

## Claims about a clam

Getting the goods on the geoduck is proving to be a daunting task, with the state funding a flurry of studies that revolve around cultivation of the world's largest burrowing clam. What does it do to the sediment? Will the sand dollar be dislodged? How much turbulence is tolerable?

The turbulence under study is measured by the size of the grains of sand kicked up by the rank and file of geoduck on tidelands seeded by Taylor Shellfish, one of the county's biggest employers. However, turbulence of another kind has attended Taylor's efforts to take advantage of a proposal to lease state tidelands to companies with a stake in the \$4.6 million generated in a typical year by the harvesting of geoduck in Washington. Leases would be granted by the Washington State Department of Natural Resources, an agency charged with extracting economic value from lands under its control and encouraged to do so through geoduck by votes of the Washington Legislature.

People living near tidelands in Mason County being considered for the leasing program have been vocal in their opposition to the leasing program. Bill Burrows spoke for many on April 25 when he attended a meeting on this subject with state officials at the Harstine Island Community Hall. His remarks were supported in a letter written by D.L. Stave of Shelton to Washington Commissioner of Public Lands Doug Sutherland that states: "Basically, we question the science, or lack of same, regarding the effect such a program will have on the environment and strongly object to the simple fact that the leasing program will remove from the public domain a valued and limited resource."

For its part, Taylor takes heart in a preliminary study by Jeffrey P. Fisher of Environ International Corporation of Seattle of geoduck and other creatures to be found in the tidelands. He looked at "turbidity and suspended solids" at the Foss Farm in August of last year as well as the effect of geoduck cultivation on the populations of crab, shrimp, snails, starfish and sand dollars at Hunter Point. A third component of his study based on samples taken in October of last year measured levels of nitrates and phosphorous at a geoduck farm on Eld Inlet in October.

Fisher concluded that, based on published reports and current research, "geoduck culture and harvesting appear to have minimal effects" on other creatures in the tidelands and "any impacts that do occur are restricted to near fields and are relatively short-lived." He also offered the opinion that any disturbance that does occur is "insignificant" when compared to the damage done by storms and shoreline development and the issue is "aesthetic, not biological."

A geoduck is not the most pleasing creature to behold. Even so, the aesthetics of commercial harvesting of the world's largest burrowing clam have less to do with a comely form than with aquaculture techniques that can make an otherwise unblemished beach look like a plumber's paradise. Geoduck farmers will plant a multitude of geoduck on a given beach and then enshrine each one in a pipe as a way of protecting the young clams against predators.

Taylor Shellfish and other companies with an interest in the aquaculture industry funded Fisher's work. Still to be heard from are the authors of three studies commissioned by the Washington State Department of Ecology that will follow the same scientific trails blazed by the preliminary study. Jules Michel of Shelton has high hopes that the studies commissioned by the state will clarify claims that there is "not one shred of scientific evidence" showing negative effects of the pipes and call into question the claim

that geoduck farms improve water quality because the world's largest burrowing clam filters pollutants from the water. He writes: "In the case of geoduck farming, the ecological impact from the periodic disturbances from cultivation and harvesting most likely negates any marginal

### WHO WROTE WHAT:

*"Oh Oysters, come  
and walk with us!"  
The Walrus did beseech.  
"A pleasant walk,  
a pleasant talk,  
Along the briny beach."  
- Lewis Carroll, 1832-98*

filtering provided by geoducks."

Michel recently recruited Rebecca Goldberg of the Environmental Defense Fund into his cause by quoting a paper she wrote to the effect that "aquaculture systems can produce large quantities of polluting wastes, as with other forms of animal production."

On the one hand the future of the leasing program may be determined by whether the state-funded studies confirm or contradict results of the preliminary study funded by the shellfish companies. The other hand will weigh the interests of people living by the beach against the interests of people looking for a job. Here's hoping the new round of studies will be valid and the state will find a middle road that can be traveled by those on both sides of this debate.

# Shellfish plan stirs up

The world's largest burrowing clam is getting worked over pretty good by researchers and residents as officials consider a proposal to lease state tidelands to companies that cultivate the geoduck.

Harstine Islanders found themselves at ground zero of the geoduck debate as a result of proposals by the Washington State Department of Natural Resources to lease three acres at Wilson Point and Fudge Point as well as two acres at Stretch Island to commercial enterprises. A one-acre parcel at Wilson has been taken off the active list "for fiscal reasons," and three more beaches in Mason County are in an earlier stage of development: two and a half acres on the eastern shore of Stretch, three acres at Fudge and one acre on the western shore of Stretch.

Curt Puddicombe is a sportsfisherman from Vaughn who worries that the tubes used to protect young geoduck from predators and elements will interfere with his quest for tastier prey. Geoduck have been known to grow to 1.9 pounds, but their delectability is questioned by this salmon fan. "My grandmother used to chop it up to make chowder and my dad and I used to joke about it that anybody who would prefer that to salm-

on would have to be crazy," said Puddicombe.

