

**Quillayute Jetty Maintenance
Quillayute River Navigation Project
Clallam County, Washington**

**Final Environmental Assessment
June 2001**

Responsible Agency: The responsible agency for the maintenance work is the U.S. Army Corps of Engineers, Seattle District.

Abstract: This document evaluates the impacts of the Quillayute Jetty Maintenance of the Quillayute River Navigation Project. Between July 15, 2001 and September 30, 2001 approximately 30,500 tons of armor rock (4,000 to 20,000 lbs) will be placed on approximately 950 feet of the existing jetty. The jetty is as low as +9 elevation in areas associated with the mouth of the river. This condition has resulted in over topping by wave action and has created a shoal that is hazardous to navigation. Authorized height of the jetty is +15 elevation. The purpose of this project is to bring the jetty back to the authorized height and reduce the shoaling in the mouth of the river.

Since the proposed action is one for which an Environmental Impact Statement (EIS) has been prepared, in accordance with 40 CFR 1502.20 this Environmental Assessment (EA) is tiered from the parent Quillayute River Navigation Project Long-Range Operations and Maintenance FEIS of 1986. As a result, this EA does not repeat evaluations presented in the EIS but rather incorporates discussions from previous NEPA documents by reference and concentrates on new issues specific to this action.

THE OFFICIAL COMMENT PERIOD FOR THE PUBLIC NOTICE CENWS-OD-TS-NS-11, OCCURRED BETWEEN OCTOBER 13, 2000 AND NOVEMBER 15, 2000.

This document is also available online at:
<http://www.nws.usace.army.mil/ers/envirdocs.html>

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**FINAL ENVIRONMENTAL ASSESSMENT
FISCAL YEAR 2001 QUILLAYUTE RIVER JETTY MAINTENANCE PROJECT
LA PUSH, CLALLAM COUNTY, WASHINGTON**

1.0 Authority

The Quillayute River Navigation Project was authorized by the River and Harbor Act of July 3, 1930 and modified by the River and Harbor Acts of March 2, 1945 and September 3, 1954. The project calls for:

- a. An entrance channel 10 feet deep, varying from 100 to 250 feet wide and a 75 foot wide channel extending about three-quarters of a mile upstream to Smith Slough;
- b. A boat basin with a timber-planked training wall with a +16 feet mean lower low water (MLLW) top elevation including a rock toe; and
- c. A jetty about 1,200 feet long at a +15 foot MLLW elevation on the east bank and a low dike 1,050 feet long on the west bank protecting the entrance channel.

There is also Federal responsibility to maintain the jetty at the mouth of the Quillayute River. Maintenance of the upstream 1,700 feet of channel is not performed, as it no longer is justified. The project is a harbor of refuge and has the only Coast Guard search and rescue station along 100 miles of coast between Grays Harbor and Neah Bay. The Reservation offers a livelihood for approximately 300 Quileute Tribal members and 50 non-Tribal members, including Coast Guard personnel. The primary commercial activity is fishing and fish processing that generates approximately \$5,000,000 in annual income.

2.0 Project Description

As stated earlier the authorized project provides for a jetty on the easterly side of the mouth of the Quillayute River to stabilize the entrance channel and to allow dredging within the mouth and entrance channel of the Quillayute River. According to records the last major maintenance accomplished on the jetty and dike was in 1962. There was some minor maintenance accomplished on the jetty in 1979.

The proposed project on the jetty consists of placing approximately 30,500 tons of armor rock (4,000 to 20,000 lbs.) over approximately 950 feet of the jetty as shown on sheet 1. Where possible displaced rock will be rehandled and placed on the structure to restore the cross section in accordance with the authorized project purpose. The jetty will be brought back to the +15 elevation for the authorized length. Currently areas on the jetty are as low as +9 elevation. The plan is to begin construction July 1st, 2001 and is expected to be completed by September 30, 2001.

At the southern most end of the jetty there will be some in-water work while ensuring the project remains within the original authorized footprint. This work will also require small rocks and/or aggregate materials to be placed on top of the jetty to allow access to the most southern end. The material will be similar to the material that has been used annually on the revetment sandspit for vehicle access to allow dredging of the settling basin. The material will settle within the larger rocks and some may eventually work its way onto river and ocean floor. All work will be monitored for sediment plumes and work will stop if a sediment plume is entering the river channel. When in water work is required in the initial phase of this portion of the project it will be accomplish on the outgoing tide weather permitting. The top of the jetty will be restored to a non-driving condition at the end of construction.

