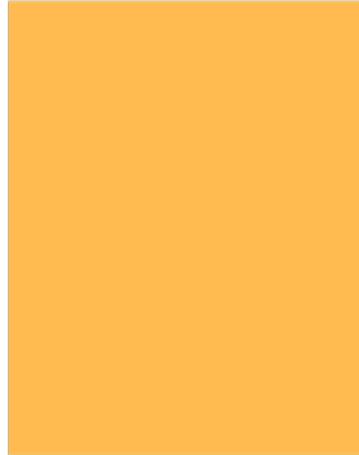


CLIMATE ACTION PLAN

SEPTEMBER 2021



1 INTRODUCTION

1.1 CLIMATE ACTION PLAN PURPOSE AND COMPONENTS

This Climate Action Plan (CAP) details specific measures that will be implemented in Sacramento County (County) by 2030 to reduce greenhouse gas (GHG) emissions from communitywide activities and government operations. It also includes an adaptation plan that recommends actions to reduce the community's vulnerability to the anticipated impacts of climate change.

The CAP has been developed in response to mitigation measures contained in the County's General Plan¹, and the County's adoption of a Climate Emergency Resolution in December 2020², and State legislation including AB 32, SB 32, and SB 743 as well as Executive Orders S-3-05 and B-55-18. The strategies and measures contained in this CAP complement a wide range of policies, plans, and programs that have been adopted by the County, State, and regional agencies to protect communities from hazards and activities contributing to GHG emissions. This CAP is organized into a main CAP document that provides general information about the County's approach and actionable strategies followed by seven appendices containing more information on the analyses used to inform the strategies and measures.

MAIN CAP DOCUMENT

Section 1: Introduction

Section 2: Greenhouse Gas Reduction Strategy (Community and Government Operations)

Section 3: Adaptation Strategy

Section 4: Implementation and Monitoring

Section 5: References

APPENDICES

Appendix A: Climate Change Planning Background – Provides background information on climate change planning and key plans, policies, and regulations at the State level.

Appendix B: Vulnerability Assessment – An assessment of climate change vulnerabilities, used to inform the adaptation strategies and actions included in the CAP.

Appendix C: Applicable General Plan Policies – Contains a matrix of policies in the County's adopted 2030 General Plan which support climate action.

Appendix D: Public and Stakeholder Engagement – Provides an overview of the County's efforts to seek public and stakeholder input on the development of the CAP.

Appendix E: GHG Inventory, Forecasting and Targets – Provides detail on the evaluation of historic and forecast GHG emissions communitywide and from government operations.

¹ Sacramento County General Plan Update Final Environmental Impact Report (2010), Mitigation Measures CC-1 and CC-2

² Resolution of the Board of Supervisors of Sacramento County Declaring a Climate Emergency, December 2020

Appendix F: Additional Options Considered for the CAP – Provides a list of CAP measures that were considered for inclusion, but excluded at this stage in the County’s climate action planning process, and the reasoning behind the exclusion.

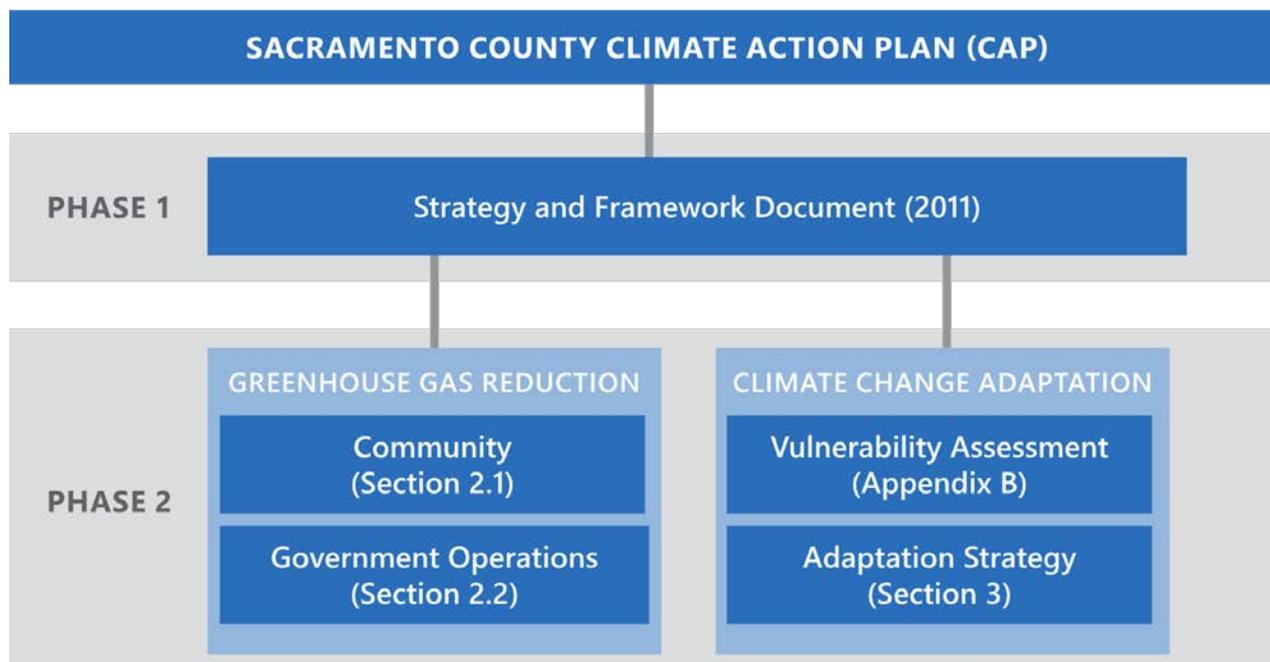
Appendix G: Cost Assessment for GHG Reduction Measures – An evaluation of costs for measure implementation from the perspective of overall measure implementation.

Appendix H: Glossary Terms and Acronyms - A glossary of terms and acronyms used throughout the CAP and appendices.

Appendix I: CAP Consistency Review Checklist - A step-by-step worksheet for development projects to demonstrate compliance with the CAP.

This CAP combines several components prepared by the County in phases into a single document, as illustrated in Figure 1. In Phase 1, the County prepared a Strategy and Framework to guide future planning actions in support of General Plan Policy LU-115. For Phase 2 the County performed assessments of forecast GHG emissions (Appendix E, Section E.2), and quantified reductions (Appendix E, Section E.4), climate change vulnerabilities (Appendix C), GHG reduction measures with timelines (Section 2), and economic analyses (Appendix G). Both phases were guided by public and stakeholder input (Appendix D) and considered the latest climate change science, incorporated into State climate policies and regulations (Appendix A). The result is a set of climate action strategies and measures detailed in the CAP (Sections 2 and 3) that support policies in the adopted General Plan while avoiding redundancy (Appendix C) and infeasibility based on social, technical, and economic factors (Appendix F); and will be monitored and adjusted, if necessary, to ensure long-term performance (Section 4). These described components are included in the CAP so that it may serve as the County’s qualified “plan for the reduction of GHG emissions,” in accordance with criteria identified in Section 15183.5 of the California Environmental Quality Act (CEQA) Guidelines. This would allow the CAP to facilitate streamlining of GHG emissions analyses for individual development projects that comply with the requirements in the CAP by utilizing the CAP Consistency Review Checklist (Appendix I).

Figure 1 Sacramento County Communitywide CAP Components



Source: Sacramento County, 2021.

1.2 BASELINE AND FORECAST GREENHOUSE GAS EMISSIONS

The County prepared GHG inventories for community and government operations as detailed in Appendix E. These results are categorized by sector for a baseline year of 2015. Using population, employment, and housing data, the results from the 2015 baseline year were forecast to 2030 for consistency with the target year for this CAP, which is aligned with the County's General Plan and California's 2017 Climate Change Scoping Plan. The effects of Federal and State legislation and regional polices aimed at reducing GHG emissions were included in the forecast. Table 1 provides results of the baseline and forecast GHG emissions for community and government operations. Table 2 provides a list of policies, legislation, and regulations adopted by agencies outside of the County that affect local GHG emissions compared to the County's 2015 baseline.

Table 1: Sacramento County Baseline and Forecast GHG Emissions by Sector

Sector	2015 Baseline GHG Emissions (MTCO _{2e} /year)	2030 Forecast GHG Emissions (MTCO _{2e} /year)
Community GHG Emissions		
Residential Energy	1,193,311	500,099
Commercial Energy	890,603	244,903
On-Road Vehicles	1,671,596	1,468,071
Off-Road Vehicles	196,769	253,857
Solid Waste	352,909	280,694
Agriculture	254,899	193,373
High-GWP Gases	251,085	245,175
Wastewater	27,253	17,139
Water-Related	15,222	0
Total Community GHG Emissions	4,853,647	3,202,311
Government Operations GHG Emissions		
Employee Commute	38,290	31,818
Vehicle Fleet	29,591	30,808
Buildings and Facilities	28,247	23,736
Airports (buildings and facilities)	18,310	15,920
Water-Related	4,665	3,498
Streetlights and Traffic Signals	3,729	2,796
Wastewater	565	597
Total Government Operations GHG Emissions	123,397	109,172

Source: Ascent Environmental 2021.

Table 2: Legislation or Regional Policies Resulting in County GHG Emissions Reductions by 2030

Policy	Description	GHG Emissions Reductions by 2030 (MT CO ₂ e)
Federal and State Vehicle Efficiency Standards	Federal and State agencies have set tailpipe emissions standards and fuel efficiency standards for medium-and heavy-duty engines and vehicles.	491,758
Federal Off-Road Compression-Ignition Engine Standards	The U.S. Environmental Protection Agency (EPA) has established standards for phasing of EPA diesel engine tiers for off-road compression-ignition equipment.	50,686
Federal Significant New Alternatives Policy	The EPA has established bans on refrigerants and refrigerant blends that contain ozone-depleting substances.	Not quantified
California Renewables Portfolio Standards	The RPS requires energy utility providers to procure 33 percent of electricity from renewable sources by 2020, 50 percent renewable by 2026, 60 percent renewable by 2030, and 100 percent zero-carbon by 2045.	1,059,458
California Building Energy Efficiency Standards	Requires all new buildings in California to comply with energy efficiency standards established by California Energy Commission (CEC).	65,072
Assembly Bill 341	Required California to achieve a 75 percent solid waste diversion target by 2020.	135,149
SMUD 2030 Clean Energy Vision and 2030 Zero Carbon Plan.	Plan adopted in April 2021 outlining SMUD’s strategy for region-wide electricity generation to be zero carbon by 2030 ¹ .	852,975
		Community: 2,600,619 Government Operations: 54,479 Combined: 2,655,098

Notes: SMUD = Sacramento Municipal Utility District. ¹

Source: Ascent Environmental 2021.

1.3 GREENHOUSE GAS REDUCTION TARGETS FOR 2030

To serve as the County’s qualified plan for the reduction of GHGs, the CAP target must be aligned with the State’s 2017 Climate Change Scoping Plan. Based on the forecast GHG emissions and population projections, the County is expected to have an emissions rate of 4.8 metric tons of carbon dioxide equivalents (MT CO₂e) per capita in 2030. This is below the rate of 6 MT CO₂e per capita by 2030 recommended to local governments by the California Air Resources Board (CARB) in the 2017 Climate Change Scoping Plan³. This indicates that the County is on track to meet a legislated State target in 2030, and it is also showing progress toward meeting longer term State goals for GHG reduction under applicable Executive Orders⁴. See Appendix E for more detail on target setting.

³ [https://ww2.arb.ca.gov/sites/default/files/classic/cc/scopingplan/scoping_plan_2017.pdf?_ Page 99](https://ww2.arb.ca.gov/sites/default/files/classic/cc/scopingplan/scoping_plan_2017.pdf?_Page%2099)

⁴ 80% reduction in statewide GHG emissions by 2050 under Executive Order S-3-05 and statewide carbon neutrality by 2045 under Executive Order B-55-18

The GHG reduction measures contained in Section 2 of this CAP will allow for additional reductions to be achieved beyond 4.8 MT CO₂e per capita forecast, further outpacing the 6 MT CO₂e per capita recommended by CARB. The quantified GHG reduction measures serve two purposes related to targets. First, they are essential for putting the County on a path toward meeting a 2030 carbon neutrality goal, established under the Board of Supervisors approved Climate Emergency Resolution, passed in December 2020. Second, they serve as contingencies for any external GHG reducing policies described in Table 2 that are not achieving the reductions anticipated. The carbon neutrality goal was passed after significant progress had already been made on climate planning activities for the County aimed at alignment with State legislated targets for 2030 under SB 32. The County goal was also established in advance of State guidance on local planning to achieve carbon neutrality, which is anticipated in 2022 through an update to CARB's Climate Change Scoping Plan⁵. Thus, the County's approach in this CAP is to maintain momentum and get reductions started sooner rather than later, while providing flexibility for the CAP to be updated later to meet carbon neutrality objectives as described in Section 2.4 of this CAP. Thus, the County's approach to carbon neutrality by 2030 is to proceed with GHG reduction and carbon sequestration measures under this CAP and then expand regional GHG reduction and carbon sequestration programs as part of an overall comprehensive CAP update. The CAP update will be concurrent with initiation of an anticipated update to the County's 2030 General Plan and availability of further guidance on recommended GHG reduction and carbon sequestration measures for carbon neutrality to be included in updates to the California's Climate Change Scoping Plan⁶ and Natural and Working Lands Climate Smart Strategy⁷.

1.4 EXISTING REGIONAL ACTIONS

The CAP is developed in the context of existing plans and policies occurring within the County that support the reduction of GHG emissions and to prepare the community for the anticipated effects of climate change. These include, but are not limited to:

- ▶ Adopted General Plan policies that guide resource conservation in future land development and transportation planning, as shown in Appendix C.
- ▶ Sacramento County's publication of Transportation Analysis Guidelines in September 2020⁸, establishing Vehicle Miles Traveled (VMT) as the metric for evaluating potential environmental impacts from transportation in new development projects pursuant to Senate Bill 743.
- ▶ County led update to the Sacramento County Local Hazard Mitigation Plan⁹, in coordination with incorporated cities, reclamation districts, and other special districts.
- ▶ SACOG adoption of a region-wide Sustainable Communities Strategy in 2019¹⁰, which provides policies and implementation actions for GHG reductions in the on-road transportation sector, consistent with statewide targets set by CARB.

⁵ Scoping Plan Meetings & Workshops | California Air Resources Board

⁶ Executive Order B-55-18 to Achieve Carbon Neutrality, Order #3, "CARB shall work with relevant state agencies to ensure future Scoping Plans identify and recommend measures to achieve the carbon neutrality goal."

⁷ Executive Order N-82-20, Order #6. Within one year 10/7/2020 order adoption selected state agencies "shall develop a Natural and Working Lands Climate Smart Strategy that serves as a framework to advances the State's carbon neutrality goal and builds climate resilience [sic]."

⁸ <https://sacdot.saccounty.net/Documents/A%20to%20Z%20Folder/Traffic%20Analysis/Transportation%20Analysis%20Guidelines%2009.10.20.pdf>

⁹ <https://waterresources.saccounty.net/stormready/Documents/LHMP%202020/Public%20Outreach%20FlyerF.pdf>

¹⁰ <https://www.sacog.org/2020-metropolitan-transportation-plansustainable-communities-strategy-update>

- ▶ SMAQMD guidance to lead agencies, updated in April 2020, on reducing GHG emissions from new land development projects through best management practices¹¹ and an Urban Heat Island mitigation project assessing vulnerability and solutions specifically to heat-related climate change impacts¹².
- ▶ Sacramento County's adoption in December 2020 of GHG significance thresholds for evaluating potential climate change impacts of new projects subject to CEQA.
- ▶ Sacramento County's declaration of a climate emergency in December 2020.
- ▶ Sacramento County's inclusion of an Infill Fee in Development Agreements adopted as part of two specific plans approved in 2020.
- ▶ SMUD operation of energy efficiency programs for County residents with performance tracked by reduction of carbon emissions¹³ and adoption of a climate resolution which aims to transition all electricity delivered to customers in Sacramento County to GHG-free sources by 2030¹⁴.
- ▶ SacRT initiatives which include providing County residents access to microtransit, electric busses, and expanded light rail service¹⁵.

2 GREENHOUSE GAS REDUCTION STRATEGY

This section outlines specific GHG reduction measures to be implemented within Sacramento County. These include quantified and non-quantified measures. The following sustainability planning strategies were considered when developing the measures.

- ▶ **Clean Energy:** Focuses on providing clean and affordable sources of energy for the County by increasing the use of renewables.
- ▶ **Low and Zero Emissions Vehicles and Equipment:** Support electrification and alternative fuels in on- and off-road vehicles and equipment, as well as fuel efficiency measures that would reduce the amount of gasoline and diesel fuel consumed.
- ▶ **Green Buildings:** Reduce commercial and residential building energy and water consumption, and incorporate design features that reduce or eliminate the need for fossil fuels.
- ▶ **Natural and Working Lands:** Sequester carbon dioxide from the atmosphere by focusing on habitat preservation, increasing urban forest and connected open space, and carbon farming.
- ▶ **Reduced Driving and Alternative Transportation Modes:** Reduce emissions-generating activities by promoting public transit, and alternative modes of transportation such as biking and walking, carpooling, and transit-oriented development

The detailed GHG reduction measure analyses in Sections 2.1 and 2.2 contain the following information for each measure.

- ▶ **Measure:** A description of the program, policy, or project the County will implement that will reduce GHG emissions.

¹¹ <http://www.airquality.org/LandUseTransportation/Documents/Ch6GHG4-25-2020.pdf>

¹² <https://urbanheat-smaqmd.hub.arcgis.com/pages/reports>

¹³ <https://www.smud.org/en/Corporate/About-us/News-and-Media/2020/2020/SMUD-first-in-US-to-change-efficiency-metric-to-avoided-carbon>

¹⁴ <https://www.smud.org/en/Corporate/About-us/News-and-Media/2020/2020/SMUD-Board-of-Directors-adopts-climate-emergency-declaration>

¹⁵ <https://www.sacrt.com/apps/sacrt-initiatives/>

- ▶ **Implementation:** Specific actions the county will take to achieve the described measure objective.
- ▶ **Implementing County Department:** The County department(s) responsible for implementation (acronyms identified below). Also includes information on external partners that could potentially collaborate for measure implementation, if applicable.
 - BAC = Building Assistance Center;
 - BP&I = Building Permits and Inspection;
 - CEO = County Executive Office;
 - DGS = Department of General Services;
 - DPS = Department of Personnel Services;
 - DWMR = Department of Waste Management and Recycling;
 - ED = Economic Development;
 - EMD = Environmental Management Department;
 - PER = Planning and Environmental Review;
 - PIO = Public Information Office;
 - SACDOT = Sacramento County Department of Transportation;
 - SCAS = Sacramento County Airport System;
 - SCWA = Sacramento County Water Agency; and
 - SM = Sustainability Manager.
- ▶ **Timeframe:** When the measure will be implemented, categorized as Near-term (2020-2023), Mid-term (2024-2026), and Long-term (2027-2030).
- ▶ **GHG Reduction Potential:** Estimated MT CO₂e reduced in 2030, if measure is quantified. See Appendix E, Table E-6 for modeling assumptions. Measures unable to be estimated indicated as “Not Quantified”.
- ▶ **Sector:** Describes which emissions sector from the GHG Inventory to which the measure applies.
- ▶ **Target Indicator:** Describes metrics that can be used to monitor progress toward goal achievement.

2.1 COMMUNITY GREENHOUSE GAS REDUCTION MEASURES

The total estimated GHG emission reduction from all quantifiable community measures is 772,095 MTCO₂e in 2030.

Table 3: Summary of Community GHG Reduction Measures

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹
GHG-01	Carbon Farming	Agriculture	377,692
GHG-02	Urban Forestry	Agriculture	1,681
GHG-03	Urban-Rural Agricultural Connections	Agriculture	Not Quantified

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹
GHG-04	Increase Energy Efficiency and Electrification of Existing Commercial/Non-Residential Buildings and Facilities	Energy - Commercial	16,006
GHG-05	Increase Energy Efficiency and Electrification of New Commercial/Non-residential Buildings and Facilities	Energy - Commercial	3,177
GHG-06	Energy Efficiency and Electrification of Existing Residential Buildings	Energy - Residential	177,187
GHG-07	Eliminate Fossil Fuel Consumption in New Residential Buildings	Energy - Residential	66,964
GHG-08	Tier 4 Final Construction Equipment	Vehicles - Off-Road	6,370
GHG-09	Electric Landscaping Equipment	Vehicles - Off-Road	Not Quantified
GHG-10	Electric Vehicle Infrastructure Program	Vehicles - On-Road	34,867
GHG-11	Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled	Vehicles - On-Road	22,037
GHG-12	Transportation System Management Plan for Non-Residential Projects	Vehicles - On-Road	15,570
GHG-13	Revise Parking Standards for Non-Residential Development	Vehicles - On-Road	4,634
GHG-14	Improved Transit Access	Vehicles - On-Road	1,854
GHG-15	Improved Pedestrian Network and Facilities	Vehicles - On-Road	1,390
GHG-16	Traffic Calming Measures	Vehicles - On-Road	927
GHG-17	Improved Bicycle Network and Facilities	Vehicles - On-Road	348
GHG-18	Improve Fuel Efficiency Standards	Vehicles - On-Road	Not Quantified
GHG-19	EV Parking Code	Vehicles - On-Road	Not Quantified
GHG-20	Safe Routes to School	Vehicles - On-Road	Not Quantified
GHG-21	Update Community and Corridor Plans	Vehicles - On-Road	Not Quantified
GHG-22	Connecting Key Destinations	Vehicles - On-Road	Not Quantified
GHG-23	Incentivize Infill Development	Vehicles - On-Road	Not Quantified
GHG-24	Increase Organic Waste Diversion	Solid Waste	39,186
GHG-25	Electric Irrigation Pumps	Water	2,205
GHG-26	South Sacramento Habitat Conservation Plan	Agriculture	Not Quantified
GHG-27	Shared Electric Vehicles at Affordable Housing Projects	Vehicles - On-Road	Not Quantified
GHG-28	Reduce or Eliminate Emissions in Agricultural Equipment	Agriculture	Not Quantified
GHG-29	Electric or Sustainably Fueled Construction Equipment	Vehicles - Off Road	Not Quantified
Total GHG Reduction from Quantified Measures			772,095

Source: Ascent Environmental 2021.

MEASURE GHG-01: CARBON FARMING

Measure: The County will work with local farmers, ranchers, and land managers to promote and increase carbon sequestration on agricultural lands through the development of carbon farming plans.

Implementation: Develop a program by 2024 that, through targeted outreach, provides carbon sequestration education and resources to relevant stakeholders (e.g., farmers, ranchers, and land managers). The program will focus on educating stakeholders about the co-benefits of implementing carbon sequestration practices and the variety of financial and technical resources that are currently available to assist farmers and ranchers in implementation. This program may be coordinated with industry groups and non-profits.

Implementing County Department: SM and AC

Timeframe: Mid-term

GHG Reduction Potential: 377,692 MT CO₂e per year by 2030.

Sector: Agriculture

Target Indicator: Implementation of a variety of carbon farming practices on agricultural land in Sacramento County. This assumes the following techniques and/or practices:

- ▶ Application of compost instead of synthetic fertilizer to 55,000 acres of cropland by 2026, and 113,286 acres of cropland by 2030;
- ▶ Grazing Management to improve irrigated pasture conditions, applied to 4,000 acres by 2026, 8,275 acres by 2030;
- ▶ Decrease fallow frequency or add perennial crops to rotations applied to 30,000 acres by 2026, and 65,632 acres by 2030, and;
- ▶ Tillage reduced, eliminated, or changed to strip tilling on 7,000 acres by 2026, and 15,191 acres by 2030.

MEASURE GHG-02: URBAN FORESTRY

Measure: The County will maintain and enhance the urban forest to provide shading that improves energy conservation in adjacent dwellings and reduces the urban heat island effect.

Implementation: Partner with the Sacramento Tree Foundation to use existing programs such as NeighborWoods and NATURE to increase tree canopy, including in redeveloping areas. Priority planting locations shall be in the County's Environmental Justice Communities identified in the Environmental Justice Element. Ensure that trees required to be planted through the Zoning Code are properly maintained to maximize tree health and ensure longevity to realize the benefits of urban trees. Forge partnerships with community cooperatives to organize tree-planting and maintenance events.

Implementing County Department: BP&I, PER, and RP

Timeframe: Near-term

GHG Reduction Potential: 1,681 MT CO₂e per year by 2030. **Co-Benefit** Co-benefit with adaptation measure Temp-07 and Temp-08.

Sector: Agriculture

Target Indicator: Track projects where the County has participated in preserving or adding to the urban forest, setting goal for 20,000 new trees by 2026, and 47,498 new trees by 2030.

MEASURE GHG-03: URBAN-RURAL AGRICULTURAL CONNECTIONS

Measure: The County will support the Food Systems Assessment and Food Action Plan described in the General Plan Environmental Justice Element by promoting Farm to Fork concepts.

Implementation: Publish on the County website a directory of local providers of Community Supported Agriculture and food delivery services. Publish information on local Farm to Fork events such as the annual Farm to Form Festival and County restaurants and farms participating in Farm-to-Fork weeks.

Implementing County Department: SM and PIO

Timeframe: Long-term

GHG Reduction Potential: Not Quantified

Sector: Agriculture

Target Indicator: Publication of described information on County website.

MEASURE GHG-04: INCREASE ENERGY EFFICIENCY AND ELECTRIFICATION OF EXISTING COMMERCIAL/NON-RESIDENTIAL BUILDINGS AND FACILITIES

Measure: The County will develop a program aimed at assisting local utilities with implementing commercial energy efficiency and electrification programs to achieve reductions in energy consumption.

Implementation: An outreach program will be developed that provides education strategies that enable commercial energy conservation and gas-to-electric conversions in non-residential buildings for space and water heating. Develop online videos targeted toward building owners and tenants that are hosted on the County's website or linked to SMUD and PG&E web interfaces. In addition to education, video tutorials can explain to business owners how to enroll in real time energy use monitoring tools to track energy use compared to historic levels and within the community through the EnergyStar™ Portfolio Manager, or other tools offered by third-party providers.

Implementing County Department: SM, PER and BP&I via the BAC with PIO support

Timeframe: Long-term

GHG Reduction Potential: 16,006 MT CO₂e per year by 2030. **Co-Benefit** Co-benefit with adaptation measure Temp-07 and Temp-08.

Sector: Energy - Commercial

Target Indicator: Develop outreach program with an objective to have 10 percent of existing businesses participate in energy efficiency upgrades by 2026, and 25 percent by 2030.

MEASURE GHG-05: INCREASE ENERGY EFFICIENCY AND ELECTRIFICATION OF NEW COMMERCIAL/NON-RESIDENTIAL BUILDINGS OR FACILITIES

Measure: Develop a reach code requiring new commercial and non-residential buildings obtaining building permits to meet the following requirements subject to cost effectiveness and feasibility analyses:

- ▶ Building permit applications filed on or after January 1, 2023, for newly constructed buildings that are three stories or less to be all-electric buildings;

-
- ▶ Building permit applications filed on or after January 1, 2026, for newly constructed buildings that are four stories or more to be all-electric buildings; and
 - ▶ Limited exemptions for specific uses, available only for building permits filed on or before December 31, 2025, provided that the associated GHG emissions are offset through an accredited local carbon offset program:
 - A limited exemption for food establishments for cooking equipment only;
 - A limited exemption for manufacturing process loads within a manufacturing or industrial facility¹⁶;
 - A limited exemption for essential medical facilities such as hospitals that may require natural gas;
 - A limited exemption for regulated affordable housing when virtual net energy metering is not available, for water heating only; and
 - If the technology to require construction of an all-electric building for ground floor food service establishments, manufacturing or industrial facilities, or regulated affordable housing is not feasible and available by July 1, 2025, the Board of Supervisors may consider extending the limited exemption until technology is feasible and available.

Implementation: Prepare an ordinance for review by the Board of Supervisors.

Implementing County Department: SM, BP&I

Timeframe: Near-term. Adopt ordinance no later than December 2022.

GHG Reduction Potential: 3,177 MT CO₂e per year by 2030. **Co-Benefit** Co-benefit with adaptation measure Temp-07 and Temp-08.

Sector: Energy - Commercial

Target Indicator: Adoption of ordinance and enforcement on commercial buildings obtaining permits after January 1, 2023 and 2026. Set a target for 230,000 therms of forecast natural gas consumption to be avoided by 2026, and 470,000 therms to be avoided by 2030.

MEASURE GHG-06: ENERGY EFFICIENCY AND ELECTRIFICATION OF EXISTING RESIDENTIAL BUILDINGS

Measure: The County will adopt a point-of-sale requirement for mixed-fuel single family homes to upgrade a minimum of one natural gas appliance or piece of equipment to an electrically-powered equivalent or upgrade an electrical panel or branch circuit to support an electrical appliance or piece of equipment in the future. In addition, the County will assist local utilities with increasing participation in residential retrofit programs to achieve a reduction in overall energy consumption.

To support utilities on residential energy efficiency, the County will develop and implement a program that provides education on strategies that promote energy savings in residential buildings. Videos featuring energy savings tips will be recorded and hosted on the County's website and a marketing campaign will be

¹⁶ A manufacturing or industrial facility means a building with the occupancy classification as defined in the California Building Code, Chapter 3, Section 306, Group F or Section 313, Group L. Group F refers to the use of a building or structure, or a portion thereof, for assembling, disassembling, fabricating, finishing, manufacturing, packaging, repair, or processing operations that are not classified as a Group H hazardous or Group S storage occupancy. Group L refers to a room building or area where the use and storage of hazardous materials are utilized for testing, analysis, instruction, research, or development activities.

developed to advertise the availability of this information. A video shall also be created that shows residents how to monitor their energy use through SMUD and PG&E web interfaces or share their energy use with third parties for more detailed analytics on energy use. An information sheet will also be published on the County's CAP Portal described in Section 4 on methods that can be used to retrofit buildings for energy efficiency, including upgrading to EnergyStar™-certified appliances, more efficient HVAC systems, weatherization, and comprehensive whole home retrofitting.

Implementation: The County Assessor will update the Preliminary Change of Ownership Report (Form BOE-502-A), Part 4 Property Information, to request that the property seller provide information on which fuel sources are used in the home (e.g., electricity, natural gas, and/or propane). If natural gas and propane are fuels used at the property, the owner will be requested to provide a description of the change out of at least one appliance supporting building electrification since acquiring the property, or within the previous two years. The information requested should include a serial number for the new electric appliance, where purchased, and contact information for the contractor who performed the installation. Eligible upgrades may include heat pump water heaters, induction cooktops, heat pump space heaters, electrical panel and branch circuit upgrades, rooftop solar, hard-wired Level 2 or higher electric vehicle chargers, or permanent removal of a fireplace.

Implementing County Department: SM, County Assessor, PER and BP&I via the BAC with PIO support

Timeframe: Mid-term

GHG Reduction Potential: 177,187 MT CO₂e per year by 2030.

Sector: Building Energy

Target Indicator: Develop outreach program with an objective to have 50 percent of existing residences participate in energy efficiency upgrades by 2030. Establish a point-of-sale electrification retrofit program aimed at electrifying 30 percent of existing residential buildings by 2030. Target 10,000,000 therms of forecast natural gas consumption by 2026 and 23,990,108 therms avoided by 2030.

MEASURE GHG-07: ELIMINATE FOSSIL FUEL CONSUMPTION IN NEW RESIDENTIAL BUILDINGS

Measure: Require pre-wiring for all-electric appliances and equipment in all mixed-fuel new single-family dwellings and multi-family buildings constructed prior to January 1, 2023. Require all new residential construction in the County to be all-electric per the following requirements subject to cost effectiveness and feasibility analyses:

- ▶ Building permit applications filed on or after January 1, 2023, for newly constructed residential buildings that are three stories or less to be all-electric buildings;
- ▶ Building permit applications filed on or after January 1, 2026, for newly constructed residential buildings that are four stories or more to be all-electric buildings.

Implementation: The County will develop and adopt an energy reach code requiring all new single-family and low-rise and mid-rise multi-family residential buildings obtaining building permits after January 1, 2023, to be designed as all-electric buildings. Development of the energy reach code will include cost effectiveness and feasibility analyses.

Implementing County Department: SM and BP&I

Timeframe: Mid-term.

GHG Reduction Potential: 66,964 MT CO₂e per year by 2030.

Sector: Building Energy

Target Indicator: Adoption of a reach code prior to January 1, 2023. All new low-rise and mid-rise residential buildings all-electric after January 2023. Target having 8,000 dwelling units all-electric by 2027.

MEASURE GHG-08: TIER 4 FINAL CONSTRUCTION EQUIPMENT

Measure: EPA-rated Tier 4 final diesel engines required in new construction projects when electric-powered construction equipment is infeasible or unavailable. Project applicants will include Tier 4 final engines in construction lists prior to receiving building permits.

Implementation: Review equipment planned for use in construction during the project application.

Implementing County Department: PER and BP&I

Timeframe: Near-term.

GHG Reduction Potential: 6,370 MT CO₂e per year by 2030.

Sector: Off-Road Vehicles

Target Indicator: 40 percent of diesel-fueled construction equipment achieve Tier 4 final-rated diesel engines by 2026, and 100 percent by 2030.

MEASURE GHG-09: ELECTRIC LANDSCAPING EQUIPMENT

Measure: The County will work with SMAQMD to establish an incentive program to trade in fossil fuel-powered landscaping equipment for electric versions.

Implementation: Create a drop-off point for fossil-fuel powered landscaping equipment at the North Area Recovery Station Household Hazardous Waste Facility, and other appropriate County-operated facilities.

Implementing County Department: DWMR and SM

Timeframe: Near-term

GHG Reduction Potential: Not quantified.

Sector: Off-Road Vehicles

Target Indicator: Track the number of vouchers issued for the exchange of fossil-fuel powered lawnmowers, leaf blowers, and weed trimmers. Aim to have 1,000 pieces of landscaping equipment traded in by 2026.

MEASURE GHG-10: ELECTRIC VEHICLE INFRASTRUCTURE PROGRAM

Measure: The County will implement the Sacramento Area Plug-In Electric Vehicle Collaborative's Electric Vehicle Readiness and Infrastructure Plan to increase the electric vehicle (EV) network capacity through infrastructure, fleet changes, funding mechanisms, utility coordination, and education.

Implementation: Install EV chargers throughout the community working with third-party EV installers and operators.

Implementing County Department: SM

Timeframe: Long-term

GHG Reduction Potential: 34,867 MT CO₂e per year by 2030.

Sector: On-Road Vehicles

Target Indicator: 1,000 chargers (4 percent Level 1, 80 percent Level 2, and 16 percent DC Fast Charge) installed by 2025, and 2,500 installed by 2030.

MEASURE GHG-11: REDUCE EMISSIONS FROM NEW RESIDENTIAL AND OFFICE/BUSINESS PROFESSIONAL DEVELOPMENT VEHICLE MILES TRAVELED

Measure: The County will achieve a 15 percent reduction in daily VMT compared to the regional average for all new residential and office/business professional development in the County, consistent with Policy CI-5 of the General Plan Circulation Element. Where the target reduction is infeasible for individual projects as determined through the CEQA process, participation in a VMT mitigation program shall be required to offset VMT impacts.

Implementation: New proposed residential and office/business professional development projects must demonstrate that project daily VMT per service population is equal to or below the established VMT thresholds established for the applicable land use designation identified in Table CI-1 of the General Plan Circulation Element. Projects which do not meet these VMT thresholds will be required to implement mitigation measures to ensure the VMT targets are met. The following actions related to the development and implementation of mitigation measures would be undertaken:

- ▶ Ensure that all feasible on-site VMT mitigation measures are prioritized and implemented prior to the development of off-site mitigation measures; and
- ▶ Develop and adopt a VMT mitigation program (e.g., VMT mitigation fee, bank, or exchange) to offset project-level and cumulative VMT impacts from projects with funding allocated towards VMT improvement projects.

Implementing County Department: PER and SACDOT

Timeframe: Near-term

GHG Reduction Potential: 22,037 MT CO₂e per year by 2030.

Sector: On-Road Transportation

Target Indicator: 7 percent reduction in VMT from forecast new residential and office/business professional development by 2026 and 10 percent by 2030.

MEASURE GHG-12: TRANSPORTATION SYSTEM MANAGEMENT PLAN FOR NON-RESIDENTIAL PROJECTS

Measure: The County will review and update Section 5.9.6.F of the Zoning Code, which requires a Transportation System Management (TSM) Plan for qualifying projects, to ensure that the ordinance is comprehensive, enforceable, and consistent with the GHG reduction target.

Implementation: The updated TSM Plan will define the minimum trip generation requirements for new non-residential development projects and include a monitoring and reporting mechanism to demonstrate on-going compliance and ensure enforcement. Considerations when reviewing and updating the TSM Plan ordinance should include:

-
- ▶ project types and sizes required to implement a TSM Plan;
 - ▶ development of a preferred/most effective set of TSM measures for developers to choose from;
 - ▶ development of monitoring and reporting requirements that developers or property owners would be responsible for submitting to the County on an annual basis; and
 - ▶ identification of County division responsible for reviewing annual progress reporting of individual projects.

Implementing County Department: SM, PER, and SACDOT

Timeframe: Near-term

GHG Reduction Potential: 15,570 MT CO₂e per year by 2030.

Sector: On-Road Transportation

Target Indicator: Update the Zoning Code to include described TSM Plan requirements by December 2023.

MEASURE GHG-13: REVISE PARKING STANDARDS FOR NON-RESIDENTIAL DEVELOPMENT

Measure: The County will study and revise the current parking standards for new non-residential development through changes to the Sacramento County Zoning Code. This measure will consist of the County implementation of reduced minimum parking standards and shared parking requirements. Reducing minimum parking standards allows developers to provide the amount of parking they deem appropriate based on market demand rather than requiring universal parking standards which disregard local data as well as the scale, use, and location of the proposed development. Minimizing parking standards reduces construction costs, shifts development growth patterns, and encourages the use of alternative modes of transportation, thus reducing VMT. Shared parking is a parking management tool that allows parking facilities to be used more efficiently by sharing spaces with more than one user. Most parking spaces are only used part-time, and a significant portion of many parking facilities are underutilized.

Implementation: The process for updating the parking standards could include the following actions:

- ▶ study of minimum parking requirements based on local data (demand);
- ▶ development of new parking standards based on the local parking demand study; and
- ▶ integration of new parking standards into the Sacramento County Zoning Code.

The inclusion of mutually supportive parking management strategies is recommended for effective implementation and to mitigate potential parking spillover into surrounding areas. These include the following actions:

- ▶ unbundling parking for new developments;
- ▶ requiring residential area parking permits; and
- ▶ implementing on-street parking regulations.

Additionally, the County will update the Zoning Ordinance to require shared parking facilities for uses in new non-residential development that have staggered parking demands at different times of the day.

Implementing County Department: PER

Timeframe: Near-term

GHG Reduction Potential: 4,634 MT CO₂e per year by 2030.

Sector: On-Road Transportation

Target Indicator: Update the parking standards by end of 2022.

MEASURE GHG-14: IMPROVED TRANSIT ACCESS

Measure: The County will support and work with Sacramento RT, Transportation Management Associations, and other transit providers in addressing identified gaps in public transit networks through implementation of the policies in the General Plan Circulation Element which seek to help by “promoting transit services, assuring that users are provided with adequate transportation choices, addressing user needs, developing convenient transfers between transportation systems, and ensuring adequate funding for the transit network” (Sacramento County 2011).

Implementation: The County could implement this measure through the following actions:

- ▶ Provide and improve connections to transit stations by identifying, prioritizing, and seeking funding to plan and construct roadways, bikeways, and pedestrian improvements within a half-mile of existing and planned transit stations;
- ▶ Work with Sacramento RT to expand the local transit network by adding or modifying existing transit service to enhance the service in areas with the greatest need;
- ▶ Work with Sacramento RT to reduce transit-passenger travel time by providing reduced headways and increased speed and reliability along the most heavily traveled transit routes within the County; and
- ▶ Explore a potential partnership with Sacramento RT when developing the VMT mitigation program (e.g., VMT mitigation fee, bank, or exchange), which could provide a new funding mechanism for these improvements.

Implementing County Department: PER and SACDOT..

Timeframe: Long-term

GHG Reduction Potential: 1,854 MT CO₂e per year by 2030.

Sector: On-Road Transportation

Target Indicator: Completion of all actions described in implementation section no later than 2026.

MEASURE GHG-15: IMPROVED PEDESTRIAN NETWORK AND FACILITIES

Measure: The County will update the Pedestrian Master Plan and will implement projects and programs identified in the Pedestrian Master Plan to reduce barriers to walking and increase mobility for all users of the roadways.

Implementation: The County will update the Pedestrian Master Plan, or adopt a replacement such as the in-progress Active Transportation Plan to:

- ▶ Identify all gaps in the pedestrian network throughout the County;
- ▶ Identify barriers and constraints to pedestrian mobility in the County;
- ▶ Develop a methodology for prioritizing future pedestrian improvements which could be based on pedestrian demand and deficiency;
- ▶ Develop a pedestrian capital improvement program (CIP);
- ▶ The updates should reference the VMT mitigation program in GHG-11 (e.g., VMT mitigation fee, bank, or exchange), which could provide a new funding mechanism for these improvements; and
- ▶ Develop a complete streets policy and implementation program consistent with the SACOG Policy to Practice Cycle to enhance pedestrian mobility.

Implementing County Department: SM and SACDOT

Timeframe: Mid-term

GHG Reduction Potential: 1,390 MT CO₂e per year by 2030.

Sector: On-Road Transportation

Target Indicator: 50 percent of projects identified in the Pedestrian Master Plan (or Active Transportation Plan when adopted) built out by 2026, and 75 percent built out by 2030.

MEASURE GHG-16: TRAFFIC CALMING MEASURES

Measure: The County will implement traffic calming measures to decrease traffic volumes and speeds and increase biking and walking trips by residents.

Traffic calming measures such as marked crosswalks, count-down signal timers, curb extensions, speed tables, raised crosswalks, raised intersections, median islands, tight corner radii, roundabouts or mini circles, on-street parking, planter strips with street trees, and bulb-outs have been shown to divert traffic from local streets and decrease vehicle speeds when present. In turn, those who would otherwise be deterred by high traffic volumes and speeds on local roads are more likely to walk and bike to destinations. Through traffic calming measure requirements for new roadway development and the inclusion of traffic calming features on existing roadways and intersections, the County can encourage residents to take more trips by active transportation modes such as biking and walking.

Implementation: The County could implement this measure through the following actions:

- ▶ Develop a complete streets policy and implementation program consistent with the SACOG Policy to Practice Cycle and that incorporates traffic calming measures;
- ▶ Review and potentially update County development standards for new roadways and existing roadway improvements to include traffic calming measures;
- ▶ Install a variety of traffic calming measures on streets and intersections, prioritizing measures proven to promote trips by active transportation modes; and
- ▶ Traffic calming measures could be included in, and funded by, a potential VMT mitigation program described in GHG-11 (e.g., VMT mitigation fee, bank, or exchange).

Implementing County Department: SACDOT

Timeframe: Long-term

GHG Reduction Potential: 927 MTCO_{2e}/year by 2030.

Sector: On-Road Transportation

Target Indicator: 10 percent of arterials, collectors, and intersections within existing urbanized areas improved by 2025. 25 percent of arterials, collectors, and intersections improved by 2030.

MEASURE GHG-17: IMPROVED BICYCLE NETWORK AND FACILITIES

Measure: The County will improve the bicycle network to provide for safe and convenient bicycle travel through implementation of the Bicycle Master Plan and the improvement of bicycle infrastructure.

Implementation: The County could implement this measure through the following actions:

- ▶ Implement projects and programs in the Bicycle Master Plan, or related in-progress plans such as the Active Transportation Plan to reduce barriers to biking and increase mobility for all users of the roadways;
- ▶ Update the Zoning Code and/or Design Guidelines to ensure the preferred siting of both short-term and long-term employee bicycle parking to encourage bicycle use at commercial, multi-family, industrial or institutional uses;
- ▶ Participate in multi-jurisdictional bike share programs (e.g., JUMP) with SACOG, Sacramento, West Sacramento, Woodland, and Davis; and
- ▶ A future VMT mitigation program (e.g., VMT mitigation fee, bank, or exchange) described under GHG-11 could provide a new funding mechanism for these improvements. Additionally, development of a complete streets policy and implementation program consistent with the SACOG Policy to Practice Cycle would enhance bicycle mobility and safety within the County.

Implementing County Department: SACDOT and PER

Timeframe: Long-term

GHG Reduction Potential: 348 MTCO_{2e}/year by 2030.

Sector: On-Road Transportation

Target Indicator: Improve an additional 30 percent of the projects listed in Appendix G of the County's adopted Bicycle Master Plan¹⁷ following CAP adoption by 2026. Include goal in the in-progress Active Transportation Plan.

MEASURE GHG-18: IMPROVED FUEL EFFICIENCY STANDARDS

Measure: Include language in the County's adopted legislative platform to encourage new or revised Federal or State legislation to promote the manufacturing, availability, and purchase of more fuel-efficient vehicles.

Implementation: Include language meeting the intent of this measure into the 2022 update to the Federal and State legislative priorities document.¹⁸

¹⁷ https://sacdot.saccounty.net/Documents/A%20to%20Z%20Folder/Bikeways/AdoptedSacCountyBMP_04.27.11.pdf

Implementing County Department: CEO and Legislative Analyst

Timeframe: Near-term

GHG Reduction Potential: Not quantified.

Sector: On-Road Transportation

Target Indicator: Include this as part of the legislative platform for all annual updates to the document until 2030.

MEASURE GHG-19: EV PARKING CODE

Measure: Amend the Building Code and Development Standards to require minimum EV charging capability in multi-family residential and commercial projects consistent with Tier 2 Standards contained in the CALGreen Code.

Implementation: For multi-family this requires that twenty percent of parking spaces support future Electric Vehicle Supply Equipment (EVSE) charging. For commercial this requires that a specific proportion of total required parking spaces must support future EVSE charging, consistent with section A5.106.5.3.1 of the CALGreen code. The measures shall also include signage requirements in the building code for EV charging facilities for both wayfinding and parking restrictions.

Implementing County Department: PER and BP&I

Timeframe: Near-term

GHG Reduction Potential: Not Quantified.

Sector: On-Road Transportation

Target Indicator: Amendment of building code and development standards to require EVSE installations at multi-family and commercial projects no later than 2023. This code amendment can occur concurrently with the reach codes for building energy specified in GHG-05 and GHG-07.

MEASURE GHG-20: SAFE ROUTES TO SCHOOL

Measure: Improve walking and bicycling safety and access to and from schools in the County.

Implementation: The County will implement the CAN Goes to School Program and work with local organizations such as WALKSacramento to improve safety among children traveling to school via walking, biking, or riding in a vehicle. Additionally, the County will include analysis of safe routes to school within the Active Transportation Plan and will factor it in to the prioritization of improvements in that Plan.

Implementing County Department: SACDOT

Timeframe: Near-term

GHG Reduction Potential: Not Quantified

Sector: On-Road Transportation

¹⁸ <https://legadv.saccounty.net/Documents/FederalandStatePriorities.PDF>

Target Indicator: Participation in CAN Goes to School Program, and update of the Active Transportation Plan to include safe routes to school.

MEASURE GHG-21: UPDATE COMMUNITY AND CORRIDOR PLANS

Measure: The County will update Community Plans and Corridor Plans in urban areas to support infill development, transit-oriented development, and mixed-use development projects.

Implementation: Ensure that a balanced approach to housing, jobs/economic development, services, and infrastructure needs are incorporated into Community and Corridor Plans. The plan updates would achieve mixed-use and transit-oriented development within existing population centers. Updates would include:

- ▶ Defining core areas within the plan areas that would include affordable housing units and mixed-use development with possible mechanisms to increase density;
- ▶ Including “Complete Streets” with sidewalk and bike lane improvements; and
- ▶ Including information on public amenities and community services in the core area, which could include parks, libraries, schools or community centers.

To help streamline the development application and review process, staff may recommend incorporating the revised Community and Corridor Plans into the General Plan as part of a comprehensive update.

Implementing County Department: PER

Timeframe: Mid-term

GHG Reduction Potential: Not Quantified

Sector: On-Road Transportation

Target Indicator: Update of all Community and Corridor Plans in urban areas by 2030 to include the features described in the implementation section.

MEASURE GHG-22: CONNECTING KEY DESTINATIONS

Measure: The County will promote better connections by all travel modes between residential neighborhoods and key commercial, cultural, recreational, and other community-supportive destinations for all travel modes through Policies CI-3 and CI-4 of the General Plan Circulation Element and associated implementation measures. This measure is connected to GHG-15 and GHG-17.

Implementation: When plans for development projects are submitted by applicants for review, the County will evaluate whether residential neighborhoods can access commercial, cultural, recreational, and other community-supportive destinations, by bicycle, walking, or using public transportation.

Implementing County Department: PER, SACDOT, and Regional Parks

Timeframe: Long-term

GHG Reduction Potential: Not quantified

Sector: On-Road Transportation

Target Indicator: The County will develop a GIS-based scoring system no later than 2025 to screen new development applications for accessibility to amenities. The scoring system will set minimum point total for compliance, which will be the sum of points assigned to community-supportive destinations (e.g.,

community centers, churches, schools, grocery stores, parks) within a certain range using the following transportation modes:

- ▶ Walking: ¼ mile walk from proposed residential development via continuous and direct pedestrian connections;
- ▶ Bicycling: ½ mile bike ride from proposed residential development, via continuous and direct bicycle connections (multi-use paths, on-street bike lanes); and
- ▶ Driving: within a 5-minute drive from proposed residential development

MEASURE GHG-23: INCENTIVIZE INFILL DEVELOPMENT

Measure: The County will facilitate and incentivize high quality infill development in the County that is likely to result in reduced vehicles miles traveled and air pollutant and greenhouse gas emissions in the County, with a focus on accelerating equitable and affordable transit-oriented and infill development through new and enhanced financing and policy incentives and mechanisms¹⁹.

Implementation: The County has several approved and pending master plans (Table 4) in locations that contribute to increased VMT and associated greenhouse gas emissions.

Implementing County Department: PER, ED, County Engineering

Timeframe: Long Term

GHG Reduction Potential: Not quantified

Sector: On-road transportation

Target Indicator: Developers/builders of projects in Table 4 and any future master plans yet to be initiated, shall pay the County the total sum of \$1,000 for each Dwelling Unit Equivalent (DUE) (the Infill Fee); provided that the Infill Fee shall not be paid for any unit constructed on any parcel dedicated to the SHRA pursuant to an applicable Affordable Housing Strategy. Beginning January 1, 2022, the fee shall be adjusted annually on each January 1 based upon the Engineering News Record Construction Cost Index. This fee shall be paid to County upon issuance of a building permit for development within the respective master plan area and deposited into a separate account dedicated to facilitating infill development or redevelopment. The Infill Fees shall be used by County only for the purposes of facilitating infill development or redevelopment in the urban, unincorporated portion of the County in locations targeted for infill development or redevelopment, including but not limited to the Green Zones identified in the November 17, 2020 Board of Supervisors' adopted Resolution No. 2020-0765, commercial corridors identified in the 2030 General Plan Land Use Element, Environmental Justice communities as identified in the Environmental Justice Element, and other locations within one-half mile of transit.

Activities that may facilitate infill development or redevelopment, including but not limited to the following:

- ▶ Design assistance;
- ▶ Fee deferrals;
- ▶ Application fee waivers;
- ▶ Staff support for Property Business Improvement District formation and capacity building;

¹⁹ 2017 Climate Change Scoping Plan (p. 78, 81)

- ▶ Electric vehicle charging facilities and other mobility hub infrastructure; and
- ▶ Code amendments that may be necessary for conversion of existing commercial or office buildings to residential uses.

Table 4: Master Plans in Sacramento County

	Master Plan Name	Status
1.	Vineyard Springs Comprehensive Plan	Approved
2.	North Vineyard Station Specific Plan	Approved
3.	Florin-Vineyard Community Plan	Approved
4.	Elverta Specific Plan	Approved
5.	Easton Special Planning Area/Land Use Master Plans	Approved
6.	Cordova Hills Master Plan	Approved
7.	NewBridge Specific Plan	Approved
8.	Jackson Township Specific Plan	Pending
9.	West Jackson Highway Specific Plan	Pending
10.	Mather South Community Master Plan	Approved
11.	Natomas Vision Area	Multiple Pending (12 and 13)
12.	Grandpark Specific Plan	Pending
13.	Upper Westside Specific Plan	Pending
14.	Rancho Murieta	Approved, Portions Pending

Source: Sacramento County Planning and Environmental Review.

MEASURE GHG-24: INCREASE ORGANIC WASTE DIVERSION

Measure: Divert 75 percent of organic waste deposited into landfills from both commercial and residential sources by 2025, up from 2015 rates of 52 and 56 percent, respectively.

Implementation: Increase local capacity for composting and processing of organic wastes.

Implementing County Department: DWMR

Timeframe: Mid-term

GHG Reduction Potential: 39,186 MT CO₂e per year by 2030.

Sector: Solid Waste

Target Indicator: Full compliance with AB 1826 and SB 1383

MEASURE GHG-25: ELECTRIC IRRIGATION PUMPS

Measure: The County will work with SMAQMD, SMUD, or provide incentives through existing programs such as CARB’s FARMER program to convert stationary diesel- or gas-powered irrigation pumps to electric pumps that are either connected to the grid or use off-grid alternative/renewable energy sources, such as solar.

Implementation: Modeling assumes that there are approximately 100 fossil fuel powered irrigation pumps operating in Sacramento County. All pumps would be converted to electric pumps with zero emissions under this measure.

Implementing County Department: EMD, SCWA, and Agricultural Commissioner

Timeframe: Mid-term

GHG Reduction Potential: 2,205 MT CO₂e per year by 2030.

Sector: Agriculture

Target Indicator: Track progress using SMAQMD permit data on stationary source emissions from irrigation pumps. Aim to convert at least 50 percent of fossil fuel powered pumps by 2026 and 100 percent by 2030.

MEASURE GHG-26: SOUTH SACRAMENTO HABITAT CONSERVATION PLAN

Measure: The County will implement the SSHCP to preserve 6,351 acres of land.

Implementation: The County will calculate the carbon sequestration values associated with acres of land located within the County that are preserved as part of the SSHCP. This information will be added to future updates to the Countywide GHG emissions inventory.

Implementing County Department: SM

Timeframe: Long-term

GHG Reduction Potential: Not quantified

Sector: Agriculture

Target Indicator: Publication of information in GHG inventory two years from CAP adoption, consistent with the Implementation and Monitoring strategy described in Section 4 of this CAP.

MEASURE GHG-27: SHARED ELECTRIC VEHICLES AT AFFORDABLE HOUSING PROJECTS

Measure: The County will work with regional partners to provide EV ride sharing at all new affordable housing developments.

Implementation: Update Countywide Design guidelines to include requirements for affordable housing projects to include designated sites for shared EVs with EV charging. Such sites would include parking zones labeled for shared EVs with signage indicating "Shared Car Zone." Potential agencies to collaborate with include SACOG, Sacramento Housing and Redevelopment Agency, and SMAQMD.

Implementing County Department: PER and SM.

Timeframe: Near-term

GHG Reduction Potential: Not quantified

Sector: On-Road Transportation

Target Indicator: Update to design guidelines to include the described requirements no later than December 2022.

MEASURE GHG-28: REDUCE OR ELIMINATE EMISSIONS IN AGRICULTURAL EQUIPMENT

Measure: Advocate to require higher efficiency EPA-rated Tier 4 agricultural equipment to be used in Sacramento County, and seek opportunities to coordinate the distribution of incentives for replacing fossil consumption in agricultural equipment with alternative fuels or electrically-powered equivalents.

Implementation: Send a formal letter request to SMAQMD recommending an update to Rule 215 Agricultural Permit Requirements (last updated in 2010) to require any diesel powered agricultural off-road equipment to be EPA-rated Tier 4 final models by 2030, as feasible. Participate in SMAQMD workshops associated with updates to rules and regulations pertaining to emissions associated with agricultural equipment.

Update County's Federal and State Legislative Priorities report to include seeking federal and State assistance with grants that can be used to incentivize the replacement of gas- and gas- or diesel-powered agricultural equipment with electric or sustainably fueled equivalents. Potential agencies to collaborate with include SMAQMD, SMUD, USDA, CARB, and EPA.

Implementing County Department: Agricultural Commissioner, SM, and CEO.

Timeframe: Mid-term

GHG Reduction Potential: Not quantified

Sector: Agriculture, Off-Road Emissions

Target Indicator: Publication of documents described in the implementation section within the specified timeframes. Participation of County staff at public and interagency SMAQMD meetings relevant to the adoption of revised rules for agricultural sector emissions. Formal letter request to SMAQMD by March 2022. Workshop attendance as needed. Federal and State assistance for agricultural grants to be included in the 2022 update to the annual Federal and State Legislative Priorities report.

MEASURE GHG-29: ELECTRIC OR SUSTAINABLY FUELED CONSTRUCTION EQUIPMENT

Measure: Encourage new development projects to use electrically-powered construction equipment wherever feasible.

Implementation: In the CalGreen ordinance prepared for BOS review under GHG-05, include language that requires submitted documentation for applicable construction projects to include information on the use of electric or sustainably fueled construction equipment under the Innovative Concepts and Local Environmental Conditions provisions contained in Section A4.306.1 of the California Green Building Standards Code (CalGreen).

Implementing County Department: BP&I

Timeframe: Near-term, concurrent with BOS consideration of CalGreen Tier 1 reach code under GHG-05, no later than December 2021.

GHG Reduction Potential: Not quantified

Sector: Off-Road

- ▶ **Target Indicator:** 5 percent of construction equipment converted to electric or renewable diesel by 2025, and 10 percent of construction equipment converted to electric or renewable diesel by 2030.

2.2 GOVERNMENT OPERATIONS GREENHOUSE GAS EMISSIONS REDUCTIONS

The total estimated GHG emission reduction from all quantifiable internal operations measures is 21,040 MT CO₂e in 2030. Table 5 provides a summary of each of the measures in this section.

Table 5: Summary of Government Operations GHG Reduction Measures

Measure Number	Measure Name	GHG Reductions (MTCO ₂ e/year) in 2030 ¹
GOV-EC-01	Employee Transportation Program	Not Quantified
GOV-EC-02	Transit Subsidy Program	2,500
GOV-EC-03	Employee Shuttle System	Not Quantified
GOV-EC-04	Secure Bicycle Storage Facilities	Not Quantified
GOV-EC-05	Carpool-at-Work Incentives	Not Quantified
GOV-FL-01	Fleet Conversion Program	2,851
GOV-FL-02	Renewable CNG for On- and Off-Road Fleets	4,334
GOV-FL-03	Renewable Diesel for On- and Off-Road Fleets	4,975
GOV-BE-01	Green Building Policy	5,668
GOV-BE-02	Solar for County Buildings	Not Quantified
GOV-BE-03	Employee Green Building Training	Not Quantified
GOV-BE-04	Electrification of Municipal Buildings	Not Quantified
GOV-AR-01	Airport Fleet Replacement	713
GOV-WA-01	Water Efficiency Policy	0
GOV-WA-02	Turf Landscape Irrigation Audit	Not Quantified
GOV-WA-03	Water-Efficient Equipment	Not Quantified
GOV-ST-01	Streetlight Conversion	0
Total GHG Reductions from Quantified Measures		21,040

Source: Ascent Environmental 2021.

MEASURE GOV-EC-01: EMPLOYEE TRANSPORTATION PROGRAM

Measure: Reduce VMT from employees commuting.

Implementation:

- ▶ Establish a post-COVID work from home program with a goal of a County-wide average of 30 percent of staff days worked to be conducted remotely. Due to the need for some positions to always be physically present, those positions which can exceed 30 percent should be encouraged to do so to achieve the 30 percent County-wide average;
- ▶ Allow all full-time staff, including managers, to opt-in to alternative work schedules (e.g., 9/80, 4/10 and flextime) to reduce VMT;
- ▶ Identify improvements to the program based on the feedback from the 2010 employee commute survey;
- ▶ Assign a staff position under the Chief of Fleets (or CEO's office) to establish and operate a County Employee Transportation Demand Management Program;

-
- ▶ Promote and encourage employee participation in regional and national bike-to-work days/months;
 - ▶ Provide incentives to employees who bike to work separate from the regional/national bike events; and
 - ▶ Waive parking fees for employees driving EVs at all County facilities, as feasible.

