

Conservation Education & Interpretive Services

Accomplishment Report 2018

Lake Tahoe Basin Management Unit



Mission and Goals

Lake Tahoe Basin Management Unit (LTBMU) Conservation Education Program works with partners and volunteers to deliver programs to youth, local communities, formal and non-formal educators, and visitors to National Forest Lands. Programs connect people with nature, promote environmental literacy, provide ecological restoration opportunities, and create future land stewards. Programs support understanding of four theme areas:



Fuels Reduction and Forest Health

Healthy forests are fire tolerant, disease and insect resistant and contain a sustainable population of native plants and wildlife.



Watershed Restoration and Habitat Improvement

Healthy watersheds consist of a mosaic of habitat types and are vital to clean abundant supplies of water.



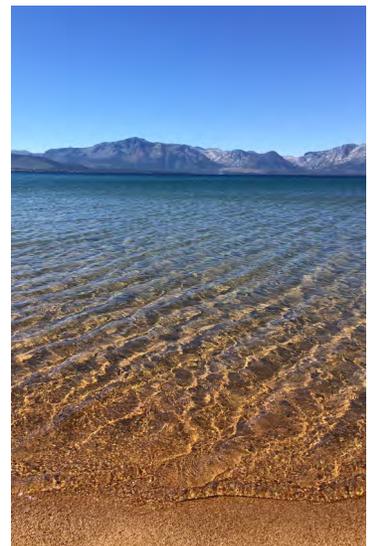
Water Quality Improvement

Controlling erosion and reducing the Total Maximum Daily Load (TMDL) around Lake Tahoe improves water quality.



Recreation and Human Responsibility

Everything we do leaves an impact on something else. Conserving Lake Tahoe is everyone's responsibility.



On the cover: Generation Green alumni and crew leader, Goody Walowit looks out at Lake Tahoe.

From the top down: Fire & Fuels presentation for sixth-graders; meadow at Taylor Creek; Generation Green crewmember fixing trail; Staff person helping student during Winter Trek; Blue Waters Exchange participants looking closely at native Hawaiian plants; waters of Lake Tahoe at Nevada Beach.

Why Conservation Education Matters

Increasing youth and adult environmental literacy about forests and natural resources is critical to the accomplishment of the Forest Service mission. Conservation Education is a powerful tool in protecting the land and teaching the local and visiting public to enjoy and care for the natural environment. After fourteen years of working with partners and with the community, we see measurable benefits that Conservation Education provides to the environment, people, and agency, including the following:

- **Builds capacity and creates and empowers land stewards** by connecting local communities and visitors with nature. By improving public understanding of natural resources processes and issues, these programs create better collaborative capacity of communities to engage in discussion to identify, address, and resolve natural resource issues today and in the future.
- **Promotes a better understanding of the role and mission of the Forest Service** and its projects, leading to more support and engagement from the community.
- **Supports activities that provide health and wellness benefits.** As people's time and interest become increasingly indoors and with screens, research shows that time outdoors and connection with nature can improve health and wellness.
- **Encourages other organizations to value community engagement** and include conservation education as part of their mission and resource work.
- **Increases interest and workability in natural resource careers.** Employment and work programs invest in the future of local youth and contribute meaningful economic and opportunities.
- **Celebrates diversity on public lands** and reaches traditionally underserved groups. Emphasis on diversity, inclusion, and accessibility increases awareness of public lands and adds perspective and representation to underrepresented groups in natural resources.



