

## 2017 Environmental Education and Outreach Update



David Pearson

This spring the District partnered with several agencies on environmental education and outreach events throughout the county. Our new education and outreach assistant, David Pearson, started in early March and hit the ground running with several events.

We began the spring season with a hike up McKenzie Gulch Loop trail in the Weaverville Community

Forest with 4th grade students from Weaverville Elementary School (WES) in mid-March. The destination was a large pond known to provide habitat for western pond turtles. The students learned about fire ecology, as well as local plants and animals along the way. When we reached the pond we learned about western pond turtles from U.S. Forest Service (USFS) Biologist Carla DeJulio. Other USFS specialists also participated in the field trip.



Students at turtle pond

In late March Trinity River Restoration Program's (TRRP) Eric Peterson led a nature hike at the Bucktail boat access near Lewiston to discuss the 2016 rehabilitation project at the

site, as well as impacts of the high river flows scheduled in April. About 10 members of the public participated in the hike, despite the pending rain.

In April local naturalist and retired TCRCD District Manager Pat Frost, led a Birding Safari that started at Lewiston Hatchery and ended near Pine Cove on Lewiston Lake. Many



Birding Safari at Lewiston Lake

native birds were spotted, including bald eagle, red tailed hawk, double crested-cormorant, and red winged black bird. This event was sponsored by TRRP and the Shasta College Foundation.

On Earth Day the District participated in the celebration at WES by teaching a station on animals, using pelts and skulls borrow from the U. S. Forest Service. District staff also led an After School Program on birding at WES. Despite the windy weather, the students successfully identified a bird they hadn't seen before – a House Finch.

April came to a close with TRRP and District staff teaming up with the USFS and volunteers to attend and teach at the 13th annual Klamath-Trinity Fish Fair at Hoopa Valley Elementary School. Activities included fish prints, animal tracks, nature themed art cards and a fishing game.

May began with Day at the Wetlands. This annual event, held at the industrial wetlands on Industrial Parkway in

*Continued, page 2 -*





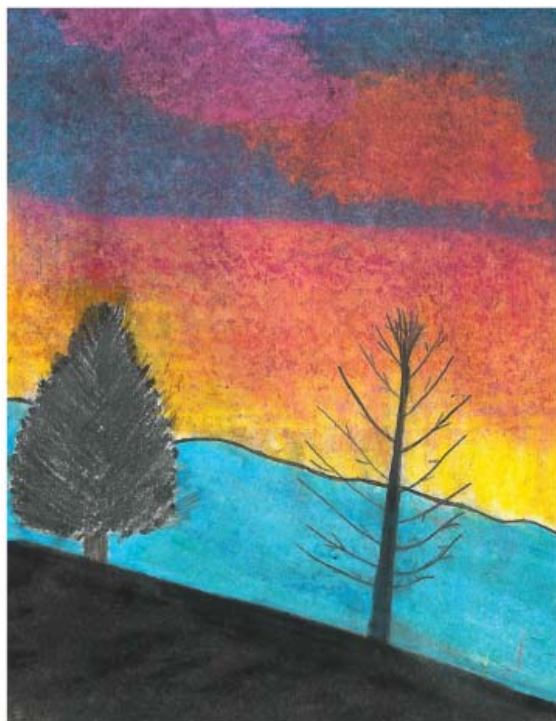
# 2017 Environmental Education and Outreach cont.



James Lee, TRRP/ Hoopa Valley Tribe, showing WES students critters at the wetlands.



Brandt Gutermuth, TRRP, teaching bird migration at the wetlands.



Winning Art by Mykeltsy Day, 8th Grade.

Weaverville, brings District and TRRP staff together with WES 4th grade students to learn about bird migration, hydrology, wetland plants, wetland critters, and aquatic macroinvertebrates (water bugs). Toward the end of May, District staff had a booth at the Weaverville Children’s Festival with a fishing game and prize give away for winners.

Spring activities wrapped up with the TRRP 2017 Trinity River Art Contest. Students from schools throughout the watershed were invited to participate by creating an image of what they think of when they hear “Trinity River”. Voting took place at the Weaverville Farmer’s Market and on Facebook. Based on popular vote by the public, the winner of the art contest is Junction City 8th grader, Mykeltsy Day.

