



# Big T Wash Line

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## In this issue



*Big T's Native Fish*

• 2 •



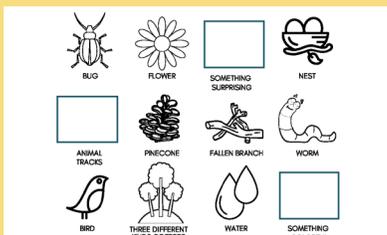
*Big T Annual Cleanup*

• 4 •



*Weed Management at Big T*

• 5 •



*Kid's Corner*

• 6 •



## About the Big Tujunga Wash Mitigation Area

**“Big T” is a conservation area located in the City of Los Angeles Sunland area (see Page 6).**

The Big Tujunga Wash Mitigation Area (Big T) covers an area of approximately 210 acres of sensitive habitat, encompassing the Big Tujunga Wash and Haines Canyon Creek. The site was purchased by Los Angeles County Public Works in 1998 as compensation for habitat loss for other Public Works projects.

Public Works' implementation of the Master Mitigation Plan for Big T has been underway since April 2000. Big T protects one of the most rapidly diminishing habitat types found in Southern California: willow riparian woodland.

The site is home to several protected species of fish, including the Santa Ana sucker, Santa Ana speckled dace, and arroyo chub. It also contains habitat for sensitive bird species such as the least Bell's vireo and southwestern willow flycatcher.

The purpose of this newsletter is to provide updates to ongoing programs and to explain upcoming enhancement measures that will be implemented on the site. Newsletters are published on a semi-annual basis in the spring and fall.

**More information can be found at:**  
[pw.lacounty.gov/wrd/projects/BTWMA](http://pw.lacounty.gov/wrd/projects/BTWMA)



Haines Canyon Creek

## Big T's Native Fish

When thinking of freshwater native fish in Southern California, trout species often come to mind. However, there are many lesser-known native fish species in Southern California and three of them inhabit waterways at Big T: arroyo chub (*Gilia orcutti*), Santa Ana speckled dace (*Rhinichthys osculus* ssp.), and Santa Ana sucker (*Catostomus santaanae*). These native fish play an important role at Big T and are good indicators of the health of the habitat as they rely on clean and flowing waterways for survival. Poor water quality, severe drought, creek obstructions (such as rock dams) that limit movement or trap native fish, and predation by larger, non-native fish species, are all adverse conditions that can reduce the number of native fish present at Big T.



Arroyo chub

Arroyo chub is a California Species of Special Concern that inhabits the Big Tujunga Wash and Haines Canyon Creek. This species is native to coastal streams and rivers within the Los Angeles plain in Southern California, which includes Los Angeles, San Gabriel, Santa Ana, San Luis Rey and Santa Margarita Rivers, and Malibu and San Juan Creeks. The arroyo chub is a small fish with a deep body that can grow to 4.5 inches in length. It is mostly silver in color with a gray or olive-green dorsal (top) region, a white ventral (bottom) region, and a light gray lateral (side) band. Characteristics that help with identifying this species are its large eyes and small, downturned mouth with black lips. Arroyo chub are most common in slow-flowing stream areas with sandy or muddy substrates. They feed on plants such as algae and water fern, and invertebrates and mollusks. Arroyo chub can live up to four years and females can start reproducing at the age of one.



Santa Ana speckled dace

Santa Ana speckled dace is also a California Species of Special Concern native to the Los Angeles, San Gabriel, San Jacinto, and Santa Ana rivers in Southern California that has been observed in Haines Canyon Creek and Big Tujunga Wash. It is a small, slender, streamlined fish that grows to around 4 inches. The dorsal and lateral regions are dark yellow with speckles and spots. The shape and color of this fish is suited to life in flowing water with

*Continue on next page...*

sandy and rocky substrates. Santa Ana speckled dace is a subspecies of the wider-ranging speckled dace. Speckled dace mainly occupy small streams where they feed and forage for aquatic insects; however, they are very adaptable and can also be found in larger rivers and deep lakes where they may also feed on zooplankton and algae. Speckled dace have a typical lifespan of three years (and can live up to six years), but don't start to reproduce until their second year.



Santa Ana sucker

Santa Ana sucker is a federally listed threatened species and California Species of Special Concern whose historic range included the upper watersheds of the San Bernardino and San Gabriel Mountains all the way down to the Pacific Ocean. Today they inhabit small, select areas of the San Gabriel, Santa Ana, and Los Angeles River basins in Southern California, and have been observed in Haines Canyon Creek and the Big Tujunga Wash. The Santa Ana sucker has a distinct look compared to the other native fish that occupy the same watersheds, as it has small, downturned mouthparts adapted to scraping and vacuuming up algae and small invertebrates. Santa Ana sucker have black splotches on their dorsal region and the ventral region is white with gold flecks. Its pectoral fins are situated on the sides

of its body like a shark. Santa Ana sucker occupy perennial streams (such as Haines Canyon Creek) in water depths from just a few inches to 3 feet deep. They seek out deep flowing pools with vegetation they can hide under and prefer boulder, cobble, and gravel substrates that provide surfaces where algae can grow. Santa Ana sucker live for about four years and can reproduce by their second summer.

