COASTAL CONSERVANCY

Staff Recommendation
March 14, 2019

Red Bank Habitat Enhancement Project:
Preparation of Designs, Environmental Review and Permit Applications

Project No. 18-055-01
Project Manager: Peter Jarausch

RECOMMENDED ACTION: Authorization to disburse up to $200,000 to the Salmon River Restoration Council to prepare designs, environmental review pursuant to NEPA/CEQA, and permit applications for the restoration of Red Bank, a section of the North Fork of the Salmon River in Siskiyou County.

LOCATION: North Fork Salmon River, Siskiyou County

PROGRAM CATEGORY: Resource Enhancement

EXHIBITS

Exhibit 1: Project Location

Exhibit 2: Project Maps and Graphics

Exhibit 3: Project Letters

RESOLUTION AND FINDINGS:

Staff recommends that the State Coastal Conservancy adopt the following resolution pursuant to Sections 31251- 31270 of the Public Resources Code:

"The State Coastal Conservancy hereby authorizes the disbursement of an amount not to exceed two hundred thousand dollars ($200,000) to the Salmon River Restoration Council ("the grantee") to prepare designs, environmental review pursuant to the National Environmental Protection Act (NEPA) and the California Environmental Quality Act (CEQA), and permit applications for the restoration of Red Bank, a section of the North Fork of the Salmon River in Siskiyou County."

Prior to commencement of the project, the grantee shall submit for the review and written approval of the Executive Officer of the Conservancy (Executive Officer) the following:

1. A detailed work program, schedule, and budget.
2. Names and qualifications of any contractors to be employed in carrying out the project.

3. A plan for acknowledgement of Conservancy funding and Proposition 1 as the source of that funding.

"Based on the accompanying staff report and attached exhibits, the State Coastal Conservancy hereby finds that:

1. The proposed authorization is consistent with Chapter 6 of Division 21 of the Public Resources Code, regarding the restoration of fish and wildlife habitat within coastal watersheds.
2. The proposed project is consistent with the current Conservancy Project Selection Criteria and Guidelines.
3. The Salmon River Restoration Council is a nonprofit organization organized under section 501(c)(3) of the U.S. Internal Revenue Code and has purposes consistent with Division 21 of the Public Resources Code."

PROJECT SUMMARY:

Staff recommends the Conservancy authorize the disbursement of up to $200,000 to the Salmon River Restoration Council (SRRC) to prepare designs, conduct environmental review pursuant to NEPA and CEQA, and prepare permit applications for the restoration of Red Bank (the proposed project), which is a section of the North Fork of the Salmon River (Exhibit 1). Engineering design work for the restoration project has been largely completed, and this grant will enable SRRC to prepare designs for restoring the riparian vegetation. The Salmon River sub-basin has some of the highest conservation value within the Klamath River basin and is likely to be a long-term refuge for salmonids in California. It hosts all the native anadromous fish runs present in the Klamath River.

Despite the Salmon River sub-basin's overall health, the Final Southern Oregon/Northern California Coast (SONCC) Coho Salmon Recovery Plan states that summertime temperatures and lack of winter rearing habitat are the primary stressors for juvenile coho in the Salmon River (NOAA 2014). Mining affected the landscape starting in the 1850s, and mined-over floodplains and terraces remain today. These poorly vegetated areas continue to adversely affect salmonid habitat. In addition, historic timber harvest as well as the 1964 flood have resulted in the precipitous decline in coho salmon along with other anadromous fish populations in the watershed.

Red Bank offers low gradient habitat that is known to host rearing juvenile coho and Chinook salmon. However, the river bar has been altered by historic mining and no longer provides much-needed off-channel habitat for coho and other salmonids. Both the SONCC Recovery Plan as well as an analysis done by the SRRC in 2008 identified Red Bank as a high priority area for the restoration of riparian conditions and salmonid habitat.

The goals of the restoration project are to:

- Enhance and increase the area of perennial groundwater-fed pools

- Increase in-channel bed complexity using large wood features to maintain pool habitat that supports thermal refugia and provides high-flow velocity refugia.
- Create self-sustaining alcoves for high-flow off-channel refugia.
- Enhance riparian vegetation and shading across the site to reduce water and air temperature and increase biodiversity and habitat complexity.

Restoring hydraulic conditions and riparian forest to the project's off-channel habitat will also benefit at-risk riparian and aquatic species including neotropical migratory birds, amphibians (Cascades Frog, Foothill yellow-legged frog), summer and winter run steelhead, fall-run Chinook salmon, resident rainbow trout, and Pacific Lamprey.

