The Sacramento Bee

April 24, 2006

EDITORIALS

Fish without borders State, feds need same rules for aquaculture

trend continues. California is poised to surpass the federal government with an important environmental regulation. In this case, the issue is "aquaculture," the farming of the sea with penned fish, frequently salmon.

More fish farming is in the world's future, and the key will be breeding those populations without harming the wild, fragile world on the other side of the pens. It isn't easy. And the job won't be easier if governments take wildly different approaches to regulating the same industry.

The vast Pacific Ocean is actually, in the view of government, three oceans. California gets to regulate what happens in the ocean up to three miles from shore. The federal government gets to regulate what happens from this three-mile boundary out to 200 miles. Beyond that, the ocean is considered international waters.

The concept that the Pacific is actually three oceans is not lost on the aquaculture industry, nor should it be. If regulations in one of the three "oceans" are more lax, for business reasons the industry may drift in that direction. For government and ecosystem management purposes, it's important to regulate this industry in a sensible, sustainable way.

Agriculture thus moves to a new setting. Fish products such as salmon are a vital food source. Aquaculture can supplement what nature can provide. The potential downside is that aquaculture can harm nature. Fish, diseased from living in cramped pens, can escape and infect wild populations. If fish raised in the farms are genetically altered to grow faster or resist farm diseases, what happens if they mingle in the wild? Those are the looming issues.

For the three miles of Pacific Ocean regulated by California, SB 201 by Joe Simitian, D-Palo Alto, takes an important step. Any aquaculture operation already has to provide an environmental analysis of its proposed operation. SB 201 provides needed standards for the analysis.

SB 201 would make California's aquaculture rules stronger than those of the federal government and international waters. That is a worry. But that is no reason to ignore the challenges of providing fish products to a hungry world in a sustainable way. The ocean is a hard place to regulate. But do we have much choice?

San Jose Mercury News

May 19, 2006

Environment State fishing for solutions REGULATE FISH FARMS NOW, AVOID PROBLEMS LATER

Fish farming is a fast-growing industry that provides an increasingly important source of food to an expanding world population. But without proper safeguards, fish farms can cause a host of environmental problems that can compromise the health of the oceans and further reduce dwindling populations of wild fish.

That's why Gov. Arnold Schwarzenegger should sign SB 201, the Sustainable Oceans Act.

Written by Sen. Joe Simitian, D-Palo Alto, the bill creates the strictest ocean fish-farming, or aquaculture, regulations in the country. It would govern state waters up to three miles offshore and could serve as a model for national legislation.

The farms grow fish in large underwater pens. While there are thousands of fish farms in North America, especially along the Atlantic and Gulf coasts and off the west coast of Canada, the aquaculture industry remains embryonic in California. It consists largely of freshwater fish, raised in inland tanks, and shellfish, neither of which would be regulated by Simi-

THE OPINION OF THE MERCURY NEWS EDITORIAL BOARD

tian's legislation.

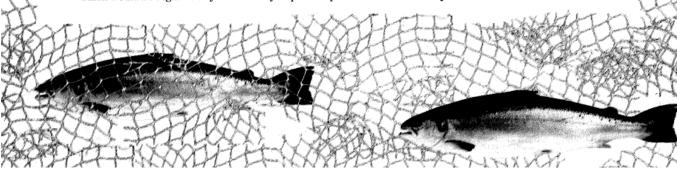
But growing demand in the nation's most populous state is certain to make coastal waters an attractive place to farm fish. SB 201 represents a rare effort to prevent environmental problems before they develop — rather than face a difficult cleanup afterward. The bill would require state reg-

The bill would require state regulators to identify which locations are best suited for aquaculture by considering effects on wild fish, water quality and marine ecosystems. Regulators would also establish standards requiring fish farms to minimize pollution and the use of drugs and other chemicals; to restore any damage they cause to marine habitats; and to monitor their facilities to prevent the escape of farmed fish, which pose a risk of disease and contamination for wild fish populations.

These measures would go a long way to prevent problems that have plagued fish farms and made them a target of environmentalists. In Maine, for instance, a virus that developed in fish farms proved to be a persistent threat to endangered wild salmon populations and required the destruction of tens of thousands of farmed salmon. And the huge amounts of waste produced by hundreds of thousands of fish swimming in large pens have polluted waters off the coast of British Columbia and elsewhere.

Over the past several months, Simitian worked to address concerns raised by the aquaculture industry, which has since dropped its initial opposition to the bill. Some industry members even say clear rules could help foster the growth of fish farms in the state's coastal waters.

Done responsibly, fish farming can help stock California's kitchens with affordable striped bass, tuna and other delicacies. It can create jobs in the state, while protecting the marine environment and the local fishing industry. SB 201 opens the door to the development of responsible fish farms up and down the California coast.



San Francisco Chronicle

May 18, 2006

CALIFORNIA

Fish farm regulations await signature

Nation's first bill to apply environmental rules to aquaculture

> By Jane Kay Chronicle Environment Writer

California will become the first state in the nation to adopt comprehensive controls on future fish farming in its coastal waters, if Gov. Arnold Schwarzenegger signs a tough set of environmental standards that state legislators have approved.