Threats to these native fish species include severe drought conditions that dry up the stream habitat in which they live, floods that can remove vegetation that the fry (juvenile fish) use for cover after they hatch, and predation by predatory birds including herons and egrets, and non-native aquatic species including largemouth bass, red-swamp crayfish, and turtle species. Other factors that have contributed to declines of these native fish species in their historic ranges include dams that divert water, habitat loss, urbanization, grazing, agriculture, mining, recreation, and pollutants. Both natural and man-made disasters have created challenges for these species at Big T as seen with the 2017 Creek Fire, and severe drought conditions in summer 2022 that dried up Haines Canyon Creek.



Biologist using a seine to capture and remove invasive aquatic species from Haines Canyon Creek.

Chambers Group biologists have and continue to employ several maintenance programs to help native fish species thrive at Big T. These methods include regular efforts to remove non-native aquatic species from the Haines Canyon Creek and Tujunga Ponds, regular inspections and maintenance of the fish exclusionary screens located near the outflow of the West Tujunga Pond, trail realignment efforts in 2019 to reduce the number of creek crossings, and exotic plant removal efforts in the riparian habitat along Haines Canyon Creek. During non-native aquatic species removal, biologist use dip nets, beach seines, and other methods to capture and remove non-native aquatic species from the creek and ponds. Biologists also regularly inspect and maintain the fish exclusionary screens, which were installed to prevent large, predatory fish species such as largemouth bass from migrating downstream into creek

from the ponds. In 2019, trails were realigned to eliminate several creek crossings. This was done to protect native fish species that are sensitive to changes in water quality (crossing the creek turns up the stream bottom and disperses sediment into the water column) and to protect the native fish and their eggs from being trampled. The regular removal of exotic plants species from riparian habitat along the banks of the creek reduces competition for water resources and allows native plant species to thrive, thus providing more hunting, spawning, and hiding places for native fish species.

In addition to maintenance efforts, public outreach is conducted by Chambers Group biologists during summer, peak-use weekends to provide the public information on Big T's plants and wildlife, including native fish. This includes guidance on how to protect Big T such as staying on the trails, picking up litter, and refraining from altering or entering the creek. With these protections being shared and practiced we can continue to improve native habitats at Big T and help native wildlife species to prosper.

# Big T Annual Cleanup Day

The 14th Annual Trail Cleanup Day was conducted on Saturday, January 21, 2023, between the hours of 8 a.m. and 12 p.m. A total of 11 participants gathered and assisted with the cleanup which included members from Public Works, Chambers Group, and community members.

Prior to the start of the cleanup, participants gathered at the staging area for a safety discussion. Participants were then divided into two teams. One team began on the trails north of the Cottonwood Avenue entrance and continued working east while the other team began at the Wheatland Avenue entrance and worked their way east (upstream) along Haines Canyon Creek towards the Cottonwood Avenue entrance. Trash observed within the trails and creek was collected, placed in heavy duty trash bags, and transported to a staging area. A total of 40 bags of trash were collected and removed from various locations throughout the site. In addition, bulky items that did not fit in trash bags but were reasonable to carry, were collected and removed. Smaller debris items collected throughout the site included plastic bottles, glass bottles, wrappers, spray paint cans, shoes, batteries, tennis balls, and clothing. Bulky items collected throughout the site included shopping carts, large trash bins, engine oil and antifreeze containers, propane tanks, toilets, chairs, shovels, tires, and road signs.



Volunteers help out with the Big T Annual Cleanup

included a portable toilet seat and PVC pipe leading to a pit with human waste just a couple feet from the banks of Haines Canyon Creek. Two additional encampments were observed approximately 100 feet away and included a cabana-like set up, landscaping, personal hygiene items, plastic buckets containing bleach for washing, and a grill for cooking. Most of the items observed would have required more time and manpower to remove, and as such, a larger effort will be coordinated with Public Works to remove the remaining trash, debris, structures, hazardous materials, and other bulky items from the site.

The trash items observed and collected can harm sensitive resources, habitats, and special status plant and wildlife species. Toxic substances such as engine oil, antifreeze, and bleach can pollute aquatic habitats and harm native wildlife (including special status species) found within Haines Canyon Creek. Other hazards observed included the introduction of ornamental, non-native plants, and accumulations of human waste which can negatively impact the site. The introduction of non-native plants can alter native vegetation communities and affect the wildlife species that rely on these communities. The presence of propane and other flammable substances on the site is a major concern as they increase fire danger both at Big T and neighboring communities.



