

Integrated Climate Adaptation and Resiliency Program



Technical Advisory Council Resilience Metrics Work Group

NOVEMBER 18, 2021

10:00 – 11:30AM



Agenda

Item 1 | Welcome & Roll Call

Item 2 | Meeting Minutes

Item 3 | State Adaptation Strategy and Resilience Metrics

Item 4 | General Public Comment

Item 5 | Closing, Future Agenda Items, & Meeting Adjourned



Item 1 | Welcome & Roll Call





Item 2 | Meeting Minutes



Item Public Comment



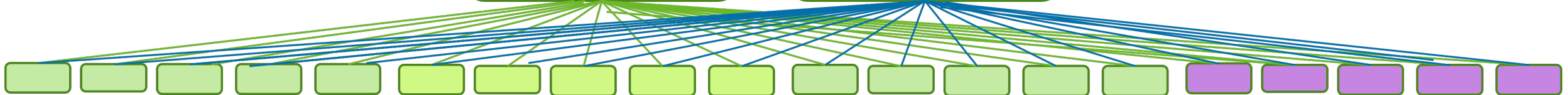
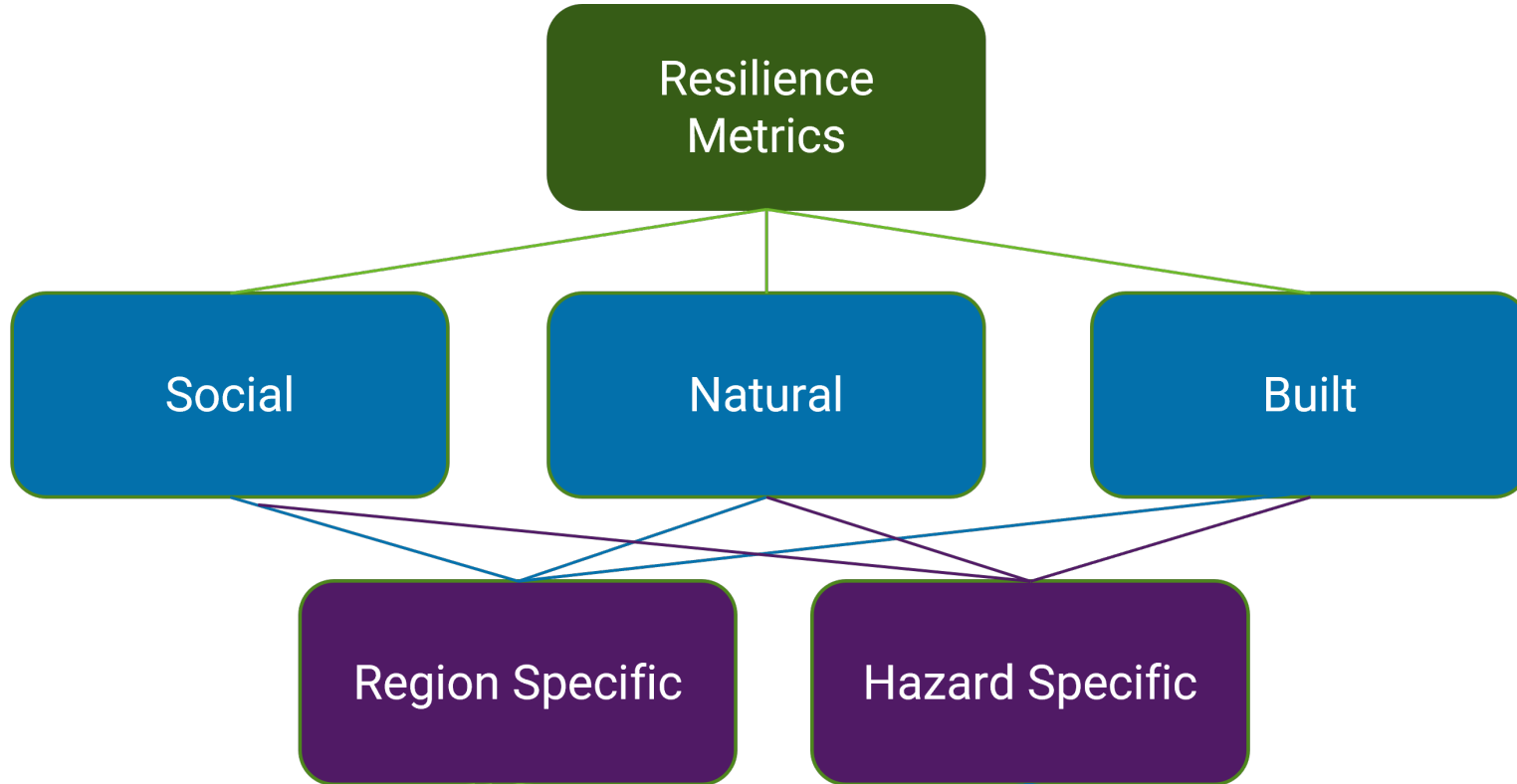
ACTION