Animals Station at Outdoor Explore

***Individuals reached by
Conservation Education
Programs and Events in 2018:***

95,035 total individuals

***Volunteers and interns with US
Forest Service Conservation
Education programs in 2018:***

**103 total volunteers &
interns
contributed 23,902 total
hours**



Blue Waters Exchange

Highlights

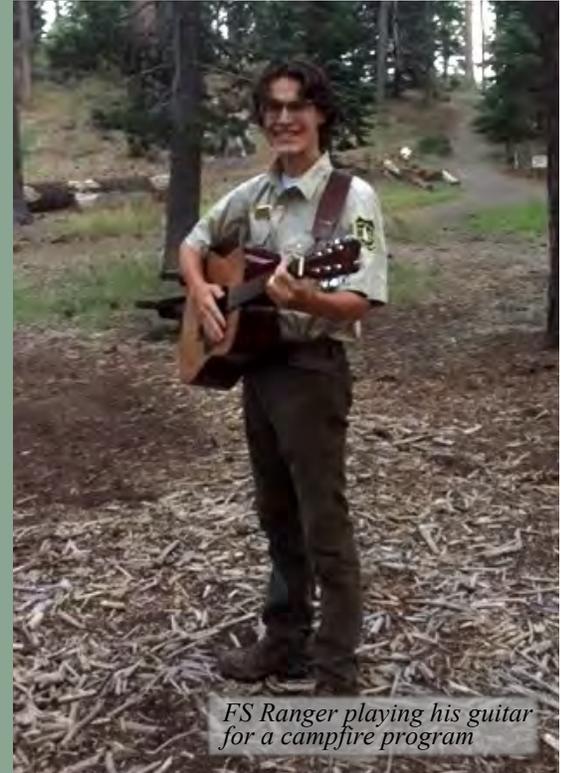
Each year Conservation Education seeks exciting opportunities to build new programs and enhance existing ones. This year's highlights demonstrate the power of partnerships to provide high quality conservation programming and increased community outreach.

California Land Management (CLM): Combining Education and Recreation

"I'm so glad to see the Forest Service here!"

—Campfire program participant

California Land Management (CLM) and the LTBMU Interpretive Services and Conservation Education program worked together as partners to deliver programs to youth, the community, formal and non-formal educators, and visitors to National Forest System (NFS) lands. These programs enhanced visitor experiences and capitalized on the opportunity to educate all types of outdoor recreationists, especially campground guests at Fallen Leaf Campground. The goals were to inform the general public with a deeper understanding of the role of the Forest Service, helping to connect people with nature, promote environmental literacy, provide ecological restoration opportunities, and create future land stewards. Campfire with a Ranger and Walk with a Ranger were both hosted at the campground, engaging the public on a weekly interpretive program focusing on natural and cultural history of the Lake Tahoe Basin. Visitors enjoyed programs such as "Be Bear Aware", "Wilderness Journey", "Tall Tales and Silly Songs," and even a visit from Smokey Bear to learn about fire prevention.



FS Ranger playing his guitar for a campfire program

607 recreationists engaged and educated



Barton patient outing at Taylor Creek

Barton Health: Nature as Medicine

"Wellness means working together to improve the community's health simply by being in nature." —Megan Dee, Conservation Education Program Specialist

Lake Tahoe Basin Management Unit and Barton Health, the community's only local hospital, formed a partnership to provide patients a connection to the healing powers of nature by accessing Forest Service lands. USFS staff supported the general public's inquiries about the Forest Service and natural and cultural history information and education. "Community Wellness Outings" led by USFS Rangers introduced attendees to natural and cultural history of the Lake Tahoe area. These one to two hour walks were guided by knowledgeable staff to provide the opportunity for patients to engage and connect with nature and be free of daily illness and disability stresses. These outings and partnerships signal a shift in valuing nature and time outdoors as a powerful tool, not only in treatment, but wellness and prevention as well.

140 participants experienced the health benefits of nature

Tahoe Basin Watershed Education Summit: Restoration with Cultural Context

“You’re not just reading about it in a textbook, you’re seeing it in real life.”

—TBWES participant

This year marked the 7th annual Tahoe Basin Watershed Education Summit (TBWES), which is an outdoor, interdisciplinary environmental education program hosted by a number of dedicated partners from around the Lake Tahoe Basin. Each fall, selected high school participants from schools around the Lake Tahoe area learn about watershed and ecosystem health while performing hands-on citizen science alongside a variety of natural resource experts in the field. Students gain experience collecting data, using scientific instruments, creating their own art, and working together as a team while gaining exposure to career and educational paths. With the addition of a new partnership with the Washoe tribe, participants received a special cultural presentation on Washoe traditions, values, and history. Students learned about a restoration project that would allow the Washoe to manage the Meeks Meadow area in a more traditional way. Participants gave back to the land and contributed to the project by thinning hundreds of small conifers in the meadow led by the Washoe tribe.



