

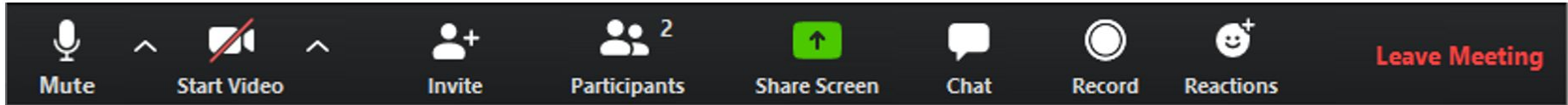
# Infill Guidance Webinar Series

Resilience and Infill

# How to Zoom

---

1. Keep yourself muted



1

2

3

4

5

6

7

8

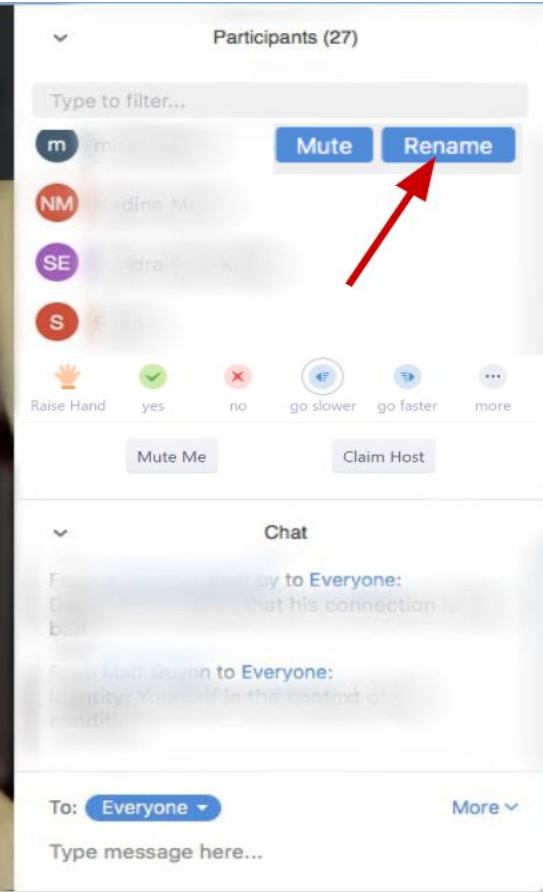
9

2. You can keep your camera on if you'd like

8. To show excitement or confusion you can use the reaction button

# Welcome!

We'll get started a few minutes after the hour. In the meantime, listen to some music.



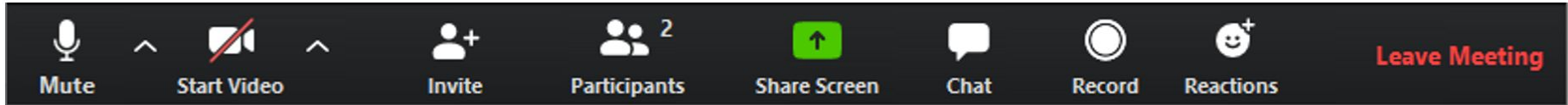
Please rename yourself by hovering on your name and clicking “Rename”.

Add your name and pronouns!

# How to Zoom

---

1. Keep yourself muted



1

2

3

4

5

6

7

8

9

2. You can keep your camera on if you'd like

8. To show excitement or confusion you can use the reaction button

# Agenda

---

60 minutes

1. Introduction of Facilitators
2. Community Agreements
3. Infill Policy Review
4. What the Guidance Says About Resilience
5. Q&A - At least 15 minutes

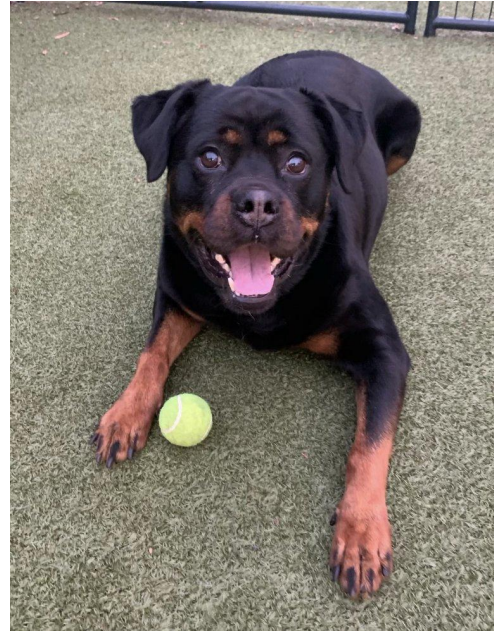
Rebekah has a dog named Willow that is a good dog 13/10

# Facilitators

---

Rebekah Whilden

Tim Frank



# Community Agreements

---

- Keep yourself muted.
- Practice active listening: listen for understanding, not response
- Expect and accept non-closure
- Minimize use of jargon and explain terms when you speak, type jargon in the chat if you don't know what something means
- Use the google form to ask questions.
  - This is an information sharing webinar and not a debate.