Implementing County Department: SM and Chief of Fleets

Timeframe: Near-term

GHG Reduction Potential: Not quantified.

Sector: On-Road Transportation

Target Indicator: Establishment of a program that includes the described implementation objectives.

MEASURE GOV-EC-02: TRANSIT SUBSIDY PROGRAM

Measure: The County will increase participation in transit subsidy program for County employees.

Implementation: Increase awareness and expand the incentives for applying to the program.

Implementing County Department: SM and Chief of Fleets

Timeframe: Near-term

GHG Reduction Potential: 2,500 MTCO_{2e}/year by 2030

Sector: On-Road Transportation

Target Indicator: 10 percent participation in transit subsidy program by 2030

MEASURE GOV-EC-03: EMPLOYEE SHUTTLE SYSTEM

Measure: The County will conduct a study of travel patterns by County employees to determine the feasibility of a shuttle system that would bring employees from major transit stations to County offices. The County may collaborate with other major employers in the region to promote ridership.

Implementation: Prepare a study of potential shuttle routes.

Implementing County Department: SM

Timeframe: Mid-term

GHG Reduction Potential: Not quantified.

Sector: On-Road Transportation

Target Indicator: Preparation of a study.

MEASURE GOV-EC-04: SECURE BICYCLE STORAGE FACILITIES

Measure: The County will site both short-term and long-term bicycle parking in convenient and secure locations at all County buildings to better encourage commuting via bicycle.

Implementation: Add employee bicycle parking at buildings where it does not currently exist.

Implementing County Department: SM and DGS

Timeframe: Mid-term

GHG Reduction Potential: Not quantified

Sector: On-Road Transportation.

Target Indicator: Additional number of secure bicycle parking spaces added.

MEASURE GOV-EC-05: CARPOOL-AT-WORK INCENTIVES

Measure: Encourage in-person trips by County staff on official business to be conducted by carpool or public transit.

Implementation: Provide carpool-at-work incentives (incentives to encourage employees in all departments to carpool between County offices, to off-site meetings and to field activities). Reimburse County employees for taking public transit for approved business travel.

Implementing County Department: SM and DPS

Timeframe: Mid-term

GHG Reduction Potential: Not quantified

Sector: On-Road Transportation

Target Indicator: Monthly employee logging of carpool and public transit use.

MEASURE GOV-FL-01: FLEET CONVERSION PROGRAM

Measure: The County will expand the existing light-duty fleet conversion policy/program with the goal of converting the entire County fleet to vehicles, trucks, and equipment powered by sustainable low-carbon fuels, electricity, fuel cells, and/or other technologies as they become financially feasible and based on total cost of ownership life cycle analysis. In addition, the County will increase designated EV parking spaces and provide charging for EVs.

Implementation:

- ▶ Allow employees to be reimbursed for charging County-owned or leased vehicles overnight at home, similar to how gasoline-powered VMT are reimbursed;
- ▶ Seek grant funding to pay for infrastructure upgrades or EV charging stations in County-owned parking lots (for use by employees, as well as visitors where appropriate); and
- ▶ Install EV chargers at County facilities available for employee and visitor use.

Implementing County Department: Chief of Fleets

Timeframe: Long term

GHG Reduction Potential: 2,851 MT CO₂e

Sector: On-Road Transportation

Target Indicator: 30 Level 2 EV chargers installed by 2030 at County-owned parking lots, and 30 percent of new fleet purchases are EVs by 2030.

MEASURE GOV-FL-02: RENEWABLE CNG FOR ON- AND OFF-ROAD FLEETS

Measure: The County will replace traditional CNG fuel with renewable CNG in all County-owned natural-gas-powered vehicles.

Implementation: Establish a procurement policy that requires fueling with renewable CNG.

Implementing County Department: Chief of Fleets

Timeframe: Near Term

GHG Reduction Potential: 4,334 MTCO₂e/year by 2030

Sector: On-Road Transportation, Off-Road Transportation.

Target Indicator: 1 million gallons of renewable CNG purchased by 2030.

MEASURE GOV-FL-03: RENEWABLE DIESEL FOR ON- AND OFF-ROAD FLEETS

Measure: The County will replace traditional diesel fuel with renewable diesel for all fleet vehicles.

Implementation: Establish a procurement policy that sets a goal for renewable diesel purchases and informs County vehicle operators where renewable diesel can be found within the County.

Implementing County Department: Chief of Fleets

Timeframe: Near-term

GHG Reduction Potential: 4,975 MTCO₂e/year by 2030

Sector: On-Road Transportation, Off-Road

Target Indicator: 100 percent of diesel purchased annually for on-road and off-road vehicles will be renewable diesel by 2030. Estimated to be 487,267 gallons purchased.

MEASURE GOV-BE-01: GREEN BUILDING POLICY

Measure: The County will develop and adopt an internal Green Building Policy

Implementation: Policy should set a 30 percent energy reduction target for all existing County buildings compared to current benchmarking. As part of this policy, the County will also design all new County-owned and operated buildings and additions to exceed the energy performance of the 2019 California Energy Code by 10 percent, consistent with CALGreen Tier 1 energy standards established in Section A5.203.1 of the code.

Implementing County Department: DGS and BP&I

Timeframe: Mid-Term

GHG Reduction Potential: 5,668 MTCO₂e/year by 2030

Sector: Building Energy

Target Indicator: 30 percent energy use reduction in County-owned and operated buildings by 2030. Adoption of the Green Building Policy by December 2022.

MEASURE GOV-BE-02: SOLAR FOR COUNTY BUILDINGS

Measure: The County will offset 100 percent of its building electricity use with renewable energy.

Implementation: Install on-site renewable energy systems or participate in SMUD's commercial SolarShares and/or Greenergy programs.

Implementing County Department: DGS

Timeframe: Near-term

GHG Reduction Potential: None by 2030 because carbon-neutral electricity would be available from the grid. GHG reductions could be realized in advance of 2030 CAP target date.

Sector: Building Energy

Target Indicator: 100 percent of County building electricity use procured from renewable sources by 2030.

MEASURE GOV-BE-03: EMPLOYEE GREEN BUILDING TRAINING

Measure: Provide training for County employees on green building codes.

Implementation: The County will support employees in Planning and Environmental Review and Building Permits and Inspection (including the Planning Director and Chief Building Official) in receiving training on the review and enforcement of CALGreen standards, including the Tier 1 and Tier 2 reach codes. At a minimum, training will be required for all employees responsible for reviewing and approving plans and permits, as well as building inspection supervisors. Certain employees will also be required to be certified according to the International Code Council's CALGreen certification programs or other equivalent programs. Cross-training and certification in other energy code related programs, such as the LEED Accredited Professionals program, California Building Officials (CALBO) Training Institute, and utility or state sponsored energy efficiency education programs will also be encouraged.

Implementing County Department: PER and BP&I

Timeframe: Near-term

GHG Reduction Potential: Not Quantified.

Sector: Building Energy

Target Indicator: County staff attendance at training events and accreditation of third-party green building programs.

MEASURE GOV-BE-04: ELECTRIFICATION OF MUNICIPAL BUILDINGS

Measure: The County shall develop and implement a plan to electrify and disconnect County-owned facilities from gas service. The County shall ensure that all new construction or major renovation projects involving County-owned facilities are all-electric. All County facilities to be supplied with 100 percent renewable power by 2025.

Implementation: Include in the Green Building Policy under GOV-BE-01 a policy that new County facilities and major renovations constructed be all-electric, in addition to the overall energy reduction standards set under that Policy. Include in next update to the County's Capital Improvement Plan (CIP) County Buildings

and Capital Construction Standards a County building decarbonization program, that seeks to phase out natural gas from three (3) county buildings by 2027, and an additional three (3) by 2030.

Implementing County Department: DGS

Timeframe: Long-term

GHG Reduction Potential: Not quantified

Sector: Building Energy

Target Indicator: Adoption of a green building policy to contain all-electric requirements by December 2022. Update to CIP upon next update to identify all-electric retrofit opportunities in existing County-owned buildings. Retrofits to buildings conducted, three buildings by 2027, and six by 2030.

MEASURE GOV-AR-01: AIRPORT FLEET REPLACEMENT

Measure: Reduce the consumption of fossil fuels in the County-owned vehicle fleet at the Sacramento International and Executive Airports.

Implementation: The County will convert the airport vehicle fleet to vehicles, trucks, and equipment powered by sustainable low-carbon fuels, electricity, fuel cells, and/or other technologies as they become financially feasible.

Implementing County Department: SCAS

Timeframe: Long term

GHG Reduction Potential: 713 MTCO_{2e}/year by 2030

Sector: On-Road Transportation.

Target Indicator: 15 zero-emission electric shuttle buses purchased by 2030

MEASURE GOV-WA-01: WATER EFFICIENCY POLICY

Measure: Improve agency-wide water efficiency by formally adopting a water reduction target for new and existing buildings.

Implementation: Develop a water efficiency policy that seeks to achieves a 20 percent reduction in water usage below 2015 levels for all County buildings by 2030. Create a drought-tolerant demonstration project with interpretive signs at a County building to exhibit native vegetation and high-efficiency irrigation techniques.

Implementing County Department: SM and DGS

Timeframe: Short-term

GHG Reduction Potential: Not quantified

Sector: Water

Target Indicator: Adoption of a water efficiency policy and construction of demonstration garden.

MEASURE GOV-WA-02: TURF LANDSCAPE IRRIGATION AUDIT

Measure: Reduce excess water consumption associated with watering lawns at County facilities.

Implementation: Conduct water audits to evaluate irrigation practices in large turf landscapes around County facilities and modify irrigation practices and equipment accordingly (timers, sprinkler heads, etc.).

Implementing County Department: SM and DGS

Timeframe: Mid-term

GHG Reduction Potential: Not quantified

Sector: Water

Target Indicator: Preparation of an audit. Replacement of suboptimal equipment identified in audit with more efficient versions. **Co-Benefit**

MEASURE GOV-WA-03: WATER-EFFICIENT EQUIPMENT

Measure: The County will replace water-wasting equipment with more efficient equipment when grant funds are available from local water purveyor(s).

Implementation: Incorporate preferences for water-saving equipment into the County's procurement and capital improvement plans.

Implementing County Department: SM and DGS

Timeframe: Long-term

GHG Reduction Potential: Will reduce energy consumption, but no GHGs reduced in 2030 because of the availability of carbon neutral-electricity sources.

Sector: Water

Target Indicator: Records of replaced water equipment each year showing the selection of equipment with efficiencies higher than average.

MEASURE GOV-ST-01: STREETLIGHT CONVERSION

Measure: Convert streetlights to more energy efficient technologies.

Implementation: The County will replace remaining high-pressure sodium (HPS) and mercury-vapor (MV) streetlights with energy-saving LED technology.

Implementing County Department: SACDOT

Timeframe: Long-term

GHG Reduction Potential: Will reduce energy consumption, but no GHGs reduced in 2030 because of the availability of carbon neutral-electricity sources.

Sector: Building Energy

Target Indicator: In 2015 there were 10,533 streetlights that were still relying on HPS or MV technology. The County will replace these with LEDs by 2030.

2.3 CARBON OFFSET PROGRAM

In addition to the GHG reduction measures described in Sections 2.1 and 2.2, the County may explore a carbon offset program, if needed, to account for any GHG reducing legislation or policies described in Table 2 that fail to come to fruition or meet stated objectives. The offset program would allow for investments in GHG reducing activities occurring outside of the County's control. The success of these investments in reducing GHG emissions would be validated by a third-party organization and be required to be in addition to any GHG emissions reductions required by a plan, policy, or regulation for that activity. The programs selected could also include projects with climate change adaptation co-benefits. The carbon offset program would support local GHG reductions by prioritizing project locations in the following order:

- ▶ Sacramento County's Environmental Justice communities;
- ▶ Countywide (including incorporated cities without adopted CAPs);
- ▶ SACOG region;
- ▶ Central Valley; and
- ▶ Statewide.

2.4 CARBON NEUTRALITY

This section describes the County's approach to reduce GHG emissions to achieve carbon neutrality by 2030, as specified for inclusion into the CAP in an adopted Climate Emergency Resolution.

This resolution, adopted by the County Board of Supervisors on December 16, 2020, seeks to address the climate emergency through the eight actions described below.

1. Urgent and immediate mobilization of public and private resources to develop and implement a climate and sustainability plan that identifies and integrates current and future actions necessary to achieve an equitable, sustainable, and resilient economy and transition to a countywide carbon neutrality footprint by 2030;
2. Build on existing climate action commitments and taking significant steps to sustain and accelerate short term communitywide carbon elimination, and all efforts and actions necessary to eliminate emissions by 2030, recognizing that such a goal will only be achieved through regional collaboration between multiple partners;
3. Explain within Communitywide CAP the County's approach to reduce greenhouse gas emissions in order to achieve carbon neutrality by 2030, building on recommendations and analysis from community partners, and suggested mitigation measures from climate experts, urban and regional planners, community members, and economists. Development and implementation of the plan shall be guided by science, data, best practices, and equity concerns;
4. Evaluate the resources necessary to achieve carbon neutrality by 2030, and the emergency actions required to eliminate emissions by 2030. Where existing funding or resources do not support the level of action required, County staff shall identify gaps and provide recommendations to the County Executive and Board of Supervisors;
5. Establish a permanent Climate Emergency Mobilization Task Force composed of climate experts including but not limited to representatives of the scientific community and academia to oversee the development and implementation of a climate emergency response plan utilized by all departments

within the County of Sacramento, and each department shall assign a point person to provide regular updates to the Task Force and the Board of Supervisors concerning departmental progress in reducing emissions;

6. Support farmers during the climate emergency, including support in necessary conservation and regenerative practices that will reduce emissions and improve resilience to extreme weather events;
7. Affirm the community's need to understand, participate and support all actions and initiatives the County adopts in response to the climate emergency. The County therefore commits to support outreach, information and education for County residents and staff on the urgent need to reduce GHG emissions, and the policies and strategies necessary to advance sustainability and resilience. Implementation of the County's climate efforts shall include the engagement of community-based and grassroots organizations and inclusive economic development partners, with a focus on low-income and disadvantaged communities, youth, communities of color, and environmental justice; and
8. Continue to support and enhance local climate mitigation and adaptation efforts, and the work of local agencies and partners, including the Sacramento Municipal Utility District (SMUD), the Sacramento Metropolitan Air Quality Management District (AQMD), the Sacramento Area Council of Governments (SACOG), and other regional agencies and associations as well as the region's environmental and social justice member organizations.

The GHG forecasting indicates that the County is on track to exceed 2030 State targets aligned with the Scoping Plan, and the strategies and measures contained in Section 2.2 and 2.3 of this CAP go above and beyond to make progress toward the 2030 carbon neutrality goal described in the resolution. While this version of the CAP does not meet the carbon neutrality goal through quantified measures, it does provide the flexibility for the plan to change over time to take additional steps that will meet the goals of the Climate Emergency Resolution. Specifically, the County commits to the following steps:

- ▶ Review forthcoming updates to the State's Climate Change Scoping Plan (2022 Scoping Plan). This plan will be the State's roadmap to achieve carbon neutrality consistent with adopted executive orders and will provide necessary guidance to local governments on feasible GHG reduction and carbon sequestration measures;
- ▶ Initiate a comprehensive update to the General Plan that includes land use and transportation policies that further promote infill development and VMT reduction;
- ▶ Update the CAP's GHG inventory and forecasting to reflect changes associated with the documents described above.
- ▶ Update the CAP with targets for Countywide carbon neutrality by 2030, and/or net zero targets for specific emissions sectors as described in the strategy options contained in Appendix F and new GHG reduction strategies to incorporate local actions recommended by the State in the 2022 Scoping Plan and Natural and Working Lands Climate Smart Strategy.

3 CLIMATE CHANGE ADAPTATION STRATEGY

This section describes the adaptation framework and presents measures that the County will take to address climate vulnerabilities and increase countywide resiliency. Table 6 provides a summary of each of the measures in this section. The adaptation framework follows the process outlined in Phase 3 of the APG and relies on the vulnerability assessment to inform the preparation of the adaptation framework and

strategies. Many climate adaptation measures may also reduce GHG emissions, improve public health, and achieve other co-benefits that further the County’s sustainability and Environmental Justice goals and improve community resilience.

The adaptation measures are grouped under five overarching goals to address each climate impact with one additional measure applicable to all which calls for a comprehensive communication strategy:

- ▶ Prepare for Increases in Temperatures and Extreme Heat Days and Heat Waves;
- ▶ Prepare for Increased Risk of Wildfire and Smoke Events;
- ▶ Prepare for Increased Drought;
- ▶ Prepare for Increased Flooding; and
- ▶ Prepare for Sea-Level Rise.

The measures within each goal define the programs, policies, and regulations that the County will need to implement to anticipate and adapt to the challenges created by climate change. Consideration for how likely and how soon impacts are expected to occur are included, with specific attention given to those exposures that pose the most serious threats to the County and its residents. This includes identifying responsible County departments and implementation timeframe for each measure. Implementation of many of climate adaptation strategies contained herein will be dependent on partnerships with local, regional, State, and federal agencies and non-government organizations. Where Sacramento County does not have jurisdictional authority (e.g., surface water storage capacity), the appropriate roles of agencies with authority, organizations, and Sacramento County are identified. Implementation timeframes are categorized as Near-term (2020-2023), Mid-term (2024-2026), and Long term (2027-2030). A co-benefit icon (Co-Benefit) is shown in the benefits evaluation section of adaptation measures, that have a connection to GHG reducing CAP measures in Section 2.

Table 6: Summary of Adaptation Measures

Measure Number	Measure Name	Strategy
TEMP-01	Protect Critical Infrastructure Vulnerable to Extreme Heat Events	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-02	Partner with Local Agencies and Utilities on Heat-Related Climate Change Initiatives and Efforts	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-03	Educate Residents of Disadvantaged Communities on Heat-Related Risks and Strategies to Prevent Heat-Related Illness	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-04	Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-05	Increase Participation in the Sacramento Area Sustainable Business Program	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-06	Partner with Valley Vision to Expand the Business Resiliency Initiative	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-07	Use Cool Pavement Technology and Reduce the Amount of Paved Surfaces	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-08	Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves
TEMP-09	Understand the Tolerance of Current Crop Mixes to Withstand Increased Temperatures	Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves

Measure Number	Measure Name	Strategy
FIRE-01	Map and Identify Locations that are Newly at Risk, or at Higher Risk for Fire Hazards	Prepare for Increased Risk of Wildfire
FIRE-02	Coordinate with Federal, State, and Local Agencies to Establish Ecological Recovery Programs	Prepare for Increased Risk of Wildfire
FIRE-03	Update Tree Planting Guidelines to Select Wildfire Resistant Species	Prepare for Increased Risk of Wildfire
FIRE-04	Coordinate and Improve Emergency Preparedness Systems	Prepare for Increased Risk of Wildfire
FIRE-05	Avoid New Development in Very-High Fire Hazard Severity Zones	Prepare for Increased Risk of Wildfire
FIRE-06	Collaborate with Agencies and Organizations on Programs to Reduce Wildfire Hazards	Prepare for Increased Risk of Wildfire
WATER-01	Evaluate Vulnerabilities of Water Supply Systems and Networks and Develop Strategies to Improve Resilience	Prepare for Increased Drought
WATER-02	Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems	Prepare for Increased Drought
WATER-03	Create Incentives and Programs to Transfer Knowledge and Technologies to Assist Farmers with New Production Methods and Drought Tolerance Species	Prepare for Increased Drought
WATER-04	Reduce Potable Water Use in Outdoor Landscaping	Prepare for Increased Drought
WATER-05	Expand Upon Existing Water Conservation Education Outreach Programs for Residents and Businesses	Prepare for Increased Drought
WATER-06	Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity	Prepare for Increased Drought
FLOOD-01	Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events	Prepare for Increased Flooding
FLOOD-02	Improve Sewage and Solid-Waste Management Infrastructure	Prepare for Increased Flooding
FLOOD-03	Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions	Prepare for Increased Flooding
FLOOD-04	Coordinate with Federal, State, and Local Agencies to Improve Emergency Evacuation and Supply Transportation Routes	Prepare for Increased Flooding
FLOOD-05	Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces	Prepare for Increased Flooding
FLOOD-06	Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable	Prepare for Increased Flooding
FLOOD-07	Establish an Underground Utilities Program Resistant to Flooding	Prepare for Increased Flooding
FLOOD-08	Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives	Prepare for Increased Flooding
FLOOD-09	Research the Tolerance of Current Crop Mixes to Withstand Increased Flooding and Support Aquaculture and Fish Habitat	Prepare for Increased Flooding
FLOOD-10	Expand Educational Programs to Address Vector and Waterborne Diseases	Prepare for Increased Flooding
FLOOD-11	Identify Concrete Channel Restoration Areas	Prepare for Increased Flooding

Measure Number	Measure Name	Strategy
FLOOD-12	Replant Bare or Disturbed Areas	Prepare for Increased Flooding
FLOOD-13	Update and Implement the County's Local Hazard Mitigation Plan to Address Climate Change-Related Flooding Impacts	Prepare for Increased Flooding
FLOOD-14	Safeguard Freshwater Supply Against Contamination, Degradation, or Loss	Prepare for Increased Flooding
FLOOD-15	Improve Flood Warning and Information Dissemination	Prepare for Increased Flooding
SLR-01	Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures	Prepare for Sea-Level Rise
SLR-02	Support and Monitor Ongoing Analysis of Sea-Level Rise Data	Prepare for Sea-Level Rise
SLR-03	Update the County's Local Hazard Mitigation Plan to Incorporate Sea-Level Rise	Prepare for Sea-Level Rise
SLR-04	Incorporate Sea-Level Rise Effects into Capital Improvement Plans	Prepare for Sea-Level Rise
SLR-05	Guide Future Development Out of Areas Vulnerable to Sea-Level Rise	Prepare for Sea-Level Rise
ALL-01	Create a Comprehensive Outreach Strategy	Prepare for All Threats

Source: Ascent Environmental 2021.

3.1.1 Prepare for Increased Temperatures and Extreme Heat Days and Heat Waves

MEASURE TEMP-01: PROTECT CRITICAL INFRASTRUCTURE VULNERABLE TO EXTREME HEAT EVENTS

Implementation: In cases where existing communication, energy, public service, and transportation facilities and infrastructure are found to be vulnerable to extreme heat, bolster and/or upgrade associated infrastructure to be more resilient to periods of high heat (e.g., use of heat-tolerant materials).

Benefits: Reinforced and bolstered infrastructure and facilities can reduce the frequency of power outages that can interrupt the functions of business and residences.

Implementing County Department: DGS and SACDOT.

Timeframe: Near-term.

MEASURE TEMP-02: PARTNER WITH LOCAL AGENCIES AND UTILITIES ON HEAT-RELATED CLIMATE CHANGE INITIATIVES AND EFFORTS

Implementation: Partner with the SMAQMD, SMUD, Pacific Gas & Electric (PG&E), and SACOG to implement future and on-going heat-related climate change initiatives. The County's partnership in ongoing programs and future initiatives could include helping other organizations increase participation in existing programs through education and promotion, and by using and integrating them in County programs and activities, where feasible. Examples include but are not limited to participation in SMAQMD's Regional Urban Heat

Island Initiative, Sacramento Tree Foundation Shade Tree and NeighborWoods Programs; PG&E's Energy Efficient Cool Roof program; and SACOG's Complete Streets GHG reduction measures.

Benefits: Implementation of this action, which includes both leveraging and supporting existing programs, as well as partnering on the development of future initiatives, can mitigate the effects of the UHIE, which produces excess heat from surfaces that absorb heat. Reducing the UHIE results in less reliance on air conditioning, which decreases energy use, susceptibility to heat-borne illness, and exposure to poor air quality.

Implementing County Department: SM.

Timeframe: Near-term.

MEASURE TEMP-03: EDUCATE RESIDENTS OF DISADVANTAGED COMMUNITIES ON HEAT-RELATED RISKS AND STRATEGIES TO PREVENT HEAT-RELATED ILLNESS

Implementation:

- ▶ Continue coordinating with the National Weather Service on delivering robust, multi-lingual education and outreach materials accessible across multiple media forms (e.g., radio, text messaging) to publicize the symptoms and dangers of heat-related illness, where cooling centers are located, how to sign up for Sacramento Alert Emergency Notification System, and practical methods for preventing heat-related illness during periods of high heat;
- ▶ The County of Department Public Health should track heat-related illness, hospitalizations, and deaths in order to target education and outreach efforts;
- ▶ Expand partnerships with local governments, non-government organizations, churches, and businesses to provide additional cooling centers within disadvantaged communities, where households and residents may not have access to air conditioning during periods of extreme heat; and
- ▶ Survey disadvantaged communities to identify community preferences regarding the appropriate location and accessibility of cooling centers, based on proximity to public transit.

Benefits: Improved outreach regarding safety during extreme heat and establishment of more cooling centers in disadvantaged areas will reduce exposure to heat-related illness. Inclusion in the Sacramento Alert Emergency Notification System informs Sacramento County residents of upcoming heat waves and the locations of cooling centers, which will allow residents to plan for extreme weather.

Implementing County Department: SM.

Timeframe: Near-term.

MEASURE TEMP-04: ENCOURAGE OR REQUIRE THE INSTALLATION OR USE OF COOL-ROOF TECHNOLOGIES, PASSIVE SOLAR HOME DESIGN, GREEN ROOFS, AND ROOFTOP GARDENS

Implementation:

- ▶ Adopt a mandatory Green Building code that requires installation of cool roof technologies for new development consistent with the 2016 Building Energy Efficiency Standards for Residential and Non-residential Buildings (California Building Code, Title 24, Part 6). Cool roofs are designed to maintain a

lower roof temperature than traditional roofs that are heated through sun exposure and contribute to the UHIE. Cool roofs are composed of surfaces that reflect sunlight and absorb less heat, which reduces heat flow into buildings and lowers energy usage and associated costs (U.S. Department of Energy [DOE] 2010);

- ▶ Develop incentive programs including, but not limited to, permit streamlining, permit fee reductions, or tax rebates for developers and landowners to apply passive solar home design to future residential buildings. A home that employs passive solar home design has windows oriented toward the south, is composed of materials of high heat absorption, and is built to distribute heat and cold air throughout the home. Use of these design elements provides natural cooling and heating and reduces energy demand; and
- ▶ Develop incentive programs including, but not limited to permit streamlining, permit fee reductions, or tax rebates to encourage the use of rooftop gardens and green roofs in residential and commercial buildings. Rooftop gardens are gardens on rooftops and green roofs (or living roofs) are roof tops that are partially or completely covered by vegetation. These forms of roofing lower the amount of heat absorbed by a building and reduces energy demand associated with air conditioning.

Benefits: The use of cool roofs, passive design, rooftop gardens, and green roofs will mitigate the effects of UHIE, lower energy consumption, and improve air quality. This measure will also have co-benefits related to water conservation and addressing air quality impacts from increased wildfire risk.

Implementing County Department: SM, PER, and BP&I.

Timeframe: Near-term.

MEASURE TEMP-05: INCREASE PARTICIPATION IN THE SACRAMENTO AREA SUSTAINABLE BUSINESS PROGRAM

Implementation: Increase funding and staff resources for the Sacramento Area Sustainable Business Program through the County's Business Environmental Resources Center (BERC), with the goal of increasing overall participation and certification in the program and implementing annual monitoring of businesses that adopt practices to reduce energy consumption and promote energy efficiency, along with other sustainability measures.

Benefits: Increasing participation and monitoring of the existing Sustainable Business Program will result in reduced energy usage.

Co-Benefit

This measure will have co-benefits related to water conservation, as well as other actions with respect to transportation, solid waste, and other actions that will contribute to community GHG emissions reductions and supports government operations GHG reduction measure GOV-BE-03.

Implementing County Department: SM and BERC.

Timeframe: Near-Term.

MEASURE TEMP-06: PARTNER WITH VALLEY VISION TO EXPAND THE BUSINESS RESILIENCY INITIATIVE

Implementation: Partner with Valley Vision to train businesses to use the BRI toolkit which will prepare business for weather-related risks to daily operations. Aspects of the BRI toolkit include:

-
- ▶ preparation of a hazard vulnerability assessment, which identifies the greatest risks and hazards facing individual businesses;
 - ▶ review of existing resiliency;
 - ▶ development of a business continuity plan;
 - ▶ testing of business continuity plans through drills and exercises; and
 - ▶ engagement in community outreach.

Benefits: Increased participation in the BRI and use of the toolkit would result in increased resiliency on a business-by-business basis during power outages induced by extreme heat events. Businesses would be responsible for conducting self-evaluations to identify assets at risk or vulnerable to weather-related disturbances that include extreme heat events, but also other extreme events such storms, floods, or fires. This measure will have co-benefits related to changes in precipitation, wildfire, and flood risk.

Implementing County Department: SM and ED.

Timeframe: Near-term.

MEASURE TEMP-07: USE COOL PAVEMENT TECHNOLOGY AND REDUCE THE AMOUNT OF PAVED SURFACES

Implementation:

- ▶ Require the use of cool pavement technology in both the replacement and construction of new roads, sidewalks, parking areas, and bikeways. Cool pavement reduces the effects of UHIE by reflecting sunlight and absorbing less heat as compared to traditional pavement. Pavement reflectance can be enhanced using reflective aggregate, reflective or clear cinder, or a reflective surface coating (Heat Island Group 2017);
- ▶ Develop and incorporate cool pavement standards into the County's roadway design manual for use in public rights-of-ways;
- ▶ Develop and incorporate cool pavement standards into the County's development standards for private development projects, in both new construction and changes to existing on-site paved surface areas (e.g., parking lots, private roadways, or other hardscape areas);
- ▶ Apply cool pavement standards when constructing new County-owned facilities or modifying existing County-owned facilities; and
- ▶ Collaborate with the CRCRC, the California Environmental Protection Agency (CalEPA), the UC Davis Cool Pavement Research Center, and other regional partners to obtain guidance, explore pilot projects, or other technical support for implementation of actions under Measure Temp-9. (Note: this action could also be achieved collaboratively with others as part of the regional UHIE initiative described earlier under Action Temp-2.1).

Benefits: Incorporation of cool pavements into maintenance of existing and construction of new paved surfaces would lower the amount of heat absorbed compared to traditional paving materials. Cool pavements would lessen the impacts of UHIE, which would result in reduced exposure to heat-related illness, decreased building energy consumption and associated GHG emissions, and improved air quality. This measure will support measures related to flood risk.

Co-Benefit

Supports GHG reduction measures GHG-02, GHG-04, and GHG-05.

Implementing County Department: SM, PER, and BP&I.

Timeframe: Near-term.

MEASURE TEMP-08: INCREASE PARKING LOT SHADING, LANDSCAPING, AND URBAN GREENING, PRIORITIZING COMMUNITIES WITH LESS TREE COVER

Implementation:

- ▶ Enforce the existing parking lot shading coverage requirements (i.e., 30 percent coverage for 5-24 parking spaces, 40 percent coverage for 25-29 parking spaces, and 50 percent coverage for 50+ parking spaces) for new development projects that include parking, and revised parking lot shading standards to provide larger minimum sizes for tree planters to improve tree health;
- ▶ Enforce existing standards for tree shading and landscaping in existing parking lots not in compliance and establish a compliance program to ensure that trees are maintained properly;
- ▶ Establish rebate programs, permit fee reductions, or tax deductions to incentivize the installation of solar photovoltaic (PV) carports in existing and future parking lots. Solar PV carports provide shade in parking lots while simultaneously converting solar energy into electricity that can be used to charge electric vehicle and plug-in hybrid-electric vehicles;
- ▶ Amend the County Zoning Code to allow solar PV carports to fulfill a portion or all the existing parking lot shading requirements and provide guidance on the appropriate mix between the use of trees and PV carports;
- ▶ Develop standards for the inclusion of solar PV carports in County-owned parking lots; and
- ▶ Collaborate with CRC, the Sacramento Tree Foundation, SMUD, PG&E, or other regional partners to identify incentives, grants, or other resources for the purposes of commercial and residential greening actions including, but not limited to, planting of parking lot or street trees, maintaining tree health, and establishing community gardens.

Benefits: Enforcement of County standards regarding shading requirements for parking lots, minimum standards for planter box sizes, incorporation of solar PV on carports, and urban greening programs will provide shade during extreme heat events and further reduce the effects of the UHIE, which will lower temperatures in urban areas and improve air quality.

Co-Benefit

Supports GHG reduction measure GHG-02, GHG-04, and GHG-05.

Implementing County Department: SM, PER, Code Enforcement, and DGS.

Timeframe: Mid-term.

MEASURE TEMP-09: UNDERSTAND THE TOLERANCE OF CURRENT CROP MIXES TO WITHSTAND INCREASED TEMPERATURES

Implementation: Actively engage with the agricultural sector to understand the tolerance of current crop mixes to withstand increased temperatures, disease, and pests, and explore options to diversify and shift to drought-tolerant crops that can be cultivated in a warmer environment.

Benefits: Diversifying Sacramento County's crops will reduce the potential for crop loss from excessive pests, disease, and increased temperatures and will improve the industry's adaptive capacity.

Implementing County Department: SM and Agricultural Commissioner's Office.

Timeframe: Mid-term.

3.1.2 Prepare for Increased Risk of Wildfire

MEASURE FIRE-01: MAP AND IDENTIFY LOCATIONS THAT ARE NEWLY AT RISK, OR AT HIGHER RISK FOR FIRE HAZARDS

Implementation: Work with CAL FIRE, Metro Fire, and any other fire department operating within the boundaries of the County to map and identify locations within the County that are newly at risk, or at higher risk, for wildfire hazards as a result of climate change and its impacts. Wildfire hazards may include direct damage to the American River Parkway, structures, electrical transmission, transportation, and communication infrastructure; increased rates of erosion, landslide, and water quality degradation; and ecological disturbance.

Benefits: Mapping and identifying locations that are already at high risk or will be with climate change would advise the implementation of Measure Fire-2 listed below.

Implementing County Department: SacOES and DTECH GIS section.

Timeframe: Near-term.

MEASURE FIRE-02: COORDINATE WITH STATE, AND LOCAL AGENCIES TO ESTABLISH ECOLOGICAL RECOVERY PROGRAMS

Implementation: Coordinate with CAL FIRE, Metro Fire and other similar agencies to establish ecological recovery programs to support ecological restoration efforts.

Benefits: Implementation of ecological restoration strategies in existing burned or potentially future burned areas would encourage the regrowth of natural ecosystems that may have been damaged during wildfire events. Ecological restoration would include establishment of native ecological systems and processes that would reduce the potential for high-intensity wildfires and improve ecological resiliency to wildfire events.

Implementing County Department: SM.

Timeframe: Near-Term.

MEASURE FIRE-03: UPDATE TREE PLANTING GUIDELINES TO SELECT WILDFIRE RESISTANT SPECIES

Implementation: Consult with the Sacramento Tree Foundation and SelecTree to identify wildfire resistant species and the appropriate species of trees for fire hazard severity zones. Incorporate such recommendations into updates to landscaping standards and tree planting guidelines in County Code or other appropriate documents.

Benefits: Selecting wildfire-resistant or fire hazard severity zone appropriate species would help mitigate wildfire risk while allowing the County to continue to expand tree planting efforts that result in improved air quality and urban heat island mitigation.

Implementing County Department: PER.

Timeframe: Near-term.

MEASURE FIRE-04: COORDINATE AND IMPROVE EMERGENCY PREPAREDNESS SYSTEMS

Implementation:

- ▶ Coordinate with Metro Fire, CAL FIRE, CalOES and City of Sacramento Fire Departments to identify strategies to ensure capacity and resilience of escape routes potentially compromised by wildfire, including emergency evacuation and supply transportation routes;
- ▶ Improve upon educational outreach regarding emergency supplies, evacuation routes, pet protection, and key terminology (e.g., controlled/prescribed burn, fuel load), as well as frequently updating the Sacramento Ready webpage to include current information; and
- ▶ Provide input to Metro Fire and CAL FIRE to establish reliable wildfire monitoring systems that provide early warning of high wildfire risk and wildfire occurrence and include evaluation of ecological and human impacts of wildfire.

Benefits: Improve the efficacy of evacuation procedures, reliability of emergency supplies, and distribution of wildfire risk information. Establishment of wildfire monitoring systems would provide up-to-date data with respect to areas considered at high risk for wildfire breakouts and improve Sacramento County's ability to prepare and combat wildfire-related impacts.

Implementing County Department: SacOES.

Timeframe: Near-Term.

MEASURE FIRE-05: AVOID NEW DEVELOPMENT IN VERY-HIGH FIRE HAZARD SEVERITY ZONES

Implementation: Avoid new development in Very-High Fire Hazard Severity Zones according to the most recent and available CAL FIRE Hazard Severity Zones maps and consider projections of future climate change when planning future land uses.

Benefits: Avoiding locating new developing in CAL FIRE designated Very-High Fire Hazard Severity Zones would limit human exposure to potential wildfire.

Implementing County Department: PER.

Timeframe: Mid-Term.

MEASURE FIRE-06: COLLABORATE WITH AGENCIES AND ORGANIZATIONS ON PROGRAMS TO REDUCE WILDFIRE HAZARDS

Implementation:

- ▶ Collaborate with Sacramento County Regional Parks Department, Metro Fire, and other Sacramento County-based fire districts to continue to reduce wildfire hazards, including but not limited to, enforcing defensible space guidelines for existing and new development, restoring wildfire-resilient conditions by thinning and removing live or dead vegetation and implementing wildfire fuel reduction action plans, and retaining healthy native trees; and
- ▶ Collaborate with the Bureau of Land Management (BLM), U.S. Fish and Wildlife Service, CRC, the American River Parkway Foundation, the Sacramento County Regional Parks Department, the Sacramento River Watershed Program, and other local stakeholders in developing Resource Management Plans (RMPs) for the Sacramento, Cosumnes and American Rivers.

Benefits: An integrated approach among agencies and organizations to reduce wildfire hazards within the County would ensure that effective fire management extends to a broad geographical area resulting in a more comprehensive protection against future wildfire events.

Implementing County Department: SM, Code Enforcement, and Regional Parks.

Timeframe: Mid-Term.

3.1.3 Prepare for Increased Drought

MEASURE WATER-01: EVALUATE VULNERABILITIES OF WATER SUPPLY SYSTEMS AND NETWORKS AND DEVELOP STRATEGIES TO IMPROVE RESILIENCE

Implementation:

- ▶ Establish a schedule to routinely evaluate the vulnerability of the water supply systems and networks to climate change-related impacts and develop strategies to add resilience to these systems. Resilient water supply systems must be able to deliver services during disruptive events (e.g., storms, drought);
- ▶ Adopt municipal codes to enforce standards of resiliency for water-related infrastructure for all future development. Municipal codes may include, but are not limited to, standards related to elevation of electrical generators and/or tanks and containers of hazardous materials, increased capacity of water storage tanks, and improved deployment of backflow preventers to impede contamination of drinking water following an extreme weather event (e.g., storms);
- ▶ Continue to participate in and support the efforts of the Sacramento Water Forum to promote comprehensive and effective water management and support aquatic ecosystem protection.

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- ▶ Collaborate with experts and other agencies to identify potential hazards (e.g., floods, drought) in sites of new infrastructure, assess the vulnerabilities associated with identified hazards, and use appropriate materials and establish adequate capacities for new infrastructure;
 - ▶ Support the projects of the Sacramento River Watershed Program aimed to improve water quality, streamflow, flood management, and watershed stewardship in the Sacramento River and the Lower American River Watersheds; and
 - ▶ Conduct ongoing maintenance of existing water supply-related infrastructure to identify potential weaknesses and deterioration.

Benefits: Resiliency improvements made to Sacramento County's water supply systems and networks would also serve to improve the County's resiliency to flooding.

Implementing County Department: SM, DWR, SCWA, and BP&I.

Timeframe: Near-Term.

MEASURE WATER-02: INCREASE ON-SITE GREYWATER AND RAINWATER REUSE, STORMWATER REUSE, AND RECYCLED WATER SYSTEMS

Implementation:

- ▶ Partner with the Regional Water Authority (RWA) and other water districts to establish incentive programs that promote the deployment of on-site rainwater catchment systems, such as rain barrels, rain gardens, cisterns, and other mechanisms to capture and store rainwater for use during the dry season for water customers;
- ▶ Continue and expand on the Sacramento County's Environmental Management Department's educational outreach regarding the safe and proper installation of rainwater catchment and storage systems;
- ▶ Coordinate with appropriate agencies to develop a standard to deploy innovative options to meet future water demand for all County-owned facilities (e.g., reclaim and purify wastewater, on-site greywater reuse systems, or use of recycled water from the regional or local treatment plants);
- ▶ Develop an integrated network of rainwater and greywater catchment systems within the County's agricultural sector through incentive and rebate programs to further increase water storage capacity; and
- ▶ Establish a regional stormwater harvest program and construct the related infrastructure (e.g., piping, storage basins and reservoirs, pumps) in existing rural and urban portions of the County as well as new development.

Benefits: Deployment of on-site and regional rainwater capture and stormwater harvest technology would expand Sacramento County's existing water storage capacity and thereby improve the County's resiliency to periods of drought or cases where water distribution infrastructure is damaged. This measure will have co-benefits related to flood risk.

Implementing County Department: SM, EMD, PIO, DGS, DWR, and Agricultural Commissioner's Office.

Timeframe: Near-Term.

MEASURE WATER-03: CREATE INCENTIVES AND PROGRAMS TO TRANSFER KNOWLEDGE AND TECHNOLOGIES TO ASSIST FARMERS WITH NEW PRODUCTION METHODS AND DROUGHT TOLERANCE SPECIES

Implementation:

- ▶ Create programs that facilitate communication between farmers of specialty crops and other climate-sensitive crops and agricultural specialists to advise future agricultural practices in light of a potentially drier and hotter climate;
- ▶ Provide financial support to farmers of specialty crops and other climate-sensitive crops for changes to irrigation systems associated with drought-tolerant crops, which may be cultivated more under future climate conditions; and
- ▶ Incentivize water conservation and efficiency in the agricultural sector through incentive and rebate programs for practices that could include, but are not limited to, drip irrigation, tailwater return systems, covered canals, reduced tillage, and covered crops.

Benefits: Increased communication and financial support within the agricultural sector of the County would allow farmers to transition and adapt to a hotter and potentially drier climate. As a major source of revenue for the County as well as contributor to the food security of the County and State, it will be imperative that the agricultural sector adapt quickly to a changing climate. Implementation of the aforementioned Actions would improve the sector's resiliency.

Implementing County Department: SM, Agricultural Commissioner's Office, ED, DWR, and SCWA.

Timeframe: Near-Term.

MEASURE WATER-04: REDUCE POTABLE WATER USE IN OUTDOOR LANDSCAPING

Implementation:

- ▶ Amend the Sacramento County Water Efficient Landscaping Ordinance to require that 80 percent of landscaping area is dedicated to low-water, drought-tolerant species for new residential and non-residential buildings;
- ▶ Partner with RWA and other water districts in the County to improve existing rebate programs (e.g., SCWA's Cash for Grass Program) to incent the incorporation of low-water, drought-tolerant species in lieu of water-intensive lawns and high-water vegetation in existing residential areas; and
- ▶ Partner with Regional San to expand the existing recycled water system service areas by 50 percent.

Benefits: Revising the County's landscaping standards as defined by the Sacramento County Water Efficient Landscaping Ordinance and County Zoning Code, improving rebates to residential water users to incorporate drought-tolerant landscaping, and increasing the size of the recycled water system would reduce the amount of water used for landscaping. These savings could be allocated to other more vital purposes (e.g., agriculture, potable water). These actions would also result in reductions in pumping energy and associated GHG emissions reductions.

Implementing County Department: PER, SM, SCWA.

Timeframe: Near-Term.

MEASURE WATER-05: EXPAND UPON EXISTING WATER CONSERVATION EDUCATION OUTREACH PROGRAMS FOR RESIDENTS AND BUSINESSES

Implementation: Expand communication of water conservation-related education and tips through multiple media platforms (e.g., radio, television, social media) to increase awareness of indoor and outdoor conservation methods. Showcase a drought-tolerant demonstration garden at a County building.

Benefits: Many Sacramento County-based water districts provide educational material to water users; however, to reduce wasteful use of water, water districts should dedicate additional efforts to expand the reach of these educational resources. This would result in more informed water users, who may implement on-site water conservation strategies.

Implementing County Department: SM, SCWA, and PIO.

Timeframe: Near-Term.

MEASURE WATER-06: COLLABORATE WITH FEDERAL, STATE, AND LOCAL AGENCIES AND ORGANIZATIONS TO IDENTIFY FUTURE WATER SUPPLIES, EXPLORE ALTERNATIVE SUPPLY SOURCES, AND IMPROVE CAPACITY

Implementation:

- ▶ Pursue grant funding opportunities from the State Water Resources Control Board, the California Department of Water Resources (CA DWR), U.S. Bureau of Reclamation (USBR), USACE and other State and Federal agencies related to water recycling projects, and/or other water resource planning projects;
- ▶ Engage with RWA, other water districts in the County, the State Water Resources Control Board, CA DWR, USBR, USACE, and other local, State and Federal agencies to identify water supply options for the future and collaborate on water conservation strategies to improve supply capacity throughout the Sacramento and American River Watersheds;
- ▶ Collaborate with Sierra Climate Adaptation and Mitigation Partnership (Sierra CAMP), Sierra Nature Conservancy, Water Forum, and CRCRC, and other local, regional, and State organizations to explore regional sustainability and conservation strategies for Sacramento County's water resources (i.e., Sacramento, American, Mokelumne, and Cosumnes Rivers; groundwater); and
- ▶ Invest in programs within Sacramento County and/or locations within or in proximity to the Sacramento Valley Groundwater Basin to artificially recharge groundwater supplies through recharge ponds and injection wells to improve Sacramento County's water storage capacity.

Benefits: On-going communication and collaboration with other water-related stakeholders (e.g., agencies, organizations, businesses) would facilitate planning efforts to ensure that potentially limited water resources are allocated fairly and appropriately both upstream and downstream of Sacramento County. It is imperative that Sacramento County and its surrounding communities adapt to shifts in precipitation patterns associated with climate change. This measure will have co-benefits related to flood risk.

Implementing County Department: SM and SCWA.

Timeframe: Mid-Term.

3.1.4 Prepare for Increased Flooding

MEASURE FLOOD-01: EVALUATE AND IMPROVE CAPACITY OF STORMWATER INFRASTRUCTURE FOR HIGH-INTENSITY RAINFALL EVENTS

Implementation:

- ▶ Invest in green infrastructure such as rain gardens, bioswales, stormwater tree trenches, green roofs, detention basins, and rain barrels to reduce peak runoff, filter stormwater, and increase groundwater recharge; and
- ▶ Increase maintenance and cleaning of gutters, drainage ditches, and culverts to maximize drainage capacity.

Benefits: Investing in green infrastructure and maintenance of existing infrastructure under jurisdiction of the County would reduce instances of localized flooding in the County.

Implementing County Department: DWR.

Timeframe: Near-Term.

MEASURE FLOOD-02: IMPROVE SEWAGE AND SOLID-WASTE MANAGEMENT INFRASTRUCTURE

Implementation: Track the efforts of sanitation districts and waste management agencies in the region with the improvement of sewage and solid-waste management infrastructure. Participate in interagency coordination meetings where applicable to identify opportunities for the County to support such efforts.

Benefits: Evaluation and improvement of existing undersized or inadequate sewage and solid-waste management infrastructure could lessen the occurrences of floodwater contamination, thereby reducing the spread of pollution and degraded water quality.

Responsibility: DWR, DWMR.

Timeframe: Near-Term.

MEASURE FLOOD-03: IDENTIFY NEW LOCATIONS FOR FLOOD CONTROL, PRIORITIZING GREEN INFRASTRUCTURE SOLUTIONS

Implementation: Identify new locations suitable for multi-benefit flood control (e.g., underused agricultural areas, small streams) that encourage groundwater recharge, aquaculture, and habitat restoration (e.g., wetlands).

Benefits: Historically, Sacramento County has relied on the Yolo Bypass, Folsom Dam, and the Sacramento River and American River levee systems for flood control; however, if high climate-change caused volumes of water exceed the capacity of these facilities, Sacramento County would be dependent on additional flood control areas. Identification of these locations would mitigate potential flood events and also provide other benefits including, but not limited to, groundwater recharge, aquaculture, and habitat restoration.

Implementing County Department: SM and DWR.

Timeframe: Near-Term.

MEASURE FLOOD-04: COORDINATE WITH FEDERAL, STATE, AND LOCAL AGENCIES TO IMPROVE EMERGENCY EVACUATION AND SUPPLY TRANSPORTATION ROUTES

Implementation:

- ▶ Coordinate with the City of Sacramento, CalOES, SAFCA, CA DWR, and the Federal Emergency Management Agency (FEMA) in improving emergency evacuation and supply transportation routes during flood events; and
- ▶ Identify locations of limited evacuation and supply transport capacity (e.g., bridges) and explore innovative alternative routes (e.g., American River bike trails, light-rail).

Benefits: Evacuation out of Sacramento County could be restricted by limited bridge crossings. Development of a comprehensive plan and multiple routes for evaluation and supply transport will be necessary to protect Sacramento County residents during flood events.

Implementing County Department: SacOES, DWR, and SACDOT. Potential collaboration opportunities with the City of Sacramento, CalOES, SAFCA, CA DWR, and FEMA.

Timeframe: Near-Term.

MEASURE FLOOD-05: INVEST IN USE OF PERVIOUS PAVEMENTS AND LANDSCAPING IN DEVELOPED AREAS AND RESTRICT THE USE OF PAVED SURFACES

Implementation:

- ▶ Increase the use of pervious pavements and landscaped areas to allow for better infiltration and reduced stormwater overflow in developed areas; and
- ▶ Minimize paved surfaces for parking in favor pervious surfaces to mitigate high stormwater flow rates. The County will consider reducing minimum parking requirements in appropriate land use designations and/or increasing minimum tree or landscaping planter sizes.

Benefits: Use of pervious pavements and landscaping combined with restricting the overall square footage of paved surfaces within development areas would minimize surface runoff and rates of urban flooding. As such, the capacity of stormwater infrastructure would be maintained, and cases of localized flooding would be less frequent.

Implementing County Department: SM, PER, DWR, and SacDOT.

Timeframe: Near-Term.

MEASURE FLOOD-06: MAP CRITICAL FACILITIES AND INFRASTRUCTURE LOCATIONS VULNERABLE TO FLOODING AND UPGRADE AND/OR RELOCATE INFRASTRUCTURE WHERE APPLICABLE

Implementation:

- ▶ Map locations of communication, energy, public service, and transportation facilities and infrastructure that are vulnerable to flooding; and

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- ▶ In cases where existing communication, energy, public service, and transportation infrastructure and facilities are found to be vulnerable to flooding, assess and upgrade associated infrastructure to be more resilient to inundation and/or relocate critical infrastructure and related-elements to higher ground (e.g., generators relocated to upper floors of hospitals).

Benefits: Public facilities and infrastructure, particularly energy infrastructure, located within the 100-year, 200-year, and 500-year floodplain may be subject to several feet of inundation. Contact with floodwaters could damage the efficacy of such infrastructure resulting in black-outs, loss of communication, and impeded public services. To combat these potential impacts, Sacramento County will need to identify the locations of existing vulnerable facilities and infrastructure, and upgrade or relocate such infrastructure to withstand potential flood events. This measure will also have co-benefits related to sea-level rise.

Implementing County Department: SacOES, SacDOT, and GIS.

Timeframe: Near-Term.

MEASURE FLOOD-07: ESTABLISH AN UNDERGROUND UTILITIES PROGRAM RESISTANT TO FLOODING

Implementation: Partner with SMUD and PG&E to establish a flood-resistant Underground Utilities Program that would underground overhead utility lines in appropriate areas to increase the resiliency of the energy grid, particularly in existing communities.

Benefits: The undergrounding of electrical utilities would increase Sacramento County's resilience to temperature- and wildfire-related impacts (see Temp-6 and Fire-7); however, in flood-prone areas, such as Sacramento County, underground utilities may be damaged during periods of inundation or rising groundwater. The County should partner with SMUD and PG&E to develop watertight, flood-resilient underground utility designs to minimize flood impacts to this infrastructure.

Implementing County Department: SM.

Timeframe: Near-Term.

MEASURE FLOOD-08: PARTNER WITH SAFCA AND LOCAL AGENCIES, UTILITIES, AND OTHER ORGANIZATIONS TO SUPPORT FUTURE AND ON-GOING FLOOD-RELATED CLIMATE CHANGE INITIATIVES

Implementation:

- ▶ Partner with SAFCA, SMUD, PG&E, CRCRC, Sierra CAMP, and others to support future and on-going flood-related climate change initiatives such as efforts such as SMUD's Sacramento Resilient Grid Initiative, Flood Data Analysis and Preparedness Planning, and other initiatives designed to increase Sacramento County's resilience to flooding;
- ▶ Partner with SAFCA, SMUD, PG&E, CRCRC, Sierra CAMP and others in advancing upstream and downstream regional water management solutions that reduce flood risks by increasing storage capacity in upstream reservoirs (similar to improvements recently made to Folsom Dam), storing, and slowing snow melt until later in the season, and increasing capacity of the Yolo bypass areas; and
- ▶ Advance projects to stabilize and reinforce shorelines and levees along the American River to accommodate 160,000 cubic feet per second flows during high release flood protection events.

Benefits: Coordination with agencies and organizations would enable Sacramento County to use and benefit from additional resources and experts. Comprehensive upstream and downstream management of the Sacramento and American River Watersheds is integral to preventing catastrophic flooding in the region. This measure will have co-benefits related to sea-level rise.

Implementing County Department: SM and DWR.

Timeframe: Near-Term.

MEASURE FLOOD-09: RESEARCH THE TOLERANCE OF CURRENT CROP MIXES TO WITHSTAND INCREASED FLOODING AND SUPPORT AQUACULTURE AND FISH HABITAT

Implementation:

- ▶ Work with the agricultural sector to understand the tolerance of current crop mixes to withstand increased flooding and explore options to shift crop types to suit changing conditions;
- ▶ Support the efforts of the California Trout's Nigiri Project and other similar projects to incentivize farmers to manage fields for fish habitat and aquatic food production (e.g., rice); and
- ▶ Coordinate with the U.S. Department of Agriculture (USDA), CDFA, CA DWR, Sacramento County Department of Water Resources (DWR), California Trout, California Department of Fish and Wildlife (CDFW), and others to identify and implement actions local farmers can take to anticipate increased flooding.

Benefits: Historically, during period when the Sacramento River's reaches a threshold elevation, water is diverted into the Yolo Bypass Area, which has five times the capacity of the Sacramento River. Investing in options to use this water for aquaculture and fish and wildlife restoration habitat would benefit the County's economy and native ecosystems. This measure will have co-benefits related to preparations for sea-level rise.

Implementing County Department: SM, Office of the Agricultural Commissioner, DWR, and ED.

Timeframe: Near-Term.

MEASURE FLOOD-10: EXPAND EDUCATIONAL PROGRAMS TO ADDRESS VECTOR AND WATERBORNE DISEASES

Implementation:

- ▶ Coordinate with the Sacramento-Yolo Mosquito and Vector Control District in the design and installation of underground cisterns and other drainage facilities to reduce and treat vectors; and
- ▶ Expand public outreach and education through multiple forms of media (e.g., radio, television, social media) to reduce standing water in areas that attract mosquitos. Include information regarding methods of protection (e.g., covering up, use of sprays).

Benefits: Stagnant water following flood events provides excellent breeding grounds for mosquitoes and other insects that may carry vector-borne diseases (e.g., West Nile virus, Zika virus). Expending greater resources to expand upon existing educational programs would reduce the deleterious effects these diseases may have on Sacramento County residents.

Implementing County Department: DHHS, EMD, and DWR.

Timeframe: Near-Term.

MEASURE FLOOD-11: IDENTIFY CONCRETE CHANNEL RESTORATION AREAS

Implementation: Identify concrete channels along the Sacramento and American Rivers that could be naturalized by stabilizing stream banks and planting appropriate vegetation to buffer buildings, roads, and crops from flooding similar to the Cordova Creek Naturalization Project.

Benefits: Naturalizing these existing concrete channels would create natural buffers to flood protection. The planting of native trees, shrubs, and other vegetation increases water absorption and allows for groundwater recharge, which moderates the volume of water entering rivers and streams, thereby minimizing flood events.

Implementing County Department: DWR and Regional Parks.

Timeframe: Near-Term.

MEASURE FLOOD-12: REPLANT BARE OR DISTURBED AREAS

Implementation: Replant bare or disturbed areas to reduce runoff, improve water uptake, and reduce erosion and sedimentation in streams.

Benefits: Vegetation acts as a natural buffer to protect water quality during flood events by filtering contaminants and reducing flows of sedimentation through soil stabilization. Replanting bare or disturbed areas would reduce flood-related water quality impacts in Sacramento County.

Implementing County Department: DWR and Regional Parks.

Timeframe: Near-Term.

MEASURE FLOOD-13: UPDATE AND IMPLEMENT THE COUNTY'S LOCAL HAZARD MITIGATION PLAN TO ADDRESS CLIMATE CHANGE-RELATED FLOODING IMPACTS

Implementation:

- ▶ Ensure that all future updates to the County's LHMP incorporate comprehensive strategies to address the increasing likelihood of flooding as a result of the hazards of climate change; and
- ▶ Pursue implementation of plans related to flood protection and continue to secure grant funding to prepare future updates, where applicable.

Benefits: In accordance with federal law, the Sacramento County LHMP will be updated periodically to adapt to potential changes in hazard conditions, including climate change influences. As the effects of global climate change continue to manifest, Sacramento County's adaptation strategies and mitigation actions may need to evolve to accommodate changing conditions. Regular updates to the LHMP would include adjustments to Sacramento County's adaptation strategies and mitigation actions, so they are deployed accurately and in a timely manner. This measure will have co-benefits related to sea-level rise.

Implementing County Department: DWR and SacOES.

Timeframe: Near-Term

MEASURE FLOOD-14: SAFEGUARD FRESHWATER SUPPLY AGAINST CONTAMINATION, DEGRADATION, OR LOSS

Implementation: Invest in new and/or upgraded existing infrastructure to ensure that freshwater supplies are not contaminated, degraded, or lost during flood events.

Benefits: Floodwaters may interact with sources of pollution and disperse hazardous substances locally or regionally potentially impairing freshwater supplies. Safeguarding freshwater supply sources through infrastructure improvements (e.g., backflow preventers) would improve Sacramento County's ability to provide drinking water to its residents during flood events.

Implementing County Department: SCWA.

Timeframe: Near-Term.

MEASURE FLOOD-15: IMPROVE FLOOD WARNING AND INFORMATION DISSEMINATION

Implementation:

- ▶ Partner with NWS to deliver robust multi-lingual education and outreach materials accessible across multiple media forms (e.g., radio, text messaging) to publicize the potential flood risk day-to-day, how to sign up for Sacramento Alert Emergency Notification System, emergency supplies, pet protection, key terminology, electrical safety, and evacuation routes in the case of flooding; and
- ▶ Invest resources and personnel to regularly update the Sacramento Ready webpage to include current information.

Benefits: Improving Sacramento County's outreach and educational programs to be more accessible to non-English speaking persons, residents living within floodplains, and disadvantaged communities would provide Sacramento County residents with real-time information of flood danger as well as useful resources regarding steps to protect against human and property damage. This measure will have co-benefits related to sea-level rise.

Implementing County Department: SacOES, DWR, and PIO.

Timeframe: Near-Term.

3.1.5 Prepare for Sea-Level Rise

MEASURE SLR-01: COORDINATE WITH OTHER AGENCIES ON FLOODPLAIN MAPPING UPDATES AND IDENTIFICATION OF IMPROVEMENTS TO PROTECT VULNERABLE POPULATIONS, FUNCTIONS, AND STRUCTURES

Implementation:

- ▶ Coordinate with the applicable Reclamation Districts (RDs), FEMA, and CA DWR to regularly update floodplain mapping for potentially affected areas to reflect changes in Base Flood Elevations that account for sea-level rise; and

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- ▶ Partner with the applicable RDs to establish measures to protect populations, functions, and structures within the affected areas including continued maintenance of RD levee systems and relocation of vulnerable communities, infrastructure, and facilities where applicable.