TBWES participants preparing for meadow restoration work

35 youth connected with the land

YCC Residential: Showing Youth Their Potential



YCCR crewmembers looking at a Desolation Wilderness map with a ranger

“I thought that if I could do this, then I could do anything.” —YCCR member on backpacking in Desolation Wilderness

Two youth from Central California, two from Nevada, one from Iowa, and one from Massachusetts made up the LTBMU’s first Youth Conservation Corps Residential (YCCR) crew in summer 2018. The six crew members traveled to Lake Tahoe to live and work on the Unit for four weeks. In addition to daily project work including trail work, meadow restoration, and facilities maintenance, crew members also enjoyed evening and weekend activities including horseback riding, kayaking and hiking. With the work experience, professional development trainings, and meeting a variety of natural resources experts, the crew gained valuable professional skills and networks to propel them into their future career and education paths. From learning to work with others to living away from home, the summer experience pushed each member out of their comfort zones which helped them gain teamwork skills, confidence, and self value. The crew left with an appreciation of the Lake Tahoe environment, gained skills and knowledge to apply back home, and developed a lifelong bonds with their crewmates.

6 youth challenged and inspired

Accomplishments

As the “Face of the Forest Service,” Conservation Education staff participated in a variety of festivals and events to educate the public and students, working with volunteers and partners. Many of the educational programs listed are offered in partnership with the South Tahoe Environmental Education Coalition (STEEC), a collaborative network of more than 25 local agencies and organizations “dedicated to bringing high quality environmental education programs and projects to Lake Tahoe.”

Events, Trainings, and Workshops

Tahoe Forest Stewardship Day: annual partner event focused on ecological restoration (158 individuals)

North and South Shore Science Expos: hands-on activities and science experiments for third through fifth grade students and community members (2,246 individuals)

South Lake Tahoe Earth Day: forest health and fire ecology education to visitors, providing Forest Service presence along with multiple local partners (475 visitors)

Annual Lake Tahoe Summit: educated public about the USFS and LTBMU. Hosted by senator Dianne Feinstein and other political leaders. Generation Green received recognition from the senators on the stage. (750 visitors)

Hike with a Ranger: 1 hour weekly interpretive hikes led by conservation education staff at Heavenly Mountain Resort (450 visitors)

Barton Walks: conservation education staff led wellness outings to encourage the power of nature’s healing and mindfulness (140 individuals)



Workability Event: outreach to students with minor to severe disabilities. Educated students on future career opportunities with the U.S. Forest Service (150 students, 23 educators)

National Public Lands Day: event in honor of the celebration of all Public Lands hosted with partners (75 individuals)

Day of the Young Child: tree lessons and activities at community event for multiple organizations to outreach to families with young children (50 individuals)

Washoe Earth Day: wildlife and habitat education at event hosted by the Washoe tribe (120 individuals)

SNC Undergraduate student presentation: two presentations for Sierra Nevada College students focusing on land management and the role of interpretive services (20 students, 1 instructor)

Partner & Friends Orientation: raining offered to frontline staff from businesses, other agencies, and visitor centers around Lake Tahoe to ensure accurate information about USFS sites (16 attendees)

Educational Programs

Tahoe Outdoor Explore
K-2nd grade
(870 students, 25 adults)

Wonders of Water Expanded Edition (WOWEE)
K-5th grade
(1,250 students, 41 educators)

Trout in the Classroom,
2nd grade
(250 students, 9 educators)

Tahoe Children’s Forest,
3rd, 4th grade
(531 students, 16 adults)

Heavenly Epic Discovery field trips,
4th grade, 6th grade
(697 students, 12 adults)

Heavenly Epic Winter
5th grade
(325 students, 12 adults)

Fire Ecology & Defensible Space,
6th grade
(307 students, 12 adults)

Tahoe Basin Watershed Education Summit (TBWES)
9th-12th grade
(29 students, 9 adults)

Trout Creek Outing
6th grade
(65 students, 3 adults)