# Guidance Overview

---

Over the last century, racially driven housing, labor, transportation and economic development policies worked together to systematically exclude low income people and people of color from opportunity. Healing those wounds will require not just rebuilding communities left behind, but intentionally listening to low income voices and honoring their agency in choosing solutions.

As part of the Sierra Club's journey to becoming a more just, equitable, and inclusive organization, the Sierra Club Board of Directors adopted the Jemez Principles for Democratic Organizing in 2014. These principles were used to create the Infill Policy and to guide the creation of the Guidance.

# Policy Review

---

To mitigate the primary drivers of climate change and prepare for the impacts:

Development should be dense, inclusive, and located within or connected to existing communities and neighborhoods....

Materials, building codes, and design should optimize energy use, the entire site's potential, building space and material use, and protect and conserve water and land....

All land use plans should identify opportunities for adapting to climate change and build resilience across communities and physical infrastructure....

Development should honor and support the right to organize and promote quality union jobs and livable wages for both construction work and the permanent jobs that follow. Construction work should pay prevailing wages and utilize apprentices.

# Guidance Overview for Resilience

---

Smart Growth. Dense and Inclusive = Mitigation and Resilience

Building Standards

Disaster Preparedness

Critical Infrastructure: Energy/Water/Sewer

# Climate Change Impacts/Solutions

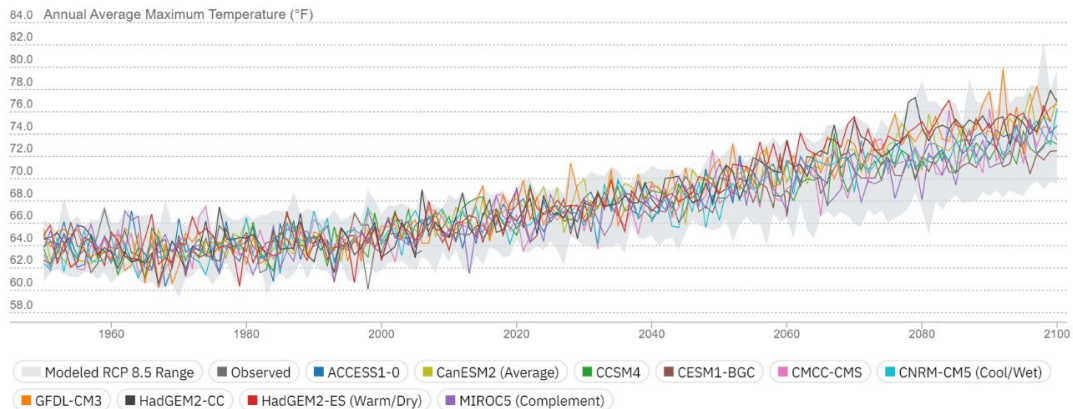
---

Extreme Heat	Insulated Buildings / Resilient Energy Infrastructure
Drought	Smart Growth / Water Efficient Buildings and Landscaping
Wild Fire / Smoke	Fire Resistant Buildings/ HVAC with Filters / Less Sprawl in WUI
Extreme Cold	Insulated Buildings / Resilient Energy Infrastructure / Shelters
Flood / Sea Level Rise:	Plan Ahead/Prioritize Nature Based Solutions
Hurricane, Typhoon, Tornado	Wind Resistant Design/ Shelters

