California Forests and Watersheds Infrastructure Resilience
2020 Request for Proposals (RFP) Appendix

Listed below are potential projects that have been identified by the Klamath National Forest (KNF) and the Lassen National Forests (LNF) within the priority watersheds. All projects will require at least a quarterly check-in with the USFS and a final presentation to USFS and NFWF, as appropriate.

National Environmental Policy Act (NEPA) acronyms include:

- CE – Categorical Exclusion
- CEQA – California Environmental Quality Act
- EA – Environmental Assessment
- EIS – Environmental Impact Statement
- FONSI – Finding of No Significant Impact
- ROD – Record of Decision

Klamath National Forest (4 projects)

- **Horse Creek Road Storm Proofing**: Improve drainage on seven road segments (12.5 miles) incorporating 25 legacy sites within the Horse Creek Watersheds. These legacy sites are those sites identified within the Horse Creek watershed as having the greatest concern for the risk of discharging sediment to the waters of the state. Work may consist of complete reconstruction of road stream crossings, fill reduction, upgrade capacity of culverts to pass 100-year flood flows, armoring, vented fords and coarse-rock fills, or outsloping of road surface to eliminate inboard ditches.

  Additional information includes: map and completed environmental compliance under Seiad-Horse Creek Risk Reduction Project.

- **Kelly Gulch Fish Passage**: The purpose of this project is to rehabilitate the Kelly Gulch culvert crossing sufficient to provide unrestricted passage for all aquatic species. This crossing is located on Forest Service Road #40N39, a maintenance level 2 road that is valuable to the forest. The road provides the administrative access into the area for cooperator access, fire suppression, resource protection and recreation. In 2001 the 5-Counties Fish Passage Site Evaluation was completed and a forest-wide fish passage inventory site evaluation was completed on the KNF in 2003. Both inventories identified the Kelly Gulch site as a complete barrier to anadromous fish passage and a high priority for culvert replacement.

  The project deliverables include:

  1. Removal of portions or all existing fill material at the stream crossing
  2. Replace the existing conventional culvert (6’ diameter and 44’ long) with an embedded bottomless arch structure exhibiting natural bed materials. The

structure will measure approximately 8’ high and 23’ wide and be able to withstand a 100 year flood event
3. Restore of natural stream gradient
4. Minimize channel constriction by road crossing
5. Add rolling dips to minimize the amount of fill material in crossings
6. Seed and mulch disturbed areas
7. Upgrade high risk/consequences/impact stream crossing culverts to withstand 100-year peak flows and/or debris flows, including reducing road fills as much as practically possible
8. Construct temporary crossings to permit traffic flow during construction and removal following project completion
9. To avoid introduction of noxious weeds the following requirements will be implemented:
    a. Equipment will be free of mud and debris which may harbor weed seeds and plant parts prior to entering National Forest system lands
    b. All materials used for erosion control, such as mulch, straw, or seeds, will be certified weed free
10. Develop an erosion control plan during the development of the engineering designs.

Additional information includes: map, restoration specifications, and drawings, and EA.

- **Elk Creek Road Storm Proofing**: The project activities will affect the road prism during construction of rolling dips, installation of culverts, and the placement of surface aggregate. On Forest Service road 15N75 at mileposts 0.98, 1.30, and 1.36, 40-foot long 36-inch diameter culverts will be installed and necessitate excavations of approximately 4-foot depth and 8-foot width. At milepost 1.67, two 48-inch diameter culverts will be installed with lengths of 40-foot at the lower section and 60-foot for the upper section. These culvert installations necessitate excavations of 20-foot depths and 10-foot widths. At milepost 1.75, a 60-foot long 48-inch diameter culvert will be installed and necessitate excavation of 20-foot depth and 11-foot width. The rolling dips to be constructed at each site require excavations of 2-foot depth x 18-foot width x 50-foot length. An additional six inches of surface aggregate shall be placed on the road surface at all sites.

  Additional information includes the West Side Fire Recovery Project and Final EIS.

- **Lovers Road Decommissioning**: Decommission 3.11 miles of roads to prevent failure and sediment delivery to streams during floods. Work will remove road fills and culverts from stream crossings, outslope road surfaces, and remove unstable fills. This project is required by the North Coast Regional Water Board as a condition for enrolling the Lovers Canyon Project under the Waiver of Waste Discharge Requirements. The project would treat 16 legacy sediment discharge sites that are at high risk of failing during floods. The primary benefit is a reduction in fine sediment in downstream salmon habitat. Work will complement a 319(h) grant proposal which would complete all remaining sediment control work in the watershed and be eligible for de-listing from EPA’s Section 303(d) list of impaired waters.

Additional information includes: map and Lovers Canyon Project Environmental Assessment.

Lassen National Forest (1 project)

- **Pine Creek Road Restoration**: This project would remove and recontour 1.2 miles of abandoned railroad grades and historic roads in four locations in the Pine Creek watershed. To support the reestablishment of a natural spawning population in Pine Creek, suitable habitat must be provided and maintained. Pine Creek is the primary spawning stream and is only connected to Eagle Lake during the spring runoff (February to May). Pine Creek's riparian corridor, channel morphology, and hydrologic function have all been highly altered by past land uses in the basin. Road and railroad construction (raised grades and borrow ditches), have contributed to habitat degradation and impaired the natural hydrology.

  The Eagle Lake Rainbow Trout (ELRT) is a subspecies of rainbow trout endemic to Eagle Lake and its main tributary, Pine Creek located in Lassen County, CA. The ELRT has been designated as a California Heritage Trout, a California Department of Fish and Wildlife Species of Special Concern and US Forest Service sensitive species. A Conservation Agreement and associated Conservation Strategy was developed between California Fish and Wildlife, U.S. Fish and Wildlife Service and the Lassen National Forest have been developed to expedite implementation of conservation measures for the Eagle Lake Rainbow Trout (ELRT) in California as a collaborative and cooperative effort among resource agencies and nonprofit groups. The project is covered under the Pine Creek Watershed Restoration EA (2015) or under the Harvey Range EA (2013). This project is one in a series of restoration efforts supported by the Pine Creek Coordinated Resource Management Planning Group (CRMP) and would improve hydrologic function by removing artificially constricted in floodplains to increase the flow duration of runoff.

  Additional information includes: map and FONSI