Santa Fe National Forest Aquatic Organism Passage Project

Rito Peñas Negras AOP



Fisheries Division

Rio Cebolla AOP



Project Contacts



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Project Location

Santa Fe National Forest, Cuba Ranger

District, Jemez Ranger District

- Sandoval and Rio Arriba Counties
- Rito Peñas Negras-(36.00094, -106.70817)
- Rio Cebolla- (35.99102, -106.6442)

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Project Background

Rito Peñas Negras

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- Heavy erosion
- Culvert head is separated from body
- Creek runs around and underneath culvert
- Aquatic organisms can't pass through









Project Background Cont.

Rio Cebolla

- Current culverts are dilapidated
- Fish can't pass through due to design
- Core conservation population for Rio Grande Cutthroat Trout with >99% purity
- Popular area for public angling







Project Purpose

Mimicking Natural Channels:

- Replicate the physical characteristics of the natural stream within the crossing structure, including channel dimensions, substrate, and bed material.
- Promote fish passage:
 - By replicating natural stream conditions, stream simulation aims to ensure that fish and other aquatic organisms can easily navigate through the structure.
- **Restoring Ecological Processes:**
 - Stream simulation strives to restore ecological processes, such as sediment transport, debris passage, and hydraulic conditions, within the passage structure.
- Reducing Maintenance Needs:
 - Stream simulations are designed to have larger sizes, which decreases the likelihood of plugging and overtopping, ultimately reducing long-term maintenance needs.

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Project Summary-Estimated Cost \$700,000

- Designs- \$65,000
- Construction- \$635,000



