



CDI and CAO

2016–17 Winter Storm projects, 2023 Atmospheric River projects, and Emergency Road Damage Assessment (ERDA) Resource

March 25, 2025

2016–17 Winter Storms and 2023 Atmospheric River Storms Status Update

2016–17 Winter Storms Update

| Phase of Project | Number of Projects | Amount (in Millions) |
|------------------|--------------------|----------------------|
| Completed | 159 | \$115.7 |
| Bid & Award | 15 | \$7.2 |
| In Design | 13 | \$9.1 |
| Denied | 2 | \$.09 |
| Total | 189 | \$132.9 |



2023 Atmospheric River Storms Update

| Phase of Project | Number of Projects | Amount (in Millions) |
|------------------|--------------------|----------------------|
| Completed | 145 | \$81.3 |
| Bid & Award | 5 | \$5.9 |
| In Design | 14 | \$12.3 |
| On Hold/Future | 53 | \$19.5 |
| Denied | 4 | \$1.2 |
| Total | 221 | \$133.8 |



Emergency Road Damage Assessment (ERDA) Resource

Background

- FY 2024–25 Budget Hearings
 - Directed CDI to return with an expanded tool to prioritize all transportation projects
- September 24, 2024 Board Update
 - Directed CDI to narrow focus to emergency projects only
- December 12, 2024 Board Update
 - Described use of Santa Cruz County Climate Adaptation and Vulnerability Assessment (CAVA) Report
- March 25, 2025 Board Study Session
 - Presenting ERDA resource with status updates on 2017 and 2023 Storm Damage Projects

Purpose

- Create a methodology that is:
 - Systematic
 - Transparent
 - Data-driven
- Increasing pressures on resources due to climate change and aging infrastructure
- Provide additional information to form budget and Capital Improvement Program recommendations

Criteria Definitions

- **Travel Volume** – Based on recent traffic counts across the county collected by RTC in 2024, as well as historic data.
- **Detour Time** – Length of detour route. One way in/out road segments scored the highest.
- **Loss of Lane** – Extent of damage to the road in terms of its continued useability.
- **Compromised Utilities/Culverts** – Based on cumulative amount of effected infrastructure including water, sewer, storm drains, franchise lines such as electrical, phone and cable service, etc.
- **Access and Functional Needs** – Based on overlays with disadvantaged community mapping, from the Census Bureau's American Community Survey data.
- **Critical Facilities** – Based on whether they road provides primary or alternate access to one or more County designated critical facilities such as schools, fire stations, hospitals, etc.

Scoring

| Criteria | Weight of Total Score |
|--------------------------------|-----------------------|
| Travel Volume | 15% |
| Detour Time | 28% |
| Loss of Lane | 25% |
| Compromised Utilities/Culverts | 8% |
| Access and Functional Needs | 12% |
| Critical Facilities | 12% |

Green Items- CAVA data

Orange Items- DPW scored criteria

Resource Limitations

- Intended to be an additional source of information to inform decision making – not end-all prioritization
- Does not evaluate other key considerations when deciding to move forward with a project including:
 - Funding (FEMA or FHWA designations included)
 - Risk and potential exposure of not doing the project
 - Will be evaluated regularly outside of model
 - Proximity of other vulnerable infrastructure and environmental hazards

Resource Products

- Methodology Report
- Assessment Report
- [GIS Dashboard](#)

| Final Score | (Old DPW Score) | CAMS # | Road | Location | Description | Storm Year |
|------------------|-------------------------|--------------------------------------|----------------------------------|-----------------|---------------------------------------|------------|
| 69.1 | (8) | P42308 | EUREKA CANYON RD | 0.35 | 40 foot long slipout, 3 ft into road | 2023 |
| CAVA Variables | Critical Facilities: 12 | Travel Volume: 9 | Access and Functional Needs: 4.8 | Detour Time: 28 | | |
| County Variables | Loss of Lane: 10 | Compromised Utilities/Culverts: 5.33 | | | FEMA Eligible: No | |
| 65.9 | (9) | | NELSON RD | 0.44 | road washout due to clogged culvert/ | 2017 |
| CAVA Variables | Critical Facilities: 0 | Travel Volume: 7.5 | Access and Functional Needs: 2.4 | Detour Time: 28 | | |
| County Variables | Loss of Lane: 20 | Compromised Utilities/Culverts: 8 | | | FEMA Eligible: Yes | |
| 62 | (10) | P42567 | REDWOOD LODGE RD | 2.02 | Road settlement from 2017 repair site | 2023 |
| CAVA Variables | Critical Facilities: 0 | Travel Volume: 9 | Access and Functional Needs: 0 | Detour Time: 28 | | |
| County Variables | Loss of Lane: 25 | Compromised Utilities/Culverts: 0 | | | FEMA Eligible: No | |

Questions?

Thank You

