



Informational Item

September 30, 2025

Item 5a

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**San Francisco Bay Conservation and Development Commission
Regional Shoreline Adaptation Plan**

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Location: San Francisco Bay Area

Strategic Plan Goals and Objectives: Goal 1: Safeguard Coastal and Marine Ecosystems and Communities in the Face of Climate Change; Objective 1.1: Build Resiliency to Sea-Level Rise, Coastal Storms, Erosion and Flooding

Executive Summary:

Sea level rise is altering the San Francisco Bay (Bay) shoreline. Adapting to rising seas, more frequent and higher storm surge, rising groundwater, and flood events has emerged as the premier challenge facing the Bay shoreline. To address the need for consistent sea level rise adaptation planning efforts, the Bay Conservation Development Commission (BCDC) voted on December 5, 2024 to adopt the [Regional Shoreline Adaptation Plan](#) (RSAP). The development of the RSAP was supported through more than \$5.5 million in funding provided by the Ocean Protection Council (OPC) and the California Coastal Conservancy (SCC). The RSAP establishes a regional coastal resiliency strategy that sets forth planning criteria and minimum standards to ensure consistency and alignment in sea level rise planning efforts throughout the Bay. The RSAP was prepared in accordance with Senate Bill (SB) 272 (Laird, 2023), which directed BCDC to develop guidelines for local governments to follow when addressing the impacts of sea level rise along the Bay shoreline. In doing so, the RSAP provides a coordinated, actionable plan for how the Bay can adapt to rising seas and ensure the long-term resilience of its communities, infrastructure, and ecosystems. Local governments are currently using the RSAP Guidelines to develop sea level rise adaptation plans, which are called Subregional Shoreline Adaptation Plans (SSAP). The primary source of funding for governments to develop SSAPs is through OPC's [SB 1 Sea Level Rise Adaptation Grant Program](#) (SB 1 Grant Program).

Background:

The current rate of global sea level rise calls for coordinated and consistent local and regional planning efforts to address the inevitable, far-reaching economic and environmental impacts of sea level rise. Planning for and adapting to sea level rise is an inherently challenging and complex process that must evaluate trade-offs between many conflicting priorities such as human access and development, and wildlife and ecosystems. Near-term priorities often take precedent over long-term planning efforts, and the political will to make difficult decisions is often lacking. The Bay is also particularly vulnerable to sea level rise; although the Bay shoreline accounts for just one-third of California's coastline, the Bay Area is expected to experience two-thirds of the state's total economic damage from sea level rise. Additionally, over 20,000 acres of habitats for depressional wetlands, lagoons, and tidal marshes are at risk of disappearing from four feet of sea level rise.

Prior to the RSAP, BCDC has led regional sea level rise adaptation planning for well over a decade. Two key milestones in particular have set a strong foundation for local and regional adaptation through the RSAP. The San Francisco Bay Plan (Bay Plan) is BCDC's guiding policy document for implementing the laws as outlined in the McAteer-Petris Act. In 2011, BCDC updated the Bay Plan to include Climate Change Policies, which call for the creation of "a regional sea level rise adaptation strategy for protecting critical developed shoreline areas and natural ecosystems, enhancing the resiliency of Bay and shoreline systems and increasing their adaptive capacity." At the same time, BCDC's Adapting to Rising Tides program has led over a decade of groundbreaking research, studies, data, and partnerships to advance sea level rise adaptation. This work culminated in 2021 in the publication of the collaboratively-developed, consensus-driven Bay Adapt Joint Platform, a "Regional Strategy for a Rising Bay." The Joint Platform lays out nine actions and 21 tasks the region must take to protect people and the natural and built environment from rising sea levels, including creating a strong vision for adaptation and collaboration around sea level rise planning. However, despite these efforts by BCDC, there was no requirement for Bay cities and counties to engage in sea level rise planning or adaptation at a landscape scale beyond a project-by-project basis. Additionally, land-use planning and project decisions are made at the city and county level and may or may not include sea level rise considerations. Prior to the passage of SB 272, BCDC did not have authority to review local government land use plans. BCDC's permitting authority regarding resilience and adaptation to sea level rise is limited to fill in the Bay and public access along the shoreline.

Recognizing the need for a regional coastal resiliency strategy with planning criteria and minimum standards to align Bay sea level rise planning efforts, OPC and SCC provided \$2 million and \$3.5 million in funding, respectively, to develop the RSAP. Concurrently, the enactment of SB 272 in October 2023 created a requirement for Bay cities and counties to develop a sea level rise adaptation plan, through a SSAP, that is subject to approval by BCDC on or before January 1, 2034.

The bill also required BCDC to create guidelines for cities and counties to use in the development of SSAPs. The guidelines are meant to establish consistency in what a SSAP should contain and what standards they should meet. While there is not a mechanism of enforcement or punishment related to not meeting this requirement, the bill requires that local governments with an approved SSAP be prioritized for funding.