The proposed project consists of preparing vegetation designs, conducting environmental analysis of the restoration project for compliance with NEPA and CEQA, and preparing permit applications needed for the project. SRRC will work in partnership with the Klamath National Forest to carry out the proposed project. The deliverables for the proposed project include: revegetation plans, final combined NEPA/CEQA documents, completed permit applications, and pre-implementation surveys. The Klamath National Forest will be the lead agency for NEPA and the North Coast Regional Water Quality Control Board will be the lead agency for CEQA. SRRC completed 90% designs for the restoration project in 2017 with funding from the California Department of Fish and Wildlife's Fisheries Restoration Grant Program. (Exhibit 2)

Site Description:

The Salmon River is a tributary to the Klamath River in northern California. It runs northeast towards the Trinity Alps and Marble Mountain Wilderness area from its confluence with the Klamath River in Somes Bar (Exhibit 2). Native anadromous fish runs include spring and fall-run Chinook, coho Salmon, summer and winter steelhead, Pacific lamprey, and green sturgeon. The Salmon River will likely significantly contribute to the recovery and resiliency of the Southern Oregon Northern California (SONCC) coho salmon ESU and spring run Chinook because of its unique location. It is almost entirely within the Klamath National Forest and therefore largely protected from development. The watershed does not contain significant consumptive water uses, and it is the highest in elevation of all of the Klamath subbasins, which will allow snowmelt to persist during climate change. Finally, the Salmon River is removed from the Klamath Basin hatcheries and therefore has less risk of being genetically compromised.

Despite the positive attributes of the Salmon River Watershed, it is still in need of restoration. Starting in the 1850s large-scale hydraulic mining and timber harvest severely altered river channels and riparian areas. From 1970-1950 it is estimated that over 20 million cubic yards of sediment were discharged into the Salmon as a result of gold mining. Mining impacted the landscape, vegetation, soil, water quality, and channel structure in many fish-bearing streams. Remnant mine tailings and riparian disturbance continue to adversely affect salmonid habitat.

The Red Bank project area is located along the North Fork of the Salmon River, about 7.5 miles upstream of its confluence with the Salmon River near Forks of Salmon, California. The entire project area is located on U.S. Forest Service (USFS) managed lands within the Klamath National Forest on the Salmon River Ranger District.

The Red Bank site is composed of about 20 acres of a large alluvial floodplain with expansive, sparsely vegetated areas, on a wide overbank bar complex, with several side channels lacking complex fish habitat, and smaller areas of limited riparian vegetation providing little habitat for riparian associated species. The Primary Side Channel and multiple high-flow side channels are frequently inundated. The lower end of the Primary side channel contains several groundwater-fed perennial pools where salmonids have been observed rearing during the dry season. Coho salmon have been observed both upstream and downstream of the project area. The restoration project is anticipated to entail active restoration work on approximately 5 acres spread through-out the 20-acre Red Bank site.

Grantee Qualifications: The SRRC has focused on restoration and watershed education since 1992. Based in Sawyers Bar they actively work with the community and agency partners to steward the Salmon River. SRRC has successfully implemented several in stream restoration and large barrier removal projects. In addition, SRRC constructed a similar off-channel habitat project during the fall of 2018.

Project History: This project started with a riparian assessment conducted in 2008. The Red Bank site was identified as a high priority for restoration of riparian conditions and salmonid habitat (Pacific Watershed Associates 2012). In 2015 funding was received through CDFW's FRGP to complete a project design for riparian and fisheries habitat enhancement on this site. Michael Love and Associates developed the designs for the project along with a team of engineering and fisheries specialists from CDFW, Karuk Tribe, Mid Klamath Watershed Council, NMFS/NOAA, and the USFS. The proposed project was submitted to the Conservancy through the Conservancy's 2018 Proposition 1 Request for Proposals. The proposed project was reviewed favorably and recommended for funding.

PROJECT FINANCING

Coastal Conservancy	**$200,000**
Project Total	**$200,000**

The expected source of Conservancy funds for this project is an appropriation to the Conservancy from the Water Quality, Supply, and Infrastructure Improvement Act of 2014 (Proposition 1, Water Code § 79700 et seq.). Funds appropriated to the Conservancy derive from Chapter 6 of Proposition 1and may be used "for multi-benefit water quality, water supply, and watershed protection and restoration projects for the watersheds of the state" (Water Code Section 79731). Section 79732 identifies specific purposes of Chapter 6 which include: protect and restore aquatic, wetland and migratory bird ecosystems, including fish and wildlife corridors; protect and restore coastal watersheds, including, but not limited to bays, marine estuaries, and nearshore ecosystems; and assist in the recovery of endangered, threatened or migratory species by improving watershed health, instream flows, fish passage and coastal or inland wetland restoration. The proposed project will help achieve these purposes of Proposition 1 by completing the designs and environmental analyses necessary to enable restoration of aquatic habitat that will provide new rearing habitat for salmonids and improve watershed health to benefit endangered fish.