Benefits: Updates to floodplain mapping that include changes in Base Flood Elevations with sea-level rise inputs would inform future planning and investment decisions. Recognizing that the impact of sea-level rise will manifest gradually over the course of the century, and that according to current projections, 8 percent of Sacramento County is at risk of inundation from a 1.41-meter rise in sea level coupled with a 100-year flood event, Sacramento County should rely on partnerships with agencies and organizations conducting sea-level rise research to identify actions that protect the County and areas within the proximity of the County. (see Measure SLR-6 below).

Implementing County Department: DWR.

Timeframe: Near-Term/Ongoing.

MEASURE SLR-02: SUPPORT AND MONITOR ONGOING ANALYSIS OF SEA-LEVEL RISE DATA

Implementation:

- ▶ Support and monitor ongoing collection and analysis of sea-level rise, storm surge, and tidal data by existing institutions, including, but not limited to: FEMA and the National Oceanic and Atmospheric Administration (NOAA); and
- ▶ Support research and analysis of saltwater intrusion and degraded water quality in the Sacramento River, as well as surrounding freshwater inlets and wells, as a result of sea-level rise.

Benefits: Gathering information on sea-level rise effects on Sacramento County (e.g., saltwater intrusion) would help the County and local water districts prepare for potentially more adverse hydrologic and water quality conditions.

Implementing County Department: DWR and SCWA.

Timeframe: Ongoing.

MEASURE SLR-03: UPDATE THE COUNTY'S LOCAL HAZARD MITIGATION PLAN TO INCORPORATE SEA-LEVEL RISE

Implementation: Require that future updates to the County's LHMP incorporate a comprehensive evaluation of sea-level rise in the County and associated risk management processes as the degree of sea-level rise manifests and as more data becomes available.

Benefits: Future updates to the County's LHMP to include sea-level rise hazards would increase Sacramento County's resilience to higher sea levels, because future LHMPs would assess the geographic extent, probability of future occurrences, magnitude/severity, significance, and climate change influence of sea-level rise as it relates to the County. The LHMP's assessment of these factors would advise the development of future Mitigation Actions.

Implementing County Department: SacOES and DWR.

Timeframe: Mid-Term/Ongoing.

MEASURE SLR-04: INCORPORATE SEA-LEVEL RISE EFFECTS INTO CAPITAL IMPROVEMENT PLANS

Implementation: Following the completion of Measures SLR-1 and SLR—3, update capital improvement plans for critical infrastructure to address the effects of future sea-level rise and associated hazards in potentially affected areas.

Benefits: Using sea-level rise data, the County would be able to design and locate future infrastructure projects accordingly. In areas where sea-level rise effects will likely occur, the County would bolster or relocate future infrastructure.

Implementing County Department: DWR, SACDOT, SCWA.

Timeframe: Mid-Term.

MEASURE SLR-05: GUIDE FUTURE DEVELOPMENT OUT OF AREAS VULNERABLE TO SEA-LEVEL RISE

Implementation: Following the completion of Measures SLR-1 and SLR-3, guide future development out of areas that are vulnerable to sea-level rise and associated hazards.

Benefits: Guiding development out of areas vulnerable to sea-level rise would reduce future flooding impacts to people and property. This measure will have co-benefits related to flood risk.

Implementing County Department: PER and DWR.

Timeframe: Near-Term/Ongoing.

3.1.6 Prepare for All Threats

MEASURE ALL-01: CREATE A COMPREHENSIVE OUTREACH STRATEGY

Implementation: Develop robust multi-lingual education and outreach materials accessible across multiple media forms (e.g., radio, television, social media) to publicize potential climate change impacts and how to sign up for Sacramento Alert Emergency Notification System and adequately protect and increase community resiliency to climate change.

Benefits: Improving Sacramento County's outreach and educational programs to be more accessible to non-English speaking persons, residents living within vulnerable areas, and disadvantaged communities would provide Sacramento County residents with real-time information of climate danger as well as useful resources regarding steps to protect against human and property damage. This measure will have multiple co-benefits.

Implementing County Department: SacOES, SM, and PIO.

Timeframe: Mid-Term.

4 IMPLEMENTATION AND MONITORING STRATEGY

To successfully implement the GHG emissions reduction and adaptation strategies described in previous sections, the CAP in its entirety will need to be continuously assessed and monitored. This will entail:

- ▶ Preparing an annual report for the Board of Supervisors that describes progress on the GHG reduction and adaptation strategies described in this plan. This report will state the status of each measure in achieving the implementation and target indicators set for the timeline specified;
- ▶ Coordinating measure implementation within each County department specified in the measure, or other departments, if necessary;
- ▶ Providing regular updates to the public on the status of CAP strategy implementation, through a CAP portal hosted on the County's website and linked to the existing Green Sacramento County page;
- ▶ Regular coordination with the Climate Emergency Mobilization Task Force as described in the County's Declaration of a Climate Emergency;
- ▶ Seeking Board approval, when necessary, to implement programs that support the goals of the CAP measures and to adjust the CAP when necessary in response to monitored performance and community feedback;
- ▶ Updating the community GHG Inventory within the first two years of CAP implementation, and every three years thereafter, publishing a summary of the results to the CAP portal;
- ▶ Screening project applications for new development to ensure that all projects, particularly those seeking streamlining for GHG analyses are in conformance with the CAP;
- ▶ Coordination with non-profits and community-based organizations engaged in sustainability planning on the implementation of CAP measures. This may include communicating volunteer opportunities for members of these groups to provide support for CAP measure implementation;
- ▶ Tracking the payment of relevant assessments on new development to ensure that these funds are being invested into high-density infill projects with per-capita GHG emissions below the County's 2030 business-as-usual forecast of 4.8 MT CO₂e per person;
- ▶ Providing updates to regional planning agencies and organizations to on the status of the CAP and learn new best practices for CAP measure implementation. This includes but is not limited to Capital Region Climate Readiness Collaborative, SMUD public workshops, SACOG regional planning efforts, and applicable SMAQMD rulemakings;
- ▶ Tracking the timeframe on updates to the County's General Plan, State Scoping Plan, Natural and Working Lands Strategy, and attending scoping meetings for these Plans to ensure that future updates to the CAP align with these Plans; and
- ▶ Begin identifying new and enhanced carbon reduction strategies to incorporate into a CAP update in the 2024-2025 timeframe that brings the County to full carbon neutrality by 2030 in accordance with the County's Climate Emergency Resolution.

The work described would entail internal coordination across multiple County agencies, with external partners, and interaction with the Board of Supervisors for consideration of actions that allow the CAP measures to be achieved, modified, and funded, as necessary. A full-time Sustainability Manager aided by support staff would be necessary for performing the duties described in this strategy. Recruitment for this position is currently open and the position is expected to be filled by the end of 2021.

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APPENDIX A – CLIMATE CHANGE OVERVIEW AND REGULATORY BACKGROUND

A.1 GREENHOUSE GAS EMISSIONS REDUCTION IN CLIMATE ACTION PLANNING

Planning for climate change at the local level can involve preparation of plans that address the causes and effects of climate change. A known cause of climate change is the release of GHG emissions into Earth's atmosphere (IPCC 2014). CAPs aim to reduce GHG emissions occurring at the local level which contribute to this global challenge. This is done by assessing historic and forecast GHG emissions occurring from local sources and then prescribing GHG reduction measures to reduce, eliminate, or remove GHG emissions over time. The measures contained in Section 2 of this CAP are aimed specifically at emissions within sectors included in the County's GHG Emissions Inventory (Section 1.2 and Appendix E) focusing on actions that are within the control of local government to enforce or provide support to partners in achieving.

A.2 KEY STATE REGULATIONS AND PLANNING EFFORTS FOR GREENHOUSE GAS REDUCTION

The CAP for Sacramento County occurs alongside other State plans, policies and regulations aimed at reducing GHG emissions. In 2005, Governor Arnold Schwarzenegger signed Executive Order (EO) S-3-05, which directed California to reduce GHG emissions to 1990 levels by 2020, and to 80 percent below 1990 levels by 2050. A year later, in 2006, the Global Warming Solutions Act (Assembly Bill [AB] 32) was passed, establishing regulatory, reporting, and market mechanisms to achieve quantifiable reductions in GHG emissions. AB 32 put a cap on GHG emissions, setting a target of reducing GHG emissions to 1990 levels by 2020. As part of its implementation of AB 32 and EO S-3-05, the California Air Resources Board (CARB) developed a Scoping Plan in 2008 to describe the State's approach to achieving GHG reduction targets and goals.

On April 20, 2015, Governor Edmund G. Brown Jr. signed EO B-30-15, establishing a new GHG emissions reduction target of 40 percent below 1990 levels by 2030. EO B-30-15 directed CARB to update the AB 32 Scoping Plan to reflect the path to achieving the 2030 target. In September 2016, Governor Brown also signed Senate Bill (SB) 32, which codified into statute the mid-term 2030 target established by EO B-30-15. The 2030 GHG emissions reduction target places California on a trajectory towards meeting the goal of reducing statewide emissions to 80 percent below 1990 levels by 2050. EO B-55-18, signed in September 2018, furthers California's efforts to reduce GHG emissions by setting a goal to achieve carbon neutrality by 2045 and achieve net negative GHG emissions thereafter.

APPENDIX B – CLIMATE CHANGE ADAPATION, BACKGROUND & VULNERABILITY ASSESSMENT

B.1 KEY STATE REGULATIONS AND PLANNING EFFORTS FOR CLIMATE CHANGE ADAPTATION

Climate change is a global phenomenon that will result in short- and long-term consequences, including detrimental impacts on human health and safety, economic continuity, water security, provisions of basic services, and economic function. Indeed, the impacts of climate change are already being felt and are disproportionately impacting California's most vulnerable communities. According to the California Natural Resources Agency's (CNRA) Safeguarding California Plan: 2018 Update, the accelerating rate of climate change in this century will likely exceed that experienced by California's native peoples over past millennia (CNRA 2018). The magnitude and timing of climate change effects will vary by location; therefore, in order to develop effective strategies to address the impacts of climate change, jurisdictions must understand the projected severity of local climate impacts.

The purpose of climate adaptation planning is to seek strategies to reduce our vulnerability to projected climate change impacts, increase adaptive capacity, and build resiliency. Resiliency is defined as the ability of an individual, community, organization, or natural system to prepare for disruptions, to recover from shocks and stresses, and to adapt and grow from a disruptive experience. A climate resilient county is one that is prepared for the effects of climate change, can continue to provide essential services, protects against disproportionate impacts during hazard events, and implements adaptive management in the face of change and disruption.

The two basic components of climate adaptation planning are a vulnerability assessment and an adaptation strategy. The vulnerability assessment presented below evaluates how climate change will impact the County. It identifies projected climate change exposures for the County at mid- and late century timescales. This assessment identifies the County's populations and assets that are most vulnerable to climate change effects and the level of severity at which they may be impacted through a method known as "vulnerability scoring". This scoring helps the County understand which effects pose the greatest threats and should be prioritized in adaptation planning efforts. Lastly, this chapter presents an adaptation strategy with measures to address the impacts of climate change, equitably protect people and infrastructure, and increase countywide resilience to climate change.

The State also prepared the 2009 California Climate Adaptation Strategy (Adaptation Strategy), which highlights climate risks and outlines possible solutions that can be implemented throughout California. The new Safeguarding California document is the State's roadmap to protect communities, infrastructure, services, and the natural environment from climate change impacts. The state has also published several guiding documents to support adaptation planning, which were used to prepare the vulnerability assessment in Appendix B and the strategies and measures contained in the main CAP document.

- ▶ **California Adaptation Planning Guide:** The California Office of Emergency Services (CalOES) and CNRA prepared the Adaptation Planning Guide (APG) in 2012 to provide vulnerability assessment and adaptation planning guidance for communities. CalOES released APG 2.0 (dated June 2020), an updated guidance document that includes best practices and additional flexibility for jurisdictions. APG 2.0 lays out a framework for communities to identify potential climate change effects; important

physical, social, and natural assets; create adaptation strategies to address climate change impacts; and develop a monitoring and implementation framework for climate change adaptation (CalOES 2020).

- ▶ **California’s Fourth Climate Assessment:** CNRA, the Governor’s Office of Planning and Research, and the California Energy Commission prepared California’s Fourth Climate Assessment (Fourth Assessment) in 2018. The Fourth Assessment was designed to address critical information gaps that decision-makers at the state, regional, and local levels need to close in order to protect and build the resilience of people, infrastructure, natural systems, working lands, and waterways.
- ▶ **Safeguarding California Plan:** Alongside the update to the Fourth Assessment, CNRA released the Safeguarding California Plan: 2018 Update which provides a roadmap for State government action to build climate resiliency. The plan identifies actions the State government will take to protect communities, infrastructure, services, and the natural environment from climate change impacts and includes strategies for use as local examples for climate adaptation.

B.2 VULNERABILITY ASSESSMENT

This section presents a vulnerability assessment for the County, focusing on direct and indirect climate change effects. The direct, or primary, effects analyzed for the County include changes in average temperature and annual precipitation amounts. Secondary effects, which can occur because of individual changes or a combination of changes in the primary effects, are also assessed. These include extreme heat, wildfire, drought, flooding, and sea-level rise. The vulnerability assessment follows the process outlined in Phase 2 of the APG and is composed of the following four steps:

- ▶ **Exposure:** The first step in the vulnerability assessment is to identify what climate change effects Sacramento County will experience in the future. To assess potential effects from climate change the APG 2.0 recommended Cal-Adapt tool is used. Results are based on two Representative Concentration Pathways (RCPs), 4.5 which represents a medium emissions scenario and 8.5 which represents a high emissions scenario. Because the efficacy of future global GHG reduction strategies is unknown, a discussion of both emissions scenarios, and their associated impacts, is included in this vulnerability assessment (Bedsworth et al. 2018).
- ▶ **Sensitivity and Potential Impacts:** This step identifies and assesses how population groups, community functions, and physical assets may be affected by localized climate change effects.
- ▶ **Adaptive Capacity:** The County, partner agencies, and organizations within the county have already taken steps to build resiliency and protect sensitive populations and assets from hazards. Thus, the purpose of this step is to characterize the County’s current ability to cope with climate impacts, by reviewing existing plans, policies, and programs.
- ▶ **Vulnerability Scoring:** Lastly, vulnerability scores are determined based on how severe projected climate exposures will be, the degree of sensitivity of population groups and assets to anticipated climate effects, and whether sufficient adaptive capacity exists to manage the potential impact. This is based on a scale of 1 to 5, with higher scores indicating greater vulnerability.

Table B-1 below includes a summary of the vulnerability scoring. It lists the direct and indirect impacts associated with climate change, the magnitude of risk posed to populations and assets (potential impact), and the County’s existing adaptive capacity. An overall vulnerability score is determined based on the potential impact and adaptive capacity scores.

Table B-1 Potential Impact, Adaptive Capacity, and Vulnerability Scoring for Sacramento County

Impact	Potential Impact	Adaptive Capacity	Vulnerability Score
Increased Temperatures	High	Medium	4
Extreme Heat Days and Heat Waves	High	Medium	4
Increased Wildfire Risk	Medium	Medium	3
Increased Drought	Medium	Medium	3
Increased Flooding	High	Low/Medium	4/5
Sea-Level Rise	High	Medium	4

B.2.1 Exposure

PRIMARY EFFECT: INCREASED TEMPERATURES

According to Cal-Adapt, the historic (1961-1990) annual average maximum temperature for the County was 74 degrees Fahrenheit (°F), and the historic annual average minimum temperature was 48.4 °F. As shown in Table B-2 and Figures B-1 and B-2, both are projected to increase by mid-century (2035-2064) and further increase by late century (2070-2099) under the medium and high emissions scenarios.

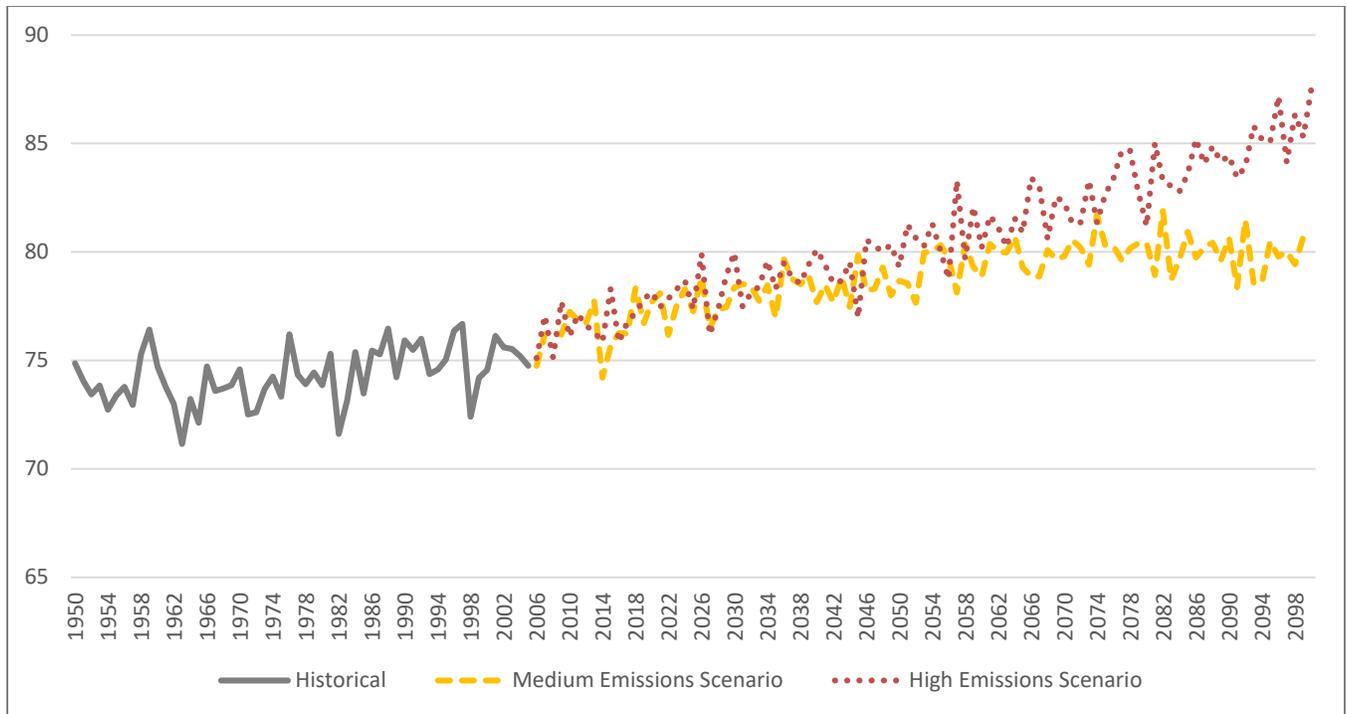
Table B-2 Changes in Annual Average Temperature in Sacramento County

Annual Average Temperature (°F)	Historic Annual Average Temperature (1961-1990)	Medium Emissions Scenario (RCP 4.5)		High Emissions Scenario (RCP 8.5)	
		Mid-Century (2035-2064)	Late Century (2070-2099)	Mid-Century (2035-2064)	Late Century (2070-2099)
Maximum Temperature	74.0	78.3	79.8	79.4	82.7
Minimum Temperature	48.4	52.2	53.4	53.2	56.8

Notes: °F = degrees Fahrenheit, RCP = Representative Concentration Pathway

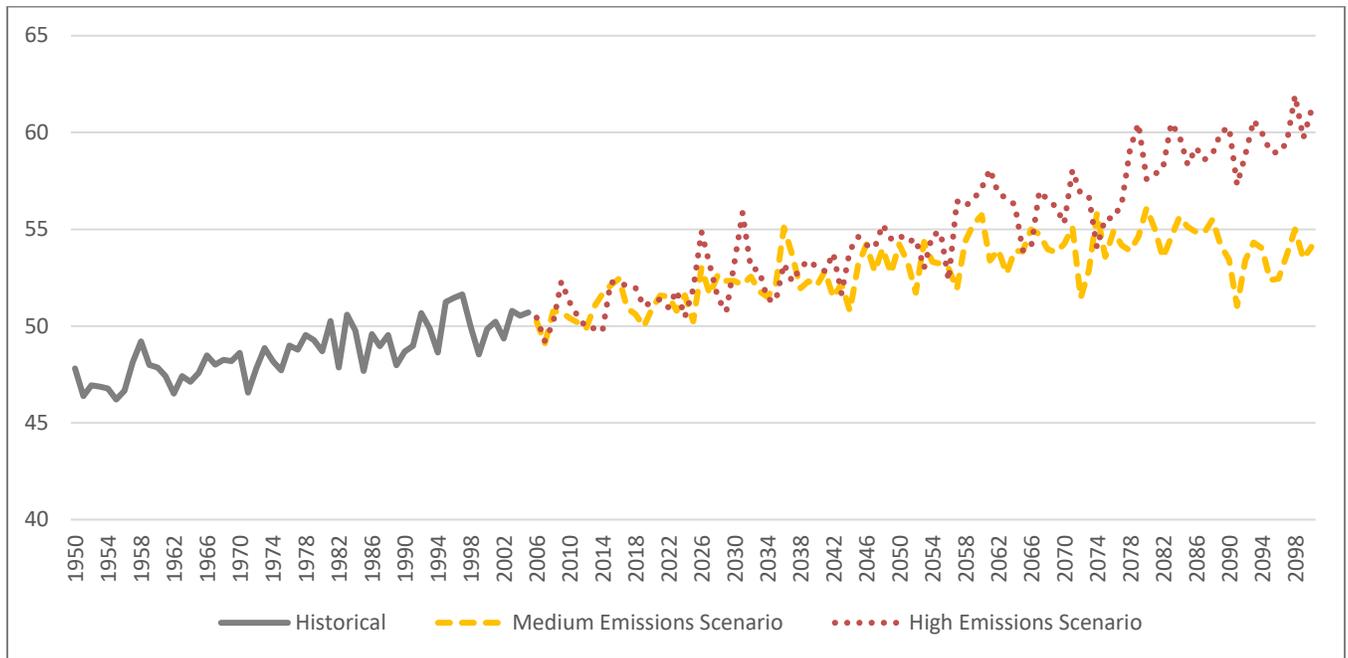
Source: CEC 2020a

Figure B-1 Historical and Projected Annual Average Maximum Temperature in Sacramento County



Source: Data downloaded from Cal-Adapt in 2020; adapted by Ascent Environmental in 2020.

Figure B-2 Historical and Projected Annual Average Minimum Temperature in Sacramento County



Source: Data downloaded from Cal-Adapt in 2020; adapted by Ascent Environmental in 2020.

Increased temperature in the unincorporated County will influence secondary climate effects including extreme heat events, wildfires, drought, and sea-level rise.

PRIMARY EFFECT: CHANGES IN PRECIPITATION PATTERNS

According to California’s Fourth Climate Change Assessment Sacramento Valley Region report, precipitation patterns in California oscillate between extremely dry and wet periods. Although annual precipitation figures in the Sacramento Valley region are expected to increase only slightly, climate change is likely to increase the intensity of extreme storms. Dry years are likely to become even drier, while wet years will become even wetter in the next several decades. Most critically, future wet seasons will have more precipitation as rain than snow, due to higher temperatures. The Northern Sierras, a primary water source for the Sacramento Valley, are expected to have almost no annual snowpack by the end of this century under the scenarios modeled for the paper. This shift will affect the timing of streamflow into the Sacramento Valley from spring to winter (Houlton and Lund 2018).

According to Cal-Adapt, the historic annual average precipitation in the County has been 18.3 inches. As shown in Table B-3 and Figure B-3, the total annual precipitation in the County is projected to increase slightly by mid-century and late century under the medium and high emissions scenarios (CEC 2020a).

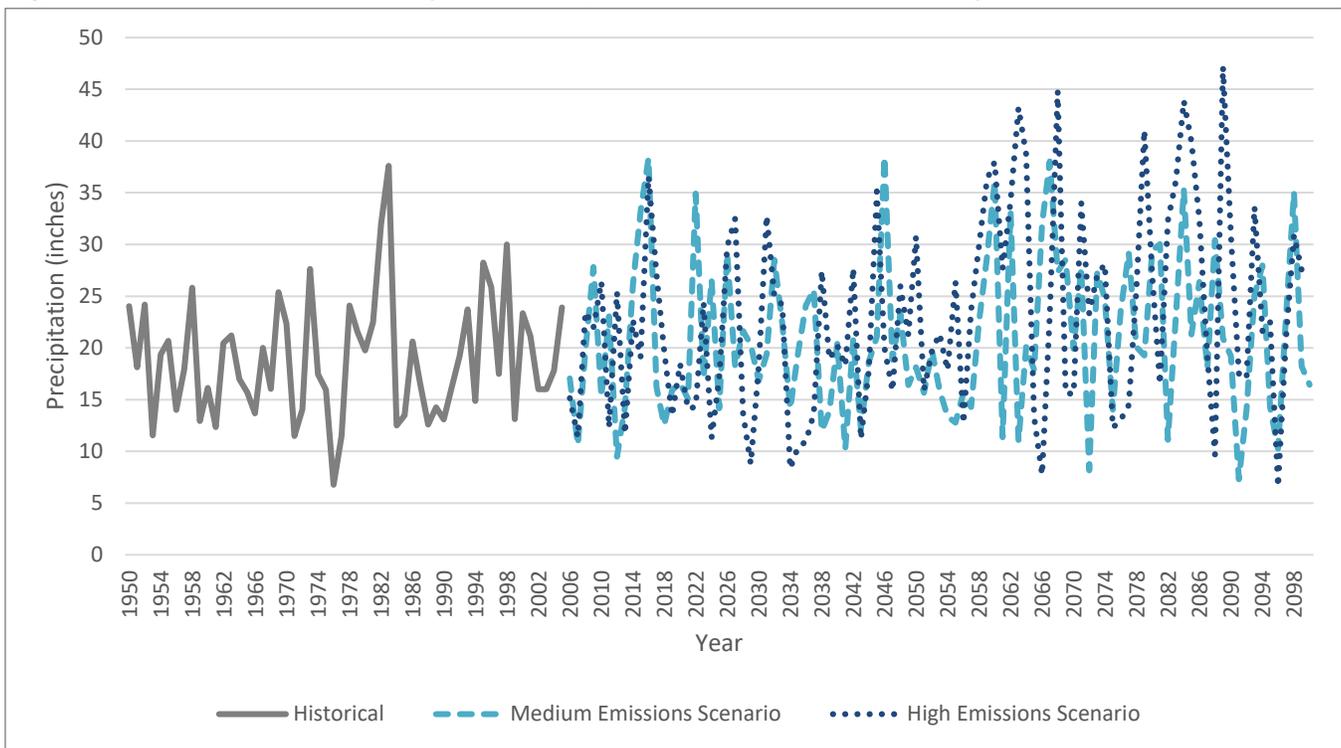
Table B-3 Changes in Annual Average Precipitation in Sacramento County

Annual Average Precipitation	Historic Annual Average Precipitation (1961-1990)	Medium Emissions Scenario (RCP 4.5)		High Emissions Scenario (RCP 8.5)	
		Mid-Century (2035-2064)	Late Century (2070-2099)	Mid-Century (2035-2064)	Late Century (2070-2099)
Annual Average Precipitation (in)	18.3	20.3	20.3	20.5	22.1

Notes: in = inches, RCP = Representative Concentration Pathway

Source: CEC 2020a

Figure B-3 Historical and Projected Precipitation in Sacramento County



Source: Data downloaded from Cal-Adapt in 2020; adapted by Ascent Environmental in 2020.

Changes in precipitation patterns will affect secondary climate effects including extreme heat, wildfires, drought, flooding, and sea level rise.

SECONDARY EFFECT: EXTREME HEAT

Cal-Adapt defines an extreme heat day as a day in a year when the daily maximum/minimum temperature exceeds the 98th historical percentile of daily maximum/minimum temperatures based on observed historical data from 1961–1990 between April and October. The extreme heat threshold for the County¹ is 103.8°F. Historically, the County experienced an average of four extreme heat days per year. Extreme heat days are already increasing in Sacramento County, with a current average of eight to nine extreme heat days per year from 2010 to 2016, including 18 extreme heat days in 2015. As a result of rising average maximum temperatures from climate change, the County is projected to experience up to 17 extreme heat days annually by mid-century and 24 extreme heat days by the late century under the medium emissions scenario. Under the high emissions scenario, the County is projected to experience up to 22 extreme heat days annually by mid-century and 40 extreme heat days by the late century (CEC 2020b).

Heat waves, which are defined as four or more consecutive extreme heat days, have been historically infrequent in Sacramento County; however, climate change will cause a substantial rise in the frequency of heat waves under both emissions scenarios. Under the medium emissions scenario, projections show an increase in heat waves to about 1.9 per year by mid-century and up to 2.8 per year by late century. Under the high emissions scenario, projections show an increase of 2.6 heat waves per year by mid-century and up to 5.8 per year by late century.

SECONDARY EFFECT: WILDFIRES

According to the 2016 Sacramento County Local Hazard Mitigation Plan (LHMP), rural wildfire and urban wildfire are ongoing concerns for the County. Currently, the major wildland fire hazards occur at the wildland urban interface where development is placed close to natural environments that support wildfire (Sacramento Metropolitan Fire District [Metro Fire] 2014).

Increased temperatures and changes in precipitation patterns associated with climate change are expected to increase the risk of wildfire in Sacramento County. Higher temperatures and reduced precipitation results in reduced average moisture in vegetation, which leads to the drying out of fuel loads that support more intense wildfires. The eastern portion of Sacramento County, where the topography includes more widespread and steeper slopes, is most vulnerable to wildfire.

SECONDARY EFFECT: DROUGHT

Sacramento County is not located in an area where snow accumulates; however, major water districts and utilities in the County receive and depend on a substantial amount of water from watersheds that rely upon spring and early-summer snowmelt in the Sierra Nevada mountain range. The Sierra Nevada snowpack, which serves as a natural water supply reservoir for California during the dry months, is predicted to decline in area covered and water volume stored, as average temperatures rise and precipitation falls more frequently as rain instead of snow at mountain elevations. Further, increased temperatures will affect the timing of historical snowmelt such that the snowpack will typically melt earlier

¹ Cal-Adapt does not include countywide aggregated climate data for extreme heat. Thus, the geographic area surveyed for extreme heat relies on aggregated data from the City of Sacramento, which serves as a proxy for the County.

in the year, causing more rapid early spring flows in the Sacramento, American, Cosumnes, and Mokelumne Rivers and reduced late spring/summer flows.

Approximately 50 percent of Sacramento County is served by groundwater supplies. Changes in surface water flow will have a direct impact on groundwater recharge, including decreased periods of recharge when late spring/summer stream flows diminish. Further, groundwater usage is higher in periods of drought; therefore, groundwater supplies may be reduced during and after periods of limited surface water flows.

California (including Sacramento County) is prone to prolonged drought. The state experienced severe drought in 1973, 1976 through 1977, 1987 through 1991, 2007 through 2009, and 2012 through 2016. During the most recent severe drought period in June of 2015, statewide reservoir storage levels were between 18 and 67 percent of normal (State Water Resources Control Board [SWRCB] 2017). Climate change is expected to increase the number, duration, and severity of future droughts. Exacerbated drought conditions, early snowmelt, and reduced snowpack size, combined with increased demand as population and development increases, could result in water supply constraints in future years.

SECONDARY EFFECT: FLOODING

Climate change is likely to lead to changes in the frequency, intensity, and duration of extreme weather events, such as sustained periods of heavy precipitation, increased rainfall intensity during precipitation events, and increased risk of rain-on-snow events. Further, more winter-time precipitation that falls as rain instead of snow, and higher temperatures that will cause earlier snowmelt, which could produce substantial surface water flows over a short period of time and may potentially affect dams and spillways and overwhelm levee systems designed for historical precipitation patterns. Historically, the County² experienced an average of three extreme precipitation events per year. Under both the medium and high emissions scenarios, the County is expected to experience four extreme precipitation events per year by mid-century and five extreme precipitation events per year by the late century (CEC 2020c).

According to the LHMP, the County is “Highly Likely” to experience localized flooding (likelihood of occurrence every year or every other year), “Occasional” to experience a 100-year flood event (one to ten percent likelihood of occurrence every year), and “Unlikely” to experience a 200- and 500-year flood event (less than one percent chance of occurrence every year).

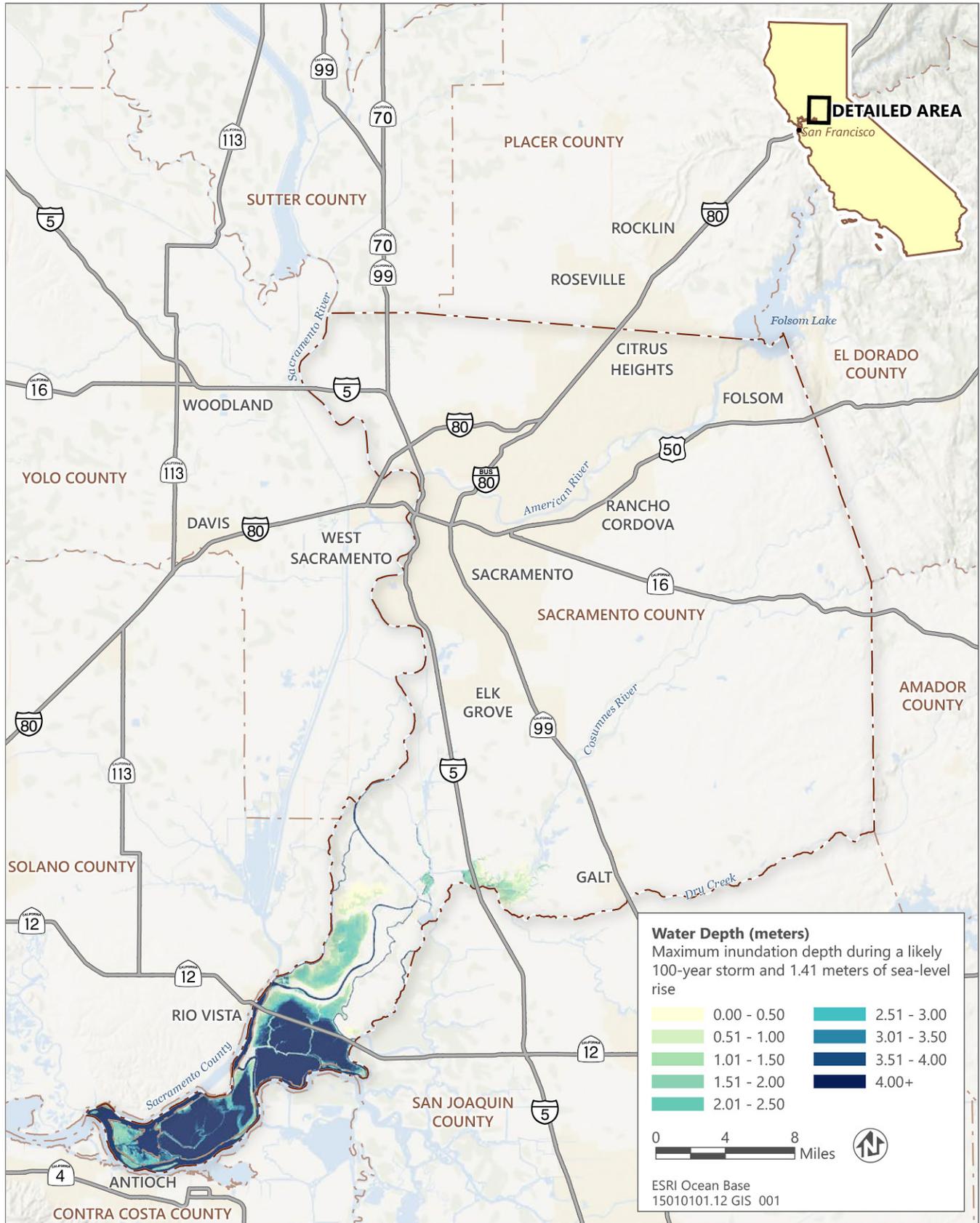
SECONDARY EFFECT: SEA-LEVEL RISE

Another outcome of global climate change is sea-level rise. As shown in Figure B-4, the southwestern portion of the County, which includes the lower reaches of the Sacramento River as it approaches the Sacramento-San Joaquin Delta, is the area of the County vulnerable to the effects of sea-level rise. Land uses in this area of the County are primarily rural and agricultural.

Sea-level rise may also result in greater saltwater incursion up the Sacramento River. Increased municipal and agricultural demand for fresh water, rising sea levels in the Delta, and reduced freshwater flow in the Sacramento River may affect water quality within the river. Water quality is dependent on a complex interaction of several variables, however, so the risk of future climate change implications on water quality in the Sacramento River is uncertain.

² Cal-Adapt does not include countywide aggregated climate data for extreme precipitation. Thus, the geographic area surveyed for extreme precipitation relies on aggregated data from the City of Sacramento, which serves as a proxy for the County.

Figure B-4 Sea-Level Rise Projections for Sacramento County, 1.41 Meter Rise Scenario



Source: Ascent Environmental 2021

B.2.2 Sensitivity and Potential Impacts

Climate change effects will impact some population groups, community functions, and physical assets more severely than others.

- ▶ **Population** includes both the general human population and segments of the population that are most likely to be sensitive or vulnerable to climate change impacts. Vulnerable populations within the County include linguistically isolated populations, the elderly, persons experiencing homelessness, outdoor workers, tribal nations, low-income communities, and disadvantaged communities who already bear a disproportionate pollution burden.
- ▶ **Functions** are essential services that provide for public health and safety, ecosystem functioning, and the economy. These include hospitals, medical facilities, police and fire stations, emergency operations centers, evacuation shelters, and schools. Transportation networks and lifeline utility systems are also critical to public health and safety. Functions also include economic systems such as agriculture, recreation, and tourism, as well as natural resources.
- ▶ **Structures** are physical assets in a community such as residential and commercial buildings, institutions (i.e., schools, churches, hospitals, prisons, etc.), recreational facilities, transportation infrastructure, parks, dikes and levees, and water and wastewater treatment infrastructure. It also includes high potential loss facilities, where damage would have large environmental, economic, or public safety considerations (e.g., nuclear power plants, dams, military installations, hazardous materials facilities).

This step in the vulnerability assessment involves identification of populations, functions, and structures that may be affected in the County by projected exposures to climate change impacts and their degree of sensitivity. A summary of potential impact scores is included in Table B-1. “Low” designates impacts that are unlikely based on projected exposure and would result in minor consequences to public health, safety, and/or other metrics of concern. “Medium” potential impacts are those that are somewhat likely based on projected exposure and would result in some consequences to public health, safety, and/or other metrics of concern. “High” potential impacts are those that are highly likely based on projected exposure and would result in substantial consequences to public health, safety, and/or other metrics of concern (CalOES 2020).

INCREASED TEMPERATURES AND EXTREME HEAT DAYS AND HEAT WAVES

Higher frequency of extreme heat days and heat waves can cause serious public health impacts, increasing the risk of conditions such as heat cramps, heat exhaustion, heat stroke, and dehydration. Higher temperatures also worsen air quality through the increased air pollution. Developed areas are especially at risk, as extreme heat events will exacerbate the phenomenon known as the urban heat island effect (UHIE). In built-up areas vegetation is sparse, roofs and asphalt pavement dominate the landscape, absorbing and retaining heat during the day and releasing it at night. Climate change poses significant challenges for achieving health equity, because populations that are socially and economically vulnerable often bear a disproportionate burden of climate effects. People in low-income areas, some of which are communities of color; people with existing health issues, such as chronic diseases and mental health conditions; young children and the elderly; people experiencing homelessness; outdoor workers, including farmers; immigrants; some tribal nations; and socially or linguistically isolated people are most vulnerable to the impacts of climate change. Vulnerable populations are less likely to have air conditioning to cool homes or shade from trees in their neighborhoods, more likely to experience infrastructure limitations, more likely to have one or more chronic medical conditions, and less likely to own cars that can provide mobility to avoid deleterious climate effects.

Extreme heat can also affect the functioning of essential services, economic systems, and ecosystems. High temperatures decrease the efficiency of power transmission lines, while demand for electricity simultaneously goes up as operation of air conditioners and cooling equipment increases. This results in more frequent blackouts and could affect the operation of infrastructure (SACOG 2015:23). Increased temperatures also lead to greater rates of evapotranspiration, leading to increased demand for outdoor watering and increasing stressors on the County's water supply. Extreme heat events can also impact outdoor activities like recreation, tourism, and agriculture. Increased temperatures and warmer nights as a result of climate change will likely reduce yield of some of California's most valuable specialty crops, result in heat stress to livestock, and alter the range of crop-damaging pests (CNRA 2014:24). Rising temperatures will also affect natural resources in Sacramento County. Temperature-sensitive terrestrial plant and animal species exposed to higher temperatures may shift their existing ranges to higher latitudes and elevations, cooler coastal environments, or local microclimate refuges. Vernal pool ecosystems, in particular, are vulnerable to increases temperatures and prolonged periods of heat.

Prolonged exposure to extreme heat can damage physical assets and infrastructure, resulting in roadway degradation, bridge expansion and contraction, and rail track buckling.

INCREASED RISK OF WILDFIRE

Increased frequency and intensity of wildfires will directly affect the safety of populations living within or near wildland areas (i.e., wildland-urban interface) prone to wildfire. Wildfires also result in the release of harmful air pollutants into the atmosphere, which dissipate and can affect the respiratory health of residents across a broad geographical scope.

Wildfires affect the functioning of transportation systems, emergency services, recreation and tourism, and healthy ecosystems. Roadway closures during a wildfire may result in poor emergency vehicle access and the isolation of rural and remote populations throughout the County (Valley Vision 2014). Hospitals may incur additional strain on their resources to accommodate an influx in emergency room visits during wildfire events. Wildfires impede recreational uses as well as the associated tourism revenue (Valley Vision 2014). Damage to ecological functions may also result due to catastrophic wildfire. When rain falls in burn scarred areas, there is a higher potential for soil erosion and mud flows into roads, ditches, and streams, which reduces water quality.

Lastly, wildfires can damage and destroy physical assets and infrastructure. In particular, critical transmission lines and hydroelectric infrastructure may be vulnerable to damage or temporary shutdown caused by wildfires (SMUD 2012).

INCREASED DROUGHT

Although the County has yet to face a critical loss in water resources, it is possible that climate-induced drought and increased water demand due to population growth could result in future water shortages wherein residents must implement severe cutback strategies. Those relying on wells or groundwater may also face challenges in meeting water demands as rates of groundwater recharge decline (CalBRACE 2015). Drought conditions can also affect public health by increasing the spread of vector-borne illnesses, such as the airborne transmission of pathogenic fungi spores, generated by parched agricultural land.

Energy production, agriculture, recreation, and ecosystem functions are especially vulnerable to drought. A declining volume of snowmelt coupled with earlier periods of melting could have severe consequences for the region's hydro-electricity generation. Drought and increased agricultural demand for water during extreme heat conditions could result in water insecurity for the sector. Reduced surface water flow in the County's watersheds could affect river-based economic and recreational opportunities such as the fishing, rafting, camping, and backpacking, and swimming activities in the tributaries of the Sacramento, American, Cosumnes, and Mokelumne rivers. Reduced streamflow combined with increased human demand for water could lower the availability of water for wildlife and alter the composition and structure of riparian communities (CDFW 2015).

In terms of damage to physical assets, drought conditions can increase in dependence on groundwater supplies and result in overdraft of groundwater basins. The Sacramento and San Joaquin groundwater basins have experienced "historical overdraft," where groundwater extraction exceeded rates of groundwater recharge (CA DWR 1980). Overdraft can lead to land subsidence wherein a gradual settling or sudden sinking of the earth's surface occurs. The effects of subsidence could impact houses and other structures such as transportation infrastructure, water well casing failures, and changes to the elevation and gradient of stream channels, drains, and other water transport structures (CNRA 2014:235).

INCREASED FLOODING

Increased flooding due to climate change will most adversely affect vulnerable populations living in floodplains. Low-income populations suffer higher mortality rates, and their homes sustain greater damage due to the housing stock, location, and inability to afford structural upgrades or flood insurance to mitigate the effects of flooding (Burton and Cutter 2008:144). Low-income households may also lack transportation and other resources to respond to or evacuate during a flood event. Race, class, ethnicity, and immigration status are also drivers of flood-related social vulnerability, as these may impose cultural and language barriers that affect emergency communications and access to post-disaster resources for recovery. Additionally, floodwater can interact with sources of pollution and distribute hazardous pollutants locally and regionally, resulting in water contamination and human health impacts.

Floods can disrupt transportation networks, cause economic losses through closure of businesses and government facilities, disrupt communications, disrupt the provision of utilities such as water and sewers, result in excessive expenditures for emergency response, and generally disrupt the normal function of a community (Sacramento County 2016). Roadway closures due to extended periods of flooding could prevent residents from accessing key supplies, such as food, electricity, fuel, and potable water. Flooding may also threaten ecosystem functioning and agricultural resources: unlike natural flooding regimes that deposits useful sediment resulting in increased soil fertility as well as groundwater recharge, catastrophic flooding from levee overtopping could lead to soil erosion and loss of viable cropland. It could also release sewage and hazardous materials into the environment if wastewater treatment plants are inundated, storage tanks are damaged, and pipelines severed.

Lastly, severe flooding is capable of destroying building and infrastructure such as bridges, roadways, electrical boxes, drainage systems, and levees. Extreme weather events could weaken or collapse levees in the Delta and could breach Sacramento and American river levees especially where they have not yet been upgraded or do not meet the minimum National Flood Insurance Program requirements.

SEA-LEVEL RISE

Portions of the County susceptible to sea-level rise are the low-lying lands near the Sacramento River in the southwest portion of the County. This area of the County is moderately disadvantaged according to the California Health Disadvantaged Index developed by the Public Health Alliance. As discussed above under the heading, "Increased Flooding," populations of high social vulnerability face challenges in responding or mitigating against flood events, including those associated with sea-level rise, due to low socioeconomic status, language barriers, educational status, and limited mobility (Climate Central n.d.).

Sea-level rise impacts to community functions and physical assets are similar to those described above in "Increased Flooding." The portion of the County susceptible to sea-level rise will face a greater threat of flooding because of the aging levees in the Delta and predicted increase in storm intensity affecting the American and Sacramento River watersheds (Curtis and Schneider 2011). Additionally, sea-level rise may affect the salinity of the Sacramento-San Joaquin Delta and cause saltwater intrusion into the Sacramento River, affecting water quality and supply throughout the region and state (CA DWR 2008, Water Education Foundation 2016).

B.2.3 Adaptive Capacity

The County, partner agencies, and organizations within the County have already taken steps to build resiliency and protect sensitive populations, functions, and assets from hazards. Review of existing local policies, plans, programs, resources, or institutions provides a good snapshot of the County's ability to adapt to climate change and reduce vulnerability. Based on this information, the County's adaptive capacity for each climate impact can be rated high, medium, or low. High adaptive capacity indicates that sufficient measures are already in place to address the points of sensitivity and impacts associated with climate change, while a low rating indicates a community is unprepared (CNRA 2012:26). Major plans and initiatives that address climate-related hazards include the following:

- ▶ **Sacramento County General Plan of 2005 – 2030:** includes policies to encourage sustainable building practices, efficient use of resources (i.e., water, land, and energy), and ecological stewardship. It also includes policies aimed at protecting its aging population, which are more vulnerable to health-related effects of climate change impacts and require better access to public services and housing (Sacramento County 2011a).
- ▶ **2016 Sacramento Countywide Local Hazard Mitigation Plan Update:** addresses current and future impacts related to existing natural hazards such as flooding, levee failure, and wildfires (Sacramento County 2016). The LHMP is currently undergoing an update to address an updated list of hazards, impacts to the people and assets, and to establish updated goals and prioritize projects to reduce the impacts of future disasters on people and property as well as to critical facilities and infrastructure. It is anticipated that a draft of the updated LHMP will be available late spring 2021.
- ▶ **Capital Region Climate Readiness Collaborative (CRCRC):** the County is an active member of the CRCRC, which works across multiple sectors to advance resiliency across the region and the state. The CRCRC works regionally and across the state with other similar collaboratives, under the Alliance of Regional Collaboratives for Climate Adaptation, to address climate change, understand and inform the region on best practices for resiliency and adaptation to build strong, resilient, healthy, equitable, and sustainable communities across California.

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- ▶ **Adaptive Efforts Related to Increased Temperature:** the Sacramento County Office of Emergency Services (SacOES) provides community-wide information for how to stay safe during periods of extreme heat through their Sacramento Ready Program, the County participates in the Property Assessed Clean Energy financing programs to help homeowners finance home energy and water efficiency upgrades, and numerous organizations within the County support urban greening and forestry efforts. The Sacramento Municipal Utility District (SMUD) implements a Cool Roof Incentive program.
 - ▶ **Adaptive Efforts Related to Wildfire:** the County adopted the 2013 California Fire Code, which includes defensible space requirements and provisions to help prevent the accumulation of combustible vegetation. Metro Fire’s Community Wildfire Protection Plan is a comprehensive plan to protect human life and reduce loss of property, critical infrastructure, and natural resources associated with wildfire. Through the CWPP, Metro Fire implements strategies to prevent and combat wildfire within its jurisdictional boundaries (Metro Fire 2014).
 - ▶ **Adaptive Efforts Related to Drought:** the County adopted a Water Efficient Landscape Ordinance and participates in stormwater quality education and management. The Sacramento County Water Agency (SCWA) supports water conservation programs and participates in the Sacramento Area Water Forum, which aims to provide a reliable and safe water supply for the region’s economic health and planned development through the year 2030 and to preserve the fishery, wildlife, recreational, and aesthetic values of the lower American River (Sacramento County 2011b).
 - ▶ **Adaptive Efforts Related to Increased Flooding:** Countywide Design Guidelines require flood protection and drainage facilities to be designed to provide multiple public benefits wherever possible. The County has also completed concrete-lined creek naturalization projects to restore habitat and increase climate resiliency. Other agencies such as the Delta Stewardship Council, Sacramento Area Flood Control Agency (SAFCA), the Central Valley Flood Protection District, and the U.S. Army Corps of Engineers (USACE) have programs in place to improve flood protection infrastructure.
 - ▶ **Adaptive Efforts Related to Sea-Level Rise:** while there are few sea-level-rise focused efforts, existing programs and strategies that address flood risk can also mitigate the impacts of sea-level rise.

A summary of the County’s adaptive capacity scores is included in Table B-1. “Low” adaptive capacity means the population or asset lacks capacity to manage climate impact and major changes would be required. “Medium” adaptive capacity means the population or asset has some capacity to manage climate impact and some changes would be required. “High” adaptive capacity means the population or asset has high capacity to manage climate impact and no changes are required.

Vulnerability scores are determined based on how severe projected climate exposures will be, the degree of sensitivity of population groups and assets to anticipated climate effects, and whether sufficient adaptive capacity exists to manage the potential impact. This scoring can help the County understand which effects pose the greatest threats and should be prioritized in future planning efforts. Table B-1 below shows the County’s vulnerability scores on a scale of 1 to 5, in accordance with the APG’s guidance. The highest scoring climate impacts are those where the potential impact is high and existing adaptive capacity is low.

APPENDIX C – SACRAMENTO COUNTY 2030 GENERAL PLAN POLICIES SUPPORTING CLIMATE ACTION

The County's 2030 General Plan is intended to guide growth and development within the unincorporated County and addresses a wide variety of issues from land use and housing to open space and safety. The general plan policies are intended to enhance and preserve the quality of life for County residents, enhance economic strengths, and preserve agricultural heritage. Notably, many general plan goals and policies also serve to advance climate change mitigation and build countywide resiliency. Table C-1 contains General Plan policies that relate to GHG reduction and adaptation and supporting CAP measures.

Table C-1: Summary of Adaptation Measures

Element	General Plan Policy Text	Supportive CAP Measures
Agricultural	AG-1. The County shall protect prime, statewide importance, unique and local importance farmlands located outside of the USB from urban encroachment.	
Agricultural	AG-2. The County shall not accept applications for General Plan amendments outside the Urban Services Boundary (USB) redesignating prime, statewide importance, unique and local importance farmlands or lands with intensive agricultural investments to agricultural/residential or urban use (i.e., residential, commercial, industrial) unless the applicant demonstrates that the request is consistent with the General Plan Agriculture-Residential expansion policies (please refer to Land Use Element Policies regarding Agriculture-Residential uses).	
Agricultural	<p>AG-5. Projects resulting in the conversion of more than fifty (50) acres of farmland shall be mitigated within Sacramento County, except as specified in the paragraph below, based on a 1:1 ratio, for the loss of the following farmland categories through the specific planning process or individual project entitlement requests to provide in-kind or similar resource value protection (such as easements for agricultural purposes):</p> <ul style="list-style-type: none"> • prime, statewide importance, unique, local importance, and grazing farmlands located outside the USB; • prime, statewide importance, unique, and local importance farmlands located inside the USB. <p>The Board of Supervisors retains the authority to override impacts to Unique, Local, and Grazing farmlands, but not with respect to Prime and Statewide farmlands.</p> <p>However, if that land is also required to provide mitigation pursuant to a Sacramento County endorsed or approved Habitat Conservation Plan (HCP), then the Board of Supervisors may consider the mitigation land provided in accordance with the HCP as meeting the requirements of this section including land outside of Sacramento County.</p> <p>Note: This policy is not tied to any maps contained in the Agricultural Element. Instead, the most current Important Farmland map from the Department of Conservation should be used to calculate mitigation.</p>	
Agricultural	AG-12. The County will cooperate with landowners of agriculturally zoned properties to promote the placing of natural preserve/mitigation amenities on land, such as trees and other biota enhancing improvement, by making sure	GHG-01 Carbon Farming

Element	General Plan Policy Text	Supportive CAP Measures
	amenities are assets to both the natural preserve/mitigation areas and agriculture practices.	
Agricultural	AG-15. The County shall pursue opportunities to create mitigation banks, environmental mitigation sites, wildlife refuges, or other natural resource preserves wherein substantial agricultural activities that are compatible with protection of high habitat values continue, but incompatible activities and conversion for development are precluded by conservation easements.	GHG-01 Carbon Farming GHG-26: South Sacramento Habitat Conservation Plan
Agricultural	AG-17. The establishment of conservation easements combining preservation of agricultural uses, habitat values, and open space on the same property should be encouraged where feasible.	GHG-01 Carbon Farming
Agricultural	AG-21. The County encourages the preservation of prime, statewide importance, unique and local importance farmlands, including opposing any residential or commercial development for the Cosumnes River or Deer Creek riparian areas which are not compatible with agricultural uses	
Agricultural	AG-22. If land within the Cosumnes River watershed is developed for non-agricultural purposes, the County should actively pursue easement dedication for equestrian trails and bikeways within such development as a condition of approval.	GHG-17 Improved Bicycle Network and Facilities
Agricultural	AG-23. The County seeks to minimize agricultural/trail-user conflicts by recommending and seeking buffer zones between trails and nearby agricultural land and by locating trails away from the Cosumnes and Deer Creek riparian areas.	
Agricultural	AG-25. Outside the Urban Service Boundary, encourage landowners to enter into Williamson Act contracts or, as appropriate, to rescind Notices of Nonrenewal. Provide support to keep property in the Williamson Act by allowing agricultural-friendly land use practices that include additional economic incentives, and support replacing existing Williamson Act contracts with amended contracts that include agricultural-friendly land use practices.	GHG-01 Carbon Farming
Agricultural	AG-26. Support the state-formed program for Farmland Security Zones (also known as the Super Williamson Act).	
Agricultural	AG-27. The County shall actively encourage groundwater recharge, water conservation and water recycling by both agricultural and urban water users.	
Agricultural	AG-28. The County shall actively encourage conservation of soil resources.	
Agricultural	<p>AG-29. The County shall minimize flood risks to agricultural lands resulting from new urban developments by:</p> <ul style="list-style-type: none"> ▶ Requiring that such developments incorporate adequate runoff control structures and/or ▶ Assisting implementing comprehensive drainage management plans to mitigate increased risks of farmland flooding resulting from such developments. 	
Agricultural	AG-31. Control agricultural losses caused by pests and fires resulting from lack of management of idled farmlands.	
Agricultural	AG-32. The County shall allow construction and occupancy of agricultural accessory dwellings provided that such dwellings provide living quarters for full-time, on-site agricultural employees.	

