Project Description
The Santa Cruz County Regional Transportation Commission (RTC), the County of Santa Cruz Department of Community Development & Infrastructure and the Santa Cruz County Office of Response, Recovery & Resiliency are partnering to develop a Climate Adaptation Vulnerability Assessment and Transportation Priorities Report (CAVA) for unincorporated Santa Cruz County maintained roads and the entirety of the Santa Cruz Branch Rail Line (SCBRL). The hazards brought on by climate change pose a serious threat to the county’s transportation infrastructure and thus the safety and quality of life of its residents.

The emphasis of the vulnerability assessment will be on identifying transportation infrastructure assets in the county that may be particularly vulnerable to climate hazards. These assets will be prioritized based on a set of metrics that assess both how sensitive they may be to damage from climate hazards and how critical they are to the functioning of the transportation network and the communities it serves.

The goal of prioritization is to identify the order in which transportation assets should undergo detailed climate assessments first since resource constraints will prevent all assets from being assessed simultaneously. A comprehensive and prioritized project list will better position Santa Cruz County to receive state and federal climate resiliency funding for the next steps of identifying actions needed for climate resiliency and implementation of resilience measures.

Santa Cruz County is already experiencing the impacts of sea level rise, coastal erosion, extreme weather events and flooding, wildfires, and extreme temperatures on the county’s transportation infrastructure. In 2017 and 2023, a series of intense winter storms caused extensive damage to the county transportation infrastructure (assessed at $130 million and $100 million consecutively) including flooding, road washouts and landslides, and damaged drainage. In 2020, the CZU Lightning Complex wildfire in the Santa Cruz Mountains, burned more than 86,000 acres and caused more than $15 million in damage to the county transportation infrastructure such as destroyed guardrails, damaged drainage, and compromised embankments.

Climate change impacts are increasing at an alarming rate. How we respond to and proactively address the impacts of climate change on the transportation network so that challenges can be mitigated will have a profound impact on county residents.

Project Highlights
- Project will determine the transportation infrastructure in Santa Cruz County that may be vulnerable to climate hazards
- Project will provide a priority list of transportation projects in the unincorporated county and on the SCBRL for taking next steps in identifying actions for climate resilience and implementation
- Prioritization metrics will consider severity of climate hazards as well as how critical the asset is to the functioning of the transportation network
- Identify both state and federal funding sources for prioritized climate adaptation projects
- Engage local stakeholders and members of the public for input on project prioritization
- Emphasis of prioritization is on environmental justice and vulnerable populations
Santa Cruz County Climate Adaptation: Vulnerabilities Assessment and Transportation Priorities Report (CAVA)

Key Project Milestones

Milestone 1: Draft Project Framework - Identify list of hazards, assets, and methodology for prioritization

Milestone 1: RTC Approval

Milestone 1: Public & Stakeholder Outreach

Milestone 2: Draft Project Prioritization - Perform vulnerability assessment & determine project priority list

Milestone 2: RTC Approval

Milestone 2: Public & Stakeholder Outreach

Milestone 3: Draft Project Report

Milestone 3: Public & Stakeholder Input

Milestone 3: RTC Approval

Next Steps
Seek funding for climate resiliency projects on unincorporated county roads and SCBRL assets based on priority list of projects developed for this project.