

LANDOWNER ASSISTANCE SPOTLIGHT

Despite the unique challenges of 2020, Cascadia staff have stayed busy assisting the citizens of Chelan County. By adapting how we connect with landowners, communicate with each other, and do work in the field, project planning and implementation have continued. In the Wenatchee watershed, private landowners are being assisted with water quality conservation practices through funding from WA Department of Ecology.

The specific problems to be addressed by these projects include degraded streambanks, lack of diverse channel morphology, diminished riparian vegetation, degraded water quality, and lack of fish and wildlife habitat.



More than 1700 native trees and shrubs were installed in the riparian area along the Little Chumstick this fall to improve water quality and restore wildlife habitat

Lack of vegetation in the riparian area (the land along a water body) contributes to increased sediment in the water and increased water temperatures. Without riparian vegetation, banks become more susceptible to erosion, and the channel is often constricted. The resulting loss of sinuosity (natural curves) decreases the variety of habitat available for fish and wildlife health. The loss of riparian vegetation also results in decreased large wood deposition into the ecosystem. Large wood is important habitat for fish and their food sources, as well as other species.

Cascadia staff also installed livestock exclusion fencing that will help limit livestock access to the



Mulching the plants reduces weed competition and adds nutrients to soil

creeks and riparian areas, helping to sustain them for wildlife use. The fencing also helps limit erosion and polluted runoff that can arise when livestock have free access to long stretches of streams and critical riparian areas.

Our staff recently worked with four landowners to install eight beaver dam analogs (BDAs) and post assisted log structures to mimic natural water-slowing processes. BDAs are a new addition to Cascadia's toolbox, but we have partners who have been doing this work for several years. Learn more about BDAs in the article from Trout Unlimited on page 2 of this newsletter.



Building the BDA structure



FREE Chipping Programs Coming from Cascadia CD and WA Dept of Natural Resources

Registration for spring program begins in March!
Look for details at www.cascadiacd.org and on Facebook or contact Amanda Newell at amandan@cascadiacd.org for info.

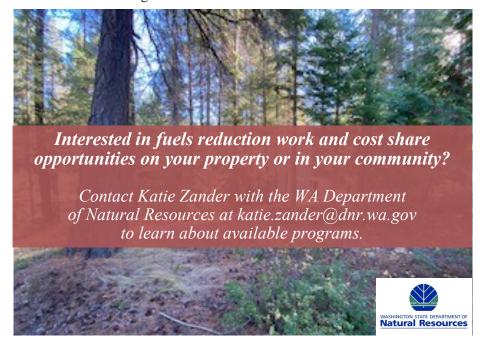
See tips below to help you reduce your risk of wildfire damage:

- Clear leaves and other debris from gutters, eaves, porches and decks.
- Remove dead vegetation and other items from under your deck or porch, and within 10 feet of the house.
- Remove flammable materials (firewood stacks, propane tanks) within 30 feet of your home's foundation and outbuildings, including garages and sheds. If it can catch fire, don't let it touch your house, deck or porch.
- Wildfire can spread to tree tops, then jump quickly from tree to tree. Prune trees so the lowest branches are 6 to 10 feet from the ground.
- Learn more about how to protect your home and property at www.firewise.org.



ECKMSS
Menatchee, WA
PAID
US POSTAGE
VORPER
WON-Profit Org.

Cascadia Conservation District 14 N Mission St Wenatchee, WA 98801



BEAVER DAM ANALOGS INSTALLED IN THE ENTIAT RIVER

Contributed by Kodi Jo Jaspers, Trout Unlimited

Beaver dam analogs (BDAs) are an effective, low-tech, low-cost method for restoring stream habitat and function.

In 2017, Trout Unlimited (TU) and US Fish and Wildlife Service (USFWS) developed a program to prioritize sites suitable for the installation of BDAs. The Beaver Restoration Decision Support Tool guided the



Installing the BDA. Photo credit: Trout Unlimited

team to identify Potato Creek and Roaring Creek in the Entiat watershed as top BDA site locations.

These tributaries were selected based on current habitat conditions: erosion/incision, a loss of large woody debris inputs, a loss of stream habitat diversity/complexity, a loss of historic beaver pond complexes, head cutting and intermittent baseflow conditions.