Approve the ICARP Technical Advisory Council Work Group draft meeting minutes from 7/21/2021 and 10/20/2021.



Item 3 | State Adaptation Strategy & Resilience Metrics

ICARP Conceptual Framework for Resilience Metrics



Ongoing State Work



CDFA HEALTHY SOILS PROGRAM

The Healthy Soils Program (HSP), consisting of Incentives Program and Demonstration Projects, provides financial assistance for incentivizing and demonstrating the implementation of soil management practices that sequester carbon, reduce atmospheric greenhouse gases (GHG) and improve soil health.

WHAT IS HEALTHY SOIL?

Soil health has been defined as the capacity of soil to function as a living system. Healthy soil also contributes to mitigating climate change by maintaining or increasing its carbon content.

WHAT IS THE CALIFORNIA HEALTHY SOILS PROGRAM?

Funded through California Climate Investments, the HSP has two components: the HSP Incentives Program and the HSP Demonstration Projects. The HSP Incentives Program provides financial assistance for implementation of soil health practices that sequester soil carbon and reduce GHG emissions. The HSP Demonstration Projects collect data and/or showcase California farmers' and ranchers' implementation of HSP soil health practices.

WHICH SOIL MANAGEMENT PRACTICES ARE ELIGIBLE FOR FUNDING?

On-farm soil management practices that are eligible include but are not limited to: mulching, compost application, herbaceous and woody plantings, cover cropping and no/reduced tillage.

HOW MANY PROJECTS HAVE BEEN FUNDED SO FAR?

CDFA has selected 646 projects for funding, totaling \$41.52 million in grant funds.

