

These fish are at the heart of California's water debate. But extinction could be close

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As a young biologist in the 1970s, Peter Moyle remembers towing nets behind boats in the Sacramento-San Joaquin Delta and catching 50 to 100 translucent, finger-length smelt in a matter of minutes.

Moyle doesn't see those days coming back.

"I think extinction is imminent the way things are going," said Moyle, a prominent University of California, Davis fisheries biologist.

State biologists have found hardly any Delta smelt in their sampling nets in the past two years. Consecutive surveys in late April and early May found no smelt at all.

Those results don't mean the smelt have completely vanished. But biologists say the California Department of Fish and Wildlife surveys provide disappointing evidence that the critically endangered [fish](#) are edging closer to extinction. The hope was the fish would show signs of recovery after three comparatively wet winters, including the drought-ending record rains of 2017.

Delta smelt are at the heart of the tensions over California's [water](#) supply and the health of the West Coast's largest estuary.

Giant pumps near Tracy funnel Delta water to 25 million people in Southern California and the Bay Area. They also send water to 3 million acres of San Joaquin Valley farmland.

To protect smelt from getting sucked into the pumps, they often get throttled back or shut off altogether. As a result, water earmarked for the south state flows out to the Pacific Ocean, outraging farmers and other water users. Pumping also alters the Delta smelt's habitat.

Gov. Jerry Brown has made the smelt's survival a talking point in his crusade for the controversial Delta tunnels project, which he says would help the fish while stabilizing declining water deliveries. However, Washington might have other priorities. Campaigning before cheering crowds in Fresno in 2016, President Donald Trump promised to "open up the water" for farmers and mocked "a certain kind of three inch fish."

The smelt's dwindling numbers could affect a proposal by the State Water Resource Control Board to restrict pumping even more and leave more water in the Sacramento and San Joaquin rivers.

Farm lobbyists say the latest survey results provide further evidence of what they have argued for years: Providing more water for smelt doesn't prop up their sagging population.

"Throwing water at the problem doesn't seem to have worked here," said Chris Scheuring, counsel at the California Farm Bureau Federation.

Scheuring said farmers aren't rooting for the smelt's demise. But he said that if the smelt are declared extinct at some point, it would probably loosen some of the restrictions on operating the estuary's pumps.

Smelt may have numbered in the millions as recently as the 1970s. Federal biologists now estimate that as few as 17,000 may still survive in the estuary. The fish have been protected by the Endangered Species Act since 1993.

Environmentalists say preventing the smelt's extinction is crucial, and

they're not ready to give up fighting for the fish. They blame decades of excessive Delta pumping as a key reason for the smelt's demise. The smelt numbers have dwindled to the point that the fish often can't find mates to reproduce, biologists say.

"We as a people are committed to eco-system health ... and we haven't kept our end of the bargain," said [biologist](#) Jon Rosenfield of the Bay Institute, an environmental advocacy group based in San Francisco.

Two small captive populations of Delta smelt are kept at Northern California hatcheries, but Moyle said they need to be refreshed with the DNA of wild fish to stay viable. Moyle said that he would consider the smelt extinct if none were found in the wild after five consecutive years of sampling. Delta smelt have a life cycle of about a year.

The federal government doesn't have any specific criteria it would use to declare the fish extinct, said Shane Hunt, a spokesman for the U.S. Fish and Wildlife Service. He said his agency hasn't yet begun the Delta smelt's death watch.

"We definitely don't want to go there," Hunt said.

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