"The goal of the project is to increase water storage in the soil and increase the duration of surface flow" said Robes Parrish, USFWS Hydrologist. "We hope that this will improve conditions for anadromous and resident fish in these important streams."

For the past three years, TU and USFWS have been working with the US Forest Service (USFS) on project scope, timeline, and permitting pathways for the BDA project. For Potato Creek, the focus was along the lower ³/₄ mile below the confluence of Potato Creek on the Entiat River. Several fires have burned through the lower Potato Creek area, leaving the creek channelized, incised, and with limited riparian vegetation.

BDAs will hopefully help create more diverse fish habitat, retain water later into the summer, and raise the water table to help bring back diverse riparian vegetation. In Roaring Creek, land use practices and the lack of a healthy beaver population have led to incision and head cutting, including a head cut that is currently acting as a complete fish barrier. The work in Roaring Creek will help remove the passage barrier and keep water in the creek for longer during the summer.

"This is the first time we've constructed these types of 'low tech' stream restoration structures on the Entiat Ranger District and we are excited to see the results" said Mariah Mayfield, USFS Fish Biologist for the Entiat Ranger District. "Hopefully, in the next few years, we'll see more water in the streams during the hottest part of the summer and, ideally, see beavers coming in to take over the dams we constructed."

Between September and October 2020, the project was implemented by TU's Beaver Crew and a private contractor. The team successfully installed



Completed BDA. Photo credit: Trout Unlimited

33 BDAs and post assisted log structures along Potato Creek and five structures along Roaring Creek. Through generous volunteer time from the Wenatchee Valley Fly Fishers, the team was able to pound and weave the BDAs along Potato Creek in three weeks. Staff will continue monitoring efforts through the fall rains and spring freshet to evaluate the project's success.

FUNDING AVAILABLE FOR CONSERVATION PRACTICES

Contributed by Sarah Troutman and Christopher Wright, Natural Resources Conservation Service

A pplications will be accepted through November 20th for the Natural Resources Conservation Service (NRCS) Environmental Quality Incentives Program (EQIP).

EQIP is a voluntary technical and financial assistance program designed to help farmers, ranchers, and private forestland owners implement conservation practices on their land. A few of these practices that are popular in Chelan County include forest health improvements, chipping of orchard prunings as a substitute for burning, and seasonal high tunnels. Many other opportunities exist as well.

Interested applicants must establish their eligibility with the Farm Service Agency by the application cutoff date of November 20th. It is important to begin this process as early as possible and not wait until near the deadline.

For additional information visit: https://www.nrcs.usda.gov/wps/portal/nrcs/main/wa/programs/financial/ or contact the field office at (509) 415-3692.



This orchard near Monitor used the NRCS EQIP program to chip orchard prunings instead of burning, therefore helping keep local air quality clean and healthy. Photo credit: NRCS

VIRTUAL OUTREACH COMING TO THE WENATCHEE WATERSHED

Contributed by Lisa Dowling, Chelan County Natural Resources Department

Partners within Chelan County are teaming together to launch a virtual outreach effort to provide landowners with information about habitat protection and restoration projects happening throughout the Wenatchee River watershed in 2020 and 2021.

The group will produce a series of short documentaries per subbasin that are designed to tell the 'big picture' story around the collaborative nature of restoration work, and the benefit of this coordinated effort for salmonids, the ecosystem, and the people that live in these subbasins. These media will offer a virtual method for sharing project details with the public about ongoing work occurring within watersheds, and answer questions from the public via a series of FaceBook Live question and answer sessions in January and February.

Stay tuned for more details coming out this winter! For questions please contact Lisa Dowling at lisa.dowling@co.chelan.wa.us or (509) 667-6682.



VIRTUAL EDUCATION MATERIALS AND RESOURCES

ascadia and its partners are busy making virtual education materials and resources to support teachers, students, and parents while restrictions remain for schools during the COVID-19 pandemic. Our goal is for the new materials to be useful and beneficial long term, not just in our current situation. The virtual materials have also given us a great opportunity to expand the reach of our education programs into other counties, states and even other countries.

Check out the links below for the virtual resources Cascadia has been directly involved with. Please note there are other great resources created by our partners. Contact us to be directed to more:

Kids in the Creek: Gets high school science students out of the classroom and into the outdoors to learn how streams and watersheds work. Videos and worksheets are available here: https:// kidsinthecreek.com. More materials are currently being created and will be available this winter.

