

Seismic Safety Policy Advisory Commission

Oregon Emergency Management

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Governor Kate Brown and Oregon Legislature State Capitol Building 900 Court Street NE, 160 Salem, OR 97301

Dear Governor Brown and Members of the Oregon Legislature,

As Chairman of the Oregon Seismic Safety Policy Advisory Commission, I am taking the opportunity of the new Legislative session to review both successes and concerns of the Commission on Seismic Policy and the implementation of the Oregon Resilience Plan (ORP). This last year saw a number of successes as the Legislature created the position of the State Resilience Officer (SRO), significantly increased the funding for the Seismic Rehabilitation Grant Program (SRGP), allowed communities to create loan/loan guarantee programs for seismic retrofits for commercial buildings, and addressed liability issues for the Critical Energy Infrastructure hub stakeholders, all of which were based the ORP. We look forward to working with Derek Smith, the new State Resilience Officer (SRO) after his approval by the Senate. We are pleased with the recent response to the SRGP program which received 117 applications for the current \$50 million budget, many of which will need to be considered in the next round. This investment will significantly improve the seismic safety of our schools and essential facilities.

One of our major concerns continues to be the adoption of the revised DOGAMI Tsunami Inundation Maps (TIM) and the updating of the administrative rules for higher development standards in the tsunami inundation zone. The coastal communities need to be provided with the best science and clear directions on development and risk in their communities. The example of the new Marine Studies Buildings proposed by Oregon State University (OSU) at the Hatfield Marine Science Center (HMSC) inside of the tsunami hazard zone in Yaquina Bay is instructive since the current decisions are based on the SB 379 line and administrative rules that have not taken into account the lessons of the ORP or a review of the effectiveness of the existing administrative rules. We are cognizant of the economic benefit this project will have for Newport and appreciate the higher design standards OSU is employing to improve the safety of the users and visitors to the new facility. However, pending the adoption of the TIMs and new administrative rules we propose the following safety issues be addressed:

- That the standards for tsunami risk be based on the DOGAMI TIMs maps which are currently the best peer reviewed science for tsunami risk. Other scientific studies used to for an individual project should meet the same level of peer review as the DOGAMI TIMs study.
- That tsunami evacuation studies be done for the new OSU facility and Hatfield Marine Science Center and be conducted looking at the "safe haven hill" and their proposed vertical evacuation element to include staff, students and visitors.
- The tsunami evacuation study of these facilities need to include a thorough review to meet the Americans with Disabilities Act access requirements. This issue is being raised in other parts of country with respect to emergency evacuation and could present future liability issues.

There are also a number of resilience issues that are relevant not only for the OSU project but for other state funded projects on both the coast and the rest of the State:

- Consistency of funding standards: Given that K-12 schools applying for SRGP must pass a FEMA-based Benefit Cost Analysis (BCA) in order to qualify for the state grant funds, it is not unreasonable to request that a BCA be completed for OSU (or other such projects) to substantiate the best use of HB 5005 bond funds from 2015 Legislature.
- We are discovering that Oregon's Universities have some unique funding vulnerabilities to natural hazards since they rely heavily on student tuition, which may need to be refunded following a disaster. Research institutions such as OSU have an additional vulnerability in that they may need to return federal grant money for projects that cannot be completed if the research facility is destroyed or the ability to conduct the research is lost. We recommend that Oregon's public universities develop continuity of operations and resilience planning, since the loss of these institutions would be a significant blow to recovery efforts.
- Besides the HMSC, Oregon has a number of other institutions that study the coastal environment, which include the Oregon Institute of Marine Biology, along with the South Slough National Estuarine Research Reserve and the newly formed Oregon Marine reserves. The Cascadia earthquake and tsunami will have enormous impact on the coastal environment and ecology and we will need these institutions to help us understand the changes. While their mission involves them being located near the ocean, thought needs to be given on how their vital missions can continue after the next Cascadia event.
- Universities and the research institutions play a big role in the economies of their community and need to be resilient in order for the communities in which they are located to be economically resilient. We recommend considering that projects like the OSU project and similar projects receiving State or Federal money have an independent peer review process ensure the basic safety for people using these new facilities and to include alternatives, such as location and design, for the project with regards to improving the facility's resilience for both economic and continuity of program concerns.

The OSU project is an opportunity for us to demonstrate best practices for our universities and communities to become resilient from a Cascadia earthquake and tsunami. The process should help us determine the best balance between risk, safety, and the current and future economic viability. We recognize that not all the questions can be answered in one project, but the path towards resilience means that we must take positive steps with each opportunity.

Having traveled three times to the damaged areas in Tohoku, Japan after the 3/11 earthquake and tsunami, I observed how they are now applying hard-learned lessons to recover and relocate important community facilities to avoid unnecessary exposure to future tsunami risk. In learning from Japan, it is time Oregon updated ORS 455.446 and 455.447 to bring stronger state agency engagement from the Department of Geology and Mineral Industries, Department of Land Conservation and Development, Building Codes Division and Oregon Emergency Management to better coordinate and assist in these types of coastal development decisions.

We need to approach these development decisions with a post-3/11 perspective. The Oregon Legislature did just that when they directed OSSPAC to deliver the Oregon Resilience Plan. We are optimistic that with the leadership and coordination from the Governor's Resilience Policy Officer, we can better integrate the ORP recommendations into everyday decisions and make our State a safer, sustainable, and more resilient place for current and future generations.

On behalf of all the members of OSSPAC, we look forward to working with you during and after the 2016 Legislative Assembly.

Respectfully,

Jay Wilson, Chairman

Jay Raskin, Vice Chairman