Best management practices will be strictly enforced. Fueling of equipment will be 100 feet or further from the shoreline and measures to prevent fuel or oil spillage will be in place. All equipment will be required to be in top working condition before allowed onto the jetty during construction. The construction will consist of dump trucks placing rock on the jetty and placement will be by a large shovel (rock picker). This same shovel (rock picker) will capture as many rocks as possible that have been displaced out of the foot print and return to same.

a. ***Project History.***

The construction of the jetty was authorized on July 3, 1930 and construction was completed in February 1960. Previous maintenance was accomplished in 1973. Twenty-eight years has elapsed since the last maintenance was performed.

b. ***Proposed Action.***

According to the Public Notice, jetty maintenance would occur at the present location of the existing jetty and within the original footprint of the jetty. The proposed work consists of placing approximately 40,000 tons of armor rock (4,000 lb. To 20,000 lb.) over approximately 950 feet of the jetty. Where possible displaced rock will be rehandled and placed on the structure to restore cross section in accordance with authorized project purpose. The jetty will be restored to the elevation of +15 and will not alter the authorized footprint. The plan is to begin construction July 1, 2001 and be completed by September 2001.

c. ***Pertinent Documents.***

Spit and jetty maintenance options in the project area were evaluated in a final Environmental Impact Statement dated February 1986 (FEIS). Two Quillayute River Navigation Project environmental reports were prepared in August 1981, one on water quality, salmonids, surf smelt, crab, and subtidal habitat, and one on benthic intertidal ecology, birds and mammals. Several EA's have been prepared since 1986 for maintenance dredging of the Quillayute Project, maintenance of the spit revetment, and repair of the spit breach. These documents are available at the Seattle District Office and are incorporated herein by reference.

3.0 Alternatives

a. ***No Action.***

The no action alternative would involve no jetty maintenance by the Corps for the project in this maintenance cycle. Currently there are sections of the jetty that have eroded to a low of +9. This not only allows strong wave action to enter the mouth of the Quillayute River it also creates a hazard for Native American and commercial fishing boats, plus the U.S. Coast Guard rescue boat. Thus making life saving function of the Coast Guard extremely hard to carry out their missions

b. ***Perform Jetty Maintenance.***

The proposed project on the jetty consists of placing approximately 30,500 tons of armor rock (4,000 to 20,000 lbs.) over approximately 950 feet of the jetty as shown on sheet 1. Where possible displaced rock will be rehandled and placed on the structure to restore the cross section in accordance with the authorized project purpose. The jetty will be brought back to the +15 elevation for the authorized length. Currently areas on the jetty are as low as +9 elevation. The plan is to begin construction July 1st, 2001 and is expected to be completed by September 30, 2001.

At the southern most end of the jetty there will be some in-water work while ensuring the project remains within the original authorized footprint. This work will also require small rocks and/or aggregate materials to be placed on top of the jetty to allow access to the most southern end. The material will be similar to the material that has been used annually on the revetment sandspit for vehicle access to allow dredging of the settling basin. The material will settle within the larger rocks and some may eventually work its way onto river and ocean floor. All work will be monitored for sediment plumes and work will stop if a sediment plume is entering the river channel. When in water work is required in the initial phase of this portion of the project it will be accomplish on the outgoing tide weather permitting. The top of the jetty will be restored to a non-driving condition at the end of construction.

Best management practices will be strictly enforced. Fueling of equipment will be 100 feet or further from the shoreline and measures to prevent fuel or oil spillage will be in place. All equipment will be required to be in top working condition before allowed onto the jetty during construction. The construction will consist of dump trucks placing rock on the jetty and placement will be by a large shovel (rock picker). This same shovel (rock picker) will capture as many rocks as possible that have been displaced out of the foot print and return to same.

4.0 Description of the Existing Environment

a. Hydrology and Geology.