Updated January 2021

BY THE NUMBERS

109,809 estimated metric tons of CO₂e sequestered each year

that's the equivalent of removing **23,724** cars from the road each year

and building soil health on **56,032 acres**

Learn more at cdfa.ca.gov/oe/healthysoils



How State Work informs Climate Adaptation Strategy

Priority 1



Priority 2



Priority 3



Priority 4



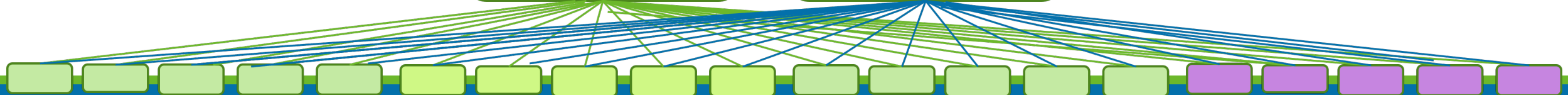
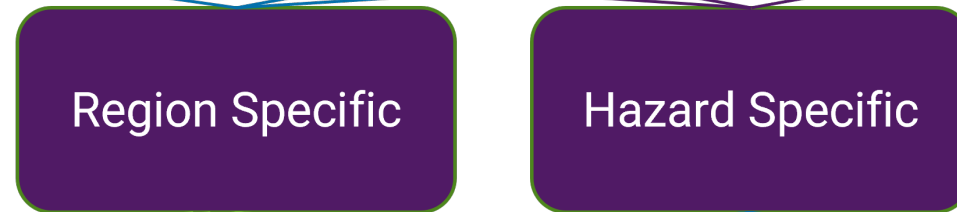
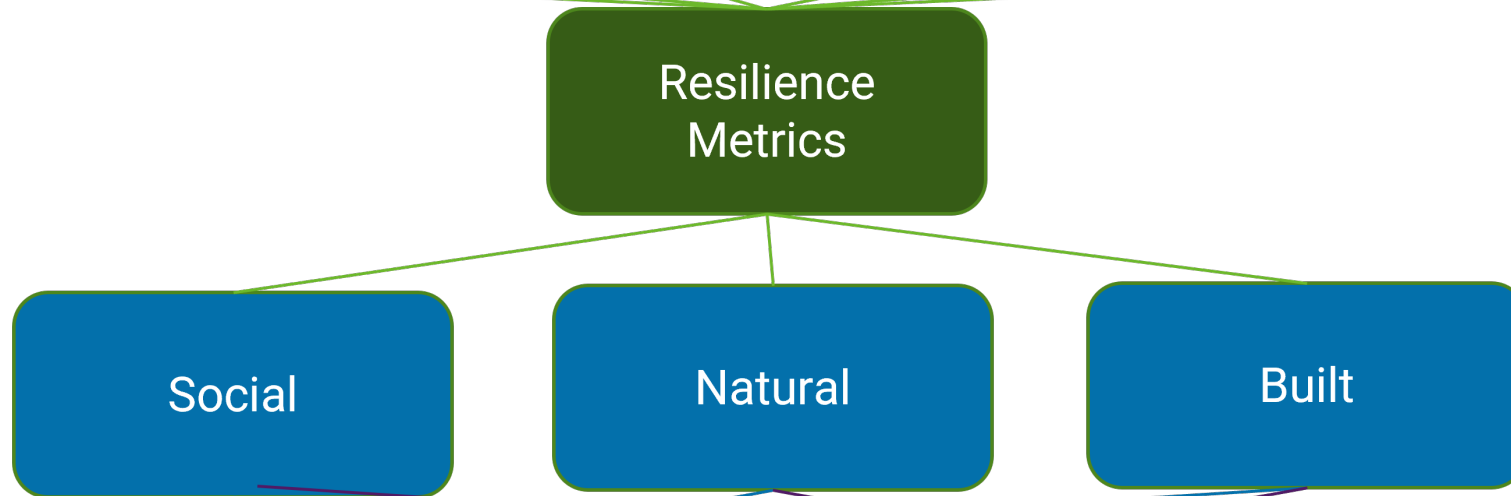
Priority 5



Priority 6



Adaptation Strategy & Resilience Metrics





DRAFT **California Climate Adaptation Strategy**

October 18, 2021

Public comment period ends November 17, 2021.

Options to submit written input include:

Mail: California Natural Resources Agency,

715 P Street, Sacramento, CA 95814

Email: icarp@opr.ca.gov

Additionally, we will hold three regional workshops and two tribal listening sessions to solicit input on the draft. Details will be posted on the [2021 California Climate Adaptation Strategy](#) web page.

Public Comment Draft Out!

- <https://resources.ca.gov/Initiatives/Building-Climate-Resilience/2021-State-Adaptation-Strategy-Update>
- Public Comment period: 10/18/21 – 11/17/21
 - Comments by email: icarp@opr.ca.gov
- Kick-off Webinar – Friday, 10/22/21 at 11am
- Stakeholder Engagement Workshops:
 - Oct. 27th, 4pm – 6pm
 - Nov. 1st, 4:30pm – 6:30pm
 - Nov. 15th, 4pm – 6pm