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## TCRCD Conservation Scholarship Fund Donation

### TRINITY COUNTY RESOURCE CONSERVATION DISTRICT SCHOLARSHIP FUND

Make a tax-deductible donation today! We will mail you a receipt or you are welcome to stop by the office.

Name: \_\_\_\_\_

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email: \_\_\_\_\_

Amount: \$ \_\_\_\_\_

Please return to: TCRCD Scholarship Fund,  
PO Box 1450, Weaverville, CA 96093  
530-623-6004 www.tcrcd.net

# 2017 Scholarship Winners

The Trinity County RCD is proud to announce the two recipients of this year's Natural Resources Scholarship Funds – Karly Gutermuth and Taylor Nelson, who each received \$500 for college expenses.

The purpose of this scholarship is to encourage and support high school seniors and continuing education students from Trinity County who are pursuing a degree in natural resources or conservation.

Both of the winners participated in extracurricular activities and maintained high grade point averages.

Karly was Associated Student Body president her senior year, after serving in ASB roles in her junior and sophomore years. Additionally she is an athlete, musician and runs a start-up cupcake business, Cupcakes Galore. She also volunteers for several organizations including Rotary Club of Weaverville, Trinity High School Athletic Booster Club and Interact Club.

Karly is interested in becoming an environmental scientist focusing on sustainability. Karly comes from a long line of natural resource professionals, with her grandfather, father, aunt and uncle all engaged in natural resource careers. In her personal statement, Karly said "I am hoping to use my

education to help allow my children and my classmates' children to grow up surrounded by untouched wilderness, and grow a steady love for the outdoors just as I have."

Taylor was president of Trinity High School Future Farmers of America, and has participated in the Trinity River 4-H Club since 2011. She organized multiple community service events for both of these clubs, held several different offices and routinely participated in the 4-H events at the Trinity County Fair.

Taylor grew up in Willow Creek in a farming and ranching family. Over her life span, she has seen the degradation of the fish and wildlife populations and forest health created by illegal cannabis growers. She feels that her community has suffered as well. This change has prompted her to attend college, majoring in range and land management. In her personal statement, Taylor said "The interrelationship between successful agriculture endeavors and a healthy wilderness are symbiotic and extremely fragile. This is why I wish to follow studies in the agricultural field."

The District wishes both of these young women success in their future endeavors.



Karly Gutermuth



Taylor Nelson



# The 9th Annual Plant and Seed Exchange

The 9th annual Trinity County Plant and Seed Exchange, held Saturday April 22 from 11 a.m. to 3 p.m. at the historic Young Family Ranch in Weaverville, proved to be a big success for gardeners of all ages and abilities.

Over 70 members of the community, plus nearly twenty volunteers, filled the lawns at the Young Family Ranch bringing plants, seeds, starts and ideas to freely share with the Trinity gardening community.

Several of the gardeners have been participating in the exchange for over five years. Planting extra starts for the exchange has become part of their spring garden tradition. They brought tomatoes, peppers, cabbage, lettuce and flowers plants, to name a few, all in varying containers: from red plastic drink cups to re-used nursery stock containers.

The abundance of giving and sharing infused the day with community spirit.

Sponsors included Tops Market, Plotzke Ace Hardware and CVS, who generously donate plants, seeds, and bulbs; Young Family Ranch, Trinity County Resource Conservation District, University of California Cooperative Extension Master Gardeners program and CalFresh Nutrition program provided the people, supplies and space to make the event a reality.

UC Cooperative Extension Master Gardener volunteers staffed the event and provided answers to many garden questions.

Young Family Ranch, Inc. is a non-profit entity that works in partnership with the Trinity Trust, Humboldt Area Foundation and the Shasta Regional Community Foundation to ensure long-term benefit to the residents of Trinity County.



A highlight this year was the garden art created by Mike McFadin on display throughout the grounds.



Children had fun planting and painting containers.



## Plant and Seed Exchange, cont.



Houseplants, bedding flowers and vegetable starts were included in the ever changing mix of plants available on April 22.