The Quillayute River system, including the Sol Duc, Sitkum, Calawah, Bogachiel, and Dickey Rivers, flows generally westward, draining the northern portion of the Olympic Peninsula. The Quillayute spit is essentially a river mouth bar formed of material derived from both the Quillayute River Basin and from erosion of the headlands to the north and south along the coast. The river transports a moderate bedload of gravel and cobbles during flood stages and a moderate bedload of sand and fine gravel during low stages. The mouth of the Quillayute River is located approximately 30 miles south of Cape Flattery Washington.

b. Water Quality.

The Washington State Department of Ecology (1991) classified the fresh/estuarine water of the Quillayute River as class AA (extraordinary). Aside from logging, the upper Quillayute Basin is relatively unaffected by human activities which might affect water quality. Within the marina, boat use and maintenance is the main source of pollutants.

c. Vegetation.

There is no known vegetation located at the project location. The area contains dredge sediment and the original jetty.

d. Fisheries.

The Quillayute River supports several species of salmon and trout. Chinook salmon is the most important species to the Quileute Tribe. Trout species occasionally present are steelhead and cutthroat trout. The estuary also supports surf smelt and small numbers of many other fish species. Surf smelt live in deep waters and move in to the project area to spawn during May to mid-November (peak time is July-August). Smelt spawn on the high intertidal area of the beach (drift line). According to WDFW, ideal smelt beaches have a grain size of 80 percent 1-8 mm, with a beach slope of 10-15 percent. The salmon species are the chinook (*Oncorhynchus tshawytscha*), coho (*O. kisutch*), chum (*O. keta*), pink (*O. gorbuscha*), and sockeye (*O. nerka*).

e. Wildlife.

The jetty is a poor habitat for mammals, although it does provide protection for other, more valuable habitat types, such as wetland areas. The jetty could provide resting areas for various species of sea birds, including the tufted puffin, the black oystercatcher, common murre, and Brandt's cormorant. The jetty in particular is used during migration by rocky shoreline birds such as turnstones and surfbirds.

f. Threatened and Endangered Species.

The bald eagle, marbled murrelet, and brown pelican are listed as threatened in Washington pursuant to the Endangered Species Act and can be found in coastal areas. These species were addressed in the BA dated February 7, 2001. The scope of work on this project has not changed since the BA was written, therefore, no change in the not likely to adversely affect those species has occurred.

No anadromous fish runs in the Quillayute River area are listed as threatened or endangered under the ESA. The Southwest Washington/Lower Columbia River ESU of the coho salmon and cutthroat trout are candidates for listing. This includes runs of this species in the Quillayute River. The Washington *9Coast ESUs for Chinook salmon and steelhead have been evaluated, and listing is considered not warranted at present.

g. Cultural Resources.

There are no known cultural resources in the project area, but cultural resources are found on National Park Service lands near or adjoining the project staging area. Cultural resources are located around the east border of the Rialto Beach parking lot, on the east side of the Dickey River bridge, and on the north end of the spit. A gravel washing operation existed on the spit for the 1940's concrete plant at Mora. The Shamrock Resort was at the base of the east bank of the Rialto Beach parking lot, while Alexander's Mansion was on the riverbank. The Taylor home and store at the Dickey River dates from the turn of the century.

h. Land Use.

The land belongs to the Native American Quileute Tribe where the jetty is located.

i. Air Quality and Noise.

Air quality meets the standards as set forth by the Washington Department of Ecology and will not be permanently affected by the construction of the project. Noise will be intermittent at the site and will vary depending on the frequency of trucks arriving with the rocks. All noise factors have been addressed for their effect on threatened and endangered species.

j. Transportation.

Roads are very narrow leading in the community of La Push. Some of the roads in the community proper are in varying states of disrepair, especially near the area of the proposed construction. The predominate vehicle used in this vicinity are passengers type vehicles. No heavy trucks are known to use this area on a regular basis.

k. Socio-Economic.

The social and economic conditions on the Quileute Reservation are, in part, due to its remoteness. Development in the area has been inhibited due to high transportation costs. The primary justification for navigation improvements has been for supporting commercial and sports fishing operations; approximately 90 percent of the tribe's income is derived from fishing related activities. The substantial income of the area realized from the tourist industry directly and indirectly benefits the Quileute Tribe, which owns most of the tourist facilities.

5.0 Environmental Consequences.

a. Hydrology and Geology.

The repair of the existing jetty will not affect the geology. Hydrology may be affected in that scouring of the river mouth may occur again as when the jetty was originally built and therefore, reduce or eliminate the requirement to dredge the river mouth.

b. Water Quality.