## Nevada County, California

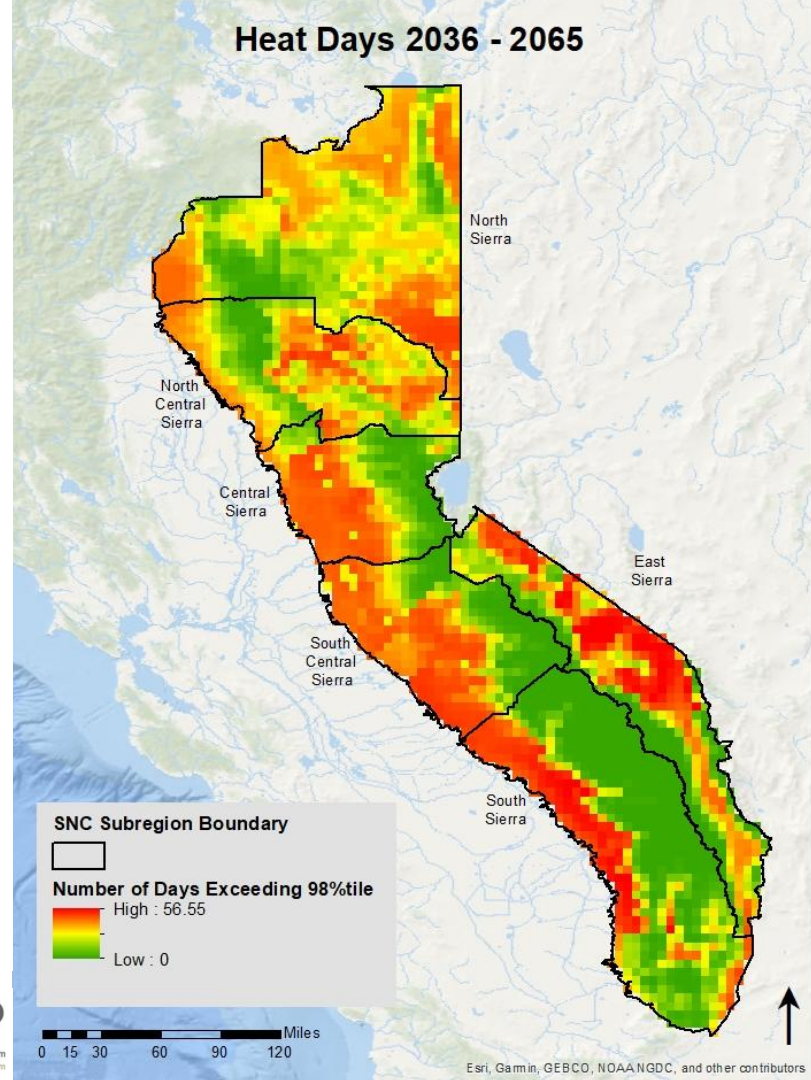
Projected changes in Annual Average Maximum Temperature under a High Emissions (RCP 8.5) Scenario.

OBSERVED HISTORICAL 1950-2005	FUTURE PROJECTIONS 2036-2065		FUTURE PROJECTIONS End-Century (2070-2099)	
56 YEAR AVG	30 YEAR AVG	30 YEAR RANGE	30 YEAR AVG	30 YEAR RANGE
64.0 °F	69.4 °F	65.1–74.1 °F	73.0 °F	67.9–79.9 °F



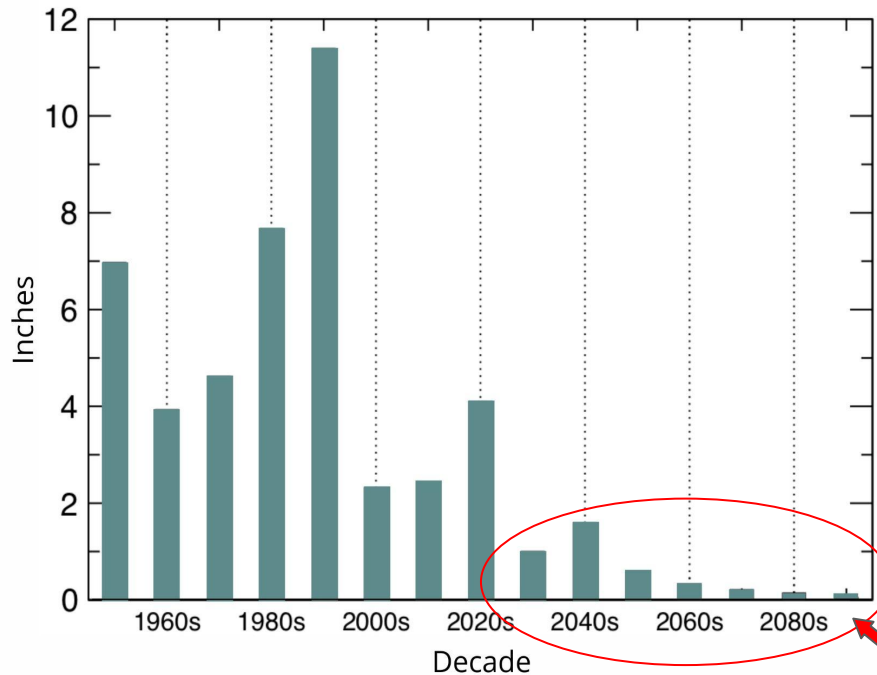
Source: Cal-Adapt. Data: LOCA Downscaled CMIP5 Climate Projections (Scripps Institution of Oceanography), Gridded Observed Meteorological Data (University of Colorado Boulder), LOCA Derived Products (Geospatial Innovation Facility).