Parbajitos Lessons
K-7 grade
(92 students, 8 adults)

CLM Partnership Programs
(607 attendees)

Earth Day EKIP Boat Day
4th grade
(340 students, 4 teachers)



Watershed Activity at WOWEE



Summer Employment Program



YCC summer interns improving trails

The Generation Green youth employment program runs for eight weeks in the summer, giving hired youth meaningful work experience and mentorship. Through this transformative opportunity, students gain valuable professional skills and networks, earn college credit, and develop leadership skills and natural resource knowledge while working on their public lands. The program outreaches to students not traditionally connected to the forest, including low-income and diverse students. The program hires young adults as Youth Conservation Corps enrollees and via our partner, the Great Basin Institute. The program was also supported by a \$25,000 donation from Tahoe Fund and numerous contributions from partners (see back page).

After outreaching to 375 students, eleven youth were accepted into the program as first year crew members, while 18 past Generation Green returnees and newly hired interns for the program worked on the LTBMU through multiple hiring paths. New this year to the summer program was the addition of a YCC Residential crew, comprised of six students from across the U.S. who came to live and work in Lake Tahoe for four weeks. This year's program included work such as trail building, engineering projects, and ecosystems restoration. Summer crews completed a total of 3,600 work hours.



Club members volunteering at Earth Day

South Tahoe High School Club

Throughout the school year, engaged summer program graduates and other involved high school students lead the Generation Green high school club. Club members experience outdoor volunteer and educational opportunities with the Forest Service and partners. In addition, involvement in the high school club helps build and continue relationships with the school and the students, empowers youth to become leaders on their campus and in their community, and prepares students for higher education and employment opportunities.

Expanding Generation Green Beyond High School

Conservation Education continues to expand and enhance the Generation Green scope through the continuation of our newer programs that outreach to younger students as well as engage older audiences.

Running for three years, Generation Green Junior is a club for South Tahoe Middle School students designed to improve students environmental literacy and introduce them to the various agencies and organizations committed to the conservation and improvement of Lake Tahoe. Potential career and educational paths are also incorporated including the high school summer internship and club volunteer opportunities.

The Blue Waters Exchange, which completed its first full program year in June 2018, empowers and supports the growing network of Generation Green alumni who are in their college years or early careers. Through a partnership with the non-profit organization called Kupu Hawaii, selected Generation Green alumni participate in a conservation and cultural exchange experience with alumni of the Kupu internship programs. The first group to participate in this exchange was comprised of four Generation Green alumni and five Kupu alumni, travelling together around Northern California and the Hawaiian Islands.



Blue Waters Exchange in Hawaii

35 2018 Summer and Yearlong Interns*

40 2018 High School & Middle School Club Members

9 2018 Blue Waters Exchange Participants

200 Youth that have gone through the Lake Tahoe Generation Green program 2008-2018

*hired through Pathways YCC, GBI, Hispanic Access Foundation, Greening Youth Foundation, or Kupu Hawaii

Taylor Creek Visitor Center



Summer Interpretive Programs

Taylor Creek Visitor Center is a summer seasonal location operated by the Forest Service in the Lake Tahoe Basin. It's largely an outdoor site, with several interpretive trails that lead to a pristine creek environment or to the sandy shores of Lake Tahoe. The visitor center itself acts as an information hub for the South Shore, providing in-depth knowledge of the Basin's natural and cultural history and recreation opportunities. With the Great Basin Institute as the site's new interpretive partner, Taylor Creek offered programs and events that allowed the public to learn about the natural area in a variety of ways, for a variety of ages. From guided tours and hour-long children's programs, to evening series such as moonlight walks or guest speakers, the visitor center offers many opportunities to learn about the natural environment and the importance of conservation.

