



## OREGON SEISMIC SAFETY POLICY ADVISORY COMMISSION (OSSPAC)

### Minutes

July 9, 2024

#### **OSSPAC Members Present:**

Tiffany Brown, Chair	Local Government Stakeholder
Allison Pynch, Vice Chair	Public Member
Althea Rizzo	Department of Emergency Management
Jonathan Allan	Department of Geology & Mineral Industries
Todd Smith	Department of Consumer & Business Services
Matt Crall	Department of Land Conservation and Development
Rep. David Gomberg	Legislative Assembly Representative - House
Lesley Ogden	First Responder Stakeholder
Nishant Parulekar	Utilities Stakeholder
Carolina Gomez	Multifamily Housing Stakeholder
Elizabeth Safran	Public Member
Anne Castleton	Public Member

#### **OSSPAC Members Absent:**

Sen. Dick Anderson	Legislative Assembly Representative – Senate
Christina LeClerc	Department of Transportation

#### **Others in Attendance:**

Jordan Peterson	Department of Emergency Management
Lalo Guerrero	Department of Geology & Mineral Industries
Rhiannon Bezore	Department of Land Conservation and Development
Jonna Papaefthimiou	State Resilience Officer
Albert Nako	Department of Transportation
Bert Hartman	Department of Transportation
Don Pettit	Department of Environmental Quality
Mike Korten Hof	Department of Environmental Quality
Mike Harryman	Oregon Department of Human Services - OREM
Laura Hanson	Haley & Aldrich
Josh Bruce	University of Oregon
Mark Darienzo	Public Member
David Edgington	Public Member



## 1. Administrative Matters:

Roll Call & Introductions: At 9:02 a.m., Brown opened the meeting and roll call was taken.

Review & Approval of March minutes: No minutes shared ahead of meeting.

Events Notification: The [Earthquake Ready Burnside Bridge Project](#) in Portland is doing community outreach events including a panel discussion at OMSI on July 11<sup>th</sup>. On June 27<sup>th</sup>, several OSSPAC members attended the CRESENT applications and partnership workshop where they presented on the ORP project. Brown is a panelist, along with members from the [Cascadia CoPes Hub](#) at the [49<sup>th</sup> Annual Natural Hazards Research Application Workshop](#) in Colorado to highlight work done by the CoPes Hub along the Oregon coast to build community resilience.

New Business: None

Next Meeting: Working with the State Treasury to have the September OSSPAC meeting held in person. Tuesday, September 10, 2024 | 9:00 a.m. – 12:00 p.m.

## 2. Reports:

**ODOT:** No update.

**DLCD:** Crall reiterated that his agency is continuing work on the [Statewide Natural Hazards Mitigation Plan \(NHMP\) Update](#) and the [Statewide Natural Hazards Risk Assessment Upgrade](#).

**OEM:** Rizzo updated the group about the ongoing ECC activation in response to the heat wave and wildfires around the state, heat activation will be demobilizing this week. OEM is still working hard on the [IronOR 24 state-level functional exercise](#) in October that will test our state's response to a large Cascadia event. [The B2WR training program](#) has officially launched and is starting to be taught around the state, led by Kayla Thompson, OEM's Community Outreach coordinator. Looking forward to [Great ShakeOut](#) in October.

**DOGAMI:** Allan updated the group about collaboration with OEM and ODHS-OREM director-level meeting for each agency to describe their relative roles and responsibilities regarding earthquake and tsunami preparedness to maintain a coordinated effort moving forward. The National Tsunami Hazard Mitigation Program (NTHMP) had a significant 55% cut in funding which is massively impacting DOGAMI's ability to provide services related to tsunamis including supporting local agencies with signage purchases and map production, as well as future probabilistic tsunami hazard mapping for the central Oregon coast. The best-case scenario for that effort is now only completing on additional county



over the next two years, whereas DOGAMI was planning on completing the entire Oregon coastline.

**DCBS:** Smith updated the group that the Building Codes Structures Board started the [2025 Oregon Structural Specialty Code \(OSSC\) adoption](#) process this month. Committee has been selected and is beginning to go through code update proposals. Passed two statewide alternate methods bringing sections of the American Society of Civil Engineer building code (ASCE/SEI 7-22) on [multi-period response spectra](#) and [reinforced concrete ductile couples walls](#) effective May 13<sup>th</sup>.