As required by Proposition 1, the proposed project will help plan a restoration project that will provide multiple benefits. By restoring off-channel habitat, the restoration project will restore juvenile salmonid rearing habitat, improve water quality by forming new channels, and reduce temperatures to levels suitable for aquatic life.

As discussed in the Project History section, the proposed project was selected through a competitive grant process under the Conservancy's Proposition 1 Grant Program Guidelines adopted in June 2015 ("Prop 1 Guidelines"). (See § 79706(a)). The proposed project meets each of the evaluation criteria in the Prop 1 Guidelines as described in further detail in this "Project Financing" section, the "Project Summary" section and the "Consistency with Conservancy's Project Selection Criteria & Guidelines" section of this report.

The NCRWQCB and USFS will provide an in-kind match of $60,000 for the CEQA/NEPA portion of the project. The USFS will provide an in-kind match of $5,000 for Section 7 consultation.

CONSISTENCY WITH CONSERVANCY'S ENABLING LEGISLATION:

The proposed authorization is undertaken pursuant to Chapter 6 of Division 21 of the Public Resources Code, as follows:

Pursuant to section 31251, the Conservancy may award grants to local public agencies and nonprofit organizations for enhancement of coastal resources which, because of human-induced events, or incompatible land uses, have suffered the loss of natural and scenic values. Consistent with this section, the proposed authorization provides funds to the SRRC for planning and environmental review necessary to enable the enhancement of coastal fishery resources disturbed by incompatible land uses, such as intensive mining, timber harvest and other legacy land uses that have disrupted the channel and floodplain processes in the Klamath River watershed.

Pursuant to section 31251.2(a), to enhance coastal resources within the coastal zone, the Conservancy may award a grant for a project that enhances a watershed resource that is partly outside of the coastal zone. The Red Bank site is located outside the coastal zone. However, Red Bank provides habitat for salmon populations known to travel many miles upstream of the coastal zone boundary to fulfill their life history patterns. Indeed, salmon depend on unimpeded access to high-quality habitat both within and outside of the coastal zone to survive. Thus, salmon are watershed resources located both within and outside the coastal zone, and the restoration of Red Bank will enhance this watershed resource, thereby enhancing a coastal resource. To maintain and restore salmon to historic levels, projects to improve salmon habitat must be undertaken both within and outside the coastal zone. The proposed project is consistent with the Humboldt County and Del Norte County local coastal programs, as discussed in the "Consistency with Local Coastal Program Policies" section below.

Under section 31253, "[t]he Conservancy may provide up to the total of the cost of any coastal resource enhancement project . . .". Consistent with this section, staff has recommended the funding amount in light of the fiscal resources of the applicant, the urgency of the matter, and the application of other factors relevant to project eligibility, as detailed in the "Consistency with Conservancy's Project Selection Criteria & Guidelines" section, below.

CONSISTENCY WITH CONSERVANCY'S 2018-2022 STRATEGIC PLAN GOAL(S) & OBJECTIVE(S):

Consistent with **Goal 6, Objective C** of the Conservancy's 2018-2022 Strategic Plan, the proposed project will develop a plan to enhance a coastal watershed.

CONSISTENCY WITH CONSERVANCY'S PROJECT SELECTION CRITERIA & GUIDELINES:

The proposed project is consistent with the Conservancy's Project Selection Criteria and Guidelines, last updated on October 2, 2014, in the following respects:

Required Criteria

1. **Promotion of the Conservancy's statutory programs and purposes:** See the "Consistency with Conservancy's Enabling Legislation" section above.
2. **Consistency with purposes of the funding source:** See the "Project Financing" section above.
3. **Promotion and implementation of state plans and policies:**

   2014 Final Recovery Plan for the Southern Oregon/Northern California Coast Evolutionarily Significant Unit of Coho Salmon (Oncorhynchus kisutch) (U. S. National Marine Fisheries Service). The Salmon River population is considered at high risk of extinction. This project directly addresses one of the main stressors, riparian forest conditions, as well as the lack of quality summer and winter rearing habitat.

   California Water Action Plan, a collaborative effort of the California Natural Resources Agency, the California Environmental Protection Agency, and the California Department of Food and Agriculture, issued in 2014. This Plan was developed to meet three broad objectives: more reliable water supplies, the restoration of species and habitat, and a more resilient, sustainably managed water resources system. It lays out the state's challenges, goals and actions needed to put California's water resources on a safer, more sustainable path. The plan identifies ten overarching strategies to protect our resources, including one which this project will implement: 4) Protect and restore important ecosystems (Continue Restoration Efforts in the Klamath Basin including improving water quality, and restoring anadromous fish runs). Restoring this section of the North Fork of the Salmon River will improve juvenile rearing habitat.