Element	General Plan Policy Text	Supportive CAP Measures
Agricultural	AG-35. The County shall support Agri-tourism for different geographical areas of the County that includes categorical definitions for intensity and type of uses that allow for flexibility in agricultural practices and market opportunities while paying particular attention to compatibility with surrounding uses.	
Air Quality	AQ-1. New development shall be designed to promote pedestrian/bicycle access and circulation to encourage community residents to use alternative modes of transportation to conserve air quality and minimize direct and indirect emission of air contaminants.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-13: Revise Parking Standards for Non-Residential Development
Air Quality	AQ-2. Support Regional Transit's efforts to secure adequate funding so that transit is a viable transportation alternative. Development shall pay its fair share of the cost of transit facilities required to serve the project.	GHG-12: Transportation System Management Plan for Non-Residential Projects GHG-14: Improved Transit Access
Air Quality	AQ-3. Buffers and/or other appropriate mitigation shall be established on a project-by-project basis and incorporated during review to provide for protection of sensitive receptors from sources of air pollution or odor. The California Air Resources Board's "Air Quality and Land Use Handbook: A Community Health Perspective", and the AQMD's approved Protocol (Protocol for Evaluating the Location of Sensitive Land uses Adjacent to Major Roadways) shall be utilized when establishing these buffers.	
Air Quality	AQ-4. Developments which meet or exceed thresholds of significance for ozone precursor pollutants as adopted by the Sacramento Metropolitan Air Quality Management District (SMAQMD), shall be deemed to have a significant environmental impact. An Air Quality Mitigation Plan shall be submitted to the County of Sacramento prior to project approval, subject to review and recommendation as to technical adequacy by the Sacramento Metropolitan Air Quality Management District.	
Air Quality	AQ-5. Reduce emissions associated with vehicle miles travelled and evaporation by reducing the surface area dedicated to parking facilities; reduce vehicle emissions associated with "hunting" for on-street parking by implementing innovative parking innovative parking solutions including shared parking, elimination of minimum parking requirements, creation of maximum parking requirements, and utilize performance pricing for publicly owned parking spaces both on- and off-street, as well as creating parking benefit districts.	GHG-13: Revise Parking Standards for Non-Residential Development
Air Quality	AQ-6. Provide incentives for the use of transportation alternatives, including a program for the provision of financial incentives for builders that construct ownership housing within a quarter mile of existing and proposed light rail stations.	GHG-21: Update Community and Corridor Plans
Air Quality	AQ-7. Implement a model trip reduction program for County employees which may include, but not be limited to, flexible and compressed work schedules, commuter matching services, telecommuting, preferential	GOV-EC-01: Employee Transportation Program GOV-EC-02: Transit Subsidy Program

Element	General Plan Policy Text	Supportive CAP Measures
	carpool/vanpool parking, carpool/vanpool and transit subsidies, and all other commute alternative incentives.	GOV-EC-03: Employee Shuttle System GOV-EC-04: Secure Bicycle Storage Facilities GOV-EC-05: Carpool-at-Work Incentives
Air Quality	AQ-8. Promote mixed-use development and provide for increased development intensity along existing and proposed transit corridors to reduce the length and frequency of vehicle trips.	GHG-21: Update Community and Corridor Plans
Air Quality	AQ-9. When park-and-ride facilities are requested by transit providers, the spaces provided for the park-and-ride facility may be counted as part of the total amount of parking required by the zoning code.	
Air Quality	AQ-10. Encourage vehicle trip reduction and improved air quality by requiring development projects that exceed the SMAQMD's significance thresholds for operational emissions to provide on-going, cost-effective mechanisms for transportation services that help reduce the demand for existing roadway infrastructure.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled
Air Quality	AQ-11. Encourage contractors operating in the county to procure and to operate low-emission vehicles, and to seek low emission fleet status for their off-road equipment.	GHG-10: Electric Vehicle Infrastructure Program GHG-08: Tier 4 Final Construction Equipment
Air Quality	AQ-12 Minimize air pollutant emissions from Sacramento County facilities and operations.	GOV-BE-01: Green Building Policy
Air Quality	AQ-13. Use California State Air Resources Board (ARB) and SMAQMD guidelines for Sacramento County facilities and operations to comply with mandated measures to reduce emissions from fuel consumption, energy consumption, surface coating operations, and solvent usage.	GOV-BE-01: Green Building Policy GOV-FL-01: Fleet Conversion Program
Air Quality	AQ-14. Support SMAQMD's development of improved ambient air quality monitoring capabilities and the establishment of standards, thresholds and rules to more adequately address the air quality impacts of plans and proposals proposed by the County.	GHG-18: Improve Fuel Efficiency Standards
Air Quality	AQ-15. Support intergovernmental efforts directed at stricter tailpipe emissions standards.	GHG-18: Improve Fuel Efficiency Standards
Air Quality	AQ-16. Prohibit the idling of on-and off-road engines when the vehicle is not moving or when the off-road equipment is not performing work for a period of time greater than five minutes in any one-hour period.	
Air Quality	AQ-17. Promote optimal air quality benefits through energy conservation measures in new development.	GHG-05: Increase Energy Efficiency and Electrification of New Commercial/Nonresidential Buildings and Facilities GHG-08: Tier 4 Final Construction Equipment

Element	General Plan Policy Text	Supportive CAP Measures
		GHG-27: EV Sharing at Affordable Housing Projects GHG-29 Electric or Alternatively Fueled Construction Equipment
Air Quality	AQ-18. Require the recovery of chlorofluorocarbons (CFC's) when older air conditioning and refrigeration units are serviced or disposed.	
Air Quality	AQ-19. Require all feasible reductions in emissions for the operation of construction vehicles and equipment on major land development and roadway construction projects.	GHG-08: Tier 4 Final Construction Equipment GHG-29 Electric or Alternatively Fueled Construction Equipment
Air Quality	AQ-20. Promote Cool Community strategies to cool the urban heat island, reduce energy use and ozone formation, and maximize air quality benefits by encouraging four main strategies including, but not limited to: plant trees, selective use of vegetation for landscaping, install cool roofing, and install cool pavements.	GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings GHG-04: Increase Energy Efficiency and Electrification of Existing Commercial/Nonresidential Buildings and Facilities GHG-02: Urban Forestry Temp-02: Partner with Local Agencies and Utilities on Heat-Related Climate Change Initiatives and Efforts Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover
Air Quality	AQ-21. Support SMAQMD's particulate matter control measures for residential wood burning and fugitive dust.	
Air Quality	AQ-22. Reduce greenhouse gas emissions from County operations as well as private development.	
Circulation	CI-1. Provide complete streets to provide safe and efficient access to a diversity of travel modes for all urban, suburban and rural land uses within Sacramento County except within certain established neighborhoods where particular amenities (such as sidewalks) are not desired. Within rural areas of the County, a complete street may be accommodated through roadway	GHG-15: Improved Pedestrian Network and Facilities

Element	General Plan Policy Text	Supportive CAP Measures
	shoulders of sufficient width or other means to accommodate all modes of travel.	GHG-16: Traffic Calming Measures GHG-17: Improved Bicycle Network and Facilities GHG-22: Connecting Key Destinations
Circulation	CI-2. Promote continued mobility for individuals whose access to automobile transportation is limited by age, illness, income, desire, or disability.	GHG-14: Improved Transit Access GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities GHG-20: Safe Routes to School GHG-22: Connecting Key Destinations
Circulation	CI-3. Travel modes shall be interconnected to form an integrated, coordinated and balanced multi-modal transportation system, planned and developed consistent with the land uses to be served.	GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Circulation	CI-4. Provide multiple transportation choices to link housing, recreational, employment, commercial, educational, and social services.	GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Circulation	CI-5. Land use and transportation planning and development should be cohesive, mutually supportive, and complement the objective of reducing per capita vehicle miles travelled (VMT).	Measure NWL-05: Smart Growth GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations Measure INC-06: Civic Lab
Circulation	CI-6. Provide support for community based corridor planning processes on existing roadways with excess vehicle capacity within built communities to optimize the public right-of-way by utilizing the excess width for other modes of travel or public amenities such as bike lanes, landscaping, walkways, parking, or medians.	GHG-15: Improved Pedestrian Network and Facilities GHG-16: Traffic Calming Measures GHG-17: Improved Bicycle Network and Facilities GHG-21: Update Community and Corridor Plans

Element	General Plan Policy Text	Supportive CAP Measures
Circulation	<p>CI-7. Plan and construct transportation facilities as delineated on the Transportation Plan of the Sacramento County General Plan. Transportation facilities shall be consistent with the Sacramento County Improvement Standards and Construction Specifications, the Connector Project Design Guidelines, and supplemented by the California Department of Transportation (Caltrans) design standards. The County may deviate from the adopted County Improvement Standards and Construction Specifications in circumstances where conditions warrant special treatment. The Capital SouthEast Connector, as designated in the Transportation Plan map, shall be consistent with the most current JPA-approved "Capital SouthEast Connector JPA Project Design Guidelines," provided that the Project Design Guidelines will not be applied to diminish or alter the rights of County-approved projects and provided that the design exception process within the Project Design Guidelines is not amended to diminish the County's land use authority to approve future projects proximate to or its authority to determine access to the Capital SouthEast Connector.</p> <p>The Capital SouthEast Connector is intended to serve the transportation demand for both existing land uses and future growth within the Urban Services Boundary (USB). The County reserves all of its rights and powers to assure that sufficient access to and from the Connector roadway is available to accommodate the existing land uses as well as the future growth within the USB. For areas of the unincorporated County outside of the USB, the County will limit access to and from the Connector roadway to only accommodate the existing and future land uses permitted outside of the USB.</p>	GHG-12: Transportation System Management Plan for Non-Residential Projects
Circulation	CI-8. Maintain and rehabilitate the roadway system to maximize safety, mobility, and cost efficiency.	GHG-16: Traffic Calming Measures
Circulation	CI-9. Plan and design the roadway system in a manner that meets Level of Service (LOS) D on rural roadways and LOS E on urban roadways, unless it is infeasible to implement project alternatives or mitigation measures that would achieve LOS D on rural roadways or LOS E on urban roadways. The urban areas are those areas within the Urban Service Boundary as shown in the Land Use Element of the Sacramento County General Plan. The areas outside the Urban Service Boundary are considered rural.	GHG-16: Traffic Calming Measures
Circulation	CI-10. Land development projects shall be responsible to mitigate the project's adverse impacts to local and regional roadways.	GHG-12: Transportation System Management Plan for Non-Residential Projects
Circulation	CI-12. To preserve public safety and local quality of life on collector and local roadways, land development projects shall incorporate appropriate treatments of the Neighborhood Traffic Management Program.	GHG-16: Traffic Calming Measures
Circulation	CI-13. Collaborate with regional transportation planning agencies and neighboring jurisdictions to provide cross jurisdictional mobility.	GHG-14: Improved Transit Access GHG-17: Improved Bicycle Network and Facilities GHG-22: Connecting Key Destinations
Circulation	CI-15. Support the relinquishment of State Highways to the County when the operation of the highway supports local travel demand rather than longer	GHG-22: Connecting Key Destinations

Element	General Plan Policy Text	Supportive CAP Measures
	interregional travel demand. Relinquished State Highways shall be developed as a complete street that accommodates all modes of travel.	
Circulation	CI-16. The County supports creating communities that promote access and mobility for all modes of travel through the development of roadway networks based on a grid or modified grid layout.	GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Circulation	CI-17. Ensure that transportation infrastructure improvement projects initiated by the County include a comprehensive public outreach process and involves affected local stakeholders and communities in the beginning and throughout the planning and development process for the project.	All-01: Create a Comprehensive Outreach Strategy
Circulation	CI-18. The County shall plan and prioritize the implementation of intersection improvements, where feasible, in corridors identified as congested.	GHG-16: Traffic Calming Measures
Circulation	CI-19. Collaborate with transit service providers to provide transit services within the County that are responsive to existing and future transit demand.	GHG-14: Improved Transit Access
Circulation	CI-20. Promote transit services in appropriate commercial corridors and where population and employment densities are sufficient or could be increased to support those transit services.	GHG-14: Improved Transit Access GHG-21: Update Community and Corridor Plans
Circulation	CI-21. Collaborate with neighboring jurisdictions and other agencies to achieve land use patterns and densities in areas planned for development that support transit services, preserve adequate rights-of-way, and enhance transit services in the designated transit corridors	GHG-14: Improved Transit Access GHG-21: Update Community and Corridor Plans
Circulation	CI-22. Collaborate with the Sacramento Area Council of Governments and transit service providers to pursue all available sources of funding for transit services when consistent with General Plan policies and long-term funding capabilities.	GHG-14: Improved Transit Access
Circulation	CI-23. Consider the transit needs of senior, disabled, low-income, and transit-dependent persons in making recommendations regarding transit services.	GHG-14: Improved Transit Access
Circulation	CI-24. Collaborate with transit service providers for the development of facilities that provide for efficient links and interconnectivity with different transportation modes, including bicyclists and pedestrians.	GHG-14: Improved Transit Access
Circulation	CI-25. The County shall develop right-of-way acquisition guidelines for the implementation of transit services shown on the Transportation Plan.	GHG-14: Improved Transit Access
Circulation	CI-26. Consider the expansion of Neighborhood Shuttle services in unincorporated area communities.	
Circulation	CI-27. Public Facilities Financing Plans shall incorporate capital costs for transit. Infrastructure Master Plans shall include transit planning.	GHG-14: Improved Transit Access
Circulation	CI-28 Collaborate with local transit service providers in obtaining all available sources of funding for the development, improvement, and maintenance of the transit system.	GHG-14: Improved Transit Access

Element	General Plan Policy Text	Supportive CAP Measures
Circulation	CI-29. The County shall work with transit service providers to establish and implement development guidelines to maximize the ability of new development and redevelopment to support planned transit services. New development and redevelopment shall have an orientation to travel patterns that are conducive to transit service. This will include concentration of development in centers and along linear corridors such that trip origins and destinations are concentrated near transit services.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Circulation	CI-30. The County shall collaborate with transit service providers to promote the phased implementation of transit services to all growth areas as development occurs.	GHG-14: Improved Transit Access GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Circulation	CI-31. In BRT corridors that are anticipated to be congested in the future, the County shall implement all feasible measures to minimize the effects of congestion on transit travel times.	GHG-14: Improved Transit Access GHG-16: Traffic Calming Measures GHG-21: Update Community and Corridor Plans
Circulation	CI-32. Develop a comprehensive, safe, convenient and accessible bicycle and pedestrian system that serves and connects the County's employment, commercial, recreational, educational, social services, housing and other transportation modes.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities GHG-22: Connecting Key Destinations
Circulation	CI-33. Adopt, implement and periodically update the Sacramento County Bicycle Master Plan for unincorporated Sacramento County that sets forth the goals, policies, guidelines, programs and improvements necessary to accomplish the goals of this section.	GHG-17: Improved Bicycle Network and Facilities
Circulation	CI-34. Construct and maintain bikeways and multi-use trails to minimize conflicts between bicyclists, pedestrians, and motorists.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Circulation	CI-35. The applicant/developer of land development projects shall be responsible to install bicycle and pedestrian facilities in accordance with Sacramento County Improvement Standards and may be responsible to participate in the fair share funding of regional multi-use trails identified in the Sacramento County Bicycle Master Plan.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled

Element	General Plan Policy Text	Supportive CAP Measures
		GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Circulation	CI-36. Collaborate with neighboring jurisdictions and regional agencies to coordinate planning and development of the County's bikeways, pedestrian facilities and multiuse trails with those of neighboring jurisdictions, and to support a regional bicycle and pedestrian network.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Circulation	CI-37. Pursue all available sources of funding for the development, improvement, and maintenance of bikeways, pedestrian facilities and multi-use trails, and to support bicycle and pedestrian safety, education, encouragement and enforcement programs.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Circulation	CI-38. Design and construct pedestrian facilities to ensure that such facilities are accessible to all users.	GHG-15: Improved Pedestrian Network and Facilities
Circulation	CI-39. Plan and implement intelligent transportation system (ITS) strategies within the County's high-demand travel corridors and support efforts to deploy ITS strategies on a regional level.	GHG-16: Traffic Calming Measures
Circulation	CI-40. Whenever possible, the applicant/developer of new and infill development projects shall be conditioned to fund, implement, operate and/or participate in TSM programs to manage travel demand associated with the project	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-12: Transportation System Management Plan for Non-Residential Projects GHG-21: Update Community and Corridor Plans
Circulation	CI-41. Consider TSM programs that increase the average occupancy of vehicles and divert automobile commute trips to transit, walking, and bicycling.	GHG-12: Transportation System Management Plan for Non-Residential Projects
Circulation	CI-42. Collaborate with other agencies to develop measures to provide for more efficient traffic flow, reduce vehicular travel demand and meet air quality goals.	GHG-16: Traffic Calming Measures GHG-22: Connecting Key Destinations
Circulation	CI-43. The County shall promote transit-supportive programs in new development, including employer-based trip-reduction programs (employer incentives to use transit or non-motorized modes), "guaranteed ride home" for commute trips, and car-share or bike-share programs.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled

Element	General Plan Policy Text	Supportive CAP Measures
Circulation	CI-44. Support improvements to at-grade rail crossings within the County. Support efforts to develop and fund the construction of grade-separated rail crossings where appropriate and cost effective to improve safety and reduce congestion.	GHG-16: Traffic Calming Measures
Circulation	CI-46. Support multi-modal stations at appropriate locations to integrate rail transportation with other transportation modes.	GHG-22: Connecting Key Destinations
Circulation	CI-47. Support the development of a statewide high-speed rail service through the Central Valley that serves Sacramento County.	
Circulation	CI-55. Encourage in coordination with the Delta Citizens Municipal Advisory Council the Department of Water Resources, the State Reclamation Board, and the U.S. Army Corps of Engineers to determine how the present strict requirements for levee stripping and burning can be revised to take into account aesthetic and environmental considerations, and including consideration of enhancement and replanting of levees.	
Circulation	CI-56. Encourage the State Reclamation Board and the U.S. Army Corps of Engineers to riprap on levees no higher than the average annual high water level.	
Circulation	CI-64. Investigate in coordination with other County agencies the routing of bike trails and equestrian paths along scenic corridors.	
Circulation	<p>CI-65. Incorporate Low Impact Design (LID) techniques to the greatest extent feasible to improve water quality runoff and erosion control, infiltration, groundwater recharge, visual aesthetics, etc. LID techniques may include but are not limited to:</p> <ul style="list-style-type: none"> ▶ Bioretention techniques, such as filtration strips, swales, and tree box filters ▶ Permeable hardscape ▶ Green roofs ▶ Erosion and sediment controls ▶ Reduced street and lane widths where appropriate 	<p>Measure GRN-14: Low Impact Development</p> <p>Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events</p> <p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-05: Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces</p> <p>Flood-05: Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces</p>
Circulation	CI-66. Use recycled and/or recyclable materials whenever feasible.	
Circulation	CI-67. When feasible, incorporate lighter colored (higher albedo) materials and surfaces, such as lighter-colored pavements, and encourage the creation of tree canopy to reduce the built environment's absorption of heat to reduce the urban "heat island" effect.	<p>GHG-02: Urban Forestry</p> <p>Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green</p>

Element	General Plan Policy Text	Supportive CAP Measures
		Roofs, and Rooftop Gardens Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover
Circulation	CI-68. Smart Growth Street planning efforts shall identify specific, implementable measures to create and/or improve community identity.	
Circulation	CI-70. Smart Growth Streets shall incorporate features such as shade trees and plantings, well designed benches and other street furniture, trash receptacles, news racks, outdoor dining experiences, entertainment, public art, pedestrian scaled lighting fixtures, wayfinding signage, bicycle racks and other amenities as appropriate.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities GHG-21: Update Community and Corridor Plans
Circulation	CI-71. A Smart Growth Street designation requires a focused and holistic corridor planning analysis that considers highly coordinated and interconnected land uses and transportation infrastructure within the corridor while also considering the impacts to surrounding communities and the natural environment. A Smart Growth Street should recognize that they will remain major corridors for through auto traffic that should be accommodated on the Smart Growth Street and not shifted to neighborhood streets surrounding it.	GHG-21: Update Community and Corridor Plans
Circulation	CI-72. On a Smart Growth Street, the County shall strive to maintain operations and capacity on urban roadways and intersections at LOS E or better, unless maintaining this LOS would, in the County's judgment, be infeasible and conflict with the achievement of other Smart Growth Street objectives. Congestion in excess of LOS E may be acceptable provided that provisions are made to improve overall mobility, reduce overall VMT and/or promote non-automobile transportation.	GHG-16: Traffic Calming Measures
Circulation	CI-73. Where a Smart Growth Street planning analysis indicates that a roadway improved to its general plan designation will be congested in excess of LOS E, mobility impacts fees may be assessed to the properties within the Smart Growth Street area. Such mobility fees shall be fairly apportioned to the properties and shall be sufficient in amount to improve other Smart Growth Street objectives such as improvements that would enhance pedestrian, bicycle, transit, other modes of mobility, and public realm amenities.	GHG-16: Traffic Calming Measures GHG-22: Connecting Key Destinations
Circulation	CI-74. Evaluation of Smart Growth Street corridors and development within those corridors shall utilize multi-modal level of service standards, including pedestrian, bicycle, and transit modes of travel in addition to motor vehicle travel, to support and encourage overall mobility through improvement to all modes of travel.	GHG-22: Connecting Key Destinations
Circulation	CI-75. Smart Growth Street planning efforts shall develop a comprehensive strategy to significantly reduce the total number of driveways along the roadway, including specific measures to ensure implementation, such as	GHG-13: Revise Parking Standards for Non-Residential Development

Element	General Plan Policy Text	Supportive CAP Measures
	requiring cross-access and reciprocal parking agreements between adjacent property owners.	
Circulation	CI-76. Smart Growth Street planning efforts shall develop a comprehensive strategy to reduce both the total amount of parking and total surface area dedicated to parking facilities. In general, reduced parking requirements and innovative parking solutions such as, shared parking, structured parking, parking maximums rather than minimums, on street parking, performance parking pricing, parking benefit districts and other innovative parking solutions will be strongly encouraged wherever feasible, while large surface parking lots will be strongly discouraged.	GHG-13: Revise Parking Standards for Non-Residential Development
Circulation	CI-77. Planning processes for Smart Growth Street corridors shall consider road diets, pedestrian and bicycle enhancements, traffic calming measures and other feasible measures to create a corridor that equitably accommodates all users and modes of travel.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities GHG-22: Connecting Key Destinations
Circulation	CI-78. Establish connectivity standards to implement within Smart Growth Street corridors, to ensure safe, pleasant and direct travel between destinations for all users.	GHG-22: Connecting Key Destinations
Circulation	CI-79. To ensure the safety and comfort of all users, support and encourage street design to accommodate vehicular speeds of up to 40 miles per hour as appropriate.	GHG-16: Traffic Calming Measures
Conservation	CO-4. Support the construction of facilities that maximize the use of available surface water.	
Conservation	CO-5. Support the WFA Increased Surface Water Diversions Element. Collaborate with other local water purveyors to ensure consistency with WFA conjunctive use goals.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-6. Support surface water supply alternatives for agriculture, including the use of SMUD water entitlements, where feasible.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-7. Support the Water Forum Agreement Groundwater Management Element. Prior to approving any new development water supply plan shall be approved that demonstrates consistency with an adopted groundwater management plan.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems Water-06: Collaborate with Federal, State, and Local

Element	General Plan Policy Text	Supportive CAP Measures
		Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-8. Applicants proposing developments in areas with significant groundwater recharge characteristics shall evaluate the impact of said development on groundwater recharge and quality. This evaluation should recognize criteria defined in any broader Countywide determination and/or evaluation of groundwater recharge areas.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems
Conservation	CO-9. Developments in areas with significant contamination shall utilize remediated groundwater as part of their water supply when feasible.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems
Conservation	CO-10. Support local watershed initiatives that enhance groundwater recharge.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems Water-06 Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-11. Support local groundwater management efforts that are consistent with the WFA Groundwater Management Element.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-12. Support groundwater recharge in surface mining reclamation plans where feasible.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-13. Support the WFA Conservation Element and the California Urban Water Conservation Council Best Management Practices for Water Conservation.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies,

Element	General Plan Policy Text	Supportive CAP Measures
		Explore Alternative Supply Sources, and Improve Capacity
Conservation	CO-14. Support the use of recycled wastewater to meet non-potable water demands where financially feasible.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems
Conservation	CO-15. Support effective agricultural water conservation practices, including the use of recycled wastewater where financially feasible.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems Water-03: Create Incentives and Programs to Transfer Knowledge and Technologies to Assist Farmers with New Production Methods and Drought Tolerance Species
Conservation	CO-16. Ensure developments are consistent with the County Water Efficient Landscape Ordinance, which shall be updated as needed to conform to state law.	Water-04: Reduce Potable Water Use in Outdoor Landscaping
Conservation	CO-18. Support the WFA recommended Lower American River Flow Standard.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-19. Support the WFA Lower American River Habitat Management Element.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-20. Support preservation and restoration of the Cosumnes River riparian ecosystem.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-21 Support protection and restoration of the Sacramento River Delta.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-22. Support water management practices that are responsive to the impacts of Global Climate Change such as groundwater banking and other water storage projects.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-23 Development approval shall be subject to a finding regarding its impact on valuable water-supported ecosystems.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	CO-24. Comply with the Sacramento Areawide National Pollutant Discharge Elimination System Municipal Stormwater Permit (NPDES Municipal Permit) or subsequent permits, issued by the Central Valley Regional Water Quality Control Board (Regional Board) to the County, and the Cities of Sacramento, Elk Grove, Citrus Heights, Folsom, Rancho Cordova, and Galt (collectively known as the Sacramento Stormwater Quality Partnership [SSQP]).	<p>Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events</p> <p>Flood-08: Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives</p> <p>Flood-14: Safeguard Freshwater Supply Against Contamination, Degradation, or Loss</p> <p>Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity</p>
Conservation	CO-25. Support the preservation, restoration, and creation of riparian corridors, wetlands and buffer zones.	<p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-14: Safeguard Freshwater Supply Against Contamination, Degradation, or Loss</p>
Conservation	CO-26. Protect areas susceptible to erosion, natural water bodies, and natural drainage systems.	<p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-14: Safeguard Freshwater Supply Against Contamination, Degradation, or Loss</p>
Conservation	CO-27. Support surface water quality monitoring programs that identify and address causes of water quality degradation.	Flood-14: Safeguard Freshwater Supply Against Contamination, Degradation, or Loss
Conservation	CO-29. Continue to support the County's participation in regional NPDES Municipal Permit compliance activities through collaborative efforts such as the Sacramento Stormwater Quality Partnership.	Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply

Element	General Plan Policy Text	Supportive CAP Measures
		Sources, and Improve Capacity
Conservation	CO-30. Require development projects to comply with the County’s stormwater development/design standards, including hydromodification management and low impact development standards, established pursuant to the NPDES Municipal Permit. Low impact development design and associated landscaping may serve multiple purposes including reduction of water demand, retention of runoff, reduced flooding and enhanced groundwater recharge. (Modified 2016)	Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events Water-04: Reduce Potable Water Use in Outdoor Landscaping
Conservation	CO-31. Require property owners to maintain all required stormwater measures to ensure proper performance for the life of the project.	Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events
Conservation	CO-32. Support programs and activities conducted by watershed groups and citizen volunteers that help to ensure compliance with the NPDES Municipal Permit by increasing public awareness and encouraging stewardship of water resources.	Water-05: Expand Upon Existing Water Conservation Education Outreach Programs for Residents and Businesses All-01: Create a Comprehensive Outreach Strategy
Conservation	CO-35. New development that will generate additional water demand shall not be approved and building permits shall not be issued if sufficient water supply is not available, as demonstrated by Water Supply Assessment and Written Verification processes.	Water-01: Evaluate Vulnerabilities of Water Supply Systems and Networks and Develop Strategies to Improve Resilience
Conservation	CO-38. Sewer interceptor and trunk alignments shall be routed to avoid areas planned for aggregate resource mining to the extent practical. Where such alignments are impractical, they shall be designed to minimize aggregate resources which would be precluded from mining, and make reasonable attempt to preserve the future use of mined areas for flood control or recharge purposes.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-45. To the maximum extent possible, all base material utilized in County and private road construction shall be composed of recycled asphalt concrete and roadway base material.	
Conservation	CO-46. Reduce solid waste beyond the 50% minimum state mandate through a variety of recycling programs.	
Conservation	CO-48. All County departments and agencies shall enforce the Environmental Purchasing Policy, approved by the Board of Supervisors in January 2003, which facilitate purchase of recycled, recyclable or reusable products and materials where feasible.	

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	CO-49. Outside contractors bidding to provide products or services to the County, including printing services, must demonstrate that they will comply with County recycled materials policies to the greatest extent feasible.	
Conservation	CO-50. Actively promote a comprehensive, consistent and effective recycled materials procurement effort among other governmental agencies and local businesses.	
Conservation	CO-51. Direct development away from prime or statewide importance farmlands or otherwise provide for mitigation as required by AG-5 slowing the loss of additional farmland conversion to other uses.	
Conservation	CO-52. Recreational uses shall not be constructed on prime, statewide importance, unique or local farmland outside of the Urban Services Boundary where the use would impede agricultural practices.	
Conservation	CO-54. Curtail tillage of peat-rich Delta soils to retard erosion and subsidence, and protect the agricultural productivity of Delta islands.	
Conservation	CO-55. Support Resource Conservation Districts to promote soil and water conservation practices.	Water-05: Expand Upon Existing Water Conservation Education Outreach Programs for Residents and Businesses
Conservation	CO-56. Support regional education and outreach efforts regarding local soil quality and the relevant current issues.	
Conservation	CO-58. Ensure no net loss of wetlands, riparian woodlands, and oak woodlands.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-61. Mitigation should be consistent with Sacramento County-adopted habitat conservation plans.	GHG-26: South Sacramento Habitat Conservation Plan
Conservation	CO-62. Permanently protect land required as mitigation.	
Conservation	CO-63. Vernal pools, wetlands, and streams within identified preserves shall not be drained, excavated, or filled for the purpose of converting the land to another use. If fill or modification is required for Drainage Master Plans, stormwater quality or levee maintenance, creation or restoration of an equal amount must occur within the boundaries of the preserve to achieve no net loss consistent with policy CO-58.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-64. Consistent with overall land use policies, the County shall support and facilitate the creation and biological enhancement of large natural preserves or wildlife refuges by other government entities or by private individuals or organizations.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions GHG-26: South Sacramento Habitat Conservation Plan
Conservation	CO-66. Mitigation sites shall have a monitoring and management program including an adaptive management component including an established	

Element	General Plan Policy Text	Supportive CAP Measures
	funding mechanism. The programs shall be consistent with Habitat Conservation Plans that have been adopted or are in draft format.	
Conservation	CO-67. Preserves and conservation areas should have an established funding mechanism, and where needed, an acquisition strategy for its operation and management in perpetuity. This includes existing preserves such as the American River Parkway, Dry Creek Parkway, Cosumnes River Preserve and other plans in progress for riparian areas like Laguna Creek.	
Conservation	CO-69. Avoid, to the extent possible, the placement of new major infrastructure through preserves unless located along disturbed areas, such as existing roadways.	
Conservation	<p>CO-70. Community Plans, Specific Plans, Master Plans and development projects shall:</p> <ul style="list-style-type: none"> ▶ Include the location, extent, proximity and diversity of existing natural habitats and special status species in order to determine potential impacts, necessary mitigation and opportunities for preservation and restoration. ▶ Be reviewed for the potential to identify nondevelopment areas and establish preserves, mitigation banks and restore natural habitats, including those for special status species, considering effects on vernal pools, groundwater, flooding, and proposed fill or removal of wetland habitat. ▶ Be reviewed for applicability of protection zones identified in this Element, including the Floodplain Protection Zone, Stream Corridor Ordinance, Cosumnes River Protection Combining Zone and the Laguna Creek Combining Zone. 	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	<p>CO-71. Development design shall help protect natural resources by:</p> <ul style="list-style-type: none"> ▶ Minimizing total built development in the floodplain, while designing areas of less frequent use that can support inundation to be permitted in the floodplain, ▶ Ensuring development adjacent to stream corridors and vernal pools provide, where physically reasonable, a public street paralleling at least one side of the corridor with vertical curbs, gutters, foot path, street lighting, and post and cable barriers to prevent vehicular entry. ▶ Projects adjacent to rivers and streams shall integrate amenities, such as trail connectivity, that will serve as benefits to the community and ecological function. ▶ Siting of wetlands near residential and commercial areas should consider appropriate measures to minimize potential for mosquito habitation. ▶ Development adjacent to steam corridors and vernal pools shall be designed in such a manner as to prevent unauthorized vehicular entry into protected areas. 	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-72. If land within river and stream watersheds in existing agricultural areas is developed for non-agricultural purposes, the County should actively pursue easement dedication for recreation trails within such development as a condition of approval.	

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	CO-73. Secure easement or fee title to open space lands within stream corridors as a condition of development approval.	
Conservation	CO-74. Evaluate feasible on-site alternatives early on in the planning process and prior to the environmental review process that reduce impacts on wetland and riparian habitat and provide effective on-site preservation in terms of minimum management requirements, effective size, and evaluation criteria.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-76. Habitat conservation plans shall be adopted by the County to provide a comprehensive strategy to protect and aid in the recovery of special status species.	
Conservation	CO-82. Ensure that mosquito control measures have the least effect on non-target species.	Flood-10: Expand Educational Programs to Address Vector and Waterborne Diseases
Conservation	CO-89. Protect, enhance and maintain riparian habitat in Sacramento County.	
Conservation	CO-90. Increase riparian woodland, valley oak riparian woodland and riparian scrub habitat along select waterways within Sacramento County.	
Conservation	CO-93. Discourage fill in the 100-year floodplain (Please also refer to CO-117).	
Conservation	CO-94. Development within the 100-year floodplain and designated floodway of Sacramento streams, sloughs, creeks or rivers shall be: <ul style="list-style-type: none"> ▶ Consistent with policies to protect wetlands and riparian areas; and ▶ Limited to land uses that can support seasonal inundation. 	
Conservation	CO-95. Development within the 100-year floodplain should occur in concert with the development of the Floodplain Protection Zone (please refer to Land Uses Adjacent to Rivers and Streams for information on this Zone).	
Conservation	CO-96. Reduce dependence on traditional levee protection methods where those methods conflict with habitat preservation efforts and where alternate methods exist which are compatible with preservation efforts and offer an acceptable level of bank stabilization.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-97. Work with appropriate regulatory agencies to reduce bank and levee erosion by minimizing erosive wake activity generated by recreational and commercial boating.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-98. Coordinate with federal, state and local agencies overseeing levee and bank stabilization to investigate and, whenever possible, utilize biotechnical or nonstructural alternatives to other conventional stabilization methods.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-99. Encourage habitat restoration and recreational opportunities as an integral part of bank and levee stabilization efforts.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-100. Encourage construction of structures for flood control and stormwater quality purposes using currently approved scientific methods to prevent erosion and stabilize the banks.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	CO-101. Stabilize the banks of rivers and streams in a manner that increases flood protection and increases riparian habitat functions.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-102. Promote and encourage habitat restoration efforts on and adjacent to our river floodways.	Measure GRN-12: River-Friendly Landscaping
Conservation	CO-103. Protect the Cosumnes River Corridor by promoting the preservation of agriculture, natural habitat and limited recreational uses adjacent to the river channel, and when feasible by acquiring appropriate lands or easements adjacent to the river.	
Conservation	CO-104. Promote the preservation of the Mokelumne River.	
Conservation	CO-105. Channel modification projects shall be considered for approval by the Board of Supervisors only after conducting a noticed public hearing examining the full range of alternatives, relative costs and benefits, and environmental, economic, and social benefits.	Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-105a. Encourage flood management designs that respect the natural topography and vegetation of waterways while retaining flow and functional integrity. (Added 2016)	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-106. Realigned or modified channels should retain topographic diversity including maintaining meandering characteristics, varied berm width, naturalized side slope, and varied channel bottom elevation.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-107. Maintain and protect natural function of channels in developed, newly developing, and rural areas.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-108. Channel lowering should occur after consideration of alternatives and only when it is necessary to accommodate the gravity drainage of storm runoff and/or accommodate floodflows under existing bridge structures.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-109. Channel modifications should not prevent minimum water flows necessary to protect and enhance fish habitats, native riparian vegetation, water quality, or ground water recharge.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-110. Improvements in watercourses will be designed for low maintenance. Appropriate Manning's "n" values will be used in design of the watercourses	Flood-03: Identify New Locations for Flood

Element	General Plan Policy Text	Supportive CAP Measures
	to reflect future vegetative growth (including mitigation plantings) associated with the low maintenance concept.	Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-111. Channel modifications shall retain wetland and riparian vegetation whenever possible or otherwise recreate the natural channel consistent with the historical ecological integrity of the stream or river.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-112. The use of concrete and impervious materials is discouraged where it is inconsistent with the existing adjacent watercourse and overall ecological function of the stream.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-11: Identify Concrete Channel Restoration Areas
Conservation	CO-113. Encourage revegetation of native plant species appropriate to natural substrate conditions and avoid introduction of nonindigenous species.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-114. Protect stream corridors to enhance water quality, provide public amenities, maintain flood control objectives, preserve and enhance habitat, and offer recreational and educational opportunities.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	<p>CO-115. Provide setbacks along stream corridors and stream channels to protect riparian habitat functions (Figure 1).</p> <ul style="list-style-type: none"> ▶ A functional setback of at least 100 feet and measured from the outside edge of the stream bank should be retained on each side of a stream corridor that prohibits development or agricultural activity. This buffer is necessary to protect riparian functions by allowing for the filtering of sediment, pesticides, phosphorus and nitrogen, organic matter and other contaminants that are known to degrade water quality. This buffer also provides for the protection of vegetation along the stream bank which provides bank stability, erosion control and flood attenuation. ▶ A transitional setback of at least 50 feet in width beyond the functional buffer should be retained along all stream corridors. This buffer is necessary to protect hydrogeomorphic functions that regulate water temperature, regulate microclimate, maintain channel complexity and retain hydrologic flow regimes. This buffer also provides corridors to facilitate the movement of wildlife. ▶ An extended setback of at least 50 feet in width beyond the transitional setback should be retained along all stream corridors. This setback will allow for recreational uses such as bike, pedestrian and/or equestrian trails and will allow for the placement of infrastructure such as water and sewer lines. ▶ Stormwater discharge ponds or other features used for improving stormwater quality may be located within the extended or transitional setback area. However, in order to protect stream habitat and floodplain value, the width of the setback shall not be based upon the width of the pollutant 	

Element	General Plan Policy Text	Supportive CAP Measures
	<p>discharge pond. The ponds shall be landscaped and maintained with vegetation native to the surrounding area. Detention ponds or other features implementing pollutant discharge requirements, other than approved regional stormwater quality practices that are designed and operated to complement the corridor functionally and aesthetically, are prohibited.</p> <ul style="list-style-type: none"> ▶ Setback averaging <u>within individual development projects or as otherwise specified in a County-adopted master plan</u> will be permitted except when riparian woodland will be lost. The minimum width of setbacks cannot fall below 50 feet. <p>Master drainage plans may provide for other standards that meet the intent of this policy.</p>	
Conservation	CO-117. Public roads, parking, and associated fill slopes shall be located outside of the stream corridor, except at stream crossings and for purposes of extending or setting back levees. The construction of public roads and parking should utilize structural materials to facilitate permeability. Crossings shall be minimized and be aesthetically compatible with naturalistic values of the stream channel.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-118. Development adjacent to waterways should protect the water conveyance of the system, while preserving and enhancing the riparian habitat and its function.	
Conservation	CO-122. River and stream maintenance should allow natural vegetation in and along the channel to assist in removal of nutrients, pollutants, and sediment and to increase bank stabilization, while minimizing impacts on conveyance.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Conservation	CO-125. Restore concrete sections of rivers and streams to natural or naturalized channels, where feasible for increased flood or conveyance capacity and groundwater recharge.	<p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-11: Identify Concrete Channel Restoration Areas</p>
Conservation	<p>CO-130. Protect, enhance and restore riparian, in-channel and shaded riverine aquatic habitat for:</p> <ul style="list-style-type: none"> ▶ spawning and rearing of fish species, including native and recreational nonnative, non-invasive species, where they currently spawn; ▶ potential areas where natural spawning could be sustainable; and ▶ supporting other aquatic species 	<p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-09: Research the Tolerance of Current Crop Mixes to Withstand Increased Flooding and Support Aquaculture and Fish Habitat</p>
Conservation	CO-137. Mitigate for the loss of native trees for road expansion and development consistent with General Plan policies and/or the County Tree Preservation Ordinance.	GHG-02: Urban Forestry
Conservation	CO-139. Native trees other than oaks, which cannot be protected through development, shall be replaced with in-kind species in accordance with established tree planting specifications, the combined diameter of which shall equal the combined diameter of the trees removed.	GHG-02: Urban Forestry

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	<p>CO-140. For projects involving native oak woodlands, oak savannah or mixed riparian areas, ensure mitigation through either of the following methods:</p> <ul style="list-style-type: none"> ▶ An adopted habitat conservation plan. ▶ Ensure no net loss of canopy area through a combination of the following: (1) preserving the main, central portions of consolidated and isolated groves constituting the existing canopy <u>and</u> (2) provide an area on-site to mitigate any canopy lost. Native oak mitigation area must be a contiguous area on-site which is equal to the size of canopy area lost and shall be adjacent to existing oak canopy to ensure opportunities for regeneration. ▶ Removal of native oaks shall be compensated with native oak species with a minimum of a one to one dbh replacement. ▶ A provision for a comparable on-site area for the propagation of oak trees may substitute for replacement tree planting requirements at the discretion of the County Tree Coordinator when removal of a mature oak tree is necessary. ▶ If the project site is not capable of supporting all the required replacement trees, a sum equivalent to the replacement cost of the number of trees that cannot be accommodated may be paid to the County's Tree Preservation Fund or another appropriate tree preservation fund. ▶ If on-site mitigation is not possible given site limitation, off-site mitigation may be considered. Such a mitigation area must meet all of the following criteria to preserve, enhance, and maintain a natural woodland habitat in perpetuity, preferably by transfer of title to an appropriate public entity. Protected woodland habitat could be used as a suitable site for replacement tree plantings required by ordinances or other mitigations. <ul style="list-style-type: none"> ▪ Equal or greater in area to the total area that is included within a radius of 30 feet of the dripline of all trees to be removed; ▪ Adjacent to protected stream corridor or other preserved natural areas; ▪ Supports a significant number of native broadleaf trees; and ▪ Offers good potential for continued regeneration of an integrated woodland community. 	<p>GHG-02: Urban Forestry</p> <p>Fire-03: Update Tree Planning Guidelines to Select Wildfire Resistant Species</p>
Conservation	<p>CO-141. In 15 years the native oak canopy within on-site mitigation areas shall be 50 percent canopy coverage for valley oak and 30 percent canopy coverage for blue oak and other native oaks.</p>	<p>Fire-03: Update Tree Planning Guidelines to Select Appropriate Species to Help Improve Air Quality</p>
Conservation	<p>CO-142. Provide funds for education, programs, and materials emphasizing the value and importance of trees.</p>	<p>GHG-02: Urban Forestry</p> <p>Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover</p>

Element	General Plan Policy Text	Supportive CAP Measures
Conservation	CO-143. Work cooperatively with local utilities to assure that new trees are planted in locations that will maximize energy conservation and air quality benefits.	GHG-02: Urban Forestry Fire-03: Update Tree Planning Guidelines to Select Wildfire Resistant Species Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover
Conservation	CO-144. Support a regional approach consistent with the provisions of Greenprint for the protection, replacement, and mitigation of trees.	GHG-02: Urban Forestry Fire-03: Update Tree Planning Guidelines to Select Wildfire Resistant Species
Conservation	CO-145. Removal of non-native tree canopy for development shall be mitigated by creation of new tree canopy equivalent to the acreage of non-native tree canopy removed. New tree canopy acreage shall be calculated using the 15-year shade cover values for tree species.	GHG-02: Urban Forestry Fire-03: Update Tree Planning Guidelines to Select Wildfire Resistant Species
Conservation	CO-146. If new tree canopy cannot be created onsite to mitigate for the non-native tree canopy removed for new development, project proponents (including public agencies) shall contribute to the Greenprint funding in an amount proportional to the tree canopy of the specific project.	GHG-02: Urban Forestry Fire-03: Update Tree Planning Guidelines to Select Wildfire Resistant Species
Conservation	CO-147. Increase the number of trees planted within residential lots and within new and existing parking lots.	GHG-02: Urban Forestry
Conservation	CO-148. Support private foundations with local funds for their tree planting efforts.	GHG-02: Urban Forestry
Conservation	CO-149. Trees planted within new or existing parking lots should utilize pervious cement and structured soils in a radius from the base of the tree necessary to maximize water infiltration sufficient to sustain the tree at full growth.	GHG-02: Urban Forestry Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover
Delta Protection	DP-3. Proponents of new non- agriculturally oriented residential, recreational, commercial, habitat, restoration or industrial development shall provide appropriate buffer areas to prevent conflicts between any proposed use and existing adjacent agricultural parcels. Buffers shall adequately protect integrity of land for existing and future agricultural uses and shall not include uses that conflict with agricultural operations on adjacent agricultural lands. Appropriate buffer setbacks shall be determined in consultation with local Agricultural commissioners, and shall be based on any applicable general plan policies and criteria included in the Right-to-Farm Ordinance.	

Element	General Plan Policy Text	Supportive CAP Measures
Delta Protection	DP-4. Direct new non-agriculturally oriented non-farmworker residential development within the existing unincorporated towns (Walnut Grove, Courtland, Hood, Locke, and Ryde).	
Delta Protection	DP-7. New structures shall be set back from levees and areas that may be needed for future levee expansion consistent with local reclamation district regulations, and, upon adoption, with the requirements to be identified in the California Department of Water Resources Central Valley Flood control Plan.	
Delta Protection	DP-11. Consider developing programs to permit clustering of residential units that allow property owners to engage in limited property development in order to ensure the efficient use and conservation of agricultural lands, support open space values, and protect sensitive environmental areas in the Primary Zone. Clustered development occurs when contiguous or non-contiguous parcels are developed to cluster lots for residential use. The purpose of clustered development is to provide a mechanism to preserve agricultural land and open space, to locate housing in areas that can readily be served by public services and utilities, and provide the agricultural community an alternative to transfer of development rights. Clustered development programs shall ensure that the number of clustered lots created does not exceed the allowable density requirement for the zoning of the sum of the parcels. Clustered development may only be used one time. Neither the clustered lots nor the remainder lots may be further subdivided. Residential development shall be consistent with Sacramento County General Plan policies and zoning regulations and standards.	
Delta Protection	DP-12. Consider developing transfer of development rights (TDR) programs that allow land owners to transfer the development right from one parcel of land to another. The purpose of these TDR programs would be to provide the efficient use and conservation of agricultural lands, to support open space values, and to protect sensitive environmental areas within the Primary Zone. This purpose would be achieved by relocating development rights within the Primary Zone to more suitable areas such as adjacent to or within existing urban areas within or outside of the Primary Zone, or to provide expanded opportunities for affordable farm worker housing. TDR programs shall ensure that the transferred development density does not exceed the development density identified for the zoning for the sending parcel, and that any farm worker housing is restricted and regulated for that purpose. The land upon which the development rights are transferred from would be restricted with a permanent conservation easement. Receiving areas must have the infrastructure capacity, public services and utilities to absorb the new development.	
Delta Protection	DP-13. Support the implementation of appropriately located agricultural labor camps and housing that serve agricultural operations, which are constructed and sited consistent with Sections 17021.5 and 17021.6 of the California Health and Safety Code and consistent with the requirements of local building codes.	
Delta Protection	DP-14. The conversion of an agricultural parcel, parcels, and/or an agricultural island for water impoundment, including reservoirs, water conveyance or wetland development may not result in the seepage of water onto or under the adjacent parcel, parcels, and/or island. These conversions shall mitigate the risks and adverse effects associated with seepage, levee stability, subsidence, and levee erosion, and shall be consistent with the goals of this element.	Flood-14: Safeguard Freshwater Supply Against Contamination, Degradation, or Loss

Element	General Plan Policy Text	Supportive CAP Measures
Delta Protection	DP-15. Support regional efforts to address issues related to urban development, habitat conservation and agricultural protection through participating in the South Sacramento Habitat Conservation Plan.	GHG-26: South Sacramento Habitat Conservation Plan
Delta Protection	DP-16. Support and Encourage agriculture in the Delta as a key element in the State's economy and in providing the food supply needed to sustain the increasing population of the State, the Nation, and the world.	
Delta Protection	DP-18. Promote recognition of the Delta as a place by educating individuals about the rich agricultural heritage, the unique recreational resources, the biological diversity, and the ongoing value of maintaining a healthy agricultural economy in the Delta.	
Delta Protection	DP-19. Support agricultural programs that maintain economic viability and increase agricultural income in accordance with market demands, including but not limited to wildlife-friendly farming, conservation tillage and non-tillage.	GHG-03: Urban-Rural Connections
Delta Protection	DP-20. Encourage implementation of the necessary plans and ordinances to: maximize agricultural parcel size; reduce subdivision of agricultural lands; protect agricultural and related activities; protect agricultural land from conversion to non-agriculturally oriented uses. An optimum package of regulatory and incentive programs would include: (1) an urban limit line; (2) minimum parcel size consistent with local agricultural practices and needs; (3) strict regulations regarding subdivision of agricultural lands intended to ensure that subdivided lands will continue to contain agriculturally-oriented land uses; (4) adequate buffers between agricultural and nonagricultural land uses particularly residential development outside but adjacent to the Primary Zone; (5) an agriculture element of the general plan; (6) a right-to-farm ordinance; and (7) a conservation easement program.	
Delta Protection	DP-22. Encourage management of agricultural lands which maximize wildlife habitat seasonally and year-round, through techniques such as fall and winter flooding, leaving crop residue, creation of mosaic of small grains and flooded areas, wildlife friendly farming, controlling predators, controlling poaching, controlling public access, and others.	
Delta Protection	DP-21. Encourage acquisition of agricultural conservation easements from willing sellers as mitigation for projects within each county. Promote use of environmental mitigation in agricultural areas only when it is consistent and compatible with ongoing agricultural operations and when developed in appropriate locations designated on a countywide or Deltawide habitat management plan.	
Delta Protection	DP-23. Encourage the protection of agricultural areas, recreational resources and sensitive biological habitats, and the reclamation of those areas from the destruction caused by inundation.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-12: Replant Bare or Disturbed Areas
Delta Protection	DP-25. Preserve and protect the natural resources of the Delta. Promote protection of remnants of riparian and aquatic habitat. Encourage compatibility between agricultural practices, recreational uses and wildlife habitat. Partner with Sacramento Regional County Sanitation District and other	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions

Element	General Plan Policy Text	Supportive CAP Measures
	partners to promote and encourage the use of recycled water for agricultural, habitat and water conservation purposes where feasible.	<p>Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems</p> <p>Water-03: Create Incentives and Programs to Transfer Knowledge and Technologies to Assist Farmers with New Production Methods and Drought Tolerance Species</p> <p>Water-05: Expand Upon Existing Water Conservation Education Outreach Programs for Residents and Businesses</p> <p>Water-04: Reduce Potable Water Use in Outdoor Landscaping</p>
Delta Protection	DP-31. Incorporate, to the maximum extent feasible, suitable and appropriate wildlife protection, restoration and enhancement on publicly-owned land as part of a Delta-wide plan for habitat management.	
Delta Protection	DP-33. Protect and restore ecosystems and adaptively manage them to minimize impacts from climate change and other threats and support their ability to adapt in the face of stress.	
Delta Protection	DP-34. Support the design, construction, and management of any flooding program to provide seasonal wildlife and aquatic habitat on agricultural lands, duck club lands and additional seasonal and tidal wetlands, shall incorporate "best management practices" to minimize vectors including mosquito breeding opportunities, and shall be coordinated with the local vector control districts., (Each of the four vector control districts in the Delta provides specific wetland/mosquito management criteria to landowners within their district.)	Flood-10: Expand Educational Programs to Address Vector and Waterborne Diseases
Delta Protection	DP-38. Encourage new regional recreational opportunities, such as Delta-wide trails, which take into consideration environmental, agricultural, infrastructure, and law enforcement needs, and private property boundaries. Also, encourage opportunities for water, hiking, and biking trails.	
Delta Protection	DP-52. Support efforts to address levee encroachments that are detrimental to levee maintenance.	
Delta Protection	DP-53. Support funding assistance for existing unincorporated towns within the Delta to improve levees up to a 200-year flood protection level.	
Delta Protection	DP-54. Support stockpiling rock in the Delta for levee emergency response	
Delta Protection	DP-55. Support a multi-year funding commitment to maintain and restore both project and non-project levees in the Delta.	

Element	General Plan Policy Text	Supportive CAP Measures
Delta Protection	DP-56. Encourage the beneficial reuse of dredged material, as appropriate, for levee maintenance and rehabilitation, and the maintenance of instream flows. Support and advocate for the Delta Long-Term Management Strategy (LTMS).	
Delta Protection	DP-60. New houses built in the Delta agricultural areas but outside of the Delta’s unincorporated towns shall continue to be served by independent potable water and wastewater treatment facilities and/or septic systems. Agricultural uses that require wastewater treatment shall provide adequate infrastructure improvements or pay to expand existing facilities, and not overburden the existing limited community resources. The appropriate governing body shall ensure that new or expanded construction of agriculturally-oriented wastewater disposal systems meet the appropriate standards/conditions and are not residentially growth inducing. Independent treatment facilities should be monitored to ensure no cumulative adverse impact to groundwater supplies.	
Delta Protection	DP-62. Encourage recycling programs for metals, glass, paper, cardboard, and organic materials in order to minimize waste generation. Recycling facilities for these materials should be suitably located to serve Delta residents, visitors, and businesses. High groundwater tables and subsiding soil make the Delta an inappropriate location for solid waste disposal.	
Delta Protection	DP-65. Encourage the provision of infrastructure for new water, recycled water and recreational and scientific research facilities.	Water-02: Increase On-Site Greywater and Rainwater Reuse, Stormwater Reuse, and Recycled Water Systems
Economic Development	ED-1. Achieve complete communities that have enough land capacity to accommodate the development of general commercial, industrial, and office uses which support community needs in all areas of the County.	
Economic Development	ED-2. Concentrate commercial uses in areas best able to support them, including neighborhood, community and regional centers, transit stations, and commercial corridors.	
Economic Development	ED-3. Ensure a controlled, balanced and sustainable development pattern on a sub-regional and regional level through comprehensive planning incorporating multiple disciplines.	
Economic Development	ED-4. Identify opportunity sites within the unincorporated area that are appropriate for regional retail opportunities and other synergistic uses.	
Economic Development	ED-5. Ensure that adequate infrastructure is planned and developed to support regional retail opportunity sites.	
Economic Development	ED-7. Promote retail facilities of appropriate size and scale to serve the shopping needs of the local population and the populace at large when planning new residential neighborhoods or major residential developments.	
Economic Development	ED-8. Create plans for new growth areas with a mix of land uses, including a balance of residential and employment (jobs-housing balance) as well as providing for neighborhood-oriented services and diverse commercial amenities to serve a broader portion of the population.	

Element	General Plan Policy Text	Supportive CAP Measures
Economic Development	ED-9. Plan new growth areas to emphasize full capture of retail and service demands within the planning area and within a broader area when appropriate.	
Economic Development	ED-10. Revitalize distressed and aging commercial corridors by developing mixed-use centers and urban villages along corridors to improve community quality of life, optimize economic development, balance land uses, and foster the opportunity to accommodate a portion of the anticipated future growth.	
Economic Development	ED-11. Foster orderly and efficient commercial and residential growth within identified commercial corridors, ensuring that adequate infrastructure and public services are available to support existing and new commercial activity on the established commercial corridors.	
Economic Development	ED-12. Improve the physical appearance and character of commercial corridors to attract new retail activity, solve functional and infrastructure issues, and create active and exciting corridors that serve as integral pieces of neighborhoods and communities.	
Economic Development	ED-13. Support location of County employment centers and facilities in areas in need of revitalization, including commercial corridors.	
Economic Development	ED-14. Support and promote a healthy and competitive agricultural industry whose products are recognized in local, national and international markets.	GHG-03: Urban-Rural Connections
Economic Development	ED-15. Support ongoing efforts by the agriculture community to develop high value products and new markets for goods that can support higher paying and more steady employment opportunities in the unincorporated area.	
Economic Development	ED-17. Support agricultural agencies, marketing cooperatives and other agricultural organizations in their efforts to research global, domestic and new markets for Sacramento County farm produce.	GHG-03: Urban-Rural Connections
Economic Development	ED-18. Encourage local and regional processing facilities that create high quality jobs.	GHG-03: Urban-Rural Connections
Economic Development	ED-20. Emphasize the efficient reuse of existing facilities and the high quality development of underutilized properties within the former base and the adjacent areas.	
Economic Development	ED-21. Promote an orderly, balanced, and integrated land use pattern that optimizes existing McClellan Park assets, supports sustainable land utilization, and enhances local and regional character, identity, and quality of development.	
Economic Development	ED-22. Support the redevelopment and revitalization efforts in the surrounding communities and create interrelationships with portals into the community along Watt Avenue and Winters Street.	
Economic Development	ED-23. Encourage economic development activities that support and complement local and regional economic development activities including the creation of high quality jobs.	
Economic Development	ED-25. Reuse of Mather Airfield will emphasize the efficient reuse of existing facilities and the high quality development of underutilized properties within the base focusing on the transition of vacant and underutilized properties into airport, commercial, and recreation uses.	

Element	General Plan Policy Text	Supportive CAP Measures
Economic Development	ED-27. Provide roadway connections through Mather Airfield to improve regional mobility and facilitate the movement of goods and services.	GHG-22: Connecting Key Destinations
Economic Development	ED-31. Support business and private sector efforts to create regional, state, national, and international markets for the Sacramento County's products and services.	GHG-03: Urban-Rural Connections
Economic Development	ED-33. Partner to create and maintain an adaptive/skilled workforce to meet the needs of existing and future businesses.	
Economic Development	ED-60. Encourage public events that allow people to gather for the purposes of entertainment and education, such as art and music festivals, farmers markets, and other performance events.	GHG-03: Urban-Rural Connections
Energy	EN-1. Develop standards which would reduce the energy required to maintain interior spaces in the comfort zone, including such standards as tree planting and proper orientation of dwellings.	GHG-02: Urban Forestry Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover
Energy	EN-2. Inform the public of the need and of ways to conserve energy in the home.	
Energy	EN-3. Encourage the conservation and rehabilitation of existing housing and the revitalization of older, more intensively developed neighborhoods in the urban area.	GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings
Energy	EN-4. Encourage consumers to purchase or rent energy efficient houses and apartments.	
Energy	EN-5. Reduce travel distances and reliance on the automobile and facilitate increased use of public transit through appropriate land use plans and regulations.	GHG-14: Improved Transit Access GHG-22: Connecting Key Destinations
Energy	EN-6. Actively support the efforts of the Regional Transit District to expand and upgrade service and attract an increasing percentage of travel.	GHG-14: Improved Transit Access
Energy	EN-7. Expand existing programs and develop new programs which promote and encourage vanpooling and carpooling.	GOV-EC-01: Employee Transportation Program GOV-EC-05: Carpool at Work Incentives
Energy	EN-8. Promote and encourage increased percentages of more efficient cars.	GHG-10: Electric Vehicle Infrastructure Program GHG-18: Improve Fuel Efficiency Standards GHG-27: EV Car Sharing at Affordable Housing Projects GOV-FL-01: Fleet Conversion Program

Element	General Plan Policy Text	Supportive CAP Measures
Energy	EN-9. Inform the public of the need to reduce auto travel and encourage the use of public transit and other energy efficient modes of travel.	
Energy	EN-10. Continue implementation of the Bikeways Master Plan, and develop standards for neighborhood bikeways and pedestrian-ways, incorporating them into Neighborhood Planning Standards.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Energy	EN-11. Promote the location within the Sacramento area of those industries which are labor intensive, utilize solar energy systems, and are consistent with other policies in terms of environmental protection.	
Energy	EN-12. Encourage industry located or locating in the Sacramento area to participate in cogeneration of power.	
Energy	EN-13. Aggressively pursue programs to retrofit with insulation those existing uninsulated or underinsulated commercial, institutional, and industrial buildings where economically justified.	Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens
Energy	EN-14. Develop or revise design standards relating to building solar orientation, landscaping, impervious surfaces, and parking space requirements to conserve energy.	GHG-04: Increase Energy Efficiency and Electrification of Existing Commercial/Nonresidential Buildings and Facilities
Energy	EN-15. Inform the agricultural industry of ways to conserve energy through the Cooperative Agricultural Extension office.	GHG-28 Electric Agricultural Equipment
Energy	EN-16. Promote the use of passive and active solar systems in new and existing residential, commercial, and institutional buildings as well as the installation of solar swimming pool heaters and solar water and space heating systems.	Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens
Energy	EN-17. Support the development and improvement of solar space cooling systems.	Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens
Energy	EN-18. Develop and implement standards for the protection of the solar rights of property owners.	Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens
Energy	EN-19. Support the development and use of renewable sources of energy, including but not limited to biomass, solar, wind, and geothermal.	