Kids in the Forest: Focuses on enriching the link between people and forests. By gaining baseline knowledge, students learn to talk about forest management and wildfire in their community in a way that supports sustainable approaches to land management. Age range: 3rd-8th grade. Videos and resources here: https:// cascadiacd.org/kids-in-the-forest 368.html



Wenatchee River Salmon Festival: Held each year to celebrate the return of the salmon to our northwest rivers. The rivers that are home to the salmon also provide sustenance for birds, frogs, salamanders, foxes, deer, bugs, bears and countless trees, bushes, and flowers. We depend on these same waters to provide electricity for our homes, irrigation for our crops, livelihoods for our fishermen, and a place for our families to play, picnic, camp and hike. Virtual materials here: http://www.salmonfest.org.

Friends of Northwest Hatcheries: A volunteer organization whose focus is to support natural resource stewardship and education, in cooperation with U.S. Fish and Wildlife Service hatcheries of the Northwestern United States. Also a major funder/supporter of the Wenatchee River Salmon Fest (above). Visit their YouTube channel for educational videos and to subscribe for alerts about the Virtual Salmon Fest. https://www.youtube.com/channel/ UC3beFXGzHYqhuqrMRGaAE-g

Wheat Week: Typically a 5 day in-person series of activities for 5th grade classes. Virtual Wheat Week includes kits of materials for each student and a set of short instructional videos. Students will

grow wheat at home, explore soil, investigate the water cycle, learn about Wheat DNA and thresh their own wheat stalk.

After School Program: Students attending the After School Program at Wenatchee's Mission View and Newbery Elementary Schools are investigating the Wenatchee River watershed through the lenses of Family, Farms, Fish, Forest and Fun. Students in the program received Science Toolkits, are Zooming with educators from locations in the watershed, and will receive Tour Kits to help them explore the watershed with their families. The program is funded by the National Oceanic and Atmospheric Administration and the North American Association of Environmental Education.

We will be so excited to get students back out into the natural world through our programs, when we can run them in person, but we hope these virtual materials will inspire them to explore our environment with their families until then.

If you have any questions about these programs please contact Amanda Newell at amandan@cascadiacd.org.

12 MONTHS OF NATURAL BEAUTY

Thank you to all the wonderful Plants: photographers who made our • 2020 photo contest another big success, and congratulations to those who captured the twelve winning photos!

The twelve winning photos, two per each of the six categories, are listed below and to the right. Please visit our Faceboook page (link at www.cascadiacd.org) to see all entries.

The 2021 Chelan County Clean Water Campaign stewardship calendar featuring the winning photos will be out in early December. Funding for the calendar is provided by: WA Department of Ecology, US Bureau of Reclamation, and other local sponsors as featured in the calendar.

Visit Cascadia's office at 14 N Mission St in Wenatchee to get your calendar! Please call ahead at (509) 436-1601 to arrange pick up due to limited office access for COVID-19 related measures.

The 2020 winning photos are below:

Agriculture:

- "Honeybee on Thistle" by Karen
- "Spring in Bloom" by Dale Blair



Landscape:

- "Grecian Setting" by Brad Brisbine
- "Ware Walk" by Robert Adamson



"Anemone Oregano" by Jill LaRue

by John Barnes



Recreation:

- "Downhill from Here" by Brendan
- "Moonlight Paddle" by Brendan Morrison



Water:

- 'Stehekin Marsh" by Brad Brisbine
- "The Journey Begins" by John



Wildlife:

- "Cedar Waxwing Feeding" by Guy Miner
- "Raccoon Peeking" by Karen Eadie





WELCOME TO THE TEAM RYAI

ascadia is excited to have Ryan ✓ Williams join the team as our new Program Director.

Ryan has a combined 13 years of experience with Conservation Districts in Washington State, including 11 years at Snohomish CD and 2 years at Mason CD. Along the way, he's acquired skills in grant writing, program building and process improvement.

Ryan has worked on river habitat restoration projects, is a certified conservation planner and is active with the statewide Center for Technical Development. He's also a graduate of the AgForestry Leadership Program (class 40).