   Klamath Project Biological Opinion. (NMFS & USFWS 2013) Salmon may be adversely affected by the operation of the dams. Implementation of this project meets the goal in Appendix C Restoration Type 5, Creation of Off-Channel Ponds/Side Channel Habitat, as it will reconnect side-channels and improve off-channel alcoves and ponds; creating much-needed habitat complexity and refugia for a coho population at high risk of extinction.
4. **Support of the public:** see "Project Letters" (Exhibit 3).

5. **Location:** The project site is outside the coastal zone but will benefit numerous coastal resources by providing coastal salmon populations with sufficient access throughout a watershed to fulfill their life history patterns.
6. **Need:** Without this grant funding, the SRRC will not be able to proceed with the project.
7. **Greater-than-local interest:** The project helps fulfill the objectives of state and federal species recovery plans, and is therefore of greater-than-local interest.
8. **Sea level rise vulnerability:** Located well outside the coastal zone, the project site is not vulnerable to sea level rise.

Additional Criteria

9. **Urgency:** Coho Salmon are at risk of extinction in the Salmon River. Restoration efforts are needed to quickly provide improved conditions.
10. **Readiness**: The grantee is ready to carry out this project. All partners and consultants are prepared to start work.
11. **Cooperation**: SRRC is working in partnership with the NCRWQCB, USFS, and the Karuk Tribe.
12. **Vulnerability from climate change impacts other than sea level rise:** Working in the Salmon River Watershed has the potential to provide salmonids a supply of cold water as the climate warms. The watershed is the highest in the Klamath Basin and is supported through snowmelt that is more likely to remain because of colder temperatures at altitude.

CONSISTENCY WITH LOCAL COASTAL PROGRAM POLICIES:

The proposed project is located in the Klamath-Trinity watershed, outside the coastal zone. Nonetheless, it addresses a coastal zone resource and comports to the goals and objectives outlined under the LCPs for Del Norte and Humboldt County, in which the watershed is located. The project is consistent with the applicable LCPs as follows:

Del Norte County

The authorization is consistent with the relevant portions of the Del Norte County Local Coastal Program (DNLCP), which was certified by the Coastal Commission on October 12, 1983. It is due to the diversity in life history patterns of anadromous fish species that the Del Norte LCP acknowledges the importance of coastal streams and riparian vegetation systems as Sensitive Coastal Habitat, necessary to both the aquatic life and the quality of water courses. Under the DNLCP, Chapter VI, the following goals and objectives are identified:

> *The County shall maintain all existing species of fish, wildlife, and vegetation for their economic, intrinsic and ecological values as well as providing adequate protection of rare and endangered species."*(p. 55)

> *The County should establish riparian corridors along local streams, creeks, and sloughs to maintain their aesthetic appeal, wildlife habitat, control of erosion..* (p. 56)
>
> *The County encourages programs (e.g., fish hatcheries, habitat rehabilitation) designed to improve the quality of coastal fisheries and other marine resources.* (p. 57)
>
> *All surface and subsurface waters shall be maintained at the highest level of quality to insure the safety of public health and the biological productivity of coastal waters.* (p. 58)

The proposed project, when implemented, will improve anadromous fish habitat by improving juvenile rearing habitat thereby enhancing the aquatic resources of the county, and, thus, is consistent with the DNLCP.

Humboldt County

The authorization is consistent with relevant portions of the Humboldt Bay Local Coastal Program (HBLCP), which was certified by the Coastal Commission on October 14, 1982, and which states:

> *The biological productivity and the quality of coastal waters, (and) streams. . . appropriate to maintain optimum populations of marine organisms . . . shall be maintained, and, where feasible, restored…*(HBLCP, 3-55)
>
> *New development within stream channels shall be permitted when there is no less environmentally damaging feasible alternative, where the best feasible mitigation measures have been provided to minimize environmental effects and shall be limited to . . . wetlands, fishery, and wildlife enhancement and restoration projects...* (HBLCP, 3-56)

The proposed authorization will prepare designs, permit applications and CEQA/NEPA analysis for a project that, when constructed, will restore biological productivity of a river that flows to coast and, thus, is consistent with the HBLCP.

CEQA COMPLIANCE:

The proposed project involves only data gathering, resource evaluation, planning, and feasibility analyses for possible future actions that have not yet been approved or funded. Thus, the proposed project is both statutorily exempt from the provisions of the California Environmental Quality Act (CEQA) pursuant to California Code of Regulations title 14, section 15262 and categorically exempt pursuant to California Code of Regulations title 14, section 15306. Section 15262 provides that feasibility and planning studies for future actions that have not yet been approved or funded are statutorily exempt from the requirement to prepare an EIR or negative declaration.

Section 15306 provides that basic data collection, research, and resource evaluation activities which do not result in a serious or major disturbance to an environmental resource are categorically exempt from the provisions of CEQA.

Upon approval of the project, Conservancy staff will file a Notice of Exemption.