**DEQ:** Pettit briefly brought up DEQ's participation in the exercise design for IronOR 24 and discussed DEQ's hazardous materials safety role in community lifeline planning.

**Legislative Assembly:** Representative Gomberg updated the group that ODOT is looking at a \$1.8 billion maintenance budget shortfall due to a 40% reduction in gas tax revenue due to an increase in electric vehicle and public transit use. He discussed that we as a state must look at how Oregon can fund transportation projects moving forward that is less reliant on gas tax revenue. Additionally, Gomberg attended a Cascadia event at the Newport airport in May that brought together many partners in planning what to do in the event of a large earthquake.

**State Resilience Officer:** Papaefthimiou talked about the Cascadia Subduction Zone documentary, put together by a CRESCENT-funded project. This summer, she has been very focused on extreme heat and wildfire recovery housing.

3. **Public Comment:** None.

4. **Island Mapping – OEM:** Presented by Althea Rizzo, Oregon Department of Emergency Management

Rizzo discussed how the idea of Island Mapping was based on work done by Mike Murphy in Lincoln County in the early 2000s. This work began as a proof of concept developed by OEM in partnership with the Cascadia Region Earthquake Workgroup and Lane Community College GIS Cooperative Education. Developed GIS maps with polygons identifying areas that would be at risk of islanding in a tsunami. Ran two series of workshops in 2014 and 2016 in coastal counties where participants verified and updated information and helped to build capabilities with islands including identifying critical infrastructure and assembly areas.

5. **Island Mapping – OREM:** Presented by Mike Harryman, Oregon Department of Human Services, Office of Resilience and Emergency Management

Harryman briefly discussed how OREM took ownership of the Island Mapping project. He then shared the [Oregon Resilience Island Map dashboard](#), showing off the various



islands in the state and how you can view critical infrastructure overlays including airports, hospitals, fuel facilities, railroads, fairgrounds, food banks, CHEMPACK sites, and community colleges.

Using this tool, OREM has deployed “emergency assembly points” to multiple coastal communities with the highest needs. The EAPs are connexes that have supplies for 100 people for 15 days. Discussed how this effort is in parallel to local efforts and hope to help support those local efforts through the OREM Resilience Hub grant. Harryman and Brown highlighted the work of Sue Graves, Lincoln County and Rick Hudson, Cannon Beach for laying the foundation for developing these emergency tsunami caches that the Resilience Hub model is based on.

#### **6. Island Mapping – Haley & Aldrich:** Presented by Laura Hanson, Haley & Aldrich

Hanson highlighted Haley Aldrich’s collaboration with ODHS OREM on this project. She discussed the phases of the project including the development of islands (Phase 1), a pilot initiative to validate and refine islands (Phase 2 Pilot), and a full statewide review of islands (Phase 2). Planning assumptions for the project include that the coastal area will have strongest impact and have the least resources, transportation will be greatly affected, impacting response efforts.

Phase 1: Island Mapping methodology:

[Oregon Seismic Lifeline Routes](#) are a set of streets, highways, and bridges identified by ODOT as the priority areas to be reopened after a disaster, these helped to inform the islands within the state. The island methodology followed three steps:

1. Hazard Identification: Tsunami (maximum extent of DOGAMI Tsunami Inundation data), liquefaction (high and very high risk areas in DOGAMI Liquefaction Susceptibility data), landslides (very high risk in DOGAMI Landslide susceptibility map), and vulnerable bridges (ODOT 2022 Bridge Condition Report)
2. Development of Non-Accessible Zones: Based on hazard impacts on transportation infrastructure. Total of 2087 square miles of non-accessible zones, over 36% of Highway 101 is in these zones.
3. Development of Islands: Based on groupings of non-accessible zones into 31 islands with 50% located along the coast.

Phase 2 Pilot: Refine Island Designations:

Engagement with coastal and tribal communities, as well as central and eastern counties. Some results from the phase so far is new information included a local alternative bridge, identification of alternate routes, identifying natural boundaries that will help refine the contours of the island boundaries. This data is important but needs action to be impactful.



#### Discussion:

Allan brought up that DOGAMI has been working on comprehensive and highly detailed assessments of individuals in tsunami inundation zones using 2020 census data and offered this data for this project.

Safran asked if there were any considerations for areas inaccessible by vehicle but would still be available by foot. Hanson agreed the importance of keeping in mind all methods of transportation whether by foot, waterway, or air; while caveating that for any substantial recovery to take place, it is imperative that roadways are restored which is why they are the current focus.