Element	General Plan Policy Text	Supportive CAP Measures
Energy	EN-20. Advocate that the state legislate a tax incentive or other means of encouraging utilities to improve the efficiency of existing hydroelectric generators.	
Energy	EN-21. Investigate the effectiveness of reducing summer daily peak load by shifting working hours, particularly for office workers and, if effective, promote its implementation.	
Energy	EN-22. Inform the public of ways to reduce electrical consumption at times of peak load and of the resulting benefits.	
Energy	EN-23. Investigate in a joint effort with SMUD the feasibility and effectiveness of peak day pricing by rate structure and/or surcharge.	
Energy	EN-24. Support electronic load management as a method of reducing peak electrical load.	
Energy	EN-25. Institute total energy management (TEM) for county buildings.	GOV-BE-01: Green Building Policy
Energy	EN-26. Use life cycle costing and, where applicable, consider energy efficiency ratios for county equipment purchases, including vehicles, and require that vendors on county property do likewise.	GOV-FL-01: Fleet Conversion Program GOV-BE-01: Green Building Policy
Energy	EN-27. Recycle office wastepaper.	
Energy	EN-28. Commit itself to the principles of source reduction and resource recovery of municipal solid waste.	
Energy	<p>EN-29. Establish within a single office of county government responsibility for the following:</p> <ul style="list-style-type: none"> ▶ Coordinating energy conservation efforts in county government; ▶ Publicizing the energy conservation programs of the city, county, SMUD, PG&E, and the state ▶ Advocating, in cooperation with the county's legislative advocate, other government agencies to adopt programs which support the county's energy goal and objectives; ▶ Preparing 'an "energy account" annually of the previous year's demand and use of energy in Sacramento County; and ▶ Coordinating and encouraging appropriate federal, state, county, and other local governmental agencies to conserve energy in water treatment and wastewater treatment and reclamation. 	GHG-25: Electric Irrigation Pumps
Energy	EN-30. Develop and implement standardized procedures for evaluating the initial and long-range energy impacts of proposed developments.	
Energy	EN-31. Design new county buildings to incorporate passive and active solar energy systems and total energy management.	GOV-BE-01: Green Building Policy GOV-BE-02: Solar for County Buildings Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive

Element	General Plan Policy Text	Supportive CAP Measures
		Solar Home Design, Green Roofs, and Rooftop Gardens
Energy	EN-32. Develop and implement a countywide water resources management plan which is based on conservation of energy and water resources.	
Energy	EN-33. Promote district heating for commercial, institutional, and high-density residential buildings in downtown Sacramento.	
Environmental Justice	EJ-1. Improvement and program support for each EJ Community shall address the Community's unique or compounded needs.	
Environmental Justice	EJ-2. Maximize public engagement opportunities and continually adapt to new forms of communication	All-01: Create a Comprehensive Outreach Strategy
Environmental Justice	<p>EJ-19. When planning for new development in new communities, the features below shall be incorporated for their public health benefits and ability to encourage more active lifestyles, unless environmental constraints make this infeasible. In existing communities, the features below shall be considered, as appropriate and feasible:</p> <ul style="list-style-type: none"> a. Where appropriate, compact, mixed use development and a balance of land uses including schools, parks, jobs, retail and grocery stores, so that everyday needs are within walking distance of homes. b. Grid or modified-grid pattern streets, integrated pathways and public transportation that connect multiple destinations and provide for alternatives to the automobile. c. Wide sidewalks, shorter blocks, well-marked crosswalks, on-street parking, shaded streets and traffic-calming measures to encourage pedestrian activity. d. Walkable commercial areas with features that may include doors and windows fronting on the street, street furniture, pedestrian-scale lighting, and served by transit when feasible. e. Open space, including important habitat, wildlife corridors, and agricultural areas incorporated as community separators and appropriately accessible via non-vehicular pathways. 	
Environmental Justice	EJ-20. The County will continue to support walking and bicycling by requiring smart growth streets (bike lanes, and sidewalks separated from the roadway with trees and planted landscaping) in transit priority areas, in Environmental Justice Communities and in new communities and developments wherever practicable.	
Environmental Justice	EJ-21. Provide safe, low stress, interesting and convenient environments for pedestrians and bicyclists, including inviting and adequately lit streetscapes, networks of trails, paths, parks, and open spaces that connects residences with key destinations, and encourages regular exercise and the reduction of vehicular emissions.	
Environmental Justice	EJ-23. The County will achieve equitable tree canopy in EJ Communities	

Element	General Plan Policy Text	Supportive CAP Measures
Environmental Justice	EJ-24. Increase tree canopy coverage to at least 35 percent in all unincorporated County neighborhoods by 2040, especially those that are in Environmental Justice Communities.	
Environmental Justice	EJ-25. Consistently enforce existing Tree Protection Ordinances including the zoning code, the Tree Ordinance (SCC 19.04) and the Tree Preservation Ordinance (SCC 19.12).	
Hazardous Materials	HM-12. Continue the effort through the Sacramento Metropolitan Air Quality Management District (AQMD) to inventory and reduce toxic air contaminants as emission standards are developed.	
Human Services	HS-5. New human services facilities shall be appropriately sited adjacent to existing or planned transportation corridors to enhance mobility options.	GHG-22: Connecting Key Destinations
Human Services	HS-6. Adequate infrastructure (i.e., complete streets including bicycle lanes and sidewalks) and appropriate design elements are incorporated during the planning and review of new human services facilities to improve connectivity and access.	Measure NWL-05: Smart Growth
Human Services	HS-9. Forward appropriate projects to the Human Service Coordinating Council (HSCC) as part of Planning and Environmental Review's initial distribution process for applications. Appropriate projects include large master plans, Specific Plans, Community Plans, and Corridor Plans but may also include other appropriate infill or corridor projects. Representatives of the HSCC may then forward comments or attend meetings and hearings such as the Project Review Committee (PRC) to comment on the needs for future human services and facilities.	GHG-21: Update Community and Corridor Plans
Land Use	LU-1. The County shall not provide urban services beyond the Urban Policy Area, except when the County determines the need for health and safety purposes and the extension provisions as provided in Policy LU-1.1.	
Land Use	LU-1.1 Limited public water service and facilities can be extended beyond the Urban Policy Area/Urban Services Boundary to serve uses allowed by the Cordova Hills Special Planning Area (SPA) for the 251 acre area located in proximity to Kiefer Landfill, as shown in Figure 9. Permitted uses within this area include agriculture, sports park, solar farm, district energy plant, corporation yard, park and ride lot, transit parking facility, fueling station, roads, storm water and storm water quality basins, community gardens, avoided areas, sewer pump station and lines, water tanks and similar utilities. Water facilities shall be sized adequately to only serve these permitted uses. Furthermore, proposed uses must be consistent with these permitted uses, act as a buffer between urban and open space uses, and help strengthen and preserve the current location of the Urban Services Boundary.	
Land Use	LU-2. The County shall maintain an Urban Service Boundary that defines the long-range plans (beyond twenty five years) for urbanization and extension of public infrastructure and services, and defines important areas for protecting as open space and agriculture.	
Land Use	LU-3. It is the intent of the County to focus investment of public resources on revitalization efforts within existing communities, especially within commercial corridors, while also allowing planning and development to occur within strategic new growth areas.	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-4. The County shall give priority to residential development on vacant or underutilized sites within existing urban areas that have infrastructure capacity available.	
Land Use	LU-6. Provide for the development of vacant or underutilized portions of commercial projects and industrial-office parks with medium or high-density residential uses or mixed-use development where appropriate, such as near existing or planned transit service.	GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Land Use	LU-7. Provide for additional mixed use development in commercial parking areas where such uses would be compatible with surrounding uses and where parking demand can be appropriately accommodated or structured parking can be constructed.	GHG-21: Update Community and Corridor Plans
Land Use	<p>LU-8. Infill projects that are consistent with the County's definition of a Quality Infill Project may participate in the County's Infill/Urban Tree Mitigation Program. The Tree Mitigation Infill Policy is as follows: Impacts to native trees designated for removal shall be calculated and mitigated based on canopy area coverage. Canopy replacement may utilize any tree species that is listed on the Tree Coordinator's list of recommended trees for parking lot shade. For measurement purposes, replacement tree canopy shall be calculated in the same manner as the parking lot shade requirements of Section 330-94 of the Sacramento County Zoning Code, using the ultimate canopy growth as specified on the Tree Coordinator's Tree Species Specifications. Tree canopy replacement shall, ideally, occur on site. In the event the physical constraints of the site preclude the additional replacement mitigation on-site, the following options may be utilized in coordination with the County Tree Coordinator and Mitigation Program:</p> <ul style="list-style-type: none"> ▶ Planting in adjacent landscape/ corridor areas; ▶ Planting within local parks; ▶ Other plantings that may otherwise be arranged in the neighborhood or community; <p>d. Participation in County programs including but not limited to payment of in lieu fees for use in tree care, preservation and maintenance programs, and other similar programs to the satisfaction of the County Tree Coordinator.</p>	GHG-21: Update Community and Corridor Plans GHG-02: Urban Forestry
Land Use	LU-9. Residential buildout of planned communities shall occur at a minimum of the approved plan densities.	
Land Use	LU-11. It is the intent of the County to comprehensively plan for the revitalization of the targeted commercial corridors and invest the resources necessary to achieve the following: stimulate private investment; encourage development of vacant and underutilized parcels; support reuse and/or rehabilitation of abandoned or blighted buildings; encourage rezoning of excess industrial and commercial lands to allow for medium and high density residential or mixed use projects, and; avoid non transit supportive uses, such as industrial uses, low density residential, and uses that would necessitate large parking lots fronting on the street.	GHG-21: Update Community and Corridor Plans
Land Use	LU-12. The County will prohibit land use projects which are not contiguous to the existing UPA, city boundaries, or existing planned communities or master plan areas (i.e. leapfrog development).	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-14. Master or Specific plans may be prepared for subareas of an urban growth area for the purpose of prioritizing development opportunities. The boundaries of new Master or Specific Plan areas should be defensible and should take into account the physical nature and characteristic of the sub planning areas. The boundaries of these subareas should consider the following constraints and features: roadways, drainage watersheds, school districts, water districts, parks districts, etc.	
Land Use	LU-15. Planning and development of new growth areas should be consistent with Sacramento County-adopted Habitat Conservation Plans and other efforts to preserve and protect natural resources.	GHG-26: South Sacramento Habitat Conservation Plan
Land Use	LU-19. Incompatible urban land uses should be buffered from one another by methods that retain community character, and do not consume large land areas or create pedestrian barriers.	
Land Use	LU-21. Promote a better balance of employment, neighborhood services, and different housing types by reviewing development projects and the surrounding community and designing new projects wherever feasible so that they maintain or improve the mix of uses in the community.	
Land Use	LU-22. Specific Plans and Community Plans should provide a balance of employment, neighborhood services, and different housing types wherever feasible.	GHG-21: Update Community and Corridor Plans
Land Use	LU-23. Providing compact, mixed use developments shall be an integral part of all master planning efforts for new growth areas and commercial corridors.	GHG-21: Update Community and Corridor Plans
Land Use	LU-24. Support private development requests that propose pedestrian- and transit-friendly mixed use projects in commercial corridors, town centers, and near existing or proposed transit stops.	GHG-14: Improved Transit Access GHG-15: Improved Pedestrian Network and Facilities
Land Use	<p>LU-26. When planning for new development in new communities, the features below shall be incorporated for their public health benefits and ability to encourage more active lifestyles, unless environmental constraints make this infeasible. In existing communities, the features below shall be considered, as appropriate and feasible:</p> <p>Where appropriate, compact, mixed use development and a balance of land uses including schools, parks, jobs, retail and grocery stores, so that everyday needs are within walking distance of homes.</p> <p>Grid or modified-grid pattern streets, integrated pathways and public transportation that connect multiple destinations and provide for alternatives to the automobile.</p> <p>Wide sidewalks, shorter blocks, well-marked crosswalks, on-street parking, shaded streets and traffic-calming measures to encourage pedestrian activity.</p> <p>Walkable commercial areas with features that may include doors and windows fronting on the street, street furniture, pedestrian-scale lighting, and served by transit when feasible.</p> <p>Open space, including important habitat, wildlife corridors, and agricultural areas incorporated as community separators and appropriately accessible via non-vehicular pathways.</p>	<p>GHG-15: Improved Pedestrian Network and Facilities</p> <p>GHG-16: Traffic Calming Measures</p> <p>GHG-21: Update Community and Corridor Plans</p> <p>GHG-22: Connecting Key Destinations</p>

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-27. Provide safe, interesting and convenient environments for pedestrians and bicyclists, including inviting and adequately-lit streetscapes, networks of trails, paths and parks and open spaces located near residences, to encourage regular exercise and reduce vehicular emissions.	GHG-15: Improved Pedestrian Network and Facilities GHG-17: Improved Bicycle Network and Facilities
Land Use	LU-28. Encourage the development of energy-efficient buildings and communities.	GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings GHG-05: Increase Energy Efficiency and Electrification of New Commercial/Nonresidential Buildings and Facilities GHG-04: Increase Energy Efficiency and Electrification of Existing Commercial/Nonresidential Buildings and Facilities
Land Use	LU-29. Promote voluntary participation in incentive programs to increase the use of solar photovoltaic systems in new and existing residential, commercial, institutional, and public buildings.	GOV-BE-02: Solar for County Buildings Temp-08: Increase Parking Lot Shading, Landscaping, and Urban Greening
Land Use	LU-30. Whenever feasible, incorporate energy-efficient site design, such as proper orientation to benefit from passive solar heating and cooling, into master planning efforts.	
Land Use	LU-32. It is the policy of Sacramento County to support and encourage Transit Oriented Development (TODs) in appropriate areas throughout the county. Development applications within ½ mile of a transit stop/station identified in Regional Transit’s Master Plan or a County-adopted Plan shall comply with the TOD development requirements as listed on Table 7. Appropriate locations include transit stops or nodes in commercial corridors, Bus Rapid Transit (BRT) or Light Rail stations, transit stops in new growth areas, or opportunity sites identified in Regional Transit’s Master Plan. The Planning Director will be responsible for determining an applications’ consistency with this policy and will take into account application-specific opportunities and constraints, including reasonable opportunities for access to transit. If the Planning Department determines that an application is inconsistent with the intent of this policy, the Board of Supervisors shall be the appropriate hearing body to determine feasibility of consistency (see table 7). Master Plans (such as Specific Plans, corridor plans, etc.) adopted after the updated General Plan is approved may replace the standards in this policy and Table 7 with standards tailored to the subject area.	GHG-13: Revise Parking Standards for Non-Residential Development GHG-21: Update Community and Corridor Plans
Land Use	LU-33. Parking requirements may be reduced in order to meet the density requirements established by policy LU-32.	GHG-16: Revise Parking Standards for Non-Residential Development

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	<p>LU-34. Developments in the areas designated on the Land Use Diagram as Transit Oriented Development shall be designed in a manner that conforms to the concepts of transit-oriented development, including:</p> <ul style="list-style-type: none"> ▶ High intensity, mixed-use development concentrated in a Core Area within an easy walk (one quarter mile) of a transit stop on the Trunk or Feeder Line Network. ▶ An emphasis on neighborhood support commercial services at street level in the Core Area that can serve the residents of the Core and surrounding Secondary Areas, with other employment encouraged in the TODs created along the Trunk Line Network. ▶ A pleasant walking environment created through good land use design, short distances, amenities, and streetscape features. ▶ Direct, multiple linkages, especially for bicycles and pedestrians, between the Core Area and the surrounding Secondary Area. 	<p>GHG-21: Update Community and Corridor Plans</p> <p>GHG-22: Connecting Key Destinations</p>
Land Use	<p>LU-35. The primary concepts in LU-34 should be employed wherever feasible in new urban development.</p>	
Land Use	<p>LU-36. Community Plans and Specific Plans shall employ the primary concepts in LU-34 in designating locations for higher intensity mixed use development and designing circulation and pedestrian networks.</p>	<p>GHG-21: Update Community and Corridor Plans</p> <p>GHG-22: Connecting Key Destinations</p>
Land Use	<p>LU-37. Provide and support development of pedestrian and bicycle connections between transit stations and nearby residential, commercial, employment or civic uses by eliminating physical barriers and providing linking facilities, such as pedestrian overcrossings, trails, wide sidewalks and safe street crossings.</p>	<p>GHG-14: Improved Transit Access</p> <p>GHG-15: Improved Pedestrian Network and Facilities</p> <p>GHG-17: Improved Bicycle Network and Facilities</p> <p>GHG-21: Update Community and Corridor Plans</p> <p>GHG-22: Connecting Key Destinations</p>
Land Use	<p>LU-38. Community Plans, Specific Plans, and development projects shall be designed to promote pedestrian movement through direct, safe, and pleasant routes that connect destinations inside and outside the plan or project area.</p>	<p>GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled</p> <p>GHG-15: Improved Pedestrian Network and Facilities</p>
Land Use	<p>LU-39. Support implementation of the ADA Transitional Plan and the Pedestrian Master Plan to create a network of safe, accessible and appealing pedestrian facilities and environments.</p>	<p>GHG-15: Improved Pedestrian Network and Facilities</p>

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-40. Employ appropriate traffic calming measures in areas where pedestrian travel is desirable but made unsafe by a high volume or excessive speed of automobile traffic. Preference shall be given to measures that slow traffic and improve pedestrian safety while creating the least amount of conflict with emergency responders.	GHG-16: Traffic Calming Measures
Land Use	LU-41. Encourage placement of active uses, such as retailers, restaurants, and various services, on the ground floor of buildings in areas where the greatest levels of pedestrian activity are sought.	GHG-22: Connecting Key Destinations
Land Use	LU-42. Master planning efforts for new growth areas shall provide for separated sidewalks along all arterials and thoroughfares to make walking a safer and more attractive transportation option.	GHG-15: Improved Pedestrian Network and Facilities
Land Use	<p>LU-43. Parking areas shall be designed to:</p> <ul style="list-style-type: none"> ▶ Minimize land consumption; ▶ Provide pleasant and safe pedestrian and bicycle movement; ▶ Facilitate shared parking ▶ Allow for the possible reuse of surface parking lots through redevelopment; and, ▶ Minimize parking lot street frontage. 	<p>GHG-13: Revise Parking Standards for Non-Residential Development</p> <p>GHG-17: Improved Bicycle Network and Facilities</p> <p>GHG-19: EV Parking Code</p>
Land Use	LU-44. Affordable housing should be located in compact, mixed use developments near transit stations whenever feasible.	<p>GHG-14: Improved Transit Access</p> <p>GHG-22 Connecting Key Destinations</p> <p>GHG-23: Incentivize Infill Development</p>
Land Use	LU-46. Assure that regionally-oriented commercial and office uses and employment concentrations have adequate road access, high frequency transit service and an adequate but efficient supply of parking.	GHG-22: Connecting Key Destinations
Land Use	LU-47. Commercial areas within one-half mile of a TOD commercial core area should maximize pedestrian and transit-friendly uses.	GHG-14: Improved Transit Access
Land Use	LU-48. Discourage the establishment and build-out of linear, strip pattern, commercial centers.	GHG-21: Update Community and Corridor Plans
Land Use	LU-50. All new employment-intensive County offices or offices providing walk-in services to the public shall be located along a Trunk Line or Feeder Line Network.	GHG-22: Connecting Key Destinations
Land Use	LU-52. New industrial uses with high employment densities that do not create significant noise, odor, or other negative impacts, such as office-industrial parks, shall be located with access to transit provided that appropriate measures are undertaken and maintained to mitigate nuisances and traffic.	GHG-14: Improved Transit Access
Land Use	LU-57. Future Agricultural-Residential development shall be limited to existing developed and infill Agricultural-Residential lands designated on the Land Use Diagram and such additional areas adjacent to existing developed lands to act as a buffer to new urban areas or as a buffer at the Urban Service Boundary as are consistent with LU-58.	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-58. Community and Specific Plans prepared for urbanizing areas may provide for additional Agricultural-Residential areas provided they are functionally integrated with other urban uses in the context of the Plan.	
Land Use	LU-60. The County supports development proposals that divide vacant and developed AR/A1 and AR/A-2 zoned parcels inside the USB to their maximum zoning density.	
Land Use	LU-61. The County supports rezoning of lands within existing Agricultural-Residential areas inside the USB to create additional AR/A-1 and AR/A-2 zoned land uses when it is consistent with plans to provide for urban uses, appropriate infrastructure is available or planned, is in line with historic demand levels, and consolidates rural communities.	
Land Use	LU-63. All new AR/A-1 and AR/A-2 lots created within the USB shall either connect to or provide for ultimate connection to the public sewer and water system to the satisfaction of the local utility service provider.	
Land Use	LU-68. Give the highest priority for public funding to projects that facilitate infill, reuse, redevelopment and rehabilitation, mixed-use development, and that will result in per-person vehicle miles traveled lower than the County average, and the lowest priority for projects that do not comply with public facilities Master Plan phasing sequences.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-21: Update Community and Corridor Plans
Land Use	LU-70. Enact cost effective energy conservation performance standards consistent with USEPA Energy Star standards for new construction.	GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings GHG-05: Increase Energy Efficiency and Electrification of New Commercial/Nonresidential Buildings and Facilities Temp-04: Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens
Land Use	LU-71. Reduce the energy impacts from new residential and commercial projects through investigation and implementation of energy efficiency measures during all phases of design and development.	GHG-05: Increase Energy Efficiency and Electrification of New Commercial/Nonresidential Buildings and Facilities
Land Use	LU-72. Expansion of urban uses in the Delta shall be limited to the established Delta communities of Freeport, Hood, Courtland, Locke, and Walnut Grove and to specific small expansions that support the agriculturally and recreationally based economies of the Delta.	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	LU-74. The County will not support the development of new towns in rural areas extending beyond the Urban Services Boundary.	
Land Use	LU-75. Limited urban services may be provided to the town of Freeport, including marinas and waterside uses, due to extraordinary circumstances including, but not limited to: the town's historic nature, its immediate adjacency to the USB, and its proximity to encroaching urban development. However, the capacity of such services shall be strictly limited to serve existing urban development and buildout of parcels within the town's boundaries at existing zoned densities, as defined by Figure 7.	
Land Use	LU-76. The County generally supports Agricultural-Residential uses adjacent to the inside boundary of the USB to both establish a smooth transition from urban uses within the USB to the rural uses found outside the USB, as well as to reinforce the integrity of the USB by limiting the potential for urban uses to reach beyond it.	
Land Use	LU-77. Future agricultural-residential development outside the USB and outside Galt's Sphere of Influence shall be limited to existing agricultural-residential lands so designated on the Land Use Diagram and new areas adjacent to existing areas with agricultural-residential land use designations. Agricultural-Residential expansion within the City of Galt's Sphere of Influence shall be discouraged.	
Land Use	LU-79. The County supports consolidating substandard lots into standard lots consistent with prevailing zoning densities.	
Land Use	LU-80. Rezones proposed for areas where urban services are not and will not be available outside the Urban Service Boundary and Galt Sphere of Influence shall be only to zones that do not allow densities to exceed 1 primary residence per five acres.	
Land Use	LU-82. Infill of existing Agricultural-Residential communities shall take precedence over expansion. Infill is defined as development within areas designated Agricultural-Residential on the Land Use Diagram. Each community is defined by the Agricultural-Residential land use classifications designated on the Land Use Diagram. Expansion is the change from Agriculture to Agricultural-Residential land use classifications.	GHG-21: Update Community and Corridor Plans
Land Use	LU-83. The County supports Agricultural-Residential expansion outside the USB when it is determined by the Board of Supervisors to be necessary to meet demand levels for agricultural-residential lands.	
Land Use	<p>LU-84. If the Board of Supervisors finds that the creation of additional Agricultural-Residential designated lands outside the Urban Services Boundary (USB) is warranted, as outlined by LU-82, then the following locational criteria apply:</p> <ol style="list-style-type: none"> 1. Encourage Agricultural-Residential expansion only where it can be shown that such expansion will serve to define community boundaries and preserve coherent neighborhoods. Agricultural-Residential expansion shall be proximate to other property designated Agricultural-Residential and form a logical expansion of an existing community; 2. Agricultural-Residential expansion shall be limited to those areas that are consistent with the following criteria: 	

Element	General Plan Policy Text	Supportive CAP Measures
	<ul style="list-style-type: none"> (a) Maintain the existing separation of communities; (b) Avoid Prime Farmland; (c) Protect Farmland of Statewide Importance where agricultural production is feasible and viable using customary and reasonable management practices. The Board of Supervisors may rely upon written documentation from the Agricultural Commissioner that the land is no longer agriculturally feasible and viable; (d) Consistent with adopted County flood policy; (e) Protect areas identified as a Natural Preserve or Resource Conservation Area on the Land Use Diagram and all areas shown on the Open Space Vision Map in the Open Space Element. 	
Land Use	LU-85. Agricultural-Residential expansion projects shall mitigate all impacts on existing rural services and schools.	
Land Use	LU-89. Support planning for and development of mixed use centers and urban villages along commercial corridors to improve quality of life by creating diverse neighborhood gathering places, supporting enhanced transit service and non-automotive travel, stimulating local economic development, eliminating blight and balancing land uses.	GHG-21: Update Community and Corridor Plans GHG-22: Connecting Key Destinations
Land Use	LU-90. Focus investment of County resources in commercial corridors to facilitate improvements to streetscapes, sidewalks, landscaping, undergrounding of utilities, and other infrastructure and public amenities to encourage and stimulate private investment.	Flood-07: Establish an Underground Utilities Program Resistant to Flooding
Land Use	LU-91. Support district planning efforts that focus on specific areas in need of reinvestment and revitalization.	
Land Use	LU-92. Support development of a bus rapid transit system and light rail expansion by encouraging appropriate land uses and densities along planned routes.	
Land Use	LU-95. Support the ongoing conservation, maintenance and upgrading of the County's housing inventory.	
Land Use	LU-100. Discourage attempts to rezone vacant and underutilized infill parcels currently zoned for residential uses to other uses, except when to allow for mixed use developments that include a residential component.	GHG-21: Update Community and Corridor Plans
Land Use	LU-101. Support conversion of excess, vacant or underperforming commercial and industrial properties to residential uses or mixed use developments.	
Land Use	LU-102. Ensure that the structural design, aesthetics and site layout of new developments is compatible and interconnected with existing development.	GHG-22: Connecting Key Destinations
Land Use	LU-105. The County shall create redevelopment districts in those areas where deteriorated conditions and blight warrant planned redevelopment.	
Land Use	LU-106. The County shall encourage aggressive code enforcement activity in areas designated for redevelopment or revitalization.	
Land Use	LU-107. When siting new civic buildings and County offices, preference shall be given to locations in existing communities in need of revitalization.	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	<p>LU-111. Annexations should only be advocated which:</p> <ul style="list-style-type: none"> ▶ ensure provisions and demonstrate maintenance for adequate municipal services; ▶ are consistent with state law and LAFCO standards and criteria; ▶ provide for equitable distribution, based on region-wide analysis, of social services and low income housing needs; ▶ preserve community identity. 	
Land Use	<p>LU-112. The County shall coordinate with regional planning agencies setting land use and environmental policies and programs and cooperate in the implementation of programs consistent with General Plan policy.</p>	<p>Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity</p> <p>Flood-08: Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives</p> <p>SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures</p>
Land Use	<p>LU-113. The County shall work with SACOG to support implementation of Blueprint's policies and land use objectives.</p>	
Land Use	<p>LU-114. It is the policy of Sacramento County that development and open space preservation in the Natomas Joint Vision Overlay Area occur in a comprehensive, responsible and cohesive manner that best addresses land use, economic development and environmental opportunities and challenges in Natomas.</p>	
Land Use	<p>LU-115 It is the goal of the County to reduce greenhouse gas emissions to 1990 levels by the year 2020. This shall be achieved through a mix of State and local action.</p>	
Land Use	<p>LU-116. The County shall consult with state and federal regulatory and resource agencies during initial review of development projects to identify potential environmental conflicts and establish, if appropriate, concurrent application processing schedules.</p>	<p>Water-06: Collaborate with Federal, State, and Local Agencies and Organizations to Identify Future Water Supplies, Explore Alternative Supply Sources, and Improve Capacity</p>

Element	General Plan Policy Text	Supportive CAP Measures
		Flood-04: Coordinate with Federal, State, and Local Agencies to Improve Emergency Evacuation and Supply Transportation Routes
Land Use	LU-117. The County will provide information to applicants with projects in potential wetland or natural resource areas and provide coordination assistance with such entities as the Army Corps of Engineers, the U.S. Fish and Wildlife Service and the California Department of Fish and Wildlife in order to facilitate development review and permit review processes.	
Land Use	<p>LU-119 The County shall only accept applications to expand the UPA or initiate an expansion of the UPA or any Master Plan processes outside of the existing UPA if the Board finds that the proposal meets the following:</p> <ul style="list-style-type: none"> ▶ Parallel processes to expand UPA and prepare Master Plans: Proposed additions to the UPA will only be considered when accompanied by a request to initiate a Master Plan process for all land encompassed by the proposed UPA expansion boundary. Likewise, requests to initiate a Master Plan process outside the UPA will only be considered when accompanied by a request to expand the UPA to include all land encompassed by the proposed Master Plan.²⁶ ▶ Project Justification Statement and Outreach Plan: Proposed UPA expansions/Master Plan processes must be accompanied by both a "Justification Statement" and an "Outreach Plan". The Justification Statement shall be a comprehensive explanation of the proposed request and the development it would allow. It must include background information, reasoning, and the goal(s) and benefits of the proposed project. The Outreach Plan shall describe how the project proponent plans to inform and engage neighbors and members of the general public about the proposed UPA expansion and project. ▶ Proximity to existing urbanized areas: Proposed UPA expansions/Master Plan processes must have significant borders that are adjacent to the existing UPA or a city boundary. As a guideline, "significant borders" generally means that the length of the boundary between the existing UPA or city boundary and the proposed UPA expansion/Master Plan should be 25 percent of the length of the boundary of the UPA expansion area. ▶ Logical, comprehensive, and cohesive planning boundaries: Proposed UPA expansions/Master Plan processes must consist of a contiguous set of parcels that have a regular outside boundary consistent with the logical planning boundary illustrations below. All parcels within this boundary must be included in both the proposed UPA expansion and proposed Master Plan area. 	All-01: Create a Comprehensive Outreach Strategy
Land Use	LU-121. The criteria in LU-120 regarding approval of proposed UPA expansions and/or Master Plans outside of the existing UPA should be used as guidelines for any proposed Master Plan within the existing UPA.	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	<p>LU-122. The Urban Policy Area is intended to provide an adequate supply of developable land sufficient to accommodate projected growth. The UPA shall also include additional preserve lands to ensure an appropriate supply of open space. It is the policy and intent of the County to evaluate the UPA at a minimum of five year intervals, to determine if an expansion is needed to maintain a constant adequate supply of land. Guidelines to be considered by the Board in determining the expansion of the Urban Policy Area include:</p> <ul style="list-style-type: none"> ▶ Buildout rates by type of use, unit type and density for the previous 5-year period. ▶ Infill trends and opportunities. ▶ Population and job growth projections as reflected by a minimum of three independent sources. ▶ Evidence that the infrastructure capacity and service availability exist or can be extended to the property. ▶ Evidence that the proposed expansion is consistent with Sacramento County-adopted Habitat Conservation Plan goals and objectives, or where such a draft or adopted Plan does not exist, evidence that important natural resources lands, agricultural lands, and open space lands will be protected and integrated into a cohesive and interconnected network of open space within the UPA. 	<p>GHG-21: Update Community and Corridor Plans</p> <p>Measure NWL-01: South Sacramento Habitat Conservation Plan</p>
Land Use	<p>LU-123. Before granting approval of an amendment to the Land Use Diagram, the Board of Supervisors shall find that:</p> <ul style="list-style-type: none"> ▶ the request is consistent with the objectives and policies of the General Plan; ▶ the request is consistent with the goals and objectives of a Sacramento County-adopted Habitat Conservation Plan; ▶ approval of the proposal will not adversely affect the fiscal resources of the County; ▶ the project will be consistent with the performance standards in this Plan and, for urban uses in urban growth areas, the project complies with the requirements of LU-13. 	
Land Use	<p>LU-125. The County shall not accept applications to amend the Land Use Diagram from a designation in Column A to a designation in Column B of Table 10 for property outside of the Urban Service Boundary unless consistent with Policy LU-72.</p>	
Land Use	<p>LU-126. The County shall not accept applications to amend the Land Use Diagram from a designation in Column A, in Table 10 to an Agricultural-Residential Land Use Designation for property outside the Urban Service Boundary, unless:</p> <ul style="list-style-type: none"> ▶ The property is proximate to an existing area designated for agricultural-residential land use. ▶ The property is consistent with Policy LU-82 & LU-83. ▶ The change in designation will not trigger the need for urban services and cumulative traffic impacts will be within the capacity of the planned road system. 	

Element	General Plan Policy Text	Supportive CAP Measures
Land Use	<p>LU-127. The County shall not expand the Urban Service Boundary unless:</p> <ul style="list-style-type: none"> ▶ There is inadequate vacant land within the USB to accommodate the projected 25 year demand for urban uses; and ▶ The proposal calling for such expansion can satisfy the requirements of a master water plan as contained in the Conservation Element; and ▶ The proposal calling for such expansion can satisfy the requirements of the Sacramento County Air Quality Attainment Plan; and ▶ The area of expansion does not incorporate open space areas for which previously secured open space easements would need to be relinquished; and ▶ The area of expansion does not include the development of important natural resource areas, aquifer recharge lands or prime agricultural lands; ▶ The area of expansion does not preclude implementation of a Sacramento County-adopted Habitat Conservation Plan; <p>OR</p> <ul style="list-style-type: none"> ▶ The Board approves such expansion by a 4/5ths vote based upon on finding that the expansion would provide extraordinary environmental, social or economic benefits and opportunities to the County. 	
Open Space	OS-1. Actively plan to protect, as open space, areas of natural resource value, which may include but are not limited to wetlands preserves, riparian corridors, woodlands, and floodplains associated with riparian drainages.	
Open Space	OS-2. Maintain open space and natural areas that are interconnected and of sufficient size to protect biodiversity, accommodate wildlife movement and sustain ecosystems.	
Open Space	OS-3. Promote educational programs which focus on the importance of natural resources and agricultural lands in Sacramento County.	
Open Space	OS-4. Open space acquisition shall be directed to lands identified on the Open Space Vision Diagram and associated component maps.	
Open Space	OS-5. Fee title and easement acquisitions within stream corridors shall be consistent with any adopted Master Drainage Plans of the Department of Water Resources.	
Open Space	OS-6. The County may seek to acquire land for open space purposes through either fee title or less than fee interest; however, such acquisitions shall be negotiated only with willing sellers.	
Open Space	OS-7. Costs of acquiring public open space shall be equitably distributed between existing and new residents.	
Open Space	<p>OS-8. The County shall consider adopting a comprehensive Open Space Preservation Action Plan which implements the Open Space Vision Diagram. Any such action plan shall be compatible with County adopted Habitat Conservation Plans. This Action Plan should include:</p> <ul style="list-style-type: none"> ▶ An inventory of open space resources. ▶ Refinement of targeted areas for preservation identified in this Element, with cost estimates for acquisition. 	

Element	General Plan Policy Text	Supportive CAP Measures
	<ul style="list-style-type: none"> ▶ An administrative structure which provides for governance by the Board of Supervisors. ▶ Provisions for permanent preservation of open space lands acquired in fee title or less than fee interest will only be negotiated with willing sellers. ▶ Funding for acquisition. 	
Open Space	OS-9. Open space easements obtained and offered as mitigation shall be dedicated to the County of Sacramento, an open space agency, or an organization designated by the County to protect and manage the open space. Fee title of land may be dedicated to the County, the open space agency, or organization provided it is acceptable to the appropriate department or agency (Please also refer to Section V of the Conservation Element for related policies).	
Open Space	OS-10. Sacramento County shall seek to attain the County Regional Park System standard of 20 acres of regional parkland per 1,000 population.	
Open Space	OS-11. Establish trail connections and linkages within the County and across jurisdictional boundaries that are compatible with existing land uses. These trail connections shall have the capability of being Class I trails (off-street, separated facilities) with grade separations wherever feasible.	
Open Space	<p>OS-12. The County shall seek to establish greenbelts to serve as habitat corridors and community separators. These shall be located:</p> <p>Between agricultural-residential communities within the unincorporated County; and</p> <p>Where feasible, between the unincorporated County and adjacent cities.</p>	
Open Space	<p>OS-13. Permit development clustering in urban areas where grouping of units at a higher density would facilitate on-site protection of woodlands, wetlands, steep slopes, urban stream corridors, scenic areas, or other appropriate natural features as open space, provided that:</p> <ul style="list-style-type: none"> ▶ Urban infrastructure capacity is available for urban use. ▶ On-site resource protection is appropriate and consistent with other General Plan Policies. ▶ General Plan policies pertaining to floodplain fill or natural preserves would not preclude development of the proposed use in the area to be protected as open space. ▶ The architecture and scale of development is appropriate for the area. ▶ Development rights for open space areas are permanently dedicated via conservation easements and appropriate long-term management is provided for by either a public agency or other appropriate entity. (Please also refer to the Conservation Element for related policies). 	
Open Space	<p>OS-14. Permit development clustering in rural areas where grouping units at a higher density would create an open space buffer protecting intensive farming activities, provided that:</p> <ul style="list-style-type: none"> ▶ Clustered residential lots are adjacent to and comparable in lot size to existing agricultural areas. 	

Element	General Plan Policy Text	Supportive CAP Measures
	<ul style="list-style-type: none"> ▶ Septic disposal systems are not concentrated in a manner which increases the potential for groundwater contamination. ▶ General Plan policies pertaining to floodplain or natural preserves would not preclude development of the proposed use in the area to be protected as open space. ▶ The project complies with any applicable development credits transfer ordinance relating to density bonuses. ▶ Development rights for open space areas are permanently dedicated via conservation easements and appropriate long-term management is provided for by either a public agency or other appropriate entity. (Please also refer to the Conservation Element for related policies). ▶ The overall average density of the project is comparable to the average lot sizes in the area. 	
Open Space	OS-15. Consider density bonuses as a method of encouraging development clustering and open space preservation.	
Public Facilities	PF-1. New water facilities shall be planned to minimize impacts to in-stream water flow in the Sacramento and American Rivers.	
Public Facilities	PF-11. The County shall not support extension of the regional interceptor system to provide service to areas within the unincorporated County which are beyond the Urban Service Boundary. This shall not prohibit the County from supporting the extension of the regional interceptor system to areas outside the USB which are being proposed for annexation to a city.	
Public Facilities	PF-13. Public sewer systems shall not extend service into agricultural-residential areas outside the urban policy area unless the Environmental Management Department determines that there exists significant environmental or health risks created by private disposal systems serving existing development and no feasible alternatives exist to public sewer service.	
Public Facilities	PF-20. Support the implementation of recycling programs for the unincorporated area of Sacramento County through the Source Reduction and Recycling Element of the County Integrated Waste Management Plan in order to meet the requirements of AB 939.	
Public Facilities	PF-23. Solid waste collection, handling, recycling, composting, recovery, transfer and disposal fees shall recover all capital, operating, facility closure and maintenance costs.	
Public Facilities	PF-24. Solid waste disposal fees and rate structures shall reflect current market rates and provide incentives for recovery.	
Public Facilities	PF-25. Transportation of solid waste shall utilize the safest practical means and routes of transport.	
Public Facilities	PF-26. Solid waste collection vehicles shall minimize dispersion of litter, odor and fumes.	
Public Facilities	PF-28. Community and Specific Plans shall consider the needs of community colleges and address the feasibility and appropriateness of off-campus facilities, particularly in TODs.	GHG-21: Update Community and Corridor Plans

Element	General Plan Policy Text	Supportive CAP Measures
Public Facilities	PF-29. Schools shall be planned as a focal point of neighborhood activity and interrelated with neighborhood retail uses, churches, neighborhood and community parks, greenways and off-street paths whenever possible.	GHG-22: Connecting Key Destinations
Public Facilities	PF-30. New elementary schools in the urban area should be planned whenever possible so that almost all residences will be within walking distance of the school (one mile or less) and all residences are within two miles of a school.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-20: Safe Routes to School GHG-22: Connecting Key Destinations
Public Facilities	PF-31. Schools shall be planned adjacent to neighborhood parks whenever possible and designed to promote joint use of appropriate facilities. The interface between the school and park shall be planned with an open design and offer unobstructed views to promote safety.	GHG-20: Safe Routes to School
Public Facilities	PF-32. Elementary schools shall not be located along arterials and thoroughfares. Junior high and high schools should be located near roadways with adequate capacity and should provide adequate parking to facilitate the transport of students.	GHG-20: Safe Routes to School
Public Facilities	PF-33. New community college campuses and high schools within the urban service boundary shall be located along arterial or thoroughfare streets, with high priority to location adjacent to transportation corridors identified on the Transportation Plan Map.	GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled GHG-20: Safe Routes to School GHG-22: Connecting Key Destinations
Public Facilities	PF-34 All school site plans shall be designed to minimize traffic speed and maximize traffic flow around the school, allowing for several access points to and from the site.	GHG-20: Safe Routes to School GHG-16: Traffic Calming Measures
Public Facilities	PF-35. New schools should link with planned bikeways and pedestrian paths wherever possible.	GHG-20: Safe Routes to School GHG-22: Connecting Key Destinations
Public Facilities	PF-48. Locate future library sites to be accessible by car, bicycle, foot, public transportation, and have sufficient off-street parking.	GHG-22: Connecting Key Destinations
Public Facilities	PF-54. Require new development to install fire hydrants and associated water supply systems which meet the fire flow requirements of the appropriate fire district.	
Public Facilities	PF-55. New development shall provide access arrangements pursuant to the requirements of the California Fire Code.	

Element	General Plan Policy Text	Supportive CAP Measures
Public Facilities	PF-56. Infill development shall be provided adequate off-site improvements to meet on-site fire flow requirements.	
Public Facilities	PF-59. Alternative methods of fire protection and access must be instituted if access is reduced to emergency vehicles.	Fire-04: Coordinate and Improve Emergency Preparedness Systems
Public Facilities	PF-61. Mitigation fees may be established by the Board of Supervisors or Fire Districts for the purpose of funding adequate fire protection and emergency medical response facilities provided they find that such fees are critical and necessary to meet the facility funding needs of the fire district and that existing methods of financing are inadequate.	Fire-04: Coordinate and Improve Emergency Preparedness Systems
Public Facilities	<p>PF-69. Cooperate with the serving utility to minimize the potential adverse impacts of energy production and distribution facilities to environmentally sensitive areas by, when possible, avoiding siting in the following areas:</p> <ul style="list-style-type: none"> ▶ Wetlands. ▶ Permanent marshes. ▶ Riparian habitat. ▶ Vernal pools. ▶ Oak woodlands. ▶ Historic and/or archaeological sites and/or districts. 	Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable
Public Facilities	PF-71. Cogeneration facilities may be located in commercially zoned areas provided that the thermal host associated with the cogeneration facility is a conforming commercial use and the cogeneration facility does not adversely affect other commercial uses in the area.	
Public Facilities	PF-73. Cogeneration facilities are prohibited outside the Urban Service Boundary, except as part of an existing processing operation such as for dairying, agricultural, or landfill purposes.	
Public Facilities	PF-76. The County supports the generation and use of energy produced from renewable resources.	GOV-BE-02: Solar for County Buildings
Public Facilities	<p>PF- 77. The County supports a variety of solar and other renewable energy sources, including:</p> <ul style="list-style-type: none"> ▶ A dispersed system that feeds into the electric delivery system, ▶ On-site facilities that primarily supply energy for on-site uses, and ▶ Properly sited large, centralized facilities consistent with Policy PF-78. 	GOV-BE-02: Solar for County Buildings
Public Facilities	<p>PF-78 Large multi-megawatt solar and other renewable energy facilities should be sited at locations that will minimize impacts. The following guidelines should be considered, though it is recognized that each project is different and must be analyzed individually, and that other factors may affect the suitability of a site. Locational criteria for wind turbines should be determined on a case-by-case basis and referred to the Sacramento County Airport System and the FAA for review and comment.</p> <ul style="list-style-type: none"> ▶ Desirable sites are those which will minimize impacts to county resources and will feed into the electrical grid efficiently, including: <ul style="list-style-type: none"> ▪ Lands with existing appropriate land use designations, e.g. industrial. 	

Element	General Plan Policy Text	Supportive CAP Measures
	<ul style="list-style-type: none"> ▪ Brownfield or other disturbed properties (e.g. former mining areas, mine tailings) or land that has been developed previously and has lost its natural values as open space, habitat or agricultural land. ▪ Sites close to existing facilities necessary for connection to the electrical grid to minimize the need for additional facilities and their impacts, and to improve system efficiency. ▶ Other sites may be used for siting renewable energy facilities after consideration of important natural and historic values of the land, including: <ul style="list-style-type: none"> ▪ <u>Farmlands</u>. Site on farmlands of the lowest quality, e.g. land classified by the Department of Conservation as “other land” or “grazing land”, then consider farmlands of local, unique or statewide importance. Avoid high quality farmlands, especially land classified by the Department of Conservation as prime and lands under active Williamson Act contracts. ▪ <u>Habitat and Other Open Space Lands</u>. Site on lands with the lowest habitat and open space values, and consider how a site will affect conservation planning, e.g. the Conservation Strategy in the South Sacramento Habitat Conservation Plan. Avoid areas containing vernal pool complexes and associated uplands. ▪ <u>Scenic Values</u>. Site in areas of lowest scenic values and avoid visually prominent locations e.g. ridges, designated scenic corridors and designated historic sites. ▪ <u>Cultural Resources</u>. Site in areas that are known to have limited potential for containing cultural resources. Otherwise, avoid sites with known cultural resources. 	
Public Facilities	PF-79. New solar and other renewable energy facilities should be designed and developed so as to minimize impacts to sensitive biological resources such as oak woodlands and vernal pools, cultural resources (including designated historic landscapes), or farmlands as defined by the California Department of Conservation. Nearby farm operations shall not be negatively affected by renewable energy facilities, per the policies of the Right-to-Farm Ordinance and the Agricultural Element.	
Public Facilities	PF-80. Locate solar facilities, and design and orient solar panels in a manner that addresses potential problems of glare consistent with optimum energy and capacity production.	
Public Facilities	PF-81. The County supports renewable energy facilities that convert and mitigate problem waste streams and residues that adversely impact environmental quality.	
Public Facilities	PF-82. The County supports the placement of large multi-megawatt solar facilities on rooftops and over parking lots to minimize land use impacts associated with these systems.	GOV-BE-02: Solar for County Buildings
Public Facilities	PF-84. New transmission lines constructed within existing and planned urban areas should utilize existing transmission corridors whenever practical. Secondary preferred locations are adjacent to railway and freeway corridors when feasible.	

Element	General Plan Policy Text	Supportive CAP Measures
Public Facilities	PF-92. Transmission lines should avoid to the greatest extent possible, cultural resources and biological resources such as wetlands, permanent marshes, riparian habitats, vernal pools, and oak woodlands. When routed through such areas, transmission lines should have maximum line spans and cross at the narrowest points which involve minimal cutting and cropping of vegetation, maintaining the drainage regime of wetland basins. Additionally, when feasible, such routes should be maintained to serve as biological dispersion corridors between areas of high biodiversity.	
Public Facilities	PF-95. Transmission lines should avoid paralleling recreation areas, historic areas, rural scenic highways, landscaped corridors, drainage basins, wetland mitigation, tree planting, and designated federal or state wild and scenic river systems, although these areas may be considered as options if facilities already exist there.	
Public Facilities	PF-96. Locate transmission facilities in a manner that maximizes the screening potential of topography and vegetation.	
Public Facilities	PF-99. Minimize overhead wire congestion using techniques such as undergrounding or combining lines on poles for the same voltage.	Flood-07: Establish an Underground Utilities Program Resistant to Flooding
Public Facilities	PF-105. Landscaping shall be included in corridor design which meets the standards of the surrounding land use zone and is compatible with the overhead line design.	
Public Facilities	PF-109. Public facility financing plans for developing neighborhoods may include the cost of undergrounding new and existing sub-transmission lines. Costs should be shared by all participating developers.	Flood-07: Establish an Underground Utilities Program Resistant to Flooding
Public Facilities	PF-110. In areas of renovation and redevelopment, install sub-transmission and distribution lines underground, when feasible, with installation costs provided to the utility by redevelopment funds. Installation should be designed in a manner that minimizes impacts to any historical features.	Flood-07: Establish an Underground Utilities Program Resistant to Flooding
Public Facilities	PF-124. Consistent with its infill development standards and mixed use Commercial Corridor plans, the County in consultation with the local recreation and park districts shall encourage new infill and Corridor development projects to provide small plazas, pocket parks, civic spaces, and other gathering places that are available to the public to help encourage pedestrian activity, meet recreational needs and service standards consistent with Smart Growth principles.	GHG-21: Update Community and Corridor Plans
Safety	SA-1. The County shall require geotechnical reports and impose the appropriate mitigation measures for new development located in seismic and geologically sensitive areas.	
Safety	SA-3. The County shall support efforts by Federal, State, and other local jurisdictions to investigate local seismic and geological hazards and support those programs that effectively mitigate these hazards.	
Safety	SA-4. The County shall prohibit development on ground surfaces which exceed 40 percent in slope, such as the bluff areas along the American River. Development shall be set back from these slopes at a distance established by the Zoning Code.	

Element	General Plan Policy Text	Supportive CAP Measures
Safety	<p>SA-5. A comprehensive drainage plan for major planning efforts shall be prepared for streams and their tributaries prior to any development within the 100-year floodplain and/or the 200-year floodplain in areas subject to the Urban Level of Flood Protection, defined by full watershed development without channel modifications. The plan shall:</p> <ol style="list-style-type: none"> a. Determine the elevation of the future 100-year flood and/or the 200-year flood in areas subject to the Urban Level of Flood Protection, associated with planned and full development of the watershed; b. Determine the boundaries of the future 100-year floodplain and/or the 200-year floodplain in areas subject to the Urban Level of Flood Protection, for both flood elevations (planned and full development) based on minimum 2-foot contour intervals; c. Assess the feasibility of gravity drainage into the existing flowline of the stream; d. Assess the feasibility of alternative means of drainage into the stream; e. Identify potential locations for sedimentation ponds and other stormwater treatment facilities; f. Determine practical channel improvements and/or detention basins to provide the flood control needs of the proposed development; g. Determine the location and extent of marsh, vernal pool and riparian habitat; h. Develop measures for protecting and mitigating natural habitat; i. Develop measures for protecting and mitigating for federal and state listed endangered species; j. Develop and ensure implementation of measures that would reduce vector larvae; k. Identify appropriate plant species to be included as part of the natural features of the comprehensive drainage plan. (Modified 2016) 	<p>Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events</p> <p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-11: Identify Concrete Channel Restoration Areas</p> <p>Flood-12: Replant Bare or Disturbed Areas</p>
Safety	<p>SA-6. The County will coordinate with the City of Sacramento, the Army Corps of Engineers, the Sacramento Area Flood Control Agency, and other Federal, State and local governments and agencies to develop a plan to finance, develop and construct flood control project improvements to reduce flooding potential in Sacramento County. The construction of flood control projects along the Sacramento and American Rivers and the immediate connection of local streams to these rivers shall be included in these projects. Such projects should provide 200-year flood protection.</p>	<p>Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events</p> <p>Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions</p> <p>Flood-08: Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives</p>
Safety	<p>SA-6a. The County will continue to coordinate with parties responsible for flood management facilities and structures (e.g., pump stations, levees, canals,</p>	<p>Flood-01: Evaluate and Improve Capacity of</p>

Element	General Plan Policy Text	Supportive CAP Measures
	channels, and dams) to provide proper maintenance and/or improvements. (Added 2016)	Stormwater Infrastructure for High-Intensity Rainfall Events Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Safety	SA-6b. The County will continue to coordinate with relevant organizations and agencies (e.g., Federal Emergency Management Agency (FEMA) and State of California Department of Water Resources (CADWR)) when updating floodplain mapping, flood management plans, local hazard mitigation plans, and other emergency response plans to consider the impacts of urbanization and climate change on long-term flood safety and flood event probabilities. (Added 2016)	Flood-08: Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives Flood-15: Improve Flood Warning and Information Dissemination
Safety	SA-6c. The County will continue to coordinate with local, regional, state, and federal agencies to maintain an adequate flood management information base, prepare risk assessments, and identify strategies to mitigate flooding impacts. (Added 2016)	Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable Flood-08: Partner with SAFCA and Local Agencies, Utilities, and Other Organizations to Support Future and On-Going Flood-Related Climate Change Initiatives
Safety	SA-7. In accordance with the County Floodplain Management Ordinance, the County shall locate, when feasible, new essential public facilities outside of flood hazard zones, including hospitals and health care facilities, emergency shelters, fire stations, emergency command centers, and emergency communications facilities; or identify construction methods or other methods to minimize damage if these facilities are located in flood hazard zones.	Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable Flood-07: Establish an Underground Utilities

Element	General Plan Policy Text	Supportive CAP Measures
		Program Resistant to Flooding
Safety	SA-8. Maintain the structural and operational integrity of essential public facilities during flooding.	Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable
Safety	SA-9. New and modified bridge structures should minimize any increase in water surface elevations of the 100-year floodplain, or the 200-year floodplain in areas subject to the Urban Level of Flood Protection. (Modified 2016)	Flood-04: Coordinate with Federal, State, and Local Agencies to Improve Emergency Evacuation and Supply Transportation Routes
Safety	SA-10. Fill within the 100-year floodplain of creeks outside of the Urban Service Boundary is permissible to accommodate structures (e.g., residential, commercial, accessory) and septic systems, and only when the Board of Supervisors finds that the fill will not impede water flows or storm runoff capacity. Such development shall not cause an increase in base flood elevation of the 100-year floodplain exceeding 0.10 feet, unless analysis clearly indicated that the physical and/or economic use of adjacent property within the floodplain will not be adversely affected. A permit is required if the fill is within the jurisdiction of the Central Valley Flood Protection Board.	Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events Flood-05: Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces
Safety	SA-11. The County shall implement the improvement of natural drainage channels and certain floodplains for urbanized or urbanizing portions of the County to reduce local flooding. Such improvements shall comply with the General Plan policies contained in the Conservation Element, Urban Streams, and Channel Modification Section.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions
Safety	SA-12. The County shall continue local efforts that encourage implementation of the Federal Flood Insurance Program.	
Safety	SA-13. Where new upstream development in Sacramento County will increase or potentially impact runoff onto parcels downstream in a neighboring jurisdiction, such as the City of Sacramento, Sacramento County will coordinate with the appropriate neighboring jurisdiction to mitigate such impacts.	Flood-05: Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces
Safety	SA-14. The County shall require, when deemed to be physically or ecologically necessary, all new urban development and redevelopment projects to incorporate runoff control measures to minimize peak flows of runoff and/or assist in financing or otherwise implementing Comprehensive Drainage Plans.	Flood-01: Evaluate and Improve Capacity of Stormwater Infrastructure for High-Intensity Rainfall Events Flood-05: Invest in Use of Pervious Pavements and Landscaping in Developed Areas and Restrict the Use of Paved Surfaces

Element	General Plan Policy Text	Supportive CAP Measures
Safety	SA-15. The County shall regulate, through zoning and other ordinances, land use and development in all areas subject to potential flooding and prohibit urban uses on unprotected flood land.	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-16. Deny creation of parcels that do not have buildable areas outside the 100-year floodplain, or the 200-year floodplain in areas subject to the Urban Level of Flood Protection, unless otherwise allowed in the Floodplain Management Ordinance. (Modified 2016)	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-17. For residential zoning, the area outside the 100-year floodplain, or the 200-year floodplain in areas subject to the Urban Level of Flood Protection, must be contiguous or reasonably situated to provide buildable area for a residence and associated structures. Examples of structures include swimming pools, sheds, barns, detached garages, and other outbuildings that are normally associated with residential development. There may be exceptions (such as the Delta area) as allowed in the Floodplain Management Ordinance. (Modified 2016)	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-18. Vehicular access to the buildable area of newly created parcels must be at or above the 10-year flood elevation. Exceptions may be made when the existing public street from which access is obtained is below the 10-year flood elevation. There may be exceptions (such as the Delta area) as allowed in the Floodplain Management Ordinance.	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-18a. Provide unobstructed access to levees on county-owned lands, whenever practicable, for maintenance and emergencies. Require setbacks and easements to provide access to levees from private property. (Added 2016)	
Safety	SA-18b. Urban flood control levees should have adequate setbacks consistent with local, regional, State, and federal design and management standards. (Added 2016)	
Safety	SA-19. Creation of lots that require watercourse crossings for single lots, or that will likely encourage watercourse crossings to be built by property owners (lots with useable area on both sides of a watercourse) will not be allowed unless a detailed hydraulic study is approved by Water Resources and there is found to be no adverse impact in accordance with the County Floodplain Management Ordinance.	
Safety	SA-20. Levees for the purpose of floodplain reclamation for development shall be strongly discouraged. Floodplain restoration shall be encouraged to provide flood protection and enhancement and protection of a riparian ecosystem.	Flood-03: Identify New Locations for Flood Control, Prioritizing Green Infrastructure Solutions

Element	General Plan Policy Text	Supportive CAP Measures
Safety	SA-21. If levee construction is approved to reclaim floodplain for new development, 200- year flood protection is required.	
Safety	SA-22. Areas within a 100-year floodplain, or within the 200-year floodplain in areas subject to the Urban Level of Flood Protection, shall not be upzoned to a more intensive use unless and until a Master Drainage Plan is prepared that identifies areas of the floodplain that may be developed. (Modified 2016)	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-22a. Sacramento County will evaluate development projects and all new construction located within a defined Flood Hazard Zone (FHZ) to determine whether the 200-year Urban Level of Flood Protection or 100-year FEMA flood protection applies, and whether the proposed development or new construction is consistent with that standard. Prior to approval of development projects or new construction subject to either standard, the appropriate authority must make specific finding(s) related to the following: a. Urban Level of Flood Protection standard (200-year) applies to projects in a Flood Hazard Zone that meet certain criteria, developed by the State of California Department of Water Resources, related to urbanization, watershed size and potential flood depth. b. b. Federal Emergency Management Agency (FEMA) standard of protection (100- year) applies to projects in a Special Flood Hazard Area that are not subject to the Urban Level of Flood Protection. (Added 2016)	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-22b. New development shall be elevated as required by the applicable flood standards (100-year, or 200-year in areas subject to the Urban Level of Flood Protection) and should be constructed to be resistant to flood damage consistent with the Floodplain Management Ordinance. (Added 2016)	SLR-01: Coordinate with Other Agencies on Floodplain Mapping Updates and Identification of Improvements to Protect Vulnerable Populations, Functions, and Structures
Safety	SA-23. The County shall require that all new development meets the local fire district standards for adequate water supply and pressure, fire hydrants, and access to structures by firefighting equipment and personnel.	
Safety	SA-24. The County shall require, unless it is deemed infeasible to do so, the use of both natural and mechanical vegetation control in lieu of burning or the use of chemicals in areas where hazards from natural cover must be eliminated, such as levees and vacant lots.	Fire-04: Coordinate and Improve Emergency Preparedness Systems
Safety	SA-25. The County shall work with local fire districts to develop high visibility fire prevention programs, including those which provide voluntary home inspections and awareness of home fire prevention measures.	Fire-04: Coordinate and Improve Emergency Preparedness Systems
Safety	SA-26. The County and fire districts shall develop programs to provide citizens with self-preparedness and community readiness skills for large or extended accidental, natural, and terrorist emergencies/incidents.	Fire-04: Coordinate and Improve Emergency Preparedness Systems

Element	General Plan Policy Text	Supportive CAP Measures
Safety	SA-27. The County shall require, where appropriate, the use of fire resistant landscaping and building materials for new construction developments that are cost effective.	
Safety	SA-28. The County shall encourage and require, to the maximum extent feasible, automatic fire sprinkler systems for all new commercial and industrial development to reduce the dependence on fire department equipment and personnel.	
Safety	SA-30. The County, medical community, and fire districts shall work to improve EMS response system that includes first responder emergency care and transportation services. <ul style="list-style-type: none"> ▶ Properly locating resources to provide timely response ▶ Paramedic services from every fire station 	
Safety	SA-31. The County shall continue to maintain, periodically update, and test the effectiveness of its Emergency Response Plan.	Fire-04: Coordinate and Improve Emergency Preparedness Systems
Safety	SA-32 The County will implement the Local Hazard Mitigation Plan in the planning and operations of the County to achieve the goals, objectives, and actions of the County's Local Hazard Mitigation Plan.	
Safety	SA-33. The County shall continue its coordinative efforts, including evacuation planning, with service agencies, the cities within the County, and cities within surrounding counties.	Measure Fire-04: Coordinate and Improve Emergency Preparedness Systems Measure Flood-4: Coordinate with Federal, State, and Local Agencies to Improve Emergency Evacuation and Supply Transportation Routes
Safety	SA-34. The County shall increase its efforts to inform and educate the general public of disaster response and emergency preparedness procedures.	Measure Fire-04: Coordinate and Improve Emergency Preparedness Systems
Safety	SA-35. The County shall ensure that the siting of critical emergency response facilities such as hospitals, fire, sheriff's offices and substations, and other emergency service facilities and utilities have minimal exposure to flooding, seismic and geological effects, fire, and explosions.	Temp-01: Protect Critical Infrastructure Vulnerable to Extreme Heat Events Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable
Safety	SA-36. The County shall require that high intensity land uses proposed in areas highly susceptible to multiple hazards, such as the Delta, provide mitigation measures that include emergency evacuation routes. Consideration shall be given to the need for additional roads, particularly in the Delta, that	Measure Fire-04: Coordinate and Improve

Element	General Plan Policy Text	Supportive CAP Measures
	<p>may serve as evacuation routes. The County Regional Emergency Operations Office has a study of evacuation routes for various levee breach scenarios for reaches of the Sacramento River north of Freeport and for the American River.</p>	<p>Emergency Preparedness Systems</p> <p>Flood-04: Coordinate with Federal, State, and Local Agencies to Improve Emergency Evacuation and Supply Transportation Routes</p>
Safety	<p>SA-37. The County shall continue to maintain its response to flood emergencies by maintaining and updating the following:</p> <ul style="list-style-type: none"> ▶ Flood Emergency Action Plan, to address potential flooding in levee and dam inundation areas, consistent with the California Water Code, and; ▶ Community flood evacuation and rescue maps, making them available to the public, as appropriate. (Added 2016) 	<p>Flood-06: Map Critical Facilities and Infrastructure Locations Vulnerable to Flooding and Upgrade and/or Relocate Infrastructure Where Applicable</p>

APPENDIX D – PUBLIC ENGAGEMENT

D.1 SUMMARY OF COMMUNITY OUTREACH

Local action on climate change requires active and ongoing partnerships between residents, businesses, the County, agencies, and organizations. Starting in August 2016, the County prioritized engagement and outreach throughout the CAP development process to ensure the CAP provides feasible, equitable, and implementable measures. The goals of the outreach process were to: (1) raise awareness of climate change and the need for this CAP; (2) inform stakeholders and the public about the CAP; (3) gather input at the various steps of CAP development; and (4) provide opportunities to influence decision-making. The County provided CAP updates via a dedicated project website, electronic mail notifications, community meetings, and press releases.

