities and their potential environmental impacts only. The additional potential impacts for this type of project are analyzed in the February 6, 2002 Programmatic Environmental Assessment (PEA) for the Community-based Restoration Program (CRP) Implementation Plan and its June 23, 2006 Supplement (SPEA).

NOAA's Administrative Order (NAO) 216-6 (May 20, 1999) contains criteria for determining the significance of the impacts of a proposed action. In addition, the Council on Environmental Quality (CEQ) regulations at 40 C.F.R. §1508.27 state that the significance of an action should be analyzed both in terms of "context" and "intensity." The significance of this action is analyzed based on the NAO 216-6 criteria and CEQ's context and intensity criteria. The criteria listed below are relevant to making a Finding of No Significant Impact, and have been considered individually, as well as in combination with the others, and include:

1) Can the proposed action reasonably be expected to cause substantial damage to the ocean and coastal habitats and/or essential fish habitat as defined under the Magnuson-Stevens Act and identified in FMPs?

<u>Response</u>: The response included in the SPEA's associated FONSI, which analyzed a broad range of restoration activities, states that "No [; the] Implementation of the CRP is designed to enhance or restore ocean and coastal habitats, and/or fish habitats that are essential to federally managed fish as defined under the Magnuson-Stevens Act or identified in FMPs. Implementation of the CRP and project types evaluated in the SPEA will be beneficial to these habitats." Goat removal will similarly be beneficial to these habitats because it will reduce sedimentation and erosion impacts to the environment.

2) Can the proposed action be expected to have a substantial impact on biodiversity and/or ecosystem function within the affected area (e.g., benthic productivity, predator-prey relationships, etc.)?

<u>Response</u>: The response included in the SPEA's associated FONSI, which analyzed a broad range of restoration activities, states that "No [;] The overall effect will be a beneficial impact, not an adverse one. By improving specific coastal or marine habitats that will benefit a range of species inhabiting them, as well as the natural resource services the public receives from the affected ecosystem, implementation of the CRP and

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projects considered in the SPEA will have a substantial beneficial effect on biodiversity and ecological functions in the affected areas. As mentioned in Section 4.7, the sustainability of resources would be enhanced; especially the living coastal and marine resources, and coastal ecosystems and communities within the United States would experience higher diversity and health." As aforementioned, goat removal will benefit native plant species biodiversity and abundance by removing their intense feeding pressure on vegetation in the area. Consequently, the soil retention services that native plant species provide will improve as a result of this activity.

3) Can the proposed action reasonably be expected to have a substantial adverse impact on public health or safety?

<u>Response</u>: The response included in the SPEA's associated FONSI, which analyzed a broad range of restoration activities, states that "No. Implementation of the CRP is designed to enhance habitat and be beneficial to the environment and will have no adverse impact to public health and safety. Projects that would alter floodplains or modify stormwater management structures to prevent erosion or improve water quality, and projects that would remove contaminated sediments to restore habitat would beneficially affect public health and safety." This project specifically aims to restore upland habitat and improve water quality. Additionally, the removal of goats will also remove any bacterial contamination associated with their residence in the lower watershed.

4) Can the proposed action reasonably be expected to adversely affect endangered or threatened species, their critical habitat, marine mammals, or other non-target species?

<u>Response</u>: NMFS has determined that the Pelekane Bay Restoration Project will be likely to have adverse effects on the Hawaiian Hoary Bat (Ōpe'ape'a) *Lasiurus cinereus semotus*, via entrainment on barbed wire strung along goat-proof fences installed as part of this project. Consequently, NMFS completed a formal section 7 consultation with the U.S. Fish and Wildlife Service (FWS), pursuant to the Endangered Species Act.

The FWS issued a Biological Opinion (BO) on February 5, 2010, for potential take of the Hawaiian Hoary Bat (Ōpe'ape'a) *Lasiurus cinereus semotus* via entrainment on the barbed wire strung along goat-proof fences as part of this project. The BO included an Incidental Take Statement (16 bats, over 20 years) with reasonable and prudent measures, terms and conditions, and Conservation Recommendations. Due to poor bat foraging habitat the likelihood of bat take is low, however a formal consultation was deemed necessary to manage for and mitigate the potential fatalities over the next 20 years of the life of the fence line. NOAA and the FWS cooperatively developed the mitigation measures, which include a total of 8,800 audio-visual bat deterrents that will be installed along the fence line to discourage bat flights near the fence lines. These deterrents will be placed along half of the total fence lines implemented for this project to experimentally discern the effectiveness of the deterrents. The audio-visual deterrents were conceptualized with assistance from the U.S. Geological Survey (USGS), from

studies of Hawaiian Hoary Bats on the Big Island. Hopefully it will allow bats to detect the fence line acoustically and/or visually. In addition to the deterrents, the recipient has agreed to coordinate with USGS to further monitor any potential bat populations that might use the area with acoustic detectors. Monthly fence line monitoring for signs of bat use and/or mortality is also an agreed component of the BO. The completed BO is attached as an addendum to this document.