Water quality impacts of the proposed action are expected to be short term and minor. Turbidity would be minimal because the work will be accomplished at low tide and out of the water. What turbidity that would exist would come from the work being washed over by the incoming tide and flushed out during the out going tide. Dissolved oxygen will not be an issue because the work will predominately be accomplished out of the water.

c. Vegetation.

No permanent vegetation will be disturbed during the jetty maintenance construction.

d. Fisheries.

The proposed dredging work is expected to have minimal impacts on salmon fisheries because in-water work would avoid peak downstream migratory periods (15 March-15 June).

The project is also being conducted at low tide so that no major in water work will occur. The in water work that will occur is the replacement of displaced rocks back into the original footprint.

e. Wildlife.

No wildlife will be harmed or placed in distress during the jetty maintenance construction.

f. Threatened and Endangered Species.

The closest bald eagle nest is about 2 miles from the project area so impacts from the project are not a concern to nesting behavior. These birds are diverse feeders and the Quillayute River is not considered a primary foraging area for the nesting birds, so the project is not likely to adversely affect bald eagles.

Marbled Murrelets do not nest in the project area but they do feed in the area.

The birds have not been observed foraging in the river so the project should not affect murrelet foraging behavior.

During most years, brown pelicans are not observed in the La Push area.

However, last year after the project had stopped due to bad weather, several brown pelicans were seen sitting on the wall at the marina. The project is expected to have no effect on brown pelicans. Further detailed analyses of the species are contained in the referenced biological assessment.

h. Cultural Resources.

The proposed work as described will have no impacts to cultural resources.

i. Land Use.

No exchange of property will occur for this project.

j. Air Quality and Noise.

Minor disturbance from noise will occur during the transportation of rocks through town to the jetty. Other noise will be associated with the placement of rock by the shovel that will be located on the jetty. No air quality issues will be involved. Noise will be short lived and will not have a significant impact to the environment.

k. Transportation.

There may be a potential for interrupted vehicle travel during the delivery of rocks via dump trucks due to the small width of the roads within La Push.

This interruption will be minor and short lived, causing no significant impacts to the environment.

l. Socio-Economic.

There will be no interruption to the social or economic assets of the Quileute Tribe.

m. Indian Treaty Rights.

This proposed project has been coordinated with and is supported by the Quileute Indian Tribe. The Tribe agrees the proposed project likely would not interfere with their treaty fishing rights.

n. Permit Requirements.

The proposed project complies with Section 404(b)(1) guidelines of the Clean Water Act. The attached Section 404(b)(1) evaluation addresses the

placement of dredged material on the spit. A copy of the Water Quality Certification, provided by EPA in consultation with Ecology, is attached to the Section 404(b)(1) analysis. The certification is contingent upon conditions outlined in the evaluation. The project is located within Trust lands of the Quileute Tribe and is consistent to the maximum extent practicable with enforceable policies of the Quileute Tribe's approved shoreline management program.

o. Cumulative Impacts.

There are no significant cumulative impacts that can be identified from implementation of this project. Cumulative impacts from local, short-term disturbances caused by the construction project (noise, emissions, traffic disruptions, etc.), would be minor and not significant.

p. Coordination.

A biological assessment was sent to the U.S. Fish and Wildlife Service and the National Marine Fisheries Service with a finding of not likely to adversely affect species under their jurisdiction. Concurrence letters were received on June 3, 2001 and June 7, 2001.

6.0 Irreversible and Irrecoverable commitments of resources

No federal resources will be irreversibly and irretrievably committed to the projects until the EA is finalized and the FONSI has been signed.

7.0 Cumulative Impacts

Any cumulative impacts of these maintenance projects would be highly localized, and would not significantly affect the quality of the natural or built environments. In both cases, the inconvenience of minor short-term disruptions is outweighed by long-term benefits.

8.0 Coordination

The following agencies and entities have been involved with the environmental coordination of the proposed project:

- Quileute Tribal Council
- U.S. Fish and Wildlife Service (USFWS)
- Washington Department of Fish and Wildlife (WDFW)
- Washington Department of Ecology

- Environmental Protection Agency (EPA)

On May 30th 2001, an environmental coordination meeting was held in La Push, Washington. Attendees included representatives of the Quileute Tribal Council, EPA, WDFW, and Ecology. Site visits were made to the areas of concern during previous coordination meetings. Numerous phone consultations occurred for this project during the last 3 months. The result was the issuance of a Water Quality Certification by the EPA.