Example of elaborate bathroom system and other debris items encountered during the cleanup effort.

Some of the trash items collected were found near or within illegal encampments observed along Haines Canyon Creek away from the authorized trails. At one of the encampments near the Wheatland Avenue entrance, pots, pans, tents, clothing, wooden pillars, tarps, utensils, and a vehicle seat were observed. Across from the encampment was an elaborate bathroom system that

The 14th Annual Trail Cleanup Day was a great success with the manpower and resources available; however, only a small percentage of the trash present was able to be removed. Additional cleanups are needed to address larger debris items at illegal encampments and dump sites. Big T needs every individual's help to support habitat recovery and maintain a clean site. The 15th Annual Trail Cleanup Day is planned for fall 2023. Please stay tuned for more information and join us in our efforts to keep Big T a clean and enjoyable place for all.

# Integrated Weed Management at Big T

Integrated Weed Management (IWM) is an adaptive approach to the maintenance and suppression of non-native weed species that utilizes a combination of manual, mechanical, and chemical (herbicide) means to address non-native weed establishment. Selection of these methods is determined based on the specific weed species and conditions at Big T, and takes into account multiple factors, including the developmental stage of the weeds, environmental conditions, sensitive wildlife or plant species in the area, human safety, and others. The selective use of herbicide is a safe and efficient method for weed control when other means are determined to be less effective or would cause more disturbance to the surrounding native habitat.

Herbicide methods are preferred for treating weeds early in their life cycle, while the plants are still small and actively growing. Treating weeds while they are growing prevents them from out-competing native vegetation and developing seeds, and reduces the total amount of non-native biomass in the environment. While manual methods can also be used before the weeds are done actively growing, these methods create more disturbance to the surrounding habitat because they involve physically removing weeds from the ground and surrounding vegetation. For example, using weed whippers can create dust and noise disturbances for native wildlife and the surrounding habitat. In addition, hand pulling weeds can disturb and loosen the soil and may create favorable conditions for weeds to re-establish, so soil disturbance should be avoided as much as feasible.

The adaptive IWM strategy is designed to change as the weeds develop and/or environmental conditions change. For example, as weeds mature and develop, manual removal methods are more effective and herbicide is no longer the appropriate method. Being aware of changing environmental conditions, carefully monitoring the effectiveness of each method, and adaptively switching methods when appropriate are key to successfully implementing the IWM strategy.

All herbicide treatments at Big T will be conducted under the supervision and guidance of licensed biologists and restoration technicians, who are trained to use herbicides in a safe manner with respect for the environment, wildlife, and human health. Only herbicides that are known to be safe for the environment will be used. Roundup® (glyphosate) will not be used. Selection and application of herbicides will be based on the area and the intended target species to minimize damage to native vegetation.



Castor bean removal



Weed whipping non-natives along Wentworth Avenue



Weed whipping non-natives around the equestrian center

# Kid'S Corner

## Nature Scavenger Hunt

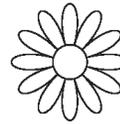
*How many treasures can you find?*

**Directions:** As you discover each item, color in the picture or draw/write what you found in the box.

Feel free to take photos of your discoveries, but leave these treasures where you found them so others may enjoy them too.



BUG



FLOWER



SOMETHING SURPRISING



NEST



ANIMAL TRACKS



PINECONE



FALLEN BRANCH



WORM



BIRD



THREE DIFFERENT KINDS OF TREES



WATER



SOMETHING COLORFUL



SEED



SOMETHING BEAUTIFUL



THREE DIFFERENT KINDS OF ROCKS



SQUIRREL

What else did you find? Write or draw an item you found interesting that wasn't on this list:

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## Report emergencies and incidents such as fire call 911

- To report minor incidents or regulation infractions contact Los Angeles County Sheriff's Department, Parks Bureau Trails Team at (323) 845-0070. (Please DO NOT use 911.)
- Do not attempt to enforce regulations yourself; please allow law enforcement to handle the situation or incident.
- For emergency follow up or to report minor incidents, obtain information, or get questions answered (8 a.m. to 5 p.m., Monday through Thursday), please contact:

### Los Angeles County Public Works

900 S. Fremont Ave  
Alhambra, CA 91803

Email: [BTWMA@pw.lacounty.gov](mailto:BTWMA@pw.lacounty.gov)

## Where is the Big Tujunga Wash Mitigation Area?

Downstream of Big Tujunga Canyon, in Lake View Terrace and south of the 210 freeway, there is a native riparian (water loving plant) natural area filled with cottonwoods, willows, and pools of water that support many native aquatic species.

Check out the Big T website for more information at:

[pw.lacounty.gov/wrd/projects/BTWMA](http://pw.lacounty.gov/wrd/projects/BTWMA)