5) Are significant social or economic impacts interrelated with natural or physical environmental effects?

Response: The response included in the SPEA's associated FONSI, which analyzed a broad range of restoration activities, states that "No significant social or economic impacts are expected. CRP-implemented habitat restoration projects, especially those having an education component, may have a substantial beneficial effect to habitats supporting coastal or marine resources, the projects would likely have a directly related economic and/or social benefit as well. Beneficial impacts would result because education of local citizens and youth about environmental issues in the community and beyond, especially habitat restoration and conservation, would promote environmental understanding of living coastal and marine resources, stewardship, and sustainability of the resources. The sustainability of these resources contributes positively to the long-term economic stability of the affected community." This is particularly the case for this project in Pelekane, where their restoration efforts include fostering volunteerism by including community groups in educational activities associated with their restoration efforts. Through monitoring in the long-term, we intend to document the environmental benefits of their restoration actions which can be readily linked to economic improvement in the area by virtue of established economic valuation of monitored resources.

6) Are the effects on the quality of the human environment likely to be highly controversial?

<u>Response</u>: Impacts to the human environment that could be highly controversial will be negligible. Ecologically, there is no benefit from feral goat populations existing in the Hawaiian environment, in terms of positive impacts to either the terrestrial watershed or adjacent coastal and marine habitats. In terms of social controversy, some concerns were raised about the prospect of eradicating pigs in the Kohala Watershed during a public review process under State auspices. In some Hawaiian cultures pigs are considered to be a traditional deity, and are also a supplementary food source for low income residents (both of Hawaiian and non-Hawaiian descent). However, these concerns are not likely to arise with goats since they are not held in esteem as a cultural resource or significant supply of food.

Beyond this particular topic, this criterion was adequately considered in the SPEA, which analyzed a broad range of restoration activities. No additional concerns or potential controversy is identified specific to this proposed action. The response included in the SPEA's associated FONSI states:

"The quality of the human environment is expected to benefit from the

proposed action and implementation of the CRP to date has not been controversial. Completed projects have been beneficial to the quality of both human and natural environments...."

7) Can the proposed action reasonably be expected to result in substantial impacts to unique areas, such as historic or cultural resources, park land, prime farmlands, wetlands, wild and scenic rivers, essential fish habitat, or ecologically critical areas?

<u>Response</u>: No. The State of Hawai'i Historic Preservation Division has been consulted. They have provided concurrence that no cultural or historic sites in the watershed will be aversely affected by these activities. If anything the removal of goats from the area would serve to benefit these sites by alleviating them of the impacts of goat trampling.

8) Are the effects on the human environment likely to be highly uncertain or involve unique or unknown risks?

<u>Response</u>: The response included in the SPEA's associated FONSI, which analyzed a broad range of restoration activities, states that "Unique or unknown risks to the human environment may be possible in areas that have not been evaluated previously, but without a prior determination regarding the project-specific feasibility it is unlikely a specific proposal would be funded if these uncertainties exist. Occasionally, the CRP may provide a limited amount of funding for project-specific feasibility studies, when appropriate. It is unlikely that conducting habitat restoration feasibility studies would pose any substantial risk to the human environment." Furthermore, restoration techniques used for this project (non-native feral ungulate removal) are typical and do not present highly uncertain or unknown risks

9) Is the proposed action related to other actions with individually insignificant, but cumulatively significant impacts?

<u>Response</u>: There are no other known, unrelated projects planned or identified in the project area which would have cumulative adverse impacts. This criterion was adequately considered in the SPEA, which analyzed a broad range of restoration activities. The response included in the SPEA's associated FONSI states:

"The proposed action, when combined with related past, present, or reasonably foreseeable future actions will not cause cumulative significant impacts to the human environment. Any impacts caused by the proposed action would generally be temporary, minor to moderate impacts due to ground disturbance or other construction-related activities from implementing specific projects, which then result in net long-term or permanent, moderate to substantial beneficial impacts on the affected communities, resources, and ecosystems of the United States. Due to the CRP's national scope and infrequency of projects occurring within the same geographic areas, the temporary negative impacts related to implementation would only be moderate, and isolated to project locations. Also, these negative impacts can be avoided, minimized or mitigated by best management practices and other measures, as described in the SPEA. Many other federal, state, and local government agencies and private organizations implement similar beneficial projects across the United States to help restore and maintain natural ecosystems. Consequently, if and when other unrelated projects are planned or identified in a project area with spatially or temporally cumulative adverse impacts, the CRP staff can work with grantees to implement best management practices, and/or require project timing that will avoid cumulative adverse impacts, by using special award conditions as described in the SPEA. The net beneficial impacts resulting from past projects, the proposed actions, and foreseeable future projects would be long-term and beneficial impacts. Overall, the sustainability of resources, especially living coastal and marine resources, would be enhanced."