The primary source of funding for SSAPs is OPC's SB 1 Grant Program which was approved at the [August 2023 Council meeting](#). Prospective applicants can also utilize the SB 1 Technical Assistance Program for help at all stages of proposal development. Since the launch of the SB 1 Grant Program, OPC has approved 10 grants (totaling \$9,635,377) to the Bay Area for development of SSAPs and is considering an additional 7 grants (totaling \$9,341,268) at this Council meeting. With the pending approval of Item 5b, OPC will have approximately \$4 million remaining Greenhouse Gas Reduction Fund (GGRF) SB 1 Grant Program funding still available. The SB 1 Grant Program received an additional \$75 million from Prop 4 which will be available to local and tribal governments for sea level rise planning and projects, of which \$20 million is available in Fiscal Year 2025/26.

RSAP Plan Requirements, Minimum Standards, and Funding Estimates:

The RSAP Guidelines describe how cities and counties will develop SSAPs, including what they should contain and what standards they should meet. The Guidelines also outline which Bay Area jurisdictions are required to create a plan by law and what plan submittal, review, and approval process involves. The Guidelines consist of Plan requirements and Minimum Standards. Plan requirements are organized into seven Plan Elements:

- Element A: Planning Process
- Element B: Existing Conditions
- Element C: Vulnerability Assessment
- Element D: Adaptation Strategies and Pathways
- Element E: Land Use and Policy Plan
- Element F: Project Implementation Plan and Funding Strategy
- Element G: Project List

The Guidelines contain four Minimum Standards:

- The Coastal Flood Hazards and Sea Level Rise Scenarios Standard includes the hazards that plans should evaluate and respond to, including sea level rise, tidal inundation, storm surge, groundwater emergence flooding, and shallow groundwater. The Plan requirements require vulnerability assessments to be conducted using four sea level rise scenarios, at a

minimum, based on the most up-to-date science from the [California Sea Level Rise Guidance \(2024\)](#).

- The Minimum Categories and Assets Standard identifies essential assets that should be evaluated and considered across adaptation planning to ensure important issues are not left out of planning.
- The Equity Assessment Standard ensures that equity considerations are incorporated across all plan elements that are tailored to individual communities. This includes assessments for integrating equitable practices into the planning process, engagement, and adaptation outcomes.
- The Adaptation Strategy Standards are designed to enable local governments to balance adaptation outcomes that align with the One Bay Vision with the flexibility to determine what suite of adaptation strategies are most appropriate for their communities and shorelines. They guide users through the myriad considerations and decision points in adaptation planning to identify what solutions work best where, while considering which outcomes will contribute to regional success by reducing flood risk and increasing the long-term health and well-being of people, natural habitats, and the regional economy.

The Guidelines are flexible in recognition that there is no one-size-fits-all approach for the Bay shoreline and some jurisdictions will have prior work to build on. The RSAP is not meant to be duplicative of previous work and encourages jurisdictions to leverage previous efforts. OPC has worked closely with BCDC staff and SB 1 applicants to ensure past assessments and planning efforts that meet the standard of the Guidelines are incorporated into SSAP efforts and will continue to do so.

Additionally, the [RSAP Atlas](#), is an online mapping tool built to support local governments, communities, and consultants in creating SSAPs. The Atlas provides access to regionally consistent datasets on existing conditions, coastal hazards, Strategic Regional Priorities, assets at risk of flood exposure, and support for adaptation strategies.

In order to help constrain and disperse funding equitably across Bay cities and counties, BCDC developed [funding cost estimates](#). These estimates help guide cities and counties regarding level of effort and resources needed, as well as OPC in their review of SB 1 grant proposals.

OPC-funded SSAPs and Funding Outlook:

Local governments in the Bay have never had a consistent funding opportunity related to sea level rise planning (in contrast to the outer coast which has had access to Coastal Commission's Local Coastal Program funding). Bay governments were therefore eager to learn about and apply for

OPC's SB 1 Program. To date, OPC has funded the following Bay cities and counties to support SSAP development:

- City of Sausalito: \$250,000
- Contra Costa County: \$1,499,285
- City of South San Francisco: \$997,500
- City of San Leandro: \$187,715
- City of Richmond: \$1,500,000
- City of Mill Valley: \$965,000
- City and County of San Francisco: \$1,500,000
- Solano County and the cities of Vallejo, Fairfield, Suisun City, and Benicia: \$1,392,000
- City of Brisbane: \$750,000
- Town of Tiburon: \$593,877

Additionally, OPC is considering the following Bay grants at today's meeting (Item 5b):

- City of Alameda: \$1,140,00
- City of Oakland: \$144,900
- Cities of Emeryville, Berkeley, and Albany: \$2,240,00
- Santa Clara County and the cities of Palo Alto, Mountain View, Sunnyvale, San Jose, Santa Clara, and Milpitas: \$2,631,383
- Cities of Belmont, San Carlos, Redwood City, Menlo Park, and East Palo Alto: \$2,033,726
- Cities of Hercules and Pinole: \$736,370
- City of Pittsburg: \$400,00

If Item 5b is approved, this funding is expected to result in 15 SSAPs, which, following local adoption and BCDC approval, will lead to SB 272 compliance for approximately 51% of Bay Area shoreline jurisdictions.