



Subject: NOAA Digital Coast Reauthorization: Rep. Dave Min

Examples of California's Application of Digital Coast for Hazard Mitigation and Planning:

California Geological Survey (CGS):

- **Seismic Hazard Program Tsunami Unit:**

- The NOAA Digital Coast website-based program provides access to key datasets used across the California Geological Survey (CGS) Seismic Hazards Program and Tsunami Unit. These datasets are fundamental to the success of our work at the CGS.
- The unit has used NOAA's Digital Coast for many projects over the past several decades. Specifically, the unit relies on Digital Coast data for elevation, land cover, socioeconomics, boundaries, and shoreline information. Most recently, the unit used Digital Coast to search for a lidar dataset for our pedestrian evacuation walk time analysis. The unit also routinely uses Digital Coast's elevation data to generate Tsunami Hazard Area maps and develop decision support tools for tsunami response. The division notes that losing access to this resource would be a significant setback for the work we do to improve California's resilience to natural hazards.
- On the C-CAP High-Resolution Land Cover: This tool allows the CGS to obtain land cover data statewide. These landcover data are used to inform tsunami modeling of pedestrian evacuation time analyses as different land cover types can affect the speed for which those areas can be traversed. These data are also used to inform tsunami modeling of sediment as different land cover types can erode at different rates.
- On the Sea Level Calculator: This information allows the CGS to help guide coastal lead agencies and the public to better prepare to be resilient when faced with higher water levels across the coast. This information helped guide an Office of Planning and Research-funded CGS project to evaluate the influences of sea-level rise on tsunami hazards across the state of California.

- **Forest and Watershed Unit:**

- The CGS Forest and Watershed Geology Program staff uses the Lidar, and Land Cover data on a regular basis for our Timber Harvest Review, emergency storm response, and other watershed based geohazard projects.
- The Forest and Watershed Program uses the Sea Level Rise Calculator in cases where assessing coastal bluff landslide hazards, and the unit has used the Risk Communication portal to help guide how to communicate risk to stakeholders.

- **Regional Geological and Landslide Mapping Program:**

- The program uses NOAA's Digital Coast portal to access lidar datasets as their first stop, go-to location for lidar data if a particular project is in a coastal state. The lidar portal hosts many datasets in a viewer that is intuitive and easy to navigate, and the Digital Coast data processing will handle reprojections of both point clouds and raster products which makes the data accessible, as well as saving the user significant time in having to reproject the data (particularly point clouds) themselves.