A summary of stakeholder and public outreach events is included in Table D-1. The County hosted four public workshops at various community locations (including two disadvantaged communities) to ensure that the CAP captured the ideas and concerns of residents and businesses. Outreach media were produced to advertise community events, solicit input on the CAP, and provide general information on the CAP development process. All flyers for community events were produced in both English and Spanish. In 2020 a stakeholder group representing a wide variety of interests was formed to provide input on the CAP. The Stakeholder Working Group was comprised of representatives from: 350 Sacramento; Associated Builders and Contractors, Inc.; Capital Region Climate Readiness Collaborative; Community Resource Project, Inc., Environmental Council of Sacramento; Lewis Group of Companies; North State Building Industry Association; Sacramento Metropolitan Air Quality Management District; Sacramento Municipal Utility District; Sacramento Regional Builders' Exchange; and Sierra Club Mother Lode Chapter.

Stakeholders and the public shaped the strategies and measures in this CAP in several ways, from attending meetings and providing comments, sending emails and letters, and participating in stakeholder calls. Comments have ranged from suggesting ideas for GHG reduction and adaptation to highlighting especially urgent and important issues that the CAP should prioritize. Themes that emerged from the outreach focused on GHG reduction included the need to: reduce water consumption, consider zero-waste goals, prioritize food recovery before composting, incentivize electric vehicles (EVs) and rooftop solar, encourage signups for the Sacramento Municipal Utilities District's (SMUD) Greenergy program, improve transit connectivity, target transportation improvements in disadvantaged communities, reduce sprawl, protect farmland, and prioritize measures with co-benefits. Themes that emerged from the outreach relating to adaptation and resiliency included: the importance of urban forestry, considering rain barrels and greywater as strategies to address changing precipitation patterns and drought, the need to specifically assess climate impacts to the Delta such as saltwater intrusion, and the urgency of increasing wildfire risk.

An additional opportunity for public input on a draft version of the CAP was provided in March 2021. Letters received during the Draft CAP's comment period are included in Section D.2. An associated environmental document will be published concurrent with release of the Final Draft CAP and available for public review and comment for 30 days. Additional public input on the CAP and CEQA environmental document will be heard at Planning Commission and Board of Supervisors meetings anticipated for late 2021.

Table D-1 Summary of CAP Stakeholder Meetings and Public Workshops

Event	Date	Description
Stakeholder Meeting	August 24, 2016	Project kickoff meeting for stakeholders to understand the purpose of the CAP and CAP development process.
Stakeholder Meeting	September 13, 2016	Meeting with VG Consulting.
Stakeholder Meeting	October 6, 2016	Meeting with Community Resource Project.
Neighborhood Meeting	October 17, 2016	Presentation to MLK Neighborhood Association.
Neighborhood Meeting	October 20, 2016	Presentation to South Oak Park Community Association.
Public Workshop #1 and #2	November 15 and 16, 2016	Initial set of public workshops held at different locations within the County to raise awareness of the CAP and get feedback and ideas for GHG emissions reduction strategies.
Public Workshop #3 and #4	February 6 and 9, 2016	Set of public workshops held at different locations within the County to raise awareness of the CAP and get feedback and ideas for climate change adaptation and resiliency strategies.
Stakeholder Meeting	March 21, 2017	Meeting with the Sacramento Metropolitan Air Quality Management District to discuss strategies related to energy efficiency and consumption, VMT, and CH ₄ emissions.
Board Workshop	May 24, 2017	Board of Supervisors workshop to discuss the 2015 GHG emissions inventory and forecasts and climate change vulnerability assessment.
Stakeholder Meeting	June 15, 2017	Meeting with the North State Building Industry Association.
Stakeholder Meeting	January 4, 2018	Meeting with the Sacramento Municipal Utility District.
Stakeholder Meeting	February 23, 2018	Meeting with the Delta Stewardship Council.
Stakeholder Meeting	February 27, 2018	Meeting with the Pacific Gas & Electric Company.
Stakeholder Meeting	March 19, 2018	Meeting with Teichert.
Stakeholder Meeting	March 21, 2018	Meeting with the Sacramento Association of Realtors.
Stakeholder Meeting	March 28, 2018	Meeting with the Sacramento Region Business Association.
Stakeholder Meeting	March 29, 2018	Meeting with the North State Building Industry Association.
Stakeholder Meeting	April 19, 2018	Meeting with the Sacramento Metropolitan Fire District.
Stakeholder Meeting	April 19, 2018	Meeting with the Environmental Justice Advisory Committee.
Stakeholder Meeting	April 26, 2018	Meeting with the Sacramento Regional Builders Exchange.
Stakeholder Meeting	April 26, 2018	Meeting with the California Sierra Club.
Stakeholder Meeting	April 30, 2018	Meeting with the Sacramento Municipal Utility District.
Stakeholder Meeting	May 1, 2018	Meeting with the Sacramento Association of Realtors.
Stakeholder Meeting	May 3, 2018	Meeting with the Sacramento Electric Vehicle Association.
Stakeholder Meeting	May 8, 2018	Meeting with the Capital Region Climate Readiness Collaborative.
Stakeholder Meeting	May 9, 2018	Meeting with the Sacramento Sierra Club.
Stakeholder Meeting	May 17, 2018	Meeting with 350 Sacramento.
Stakeholder Meeting	May 22, 2018	Meeting with the Environmental Council of Sacramento.
Stakeholder Meeting	May 22, 2018	Meeting with the Capital Region Climate Readiness Collaborative.
Stakeholder Meeting	August 16, 2018	Meeting with the Sacramento Sierra Club.
Stakeholder Meeting	October 29, 2018	Meeting with 350 Sacramento.

Event	Date	Description
Stakeholder Meeting	December 3, 2018	Presentation to the American River College class.
Stakeholder Meeting	August 12, 2020	Meeting with Stakeholder Working Group ¹
Stakeholder Meeting	August 19, 2020	Meeting with Stakeholder Working Group
Stakeholder Meeting	September 24, 2020	Meeting with Stakeholder Working Group
Stakeholder Meeting	November 19, 2020	Meeting with Stakeholder Working Group
Public Workshop	March 15, 2021	Public Workshop presenting Draft CAP Document at Sacramento Environmental Commission Meeting
Stakeholder Meeting	May 11, 2021	Meeting with Stakeholder Working Group

Source: Ascent Environmental 2021.

D.2 COMMENT LETTERS RECEIVED FOR DRAFT CAP

The following pages contain comment letters received by County planning staff during the comment period following publication of the Draft CAP.

Taylor. Todd

From: Kathy Les <kathy.les321@gmail.com>
Sent: Thursday, March 11, 2021 4:57 PM
To: PER. climateactionplan
Subject: Electrify Landscape Equipment

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

I am writing to whole-heartedly support measures proposed in the county Climate Action Plan. I especially encourage rapid adoption of the measure to create an incentive program to trade in gas-powered landscaping equipment for electric and zero-emission versions.

Everyday local residents are assaulted with noise and air pollution from gas powered lawn equipment, mainly that used by professional landscapers. Polluted lawn equipment is damaging to the health of the workers who use it and to the residents in the vicinity of its use. The California Air Resources Board projected gas lawn equipment would be more polluting than cars by 2020.

Please move forward on this important measure!

Kathy Les
Curtis Park, Sacramento

- Low and Zero Emissions Vehicles and Equipment: Support electrification and alternative fuels in on- and off-road vehicles and equipment, as well as fuel efficiency measures that would reduce the amount of gasoline and diesel fuel consumed.

MEASURE GHG-09: ELECTRIC LANDSCAPING EQUIPMENT

Measure: The County will work with SMAQMD to establish an incentive program to trade in fossil fuel-powered landscaping equipment with electric versions.

Implementation: Create a drop-off point for fossil-fuel powered landscaping equipment at the North Area Recovery Station Household Hazardous Waste Facility, and other appropriate County-operated facilities.

Responsibility: DWMR and SM

Timeframe: Near-term

GHG Reduction Potential: Not quantified.

Sector: Off-Road Vehicles

Target Indicator: Track the number of vouchers issued for the exchange of fossil-fuel powered lawnmowers, leaf blowers, and weed eaters.

Taylor. Todd

From: Ron Brasel <rbrasel2@gmail.com>
Sent: Thursday, March 11, 2021 6:29 PM
To: PER. climateactionplan
Subject: Charging stations for micromobility

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Ebikes and scooters have exploded the micromobility sector in Transportation during the pandemic as an alternative to carpooling and public transportation. Charging stations will be an integral part of the infrastructure for continued growth. Public/private partnerships are needed to help achieve municipalities goals.

Taylor. Todd

From: nancy mckeever <nancyjmckeever@gmail.com>
Sent: Monday, March 15, 2021 2:47 PM
To: PER. climateactionplan
Subject: SUPPORT - Measure GHG-09: Electric Landscaping Equipment and Trade-In Program

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

County Supervisors and Staff,

I am writing to express strong **support for MEASURE GHG-09: ELECTRIC LANDSCAPING EQUIPMENT** in the proposed Climate Action Plan and to **encourage rapid adoption and full implementation of a County/SMAQMD incentive program to trade in gas-powered landscaping equipment** for electric and zero-emission equipment.

The California Air Resources Board projected gas-powered lawn equipment would be more polluting than cars by 2020. Clearly, electrification of landscaping equipment is an essential effort toward achieving climate goals. In addition to the extreme pollution emitted from two and four stroke gas-powered engines, they are much louder than electric-powered equipment, which both damages the hearing of the workers who use them and the residents in the vicinity. With an affordable, off-the-shelf alternative to highly polluting gas-powered landscaping equipment already available, this measure should be immediately implemented.

Thank you,
Nancy McKeever
Sacramento, CA

Sent from [Mail](#) for Windows 10

Taylor. Todd

From: Taylor. Todd
Sent: Monday, March 29, 2021 12:58 PM
To: PER. climateactionplan
Subject: FW: Proposed All-Electric Requirement for Future Residential Development
Attachments: Proposed All-Electric Requirement for Future Residential Development- Sacramento Housing Alliance.pdf

From: Ejiro Okoro <Ejiro@sachousingalliance.org>
Sent: Monday, March 29, 2021 12:44 PM
To: smithtodd@saccounty.net; Lundgren. John <lundgrenj@saccounty.net>; Taylor. Todd <taylor@t@saccounty.net>
Cc: Kendra Lewis <kendra@sachousingalliance.org>; cathy creswell <cat.creswell@comcast.net>
Subject: Proposed All-Electric Requirement for Future Residential Development

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Good day,

Please see the following letter regarding the proposed all electric requirement for future residential development. Please feel free to contact us if you have any questions, and we are available to meet to further discuss proposals.



<https://sachousingalliance.org/>

March 26, 2021

Sacramento County Board of Supervisors
700 H Street
Sacramento, CA 95814

RE: Proposed All-Electric Requirement for Future Residential
Development

Dear Honorable Chairwoman Frost and Members of the Board of
Supervisors:

On behalf of the Sacramento Housing Alliance (SHA), we are writing regarding the County's proposed all-electric policy for new residential development. The Sacramento Housing Alliance's affordable housing developers have led on sustainable building practices and support the County's all-electric proposal with three caveats.

First, the County must synchronize its all-electric policy with SMUD's adopting a "Virtual Net Energy Metering" billing option for multifamily rental properties. Virtual Net Energy Metering allows individual renters to benefit from on-site energy generation by allowing monthly crediting against tenant-paid utility bills. In addition, affordable rental housing developers can borrow larger sums based upon anticipated savings from that on-site generation and smaller utility allowances that otherwise reduce rental income. While private Investor Owned Utilities, like PG&E, provide a Virtual Net Energy Metering billing feature, SMUD does not. All-electric affordable multifamily developments are not feasible without SMUD providing a Virtual Net Energy Metering billing feature, and the County should not apply the proposed policy to affordable rental developments until SMUD has such a billing system in place.

Second, the up-front costs associated with installing all-electric systems are higher than including some gas features. Our nonprofit affordable housing developers estimate a seventy-five hundred to fifteen thousand dollar (\$7,500 - \$15,000) per-unit cost increase for all-electric systems. The County should work closely with local developers to mitigate those costs since State affordable housing funding sources are now competitively rewarding development cost reduction.

SHA
Board of Directors

Cathy Creswell
President
At-large

Paul Ainger
Treasurer
Volunteers of America

Valerie Feldman
Secretary
At-large

LaShawnda Barker
At-large

Stephan Daues
Mercy Housing

Tamie Dramer
Organize Sacramento

Jenn Fleming
Mercy Housing

John Foley
Sacramento Self Help
Housing

Nur Kausar
At-large

Stanley Keasling
At-large

Alicia Sebastian
California Coalition for
Rural Housing

Rachel Smith
Rural Community
Assistance Corporation

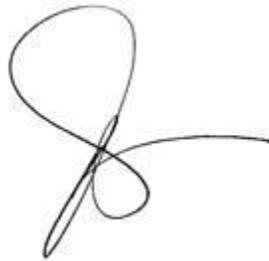
Holly Wunder-Stiles
Mutual Housing
California

Finally, SHA's developers would reflect additional all-electric costs in their local funding applications. The County should increase its loan amounts available for such affordable housing developments.

In closing, SHA supports the all-electric proposal, with our three caveats. Thank you.

CC. Todd Smith
Principal Planner
Long Range Planning & Master Plans
Sacramento County

Sincerely,

A handwritten signature in black ink, appearing to be 'Kendra Lewis', with a large loop at the top and a horizontal line extending to the right.

Kendra Lewis, Executive Director
Sacramento Housing Alliance

A handwritten signature in black ink, appearing to be 'Cathy Creswell', written in a cursive style.

Cathy Creswell, Board President
Sacramento Housing Alliance

Taylor. Todd

From: Virginia Volk-Anderson <vanderv@surewest.net>
Sent: Saturday, April 3, 2021 2:39 PM
To: PER. climateactionplan
Subject: Draft CAP

EXTERNAL EMAIL: If unknown sender, do not click links/attachments.

While I appreciate that a great deal of effort has gone into creating the CAP, the document is disappointing in several ways. Firstly, we are in a crisis as vividly presented in the Climate Emergency Declaration adopted by Sacramento County. The CAP does not reflect the urgency of the situation or fully align with the declaration; the declaration should guide the CAP. Another concern is that the CAP allows for sprawl, which will only increase miles driven and lead to greater GHG emissions while simultaneously destroying more of the county's tree canopy. There needs to be a much stronger emphasis on infill. And thirdly, the CAP seems to kick a lot of implementation down the road, with little action for at least two-to-three years.

Thank you for your consideration of my comments and concerns.

Virginia Volk-Anderson
1408 La Sierra Drive
Sacramento, CA 98864

Taylor. Todd

From: Ronnie Jeanne Amato <outlook_472D695ED88EEA44@outlook.com>
Sent: Saturday, April 3, 2021 9:45 PM
To: PER. climateactionplan
Subject: Too many Dismissals

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

There was so much to go through but I didn't see anything for "grey water" Innovation.

I think a priority is to get government offices on solar electricity. Certainly gyms could be made to utilize their electrical equipment supplied by customers' activity. That should not be difficult for an engineer to device.

My personal hope is to get all electricity appliances, solar electricity and then I can purchase an EV. It would be helpful is there was incentive for "instant hot water." Much of my water is wasted waiting for the heated water. The Fair Oaks Water District could provide service personnel to evaluate and implement water heaters in residences and innovation for recycling grey water.

Everyone who has some land, about up to ½ acre, should be required to grow something of value for the community. It is the privilege of having that land. It could be a fruit tree or tomatoes. These items can be collected by the owner and deposited in the Food Banks or put at curb or allowed designated others to pick and deposit at the Food Banks or curb. More crazy ideas column might get us going on what we have to do.

Sent from [Mail](#) for Windows 10

From: Barbara Baran <b.baran@comcast.net>
Sent: Sunday, April 4, 2021 11:37 AM
To: PER. climateactionplan
Subject: National Council of Jewish Women-Sacramento Comments on proposed Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

To whom it may concern:

As a resident of Sacramento and member of the National Council of Jewish Women-Sacramento, I urge that the proposed Climate Action Plan include the following:

1. The public draft of the CAP should specifically address the directives and goals of the County of Sacramento Climate Emergency Declaration (CED). This is just common sense as well as good government. The CAP is the foundational document of the county's response to climate change and the current version should address the goals and actions needed to mitigate the climate crisis now. Delaying inclusion of mitigation measures and goals until the next CAP will have significant deleterious consequences.
2. The public outreach for the CAP needs to be improved in several ways: by lengthening the public comment period to 60 days from 30 days, and by seeking public participation through many methods of outreach, including more workshops for the public. The current review process for the CAP has provided less opportunity for public involvement than other current County plans. Public outreach should be consistent with the CED directive that "*the scope and scale of action necessary to stabilize the climate will require unprecedented levels of public awareness, engagement and deliberation to develop and implement effective, just and equitable policies to address the climate crisis.*"

3. The CAP needs to provide a specific implementation plan for the suggested measures, which includes regular monitoring and methods to adapt to changing conditions.
4. The CAP should commit to keeping and using carbon offset funds locally, by funding local measures which reduce greenhouse gas emissions and/or help the community adapt to climate change impacts.
5. Environmental Justice measures, which mitigate the impacts of climate change on communities that suffer the greatest impacts, as identified by the CED, need to be included in the plan. Carbon offsets should be identified as a funding source.
6. The plan should include provisions for land use measures which will stabilize greenhouse emissions, including incentives for infill development and development near transportation hubs. The plan should address current county policies which facilitate “leapfrog” development that result in increasing greenhouse gas emissions due to increased transportation emissions.

Thank you for your time and consideration,

Barbara Baran
National Council of Jewish Women-Sacramento

Taylor. Todd

From: Claire <clairelipschultz@gmail.com>
Sent: Sunday, April 4, 2021 11:44 AM
To: PER. climateactionplan
Subject: Comments on Sacramento Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

As a resident of Sacramento County I commend the steps taken toward creating a plan to address the all important issue of climate change. However there are some deficiencies in the plan which I outline below. Please take all measures necessary to ensure a comprehensive, effective Plan.

Thank you for your consideration.

Claire Lipschultz,
6344 Palm Drive
Carmichael,CA.

1. The public draft of the CAP should specifically address the directives and goals of the County of Sacramento Climate Emergency Declaration (CED). This is just common sense as well as good government. The CAP is the foundational document of the county's response to climate change and the current version should address the goals and actions needed to mitigate the climate crisis now. Delaying inclusion of mitigation measures and goals until the next CAP will have significant deleterious consequences.
2. The public outreach for the CAP needs to be improved in several ways: by lengthening the public comment period to 60 days from 30 days, and by seeking public participation through many methods of outreach, including more workshops for the public. The current review process for the CAP has provided less opportunity for public involvement than other current County plans. Public outreach should be consistent with the CED directive that *"the scope and scale of action necessary to stabilize the climate will require unprecedented levels of public awareness, engagement and deliberation to develop and implement effective, just and equitable policies to address the climate crisis."*
3. The CAP needs to provide a specific implementation plan for the suggested measures, which includes regular monitoring and methods to adapt to changing conditions.
4. The CAP should commit to keeping and using carbon offset funds locally, by funding local measures which reduce greenhouse gas emissions and/or help the community adapt to climate change impacts.
5. Environmental Justice measures, which mitigate the impacts of climate change on communities that suffer the greatest impacts, as identified by the CED, need to be included in the plan. Carbon offsets should be identified as a funding source.

6. The plan should include provisions for land use measures which will stabilize greenhouse emissions, including incentives for infill development and development near transportation hubs. The plan should address current county policies which facilitate “leapfrog” development that result in increasing greenhouse gas emissions due to increased transportation emissions.

Thank

Taylor. Todd

From: Elliott Wezerek <ewezerek@gmail.com>
Sent: Sunday, April 4, 2021 8:11 PM
To: PER. climateactionplan
Subject: GHG Reduction Methodology

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Hello,

I have one comment on the County's recently drafted CAP.

Table 1, *Summary of GHG Reduction Measures*, cites "Ascent Environmental 2021" as the source for the emission reduction values. This source does not appear in the references section and is not presented as an appendix or as a separate document elsewhere on the CAP website. Please provide the emission reduction calculation methodology for each measure that appears in Table 1.

Thank you,
Elliott

Taylor. Todd

From: Steve Letterly <sletterly@letterlymgmt.com>
Sent: Monday, April 5, 2021 9:25 AM
To: PER. climateactionplan
Cc: Smith. Todd; 'demetercorp@sbcglobal.net'; Margie Campbell; John Norman; 'George Phillips (gphillips@phillipslandlaw.com)'; Gregory Thatch; Moffitt. Leighann; Lundgren. John
Subject: Grandpark Comments On Sacramento County Draft Climate Action Plan (CAP)
Attachments: Grandpark County of Sacramento draft CAP comment letter April 5 2021.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Thank you for allowing the opportunity to comment on the draft CAP. Attached are the comments from the Grandpark Owners Group, project applicants for the Grandpark Specific Plan.

Steve Letterly
Grandpark Project Manager
sletterly@letterlymgmt.com
cell 949-422-2860



April 5, 2021

GRANDPARK COMMENTS SACRAMENTO COUNTY DRAFT CLIMATE ACTION PLAN

Thank you for providing the Grandpark Specific Plan team the opportunity to provide comments regarding the Draft Climate Action Plan (CAP). Grandpark is a 5,700-acre mixed use specific plan proposed in the northwest portion of the County of Sacramento. As a major proposed development, the project applicants were requested to help fund development of Phase II of the CAP. The project applicants concurred with assisting with CAP II funding and appreciate the hard work by the County and consultant team in developing the draft document. Upon review of the draft, we do have questions and appreciate the opportunity to provide these comments.

General Comments

1. The Plan in many areas is vague and needs definition to be useful to applicants. It would be helpful to provide intent language that sets forth how the CAP is to be used to guide future development in unincorporated Sacramento County. For example, is the CAP intended to be used as a menu of mandatory and optional measures from which development projects may choose in order to meet quantified mitigation obligations for development? If so, please clarify. How does a project illustrate consistency with the CAP? Unlike the County's recent VMT thresholds, we could not ascertain a clear method of illustrating consistency.
2. A number of the GHG mitigation measures are not quantified. How can the unquantified measures accurately portray reduction of GHG emissions within the County? How will projects be able to use the mitigation measures to reduce GHG emissions if no quantification is provided?

1

3. On page one of the CAP it states that the plan has been developed in response to mitigation measures contained in the County’s General Plan. Yet there is no accommodation for future projects that are consistent with the General Plan. Would a project consistent with the General Plan also be considered consistent with the CAP? What will be the review process under the CAP for such projects?

4. Table 1; Sacramento County Baseline and Forecast GHG Emissions by Sector (Off-Road Vehicles). Table 1 identifies an increase in GHG emissions for the Off-Road Vehicle Sector between 2015 and 2030. The 2015 BAU emissions presented in the CAP appear to be from a 2016 memo published by Ascent Environmental. This memo also includes a projection of 2030 BAU. The CAP should have taken this 2030 BAU and scaled down emissions based on all relevant state, federal, and district regulation. While this appears to be the case for every other source category, there is no reduction taken for off-road equipment, even though the emissions from off-road equipment are expected to decrease due to idling limits, low carbon fuel standards, etc. It seems appropriate to incorporate off-road regulations in the 2030 emission forecast.

Comments on GHG Reduction Measures

1. Measure GHG-02: Urban Forestry

How will the County maintain and enhance the urban forest? Will there be a verification process in place to measure the reduction in GHG emissions? What is the measure of success for such a program? How will the County ensure that the trees required to be planted through the Zoning Code are properly maintained to maximize tree health? Who will be responsible for the cost?

2. Measure GHG-05: Increase Energy Efficiency in New Commercial Buildings

Would the reach code exceed state building code requirements? If so, how far beyond the State minimum requirements will the reach code go? Will there be incentives for complying with the reach code? How can this GHG reduction be quantified when no specifics are given?

3. Measure GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings

Is it anticipated that a credit program will be established by which developers can purchase credits the funds from which will be used to retrofit existing residential units? By including an option that allows funding of a credit program that assist residential retrofitting, such a program could provide superior reductions in energy consumption and address social equity. If so, what is the timing anticipated for developing the program? Combining the reductions that would occur through improving energy efficiency in existing residential units with partial elimination of fossil fuel consumption in new residential buildings (GHG-07) could result in greater emission reductions and provide economic and environmental benefits to underserved communities. The GHG measures should be presented as a menu approach with an overall Project reduction target.

4. Measure GHG-07: Eliminate Fossil Fuel Consumption in New Residential Buildings

SMAQMD identifies all electric residential units in new development as an option to reduce GHG emissions. We suggest mirroring this approach, rather than making it a mandatory obligation if a project can implement measures with equivalent emission reductions as all electric homes. The SMAQMD, in June 2020, finalized the document, Greenhouse Gas Thresholds for Sacramento County. In it SMAQMD included best management practices which included no natural gas. However, it stated that alternatives may be proposed that demonstrate the same level of GHG reductions as no natural gas. (Greenhouse Gas Thresholds for Sacramento County, pg. 39). Can there be alternatives for eliminating fossil fuel for projects that could demonstrate that they can reduce GHG in other ways? What about projects where all electric is infeasible? Will there be an infeasibility exception?

5. Measure GHG-08: Tier 4 Final Construction Equipment

Is there a phase-in timeline for this update? Is it only after January 1, 2030 that a Project application must include 100% Tier 4 final engines or electric engines? Additionally, Tier 4 engines do not reduce GHGs, and can often have climate penalty due to increased power needs for necessary control technology (SCR and DPF). Can renewable diesel be used in lieu of a Tier 4 engine? Renewable diesel would have a GHG benefit.

6. Measure GHG-09: Electric Landscaping Equipment

How and when will “not quantified” measures be quantified to determine the effect of their implementation? Similar to GHG-06 could implementation of this measure benefit from establishment of credit purchase program.

7. Measure GHG-11: Reduce Emissions from New Residential and Office/Business Professional Development Vehicle Miles Traveled

The component pieces of the VMT Mitigation Program should be identified. How would the VMT mitigation fee, bank or exchange work? When will the guidance be developed? Would there be a cost backstop for this measure? Is there more information about the VMT-related funding mechanism?

How will emission reduction requirements be adjusted over time to acknowledge ongoing changes to commute patterns and volumes due to fundamental and likely permanent shifts to working from home for many occupations? How will emission reduction requirements be adjusted over time to acknowledge increases in E-commerce and mobile delivery services and reductions in VMT?

Does the regional average include all of SACOG’s five counties? The second bullet states, “Develop and adopt a VMT mitigation program... to offset project-level and cumulative VMT impacts...”. If a project exceeds the “regional” average, it will most likely have to pay an impact fee. What if the project could be mitigated so as to not have a significant impact? Should the line state “to offset an unmitigated impact” from VMT? Will payment of VMT fees equate to a reduction in a projects VMT and potential consistency with VMT thresholds?

8. Measure GHG-12 Transportation System Management Plan for Non-Residential Projects:

Provide information on what is the criteria for a “qualifying project”. How will the minimum trip generation requirements be defined? What will be the basis for this definition? How will the minimum trip generation requirements be determined? The first bullet states, “project types and sizes required to implement a TSM Plan,” this bullet is unclear and needs further description. What type of project? What size? This requirement needs to be defined.

The third bullet states, “development of monitoring and reporting requirements that developers or property owners would be responsible for submitting to the county on an annual basis.” This is incredibly burdensome. What type of reporting requirements? What is being monitored? Will reporting annually be indefinite? How will it be enforced, especially when property may be transferred many times.

9. Measure GHG-13: Revise Parking Standard for Non-Residential Development

How will shared parking be implemented and required? What does unbundling parking for new development mean? Is there a quantitative goal for the revised parking standards? What constitutes success for this measure?

Prior to the County updating the parking standards by end of 2022 pending Specific/Master Plans should be provided the opportunity to pursue revised parking standards.

10. Measure GHG-14: Improved Transit Access

This measure should acknowledge changes in future travel patterns, vehicle ownership and growth in ride sharing opportunities, and how this evolution will either complement, or in some cases replace, traditional transit service.

Where will the County seek funding to plan and construct roadways, bikeways, and pedestrian improvements? How will the needed improvements be determined? Will there be an increase of fees for developers to build these improvements? If so, where is the nexus?

11. Measure GHG-15: Improved Pedestrian Network and Facilities

Develop quantified credits to new development that implement innovative bike/ped facilities/connections within a project. Such credits will incentivize future development. If there is no quantified credit received, why do it?

How will the VMT mitigation program funding mechanism be divided among the different improvements? Will there be a priority list for the improvements?

The VMT mitigation program seems to be the funding mechanism of many improvements. Will the VMT mitigation program be able to cover the cost of all these improvements?

12. Measure GHG-16: Traffic Calming Measures

Quantified credits for the various traffic calming measures should be developed.

13. Measure GHG- 17: Improved Bicycle Network and Facilities

Quantified credits should be developed. Projects that have high a ratio of bike lanes/trails per square mile, provide a variety of bike lane classes (Class 1 through 4) and are planned to logically connect residences with activity nodes should receive quantified credits.

14. Measure GHG -19: EV Parking Code

What is the proposed timeline for this update?

15. Measure GHG-21: Update Community and Corridor Plans

This measure should provide for high density residential development as of right in all commercial zones county-wide, with only design review to better assist intensification in infill and corridor areas.

16. Measure GHG-22: Connecting Key Destinations

Develop quantified credits to new development that achieves the target indicators. Is this system only with respect to existing community-supportive destinations? In other words, if the Project includes housing and commercial and community centers, schools, and parks, will these be factored into their score?

How were the distances for each transportation mode determined? Are there support documents as to how these determinations were made?

How will the GIS-based scoring system be developed? What is the proposed timeline for this update? What would the minimum point total be for compliance with the GIS-based scoring system? Who makes this determination? How will the points be assigned?

17. Measure GHG-23: Incentivize Infill Development

Develop quantified credits for incentivizing infill development? How is the Dwelling Unit Equivalent (DUE) defined? How, was the nexus between pending master plans and incentivizing infill development developed? If a pending master plan falls below the VMT thresholds shouldn't the project be exempt from the fee?

This measure appears to assume that VMT will always be increased by a project if it is not infill development. What if a project does not increase VMT? What if all impacts are mitigated? If VMT is not increased, will the infill fee still apply? If VMT is not increased and the infill fee still applies, what is the nexus for requiring developers to pay this fee? Should the fee be based on a sliding scale based on amount of threshold exceedance? Shouldn't payment of fee result in VMT reduction credit? Is the Infill Fee a one-time fee paid only when obtaining building permits?

18. Measure GHG-24: Increase Organic Waste Diversion

What programs will be put in place to increase local capacity for composting and processing of organic waste? Could pending specific plans/master plans be incentivized to implement measures prior to 2030 and if so can credits be quantified?

Climate Change Adaptation Strategy Comments

1. TEMP-04; Encourage the Installation or Use of Cool-Roof Technologies, Passive Solar Home Design, Green Roofs, and Rooftop Gardens

How are "cool roof technologies" defined? How will the incentive programs for installing passive solar technology or green roofs be determined? What is the proposed timeline for the update?

2. TEMP-07: Use Cool Pavement Technology and Reduce the Amount of Paved Surfaces

How are “cool pavement technologies” defined? What is the proposed timeline for this update?

3. TEMP-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover

How will the incentive programs for installing solar PV carports be determined? Could this program be another example of a credit program for existing development to offset emissions from new projects?

The measure discusses revising parking lot shading standards to include larger minimum sizes for tree planters. What size tree planters?

4. WATER -01: Evaluate Vulnerabilities of Water Supply Systems and Networks and Develop Strategies to Improve Resilience

What is the proposed timeline for this update?

5. WATER-04: Reduce Potable Water Use in Outdoor Landscaping

Is there a published list of low-water, drought tolerant species approved for landscaping? What is the timeline for this update?



Appendix E 1.2 Forecast Comment

1. Table E-3 and paragraph on page E-4 states that the 2030 Adjusted BAU Forecast is 16% less than 2015; or 3,202,311 MTCO/year vs. 4,853,647MTCO/year. Isn't the 1.6 million decrease greater than 16%?

Thank you for this opportunity to comment on the draft CAP. If you should have any questions please e-mail or contact me by phone.

Steve Letterly
Grandpark Project Manager
sletterly@letterlymgmt.com
cell 949-422-2860

Taylor. Todd

From: Larry Larsen <llarsen@thatchlaw.com>
Sent: Monday, April 5, 2021 4:44 PM
To: PER. climateactionplan
Cc: Denise Gammon; Holger Fuerst; Smith. Todd; Gregory Thatch
Subject: Community Climate Action Plan Comment Letter - Law Offices of Gregory D. Thatch
Attachments: Community Climate Action Plan Comment Letter - 04-04-2021.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Attached please find the comment letter of today's date regarding the comments of Mr. Thatch on behalf of Cordova Hills, LLC.

Should you wish to discuss the matter further, please do not hesitate to contact Mr. Thatch or me.

Larry C. Larsen
LAW OFFICES OF
GREGORY D. THATCH
1730 I Street, Suite 220
Sacramento, CA 95811
Phone: (916) 443-6956
Fax: (916) 443-4632
E-Mail: llarsen@thatchlaw.com

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April 4, 2021

VIA ELECTRONIC MAIL ONLY

Sacramento County
Planning and Environmental Review
Email: ClimateActionPlan@saccounty.net

RE: Cordova Hills, LLC
Communitywide Climate Action Plan Comments

Dear Staff:

This office represents Cordova Hills, LLC, the Property Owner for the Cordova Hills Project that was approved by the County in 2013. Consistent with the County's Climate Action Plan website directions, we hereby submit the following comments on the Communitywide Climate Action Plan.

As part of the project approvals for the Cordova Hills Master Plan, the County and the Property Owners entered into a written Development Agreement to permit the Property Owners to develop the property consistent with the terms of the Development Agreement. The Development Agreement was entered into on March 12, 2013 and has an initial term of thirty (30) years. The Development Agreement remains in place and continues to apply to development of the Cordova Hills Master Plan.

The draft Climate Action Plan includes a series of proposed Greenhouse Gas Reduction Measures, including GHG-23 – Incentivize Infill Development. While this measure does not quantify the level of Greenhouse Gas reduction to be realized by the proposed infill incentives, it does include a table on page 19 that lists a number of Master Plan areas in the County, including the Cordova Hills Master Plan, upon which the County proposes to impose an "Infill Fee" of "\$1,000 for each Dwelling Unit Equivalent."

Section 4.2.5.2 of the DA addresses Development Impact Fees, Exactions and Dedications and reads as follows (highlights are added for emphasis):

County agrees that Property Owners shall be required to pay only those development impact fees, connection or mitigation fees, or offer dedications of land, or other exactions required by County to support the construction of public facilities and improvements or the provision of public services in relation to development of the Project that are enumerated in Exhibit J to this Agreement. The County and Property Owners agree to meet every five (5) years commencing from the date of issuance of the first Certificate of Occupancy in the Project area to review the list of fees and fee programs specified in Exhibit J and consider the mutual benefit, if any, of amending same. The list of fees and fee programs may only be amended by mutual, written consent of the County and Property Owners.

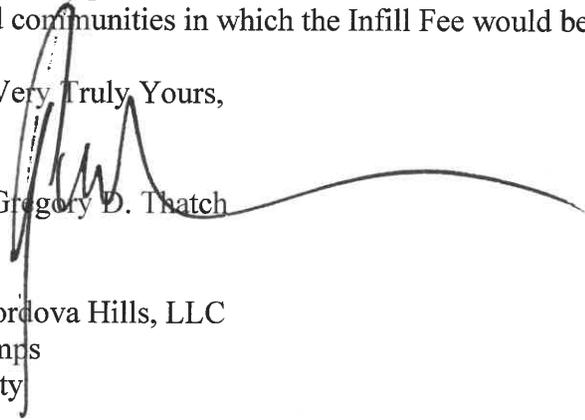
The Development Agreement between the Cordova Hills Property Owners and the County meticulously identified in Exhibit J (copy attached) County impact fees that could be payable by the Property Owners, including a number of possible future fees that might be adopted. No Infill Fee or any synonymous fee is specified in Ex. J. Thus, this Infill Fee, if adopted, cannot be imposed on the Cordova Hills Project.

We also note that, according to the draft Climate Action Plan (page 5), two Specific Plan development agreements approved in 2020 included an Infill Fee requirement – further ancillary evidence that earlier Development Agreements, such as Cordova Hills’, do not include a requirement to participate in any Infill Fee.

On behalf of Cordova Hills, LLC, we respectfully request that the CAP be revised to remove the Cordova Hills Master Plan area from the list of master planned communities in which the Infill Fee would be imposed.

Very Truly Yours,

Gregory D. Thatch



GDT:ll

cc via email: Denise Gammon, President, Cordova Hills, LLC
Holger Fuerst, McKay and Soms
Todd Smith, Sacramento County

EXHIBIT J

DEVELOPMENT IMPACT FEES, EXACTIONS AND DEDICATIONS

A. The Cordova Hills Project shall be subject to the below Cordova Hills Project related districts and programs:

- Cordova Hills Special Plan Area Fee Program.
- Future districts to be established to fund the services identified in the Cordova Hills Urban Services Plan.

B. In addition to the items identified in Section A, the Cordova Hills Project shall only be subject to the below County fee programs and districts to the extent that: i) the fee program or district is in effect at the time of such development approval (e.g., building permit, rezone, tentative map), as specified in each district or program; and ii) the fee program or assessment is applicable to the Cordova Hills Project.

1. The Cordova Hills Project shall be subject to the following County Development Impact fee programs, as they may be adjusted or amended from time to time:

- Sacramento County Transportation Development Fee Program (SCTDF) District 3 Roadway and Transit Fee Program.
- Sacramento Public Library Authority Development Impact Fee Program
- Very Low Income Housing Fee on non-residential properties pursuant to Chapter 16.89 of the Sacramento County Code

2. The Cordova Hills Project shall be subject to the following County special taxes, assessment districts, and utility services or equivalent replacement mechanisms to the satisfaction of the County:

- Sacramento County Police Services CFD No. 2005-1.
- CSA-1 (Safety and Street Lighting).
- Sacramento County Storm Water Utility District.
- CSA-11 (Police Protection and latent Animal Control Services).

3. The Cordova Hills Project shall be subject to the following financing programs or equivalent mechanisms to the satisfaction of the County:

- Any future County-wide Storm Water CFD required to fund maintenance of expanded stormwater/stormwater

quality/hydromodification basins and facilities required as a result of State or Federal mandates and which are not included in the existing County Storm Water Utility program.

- Any future County-wide Roadway Maintenance Financing Mechanism.
- Any future Financing Mechanism adopted by the County on a regional or sub-regional benefit basis related to the Southeast Connector.
- Any future County-wide Regional Park Financing Mechanism.
- Any future County-wide fee programs that are a result of a Federal or State mandate.

From: Patricia Sturdevant <patricia.sturdevant@gmail.com>
Sent: Wednesday, April 7, 2021 7:20 AM
To: PER. climateactionplan
Subject: Comments on Sacramento Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

I am a resident of Sacramento County, and commend the steps you have taken to create a plan to address climate change. However there are some deficiencies in the plan which I have described below. Please take all measures necessary to ensure that your plan will be both comprehensive and effective in addressing this crucially important issue.

Patricia Sturdevant
1836 8th Avenue, Sacramento, CA 95818

1. The public draft of the CAP should specifically address the directives and goals of the County of Sacramento Climate Emergency Declaration (CED). This is just common sense as well as good government. The CAP is the foundational document of the county's response to climate change and the current version should address the goals and actions needed to mitigate the climate crisis now. Delaying inclusion of mitigation measures and goals until the next CAP will have significant deleterious consequences.
2. The public outreach for the CAP needs to be improved in several ways: by lengthening the public comment period to 60 days from 30 days, and by seeking public participation through many methods of outreach, including more workshops for the public. The current review process for the CAP has provided less opportunity for public involvement than other current County plans. Public outreach should be consistent with the CED directive that "*the scope and scale of action necessary to stabilize the climate will require unprecedented levels of public awareness, engagement and deliberation to develop and implement effective, just and equitable policies to address the climate crisis.*"
3. The CAP needs to provide a specific implementation plan for the suggested measures, which includes regular monitoring and methods to adapt to changing conditions.

4. The CAP should commit to keeping and using carbon offset funds locally, by funding local measures which reduce greenhouse gas emissions and/or help the community adapt to climate change impacts.
5. Environmental Justice measures, which mitigate the impacts of climate change on communities that suffer the greatest impacts, as identified by the CED, need to be included in the plan. Carbon offsets should be identified as a funding source.
6. The plan should include provisions for land use measures which will stabilize greenhouse emissions, including incentives for infill development and development near transportation hubs. The plan should address current county policies which facilitate “leapfrog” development that result in increasing greenhouse gas emissions due to increased transportation emissions.

From: Susan Rosenberg <susanarosenberg@gmail.com>
Sent: Wednesday, April 7, 2021 8:57 PM
To: PER. climateactionplan
Subject: Comments on the County of Sacramento Draft Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

I am a resident of Sacramento County and support the development an updated Climate Action Plan (CAP). I am concerned that, in several critical areas, the draft CAP and the public notice procedures are inadequate, as described below. Please take all necessary steps to ensure that the plan itself will address these concerns.

Susan Rosenberg
1704 Potrero Way
Sacramento, CA 95822

1. The public draft of the CAP should specifically address the directives and goals of the County of Sacramento Climate Emergency Declaration (CED). This is just common sense as well as good government. The CAP is the foundational document of the county's response to climate change and the current version should address the goals and actions needed to mitigate the climate crisis now. Delaying inclusion of mitigation measures and goals until the next CAP will have significant deleterious consequences.
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6. The plan should include provisions for land use measures which will stabilize greenhouse emissions, including incentives for infill development and development near transportation hubs. The plan should address current county policies which facilitate “leapfrog” development that result in increasing greenhouse gas emissions due to increased transportation emissions.

Taylor. Todd

From: Jill <jillpz@yahoo.com>
Sent: Thursday, April 8, 2021 9:31 AM
To: Kennedy. Supervisor; Rich Desmond; Supervisor Serna; Nottoli. Don; Frost. Supervisor; PER. climateactionplan
Cc: Edith Thacher
Subject: Citizens' Climate Lobby of Sacramento Comments to Public Draft of County Climate Plan
Attachments: Final CCL Sacramento CAP Comments April 2021.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Good morning,

Attached for your consideration is a letter written on behalf of the Sacramento Chapter of Citizens' Climate Lobby providing our comments to the March 2021 draft of the County Climate Action Plan for which you sought public comment. Thank you for the opportunity to provide input on this extremely important document. We are available to answer any questions you may have after reviewing our letter.

Thank you,

Edith Thacher
Lead, Sacramento Chapter, Citizens' Climate Lobby

Jill Peterson
Volunteer, Sacramento Chapter, Citizens' Climate Lobby



April 8, 2021

The Honorable Patrick Kennedy: SupervisorKennedy@saccounty.net

The Honorable Rich Desmond: richdesmond@saccounty.net

The Honorable Phil Serna: SupervisorSerna@saccounty.net

The Honorable Don Nottoli: nottolid@saccounty.net

The Honorable Sue Frost: SupervisorFrost@saccounty.net

Sacramento County Office of Planning and Environmental Review
827 7th Street
Sacramento, CA 95814
c/o ClimateActionPlan@saccounty.net

Re: Citizens' Climate Lobby, Sacramento Chapter-Public Comment on Sacramento County Climate Action Plan Public Draft dated March 2021

Dear Supervisors Kennedy, Desmond, Serna, Nottoli and Frost and Staff at the Office of Planning and Environmental Review:

We are writing on behalf of the Sacramento Chapter of Citizens' Climate Lobby (CCL) in response to the Sacramento County Climate Action Plan Public Draft dated March 2021 (Draft #1 CAP) for which the County is seeking public comment.

Our organization was asked by and submitted comments to the Sacramento County (County) staff on January 17, 2021 regarding the Administrative Draft of the County's Climate Action Plan. While Draft #1 CAP, released for public comment, has some modifications, we remain concerned that the same issues we raised with regard to the Administrative Draft continue to plague the current version. Draft #1 CAP portrays the County as an entity that will "encourage" and/or "support" certain actions. Given the Climate Emergency recognized by the Board, the **County must be a leader in the fight against climate change**. Draft #1 CAP falls far short of showing the needed leadership. The CAP must above all take strong action on both land use issues and transportation. At the same time, it must move quickly to implement electrification and set specific goals and targets on all measures that provide for accountability. In addition, there must be regular reports to the Board at least every 60 days to update the Board on the progress being made on the goals set. One need only look to the language the Board used in its Declaration of a Climate Emergency to see that

the Board committed itself to prompt, effective and decisive actions directed toward carbon neutrality by 2030 in the County's Climate Action Plan. That Declaration States at page 3:

BE IT FURTHER RESOLVED, The County of Sacramento commits to building on existing climate action commitments and **taking (sic) significant steps to sustain and accelerate** short term communitywide carbon elimination **and all efforts and actions necessary to eliminate emissions by 2030**, recognizing that such a goal will only be achieved through **regional collaboration between multiple partners; and**

BE IT FURTHER RESOLVED, The Communitywide Climate Action Plan shall explain the County's approach to reduce greenhouse gas emissions in order to achieve carbon neutrality by 2030, building on recommendations and analysis from community partners, and suggested mitigation measures from climate experts, urban and regional planners, community members, and economists. Development and implementation of the plan shall be guided by science, data, best practices, and equity concerns; Emph. Added. We ask that the CAP reflect this commitment. We also ask that the County collaborate with the City of Sacramento in this work, along with other regional partners including SACOG. This collaboration not only makes sense, but the Board's December Declaration also commits to regional collaboration. Thus far this collaboration has been largely absent.

We ask that serious consideration be given to our comments and the draft CAP revised to address our concerns as well as those of other local environmental groups who will be submitting recommendations we support. These include the Sierra Club, Environmental Council of Sacramento, and 350 Sacramento.

In reviewing the Draft #1 CAP, we rely in part on certain regulatory requirements in our analysis and state guidance provided by the Governor's Office as follows:

1. Regulatory Requirements:

14 CCR § 15183.5 sets forth the requirements for a CAP. It states:

(b) Plans for the Reduction of Greenhouse Gas Emissions. Public agencies may choose to analyze and mitigate significant greenhouse gas emissions in a plan for the reduction of greenhouse gas emissions or similar document. A plan to reduce greenhouse gas emissions may be used in a cumulative impacts analysis as set forth below. Pursuant to sections 15064(h)(3) and 15130(d), a lead agency may determine that a project's incremental contribution to a cumulative effect is not cumulatively considerable if the project complies with the requirements in a previously adopted plan or mitigation program under specified circumstances.

(1) Plan Elements. A plan for the reduction of greenhouse gas emissions should:
(A) Quantify greenhouse gas emissions, both existing and projected over a specified time period, resulting from activities within a defined geographic area;
(B) Establish a level, based on substantial evidence, below which the contribution to greenhouse gas emissions from activities covered by the plan would not be cumulatively considerable;

- (C) Identify and analyze the greenhouse gas emissions resulting from specific actions or categories of actions anticipated within the geographic area;
- (D) Specify measures or a group of measures, including performance standards, that substantial evidence demonstrates, if implemented on a project-by-project basis, would collectively achieve the specified emissions level;
- (E) Establish a mechanism to monitor the plan's progress toward achieving the level and to require amendment if the plan is not achieving specified levels;
- (F) Be adopted in a public process following environmental review.

2. State Guidelines:

Chapter 8 of the General Plan Guidelines prepared by the Governor's Office of Planning and Research (OPR) (<https://opr.ca.gov/>) provides clear guidelines for CAPs which can be found at https://www.opr.ca.gov/docs/OPR_C8_final.pdf.

Here are our comments and recommendations regarding the Draft #1 CAP:

1. **The CAP Target Must be Based upon Carbon Neutrality by 2030.**

As we did in January, we once again commend the Board for enacting its recent climate emergency declaration in which it states it will take urgent action to become carbon neutral by 2030. However, Draft #1 CAP is at odds with this ambitious goal. Unlike its predecessor, Draft #1 CAP mentions the Climate Emergency Declaration and carbon neutrality only to say that it will not address carbon neutrality by 2030. Incredibly, Draft #1 CAP states that the Board's directive may be addressed a down the road (perhaps as late as 2030) when the CAP is updated. Specifically, at Page 4 it states:

The GHG reduction measures contained in Sections 2 and 3 of this CAP will allow for additional reductions to be achieved beyond 4.8 MT CO₂e per capita forecast, further outpacing the 6 MT CO₂e per capita recommended by CARB. Their associated quantified GHG reductions and carbon sequestration benefits will be essential for putting the County on the a path [sic] to achieving the objectives of the community 2030 carbon neutrality goal, established under the Board of Supervisors approved Climate Emergency Resolution, passed in December 2020. The carbon neutrality goal was passed after significant progress had already been made on climate planning activities for the County to adhere to 2030 Scoping Plan and SB 32. Thus, the County's current approach in this CAP is to maintain momentum and get reductions started sooner rather than later, **while providing flexibility for the CAP to be updated later to meet carbon neutrality objectives. Thus, the County's approach to carbon neutrality by 2030 is to proceed with GHG reduction and carbon sequestration measures under this CAP and then expand regional GHG reduction and carbon sequestration programs as part of an overall comprehensive CAP update. The CAP update will coincide with an anticipated update to the County's 2030 General Plan** and availability of further guidance on recommended GHG reduction and carbon sequestration measures for carbon neutrality to be included in updates to the California's Climate Change Scoping Plan and Natural and Working Lands Climate Smart Strategy. Emph. Added. Footnotes omitted.

This language indicates the County intends to wait to pursue a goal of 2030 carbon neutrality until the CAP and General Plan update in 2030.

The failure to outline a path to carbon neutrality in Draft #1 CAP is at complete odds with the Board's Climate Emergency Declaration which expressly states the CAP will outline the steps that the County will take to achieve carbon neutrality. The Board made clear that the County intended to take strong action on Climate Change in the CAP, but Draft #1 CAP fails to do so.

We request that the CAP be redrafted based on the goal of carbon neutrality by 2030, consistent with the policy decision and directives issued by the Board in December 2020.

2. The CAP Must Include Ambitious and Specific Goals to Address Land Use.

That land use management is not listed as one of the greenhouse reduction strategies under Section 2 of the Current CAP is telling. While it is universally recognized that land use management and focusing on infill vs sprawling development is a key to reduction of GHG, Draft #1 CAP fails to implement one of its most effective tools to reducing GHG by ignoring this opportunity. The California Air Resources Board in a paragraph on Cross-Sector Interactions, clarifies: "more compact development patterns reduce per capita energy demands, while less-compact sprawl increases them."¹

Senate Bill 375 requires CARB to develop and set regional targets for greenhouse gas (GHG) emission reductions from passenger vehicles. CARB has set regional targets, indexed to years 2020 and 2035, to help achieve significant additional GHG emission reductions from changed land use patterns and improved transportation in support of the State's climate goals, as well as in support of statewide public health and air quality objectives. Metropolitan planning organizations (MPOs) must prepare a sustainable communities strategy (SCS) that will reduce GHG emissions to achieve these regional targets, if feasible to do so.²

Not only does smart growth and infill reduce GHG, it promotes improved public health and air quality, something the County should also prioritize.

Other jurisdictions recognize the key role land use plays in addressing climate change and have made land use management one of their key strategies in their Climate Action Plans: Yolo County, Solano County, and City of San Francisco, among others.

The City of Sacramento recognizes the key role land use policies play in the reduction of GHG. Its first recommendation under Built Environment is Sustainable Land Use. As stated on page 16 of the Final Report of the Mayors' Commission on Climate Change:

¹ https://ww2.arb.ca.gov/sites/default/files/classic//cc/scopingplan/scoping_plan_2017.pdf, pg 67

² <https://ww2.arb.ca.gov/our-work/programs/sustainable-communities-program/regional-plan-targets#:~:text=CARB%20has%20set%20regional%20targets,health%20and%20air%20quality%20objectives>

Evidence on land use and driving shows that compact development will reduce the need to drive between 20 and 40 percent, as compared with development on the outer suburban edge with isolated homes, workplaces, and other destinations (according to Growing Cooler authors Reid Ewing, Keith Bartholomew, Steve Winkelman, Jerry Walters, and Don Chen). They propose it is realistic to assume a 30 percent cut in VMT with compact development. Making reasonable assumptions about growth rates, the market share of compact development, and the relationship between CO2 reduction and VMT reduction, smart growth could, by itself, reduce total transportation-related CO2 emissions from current trends by 7 to 10 percent as of 2050. This reduction is achievable with land-use changes alone. The authors calculate that shifting 60 percent of new growth to compact patterns would save 85 million metric tons of CO2 annually by 2030.

As a result of recognizing the significance of land use in addressing GHG, the Final Report of the Mayors' Commission on Climate Change recommends at page 24:

Built Environment Recommendation #1: Sustainable Land Use Support infill growth that is consistent with the regional Sustainable Communities Strategy to ensure: 90% of the cities' growth is in the established and center/corridor communities and is 90% small-lot and attached homes by 2040.

The County CAP must include the same kind of specific measures with regard to land use by the County. In addition, any measures regarding land use, must have specific targets and interim measures.

Draft #1 CAP offers up GHG 11 and 23 regarding infill development and potential sprawl. These two measures do nothing to address sprawl besides indicate that developers may have to pay a fee or offsets if their project cannot meet the required standards. GHG 11 and 23, do not require any interim monitoring between now and 2030 nor do they provide clear targets to be achieved. The County currently plans on approximately 103,000- dwelling units to be located on greenfield sites. These plans run afoul of efforts to curb GHG. Housing needs in our area can be met without the sprawl and increased GHG that will be created, should these developments go forward. The County's available infill capacity of 33,000 DU is almost enough to handle all SACOG-projected housing growth to 2040. The available infill capacity could accommodate SACOG's entire Regional Housing Needs Allocation of 27,200 DU for this decade. And it could easily accommodate more

than the 10,000 DU the County has proposed for the GHG-reducing Green Zones, which lie within infill areas.³

The County should freeze development on greenfield sites and instead use existing infill capacity to meet housing needs. Only decisive action will result in sustainable land use policies that will address climate change in our region. At a minimum, the CAP should set a specific commitment to infill development and not offer offsets to cure the problem of sprawl. If any offsets are allowed, they must be local and prioritize marginalized communities.

3. The CAP Must Include more Specific and Measurable Strategies/Measures to Address GHG Emitted by Vehicles on the Road.

Figure E-7 (found in the final Appendix of Draft #1 CAP) is very telling. It identifies the sources of GHG starting in 2015 and sets forth the anticipated reductions in each source by 2030. Not surprisingly, on road vehicles are by far the largest source of GHG in 2015. However, the draft CAP shows virtually no reduction in GHG from this source by 2030. This is a lost opportunity. The failure of the CAP to meaningfully address land use and to set forth a comprehensive transportation plan that will take more cars off the road will result in not only a failure to address climate change, but worsening air quality and a negative impact on public health. The CAP must include clear and broad measures to use transportation (both active and shared) to the fullest extent possible in Sacramento County to reduce GHG by taking cars off the road. These measures must be followed up with implementation steps, targets, and methods for monitoring the progress on the measure. In addition, no master plans should be approved until there are meaningful transportation options. Land use and transportation go hand in hand and that is one of many reasons why infill makes sense, namely, compact developments located near public transportation hubs.

The CAP must include more ambitious and specific strategies and measures to reduce the GHG from vehicles on the road through establishing comprehensive transportation and land use policies that work hand in hand.

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1	Sacramento County 2030 General Plan 2020 Annual Report, ATT 2 - pg. 3. Annual Housing Element Progress Report, Appendix A, Table B Regional Housing Needs
2	SACOG Green Means Go, Locally Nominated Green Zones, updated 12/4/20
3	SACOG RHNP REGIONAL HOUSING NEEDS PLAN 2013–2021, Executive Summary Table 1 - Allocations - Total and by Income Category, pg. 5
4	SACOG Regional Housing Needs Plan Cycle 6 (2021-2029), Adopted March 2020, pg. ES-3
5	Sacramento County 2030 General Plan 2020 Annual Report, County Growth, Infill, pg. 11
6	SACOG 2020 MTP/SCS, Appendix C: 2020 MTP/SCS Land Use Forecast, pg. 12, Preferred Scenario GROWTH 2016-2040
7	Sacramento County 2030 General Plan 2020 Annual Report, ATT-1, Table 3, Land Use Summary for Approved Growth Areas, pg. 15
8	Sacramento County 2030 General Plan 2020 Annual Report, ATT-1, Table 4 Land Use Summary for Pending Master Plans, pg.15

4. The CAP Should Not make SMUD'S Goals Such a Key Aspect of the County's GHG Reduction and Must Include Specific Measures to provide for Electrification of New and Existing buildings-Both Residential and Commercial.

Draft #1 CAP places much reliance on SMUD's commitment to carbon free electricity generation. While SMUD's actions to create carbon free electricity generation is absolutely the right decision, it is not at all clear that SMUD will be able to reach these goals. Whether or not SMUD can reach these goals, the Draft #1 CAP places too much reliance on SMUD reaching these goals, rather than taking the specific County actions needed to reduce the County's GHG.

If SMUD does realize its goals, the reduction in GHG emissions resulting from SMUD's action will only occur if residences and business are using the electricity generated by SMUD. Many rely on natural gas. Measures GRN-03 in the Administrative Draft of the CAP and GHG-07 in Draft #1 CAP speak to the electrification of buildings (Both are set forth below.) Both identify 2023 as the year when new residential buildings will be all-electric. Why not sooner? Absent any explanation for this date, the selection of 2023 appears arbitrary. The City of Sacramento is moving forward on electrification and it appears it will be implemented in 2021, potentially two years before the County. The County and City should be on the same schedule.

In addition, potential GHG reduction from this change has changed from 113,324 to 66,964 between the Administrative Draft and the Draft #1 CAP. There is no explanation for this almost 50% reduction in potential savings in GHG. This sudden and significant change in savings makes one question the data in Draft #1 CAP. The only target indicator for GHG-07 is the adoption of the ordinance; there is no effort to confirm the actual savings in GHG or otherwise determine whether the implementation has been effective.

Administrative Draft:

MEASURE GHG-03: ELIMINATE FOSSIL FUEL CONSUMPTION IN NEW RESIDENTIAL BUILDINGS The County will develop and adopt a building code requiring all new single-family and multi-family residential buildings obtaining building permits after January 1, 2023 to be designed as all-electric buildings. Target Indicators □ The Sacramento County Building Department will deny building construction and occupancy permits for all new projects that do not comply with the described reach code. GHG Reduction Potential: **113,324 MTCO₂e/year by 2030**. Emph. Added.

Draft #1 CAP

MEASURE GHG-07: ELIMINATE FOSSIL FUEL CONSUMPTION IN NEW RESIDENTIAL BUILDINGS Measure: Require all new residential construction in the County to be all-electric. Implementation: The County will develop and adopt an energy reach code requiring all new single-family and multi-family residential buildings obtaining building permits after January 1, 2023 to be designed as all-electric buildings. Responsibility: SM and BP&I Timeframe: Mid-term. GHG Reduction Potential: **66,964 MT CO₂e per**

year by 2030. Sector: Building Energy Target Indicator: Adoption of a reach code prior to 2023. All new residential buildings all-electric after January 2023. Emph. Added.