At Cascadia, Ryan will direct the District's many conservation programs with an eye to sustainability. He expects the forest health and fire programs to play an important role,



Alpaca fun in Ecuador while on a tree planting trip with AgForestry Class 40

as well as the irrigation efficiencies and habitat programs. He'd like to expand the Urban Agriculture program, linking backyard farming to support for local food banks. The benefits include encouraging more efficient use of land and water resources as well as the potential to provide a surprising amount of fresh food.

"Water will continue to be important to this region," said Ryan, "and Cascadia is in a position to be a key resource to the community for the long term.'

In his free time, Ryan enjoys fly fishing, brewing beer and working on restoring his classic car. Give him a call at 509-436-1601 or email ryanw@cascadiacd.org.

CASCADIA WILL NO LONGER HOST A NATIVE PLANT SALE

Landowners looking to do large scale restoration with bare root stock can order directly from the WA Association of Conservation Districts Plant Materials Center in Bow, WA.

For landowners looking for smaller quantities we recommend visiting a native plant nursery that specializes in Eastern Washington plants.

Here's a few options to get you started:

- Derby Canyon Natives Deeproots Landscaping & Nursery, Inc.
- Plants of the Wild
- South Douglas Conservation District
- Wildlands, Inc.





Staff Members

Mark Amara, Archaeologist Kirk Beckendorf, Environmental Educator MarySutton Carruthers, Resource Specialist II Kathleen Deason, Administrative Assistant Peggy Entzel, District Administrator Patrick Haggerty, Forestry Program Manager Valerie Hampton, Administrative Assistant Kim Lancaster, Archaeologist Sandy Letzing, Resource Specialist II Ken Muir, Project Coordinator II Amanda Newell, Education & Outreach Nada Wentz, Office Assistant Ryan Williams, Program Director

Board of Supervisors

Josh Koempel, Chair Junell Wentz, Vice Chair Dillon Miller, Auditor Jim Bartelme, Member Amy Bridges, Member Larry Cordes, Associate Hal Hawley, Associate

The Conservation Quarterly is published on a quarterly basis by Cascadia Conservation District.

Please Remember to Recycle

This newsletter is funded in part by grants from the Washington State Conservation Commission and other public and private granting entities.

UPCOMING MEETINGS & EVENTS

Cascadia Conservation District Board Meetings*

Nov 20 Call our office for details 1:30 - 4:00 pm Call our office for details 1:30 - 4:00 pm Dec 18 Jan 15 Call our office for details 1:30 - 4:00 pm

*Meetings will be call-in or video conference only until the Governor's order is lifted. Watch our website or call 509-436-1601 for updates.

Entiat Watershed Planning Unit Meeting

TBD Call our office for details 10:00 am - 12:00 pm

Wenatchee River Institute

Glaciers of the North Cascades with Jon Riedel, geologist at North Cascades National Park

Nov 10 Via Zoom and Facebook TBD

Cascade Volcanos with Seth Moran with USGS Cascades Volcano Observatory

Nov 17 Via Zoom and Facebook TBD

Wenatchi Dialect (Nxa?amxcin) Language Class

Tuesdays Via Zoom 6:00—7:00 pm Nov 24, Dec 1, 8, 15, & 29

For questions are additional info regarding WRI events visit: www.wenatcheeriverinstitute.org or contact Rachel Bishop at rbishop@wenatcheeriverinstitute.org.

WE NEED YOU...



...TO JOIN OUR BOARD OF SUPERVISORS...

ascadia Conservation District is self-governed by a Board of Supervisors who work to establish priorities, set policy and direct the work of Cascadia staff.

Registered voters residing in Chelan County who are interested in guiding local conservation efforts are encouraged to run for office or apply for appointment.

Board members are unpaid volunteers who serve a three-year term and must be available to attend monthly meetings. We have one elected and one appointed position to be filled in early 2021.

Cascadia also encourages community members to attend our monthly meetings, and consider becoming an associate supervisor to offer additional local expertise and perspective on community natural resource concerns. These positions are also voluntary, with no specific term and are established by appointment of the Board. Your input is welcome!

...AND TO VOTE!

The next election will be held in early 2021. Watch our website for filing information, official dates and other announcements. Please call (509) 436-1601 with election questions.