## Heat Days 2036 - 2065



# Lake Tahoe

April Snow Water Equivalent  
RCP 8.5 Emissions



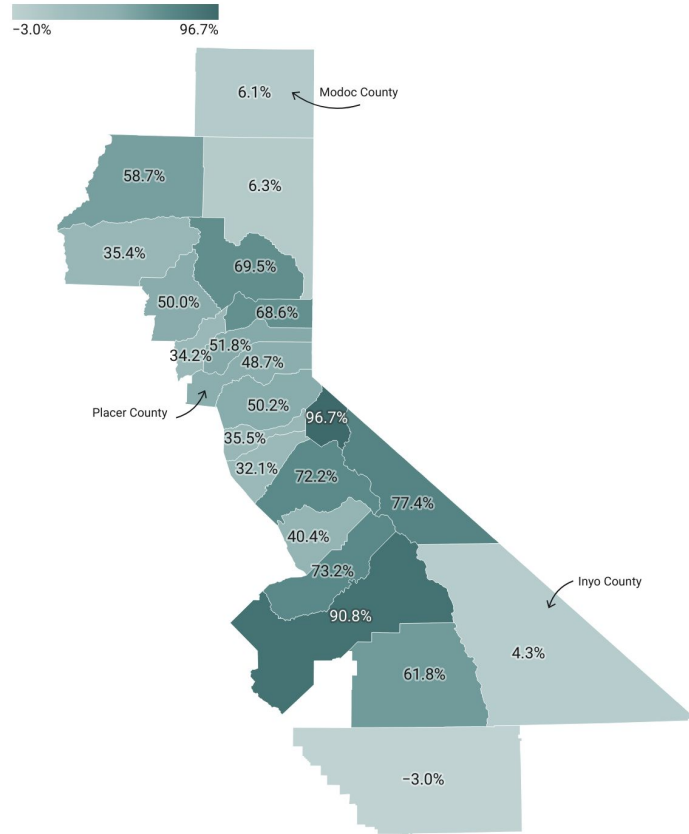




Dixie Fire 2021  
<https://inciweb.nwcg.gov/incident/7801/>

## Percent Change in Acreage Burned

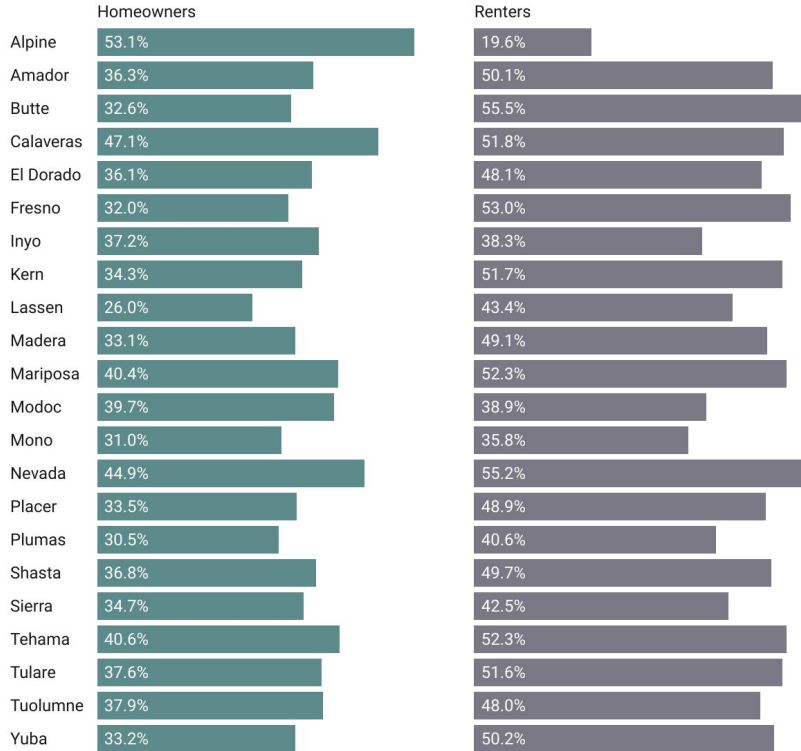
Percent Change in acreage burned by wildfire from Modeled Historical (1961-1990) to Modeled Mid-Century (2035-2069) under RCP 8.5.