Adaptation Strategy Priorities

**Strengthen Protections
for Climate Vulnerable
Communities**

**Bolster Public Health and
Safety in Light of
Increasing Climate Risks**

**Build a Climate Resilient
Economy**

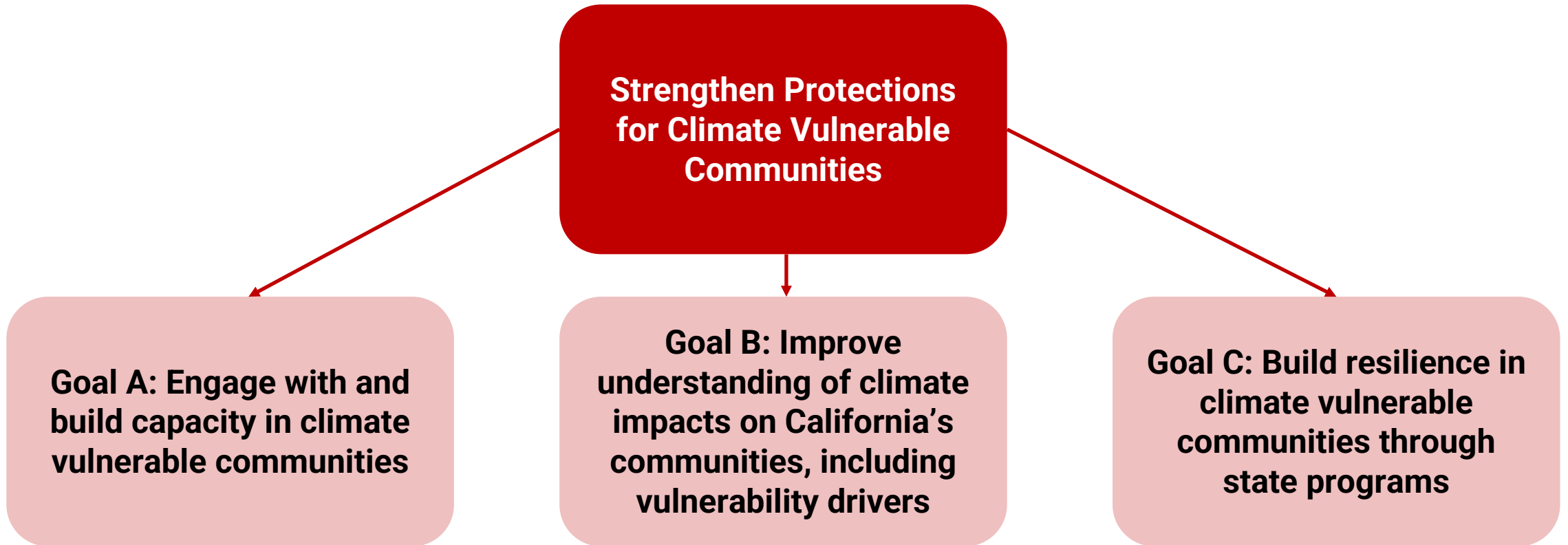
**Accelerate Nature-Based
Climate Solutions and
Strengthen Climate
Resilience of Natural
Systems**

**Make Decisions Based on
the Best Available Climate
Science**

**Partner and Collaborate to
Leverage Resources**



Priority -> Goals





Priority -> Goals -> Actions -> *Metrics!*

Goal A: Engage with and build capacity in climate vulnerable communities

Action 1: Provide technical assistance and funding to expand the capacity and planning capabilities of under-resourced communities, including California Native American tribes, to implement climate change mitigation, adaptation, and resilience projects

Success Metric: Disadvantaged communities have increased success in accessing State climate resilience funding

Success Metric: Under-resourced communities have a greater participation in key decision-making processes on climate change adaptation and resilience



Theory of Change

From the ever-helpful (though not necessarily authoritative) Wikipedia:

- ***Theory of Change** is a methodology for planning, participation, and evaluation that is used in companies, philanthropy, not-for-profit and government sectors to promote social change. Theory of Change defines long-term goals and then maps backward to identify necessary preconditions*



Theory of Change & the Strategy

Priority: Strengthen Protections for Climate Vulnerable Communities

- Goal A: Engage with and build capacity in climate vulnerable communities

Theory of Change would be:

“If the State of CA engages with and builds capacity in climate vulnerable communities, the state will advance climate resilience for all...”



Theory of Change & the Strategy

Priority: Bolster Public Health and Safety in Light of Increasing Climate Risks

- Goal A: Build infrastructure resilience to protect public health and safety

Theory of Change would be:

“If the State of CA builds infrastructure resilience to protect public health and safety, the state will reduce risk and increase climate resilience...”



Natural, Social, Built System Function

Natural / Social / Built Process



Natural / Social / Built System FUNCTION

Theory of Change and System Function

“If the State of CA engages with and builds capacity in climate vulnerable communities, the state will advance climate resilience for all...”

Action 1: Provide technical assistance and funding to expand the capacity and planning capabilities of under-resourced communities, including California Native American tribes, to implement climate change mitigation, adaptation, and resilience projects.

- **Success Metric:** Disadvantaged communities have increased success in accessing

State climate re

- **Timeframe**

- **Success Metric:** decision-makin

- **Timeframe**

- **Success Metric:** other and work

- **Timeframe**

- **Success Metric:** communities in

- **Timeframe**

Action 3: Partner with underserved communities and with tribes in California and tribal governments to build coastal and ocean climate resilience.