**WILLIAM BURROWS** wrote an open letter on the subject on behalf of a group calling itself the Concerned Citizens of Harstine and Stretch Island. He said that while the DNR is only fulfilling the intent of the Washington Legislature "it is clear by the almost unanimous opposition that their actions are inconsistent with public feelings." He stated:

"While efforts are under way to change the political landscape that created

are questioning claims that the cultivation of geoduck improves water quality and objecting to the prospect of sharing the tidelands.

This marks the first time that the state has considered leasing publicly owned tidelands to people who traffic in geoduck, though Jane Chevy of the DNR makes the point that the state tidelands have been leased to companies that cultivate oysters and other kinds of clams for more than a hundred years. "We've got clams and oysters and all kinds of shellfish that are a real asset to

**'While efforts are under way to change the political landscape that created this problem, the shellfish industry is in a unique position to stop this program, and do so immediately.'**

this problem, the shellfish industry is in a unique position to stop this program, and do so immediately. There are many thousands of acres of privately owned beaches in Puget Sound with whom the shellfish industry may partner to support their activities."

Companies interested in the proposed leasing program are applying for the necessary permits, conducting biological surveys and negotiating sharing agreements with Indian tribes that have treaty rights affected by proposed leases. Meanwhile, people living near Wilson Point

this state," she said.

**ACTS OF THE** legislature have opened the door to geoduck developments. During their 2003 session, lawmakers directed the DNR to address the issue of geoduck aquaculture on state-owned lands and appropriated \$265,000 to the Geoduck Aquaculture Pilot Project. Research and monitoring are key components of this process, with Chevy making the point that the state wants to make sure that geoduck cultivation on public tidelands does not adversely affect the environment.

"We are trying to do this



Journal photo by Frank Isaac

**Two men work the line at a company that processes shellfish in Mason County. The industry is a major provider of employment here.**

# a vigorous debate

in a very measured way, trying to get good information and see where the road takes us," she said.

During last year's session, lawmakers approved the spending of \$750,000 through House Bill 2220 on research into geoduck aquaculture, and earlier this year the University of Washington Sea Grant made grants of these funds to three major research projects. One will look into the geochemical and ecological consequences of disturbances associated with geoduck aquaculture operations, and another will study the interaction of cultured and wild geoduck populations. This five-year study will provide baseline data on disease prevalence in wild geoduck populations. The third study looks at the effect

of geoduck cultivation on the foliage in Samish Bay, where a new eelgrass meadow has been established since geoduck were planted in 2002.

Jules Michel of Shelton has conducted a vigorous correspondence on the subject, with a number of letters taking other correspondents to task for public statements they have made about the science of geoduck cultivation and the claim that the clam is an environmental plus. He wrote: "Studies supporting oysters' ability to filter and clean water cannot be used to support the claim that geoducks fight pollution."

**IN HER REPORT** on these studies to the Washington Shellfish Aquaculture Regulatory Committee, Raechel Waters of Washington Sea Grant referred to indications that geoduck aquaculture is a potentially valuable industry for the state. Geoducks exported to Asia can fetch prices of up to \$30 per pound, fueling a market currently estimated at about \$80 million annually in Washington and British Columbia.

"Washington Sea Grant is working to pull together the best scientists, identify key research needs and disseminate findings to the people who need them," said Penny Dalton of Sea Grant. "We are committed to marine habitat protection and sustainable use of ocean resources. Our goal is



Journal photo by Frank Isaac

**A man digging on the beach for shellfish takes a real close look at a little critter he has found.**

to ensure that people understand geoduck issues and that good scientific information is available to manage geoduck aquaculture."

Washington's first experiments in geoduck enhancement occurred in the early Nineties, when young geoducks were grown at a state-operated hatchery and dropped onto the seabed. Enhancement efforts were stopped when officials found that the survival rate of young geoducks by this method was very low. Partners in the new studies include Pacific Shellfish Institute, the Washington Department of Fish and Wildlife and the treaty tribes of

Puget Sound Treaty Tribes.

The DNR will manage its geoduck aquaculture program based on new scientific data and monitor the environmental effects for 10 years at least, this being the time frame of one full cycle of geoduck aquaculture operations. Monitoring will be done at three aquaculture sites, with a beach in Jefferson County serving as the state's outpost on Hood Canal. The monitoring program is expected to provide scientific data on how geoduck aquaculture affects beach sediments as well as the animals and plants that live in and on the sediment.

## David's sale helps fund good works

Saint David's Episcopal Church will conduct its annual rummage and bake sale on September 5-6.

The event will take place from 9 a.m. to 3 p.m. in the parish hall at 218 North Third Street in downtown Shelton. A variety of quality secondhand items contributed by church members and friends will be for sale. Items will range from books, clothing, holiday décor and household wares to office and landscape equipment. Any rummage items left

at noon on the second day of the fund-raiser will be sold at half price.

A bake sale will also take place. Shoppers will find both a counter and table arranged close to the kitchen covered with cookies, pies, cakes and breads made from favorite recipes.

Proceeds from this event are a source of income for the general fund of the church. This in turn enables the support of community outreach programs.