The seed table was a popular spot at the exchange.



Children had fun making crafts and decorating containers for their very own plants to bring home.



TCRCD Project Coordinator Ian Erickson (right) presented tours of the District's new native nursery at the Young Family Ranch.



# Be Prepared for Wildfire Season

The 2015 Trinity County Hazard Mitigation Plan determined that wildfire continues to be the number one hazardous threat to Trinity County. Trinity County residents live in, or near, forests and grasslands that can erupt in flames at a moment's notice due to lightning strikes that are relatively common during hot summer months; a campfire left unattended; a carelessly tossed cigarette; or as has happened too often, a chain dragging on the highway from a towed trailer or camper.

This wildfire season may be starting later than usual due to the heavy rains and snow and cooler temperatures into June. Because of the moisture, the grasses are much taller and denser than usual and are expected to add to the fuel load once they dry out, resulting in additional fire risk.

Damage to the state's forests from the extended drought also may exacerbate wildfire conditions this year. CAL FIRE states that an estimated 102 million trees have died across the state as a result of drought and the effects of bark beetle infestation. "No amount of rain will bring back 102 million dead trees and it will take several years of continued precipitation to undo the effects of our severe five-year drought," said Chief Ken Pimlott, CAL FIRE director, and California's state forester.

The District has a long history of addressing the threat of wildfire in Trinity County. Here are some of the District's recent fire prevention, planning, and implementation projects:

Update the Trinity County Community Wildfire Protection Plan (CWPP). Earlier this year the District, in partnership with the Watershed Research and Training Center, completed the 2015 CWPP update to prioritize fire prevention projects and provide recommendations to help prevent wildfire (funded by a grant from CAL FIRE State Responsibility Area Fire Prevention Fund). The CWPP is available online at:

[www.tcrd.net/fsc/pdf/CWPP\\_2015\\_Update\\_Final.pdf](http://www.tcrd.net/fsc/pdf/CWPP_2015_Update_Final.pdf).

Provide content for the Trinity Journal special publication on Wildfire Preparation sponsored by the Trinity Journal and the Trinity County Fire Safe Council. The publication has helpful advice on Wildfire Prevention, What to do During a Fire, and Aftermath of a Fire. This issue includes an educational map of Trinity County Fire History from 1910-2015, prepared by the District GIS Manager, which clearly depicts that the size of wildfires in Trinity County has increased over the last century.

May 2017 proclaimed as Wildfire Awareness Month. The Fire Safe Council facilitated the Trinity County Board of Supervisors to issue a Proclamation announcing the month of May as Wildfire Awareness Month.

Trinity County Fire Safe Council Coordination. The District has facilitated the Trinity County Fire Safe Council (TCFSC) since its inception in 1998 and hosts its website ([www.tcrd.net/fsc](http://www.tcrd.net/fsc)). In recent years this coordination has been funded by Trinity County Title III (Secure Rural Schools and Community Self-Determination Act of 2002). Members of the TCFSC include state, federal, and local agencies, local Volunteer Fire Departments, non-governmental organizations, and other interested groups and individuals. The Trinity County Fire Safe Council seeks to improve cooperation and coordination in all aspects of wildfire management in Trinity County. Meetings are held the fourth Thursday of each month (see website for details). In June, the Trinity County Fire Safe Council hosted a Wildfire Preparedness Workshop at the Weaverville Fire Hall to help prepare our communities become more resilient to the threat of wildfire.

**Hazardous Fuels Reduction Implementation Projects.**

The District and its many partners have been busy with several hazardous fuels reduction implementation projects:

- **Shaded Fuel Break / Plantation Thinning.** With funding from US Forest Service Trinity County Resource Advisory Committee (RAC), the District is working to complete environmental analysis, GIS mapping, and planning on a roadside shaded fuel break and plantation maintenance project developed through the Trinity County Collaborative.
- **Grass Valley Creek Stewardship.** This project is funded by the Bureau of Land Management to assist with the planning and implementation of resource management projects within the Grass Valley Creek (GVC) Watershed. Specific projects within GVC can include selective timber and biomass sales, hazardous fuels reduction, watershed restoration, and road stabilization and maintenance. This year District crews have worked on roadside shaded fuel breaks and improving elk habitat.
- **Trinity County Fuels Reduction.** The California Fire Safe Council provided funding to the District, in partnership with the Watershed Research and Training Center (WRTC) to complete fuels reduction projects on Oregon Mountain near

