

Pep rally: 'These kids need something better, something safe'

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The measure to relocate Gearhart Elementary School, Broadway Middle School and Seaside High School to a new campus on high ground in the east hills adjacent to Seaside Heights Elementary School goes before voters Tuesday.

Seaside High School's Lucy Bodner said students turned out to spread awareness for the vote to get the schools out of the tsunami-inundation zone. "There are so many kids that are in danger all the time," Bodner said.

Crawford agreed. Along with support for the bond, he called for a districtwide emergency plan.

"I don't think tsunami awareness is enough," Crawford said. "Other schools have action plans for other natural disasters, like earthquakes or hurricanes, but nobody talks about the tsunami. Every day we could easily be wiped out."

Associated Student Body co-President Emma Dutcher said the rally's goal was to get the word out about the bond. "We're hoping that by walking downtown, it will get a lot of businesses aware and get the community together," Dutcher said.

This year's campaign was going "really well," she said.

"Four years ago, when I was a freshman, it wasn't so popular," Dutcher said. "This year I'm seeing a lot of 'Vote Yes for Local Schools' on lawns signs. It looks like it will go in our favor this year."

Students from throughout the North Coast joined the rally in a show of solidarity.



Danny Miller/The Daily Astorian
Seaside School District Superintendent-emeritus Doug Dougherty, left, and Seaside High School sophomore Mason Crawford, right, march with other students, community members and voters in support of the Seaside schools bond measure around downtown.

Payton Wolf, Associated Student Body president of Vernonia High School, said students outside of the Seaside School District were responding to the plight of their neighbors.

"Recently we had to go through the same thing in passing a bond for our own schools when we got flooded twice," Wolf said. "We just had to gather together with our town and do pretty much the same thing. We feel we can give back to them."

Student involvement makes a "100 percent" difference, she added. "Older people can sit here and try to pound something into you, but when it

comes from the students, it makes a lot more of an impact."

High-schooler Dakota Willard was also part of the Vernonia contingent. "I was in fourth grade when they decided they needed to move our school, so I got to go to fifth grade in the new school," Willard said. "It was really nice. We should help them get a new school."

"This is our best chance to get our schools out of the tsunami inundation zone and build these schools that have gone 15-20 years past their useful life," Seaside School District board member Patrick Nofield said as the group walked double file along the sidewalk up First Avenue to Highway 101.

"This is our future. We need to create environments for kids like this and future generations with opportunities to learn and give back to our communities."

Gearhart City Councilor Sue Lorain, who is running unopposed for re-election, showed her support. "When I see the appalling condition of the schools, on a daily basis these kids need something better, something safe," Lorain, a retired schoolteacher said. "Not to mention the endgame, which is a catastrophic event."

Scanning the crowd, she added: "This reaffirms if you can get your kids involved, you can do just about anything."

The whoops and cries of



Danny Miller/The Daily Astorian
Students, community members and voters in support of the Seaside schools bond measure march around downtown reminding voters to turn in their ballots.



Danny Miller/The Daily Astorian
Karin Webb, center, and other supporters of the Seaside Schools bond measure, prepare to march around downtown Sunday in Seaside.

students rang out as the group looped west down Broadway toward the Prom. The chants reverberated to the Turn-around, inspiring a cacophony of car horns and cheers from onlookers.

Is the public listening?

"I think we'll find out on Tuesday," sophomore flag-bearer Crawford said. "They really need to. I don't think they understand the gravity of the situation."

Schools: Seaside School District serves some 1,500 students

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But everything is at the center of something. Last year, I wrote an article in The New Yorker about the Cascadia subduction zone, a little-known fault line that cyclically produces the largest earthquakes and tsunamis in North America — shaking of magnitude 9.0 or higher, waves of a scale and destructive force analogous to the 2011 disaster in Japan. The subduction zone runs for 700 miles along the western coast of our continent. At its south end is Cape Mendocino, California. At its north end is Vancouver Island, Canada. In the middle is Seaside.

That centrality is not just geographic. With one possible exception — the similarly unlucky town of Long Beach, Washington — no other place on the West Coast is as imperiled by the Cascadia subduction zone as Seaside. When the earthquake hits, the continent will jolt westward into the Pacific, displacing an enormous amount of ocean. All of that seawater will be forced upward into a massive liquid mountain, which will promptly collapse and rush back toward the shore. That's the tsunami, which will flood the coastal region up to a mile and a half inland and to a depth of 20, 40, even 100 feet, depending on your precise location. The area that will be swamped is called the inundation zone; within it, tsunamis are essentially unsurvivable. Eighty-three percent of Seaside's population and 89 percent of its workforce are located inside that zone. So is its energy infrastructure, water supply, wastewater-treatment plant, hospital, police department and fire stations. And so, during the school year, are nearly all of its children.

The Seaside School District serves some 1,500 students, spread out across four different buildings. One of those, Seaside Heights Elementary, is, as its name suggests, on high-enough ground to be relatively safe. The other three — an elementary school, a middle school and a high school — are between five and 15 feet above sea level. Seismologists expect that in a full-scale Cascadia earthquake, the tsunami in Seaside will be between 45 and 50 feet high. It will make landfall roughly 15 minutes after the earthquake begins, which means that, to have any chance of getting to safety, students and staff will need to start evacuating as soon as the

shaking stops.

Unfortunately, even their very first step will be, at best, extremely difficult, because none of the schools in Seaside's inundation zone have been seismically retrofitted. According to the Oregon Department of Geology and Mineral Industries, in a major earthquake, all three are likely to suffer catastrophic collapse. Those who manage to escape from whatever is left of the middle school will have to walk uphill for eight-tenths of a mile, through rubble, fires, and flooding, over a bridge that might not remain standing. Those who escape the high school will need to walk a mile in that landscape, likewise over a possibly nonexistent bridge.