Note that this map used county-wide data, some which is outside the SNC boundary.  
 Map: Sierra Business Council • Source: Cal-Adapt • Created with Datawrapper

## Unaffordable Housing in SNC

Percentage of homeowners and renters who spend more than 30% of their monthly income on housing.

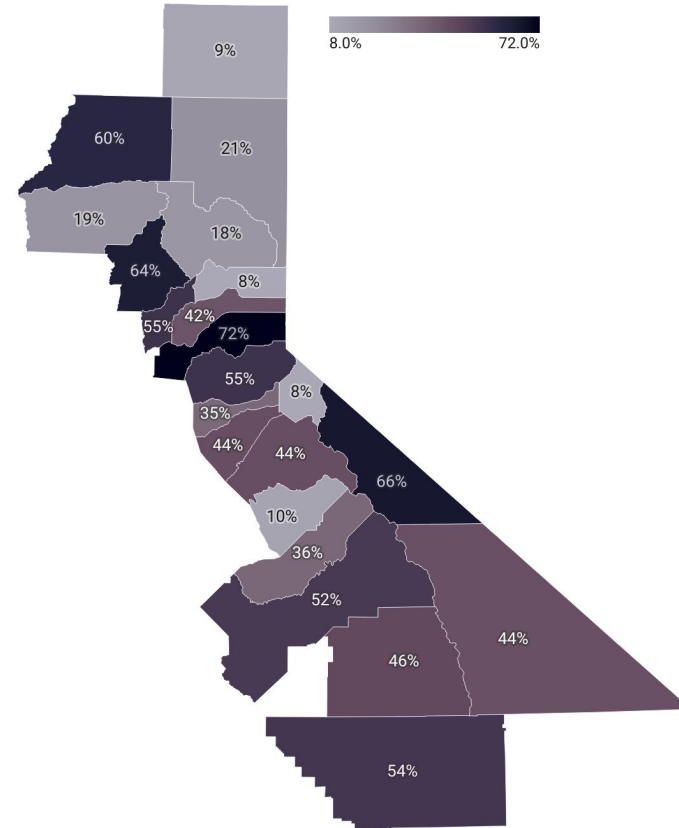


Monthly costs for homeowners: The sum of payment for mortgages, real estate taxes, various insurances, utilities, fuels, mobile home costs, and condominium fees. Monthly costs for renters: The amount of the contract rent plus the estimated average monthly cost of utilities and fuels if these are paid for by the renter.

Chart: Sierra Business Council • Source: Data Sources: U.S. Department of Commerce, 2020. Census Bureau, American Community Survey Office, Washington, D.C. via Headwaters Economics, Demographics, 2020 • Created with Datawrapper

## High Speed Broadband in the SNC

Percentage of people using broadband at 25Mbps or higher.



Broadband data based on usage in October 2020 as collected by Microsoft. Percentages on the map are rounded to the nearest whole number.

Map: Sierra Business Council • Source: Microsoft • Created with Datawrapper



# Lassen County

Overall Risk Score (62.11 / 100)

Climate Hazard Risk Score (8.71 / 10)

Human Impact Score (7.13 / 10)

Community Capacity Score (/)

Hazard	Modeled Historical (1961-1990)	Projected Range (2035-2064)	Percent Change from Historical
Temperature - Extreme Heat Days (above 91.9°F)	4 days	12-50 days	625%
Temperature - Warm Nights (above 51.3°F)	4 nights	9-46 nights	575%
Wildfire - Acreage Burned	19552.7 acres	15624.9 - 23754.6 acres	6.3%
Snowpack - April 1 SWE	1.6 inches	0.3-1.3 inches	-62.5%
Highest Populations of Underserved Groups		Percentage of population	
Residents without High speed broadband		79%	
Housing-burdened		34%	
People of Color & Hispanics/Latinx		34%	

# Community Capacity Workshop Highlights

- Low to Medium capacity throughout the region, with a few exceptions of tight knit communities that rated themselves fairly high.
- Many of them are eager to hear the results and are interested in future collaboration, regardless of the small community mentality.
- The bottom line for many communities is that they don't want to hear more problems, they are only interested in solutions. They don't want people talking at them, they want people working with them.

# Q&A

Put your questions in the google form!