Castleton asked for clarification on the narrative thread on how this project has changed hands over the years from locals to OEM to ODHS-OREM with support from Haley Aldrich. Hanson outlined how the effort by OEM worked from the local level up and ODHS worked at the State level with federal data down. The convergence of these two efforts has led to where the project is today. Hanson also discussed how ODHS has done a good job bringing in multiple data layers including the [Oregon Regional Resiliency Assessment Program](#) data into the dashboard.

#### 7. Island Mapping – UO: Presented by Josh Bruce, University of Oregon

Bruce presented the work conducted by the [Oregon Partnership for Disaster Resilience](#) and Lane County working as a pilot county for the island mapping project. He highlighted that this idea of islanding applies from a federal perspective all the way down to a community perspective, with ever increasing detail on the areas that will become islands in a disaster, and it is important that the boundaries align between the various perspectives.

His team developed methodology for analyzing a community's critical infrastructure and key assets such as roads, bridges, electricity and communication lines, fire stations, hospitals, and schools. They then looked at for each island in the community, what resources and assets would be accessible to better understand the needs of each island.

Bruce acknowledged the complexities of overlapping jurisdictions between the county, cities, and special districts that control critical infrastructure and the level of coordination and communication that is needed for alignment. He also pointed out that many of the state's island boundaries follow natural boundaries and not jurisdictional boundaries which further adds complexity to the planning.



**8. Transportation:** Presented by Bert Hatman, Oregon Department of Transportation and Albert Nako, Oregon Department of Transportation

Since the ORP's release, ODOT and counties have put in a lot of work to improve transportation resilience. Hartman presented the [State Bridge Seismic Program](#)'s progress over the last decade. The program has three major focus areas: bridge replacements, preservation of major bridges, and bridge rehabilitation/maintenance

ODOT are currently replacing three bridges a year, looking at the past bridge development, we have a few hundred bridges from the 60s and earlier that will need to be replaced soon.

[The Oregon Highways Seismic PLUS Report](#) was conducting in 2014 and outlined a five-phase plan to seismically retrofit the state highway system. The first phase focused on ensuring the "backbone" routes within a decade. ODOT is currently finishing projects to complete the Phase 1 routes.

Looking ahead to future phase routes, ODOT is working on identifying local detours available to get around seismically vulnerable bridges. That way, in the event that a Cascadia earthquake occurs prior to retrofits, there is a pre-determined route that is still accessible.

Nako discussed how ODOT has worked with local agencies to evaluate their emergency transportation routes and identify alternative routes to bypass seismically vulnerable bridges. This effort began in 2016 and worked well until 2020, due to the pandemic and wildfires many counties lost the workforce available to work on these projects and many stalled. They are working on re-establishing this program to complete support for all counties.

Local agency seismic resilience support:

- Complete: Clackamas, Clatsop, Lane, Lincoln, Linn, Multnomah, Tillamook
- Underway: Benton, Columbia, Deschutes, Douglas, Jackson, Jefferson, Polk Washington
- Scheduled: Coos, Curry, Hood River, Josephine, Klamath, Marion, Sherman, Wasco, Yamhill

**9. Oregon Resilience Plan Project Update & Discussion**

Brown addressed the progress made on the ORP review, analysis, and update (addition of a new chapter on social and community resilience). Most recently Brown, Pyrch, and Rizzo met to establish a meeting to kickoff development of the new chapter and there is currently a scheduler out to set a date and time for the meeting.



Additionally, Brown will be issuing a survey that asks a few questions about content for the ORP review and a webpage to describe the project to provide an opportunity to take the survey. Brown walked the group through the current iteration of the survey and sought input for improvements and reviewed the project purpose statement to be included on the webpage. There was discussion about combining statement one and four, as well as an in-depth conversation about statement two regarding the intent behind “whole community” and whether “equity lens” should be added.

**10. Additional Discussion:**

Mark Darienzo brought up concerns about the health and safety issues associated with the CEI hub and the group discussed ongoing efforts in supporting upcoming legislation.

Brown discussed the Western States Seismic Workgroup funded under the NEHRP grant.

Parulekar brought up wanting a follow up email on explicit benchmarks and timelines for the committee members to stay on track.

**Adjourned:** Brown adjourned the meeting at 11:52 a.m.

**Next Meeting:** September 10, 2024 | 9:00 a.m. – 12:00 p.m.