10) Is the proposed action likely to 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?

<u>Response</u>: Goat removal would, if anything, benefit historical and cultural resources by protecting them from harm due to trampling effects or exposure due to erosion effects caused by feral ungulate grazing.

Moreover, this criterion was adequately considered in the SPEA, which analyzed a broad range of restoration activities. The response included in the SPEA's associated FONSI states:

"The CRP program must comply with the National Historic Preservation Act (NHPA) by coordinating with State Historic Preservation Officers (SHPO). There should be a very low potential to affect historical and cultural resources. If historical or cultural resources are identified at a CRP project site, additional coordination will be undertaken with SHPO to ensure full compliance with the NHPA."

11) Can the proposed action reasonably be expected to result in the introduction or spread of a non-indigenous species?

<u>Response</u>: This criterion was adequately considered in the SPEA, which analyzed a broad range of restoration activities. A main thrust of the Pelekane Bay Restoration Project is to remove invasive, non-native plant and animal species contributing to the bay's sedimentation problems. Consequently, activities associated with this project would only serve to improve (*i.e.*, decrease) the invasive species situation at the project site. The response included in the SPEA's associated FONSI states:

"No. Implementation of the CRP should not cause or promote the introduction or spread of nonindigenous species, and as described in section 2.2 and 4.1 of the SPEA, some project-specific actions may intentionally be conducted to prevent or avoid the introduction or spread of invasive species, and protect habitat for native species."

12) Is the proposed action likely to establish a precedent for future actions with significant effects or represents a decision in principle about a future consideration?

Response: No - a commitment of funds for this undertaking does not obligate NMFS's

involvement in future, similar actions.

13) Can the proposed action reasonably be expected to threaten a violation of Federal, State, or local law or requirements imposed for the protection of the environment?

<u>Response</u>: NOAA specifically engaged in a consultation under Section 7 and conducted a supplemental analysis for potential impacts to the Hawaiian Hoary Bat (*Lasiurus cinereus semotus*) as a result of entrainment on barbed-wire fencing that would be implemented as part of this project. The Biological Opinion (BO) prepared by the US Fish and Wildlife Service is provided. However, with specific respect to goat eradication activities, no Federal, State, or local law or requirements are threatened to be violated.

NOAA and project partners have undertaken extensive preapplication coordination with local, state and federal permitting authorities. There are no expected outstanding issues and all final permit applications have been submitted. Issuance of permits is expected in early June.

14) Can the proposed action reasonably be expected to result in cumulative adverse effects that could have a substantial effect on the target species or non-target species?

<u>Response</u>: This criterion was adequately considered in the SPEA, which analyzed a broad range of restoration activities. The response included in the SPEA's associated FONSI states:

"No. As explained in the above response to criterion 9, the proposed action can reasonably be expected to result in cumulative *beneficial* effects on target species (i.e., federally protected or managed species or fisheries). The net cumulative effect could have a substantial positive impact on the target species. The net additive effects resulting from past projects, the proposed action, and reasonably foreseeable future projects that would affect target species would constitute a long-term beneficial impact to those species."

In addition, the potential for cumulative effects to the Hawaiian Hoary Bat was considered by the USFWS in accordance with the Section 7 consultation requirements of the Endangered Species Act (ESA). Note that the definition of cumulative effects under the ESA is different than with NEPA, and the USFWS based its decision under ESA's guidelines. The USFWS' BO concluded that "the Service is unaware of any other future State, local, or private actions that are reasonably certain to occur within the action area covered in this Biological Opinion and that would not be subject to consultation under section 7 of the Act."

DETERMINATION

In view of the information presented in this document and the analysis contained in the supporting Targeted Supplemental Environmental Assessment prepared for the Pelekane Bay

Watershed Restoration Project, I have determined that this project will not significantly impact the quality of the human environment. Moreover, I have determined that there are no unresolved conflicts concerning alternative uses of available resources at the project site. Finally, all beneficial and adverse impacts of the proposed action have been addressed to reach the conclusion of no significant impacts. Accordingly, preparation of an EIS for this action is not

necessary.

Date

Patricia A. Montanio Director, Office of Habitat Conservation National Marine Fisheries Service National Oceanic and Atmospheric Administration U.S. Department of Commerce