The Sustainable Oceans Act would install provisions for siting and operating aquaculture businesses that produce finfish such as halibut, bass or tuna for the retail market. About 100 aquaculture businesses operate in California, but none of the farms raise finfish. Farm-raising salmon or genetically engineered fish is illegal in the state.

SB201, by state Sen. Joseph Simitian, D-Palo Alto, requires the state to prevent fish farms from interfering with wildlife and marine habitats or with commercial fishing. Farms would have to minimize the use of fish meal and fish oil taken from the ocean, and prevent the spread of disease or the escape of fish into the environment. Regional water-quality boards would issue permits and regulate against pollution discharges to the ocean. The governor has until Wednesday to sign or veto the bill, 12 days after the Legislature passed it. An unsigned bill would become law. A representative of the governor said the bill hadn't reached the governor's desk, and he hadn't taken a public position.

Applicants for fish-farming leases now go to the state Fish and Game Commission; no environmental standards must be met before the commission considers granting a lease.

The California Aquaculture Association, a trade group, said the state's fish farming businesses grow freshwater fish, aquarium stock and aquatic plants. Industry officials say the demand for farmed fish will increase as more people learn about the health benefits of fish and wild ocean supplies are taxed.

State waters extend from the shore to 3 miles out, where federal waters begin and extend another 200 miles to sea. International waters lie beyond that.

The bill was ready to go last fall, according to Simitian's staff, but Resources Secretary Mike Chrisman expressed interest in working with the parties on the bill's content. Chrisman attended the last two of about a half-dozen meetings among representatives of the state Fish and Game Department, environmental groups and the aquaculture and commercial fishing industries.

The Pacific Coast Federation of Fisherman's Associations, a Aquaculture businesses still have concerns over some parts of the bill ... and will take an active role in discussions about state regulations if it becomes law.

commercial fishermen's group, and the nonprofit Ocean Conservancy, Natural Resources Defense Council, Environment California, Bluewater Network, Environmental Defense and Sierra Club California supported the bill. The aquaculture industry was neutral. Sandy Cooney, a spokesman in the Resources Agency, said Chrisman didn't have a position on the bill.

Richard Matteis, who represents the aquaculture association in Sacramento, said the industry removed its opposition to the bill "after the latest amendments and some clarification by the senator over a couple of remaining issues."

Aquaculture businesses still have concerns over some parts of the bill, Matteis said, and will be active in discussions about state regulations if it becomes law.

Tim Eichenberg, Pacific Region director of the Ocean Conservancy, said the environmental groups want to see standards set.

"We want to put these standards in the bill so when consumers buy these products they can be sure that they (the farmed fish) aren't harming the marine environment," Eichenberg said. He said fish farming may be a cause for depleted ocean fisheries rather than a solution. Using chopped up ocean fish to feed farmed fish depletes the net protein production of the ocean, he said.

The pressure to pass a California aquaculture bill has increased in recent months, as Congress considers legislation that would put the National Oceanic and Atmospheric Administration in charge of developing a permit and leasing system for fish farms in federal waters.

The supporters of the state bill say the federal legislation, backed by U.S. senators Ted Stevens, R-Alaska, and Sen. Daniel Inouye, D-Hawaii, doesn't contain strict environmental controls. The federal legislation is before the Commerce Committee's National Ocean Policy Study Subcommittee.

E-mail Jane Kay at jkay@sfchronicle.com.

San Jose Alercury News

May 27, 2006

New law aimed at protecting ocean from fish-farming risks

By Paul Rogers Mercury News

Gov. Arnold Schwarzenegger on Friday signed into law new rules giving California the toughest ocean fish-farming regulations in the United States.

The measure, written by state Sen. Joseph Simitian, D-Palo Alto, is designed to reduce the risk of pollution and harm to marine wildlife from giant floating pens of tuna, halibut or other species that could result if the aquaculture industry expands to the California coast.

"Ocean fish farming can now be part of California's future without sacrificing the environment," Schwarzenegger said. "This legislation will lay the groundwork for a



Simitian Palo Alto Democrat wrote the measure to regulate fish farming. It was signed into law Friday.

new California aquaculture industry to thrive while providing an abundance of healthy food and more jobs."

The bill was supported by the Ocean Conservancy and other environmental groups. It passed mostly along party lines, with Democrats voting for it and nearly all Republicans voting against.

The new law requires the Califor-

nia Fish and Game Commission to identify which coastal locations are best suited for fish farming. It also directs the commission to require fish-farming companies to reduce pollution and chemicals, tag all farmed fish, minimize the risk of fish escaping and return each site "to its original condition" after the operation is finished.

"The standards are rigorous, but attainable," Simitian said.

California's aquaculture industry brings in \$83 million a year. It is made up of freshwater fish, such as trout and tilapia, grown in tanks in Southern California, and also shellfish. No fish are now commercially farmed off the California coast just abalone, oysters and mussels. In 2003, the state banned farming of salmon and non-native fish in all coastal waters because of concerns about pollution, disease and escapes.

But demand for farmed fish is growing enormously. In the past 20 years, fish-farming production has increased fourfold worldwide and now makes up one-third of the world's fish catch. Last year, the Bush administration launched an effort to expand the U.S. industry from \$1 billion to \$5 billion a year by 2025 by issuing permits for floating fish farms in federal waters.

Contact Paul Rogers at progers@mercurynews.com or (408) 920-5045.