As to existing residential buildings, the Draft #1 CAP indicates under GHG-06

The County will assist local utilities with increasing participation in residential retrofit programs to achieve a reduction in energy consumption. Implementation: These retrofits will involve upgrading to EnergyStar™-certified appliances, more efficient HVAC systems, weatherization, and comprehensive whole home retrofitting. The County will develop and implement a program that provides education on strategies that enable residential energy conservation. Videos featuring energy savings tips will be recorded and hosted on the County's website and a marketing campaign will be developed to advertise the availability of this information. A video shall also be created that shows residents how to monitor their energy use through SMUD and PG&E web interfaces or share their energy use with third parties for more detailed analytics on energy use. Responsibility: PER and BP&I via the BAC with PIO support Timeframe: Mid-term GHG Reduction Potential: 177,187 MT CO₂e per year by 2030. Sector: Building Energy Target Indicator: Develop outreach program with an objective to have 25 percent of existing residences participate in energy efficiency upgrades by 2030.

Draft #1 CAP only commits to the development of an undefined outreach program for retrofit of existing residential units. The Draft #1 CAP indicates that 177,187 MT CO₂d per year could be saved under this measure, but does nothing to measure that savings nor does it commit itself to anything meaningful such as funding of retrofits and/or requiring retrofits when remodeling and/or selling units. This is simply inadequate.

Regarding existing commercial buildings, under GHG-04, Draft #1 CAP states only

The County will develop a program aimed at assisting local utilities with implementing commercial energy efficiency and electrification programs to achieve reductions in energy consumption

The implementation of this measure is for the County to launch an outreach program with an objective to have 25 percent of commercial buildings participate in energy efficiency upgrades by 2030. There is nothing more to this proposal and no plan as to how or when the 25 percent goal will be reached much less monitored.

There is also nothing in Draft #1 CAP mandating new commercial to be all electric. This is a significant gap in the document. The City of Sacramento is already working on an ordinance that will include new commercial buildings in its electrification efforts as have numerous other jurisdictions. The County must do likewise.

/

5. The CAP Must Include Additional Reduction Targets Beyond 2030.

The Draft #1 CAP identifies a target for 2030, with no additional targets beyond 2030. Such an approach does not follow the recommendations of the OPR which points out how setting only one near target can cause inaccurate assessments of the plan. The guidance states:

Selecting a single reduction target year does not typically allow an agency to accurately assess the trajectory of the plan. Given the long-term nature of the effects of climate change, understanding the effects of the plan on long-term emissions reductions is necessary to determine whether the plan will reduce emissions to a less than significant level. Examining the long-term trajectory also allows a lead agency to determine whether the emissions reductions in the plan are sustainable, or will be overtaken by population growth, increased driving, or other shifts in emissions. Take for example, a plan that sets only a near-term target. Such a plan might rely on increasing building energy efficiency to achieve near-term goals. Looking further out, however, might demonstrate that steady increases in vehicle miles traveled will counteract those reductions, and result in an emissions trajectory that increases rather than decreases. Setting targets out to the general plan horizon year or beyond allows a lead agency to consider the full suite of measures that might be necessary to achieve long-term reduction goals. See https://www.opr.ca.gov/docs/OPR_C8_final.pdf at pages 226-227.

6. The CAP Must Identify Target Indicators for all Measures.

Section 2 of Draft #1 CAP identifies five strategies to reduce community emissions to the target level. Under each strategy there are measures defined as, “a program, policy, or project the County will implement that will cause a direct and measurable reduction in GHG emissions.” Under about 1/3 of the measures there are “target indicators” which Draft #1 CAP defines as “the performance metric by which achievement will be measured in target years.”

The vast majority of the measures identified in Draft #1 CAP are drafted in skeletal fashion and need to be fleshed out, including implementation steps, targets, and interim measures. Simply saying the County will launch educational programs or place something on its website, does not constitute meaningful action to implement the measures proffered. In addition, the majority of the measures identified in Draft #1 CAP are worded in such terms that indicate the County will support, encourage, and incentivize certain actions. Using these vague terms means the success or failure of these measures is not measurable or verifiable. That these are not measurable is further illustrated by the fact that very few measures have “target indicators.” Approximately 1/3 of the measures have any performance metric designed to measure performance. Without target indicators there is no way to assess whether the measures are being implemented and whether the projected results are being realized. Many of the target indicators included are also vague and not true indicators of whether the measure and/or its implementation have succeeded.

Under 14 CCR § 15183.5 (B) (1)(B) the plan must: “Specify measures or a group of measures, **including performance standards**, that substantial evidence demonstrates, if implemented on a project-by-project basis, would collectively achieve the specified emissions level...” Emph. Added.

This requirement is also discussed by the OPR guidelines:

Feasibility and Enforceability CEQA Guidelines sections 15168(b)(4) and 15168(c)(3) recognize that programmatic documents like a general plan or CAP provide an opportunity to develop mitigation plans that will apply on a project-specific basis. As a result, a CAP needs to include measures that will achieve the reduction target. How the plan achieves those targets, whether through mandatory or a mix of voluntary and mandatory measures, is up to the lead agency, so long as substantial evidence supports the conclusion. When addressing greenhouse gas emissions, like all other technical analysis, the methodology and calculations should be transparent and replicable with the goal of providing substantial evidence supporting the assumptions, analysis and conclusions. **Measures should also be real and verifiable, through either full enforceability or through substantial evidence in the record supporting an agency's conclusion that mitigation will be effective.** A number of published court cases address the need for feasible and enforceable emission reduction measures.

The decision in *Communities for a Better Environment v. City of Richmond* (2010) 184 Cal. App. 4th 70, provides guidance on the level of detail that is needed. In that case, the city proposed to mitigate the effects of a refinery project by developing an emissions reduction plan after project approval. Specifically, the city pledged to implement measures that would ensure no net increase in emissions from the refinery. The EIR for the refinery suggested several possible measures, including energy efficiency upgrades and carbon sequestration. On appeal, the court held that the city's mitigation plan was inadequate. Specifically, the court found: "...The final EIR merely proposes a generalized goal of no net increase in greenhouse gas emissions and then sets out a handful of cursorily described mitigation measures for future consideration that might serve to mitigate the 898,000 metric tons of emissions resulting from the Project. No effort is made to calculate what, if any, reductions in the Project's anticipated greenhouse gas emissions would result from each of these vaguely described future mitigation measures. Indeed, the perfunctory listing of possible mitigation measures ... are nonexclusive, undefined, untested and of unknown efficacy." (*Communities for a Better Environment*, supra, 184 Cal.App. 4th at 93). The court observed that to be adequate, a plan should include measures that are "known to be feasible", **"coupled with specific and mandatory performance standards to ensure that the measures, as implemented, will be effective"** (Id. at p. 94).

Consistent with the regulation and OPR guidance, all of the measures identified in the CAP include target indicators. If it is impossible to provide a target indicator, the measure needs to be rewritten in a more specific way that will allow for evaluating implementation, effectiveness and to allow for accountability.

7. The CAP Must Set Target Indicators between Now and 2030.

Section 15183.5(b) (1) (e) states CAPS should, "Establish a mechanism to monitor the plan's **progress** toward achieving the level and to require amendment if the plan is not achieving specified levels." Emphasis Added.

The very few target indicators in Draft #1 CAP are almost all indicators measured in 2030. To monitor progress towards the 2030 goals, specific target indicators should be set for time periods between now and 2030. If there is no monitoring of the progress made between now and 2030, the County will not know whether the measure is being implemented or if other actions need to be taken to reach the goal set in 2030. Section 15183.5 clarifies these interim measures are needed to determine whether the plan needs amendment if it is not achieving specified levels.

In addition, the Board must be updated at regular intervals no less frequent than every 60 days on the progress on these various goals. There are really no teeth in the document if there is no accountability for anything until 2030 and there are no markers to measure effectiveness.

8. Appearance of a Conflict of Interest if Developers are Paying Ascent.

It is our understanding that developers are being asked to pay for the preparation of the CAP by the consultant Ascent. As a completed CAP allows developers to streamline the environmental process for future projects, developers substantially benefit from its preparation. The County must be sensitive to any appearance that developers are in the driver's seat on the CAP.

The Board has made clear the CAP is to be the mechanism the County will use to reach carbon neutrality by 2030. Because Draft #1 CAP is so far from reaching that goal, there is the appearance the developers could be exerting undue influence in its preparation. If developers are paying for Ascent, it would be in the developers' interest to make the process short to save money and place fewer limits on development projects.

Our members and the public at large need to be assured that if developers are paying for the CAP to be prepared, developers are not directing its contents. The best way to cure this conflict of interest is to have the County pay for the CAP. Assuming there are no funds available, there are grants available to local governments to fund preparation of CAPS (<https://fundingwizard.arb.ca.gov/web/>).

The County is slated to receive \$300 million in stimulus aid this year. Some of this money can fund not only the CAP but investments in transportation and other needs facing our community.

Finally, the appearance of rushing the CAP process ignores the fact that if not done correctly, or if there appears to be undue developer influence, the CAP could generate litigation. Our interest is that the County create a meaningful and effective CAP that benefits all citizens.

Thank you for the opportunity to comment on the Draft #1 CAP. We are happy to discuss our recommendations with you further and answer any questions.

We urge the County to act boldly and decisively to address climate change in our region and to follow the clear directives provided by the Board in its December 2020 Climate Emergency Declaration. Our future and that of our children depend on it.

Sincerely,

/s/

Edith Thacher
Chapter Lead, Sacramento Chapter, CCL

/s/

Jill C. Peterson
Volunteer, Sacramento Chapter, CCL

Taylor. Todd

From: Laurel Hollis <info@email.actionnetwork.org>
Sent: Thursday, April 8, 2021 9:39 AM
To: PER. climateactionplan
Subject: Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

Thank you for your commitment to improve life for all in our county. I live four blocks away from Highway 50 in Land Park. A strong Climate Action Plan will reduce vehicle noise and pollution in my neighborhood. I have a daughter who had to leave the area because she has asthma, which was very sad for me. I used to live in Carmichael, where there was almost no public transit. The current CAP doesn't align with the county's own Climate Emergency Declaration, or offer enough specific funding sources and recommendations for partnerships. This draft is a start, but needs work. I hope you'll listen to the public, and allow ample opportunities to your constituents to weigh in. At this time of dire consequences, there is no time for half measures.

Laurel Hollis
hollislaurel@gmail.com
2665 13th street
sacramento CA , California 95818

Taylor. Todd

From: stensheri@comcast.net
Sent: Thursday, April 8, 2021 2:37 PM
To: PER. climateactionplan
Subject: Draft Climate Action Plan comment

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Dear Planning and Environmental Review Staff,

I'm happy to see the development of the Climate Action Plan for the County and appreciate the opportunity to review and comment.

I have two comments:

- 1) Regarding MEASURE GHG-07: ELIMINATE FOSSIL FUEL CONSUMPTION IN NEW RESIDENTIAL BUILDINGS. I don't support the 100% electrification of new residential homes. I think it sets up the county and the cities located within it to experience increased strain on the electrical grid and a return to rolling blackouts, as well as increased energy use rates. The state requirement to include solar on new homes definitely should help, but I think we should also consider working with PG&E to use waste from the landfills, wastewater treatment plants, and Ag industry to work on converting from natural gas to renewable natural gas. This type of partnership should ultimately be both an economical and environmental benefit for the County, PG&E and county residents. This link to a presentation for a similar effort in SoCal. [Getting the Facts on Renewable Natural Gas \(epa.gov\)](https://www.epa.gov/energy/getting-the-facts-on-renewable-natural-gas)
- 2) Include renewable energy battery storage at existing buildings and residential properties, and not just for new construction. I also think there should be goals to create net zero neighborhoods where new solar PV is being installed and to incentivize existing neighborhoods. These neighborhoods could also use neighborhood solar power plants with storage power to connect to, reducing the need for transmission lines. Park and school parking areas could be used to build these solar facilities and/or perhaps built near existing substations.

Sincerely,

Sheri Lasick
5235 Fawn Crossing Way
Antelope, Ca 95843

Taylor. Todd

Subject: Sac Climate Organizers might find this online meeting of interest

From: E Durbrow <durbrow@gmail.com>
Sent: Thursday, April 8, 2021 3:01 PM
To: PER. climateactionplan <climateactionplan@sacounty.net>
Subject: Sac Climate Organizers might find this online meeting of interest

EXTERNAL EMAIL: If unknown sender, do not click links/attachments.

This is via the Google CDR listserv. I thought the planners might be interested in refining measures to encourage (and measure) carbon capture in the county... Just FYI.

<https://www.urbangreencouncil.org/content/events/carbon-dioxide-removal-and-city>

CARBON DIOXIDE REMOVAL AND THE CITY

APRIL 29, 2021

10:00 TO 11:30 AM

1 0 3

REGISTER

ALSO ON THIS DATE

CRUSHING THE CODE NYS: COMMERCIAL

EVENT PRICES:

Non-member

\$20

Member

\$10

Sponsor and Organizational Member

Free Admission

Trust and Leadership Level Member

Free Admission

Carbon Dioxide Removal and the City

According to the U.N. IPCC (October 2018), carbon dioxide removal (CDR) on a massive scale will be necessary to limit global temperature change to 1.5°C this century. Growing attention to this has focused mainly on a handful of nature-based and industrial solutions that appear to be decidedly un-urban in their footprint, operation and logistical demands.

But cities have historically provided critical early habitats for innovations that ultimately attain transformational scale far beyond their borders. Indeed, today's urban centers are leading some of the most creative, serious and impactful responses to the climate crisis.

What role might cities play in fostering early niche markets and proving grounds for promising CDR applications and companies? Furthermore, how might CDR help climate-forward cities like New York achieve their long-term emissions reductions goals? In this panel discussion, pioneering CDR entrepreneurs and thinkers from around the world will present a series of (near) future-focused CDR use cases for the urban environment.

Previous

Next

MODERATOR

Jamie Rogers

Senior Advocate, The OpenAir Collective

SPEAKERS

Jia Li

Co-Founder and Chief Scientist, Carbon Infinity

Chris Neidl

Policy Analyst, Carbon 180

Josh Santos

CEO, Noya

Doug Staker

VP, Business Development, Carbon Quest

Bob Wilson

VP of Commercialization, AirCapture

Taylor. Todd

From: Susan Solarz <solaking19@gmail.com>
Sent: Thursday, April 8, 2021 3:48 PM
To: PER. climateactionplan; Supervisor Serna; Kennedy. Supervisor; Rich Desmond; Frost. Supervisor; Nottoli. Don
Cc: Laurie Heller
Subject: Comments on Sacramento County Draft Communitywide Climate Action Plan (CAP)- Public Participation and Environmental Justice
Attachments: Solarz -Heller CAP Comment FINAL.docx

Comments on the draft CAP are provided below and attached.

To: Sacramento County Office of Planning and Environmental Review

Supervisor Phil Serna

Supervisor Patrick Kennedy

Supervisor Rich Desmond

Supervisor Sue Frost

Supervisor Don Nottoli

From: Susan Solarz (District 3) and Laurie Heller (District 2)

Re: Sacramento County Draft Communitywide Climate Action Plan (CAP) - Public Participation and Environmental Justice

As members of 350 Sacramento, we have both been engaged in County's CAP development process since 2017. We are very pleased to see the project moving forward. However, *current* public participation in the process is insufficient for the scope of the problem – and the scope of the necessary solutions. Consideration of environmental justice must also be an integral and enhanced focus in the CAP. Disadvantaged communities – who suffer disproportionate harm from climate change impacts - must have the opportunity to fully participate in solutions.

Public workshops held by the County in 2016 and 2017 are out-of-date and therefore irrelevant to the current CAP. Climate change has progressed, climate science has moved on, new solutions are available – and the CAP needs to reflect that.

Unfortunately, this draft of the CAP is the *first* opportunity for the public to review the County's specific proposed measures to address climate change. We believe that a more robust outreach effort is necessary, including

- A review period of a at least 60 days; and
- Multiple public workshops at different locations and times of day/evening.

The CAP will have wide ranging importance to our community. A public comment period of only 30 days with only one public (zoom) meeting stands in contrast to the public comment and outreach for other environmental documents – with arguably less broad public impact. (For instance, the Natural Resources Management Plan for the American River Parkway had a comment period of 60 days.)

The County committed to significant public engagement when it adopted the *Climate Emergency Declaration Resolution*, which states:

“The County of Sacramento affirms the community's need to understand, participate and support all actions and initiatives the County adopts in response to the climate emergency. The County therefore commits to support outreach, information and education for County residents and staff on the urgent need to reduce GHG emissions, and the policies and strategies necessary to advance sustainability and resilience.

A robust community engagement process:

- 1) Identifies existing conditions, issues, and opportunities throughout the county, including potential barriers to implementation;
- 2) Informs the plans' vision and guiding principles and shape strategies in a way that responds to community needs;
- 3) Reaches out to youth, who have a particular stake in the climate crisis and will need to sustain, accelerate and expand solutions as climate change worsens.
- 4) *Continues* to solicit stakeholder feedback to maintain the balance of environmental leadership, social equity and economic prosperity.
- 5) Partners with the many jurisdictions *within the County* – and the County's regional neighbors – which are currently developing their own Climate Action Plans.

The County alone cannot safeguard communities from the worsening impacts of climate change. Community Engagement is needed to inform planning, *and* to ensure buy-in and long-term commitment from stakeholders. In fact, the County committed to do this when it adopted the *Climate Emergency Declaration Resolution*, which states:

“Implementation of the County's climate efforts shall include the engagement of community-based and grassroots organizations and inclusive economic development partners, with a focus on low-income and disadvantaged communities, youth, communities of color, and environmental justice.”

Robust community engagement is necessary to co-create adaptation strategies and implementation measures that preserve community culture, provide local economic growth opportunities, and create a sense of shared ownership and responsibility for community resilience.

Although we applaud the *Environmental Justice Element* published by the County in response to the *General Plan* update, we do not see these priorities reflected in the CAP. The Environmental Justice element must be implemented in the targeted neighborhoods (North Highlands, West Arden-Arcade, South Sacramento, North Vineyard) by including *specific elements pertaining to environmental justice* in the CAP.

- The CAP must deliver public health *and* resilience benefits by *directly* addressing the impacts of climate change that these communities are *already* grappling with – such as the need for affordable housing, clean mobility, access to healthy food, parks and green space. The CAP should promote mitigation and adaptation policies that provide health benefits and adaptive capacity, such as active transportation, mixed use zoning, energy-efficient housing, and urban greening.
- We strongly support the inclusion of measure GHG-02 (Urban Forestry) as an element in the CAP as a near-term priority. We stress that the planting of shade trees in the identified Environmental Justice communities is essential not only to reduce greenhouse gas emissions but also as a significant adaptation measure to reduce the potential for heat-related illnesses in these communities.
- The CAP must develop and implement transportation systems and built environments that are accessible to people of all ages, sizes and abilities, to ensure marginalized communities can participate in and access the benefits of climate action strategies.

Vulnerable Populations (people experiencing homelessness, low-income households, people with disabilities, and communities of color) have historically borne the greatest burden from the effects of pollution and disinvestment. They remain on the front lines of climate change. Residents are more likely to have pre-existing health conditions and less access to health care. With fewer neighborhood parks and tree-lined streets, these populations are more susceptible to the stress of increasing heat. *Needs such as these must be called out and solutions clearly identified and prioritized in the CAP, to ensure the CAP advances environmental justice.*

Because we are all experiencing climate change, we are all responsible for climate action.

Thank you for your consideration of our comments.

Taylor. Todd

From: Kari Bauer <info@email.actionnetwork.org>
Sent: Thursday, April 8, 2021 5:08 PM
To: PER. climateactionplan
Subject: Sac Co Climate Acton Plan Draft

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

Climate Change has hit us especially hard in the Central Valley where we suffer from poor air quality due to forest fires as well as use of fossil fuels to power vehicles along the I-5 corridor. Sacramento County must do it's part to lower greenhouse gas (GHG) emissions.

We need a serious effort to address Climate Emergency Declaration (CED) direction in the CAP. The CED presents both specific directions and a challenging goal. SMUD is addressing a similarly challenging goal in a professional and responsible manner, while the CAP just 'kicks the can down the road'.

Re: Infill development, we need Policy measures that actually prioritize infill before sprawl development.

Re: Carbon Offsets: Please include Justification for allowing offsets at all instead of requiring direct GHG-reductions; clarification of proposed offset funding and implementation; and commitment to keeping offset funds local and available to reduce GHG emissions and provide co-benefits to environmental justice communities.

We also need full community support - opportunity for the general public to hear about and informally express views on the CAP before formal presentations for adoption.

Sincerely, Kari Bauer, Carmichael

Kari Bauer
Grandmakari@gmail.com
4856 Paisley Way
Carmichael, California 95608

Taylor. Todd

From: CJ <cjmeakes@gmail.com>
Sent: Thursday, April 8, 2021 9:45 PM
To: PER. climateactionplan
Cc: Kennedy. Supervisor
Subject: CAP comments

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Hello -

Thank you for the opportunity to comment on the Sacramento County Draft Climate Action Plan. Below are my comments.

Thank you,

C.J. Meakes

Comments:

1. Section 1.2 Table 1. The 2030 forecast emissions for Government operations (109,172 MTCO₂e) does not come close to meeting the SB 32 reduction target of 73,348 MTCO₂e presented in Table 2-7 on page E-7. This plan needs to describe how the county will meet it's legally mandated targets.

2. Section 1.3 - With the Counties goal of carbon neutrality by 2030, this plan seems to fall far short. While it is understood that another plan is coming, after further knowledge resources are made available, given the tight deadline, there needs to be a schedule that is proposed to be adhered to. It is 2021, only 9 years from the goal of carbon neutrality, and these reports can take a year or more to finalize, so it needs to be called out here when the updated plan will be completed.

3. Measure GHG-07: This deadline should be sooner. There is no reason to continue installing technology we know will not be sustainable or acceptable in 9 short years. The best time to convert is before construction is done, even if it means updating existing plans.

4. GHG-10: These installations of electric vehicle infrastructure should start in the near term, not the long term. There also should be a focus on getting landlords, especially of multi-unit properties, to install electric vehicle charging infrastructure.

5. GHG-17: This should be a mid term goal, not long term. Focus should be on providing bicycle lanes with physical barriers from vehicle traffic, and that are direct paths to destinations. Experience in places with widely used bike infrastructure shows that a focus on safety and convenience are necessary to ensure widespread adoption. Would you feel comfortable with your 5 year old and your grandma riding on it? If so, then people will use it. Otherwise only a few hardy people who feel super comfortable on a bike will use it. Also, if it makes you go out of your way, people will be less likely to use it.

6. GHG-19: The standard for EV parking should be at least 30%, or include specification for rapid chargers, otherwise these would not be reliably available for residents. Also, this measure (or another) needs to provide for secure bicycle parking as part of the code, such as at least 1 secure spot per two apartments.

7. GHG-20 This seems to have a lot of overlap with GHG-15-17

8. GHG-21 - As mentioned for GHG-17, these need to include planning for physically separated bicycle pathways.

9. GHG-22 This scoring system needs to take into account the accessibility of the bike lane: a better score for a physically separated bike lane, a middling score for a bike lane on a low traffic and low speed road, and worse scores for bike lanes on higher vehicle traffic and/or speed roads. Some bike lanes are so unsafe they are not and will not be used by many people, and thus should not be scored the same as better routes.

10. GOV-EC-4: This should be a short term goal, not a mid term goal

11. GOV-FL-01: All newly purchased county vehicles should be electric, effectively immediately, unless the vehicle is for a specific purpose that cannot be met with currently available EVs. Then alternatives, such as a plug in hybrid, should be the next alternative.

12. GOV-FL-02 Burning of CNG in vehicles, from any source, needs to be eliminated by 2030 to the maximum extent possible, and language of this fact should be included here.
13. GOV-FL-03 Burning of diesel in vehicles, from any source, needs to be eliminated by 2030 to the maximum extent possible, and language of this fact should be included here.
14. GOV-WA-02 Should part of this be an analysis of switching from turf to native xeriscaping?
15. Section 2.4 These measures should also be numbered and details provided like the other measures
16. Section 2.5 A date needs to be provided as to when this General Plan or CAP update will occur. Also, the actions being investigated by others described in this section seem to largely have to do with land management. Given that, and the goal of carbon neutrality by 2030, it makes sense that this CAP needs to cover all the bases it can as thoroughly and aggressively as possible. As my multiple comments above illustrate, this CAP needs to be strengthened significantly now.
17. FIRE-07 there should be a FIRE-07 which addresses HVAC systems and plans in county owned buildings for during heavy smoke events, and provides education and resources for local schools, businesses, and residents to adequately filter and keep their indoor air clean during bad air quality days due to fire in surrounding areas.
18. WATER-04 - this should include fire safe xeriscaping of county and CalTrans properties, to get away from the water intensive turf mentioned in GOV-WA-02
19. FLOOD-15: There needs to be county requirements created that accurate, up-to-date, specific flood risk information is communicated to renters and buyers of properties prior to lease/purchase agreement.
20. Ch 4 - Per the December Climate declaration, the Climate Emergency Mobilization Task Force was supposed to be set up by the end of February 2021, so initial members and framework for this task force and their oversight of CAP implementation should be included in the CAP.
21. Ch 4 -There should be a description here of the Counties plan and schedule to hire the staff necessary to implement the CAP.

Taylor. Todd

From: Susan Solarz <solaking19@gmail.com>
Sent: Thursday, April 8, 2021 11:45 PM
To: PER. climateactionplan
Cc: Rich Desmond
Subject: Additional Comments on Sacramento County Draft Communitywide Climate Action Plan (CAP)- Public Participation and Environmental Justice

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Together with Laurie Heller, I previously provided comments pertaining to public participation and environmental justice (forwarded).

The following are my additional comments:

1. Greenhouse gas (GHG) reduction measures in the CAP should be targeted toward **Climate Emergency Declaration resolution goals of carbon neutrality by 2030. These goals should not be delayed to a future CAP update.** Consistent with this declaration, "*County staff shall evaluate the resources necessary to achieve carbon neutrality by 2030, and the emergency actions required to eliminate emissions by 2030. Where existing funding or resources do not support the level of action required, County staff shall identify gaps and provide recommendations to the County Executive and Board of Supervisors.*" The County should also move expeditiously to establish the Climate Emergency Task Force identified in the resolution.
2. The CAP should prioritize **land use** policies to **reduce urban sprawl** with emphasizing **infill** development should be emphasized to reduce transportation emissions, the largest source of greenhouse gases in our area. The CAP should strengthen the requirement that development should not be outside the urban boundary and promote habitat.
3. **Carbon offsets should be an exception, and when allowed, there should be a commitment to keeping offset funds local** and available to reduce GHG emissions and provide co-benefits to environmental justice communities.
4. I question the validity of GHG-01, Carbon Farming, to achieve the identified reduction in GHG emissions. The assumptions of available land and willing farmers appears to be far-fetched.
5. Sacramento County should collaborate with its regional neighbors, including the City of Sacramento, in developing and implementing the CAP.
6. Measures in the CAP should identify specific quantifiable indicators/milestones to provide a basis for assessments.

Thank you for taking urgent action on this serious matter.

Sincerely,

Susan Solarz, District 3
Member, 350 Sacramento CAP Outreach Team
1260 Los Rios Dr, Carmichael, CA 95608
916-212-9265

----- Forwarded message -----

From: Susan Solarz <solaking19@gmail.com>
Date: Thu, Apr 8, 2021 at 3:48 PM
Subject: Comments on Sacramento County Draft Communitywide Climate Action Plan (CAP)- Public Participation and Environmental Justice
To: <ClimateActionPlan@saccounty.net>, <SupervisorSerna@saccounty.net>, <SupervisorKennedy@saccounty.net>, <richdesmond@saccounty.net>, <SupervisorFrost@saccounty.net>, <nottolid@saccounty.net>
Cc: Laurie Heller <laurierivlinheller@gmail.com>

Comments on the draft CAP are provided below and attached.

To: Sacramento County Office of Planning and Environmental Review

Supervisor Phil Serna

Supervisor Patrick Kennedy

Supervisor Rich Desmond

Supervisor Sue Frost

Supervisor Don Nottoli

From: Susan Solarz (District 3) and Laurie Heller (District 2)

Re: Sacramento County Draft Communitywide Climate Action Plan (CAP) - Public Participation and Environmental Justice

As members of 350 Sacramento, we have both been engaged in County's CAP development process since 2017. We are very pleased to see the project moving forward. However, *current* public participation in the process is insufficient for the scope of the problem – and the scope of the necessary solutions. Consideration of environmental justice must also be an integral and enhanced focus in the CAP. Disadvantaged communities – who suffer disproportionate harm from climate change impacts - must have the opportunity to fully participate in solutions.

Public workshops held by the County in 2016 and 2017 are out-of-date and therefore irrelevant to the current CAP. Climate change has progressed, climate science has moved on, new solutions are available – and the CAP needs to reflect that.

Unfortunately, this draft of the CAP is the *first* opportunity for the public to review the County's specific proposed measures to address climate change. We believe that a more robust outreach effort is necessary, including

- A review period of a at least 60 days; and
- Multiple public workshops at different locations and times of day/evening.

The CAP will have wide ranging importance to our community. A public comment period of only 30 days with only one public (zoom) meeting stands in contrast to the public comment and outreach for other environmental documents – with arguably less broad public impact. (For instance, the Natural Resources Management Plan for the American River Parkway had a comment period of 60 days.)

The County committed to significant public engagement when it adopted the *Climate Emergency Declaration Resolution*, which states:

“The County of Sacramento affirms the community's need to understand, participate and support all actions and initiatives the County adopts in response to the climate emergency. The County therefore commits to support outreach, information and education for County residents and staff on the urgent need to reduce GHG emissions, and the policies and strategies necessary to advance sustainability and resilience.

A robust community engagement process:

- 1)** Identifies existing conditions, issues, and opportunities throughout the county, including potential barriers to implementation;
- 2)** Informs the plans' vision and guiding principles and shape strategies in a way that responds to community needs;
- 3)** Reaches out to youth, who have a particular stake in the climate crisis and will need to sustain, accelerate and expand solutions as climate change worsens.
- 4)** *Continues* to solicit stakeholder feedback to maintain the balance of environmental leadership, social equity and economic prosperity.
- 5)** Partners with the many jurisdictions *within the County* – and the County's regional neighbors – which are currently developing their own Climate Action Plans.

The County alone cannot safeguard communities from the worsening impacts of climate change. Community Engagement is needed to inform planning, *and* to ensure buy-in and long-term commitment from stakeholders. In fact, the County committed to do this when it adopted the *Climate Emergency Declaration Resolution*, which states:

“Implementation of the County's climate efforts shall include the engagement of community-based and grassroots organizations and inclusive economic development partners, with a focus on low-income and disadvantaged communities, youth, communities of color, and environmental justice.”

Robust community engagement is necessary to co-create adaptation strategies and implementation measures that preserve community culture, provide local economic growth opportunities, and create a sense of shared ownership and responsibility for community resilience.

Although we applaud the *Environmental Justice Element* published by the County in response to the *General Plan* update, we do not see these priorities reflected in the CAP. The Environmental Justice element must be implemented in the targeted neighborhoods (North Highlands, West Arden-Arcade, South Sacramento, North Vineyard) by including *specific elements pertaining to environmental justice* in the CAP.

- The CAP must deliver public health *and* resilience benefits by *directly* addressing the impacts of climate change that these communities are *already* grappling with – such as the need for affordable housing, clean mobility, access to healthy food, parks and green space. The CAP should promote mitigation and adaptation policies that provide health benefits and adaptive capacity, such as active transportation, mixed use zoning, energy-efficient housing, and urban greening.
- We strongly support the inclusion of measure GHG-02 (Urban Forestry) as an element in the CAP as a near-term priority. We stress that the planting of shade trees in the identified Environmental Justice communities is essential not only to reduce greenhouse gas emissions but also as a significant adaptation measure to reduce the potential for heat-related illnesses in these communities.
- The CAP must develop and implement transportation systems and built environments that are accessible to people of all ages, sizes and abilities, to ensure marginalized communities can participate in and access the benefits of climate action strategies.

Vulnerable Populations (people experiencing homelessness, low-income households, people with disabilities, and communities of color) have historically borne the greatest burden from the effects of pollution and disinvestment. They remain on the front lines of climate change. Residents are more likely to have pre-existing health conditions and less access to health care. With fewer neighborhood parks and tree-lined streets, these populations are more susceptible to the stress of increasing heat. *Needs such as these must be called out and solutions clearly identified and prioritized in the CAP, to ensure the CAP advances environmental justice.*

Because we are all experiencing climate change, we are all responsible for climate action.

Thank you for your consideration of our comments.

Taylor. Todd

From: Alexandra Reagan <office@ecosacramento.net>
Sent: Friday, April 9, 2021 9:29 AM
To: PER. climateactionplan; Smith. Todd; Clerk of the Board Public Email; County Executive; Moffitt. Leighann; Lundgren. John
Subject: ECOS comments re Sacramento County Climate Action Plan, March 2021 Public Draft
Attachments: 2021 03 April 09 ECOS Comments on SacCounty CAP of March 2021.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

To Mr. Todd Smith:

On behalf of the Environmental Council of Sacramento, I am submitting by way of this email our comments on the Sacramento County Climate Action Plan, March 2021 Public Draft. Please see the attached letter and respond to this email to confirm its receipt.

Regards,

Alexandra Reagan

Director of Operations | ECOS

The Environmental Council of Sacramento

My pronouns: she/her/hers

P.O. Box 1526, Sacramento, CA, 95812

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Visit us on [Facebook](#) or [Twitter](#)



ECOS

ENVIRONMENTAL
♦ COUNCIL ♦
OF SACRAMENTO

Post Office Box 1526 | Sacramento, CA 95812-1526

April 9, 2021

Todd Smith
Principal Planner
Office of Planning and Environmental Review
County of Sacramento
700 H Street, Suite 1450
Sacramento, CA 95814

Sent via email to ClimateActionPlan@saccounty.net smithtodd@saccounty.net

RE: Sacramento County Climate Action Plan, March 2021 Public Draft

Dear Todd,

Please see our comments on the subject draft climate action plan. Thank you for your consideration.

Sincerely,

Ralph Propper
ECOS President

cc:

Board of Supervisors via email to BoardClerk@saccounty.net
Ann Edwards, Interim County Executive CountyExecutive@saccounty.net
Leighann Moffitt, Planning Director moffittl@saccounty.net
John Lundgren, Senior Planner lundgrenj@saccounty.net

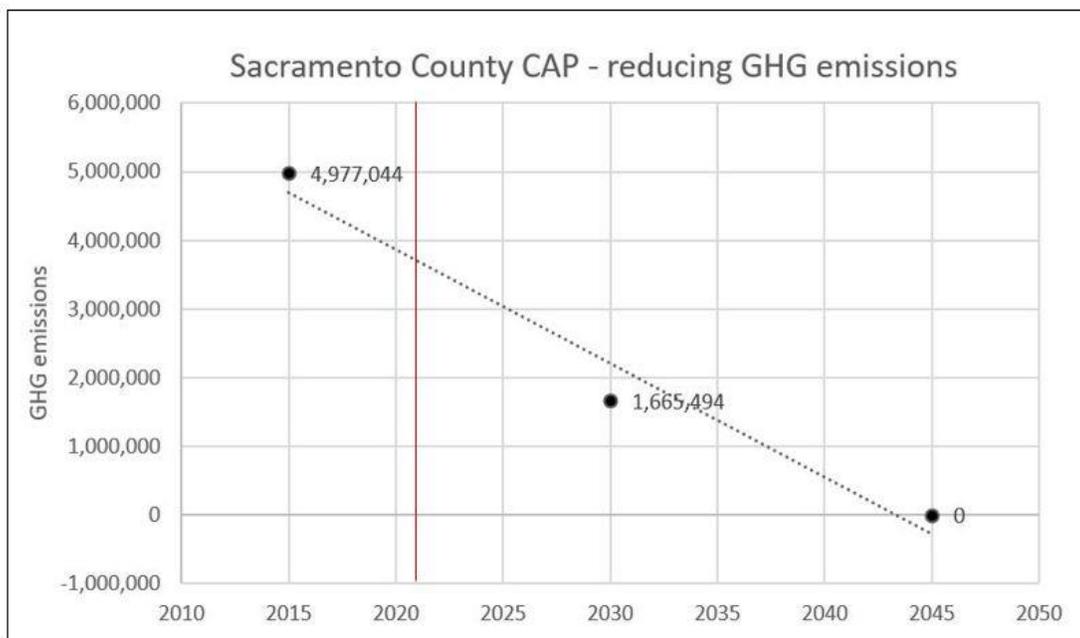
www.ecosacramento.net

1) The CAP needs to demonstrate how the County will reach carbon neutrality.

The CAP is very optimistic when it shows the County will reduce two-thirds of its emissions by 2030, less than ten years from now.

While 2015 is the starting point in the graph, it represents the date of the emissions inventory. The starting point for action under the CAP is 2021, indicated by the red vertical line, leaving nine years to achieve a dramatic reduction. The point at 1,665,494 represents the target emissions to be achieved by 2030. In 2045, fifteen years later, the point at 0 represents California's goal of carbon neutrality.

EXHIBIT 1



If emissions do drop from 4.977M to 1.665M MTCO₂e by 2030 because of legislation or regional policies¹, SMUD's achievement of zero-carbon electricity generation, and successful implementation of CAP measures, the hardest part is still ahead – the last third of emissions.

The CAP should include contingency plans so that if one or more sources of GHG emissions reduction do not work out, other sources are ready to be implemented. For example, if SMUD achieves only half of its target reduction, the CAP should explain how the County will make up for the other half.²

¹ CAP Chapter 1 "Table 2 Legislation . . ." should include SB375; SB743; EO B-55-18 establishing 2045 carbon neutral goal;

² Where in the CAP is supporting information provided for the .853M MTCO₂e estimate of reductions for SMUD?

The information in the table below is from the CAP. It shows the anticipated reduction in emissions, from left to right. In 2030, the remaining emissions are 1.665M MTCO2e.

EXHIBIT 2

Sacramento County CAP: GHG Emissions Reduction 2021 - 2030					
From App. E, Table E-1, E-2		From App. E, Table E-3, E-4		From CAP, Chapter 1, Table 2	From CAP, Chapter 2
2015 GHG Inventory COMMUNITY		2030 GHG Adjusted BAU Forecast COMMUNITY		SMUD	CAP Measures
Residential Energy	1,193,311	Residential Energy	500,099	Zero-carbon electricity generation policy reduce 852,975 by 2030	From Table 1 Community reduce 772,095 by 2030
Commercial Energy	890,603	Commercial Energy	244,903		
Agriculture	254,899	Agriculture	193,373		
High-GWP Gases	251,085	High-GWP Gases	245,175		
Wastewater	27,253	Wastewater	17,139		
Water-Related	15,222	Water-Related	0		
Solid Waste	352,909	Solid Waste	280,694		
On-Road Vehicles	1,671,596	On-Road Vehicles	1,468,071		
Off-Road Vehicles	196,769	Off-Road Vehicles	253,857		
	4,853,647		3,203,311		
2015 GHG Inventory GOV OPS		2030 GHG Adjusted BAU Forecast GOV OPS			
Buildings, Facilities	28,247	Buildings, Facilities	23,736		From Table 5 Gov Ops reduce 21,040 by 2030
Airports	18,310	Airports	15,920		
Wastewater	565	Wastewater	597		
Water-Related	4,665	Water-Related	3,498		
Streetlights, Traffic Sig	3,729	Streetlights, Traffic Sig	2,796		
Employee Commute	38,290	Employee Commute	31,818		
Vehicle Fleet	29,591	Vehicle Fleet	30,808		
	123,397		109,173		
TOTAL REMAINING	4,977,044		3,312,484		

a) Risk Mitigation – Have possible actions ready to be implemented

If some GHG reductions sources fail to come to fruition, instead of going directly to carbon offsets, as described in Section 2.3, the CAP should identify and prepare for substitute actions. Some possibilities are shown below. The CAP should include a risk mitigation plan.

EXHIBIT 3

CAP Chapter 2 Measures	Actions that could be taken:	GHG reductions	Sector
GHG-01: Carbon Farming	Put an additional 200,000 acres into carbon farming. ³	.378M	Agriculture
GHG-04: Energy Effic., Electrification of Existing Nonres. Buildings	Accelerate the retrofit of 75% existing non-residential buildings instead of 25%. ⁴	.032M	Energy - Commercial
GHG-06: Energy Effic., Electrification of Existing Resident'l Buildings	Accelerate the retrofit of 75% of existing residential buildings instead of 25%.	.354M	Building Energy
GHG-10: Electric Vehicle Infrastructure Program	Implement an additional 1,170 chargers.	.104M	On-Road Vehicles

³ How much acreage in the County can do Carbon Farming? Can the County require these practices?

⁴ The emission reductions from nonresidential buildings seem small. Please explain.

b) Risk Mitigation – The planning work must start earlier

Each planning activity listed below is taken from the GHG reduction measures in the CAP and is therefore necessary for the GHG reduction to occur. Altogether, this is a lot of planning work. This should be done as soon as possible to enable the GHG reductions to begin. The CAP includes a completion date for some activities but not for all.

The County needs to accelerate the planning work, to achieve completion of all the amendments, changes, updates, and developments by December 2022. This will require additional planning staff.

EXHIBIT 4

Measures that require Planning Work to start GHG reductions	
No.	GHG Measure
7	Energy Code - Reach Code for New Residential Buildings
11	VMT Mitigation Program
12	Zoning Code to include a TSM Plan
13	Zoning Code to modify Parking Standards
14	Plan transit connections, coordinate with SacRT
15	Pedestrian Master Plan or Active Transportation Plan
15	Pedestrian Capital Improvement Program
15	Complete Streets Policy
16	Development Standards for new and existing Roadways to include Traffic Calming
17	Zoning Code to ensure preferred siting of employee bike parking and encourage bike use
18	County’s Federal/State Legislative Priorities document to encourage fuel-efficient vehicles
19	Building Code - Require Electric Vehicle Charging infrastructure (EVSE)
19	Development Standards for Electric Vehicle charging infrastructure
20	Active Transportation Plan to add Safe Routes to School and related capital improvements
21	Community Plans and Corridor Plans in urban areas to support infill and TOD
22	GIS-based scoring system to screen new development for access to destinations
23	Set up account to facilitate infill dev w/fees on DU in Approved & Pending Master Plans

2) The CAP should address capacity building

a) Hire more planning staff

The CAP should call for the hiring of more staff to complete as soon as possible the planning activities listed above. The planning work enables GHG-reducing follow-on activities, including the design and construction of many capital improvements. A building boom is needed to achieve the GHG reductions called for by 2030. Federal funding may become available to help build the infrastructure, and the County should be ready by having the planning work complete.

b) Set up a climate team to coordinate the County’s efforts

In Chapter 4 Implementation, the CAP mentions the Climate Emergency Mobilization Task Force and calls for coordination with it. The CAP needs to go much further: it should call for and describe this climate team, its composition, and roles, responsibilities, and authority, so that the team can be engaged and go into action immediately following the Board of Supervisors’ approval of the CAP.

3) The CAP should include a financial component

a) Alignment of values

To ensure the County's time, effort, and revenue are effective in reducing GHG emissions, the CAP should require a determination of consistency with CAP strategies for the County's planning, capital improvement projects, and operations, as well as for plans and projects proposed by other parties. This is a necessary step. For example:

- SACOG favors grant applications for projects aligned with the MTP/SCS.
- California State Transportation Agency (CalSTA) reviews projects funded with State transportation funds for consistency with its goals.
- Governor Newsom's Executive Order N-19-19 called for the creation of a Climate Investment Framework to leverage state funds to drive investment toward carbon-neutral technologies.⁵
- The 2015 Paris Agreement calls for "Making finance flows consistent with a pathway towards low greenhouse gas emissions and climate-resilient development."⁶

b) Funding plan and costs to implement the CAP

The CAP identifies only two fund sources, both from new developments. The revenue from both sources is to be invested into high-density infill projects, per Chapter 4 Implementation, bullet 9.

- In GHG-11, the County plans to charge fees to new developments that do not achieve a 15 percent reduction in daily VMT compared to the regional average. The fees will be collected to offset VMT impacts and put into a County VMT mitigation bank.
- In GHG-23, the County plans to charge \$1000 for each dwelling unit in the Approved or Pending Master Plans listed in Measure CHC-23 Incentivize Infill Development, Table 4, page 19.

Although we want funds to go toward infill development, it is disheartening to see the arrangement laid out in the County's CAP, in which less VMT- and GHG-producing infill development is dependent upon the successful implementation of more VMT- and GHG-producing greenfield development, namely the Approved and Pending Master Plans. The County should review its budget and reprioritize and reorganize its revenue and funding methods to ensure achievement of the CAP's emission reduction goals, especially because the fate of Pending Master Plans cannot be assured.

Regarding the cost to implement the CAP, the qualitative cost analysis in Appendix G gives us a rough idea of the County's administrative costs. The CAP should develop an order-of-magnitude cost estimate with a breakdown that includes administrative and professional; operations; and capital costs for both County and Others. Based on this cost estimate, the CAP should develop a funding plan. Both the cost estimate and funding plan should be included in the CAP document and be part of what is approved by the Board of Supervisors. Without these, the CAP will not be able to achieve its goals.

⁵ <https://www.gov.ca.gov/2019/09/20/ahead-of-climate-week-governor-newsom-announces-executive-action-to-leverage-states-700-billion-pension-investments-transportation-systems-and-purchasing-power-to-strengthen-climate-resili/>

⁶ https://unfccc.int/sites/default/files/english_paris_agreement.pdf Article 2, Para.1(c)

4) The CAP should strengthen transportation as a strategy, especially the On-Road Vehicle Sector.

The 2030 forecasted GHG reductions in the On-Road Vehicle Sector are relatively modest, given that this sector contributes over a third of GHG emissions in the County (see GHG Inventory in Exhibit 2 above.) The combined Adjusted BAU and GHG Reduction Measures reduce this Sector by only 17 percent.

EXHIBIT 5

On-Road Vehicle Sector			
Percent Reduction	Total GHG emissions	Reduction in GHG emissions	Source
	1,671,596		2015 Inventory
12%	1,468,071	203,525	2030 Adjusted BAU forecast
17%	1,386,444	81,627	2030 Community GHG Reduction Measures

The County should take the following actions to increase GHG emission reductions.

a) Accelerate the planning work.

Almost all of the measures in the On-Road Vehicle Sector require planning work before the reductions can begin, so the planning work must be completed as soon as possible. Refer to Para. 1b and 2a above for more information.

b) Install more EV chargers. Measure GHG-10 Electric Vehicle Infrastructure.

At 34,867 MTCO₂e/year, this measure reduces more than any other On-Road measure. Is the number of installed chargers, 390, based on assumed EV demand or on available resources? The CAP should explain how this number can be increased.

c) Make increasing transit ridership one of the County’s first priorities.

Improved Transit Access (Measure GHG-14) is essential to reducing on-road vehicles. The CAP should provide specific progress benchmarks for this measure and explain how this measure can be substantially strengthened.

5) The CAP should treat *Compact Land Use Development around Transit (Infill Zones)* as a strategy.

a) The Rationale

Due to the region's growth pressures, a majority of people in the County are unlikely to be able to live in single-family neighborhoods, but in multi-unit housing that is convenient to transit and work sites.

This shift to more a more compact, walkable development pattern, has been promoted for over twenty years by the California legislature and governors, and by regional governments such as SACOG, in order to reduce GHG emissions per capita, reduce VMT per capita, increase housing affordability, increase access and equity of access to destinations and services, improve the quality of public spaces, improve public health, protect open space, and reduce energy consumption during construction and during operations. The idea is to build more sustainable communities.

“Senate Bill 375 requires CARB to develop and set regional targets for greenhouse gas (GHG) emission reductions from passenger vehicles. CARB has set regional targets, indexed to years 2020 and 2035, to help achieve significant additional GHG emission reductions from changed land use patterns and improved transportation in support of the State's climate goals, as well as in support of statewide public health and air quality objectives. Metropolitan planning organizations (MPOs) must prepare a sustainable communities strategy (SCS) that will reduce GHG emissions to achieve these regional targets, if feasible to do so.”⁷

In a paragraph on Cross-Sector Interactions, CARB's Scoping Plan states: “more compact development patterns reduce per capita energy demands, while less-compact sprawl increases them.”⁸

This development pattern deserves to be its own strategy in the CAP. By giving it a platform in the CAP, the County would be taking a stand against the GHG-generating impacts of sprawl.

The strategy itself: Reduce emissions-generating sprawl-type land use patterns by promoting and investing in infill zones. These zones will have infill housing and three- to ten-story mixed-use developments located in established communities and along commercial corridors. This compact development will bring together retail, work sites, and residences, around transit stations and along walkable, bikeable streets served by bus transit. Lower density development just beyond the infill zones will enjoy easy access to populated public spaces, shops, and transit.

b) Suggested names for this strategy

The strategy could have a name similar to one of the two transportation strategies in the CAP – it could be called *Reduced Land Consumption for Development and Alternative Land Use Patterns* -- but *Compact Land Use Development around Transit/Infill Zones* seems more positive.

⁷ <https://ww2.rb.ca.gov/our-work/programs/sustainable-communities-program/regional-plan-targets#:~:text=CARB%20has%20set%20regional%20targets,health%20and%20air%20quality%20objectives>

⁸ https://ww2.arb.ca.gov/sites/default/files/classic/cc/scopingplan/scoping_plan_2017.pdf, pg 67

c) Other jurisdictions have a strategy for this

San Francisco’s draft Climate Action Plan has both a Transportation/Land Use Strategy and a Housing Strategy.⁹ Below is TLU 6: Increase density, diversity of land uses, and location efficiency

TLU 6: Increase density, diversity of land uses, and location efficiency across San Francisco.

Supporting Actions

- TLU 6-1: By 2023, re-zone to allow for multi-family housing throughout San Francisco.
- TLU 6-2: By 2023, increase the types of home-based businesses allowed in residential districts to reduce commute trips and provide more flexibility in how space can be used by San Franciscans.

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WORKING DRAFT | DECEMBER 2020

- TLU 6-3: Create an interagency working group or division to facilitate the development of neighborhoods where people live within an easy walk or roll of their daily needs (e.g., parks, retail goods, services).
- TLU 6-4: Every five years, identify and reimagine under-utilized publicly owned land and roadways that could be transformed or repurposed.
- TLU 6-5: Design public space and the transportation system (including roadways) to advance racial and social equity by co-developing public spaces with BIPOC community members and understanding their needs before designing the space.

d) GHG Reduction Measures would change if this strategy were added

The GHG reductions from compact development patterns are varied, such that multiple sectors are needed to account for them – Agriculture, Energy Residential, Energy Commercial, and On-Road Vehicles.

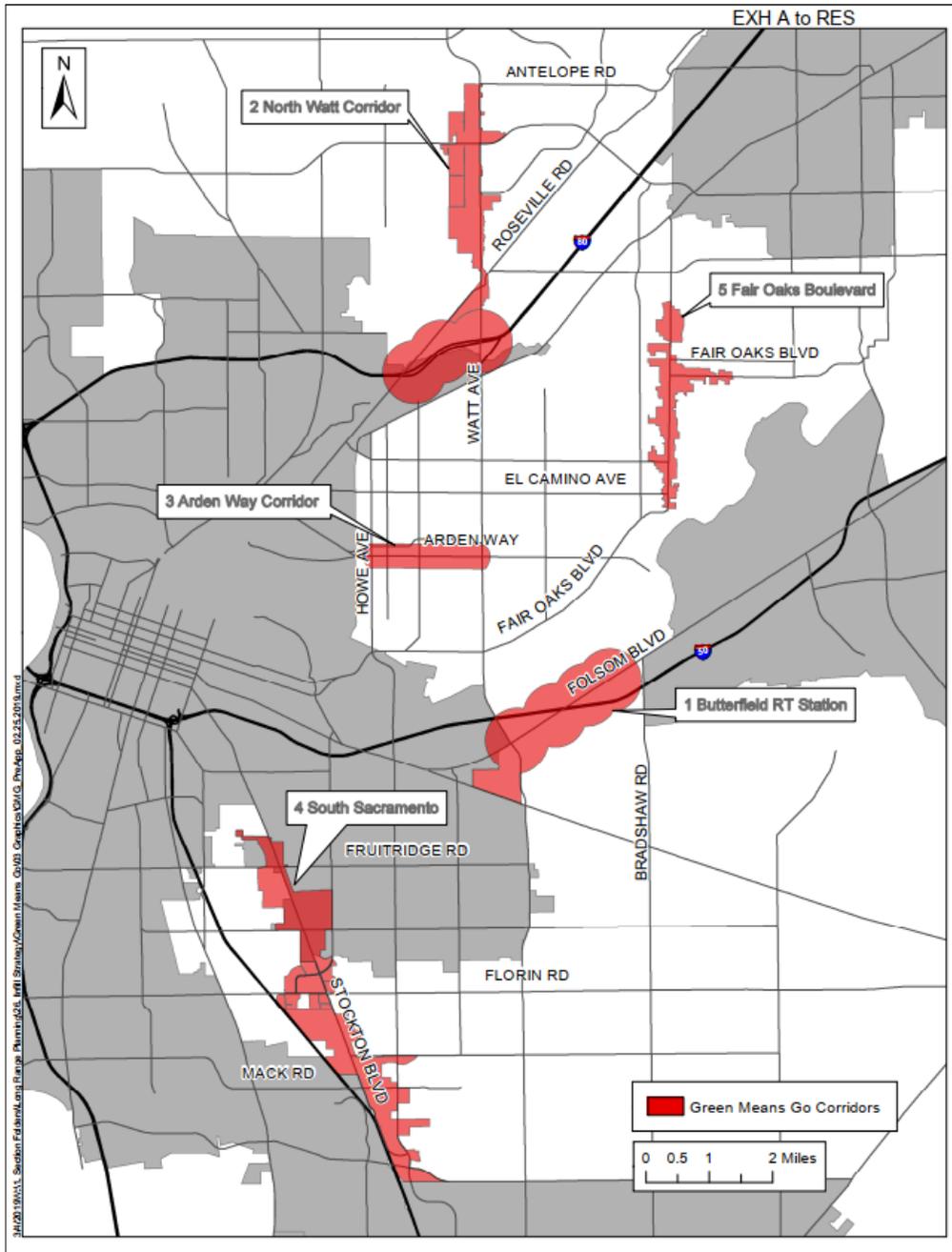
Among others, Measure GHG-23 Incentivize Infill Development would change. It would actually describe steps the County would take to incentivize infill development and set benchmarks/target indicators to show progress. Because the County has identified infill capacity for 33,000 dwelling units, the CAP should set a target of at least 10,000 dwelling units (DU) in Infill Zones by 2030, another 10,000 DU by 2040, and another 10,000 DU by 2050. This would not fulfill the County’s Regional Housing Needs Allocation of 21,272 for 2021-2029, but it would be a good start.

Measures would also describe the reduced energy used to manufacture the fewer materials required by multi-unit dwellings, and the reduced energy used by residents to operate their dwelling unit.

⁹ <https://sfclimateaction.konveio.com/>

e) **Examples should be given.**

The County's identification of Green Zones for SACOG's Green Means Go initiative is a good start. The County recently proposed 10,000 dwelling units for five of the six the highlighted infill areas on the map.



Taylor. Todd

From: PER. climateactionplan
Subject: Questions/comments on Draft Climate Action Plan

From: Jim Wiley <jwiley@taylor-wiley.com>
Sent: Friday, April 9, 2021 11:14 AM
To: Smith. Todd <smithtodd@saccounty.net>
Cc: Angelo G. Tsakopoulos <agtesq@tsakvest.com>
Subject: Questions/comments on Draft Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Hi Todd,

Thank you for discussing the draft Climate Action Plan with us yesterday. Based upon our discussion we have narrowed our questions regarding the draft to the following:

- How are the measures applied to land use entitlements? For instance, with a major Master Plan or Specific Plan where there is a GHG reduction plan and the project results in less than 4.0 MT CO₂e per capita in 2030, how are the measures implemented? Are they all required to be implemented?
- How does this apply to Master Plan Projects already approved with or without zoning and/or maps?
- In particular, Is Measure GHG-23 going to be implemented through a fee ordinance? Will it apply to all new development? Will it be prorated by location, i.e. VMT or some other metric? How will the funds be used? How will the reduction in GHG be quantified?
- How will uses (some essential, i.e. hospitals, concrete and asphalt batch plants) that require the use of natural gas be allowed?

Please let us know if you have any questions about or questions.

Thanks,
Jim

Jim Wiley
TAYLOR & WILEY
500 Capitol Mall, Suite 1150
Sacramento, CA 95814
916.929.5545

CAUTION: THE INFORMATION CONTAINED IN THIS ELECTRONIC E-MAIL AND ANY ACCOMPANYING DOCUMENT(S) IS INTENDED ONLY FOR THE USE OF THE ADDRESSEE AND MAY BE CONFIDENTIAL, MAY BE PRIVILEGED (ATTORNEY-CLIENT, ATTORNEY WORK PRODUCT, RIGHT TO PRIVACY) AND MAY CONSTITUTE INSIDE INFORMATION. IF ANY READER OF THIS COMMUNICATION IS NOT THE INTENDED RECIPIENT, OR THE EMPLOYEE OR AGENT THAT IS RESPONSIBLE FOR DELIVERING THE COMMUNICATION TO THE INTENDED RECIPIENT, UNAUTHORIZED USE, DISCLOSURE OR COPYING IS STRICTLY PROHIBITED, AND MAY BE UNLAWFUL. IF YOU HAVE RECEIVED THIS COMMUNICATION IN ERROR, PLEASE IMMEDIATELY NOTIFY US AT (916) 929-5545, AND DELETE THE ORIGINAL MESSAGE FROM YOUR ELECTRONIC MAIL BOX.

Taylor. Todd

Subject: Comments on Sacramento County Draft Communitywide Climate Action Plan, re Communitywide Greenhouse Gas Reduction and Climate Change Adaptation (Communitywide CAP) Project

From: Steve Uhler <sau@wwmpd.com>

Sent: Friday, April 9, 2021 11:21 AM

To: PER. climateactionplan <climateactionplan@saccounty.net>

Subject: Comments on Sacramento County Draft Communitywide Climate Action Plan, re Communitywide Greenhouse Gas Reduction and Climate Change Adaptation (Communitywide CAP) Project

EXTERNAL EMAIL: If unknown sender, do not click links/attachments.

Understanding Renewable Energy Credits and Power Content

Hello Climate Action Planners,

Comments on Sacramento County Draft Communitywide Climate Action Plan

<https://planning.saccounty.net/PlansandProjectsIn-Progress/Documents/Sacramento%20County%20Draft%20Communitywide%20Climate%20Action%20Plan.pdf>

Know the source of electricity and who has legal title to Renewable Energy Credits (REC) to ensure others will consider Sacramento County as making progress toward or is achieving zero carbon or zero Greenhouse Gas (GHG) emissions.

Review the below EPA.gov link to understand how to utilize rules for claiming the making of progress toward or is achieving zero carbon or zero GHG emissions in the electricity sector.

Ensure your contractual right to make claims.

Ensure your purchase does not count towards a mandate.

Make claims that match the scope of your purchase.

Organizations should avoid making claims where green power purchases originate from projects in markets outside of where the green power will be applied.

Retain ownership of RECs for on-site green power.

Retire the RECs associated with your green power purchase.

Support your claims by buying certified or verified green power products.

Limit claims to indirect emissions.

Use the terms "REC" and "offset" correctly in your claims.

RECs substantiate the claim that you are using a specific number of megawatt-hours of renewable electricity from a zero-emissions renewable resource.

Follow Federal Trade Commission (PDF) (36 pp, 195K) and National Association of Attorneys General green marketing guidance.

See, <https://www.epa.gov/greenpower/making-environmental-claims> for more detail.

Review SMUD's 2019 Power Content Label, note that some green pricing programs deliver mostly natural gas sourced generation.

<https://www.smud.org/SMUDPCL>

Don't make claims to renewable energy to show GHG reductions, if Sacramento County does not or will not have legal title to RECs verified through unimpaired contracts for renewable energy sourced electricity.