Summer programs and events: 13,523 visitors total

- ◇ Rainbow Trail Guided Walks
- ◇ Jr. Forest Ranger
- ◇ Smokey Bear & Fire Prevention
- ◇ Lake Tahoe Wildlife Care Center Presentations
- ◇ Tahoe Institute of Natural Science Moonlight Walks
- ◇ Amphitheater Showings
- ◇ Native Species and Birds Festival



Guided Rainbow Trail Walk



Kokanee Salmon program

Fall Programs and Events

In October, Kokanee Salmon run up Taylor Creek in substantial numbers offering a real life example of animal life cycles and behavior. The site hosts the Fall Fish Festival annually where the public can learn more about Tahoe wildlife and fish and the sensitive ecosystems they inhabit while meeting and learning from Forest Service staff and partner booths. Additionally, third grade classes can enjoy guided walks that cover core science standards, in both Nevada and California.

Fall programs and events:

11,138 visitors total

- ◇ Kokanee Salmon guided walks for classes (25 elementary schools, 1,538 students, 50 adults)
- ◇ Fall Fish Festival (9,550 visitors)

Tallac Historic Site

Tallac Historic Site operates during the summer season by the Forest in the Lake Tahoe Basin. The site features historic summer estates of the wealthy vacationing families who enjoyed Lake Tahoe in the 1920s to 1960s. Visitors enjoy a wide array of events, tours, and programs that focus on the cultural and natural history of the area and provide the public a better understanding of Lake Tahoe's rich history and the importance of the Forest Service's value in historical and cultural preservation. The site and its many interpretive programs for the public operates in partnership with the Tahoe Heritage Foundation for funding and volunteer power.



Special Events, Tours, Interpretive Programs

Visitors can get a glimpse of the estate and learn more about the era through the special events and tours that recreate living history for the public. From cooking to fashion to historic kids games, interpretive programs offered throughout the summer immerse guests in the history of Lake Tahoe and the site. In the 2018 summer, 58,666 visitors of all ages enjoyed the many educational and interactive experiences offered at Tallac Historic Site.



Programs:

- ◇ Interpretive Services at the Boathouse, Blacksmith, and Museum
- ◇ Artist workshops
- ◇ Washoe Ways
- ◇ Kitchen Kids
- ◇ Guests of the Vatican Lodge
- ◇ Tea and Scones
- ◇ Afternoon with Anita
- ◇ Tea with Mrs. Tevis
- ◇ Fashion Reflects the Times
- ◇ Talking with the Blacksmiths
- ◇ Museum docents

Special Events:

- ◇ Heritage Days
- ◇ Great Gatsby Festival

Tours:

- ◇ Pope House Tours
- ◇ Estate Walks
- ◇ Veteran's Group Tour
- ◇ Tahoe Terror

58,666

Total visitors reached through Interpretive Services and Conservation Education programs



Valued Partnerships

The quality, capacity, and reach of these conservation education programs would not be possible without the collaboration, support, and efforts of valued partnerships.

South Tahoe Environmental Education Coalition (STEEC) partners and program supporters:



- Ag in the Classroom
- Barton Health
- Boys and Girls Club of Lake Tahoe
- California Tahoe Conservancy
- Lake Tahoe Community College
- Lake Tahoe Unified School District
- League to Save Lake Tahoe
- Sierra Avalanche Center
- Sierra Watershed Education Partnership
- South Tahoe Public Utilities District
- South Tahoe Refuse
- Sugar Pine Foundation
- Tahoe Family Resource Center
- Tahoe Institute for Natural Science
- Tahoe Regional Planning Agency
- Tahoe Resource Conservation District
- Tahoe Rim Trail Association
- UC Davis Tahoe Environmental Research Center
- UC CalFresh & 4-H
- University Cooperative Extension
- Vail Resorts



Students collecting macroinvertebrates during TBWES

- Washoe Tribe
- Zephyr Cover Resort

Winter and summer programs partners:

- California Land Management
- City of South Lake Tahoe
- Great Basin Institute
- Heavenly Mountain Resort
- Tahoe Heritage Foundation

Lake Tahoe Generation Green and YCC program partners:

- Boys and Girls Club of Lake Tahoe
- California Land Management
- George Whittell High School
- Great Basin Institute
- Kupu Hawaii
- Lake Tahoe Community College
- Mt. Tallac Continuation High School
- South Tahoe High School
- Tahoe Fund
- Tahoe Rim Trail
- Youth Conservation Corps



Generation Green backpacking