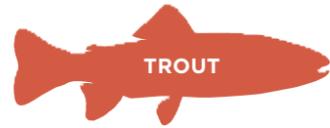


California Golden Trout

Oncorhynchus mykiss aguabonita

chances for survival:
poor

2



California golden trout, the official state fish, is one of three species of brilliantly colored trout native to the upper Kern River Basin; the others are the Little Kern golden trout and Kern River rainbow trout.

California golden trout evolved in streams of the southern Sierra Nevada Mountains, at elevations above 7,500 feet. The Kern Plateau is broad and flat, with wide meadows and meandering streams. The streams are small, shallow, and have only limited vegetation along the edges. The exposed nature of these streams is the result of intensive grazing of livestock in the fragile landscape, which began in the 1860s. The stream bottoms are mostly volcanic sand and gravel with some cobble. The water is clear and cold, although summer temperatures can fluctuate from about 37 to 68°F.



PHOTO: JOE FERREIRA

California Trout is There for the Fish!

Protecting California golden trout has been a major conservation focus for California Trout for over a decade. Working first to develop a watershed group in 1995 and then collaborating with the Inyo National Forest, California Trout was instrumental in retiring grazing allotments that provided the means to scientifically assess whether grazing was detrimental to California golden trout and their habitats.

CATEGORY	SCORE	EXPLANATION
Range	1	Native to one watershed, but they now contain hybrid trout. "Pure" California golden trout are confined to a few small tributaries
Population size	2	Tributary populations show signs of genetic limitations, but probably still contain 100 to 1,000 non-hybrid adults, although the population size could be smaller
Intervention needs	3	Non-hybridized fish require maintenance of barriers and continued vigilant management
Tolerance	2	Require conditions present in relatively undisturbed small alpine streams
Genetic risk	1	Hybridization with rainbow trout is constant high risk
Climate change	3	Risk declines with better watershed management
Overall status	2	
Reliability	4	Well documented in scientific literature

DISTRIBUTION: California golden trout are endemic to South Fork Kern River and to Golden Trout Creek. They have been introduced into many other lakes and creeks in and outside of California, including the Cottonwood Lakes not far from the headwaters of Golden Trout Creek and into the headwaters of South Fork Kern River, such as Mulkey Creek. The Cottonwood Lakes have been a source of golden trout eggs for stocking other waters and are still used for stocking lakes in Fresno and Tulare Counties. As a result of widespread stocking in California, golden trout are now found in more than 200 high mountain lakes and streams outside of their native range. Many of these populations have hybridized with coastal rainbow trout. Golden trout are also widely distributed in lakes and streams of the Rocky Mountains, but most populations there are also hybridized with both rainbow and cutthroat trout.

ABUNDANCE: When the first major California Department of Fish and Game habitat management plan was issued in 1965, there were about 2,400 to 15,600 golden trout in Golden Trout Creek (19 miles) and 4,000 to 26,000 in the South Fork Kern River (31 miles). It is estimated that unhybridized fish exist today only in about three miles of Volcano Creek with only 400 to 2,600 "pure" golden trout left today, a decrease of at least 95% from historic numbers.

FACTORS AFFECTING STATUS: The principal threats to California golden trout are (1) hybridization with rainbow trout, (2) competition and predation from non-native brown trout, and (3) degradation of streams from livestock grazing, which continues even in the Golden Trout Wilderness Area.

STATUS 2: California golden trout have a high likelihood of extinction in 50 to 100 years, if not sooner. A recovery plan for California golden trout has been developed that could reduce the threat of extinction, but it has not been fully

implemented. Major efforts have been made to create refugia for golden trout in the upper reaches of the South Fork Kern River by constructing barriers and then applying the poison rotenone to kill all unwanted fish above barriers. Despite these and other efforts, most populations of California golden trout are hybridized and are under continual threat from brown trout invasions. Management actions are needed to address threats to California golden trout which include hybridization with rainbow trout, competition, and degradation of their streams from livestock grazing, which continues even in the Golden Trout Wilderness Area.

CONSERVATION RECOMMENDATIONS: Management measures should include, (1) repair or replacement of barriers, (2) eradication of all rainbow and brown trout populations that threaten California golden trout, (3) elimination of grazing, and (4) management of recreation to reduce impacts on the trout. The most urgently needed management measure is the repair or replacement of deteriorating fish barriers that exclude brown trout and rainbow trout from the South Fork Kern River.



Mulkey Creek. PHOTO: RICHARD JAMES



California Golden Trout Were Historically Present in South Fork Kern Basin, Part Of The Upper Kern River Basin Shown Here