9.0 Environmental Compliance

9.1 National Environmental Policy Act

This Environmental Assessment, prepared June 2001, is a compilation of environmental information on the project related to the Quillayute River Navigation Channel. The BA was coordinated with state, federal, and local agencies and is attached as reference (Appendix B).

9.2 Endangered Species Act Section 7 Consultation

In accordance with Section 7(a)(2) of the Endangered Species Act of 1973, as amended, federally funded, constructed, permitted, or licensed projects must take into consideration impacts to federally listed or proposed threatened or endangered species. A Biological Assessment was submitted to USFWS on January 17, 2001 and is attached as Appendix B. A letter of concurrence dated June 3, 2001 has been received from the USFWS, June 11, 2001 from the NMFS and therefore, concludes the requirements under Section 7(a)(2) of the Endangered Species Act of 1973.

9.3 Clean Water Act Compliance

A 404(b)(1) evaluation, which demonstrates compliance with the substantive requirements of the CWA, is required for work involving discharge of fill material into the waters of the United States. Since no in-water work will occur but riprap will be in the water at summer stage level a 404(b)(1) evaluation was prepared and is attached as appendix A.

9.4 Hydraulic Permit Approval

No HPA was required, as this project is located on tribal lands.

9.5 Fish and Wildlife Coordination Act

The Fish and Wildlife Coordination Act (16 USC 470) requires that wildlife conservation receive equal consideration and be coordinated with other features of water resource development projects. This goal is accomplished through Corps funding of U.S. Fish and Wildlife Service habitat surveys evaluating the likely impacts of proposed actions, which provide the basis for recommendations for avoiding or minimizing such impacts. A Fish and Wildlife Coordination Act Report is not required for maintenance work.

9.6 National Historic Preservation Act

The National Historic Preservation Act (16 USC 470) requires that the effects of proposed actions on sites, buildings, structures, or objects included or eligible for the National Register of Historic Places must be identified and evaluated. A review was conducted by staff Archaeologist and by Quileute Natural Resources Department for the construction project listed in this EA. There were no National Historic nor Native American sites, buildings, structures, or objects that met the preservation Act criteria.

In accordance with the current Section 106 regulations, we have determined that the listed maintenance work comprises "undertakings" in accordance the Washington State Historic Preservation Office and is the appropriate authority for coordination. We have determined that while some of the undertakings have no potential to affect historic properties, other undertakings might affect such properties. We have found that in no case will historic properties be affected.

9.7 Executive Order 12898, Environmental Justice

Executive Order 12898 directs every federal agency to identify and address disproportionately high and adverse human health or environmental effects of agency programs and activities on minority and low-income populations.

The potentially affected community does include a minority and/or low-income population. A query of the Washington Census for 1998 indicated that La Push contained a population of 98% Native American Indians, and more than 16% of Clallam County's population had income below the poverty level.

The project does not involve the siting of a facility that will discharge pollutants or contaminants, so no human health effects would occur. Maintenance of these facilities would not negatively affect property values in the area, or socially stigmatize local

residents or businesses in any way. No interference with local Native American Nation's treaty rights would result from the proposed project; construction activities would not physically interfere with fishing, or impact fishery resources.

Since no high and adverse effects are anticipated to result from the project, the Corps has determined that no disproportional impacts would occur.

10.0 Finding.

Based on this assessment and on coordination with Federal and State agencies and the Quileute Indian Tribe, it is considered that the proposed project would not result in significant adverse environmental impacts. The proposed project is not considered a major Federal action having a significant impact on the human environment and does not require preparation of an environmental impact statement supplement. A finding of so significant impact (FONSI) has been prepared

11.0 LIST OF APPENDICES

Appendix A

Substantive Compliance for Clean Water Act Section 404 and Rivers and Harbor Act

Appendix B

Biological Assessment

Appendix C

Public Notice CENWS-OD-TS-NS-11(October 13, 2000)

Appendix D

Agency and Public Comments with Corps Response

Appendix E

Regulatory Approvals