# Be Prepared for Wildfire Season, cont.



GVC Stewardship Shaded Fuel Break

Weaverville and at several project sites in the Hayfork vicinity. The prescription includes thinning to reduce fuel loads and ladder fuels. These fuels reduction projects will help lessen the very high risk of catastrophic fires due to buildup of fuel loads in these priority areas, and act as fuel breaks to protect communities and residences. The areas selected for fuels reduction were made with careful consideration based on the Trinity County CWPP project ranking and recommendations for strategic fuels reduction.

- **Trinity County Chipping Services.** The district received funding from multiples sources, including Trinity County RAC Title II and III, CA Fire Safe Council and CAL FIRE to provide chipping services to landowners who are implementing fuels reduction work on private lands adjacent to, or near US Forest Service lands, and those areas identified in the CWPP as being high priority. Community chipping days will be held in central locations to assist landowners in the disposal of dead and dying trees and other hazardous fuels.

- **Greenhorn Fuels Reduction.** With funding provided by Trinity County RAC, District crews are working to create a strategic shaded fuel break by reducing hazardous fuel loading along 2.5 miles of US Forest Service

Roads near Lake Forest Subdivision in Trinity Center.

- **Trinity County Fuels Reduction and Community Chipping.** With funding from CAL FIRE, the District is implementing fuels reduction on 125 acres in Weaverville, Lewiston, Trinity Center and Coffee Creek.

- **Beaverslide Fuels Reduction.** Trinity River Lumber has contracted with the District to cut and hand pile slash on about 165 acres for a roadside fuel buffer. This project, on Six Rivers National Forest lands near Ruth, is projected to run through 2020.

- **Fire Prevention and Sediment Reduction.** The State Water Quality Control Board's Timber Fund recently approved this project to create roadside fuel breaks along county roads in the Trinity River Watershed, a sediment impaired watershed. This work will improve water quality by reducing the likelihood of catastrophic fires and the resulting sedimentation from burned areas making its way into the Trinity River and its tributaries. Project areas have been identified as being high priority areas in the Trinity County CWPP. Treatment will occur in eleven different CWPP identified project areas on up to 150 acres along 25 miles of county roads over a three-year period. *Continued next page...*



GVC Stewardship Shaded Fuel Break



# Be Prepared for Wildfire Season, cont.

## Just a reminder....

In January 2005, a state law became effective that extended the defensible space clearance around homes and structures from 30 feet to 100 feet. Proper clearance to 100 feet dramatically increases the chance of your house surviving a wildfire. This defensible space also provides for firefighter safety when protecting homes during a wildland fire.

**Wildfire Season 2017 is here! Are you prepared? Remember, it is not if, but when a wildfire will threaten your home.**

## Defensible Space Saves Lives and Property!

Two zones make up the required 100 feet of DEFENSIBLE SPACE:

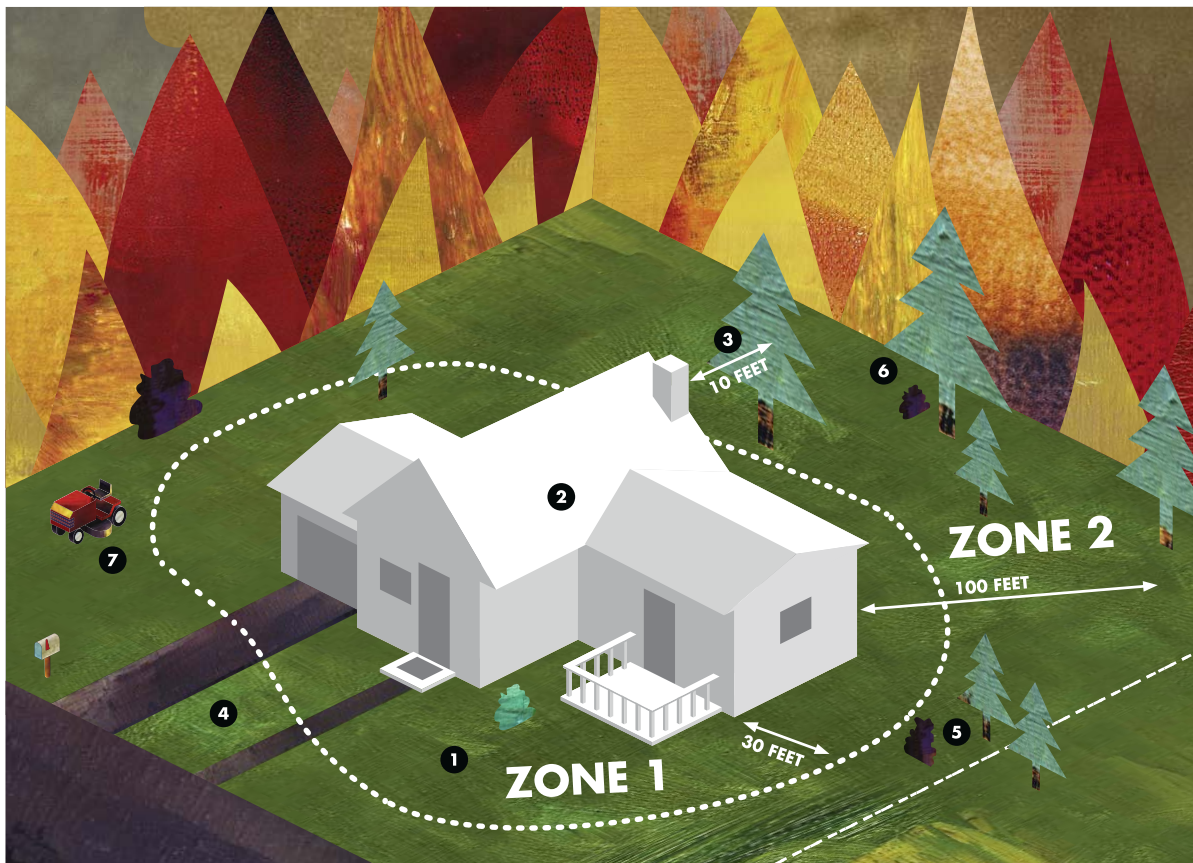
### 1. Lean, Clean and Green Zone

An area of 30 feet immediately surrounding your home.

### 2. Reduced Fuel Zone

The fuel reduction zone in the remaining 70 feet (or to the property line).

- Clear dead weeds and vegetation
- Remove leaves and needles from gutters
- Trim branches 6 feet from the ground



### TWO ZONES MAKE UP THE REQUIRED 100 FEET OF DEFENSIBLE SPACE:

#### ZONE 1: 30 feet of Lean, Clean & Green

- 1 Remove all dead plants, grass and weeds.
- 2 Remove dead or dry leaves and pine needles from your yard, roof and rain gutters.
- 3 Keep tree branches 10 feet away from your chimney and other trees.

#### ZONE 2: 30-100 feet of Reduced Fuel

- 4 Cut or mow annual grass down to a maximum height of 4 inches.
- 5 Create horizontal spacing between shrubs and trees.
- 6 Create vertical spacing between grass, shrubs and trees.

#### Use Equipment Properly to Keep from Sparking a Wildfire

- 7 Mow before 10 a.m., and never on a hot or windy day. String trimmers are a safer option (vs. lawnmowers) for clearing vegetation.

BE SAFE THIS FIRE SEASON AND BE PREPARED!!! For more fire prevention tips visit [www.preventwildfireca.gov](http://www.preventwildfireca.gov)



# Weaverville Community Forest Roundup

The Weaverville Community Forest, a nationally recognized stewardship project, is a unique partnership between the people of Weaverville, represented by the District, and the federal agencies responsible for managing approximately 13,000 acres within the Weaverville Basin.