As for those at the grade school: they have no viable evacuation option at all. Gearhart Elementary School is sandwiched between the ocean and a wetland, through which no roads exist and none can be built, because the ground there will liquefy in an earthquake. At present, students at the school, together with everyone else in the eponymous Gearhart neighborhood, are instructed to walk to a nearby 40-foot ridge. Seismologists expect the tsunami there to be 5 feet higher than that, but even if it were 5 inches higher, that would be enough — or rather, too much. At the speed of a tsunami travels, 3 inches of water suffices to knock over a grown man, to say nothing of a third-grader.

For the past 19 years, all of this has been the chief headache and potential heartache of a man named Doug Dougherty, the longtime superintendent of the Seaside School District. Dougherty began his career in Seaside as a teacher at — and later principal of — the now-defunct Cannon Beach Elementary School. That school was situated so close to its namesake that, if you opened the windows, you could listen to the surf all day long. In 1995, as seismologists began to sound the alarm about seismic risk in the region, Dougherty became the first principal in the United States to institute tsunami evacuation drills. That seemed like a life-saving innovation (it attracted national attention, and national praise), until engineers examined the bridge along the evacuation route and determined that it would collapse in an earthquake. The only other route to high ground

was almost a mile and a half long. To get to safety, everyone at the school — faculty members, 5-year-olds, kids who were on crutches after breaking a leg on the playground — would need to be able to cover that distance in not much more than 10 minutes. "It was really clear," Dougherty said, "that we wouldn't be able to have even a small chance of getting everyone out."

In 1998, Dougherty became superintendent; 15 years later, in 2013, he finally succeeded in closing Cannon Beach Elementary School. That same year, he came up with a plan to protect the district's other students as well, by buying land outside the inundation zone and building a new K-12 campus there, which would double as a much-needed evacuation site for the entire city. The projected cost was \$128 million dollars. No national funds were available, because of a ban on federal earmarks. No state funds were available, because, although Oregon provides money to seismically retrofit schools, those inside the tsunami inundation zone aren't eligible to apply — a strangely cruel provision that leaves the lowest and soon-to-be-wettest schools high and dry. That left the city to foot the bill on its own, which it proposed doing via a tax increase of \$2.16 per thousand dollars of property value — less than the price of a latte. The bond measure went up for a vote in 2014. So reasonable was the ask, and so dire the issue, that Dougherty, together with almost everyone involved, felt confident that it would pass. It failed, by a wide margin: 62 percent to 38 percent.

This week, another, more modest version of that bond measure will be back on the ballot. This time, the Weyerhaeuser timber company has agreed to donate 80 acres of land outside the tsunami inundation zone, leaving the town to cover only the cost of construction and relocation. The price of the bond has dropped to \$1.35 per thousand dollars of property value.

That isn't much, but, as Dougherty knows by now, it isn't nothing, either. Many of Seaside's residents are service employees, working in restaurants or cleaning hotels; more than half of them live below the poverty line. As devastating as the coming natural disaster will be, it is difficult to convince people to put money toward the future when

the demands of the present are so pressing. But, of course, the future has a way of becoming the present — sometimes much sooner than we expect. According to seismologists, the odds that a major Cascadia earthquake and tsunami will strike within the next 50 years are 1-in-3.

As for the odds that the bond measure will pass: this time, Dougherty is declining to speculate. Instead, having stepped down as superintendent, in June, he is using his putative retirement to fight for the measure's passage. He has also chosen to stay in his current house, although it is in Gearhart, the area of Seaside from which it is essentially impossible to evacuate. He understands the risk involved

in living there, but, he told me, he can't bring himself to leave as long as others have no choice but to work and study there. "My wife and I have a plan that if we need to climb trees, we will climb trees," he said. Their home sits atop the neighborhood's 40-foot ridge; the trees buy them another 60 feet. It is true that trees fare better in earthquakes than homes and hotels and brick elementary schools. Still, as he spoke, I pictured the tsunami — not just coming in but receding, with the terrifying detritus of an entire city smashing around inside it.

To be precariously balanced just above that kind of disaster: that is where Seaside finds itself right now, as it prepares to vote on its bond measure

sure this Tuesday. Either the city will choose to knock down its schools and rebuild them somewhere safer — or, sooner or later, other forces will knock them over instead. For those who live there, for those with loved ones there, for anyone with a school-aged child and an imagination, the issue is as stark as the one at the top of the ballot: a vote for reason or for madness, for relative safety or looming catastrophe.

This article originally appeared in The New Yorker. Kathryn Schulz joined The New Yorker as a staff writer in 2015. In 2016, she won the Pulitzer Prize for Feature Writing and a National Magazine Award for "The Really Big One," her story on the seismic risk in the Pacific Northwest.

What the heck just happened?!

An Analysis of the 2016 Election

NOVEMBER 27



John Horvick

John Horvick, Political Director at DHM Research, will review the 2016 election in Oregon and nationally. He'll share his thoughts about what the election outcomes say about our state and country. Horvick has conducted hundreds of surveys and focus groups with Oregonians across the state, and he'll discuss some of the research findings that help explain why we voted the way we did, including the values and issues that were most influential this election.

TO ATTEND:

For Members: Dinner & Lecture: \$25 each; Lecture only: no charge

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Appetizers will be available at 6 p.m. • Dinner will be served at 6:30 p.m.

The speaker will begin after the dinner service is complete and non-dinner members and guests of the audience take their seats.

Forum to be held at the CMH Community Center at 2021 Exchange St., Astoria.

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