- **Success Metric:** Availability of multilingual sea-level rise interpretive and educational materials

- **Timeframe:** Under review

- **Success Metric:** Improve how communities and public agencies learn from each other and work together

- **Timeframe**

- **Success Metric:** organizations

- **Timeframe**

- **Agency/Agencies:** State Coastal

State Coastal

Department of

Development

- **For More Detail:** [Commission on](#)

[Consultation](#)

[San Francisco Bay](#)

Action 7: Through meaningful multilingual and culturally-relevant outreach and engagement, seek and facilitate community input into health impacts studies of climate-related hazards, highlighting disparities and ways to minimize exposures in vulnerable communities.

- **Success Metric:** Number of outreach events and mechanisms implemented to engage community-based organizations, non-governmental organizations and other relevant entities; number of and extent to which studies incorporate community input; number of studies that advance the understanding of disparities, vulnerabilities, and ways to mitigate them

- **Timeframe:** Ongoing

- **Agency/Agencies:** CA Environmental Protection Agency - Office of Environmental Hazard and Health Assessment

- **For More Detail:** [Office of Environmental Health Hazard Assessment Strategic Plan: 2018 Update; Human Health Impacts of Climate Change](#)

Have we achieved social system *function* resilience?

Natural, Social, Built System Function

Action 1: Provide technical assistance and funding to expand the capacity and planning capabilities of under-resourced communities, including California Native American tribes, to implement climate change mitigation, adaptation, and resilience projects.

- **Success Metric:** Disadvantaged communities have increased success in accessing State climate resilience funding
 - **Timeframe:** Under review
- **Success Metric:** Under-resourced communities have a greater participation in key decision-making processes on climate change adaptation and resilience
 - **Timeframe:** Under review
- **Success Metric:** Improve how communities and public agencies learn from each other and work together
 - **Timeframe:** Under review
- **Success Metric:** Fund the participation and leadership of CBOs and frontline communities in adaptation planning
 - **Timeframe:** Under review

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 - **Timeframe:** Under review
- **Agency/Agencies:** CA Natural Resources Agency – Ocean Protection Council, State Coastal Conservancy, Department of Water Resources, Coastal Commission, Department of Fish and Wildlife, State Parks, San Francisco Bay Conservation and Development Commission
- **For More Detail:** [CA Ocean Protection Council Strategic Plan](#), [CA Coastal Commission Environmental Justice Policy](#), [CA Coastal Commission Tribal Consultation Policy](#), [CA State Parks Sea Level Rise Adaptation Strategy](#), [San Francisco Bay Conservation and Development Commission Bay Adapt](#)

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Natural / Social / Built Process



Natural / Social / Built System FUNCTION



Probably Not.

So, we need to understand:

- What else should the State be measuring?
- Where do all of you and your respective efforts fit in, enhance, and build system function?
- What are all of us *not* measuring that we should be measuring?
- How do we ensure the sum is greater than the parts?



Strategy & Prior Discussions

Way back when...

- Include short- and long-term actions in the capital improvement program which would promote resiliency of physical infrastructure to climate change impacts.
- Local building codes updated to account for climate impacts
- Upgrade existing buildings and design new buildings and development projects to withstand climate change impacts
- Access to services and health, safety, and comfort resources and not degraded by climate stressors.
- People returning to cities/towns instead of staying in new places after disasters.