The steering committee held a committee meeting on May 4, and the annual Weaverville Community Forest Community Meeting, with public and partner agency participation, was held on June 15.

Multiple topics were discussed at both meetings, with agency partners US Forest Service, TCRCD and Bureau of Land Management reporting out on past and future projects.

Future USFS projects include trail maintenance work, road-landing decommissioning, and tree inventory. The USFS completed two prescribed fires in the Weaverville Community Forest this spring.

BLM reported that prescribed fire will continue in the fall. They will also continue cleanup of the Brown's Fire area, with firewood being sold to the public at their campgrounds.

The District reported on fuels reduction, noxious weed removal and an upcoming stream rehabilitation project on West Weaver Creek.

The Watershed Research and Training Center expects to eventually begin a project for prescribed fire on private property adjacent to USFS lands within the Community Forest. The project is currently in the planning stage.



The East Weaver Creek Campground, managed by Shasta-Trinity National Forest and run by concessionaire to the Forest Service, Shasta Recreation Company, provided a lively topic of discussion at both meetings. It has been reported that the Shasta Recreation Company seeks to close the campground, citing low use and no profit.

Many ideas and concerns were raised by all stakeholders present, with no consensus evident. The areas that appeared to have the most agreement included keeping the campground open in some capacity, with increased law enforcement patrols and a host on site.

The goals of the Weaverville Community Forest are to reduce fire hazard through fuels reduction, maintain high visual quality, improve forest health through timber harvests and other activities, maintain and improve wildlife habitat, provide recreation and other services, and continually engage our community in the management of their federal lands.

Patrick Flynn started working as the District's new GIS Technician in June. Originally from Redwood Valley in Mendocino County, California, Patrick graduated from Humboldt State University in December 2015 with a Bachelor's degree in Environmental Planning and Geographic Information Systems (GIS).

Patrick enjoys the challenges presented by the real-world problems that can be solved using GIS and collaborative planning processes.

This is his second time living in Weaverville, as he interned with the TCRCD in the summer of 2015. He loves the outdoors and all of the extracurricular activities that Trinity County has to offer. In addition to outdoor activities, Patrick plays guitar in the local band Philosopher's Tone, with Assistant District Manager Kelly Sheen. Patrick is excited to be here and a part of the TCRCD!

## Patrick Flynn Joins TCRCD Staff





# Restoring Salmon Habitat

Healthy salmon and steelhead populations depend on healthy conditions in their home streams. For centuries people have recognized this important relationship. Records show that the New England colonies enacted laws as early as 1709 that made it illegal to obstruct fish passage. These early laws were based on a basic understanding of salmon life history, but were not able to slow the effects of extreme landscape changes and human impacts that reduced a once abundant wild Atlantic salmon population to near extinction.

Even in the rugged and remote Trinity Mountains, salmon and steelhead habitat is threatened by human-caused landscape changes. Although salmon can spend as much as 80 percent of their lives in the ocean, the health of their native streams is critical for survival. Salmon spend their most vulnerable life stages in fresh water habitats.

The pressure on juvenile salmon populations in the Trinity River Watershed is largely a story of altered landscapes. Salmon are a naturally resilient and adaptable species. They have evolved to weather natural disturbances such as droughts, fires and floods, but salmon species struggle to adapt and fulfill their life cycles under relatively rapid human-caused stresses from historic logging, mining and dams.

preservation and propagation of fish and wildlife” below the dams (H.R. 4663 (84th)); and extensive habitat studies were done in response to the dwindling wild salmon populations. These studies ultimately led to the signing of the 2000 Record of Decision (ROD).

The Trinity River Restoration Program (TRRP) was developed as a result of the ROD to carry out the mandated task “to restore and maintain the Trinity River’s anadromous fishery resources” (U.S. DOI, ROD, 2000). Natural fish populations cannot be directly ‘created’, however they can be encouraged by improving habitat conditions. Therefore, the ROD directed TRRP to achieve its task by working to restore and maintain a functioning river that will support the salmon life cycle.