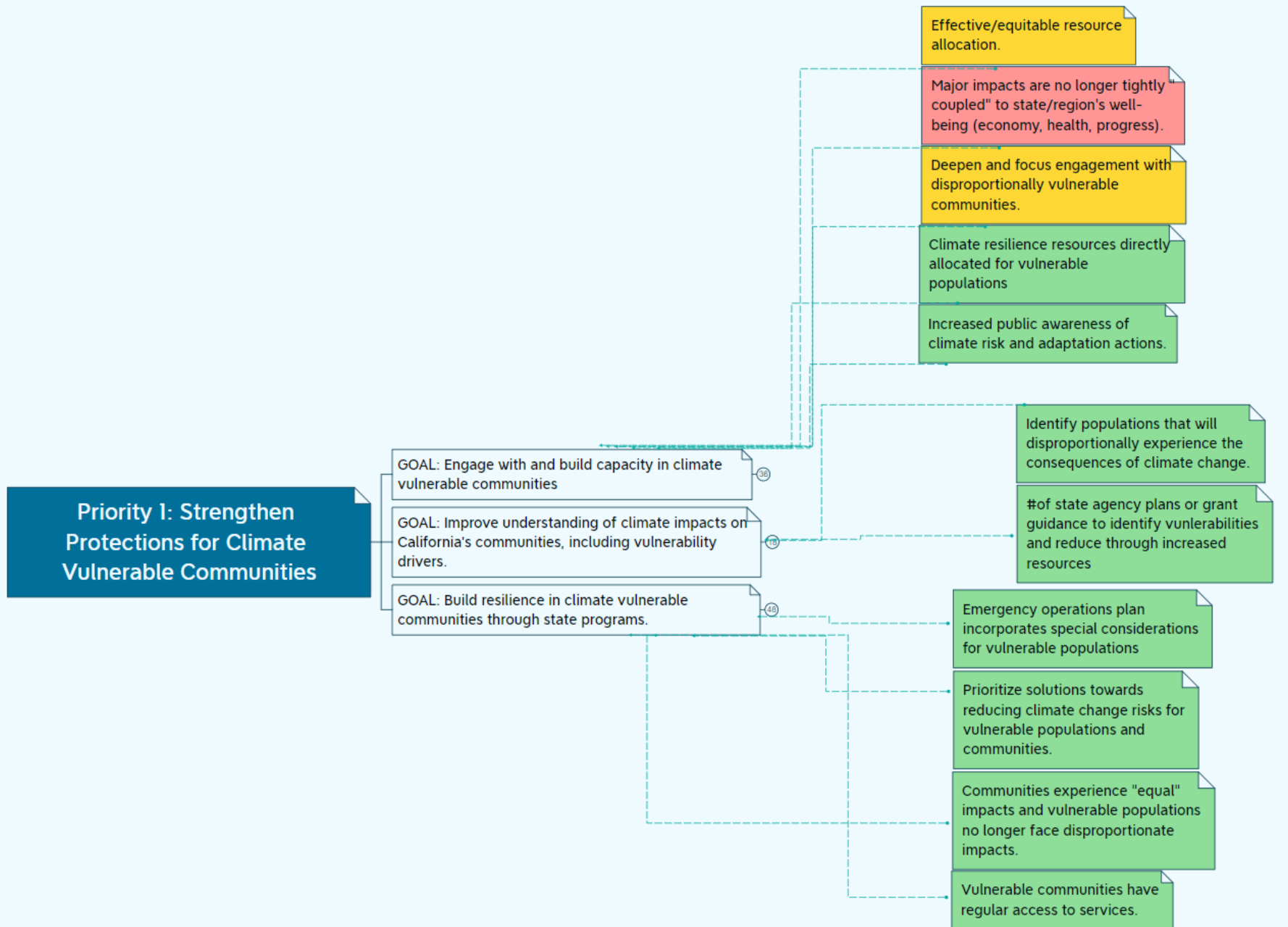


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Overlap of Adaptation Strategy Metrics & Broader Resilience Metrics





Are these the right questions?

- What else should the State be measuring?
- Where do all of you and your respective efforts fit in, enhance, and build system function?
- What are all of us *not* measuring that we should be measuring?
- What else should we ask?



Homework for Nov. 18th

Review:

- Climate Adaptation Strategy (Strategy) with focus on identified success metrics
- Participate in the public comment on the Strategy!
- Review resilience metrics white paper (will be sent end of next week)

Come Prepared to Discuss:

- What else should the State be measuring?
- Where do all of you and your respective efforts fit in, enhance, and build system function?
- What are all of us *not* measuring that we should be measuring?
- [other questions we just identified]



Item Public Comment



Item 4 | General Public Comment



Item 5 | Closing, Future Agenda Items, & Meeting Adjourned



Next Meetings

ICARP Council 4th Quarter Meeting:

- December 10, 2021

[OPR.CA.GOV/MEETINGS/TAC/](https://opr.ca.gov/meetings/tac/)



CALIFORNIA
**CLIMATE
ADAPTATION
STRATEGY**

DRAFT 2021 California Climate Adaptation Strategy Released for Public Comment

JOIN US FOR AN INFORMATIONAL
WEBINAR ON OCT. 22 AT 11 AM

Register at Resources.Ca.Gov

Thank You!



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- ∅ ICARP Newsletter & Announcements <https://tinyurl.com/icarp-newsletter>