At the simplest level, salmon habitat is shaped by landscape processes that control the supply and movement of water, sediment, and wood through stream channels. Healthy salmon runs need habitat for spawning, which means coarse gravel streambeds for egg development. Young salmon need somewhat slow, often shallow water to feed in, plus woody debris to protect the young while they forage, grow, and hide from predators. Good food sources include insects on floodplains and aquatic insects that are most abundant

where water flows through coarse gravel or cobble, such as around bars and riffles. When returning upriver adults need deep, sheltered pools to rest and stay cool.

Ideal spawning habitat has appropriately-sized clean gravel near deep pools, which provide sheltered resting areas. Restoration flows released from the dams cause sediment transport and scour around boulders and logjams to provide different types and qualities of habitat for juvenile rearing in the mainstem channel. Side channels,

off-channel wetlands and wetted floodplains provide rearing habitat with slow water and abundant food during high flows. Many of these features are designed and built during channel rehabilitation projects at select locations along the river.



After the construction of the Trinity and Lewiston Dams, in-river salmon habitat degraded rapidly following dam operations, leading to drastic declines in the abundance of wild salmon populations. The Secretary of the Interior was “directed to adopt appropriate measures to insure the





Fully restoring all life-stages of native fish populations involves a complex web of interdependent processes. Factors such as over-harvest, ocean health, climate change, and watershed conditions can effect fish populations despite increases in the number of juveniles thanks to the quality of newly restored habitat.

Effective fisheries restoration in the Trinity River begins with understanding the watershed and river system processes that create and sustain salmon habitats—and thereby salmon populations. This understanding is guided by the work of fisheries biologists, aquatic ecologists, geomorphologists and engineering hydrologists working together to develop effective restoration strategies.

Between mining, logging, and exporting water from the dams, the Trinity River went through a century of extreme landscape changes. Natural processes, such as fluvial processes, can be slow to respond to management actions. However, the benefits of river restoration not just for salmon – but for the river ecosystem itself – are becoming more evident as the TRRP continues using variable flows, mechanical actions, and science-based adaptive-management processes designed to bring back a river that can support a healthy fishery.

### Fluvial Geomorphology

*From the mountains to trickling streams, geomorphologists study why the Earth is shaped the way it is. Geomorphology is the scientific study of how land is formed over time across the physical landscape. This field is generally broken into various physical processes that shape the landscape, which include mass movement, weathering, and fluvial processes.*

*Fluvial processes are the changes created and shaped by rivers and streams. Fluvial comes from the Latin word fluvius, which means river. Water shapes the landscapes in important ways: moving water cuts and erodes channels to bedrock in some areas and it moves and deposits sediment in other areas during high flows.*



Trinity County



Resource Conservation District

*Established 1956*

Trinity County Resource Conservation District  
P.O. Box 1450  
Weaverville, CA 96093



**District Board Meetings**

Third Wednesday  
5:30 PM  
Open to the Public

**TCRCD Office**

30 Horseshoe Lane  
PO Box 1450  
Weaverville, CA 96093

**Telephone**

(530) 623-6004  
FAX 623-6006

**E-mail: [info@tcrd.net](mailto:info@tcrd.net)**

**Internet: [www.tcrd.net](http://www.tcrd.net)**

The Trinity County Resource Conservation District (TCRCD) is a special district set up under state law to carry out conservation work and education. It is a not-for-profit, self-governing district whose board of directors volunteer their time.

**The TCRCD Vision**

TCRCD envisions a balance between utilization and conservation of our natural resources. Through economic diversity and ecosystem management our communities will achieve and sustain a quality environment and healthy economy.

**The TCRCD Mission**

To assist people in protecting, managing, conserving and restoring the natural resources of Trinity County through information, education, technical assistance and project implementation programs.

TCRCD Board of Directors are  
Mike Rourke, Morgan Rourke, Patrick Truman,  
Colleen O'Sullivan, and Greg Lowden.

*The RCD is landowners assisting landowners with conservation work. The RCD can guide the private landowner in dealings with state and federal agencies. The RCD provides information on the following topics:*

- Forest Land Productivity
- Watershed Improvement
- Water Supply and Storage
- Educational Programs
- Erosion/Sediment Control
- Wildlife Habitat
- Soil and Plant Types
- Fuels Reduction

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