Steve Uhler
sau@wwmpd.com

Taylor. Todd

From: coyote1@surewest.net
Sent: Friday, April 9, 2021 1:24 PM
To: PER. climateactionplan
Subject: CAP Comments

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Comments on County Climate Plan

Rick Codina April 9, 2021

This is a frankly disappointing Plan that does little to advance the County's efforts to reduce greenhouse gas (GHG) emissions in concert with state and other regional efforts. It offers few concrete prescriptive solutions and instead relies heavily on education, persuasion and the programs and incentives of other agencies such as the Sacramento Municipal Utility District. I have two specific areas for complaint:

Agricultural Sequestration. The Plan ascribes more than half of its community GHG to modified agricultural practices of county farmers including the use of compost and advanced grazing and tillage techniques. While these actions may in fact result in emission reductions, they should be verified by an approved climate certification agency such as the Climate Registry to be credible before being counted in the County's goals. Moreover, it appears that the County's role in these efforts is relatively tangential. It will not be providing compost to farmers for example, and it is unclear if the County currently employs farm advisors who can provide the ongoing expertise or monitoring to ensure successful implementation over time.

Building Electrification. In my view, the proposal for a residential ordinance (GHG-07) requiring all-electric new construction is the most directly effective recommendation in the Plan. It mirrors ordinances under consideration by the City of Sacramento and already in effect in more than 40 other California cities. But the County does not go far enough. It does not include new commercial buildings for all-electric construction, calling only for a rather tame CalGreen Tier 1 compliance. And it fails to address natural gas space and water heating equipment in existing buildings where the bulk of GHG sources reside. Instead, it makes a weak call for education and unspecified collaboration with utilities (GHG 5 and 6) for energy conservation. This confuses the metric of GHG reduction which relies on the far more effective actual removal of gas-using equipment, with energy conservation which focuses on efficient appliances regardless of the fuel source.

My biggest issue is the Plan's cop-out concession that it need not pursue meaningful GHG reduction actions because the County is already in compliance with current statutory requirement, largely because of other state regulatory actions and SMUD's proposed Carbon Zero Plan. SMUD, for its part, has elected to go beyond SB-1 and the ARB's Scoping Plan requirements, instead setting goals to meet its Climate Emergency Declaration. The County has also approved the same Climate declaration which pledges to reduce carbon emissions to zero by 2030. It is this goal which the Plan should be focused on.

Taylor. Todd

From: Laurie Litman <llitman@pacbell.net>
Sent: Friday, April 9, 2021 2:14 PM
To: PER. climateactionplan
Subject: Do better

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

The current Climate Action Plan (CAP) draft is unacceptable!! After almost a decade of delay, it is very obvious that the County is not even trying to seriously address the biggest challenge of our lifetime: climate change.

I have children and grandchildren who will be even more impacted than we are today, and already we are seeing catastrophic wildfires and air pollution, drought, extreme weather, food and water insecurity, flooding, novel diseases, and more. According to the IPCC, we have fewer than 10 years to cut our emissions drastically. Sacramento County must do its part.

I am embarrassed for the County that you don't understand the extent of the threat—our grandchildren may not survive your willful neglect of science and common sense. This CAP ignores the actions needed to preserve a safe future, and tries to avoid robust actions with meaningless words, assumptions, and actions (such as depending on SMUD's actions rather than taking responsibility to cut the County's emissions).

You know what needs to be done...DO IT!! Below are some major problems with this draft CAP.

1. The draft CAP does not reflect the County's Climate Emergency Declaration (CED). There is fig-leaf verbiage but no substantive action based on the CED's specified 2030 carbon-neutral goal. In fact, the draft would defer the CED provisions until a proposed 2024-25 CAP update! The CAP just kicks the can down the road, where implementing measures to avoid runaway climate change will be even more difficult.
2. The draft CAP does not offer actions to prioritize infill over sprawl development. Sprawl is the major driver of passenger VMT, the County's biggest source of GHG.
3. Carbon offsets are a cop-out and should be used only as a last-ditch effort when other

actions have failed. Offsets should not be part of the initial set of actions to address the climate crisis. If offsets are used, they must be kept local to both reduce GHG emissions and provide benefits to disadvantaged communities.

4. Most of the CAP measures are a joke. They will be impossible to enforce and monitor because they are described ambiguously or in aspirational terms, defer formulation of mitigation, do not identify costs and funding, propose partnership or collaboration with uncertain effect, do not identify or commit to a schedule of performance, and state final 2030 goals without interim milestones.

5. The draft CAP does not provide robust public involvement in its development. What are you afraid of? Combating climate change requires community-wide input and action.

6. The draft CAP assumes SMUD will meet its aspirational 2030 carbon-zero goal, reducing the need for County action. That's ridiculous! We applaud SMUD for their actions, but no matter what SMUD achieves the County must also do all they can to address the climate crisis.

7. The draft CAP does not provide an adequate Implementation Plan. Implementation is everything, the rest is just words. You need to do better!!!

Laurie Litman

llitman@pacbell.net

301 27th St

Sacramento, California 95816

Taylor. Todd

Subject: Corrected copy - Sierra Club & Sac Climate Coalition Comment letter re: County CAP Public Draft
Attachments: CAP Public Draft SC.SCC Comments 4.9.2021 FINAL.pdf

From: Sacramento Sierra Club <sacramentosierraclub@gmail.com>

Sent: Friday, April 9, 2021 1:22 PM

To: Smith. Todd <smithtodd@saccounty.net>; Lundgren. John <lundgrenj@saccounty.net>; Frost. Supervisor <SupervisorFrost@saccounty.net>; Nottoli. Don <nottolid@saccounty.net>; Supervisor Serna <SupervisorSerna@saccounty.net>; Kennedy. Supervisor <SupervisorKennedy@saccounty.net>; Rich Desmond <RichDesmond@saccounty.net>

Cc: Katrina H <kandchf@gmail.com>; Sean Wirth <wirthsoscranes@yahoo.com>; info@sacclimate.org

Subject: Corrected copy - Sierra Club & Sac Climate Coalition Comment letter re: County CAP Public Draft

I am sending a corrected copy of the comment letter submitted earlier containing the Sierra Club and Sacramento Climate Coalition Comments on the March 2021 Public Draft of the CAP. It was amended to add a line denoting the nature of the document.

Please replace the document sent at 12:21 pm

Thank you,

Barbara Leary, Chairperson

Sierra Club Sacramento Group

909 12th Street, Suite 202, Sacramento, CA 95818

www.sierraclub.org/mother-lode/sacramento

sacramentosierraclub@gmail.com

Follow us on [Facebook](#) and [Twitter](#)!



SIERRA CLUB

SACRAMENTO GROUP

909 12th Street, Room 202
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April 9, 2021
*corrected copy

Todd Smith, Principal Planner
John Lundgren, Senior Planner
County of Sacramento
Department of Community Development,
Planning, and Environmental Review
827 7th Street, Room 225
Sacramento, CA 95814

County Board of Supervisors, Chair Frost, Vice-Chair Nottoli, Serna, Kennedy, & Desmond
700 H Street, Sacramento 95814

Sent via email: smithtodd@saccounty.net , lundgrenj@saccounty.net , SupervisorFrost@saccounty.net ,
nottolid@saccounty.net , SupervisorSerna@Saccounty.net , SupervisorKennedy@saccounty.net ,
richdesmond@saccounty.net

RE: Sacramento County Climate Action Plan March 2021 Public Draft

Dear Mr. Smith and Mr. Lundgren, Supervisor Chair Frost, Vice-Chair Nottoli, Supervisors Kennedy, Desmond, and Serna,

Thank you for the opportunity to address the ongoing development of the Sacramento County Climate Action Plan (CAP) following the release of the Public Draft. The comments in this document reflect the ongoing concerns that both the Sierra Club and the Sacramento Climate Coalition have with the Public Draft, and therefore do not support the CAP in its current form.

Recognizing that the CAP is following the State guidelines, the current document is insufficient as we face an unprecedented climate crisis. The Climate Emergency Declaration passed by the Board of Supervisors in December of 2020 addresses this and calls for carbon neutrality by 2030. We find the plan to be wholly inadequate as a Climate Action Plan, as the plan does not lead the County to carbon neutrality by 2030 and in fact predicts over 3.2 million MTCO_{2e}/year in 2030. Therefore, there should be no target dates for carbon neutrality and zero emissions other than 2030 in the document to avoid confusion. There should be a sense of urgency communicated throughout the document, as well as concrete, timely measures to reach carbon zero by 2030.



info@sacclimate.org

The CAP and the Appendix must create a hierarchy of priorities with the highest being those that will eliminate and sequester greenhouse gas emissions the fastest and to the greatest extent.

We have found that there are a significant number of missing CAP measures to support the County General Plan Policies, particularly in sections where General Plan Policy text is also vague though aspirational. We found a lack of time frames for initiation and monitoring of CAP measures, implementation and enforcement of the measures, and recommended funding mechanisms to support the CAP measures.

We are hoping to see more specificity in the CAP measures as the document is re-evaluated following the input the County receives from comments submitted by our and other concerned environmental organizations. The Environmental Council of Sacramento, 350 Sacramento, and the Citizens Climate Lobby have submitted comments that we also share and support. We incorporate their comments into this letter by reference.

In addition, we are not supportive of purchasing carbon offsets. If carbon offsets become a part of the plan, they must be monitored, tracked, and reported on annually. Additionally, if carbon offsets become a piece of the GHG reduction plan they, along with other mitigation measures such as tree mitigation for protected species, wetland mitigation, and open space mitigation must have specificity in implementation included in the CAP. We want to see assurances that each mitigation measure noted in the CAP is done within the County. Any in lieu fees for mitigation projects for habitat should aid in the enhancement of existing restoration projects, for example along the American River Parkway, for the augmentation of existing Habitat Conservation Plans, and establishment of additional habitat conservation areas and easements to account for the loss of sequestration capacity when open lands/farmland is lost to development.

Sierra Club Specific Comments

To meet conservation, land use, and open space goals seen in the Climate Action Plan we recommend that the County engage a professional grant writer to aid staff in obtaining State and Federal funding to meet conservation goals as noted in many of the changes we are requesting. Funding programs to accomplish this could include the \$1,000 per dwelling unit for new construction that has been proposed. The proposal to institute a “one size fits all” fee structure is counter-intuitive and not consistent with the need to address environmental justice issues by not treating disadvantaged communities the same as wealthier neighborhoods where affording a slightly higher fee would not be a burden.

We also want to express our dismay that the measure to “Preserve Lands Identified in the SSHCP Voluntary Conservation Targets” was removed from the Administrative draft of the CAP. It is important to prioritize work to ensure that the blue oak woodland and associated habitat conservation goals in the northeast portion of the SSHCP Plan area, as laid out in the Appendix J of the SSHCP “above and beyond” conservation” targets, are realized. This will have the benefit of preserving important GHG sequestration resources while also providing protection for the only large remaining connectivity corridor to join the south and the north county in the eastern portion of the county.

The reason for dismissal (feasibility and cost) does not seem to take into account the realities associated with SSHCP Appendix J and the "above and beyond" targets found therein. Because the voluntary

targets are part of a regional conservation strategy, they have an elevated status when it comes to seeking grant funds for conserving the lands identified as targets for voluntary conservation in the SSHCP. The county would not be incurring much, if any, cost by supporting those grant writing efforts. As for feasibility, supporting grant writing efforts is hardly a heavy lift, especially if the county is not writing the grants. It is unclear what is infeasible, and we suggest the County reconsider this dismissal.

Following are examples of areas in the CAP that are of particular concern, where there is a disconnect between the General Plan policies and Supportive CAP measures in Appendix C:

Agriculture

Page C-1 - Ag 12 -15-17: The General Plan Policy states in these sections that “the County will cooperate with landowners of agriculturally zoned properties to promote the placing of natural preserve/mitigation amenities”, “create mitigation banks, environmental mitigation sites, wildlife refuges, or other resource preserves...”, and “establish conservation easements combining preservation of agricultural uses, habitat values, and open space on the same property”. These measures are missing CAP measures which would support implementation and should note that conservation easements, when combined with agricultural land, need to exclude those lands without or with little habitat value (i.e. tree and vineyard properties). Converting agricultural land with unsupportive crops, such as trees/vineyards, to row crops reduces the expense of land purchases for habitat use as compared to buying row crop land.

Conservation

There are multiple references in the tables intended, but often fail, to show that General Plan Policy is supported by various CAP measures. For example, the oft-used Flood Control measure 3 is often listed as the supportive CAP measure “prioritizing green infrastructure solutions” yet does not direct that “new locations suitable for multi-benefit..., flood control...and habitat restoration” occur within the County, approximate to areas disrupted by development, or with native mitigation vegetation and trees known to be high in carbon-sequestration. More specifically we find that the following areas lack detailed CAP measures as described.

Page C-18-19 - CO 19, CO 20, CO 21, CO 25, and CO 26 and Pg. C-22 CO-58, regarding the American River, Cosumnes River, and Sacramento River habitat & ecosystem preservation, maintenance, and restoration: Specific time frames and actions should be delineated to identify funding needs, the time frame for implementation, responsible agencies, and evaluation of monitoring, outcomes, and frequency of reporting to the Board of Supervisors. The CAP Measures Flood-03 and 14 do not accomplish these important goals.

Page C-22, CO- 61 and 62: The General Plan Policy notes that “Mitigation should be consistent with Sacramento County adopted habitat conservation plans” and “Permanently protect land required as mitigation”. There is no supportive CAP measure for either of these statements. This is of critical importance as mitigation land is becoming scarce as now evidenced by the lack of land in the North Natomas Basin to accomplish the goals of the Natomas Basin Habitat Conservation Plan. A CAP measure is needed to commit the County not to disrupt the NBHCP strategy.

CO-63 and 64: The General Plan Policy states, “Vernal Pools, wetlands, and streams... shall not be drained” and “Support and facilitate the creation and biological enhancement of large natural

preserves...” Measure Flood-03 does not accomplish these goals. Again, mitigation for the loss of this must be done within the County, specifically near or adjacent to the area where the loss has occurred. In addition, there are no supportive CAP measures related to CO-66 and 67 regarding mitigation site monitoring and management. CO-69 is also without a supportive CAP measure. The general policy text should be amended to prohibit new infrastructure for development in wildlife preserves.

Page C-23 CO-72,73 and 76 regarding easement dedication and fee title to open space lands as a condition of approval: There is no CAP measure corresponding to these General Plan policy statements, and the wording does not assure the County that these actions will take place within the County, nor is there a CAP measure to support the “aid in recovery of special status species”.

Page C-24 CO 90 and 99: General Plan policy text notes “Increase riparian woodland, valley oak riparian woodland and scrub habitat...” and “encourage habitat restoration”. There is no supportive CAP measure for either of these General Plan policy texts. Known carbon-sequestering native plants and trees must be used in habitat restoration to enhance CO2 reductions. The California Native Plant Society Homegrown Habitat program should be noted as a resource in plant selection in addition to the Sacramento Tree Foundation.

Page C-28 CO 118: General Plan policy text notes “Development adjacent to waterways...should” (not shall which would be appropriate) preserve and enhance riparian habitat and its function.” There is no CAP measure noted.

CO-130: General Plan policy text notes “Protect, enhance and restore riparian, in-channel and shaded riverine aquatic habitat...” Measure Flood 3 and 9 do not outline funding mechanisms for research and planting that should be identified, such as in lieu fees or monies from future assessments on housing development.

Page C-29: General Plan policy text notes “If the project site is not capable of supporting all the required replacement trees...replacement cost...may be paid into the Tree Preservation Fund”. GHG-02 does not specify that mitigation is within the County, nor does it require a monitoring or reporting plan for successful mitigation.

Page C-30 CO -143 and CO-144 regarding General Plan policy text referring to new tree plantings and regional Greenprint: Again GHG-02 needs a monitoring or reporting plan for successful mitigation.

Page C-31 CO-145: Mitigation in GHG-02 for tree loss should be within County, approximate to site of tree removal, mandated and enforced in residential and parking lots.

Land Use

We would like to see the retention of open space lands as a specific percentage of land, mirroring the goal of Governor Newsom who proposes “to preserve and protect **30%** of the state's lands...by 2030.” The addition of such a CAP measure would support long term carbon sequestration goals in Sacramento County. Efforts to maintain open space and habitat with long term conservation plans through Land Use CAP measures has the co-benefit of reducing sprawl and the production of greenhouse gases that result from the transportation sector. Areas of particular concern in this section of the document are as follows:

Page C-43 LU-12: General Plan Policy notes that “the County will prohibit land use projects which are not contiguous to the existing UPA”. However, there is no corresponding CAP measure. LU -15 is also without a CAP measure and “should be” rather than “will be” is noted in this General Plan Policy that reads “Planning and development of new growth areas should be consistent with Sacramento County Habitat Conservation Plans and other efforts to preserve and protect natural resources”. No enforceable measure appears to exist that would ensure consistency with habitat conservation plans throughout the County.

Page C-53: General Plan Policy notes in LU-123 “Before granting approval of an amendment to the Land Use Diagram the BOS shall find that: ... (bullet 2 •) the request is consistent with the goals and objectives of the Sacramento County adopted Habitat Conservation Plans” There is no supportive CAP measure to ensure that lands are set aside to support the existing Habitat Conservation Plans. Lands needed to maintain the Habitat Plan objectives must be set aside and direction included in any amendment to the Land Use Diagram.

Page C-54 LU-127: The General Plan Policy notes that “The County shall not expand the USB unless” followed by 7 bullet points allowing exceptions for this to occur. There is no Supportive CAP measure to evaluate the frequency of use of the exceptions or a method evaluating the amount of land lost to development before these exceptions may be made, nor is there a limit on expansion of the USB. This results in allowing expansion of growth outside of the USB without ensuring that existing Habitat Conservation Plans can survive since the County has not signed onto plans such as the Natomas Basin Habitat Conservation Plan or actively sought to facilitate other such plans.

Open Space

While the County General Plan Policy notes that Open Space is an essential component to reducing greenhouse gas emissions, there is little support in the CAP measures to do so. The CAP lacks details both in limiting the growth of development into undeveloped areas of the county, and in actively supporting the retention of important lands and habitat that serve as carbon sinks.

We believe that the following references substantiate the value of preserving native plant species, trees, and wetlands by establishing and maintaining open space for carbon sequestration and reducing the heat islands that are created by development.

1) From savanna to suburb: Effects of 160 years of landscape change on carbon storage In Silicon Valley, California [Erin E.Beller^{ab}MaggiKelly^{cde}Laurel G.Larsen^b](#)

<https://www.sciencedirect.com/science/article/pii/S0169204619307741>

2) Institute for Local Government – Open Space and Offsetting Carbon Emissions

<https://www.ca-ilg.org/open-space-offsetting-carbon-emissions>

Cost Savings of maintaining open space: reduced need for energy production.

There is reference in several General Plan Policy sections of the document noting that the County should support the creation of an interconnected preserve system through mandatory mitigation and voluntary conservation targets. However, these are again not supported by CAP measures.

Page C-54 OS-1, 2: These General Plan Policies both support active protection of natural resource spaces with interconnectivity and adequate size to sustain ecosystems. There is no supportive CAP measure to

ensure that open space including areas of high habitat, woodland, and wetland value are protected and interconnected.

Page C-55 OS-4 and 6: The General Plan Policy notes “Open space acquisition shall be directed to lands identified on the Opens Space Vision Diagram” and “The County may seek to acquire land for open space purposed...”. However, there is no supportive CAP measure to ensure that these goals are accomplished including a funding mechanism for these which could include mitigation, grant fees, and the suggested offset of \$1,000 per dwelling unit fee.

Page C-56 – O-15: The General Plan Policy states “Consider density bonuses as a method of encouraging development clustering...”. This statement lacks a supportive CAP measure defining how this can be accomplished and the benefit implemented.

Additional suggestions for augmenting the CAP measures would be to focus on connecting areas outside of the County to extend the wildlife corridors along the County borders, particularly the Sacramento River Corridor and the Blue Oak woodlands in the East County. We would like to see the preservation of 8,000 acres of “total oak woodland, oak savannah, and grasslands” in the NE portion of the South Sacramento Habitat Conservation Plan above and beyond conservation targets in the East County.

GHG Reduction Measures

As stated in the County’s Climate Action Plan, “On December 16, 2020, the Sacramento County Board of Supervisors adopted a resolution declaring a climate emergency. This resolution states that the Communitywide CAP shall explain the County’s approach to reduce GHG emissions to achieve carbon neutrality by 2030.” However, while Table 1 in the very beginning of the Climate Action Plan shows a reduction in County emissions by 1.6 million MTCO₂e/year, the plan still predicts emissions of over 3.2 million MTCO₂e/year. Currently the plan pays lip-service to the “climate emergency” and then proceeds to ignore this urgency altogether in the actual plan. Significantly more aggressive actions, including S.M.A.R.T. objectives and concrete, enforceable steps, should be identified for nearly all greenhouse gas emissions reductions measures.

Page 3, Table 1: From Table 1, many areas for GHG emissions are projected to decrease by 2030, meeting the Climate Emergency goal. A few are projected to increase, however, and this begs the question of whether the County should implement measures to address these, which include addressing off-road vehicles, and the County’s vehicle fleet.

Many of the plan’s community GHG reduction measures are education and outreach, and few of them are concrete requirements (such as building “reach” code changes as for GHG-05). For example, instead of an incentive program, require fossil-fuel based landscaping equipment be phased out by 2025 and transition to all-electric. In addition, we suggest more of the measures turn into concrete code changes and other actionable items and, in addition, that timeframes be moved up (2025 instead of 2030 implementation for Tier 4 final-rated diesel, 390 electric charging stations, 15% reduction in VMT).

Page 13: For GHG-13, this measure will consist of the County implementation of reduced minimum parking standards and shared parking requirements. We suggest the County follow the lead of the City of Sacramento and take more aggressive measures – eliminating minimum parking standards and increasing investments in public transit.

Page 14: For GHG-14, we appreciate the concrete implementation steps identified. However, no funding mechanisms are identified. As discussed in this letter, funding mechanisms should be identified for all aspects of the CAP's implementation.

Page 15: Measure GHG-17 has no timeframe. We suggest improving 30% of the projects listed in Appendix G by 2025.

Page 17: Measure GHG-21 also has no timeframe. Achieving mixed-use and transit-oriented development within existing population centers is a great goal, but climate change is an immediate and pressing action and we need rapid change now. We suggest setting a goal of implementation of some percentage of mixed-use and transit-oriented development by 2025.

Page 18: We appreciate the detailed and objective metrics included for the concrete implementation of GHG-22. However, no timeframe for developing the GIS based scoring system is provided. We suggest development by the end of 2022. All GHG measures should have this level of specific, measurable, and achievable goals, and in addition they should be time-bound.

Page 19: For GHG-23, the Infill Fee amount should be increased, on a sliding scale based on unit cost, to discourage development in locations that contribute to increased VMT and associated greenhouse gas emissions. An Infill Fee to implement infill should be combined with discouraging greenfield development in the first place.

Page 19: Related to GHG-24, increasing organic waste diversion by 2045 is an extremely long timeframe. We suggest moving this target to a sooner date, perhaps 2025 or 2030, and identifying specific measures to achieve this goal. Also see further detail from the Sacramento Climate Coalition later in this letter.

Page 20: GHG-25 also has no timeframe. Conversion of irrigation pumps to electric should be accomplishable by 2030.

GHG Reduction Measure - Temp

In regards to the Measure Temp CAP recommendations we are asking for the following changes.

Page 35 Measure Temp -08: All parking lot tree coverage requirements should mandate 50% coverage within 15 years in all new lots no matter the size, and to add carbon sequestering tree selection for these areas per recommendation of the Sacramento Tree Foundation.

Page 36 Measure Temp-08: We suggest the CAP be modified to add a section requiring mandatory tree replacement, define a minimum percentage of solar and tree coverage of new parking lots, and add a note to bullet 5 re: grant funding/partnerships for new and retro-fitting existing parking lots "for purpose of commercial and residential greening actions". These suggested modifications support GHG measures 02, 04, and 05.

Sacramento Climate Coalition Specific Comments:

Section 1.1 Purpose of the Climate Action Plan (Page 1): The purpose should not only be to "identify pathways ... to achieve ... emission reductions, in line with State targets ..." The purpose should be restated and identify that this is a plan to meet the December 16, 2020 Climate Emergency Declaration goal of carbon neutrality by 2030.

The overall emission reductions as outlined in the document do not approximate the Climate Declaration's goal. Figures 2-3 and 2-4 need to be revised, showing how the planned actions can meet the carbon neutrality goal by 2030. If identified measures will leave the County short of the goal - the areas in which new approaches or technology are needed should be clearly identified. This could be illustrated by two lines: one which calculates the potential emissions reductions with the actions mentioned in the Climate Action Plan, and the other showing the goal of zero by 2030 - the resultant gap should be discussed in terms of the need to identify near term actions not mentioned in the CAP but which will be needed to meet the goal.

GHG -24 p. 19 Increase Organic Waste Diversion 75% by 2045. Not only is this goal date too late, a comprehensive composting program needs to be established, not just an “increase” to deal with methane production in the landfill. Methane is much worse than CO2 in terms of harm to the environment.

New Measure for Formal Partnership:

Measure: The County will work with SMUD and the City of Sacramento and other municipalities within the County to create a formal joint partnership among the organizations with the mutual intent of eliminating all GHG emissions in the County by 2030.

Implementation: The County will reach out to leadership from SMUD and the city of Sacramento, and create a joint task force with participants from all three organizations, expandable to include other jurisdictions that adopt a climate emergency declaration. The taskforce should meet monthly. Opportunities to leverage scale (purchases of GHG eliminating equipment), conduct common messaging (educate the public on ongoing activities to eliminate GHG emissions), creation of new ordinances and laws to facilitate GHG reductions and other mutually beneficial activities must be identified.

Responsibility: Board of Supervisors

Timeframe: Near-term, in the next 12 months.

Page 51 – 52: In Section 4 Implementation and Monitoring Strategy (misabeled Section 5 in the Table of Contents), we strongly support the position that *“would entail internal coordination across multiple County agencies, with external partners, and interaction with the Board of Supervisors for consideration of actions that allow the CAP measures to be achieved, modified, and funded, as necessary.”*

In addition, it is recommended that the *“new full-time position that would be created as part of the CAP”* be more aptly titled, the Climate Emergency Mobilization Director (CEMD) instead of *“Sustainability Manager”*. We support this position *“reporting to the County Executive”* and the fact that *“the position would be aided by part-time support staff that will be necessary for performing the duties described in this strategy.”* We believe it may also be necessary for the CEMD to have the option to supervise county expert employees in temporary matrix full or part-time assignments to help achieve climate goals and objectives, if approved by the County CEO. It is imperative that this be an executive-level position that is able to work cross-departmentally. This position would naturally work hand in hand with the Climate Emergency Mobilization Task Force.

New Measure for Public Education:

There should be up-front recognition that the County will need to work hand in hand with SMUD, the City of Sacramento, and other municipalities in the County to achieve the mutual goal of achieving carbon neutrality by 2030. We are encouraging the County to create a commission with representatives of each elected governing body in the County with the sole purpose of reaching the 2030 goal. In this light we suggest that another greenhouse gas emission reduction measure be added to the plan: public education.

There are numerous references about public education in the CAP Draft on specific issues, such as:

Measure TEMP-03 p. 32 regarding: heat risks and strategies

Measure FIRE-04 p. 37 regarding: improve upon education re emergency supplies, evac routes etc.

Air Quality p. C 2-1 Appendix C re: transportation and VMT education

Energy - EN-9 p. C-38 Appendix C re: public's need to reduce auto travel

These measures are about specific topics like wildfires and air quality and are important, but public education needs to have its own section in this CAP as it is a vital part of addressing our climate crisis. There is no one category in this CAP draft that addresses the need for public education about climate change and personal and community action that can be taken by Sacramento residents.

As a community, we must engage the public to gain their buy-in and participation regarding the pressing need to remove carbon from the earth's atmosphere on a huge scale. We need to enlist the public in a massive mobilization. Public education should include:

- An overview of the Climate Emergency Plan
- Information re: local climate issues
- Alternative Energy Methods and ways residents can make a difference in terms of personal behaviors – i.e., composting, recycling, turning off lights
- Addressing the business community on their part in this effort – i.e., restaurants and food waste.

Community Engagement should be paramount in the planning of the public education process itself. Equity and social justice in the planning process itself is critical for community buy in. For example, the City of Oakland has been working on forming neighborhood leadership groups in each of the County Supervisors' districts who will work to help implement CED programs - public education, workshops, assemblies, and basic training in climate science. (Oakland 2030 Equitable Climate Action Plan -ECAP) A Climate Emergency Workforce should be created to facilitate the necessary infrastructure and public behavioral changes needed to be successful in combating climate change.

New Measure on Funding:

Another section left out of the CAP, but essential for its success is sources of funding. We suggest adding a section which identifies funding to support implementation of the measures in the Climate Action Plan. In addition, we suggest establishing committees to explore the following ideas, which are successful funding mechanisms used elsewhere.

- We suggest the establishment of a CLIMATE EMERGENCY FUND. This could include mechanisms like designated fees on business licenses or a Utility User Tax aide at the largest users of natural gas. The City of Portland, Oregon has a surcharge on business licenses for the largest businesses which has generated \$30 million a year.

- The fund can be used for retrofitting homes, apartments, community solar, sustainable building projects that benefit the community and training (see Public Education above).
- Portland, Oregon has a model that involves direct work with non-profit organizations, those active in disadvantaged communities, to form a governance board of local leaders. Portland City Council oversees and ensures this governance structure is working as planned. This is an opportunity for the County to collaborate with and support the City of Sacramento on these efforts. There is also a need to replicate these same programs in County areas not covered by the City program, i.e., Arden Arcade, one of the most poverty-stricken areas that is food insecure, and currently has no farmers markets which could be located right behind one of our business centers - the Arden Mall.
- The Portland Clean Energy Fund raises \$54 to \$71 million in new annual revenue for clean energy and clean energy jobs in Portland. Nonprofit organizations, alone or in partnership with for-profit companies, schools and/or other government agencies, can apply for grants from this revenue to weatherize homes, install solar and other renewable energy projects, provide job and contractor training, expand local food production and build green infrastructure in Portland. The revenue is raised by a 1% business license surcharge on the Portland revenue generated by retail corporations with over \$1 billion in annual revenue and at least \$500,000 in Portland revenue.
- On May 8, 2018, voters in the City of Athens, OH approved the opt-out carbon fee to be charged on electric utility usage within the City. The fee was proposed as a local mechanism to adjust energy prices and account for some of the social costs of carbon that result from fossil fuel power plants supplying the utility grid. In addition, the approved ballot measure restricts all revenues collected from the fee for the future development of solar PV systems on publicly-owned buildings within the City of Athens.
- The Athens OH carbon fee only captures a small portion of the actual carbon damages resulting from the energy grid, and is therefore unlikely to cause a financial burden for most customers. The carbon fee was approved by voters at a rate of 2-mills per kilowatt hour (\$0.002/kWh). With the average household in Athens consuming approximately 800 – 900 kilowatt hours per month, the fee is expected to result in a small increase of \$1.60 – \$1.80 for the average monthly residential utility bill. However, residential or small commercial customers who use more energy than 900 kilowatt hours per month, and do not reduce their usage, can expect to pay more under the carbon fee.
- Boulder, Colorado’s Climate Action Plan Tax is the nation’s first voter-approved tax dedicated to addressing climate change. Originally passed in 2006, it was extended in 2015 to continue through March 31, 2023. It Generates approximately \$1.8 million per year. It is levied on city residents and businesses based on the amount of electricity they consume. Tax rates are different depending on the sector. Annual average costs: Residential: \$21; Commercial: \$94; and Industrial: \$9,600

Solar Energy:

The Sacramento County Climate Action Plan includes many commendable points on the issue of developing renewable energy sources, including solar energy:

1. Section 2, Greenhouse Gas Reduction Strategy, page 6, states that the planning strategies considered when developing greenhouse gas (GHG) reduction measures included, “Clean Energy: focuses on providing clean and affordable sources of energy for the County by increasing the use of renewables”.

2. Section 2.2, Government Operations Greenhouse Gas Emissions Reductions, GOV-BE-02, page 24, states the measure that, “The County will offset 100 percent of its building electricity use with renewable energy. Implementation: Install on-site renewable energy systems or participate in SMUD’s commercial SolarShares and/or Greenergy programs. Responsibility: DGS.”
3. Appendix C, Sacramento County 2030 General Plan Policies Supporting Climate Action, Table C-1, General Plan Policy Text, Public Facilities Measures 76-82, pages C-59 to C-60, lists three sources of renewable energy, a dispersed system; on-site facilities; and large centralized facilities, and describes limits on where public facilities can be sited.

This focus on increasing the use of renewable energy, and the goal of offsetting 100% of electricity used by county buildings with renewable energy are truly commendable. The guidelines on development and siting of large public facilities are also commendable as they recognize and protect other important interests, such as protecting habitat, conservation areas, farm operations, environmental quality and cultural resources.

However, although the CAP is notable for setting out these measures and plans, it is also notable for the goals and measures it fails to address. These failures should be considered and addressed if the County is to reach the goal of zero GHG emissions by 2030, as it committed to doing in its Climate Emergency Declaration of December 16, 2020. We suggest the following changes and additions:

GHG-04 Energy Efficiency and Electrification of Existing Non-Residential Buildings, page 7: The County should pass ordinances and adopt incentive programs to encourage the use of solar panels on large, privately-owned buildings, such as office buildings, garages, and warehouses. This would increase the number of available locations for solar panels and would also provide shade to these buildings, which in turn would decrease the need for cooling them in hot weather.

GHG-06 Energy Efficiencies and Electrification of Existing Residential Buildings, page 7: The County should pass ordinances and develop incentive programs and grants to support adding residential solar panels to existing residential buildings and making solar energy available in multi-family housing. Battery storage capability should be included with the addition of solar panels.

We suggest a measure be added to Table 2.1 stating that the County will work with the Sacramento Municipal Utility District to develop microgrid systems, and will support this development with appropriate ordinances, incentive programs and grants. The development of microgrid systems will facilitate the addition of solar energy systems to multi-family buildings. It will also increase the efficiency and resiliency of our energy supply. In the event of emergencies or events that interrupt power deliveries, a microgrid enables energy to be transferred to the affected units. This is a valuable benefit not just for residential houses, but also for government officials who provide important services, such as police and fire departments, hospitals and other emergency workers. If power is interrupted to one unit, a microgrid connection will enable power to be transferred from other units to the affected unit. This would make our community more resilient and better protected.

Appendix C:

Page C-17: CO-14 is the closest CAP draft action parallel to these comments.

Utilizing digestion of wastewater from water treatment plants can recover waste heat via anaerobic digesters and the use of methane to cool buildings can also provide electricity to those same buildings. Riverside and San Diego Counties have done this, as well as using energy from microturbines. Per these counties, using self-generated power by installing biodigesters and fuel cell technology “will allow the (Water) District to run some of its water reclamation facilities for FREE, without toxic emissions, and LOWER GHG by 10,600 tons annually” (source: Sierra Club’s California Climate Emergency Resource Page)

Page C-21: Purchasing of recycled products needs an additional program:

In addition to comprehensive composting of residential food waste, a program should include waste from restaurants, catering, grocery stores as well as the usual yard waste. The County should add residential kitchen compost to the current green waste program & public education regarding composting of kitchen waste is important. This can be accomplished via the Food Hubs proposed below under Environmental Justice. The wider use of compost also increases carbon sequestration, soil vitality and can be used in community and personal gardens which also should be encouraged. Multiple composting sites can reach more communities and more jobs as well.

Reference: City of Ann Arbor’s Climate Emergency Plan has a model composting program.

Page C-21: In addition to recommending the purchase of recyclable products, a plan to aid the food industry to eliminate non-biodegradable containers and utensils should be suggested. Plastic and polystyrene (Styrofoam) take hundreds of years to degrade. If both County and City collaborate to create a bulk processing network of recyclable products, the stress and higher cost can be taken off the backs of the food industry; this action would help reduce waste, and promote degradable, eco-friendly containers, utensils etc.

Polystyrene is classified as a probable carcinogen by the WHO, creates harmful pollution when exposed to sunlight or burned leading to contaminated landfill, contributes to depleting the ozone layer and harms marine animals who ingest it. Plastic take-out containers are made from fossil fuels and have negative impacts on the environment in their production.

Page C-41: Appendix C ENVIRONMENTAL JUSTICE - EJ-1 p. C-41

“Improvement and program support for each EJ Community shall address the Community’s unique or compounded needs.” A more specific need within this General Plan statement is food insecurity. With the current COVID-19 crisis, food insecurity, a longstanding problem, has become worse and more visible. There is a need to create a network of Food Hubs and community centers with neighborhood partners that provide food distribution and education. Sources for this are: excess food from restaurants, catering businesses and grocery stores. Food that is not edible by the public, can be used for compost. Hubs can offer compost collection, as well as training on composting, reducing food waste, gardening and healthy cooking, all forms of programmatic community support.

Appendix F Responses to measures left out of Draft CAP:

Page F-2: Measure: Require all electric construction for other building types. The reason for dismissal is “duplicative of Measure GHG-05”. However, Measure GHG-05 refers to CALGreen tier 1 which is a Voluntary Measure. This measure is different because it is a requirement, and it should remain in the CAP.

Page F-2: Measure: Require all electric construction for other building types.

Reasons for rejection include, “Precedents for local government ordinances to “ban” natural gas in commercial buildings contain language that allows exemptions based on technological, economic, and political factors.” While other local government ordinances could include substantial exemption language, the County of Sacramento Board of Supervisors passed a Climate Emergency Declaration, and as such we are confident that they will uphold their goals and could pass an ordinance without substantial exemptions. This reason for dismissal is not valid.

Page F-5: Measure: Streamline permitting for electrification of existing residential and commercial buildings. The stated reason for dismissal is “it would not be appropriate to exempt a permit...” However, streamline does not mean exempt. Efficiencies can be promoted without exemption. This measure should remain in the CAP.

Page F-10: Measure: Electrification of Agriculture. The reason for dismissal is “...not feasible for the County to mandate conversion of private equipment”. However, we feel through air quality requirements, it is not only feasible for the County or partners to make such a mandate it is the responsibility of the County.

Appendix F Rain Capture: County to promote use of rain barrels and rain gardens which allow for capture of rainwater for reuse in landscaping. The stated reason for dismissal was that GHG reduction not substantiated. County departments already have similar programs and published guidance. The 2010 County rebate program for residential rain gardens refers to a website which cannot be reached. This gives the impression that the program no longer exists. At the least, a revamp to ensure information is accessible seems justified.

Page F-8 Green Jobs Training: This measure was intended to “support local efforts of colleges, universities and community-based organizations to provide green jobs training.” The stated reason for dismissal was due to concerns regarding efficacy and feasibility and the County being unsure of “what supporting green jobs would entail”. City of Sacramento analysis done by John Mitchell of Jai J Mitchell Analytics in 2018 titled: the Sacramento City Climate Mobilization (draft) Technical Implementation Plan” outlined a rapid mobilization plan that could achieve net zero greenhouse gas emissions plan over an 8-year timeline. He specified the need for a Climate Emergency Workforce, and provided some details that could help the County understand what supporting green jobs could entail. This work force would address both manpower needs and our current unemployment problem.

Page F-8: Measure: Develop McClellan as a Research Education & Job Training Facility. The stated reason for dismissal was feasibility, cost & anticipated GHG reductions, as well as the percentage of private ownership of McClellan. We suggest the County reconsider this measure. These are critical programs for the multiple anticipated crises brought on by climate change. We have seen these critical needs during the current pandemic. These programs are crucial to any CAP or CED. Also see the suggested Climate Workforce, under the suggested new measure for Public Education.

Page F-8: Measure: Renewable Energy Development Center. The stated reason for dismissal was feasibility, cost & anticipated GHG reductions. We believe that through partnership, this measure produces local jobs and brings revenue into Sacramento County.

Page F-10: Measure: County Composting Program
Establish a program that incorporates the community food waste & green waste which then provides quality compost for the community and County’s use. The stated reason for Dismissal was due to a

similar measure, GHG-02 - Organic Waste Diversion in the CAP. This is a typo – the similar measure is GHG-24. As stated elsewhere, GHG-24 needs a much more aggressive timeframe, funding, and a concrete implementation plan or program.

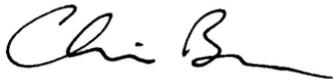
In summary, we found many of the Greenhouse Gas Emission reduction measures as well as much of the plan to be inadequate, requiring further specificity, shorter timeframes, and clearer implementation steps. To match the County’s Board of Supervisors Climate Emergency Declaration, a more aggressive Climate Action Plan is needed that recognizes the urgent nature of climate change.

The Sacramento Group of the Motherlode Chapter of the Sierra Club and the Sacramento Climate Coalition look forward to improvements in the County of Sacramento’s Climate Action Plan in the next revision. Please contact us if you have further questions or opportunities for engagement.

Respectfully submitted,



Barbara Leary, Chairperson, Sierra Club Sacramento Group



Chris Brown, Coordinator, Sacramento Climate Coalition

Taylor. Todd

Subject: CAP Letter
Attachments: FINAL Comment Letter on March 2021 Draft .pdf

From: Chris Norem <chris@northstatebia.org>
Sent: Friday, April 9, 2021 3:54 PM
To: Smith. Todd <smithtodd@saccounty.net>
Subject: Re: CAP Letter

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Please use this one. The ABC wanted me to add “Northern California Chapter” to the first page. No substantive changes.

Best,



Chris Norem
Director of Governmental & Political Affairs
c: 916 677 9190
w: northstatebia.org





April 9, 2021

To: Todd Smith
Principal Planner, Office of Planning and Environmental Review
Sacramento County
827 7th Street, Room 225
Sacramento, CA 95814

From: North State Building Industry Association
Sacramento Regional Builders Exchange
Plumbing Heating Cooling Contractors Association
Associated Builders and Contractors

This letter offers comments from the above listed industry trade associations on the Sacramento County Climate Action Plan (CAP) March 2021 Draft. We appreciate the opportunity to provide comments on the March Draft report, and we would like to state that this letter adds to (and does not supplant) the comments in our letter of December 30, 2020.

We appreciate the opportunity to work closely and collaboratively with the county and other stakeholders on this important issue. We continue to urge the county to look at adopting a wide range of mitigation measures as potential alternatives and to allow flexibility for applicants seeking to use the CAP.

The construction industry would ask that applicants be granted the flexibility to demonstrate compliance with the CAP through a combination of the alternatives described in the March Draft or through yet-to-be-defined technologies or options that applicants may wish to present to the county as alternatives after adoption of the CAP in 2021.

As stated in our previous letter, we are pleased that the report recognizes SMUD's substantial work to meet the state's ambitious 2030 GHG reduction goals. The ASCENT report states that no additional mitigation measures are technically necessary to meet the county's proportionate share of the state's 2030 climate action goal because SMUD's already-adopted climate emergency resolution and incentives.

With that fact in mind, we would make the following observations on the specific mitigation measures, which are prioritized based on areas of greatest concern.

Residential Housing and Commercial Development Disproportionately Affected

Residential construction (new and existing) accounts for 25% of the existing baseline 2015 GHG inventory (Figure E1) but accounts for 42% of the GHG reduction contemplated by the reduction measures (Page 7).

More specifically, new homeowners are paying a disproportionate share of the costs of reducing GHG under this proposed CAP. Over the next nine years, new residents in the county will be approximately 2-3% of the population, but account for 8% of the GHG reduction measures (Table 2.1, Page 7).

Residential Construction GHG Calculation Summary	
2015-2020 Average Number of New Homes in Sac County	600
Homes produced 2021-2030. (Historic average plus 10%)	6,000
New Residents (assuming 2.66 per household census data)	15,960
Total Sac County Residents 2020	590,000
New Residents % of Current Population	2.7%
New Residents % of GHG Reduction Measures	8%

It is worth noting that new homeowners will also absorb the costs of several other mitigation measures not specifically identified as residential construction, such as GHG 23 (infill), GHG 08 (Tier 4 construction equipment) and other mitigations measures and VMT requirements that are not strictly quantified. Therefore, the 8 percent figure is a very conservative figure and it is likely that the forthcoming three percent of the population that purchases a new home will be responsible for a 9-10 percent reduction in GHG.

Similarly, commercial construction represents 18% of the current GHG load (table E1), but accounts for nearly 40% of the GHG mitigation reductions in table 2.1 (Page 7).

We would ask that the county consider options for providing GHG reductions that spread the costs more evenly among existing residents to meet a public policy goal aimed at benefiting everyone in the community.

GHG-07. Energy Efficiency in New Residential

This requires a phase out of natural gas by 2023, which is infeasible due to a lack of supply chain providers of all electric components. It is our understanding based on our conversations with county staff that this infeasibility has been confirmed.

The reason for this infeasibility is that all electric appliances are emerging technologies that now enjoy relatively little market share. Statewide, roughly two percent of all new housing is all electric. As such, a 2023 deadline would likely serve to block new homes from being sold due to the lack of available appliances. This policy is complicated by the City of Sacramento's push to adopt an all-electric policy, which will provide a competing market force that will likely absorb the small number of all-electric appliances available in the marketplace (assuming the city adopts this policy in 2021).

If both jurisdictions were to adopt these policies in 2021, it is highly likely that there would be insufficient equipment, appliances and vendors to install all-electric appliances. Therefore, it is likely that such a requirement would cause builders to shift their investments to other surrounding jurisdictions where they could bring housing product to the market, a development that risks creating longer commute times and more GHG emissions.

It is our strong recommendation that the effective date of this requirement be moved back to 2026 or later and that feasibility analysis is performed before it is implemented so as not to exacerbate the housing crisis and prevent new housing from reaching the market.

GHG-23. Incentivize Infill.

This measure calls for a \$1,000 per door assessment on new homeowners to create a fund to help incentivize infill as a method of meeting the state's new 15% reduction in VMT. This mitigation measure should be integrated with the County's existing VMT guidelines and should not be duplicative of those efforts. It is recommended that the fee program have accountability mechanisms for project spending, with regular Board of Supervisor updates to ensure the fees are properly addressing the goal of reducing GHG.

GHG-05. Energy Efficiency in New Commercial

The new statewide California Green Building Code current under development will likely include Tier 1 energy standards for commercial and will take effect on 1/1/23. The County's move to this standard one year sooner than the state would mean local county staff will have to switch to (and learn) the Tier 1 regulations for 12 months before having to implement a whole new set of state minimum regulations which will likely include mandates for fully functioning EV charging systems in all new commercial. This would also create some level of confusion and training issues for the commercial building industry with two new sets of standards less than 12 months apart from one another. Additionally, due to COVID, commercial permits are down and vacancy rates are up and many commercial projects statewide are either being postponed or cancelled, which calls into question the potential negative consequences of assessing new fees on commercial investment at this time that would incentivize builders to go to other surrounding jurisdictions without this requirement.

GHG-01. Carbon Farming

Since this mitigation measure is such a large component part of the county's program (48%), we would encourage the county to allow the industry to purchase credits throughout the region or

the state, or the nation from reputable carbon farming operations and not just in Sacramento County. There is a growing national awareness of this as a mitigation option and Sacramento County should avail itself of these opportunities in an effort to reduce GHG.

GHG-04. Electrification of Existing Commercial

This measure calls for the County to develop a program aimed at assisting local utilities with implementing commercial energy efficiency and electrification programs to achieve reductions in energy consumption with an educational outreach program. We would urge the County to provide real financial incentives provided by local, state or federal funding.

GHG-06. Energy Efficiency in Existing Residential

This measure calls for the County to assist local utilities with increasing participation in residential retrofit programs to achieve a reduction in energy consumption to urge consumer upgrading to EnergyStar™-certified appliances, more efficient HVAC systems, weatherization, and comprehensive whole home retrofitting. We would urge the county to consider a continued interest in finding real ways to offer financial incentives through either local, state or federal funding.

New Suggested Mitigation Measures

The building industry suggests that the county consider the following alternative mitigation measures:

Tree Planting. Allow applicants to coordinate efforts with the South Sacramento Habitat Conservation Plan or the Natomas Basin Conservancy and the Tree Foundation to fund tree planting as a mitigation measure. Tree planting by the Tree Foundation has already been undertaken at the Natomas Basin Conservancy lands with measure environmental benefits.

South Sac HCP Wetlands Mitigation. This mitigation measure was removed from the prior draft, but the ability of wetlands to capture carbon suggests that this may be a worthwhile mitigation measure worth including.

Make Infill Approvals Ministerial In Line with the City of Sacramento

The City of Sacramento in July of 2020 approved steps to make the approval of infill a ministerial process. The county should explore such an alternative as the region is still only producing roughly 60% of the roughly 11,000 housing units that SACOG identifies as the long term yearly average.

Support Regional Incentives for Telework

SACOG is currently analyzing telework trends and GHG savings with the intent of potentially creating a regional platform for telework policy. The County should consider supporting this endeavor as a potential mitigation measure.

Support Investments in Broadband

In conjunction with #2 above, the county should consider incentives for broadband or other forms of high-speed internet to all communities as a method of potentially encouraging connectivity via the internet to reduce vehicle miles traveled.

Thank you for your consideration of our feedback. We look forward to continuing to provide input on the alternatives as they are developed in the coming months.

Taylor. Todd

From: Jamie Cutlip <Jamie.Cutlip@smud.org>
Sent: Friday, April 9, 2021 3:55 PM
To: PER. climateactionplan
Cc: Smith. Todd; Lundgren. John; Steve Johns
Subject: Draft CAP - SMUD Comments
Attachments: SACCo_CAP Draft_SMUD Comments_4-9-21_FINAL.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Please find attached a comment letter from SMUD on the County's Climate Action Plan Public Draft.

Jamie Cutlip
Government Affairs Representative III
Regional & Local Government Affairs, Office of the General Counsel
w.916-732-5308 | Jamie.Cutlip@smud.org

SMUD | Powering forward. Together.
6201 S Street, Mail Stop B404, Sacramento, CA 95817



Sent Via E-Mail

April 9, 2021

Mr. Todd Smith, Principal Planner
Office of Planning and Environmental Review
827 7th Street, Room 225
Sacramento, CA 95814
ClimateActionPlan@saccounty.net

Subject: Comments on the County's Draft Climate Action Plan

Dear Mr. Smith:

The Sacramento Municipal Utility District (SMUD) appreciates the opportunity to provide comments on the Sacramento County Draft Climate Action Plan (Plan). SMUD is the primary energy provider for Sacramento County (County) and the proposed Plan area. SMUD's vision is to be the trusted partner with our customers and community, providing innovative solutions to ensure energy affordability and reliability, improve the environment, reduce our region's carbon footprint, and enhance the vitality of our community.

We are pleased to see the County adopt a similar 2030 timeframe for GHG reductions, aligning with both the County's recently adopted Climate Emergency Declaration and with SMUD's own 2030 Zero Carbon Plan. Our plan identifies specified actions needed to get to zero carbon by 2030, but we cannot do this alone. Sacramento County is a critical partner to ensuring our plan's success. SMUD and the County have aggressive goals for carbon reduction and many of our initiatives overlap. We look forward to coordinated implementation and collective achievement on electrification, local carbon-free electricity development, and on other initiatives we share as common interests.

Based on our review of the County's proposed Plan policies and implementation measures, SMUD offers comments for the County's consideration. Where noted, SMUD encourages the County to consider additional policies and implementation measures.

Section 1.2: Baseline and Forecast Greenhouse Gas Emissions

- *Table 2: Legislation or Regional Policies Resulting in County GHG Emissions Reductions by 2030.*

SMUD stands for "Sacramento Municipal Utility District" and should be revised on page

to Utility in the singular on page 5. This revision is needed in the Glossary as well on page 175. Our 2030 Carbon Zero Plan was presented to the SMUD Board on March 31, 2021. After a public comment period, our final plan will be endorsed by the SMUD Board in late April 2021.

Section 2.1: Community Greenhouse Gas Reduction Measures

- *GHG-04: Energy Efficiency & Electrification of Existing Nonresidential Buildings.*
Although the measure title includes electrification, this description appears to favor commercial energy conservation. Instead, the County should include actively educating and supporting gas-to-electric conversions in commercial buildings for space and water heating. Such conversions will result in greater GHG reductions than through conserving both natural gas/ propane and electricity. Secondly, SMUD is shifting our rebate programs to increasingly support such gas to electric conversions in existing and in new all-electric development. SMUD offers many tools and resources that can be shared through County channels to help educate business owners and commercial customers. This measure should be revised to a near-term action rather than the long-term identified timeframe.
- *GHG-05: Increase Energy Efficiency in New Commercial Buildings.*
While the County should be commended for considering the CalGreen Tier 1 efficiency standards to be adopted in the near-term, we strongly urge the County to reconsider adding electrification of space and water heating for new commercial construction or “electric-ready” requirements to the Plan now. If buildings are not electrified or made all-electric ready in this Plan, there will be a much higher cost for the building owner to retrofit these buildings to all-electric at a later date.
- *GHG-06: Energy Efficiency & Electrification of Existing Residential Buildings.*
Although the measure title includes electrification, this description appears to favor residential electricity and natural gas / propane conservation. Instead, the County should include actively educating and supporting gas-to-electric conversions in residential buildings for cooking, space and water heating. Such conversions will result in greater GHG reductions compared to energy conservation. Secondly, SMUD is shifting our rebate programs to increasingly support such conversions in existing construction and in new all-electric development. SMUD offers many tools and resources that can be shared through County channels to help educate homeowners and residential customers.
- *GHG-07: Eliminate Fossil Fuel Consumption in New Residential Buildings.*
We applaud the County for including this measure and request reconsideration of a similar measure for new commercial buildings. Cost-effectiveness studies show that all-electric new construction for [low-rise](#), [mid-rise](#) (4-7 stories) and [high-rise residential](#) (8 stories and up) can be cost effectively built today.
- *GHG-19: EV Parking Code.*
To further support greater GHG reductions in the transportation sector and to create consistency of requirements within the region, the County may want to consider higher minimums to match what is being proposed within the City of Sacramento of 20% of required parking spaces to be EV Capable with at least one installed, operational Level 2 charger or consider EV parking minimums found in the CalGreen Tier 2 standards. Adding higher minimum EV parking requirements support greater GHG emission

reductions, achieves broader inclusion of EVs in multi-family developments when it is most cost-effective, at the time of new construction vs retrofit. Also, please note that SMUD EV infrastructure program incentives require spaces to be stubbed out or have a Level 1 or 2 charger installed to qualify.

Section 2.2: Government Operations Greenhouse Gas Reductions

- *Charging as a Service.*
SMUD looks forward to supporting the County by providing Fleet Advisory Services upon program launch to enable the development of short and long-term fleet electrification plans as well as a soft launch of the Charging as a Service program with a County EV infrastructure project.

Section 3: Climate Change Adaption Strategy

- *FLOOD-07: Establish an Underground Utilities Program Resistant to Flooding.*
This measure warrants further discussion as existing mitigation measures, such as enhanced above ground design and construction standards, relocation, preventative monitoring, infrastructure inspections and maintenance, may already serve the intended goal and would be more cost-effective than establishing an undergrounding utilities program.

Secondly, SMUD's System Enhancement Strategic Directive already offers undergrounding or permanent relocation of existing primary lines when feasible and determined to be in the public's interest. The County is eligible for this program. Please see SMUD's [Strategic Direction SD-14](#) for more information. Finally, the description of benefits includes outdated references to temperature and wildfire measures (Temp-6 and Fire-7) that were included in the administrative draft and are no longer included in this public draft.

Appendix F – Measures Considered but Eliminated from the Climate Action Plan

- *SMUD Greenergy – Residential & Commercial.*
SMUD is developing its 2030 Zero Carbon Plan to eliminate GHG emissions from our electricity generation by 2030. Even if the County decides to not offer an incentive for participation, SMUD's Greenergy Programs should still be considered for Residential and Commercial buildings. We will continue to offer the Greenergy program until Zero Carbon can be achieved and are looking to expand the program with additional participation tiers in the near term. The County can assist in increasing program participation.
- *Streamline Permitting for Electrification of Existing Residential and Commercial Buildings.*
Although this measure is purposed for elimination, we look forward to partnering with the County to identify and resolve barriers to gas-to-electric conversions within existing residential and commercial buildings that may stem from the permit review process.
- *Require All Electric Construction for Other Building Types.*
We strongly urge the County to reconsider adding "electric-ready" or electrification of space and water heating for new commercial construction to the Plan now as each

newly constructed commercial building that is not addressed will need to be retrofitted at a higher cost later on. Cost-effectiveness studies show that all-electric new construction for low-rise [commercial, mid-rise](#) (4-7 stories) and [high-rise residential](#) (8 stories and up) can be cost effectively built today.

As environmental leadership is a core value of SMUD, we look forward to collaborating with you on this Plan. We aim to be partners in the efficient and sustainable delivery of the proposed Plan.

Again, we appreciate the opportunity to provide input on the public draft of the County Climate Action Plan. SMUD would like to stay involved and is available to discuss any of the above areas of interest and any other potential issues.

If you have any questions regarding this preliminary review, please contact me at Jamie.Cutlip@smud.org or (916)732-5308.

Sincerely,



Jamie Cutlip
Government Affairs Representative III
Regional & Local Government Affairs
Sacramento Municipal Utility District

Cc: John Lundgren, County of Sacramento
Todd Taylor, County of Sacramento

Taylor. Todd

From: Crawford. Piper
Sent: Friday, April 9, 2021 2:25 PM
To: PER. climateactionplan; Smith. Todd
Cc: Dobson. Christoph; Mitchell. Terrie; Ocenosak. David; Oriol. Heidi; Nebozuk. Steven; Ramirez. Jose; Taylor. Todd; Lundgren. John; Dan.Krekelberg@ascentenvironmental.com; honey.walters@ascentenvironmental.com
Subject: Regional San & SASD Comments to County CAP
Attachments: RegionalSanCommentLetterFINAL_040921.pdf

Good afternoon,

On behalf of Regional San and SASD, I am submitting a comment letter responding to the draft Climate Action Plan released by Sacramento County. Should you have any questions or concerns, please let me know.

Thank you,
Piper

Piper Crawford, EIT

Assistant Civil Engineer | Policy & Planning
Sacramento Regional County Sanitation District &
Sacramento Area Sewer District
10060 Goethe Road
Sacramento, CA 95827



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Board of Directors

Representing:

County of Sacramento

County of Yolo

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City of Elk Grove

City of Folsom

City of Rancho Cordova

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Prabhakar Somavarapu

District Engineer

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Director of Operations

Christoph Dobson

Director of Policy & Planning

Matthew Doyle

Director of Internal Services

Joseph Maestretti

Chief Financial Officer

Nicole Coleman

Public Affairs Manager

www.regionalsan.com

April 9, 2021

Todd Smith
Principal Planner
Office of Planning and Environmental Review
827 7th St
Sacramento, CA 95814

Sent via email to: ClimateActionPlan@saccounty.net

Subject: Regional San & SASD Comments to Sacramento County CAP

Sacramento Regional County Sanitation District (Regional San) and Sacramento Area Sewer District (SASD) appreciate the opportunity to provide comments on the County of Sacramento (County) Climate Action Plan (CAP). Regional San owns the Sacramento Regional Wastewater Treatment Plant (SRWTP) in Elk Grove and treats an average of 124 million gallons of wastewater daily. Together, Regional San and SASD operate nearly 4700 miles of pipeline and 142 pump stations across the Sacramento region to safely convey wastewater to the SRWTP. The Districts serve more than 1.6 million customers daily. Protecting such a large public investment from climate change impacts is imperative and both Districts recognize the importance of establishing a countywide CAP.

We appreciate the County and Ascent Environmental's efforts on developing the draft CAP, as well as their willingness to meet with both Districts the last week of March to discuss our comments. In order to provide full transparency, Regional San and SASD would like to reiterate our comments on the overarching concerns brought up in the meeting. I am also attaching the references made to Regional San and SASD in the CAP for convenience. We look forward to discussing specific rewording and edits for each of the references in a future meeting, but prior to finalizing the CAP, as there are inaccurate statements that need to be addressed.

Regional San and SASD serve customers throughout unincorporated Sacramento County, the cities of Citrus Heights, Elk Grove, Folsom, Rancho Cordova, Sacramento and West Sacramento, and the communities of Courtland and Walnut Grove. Regional San is governed by a 17-member Board of Directors made up of the County Board of Supervisors as well as representatives from the cities. SASD is overseen by a 10-member Board of Directors consisting of five members from the County Board of Supervisors and five representatives from the cities of Citrus Heights, Elk Grove, Folsom, Rancho Cordova and Sacramento. Given that neither District is under the direct operational control of Sacramento County, climate change adaptations and mitigations associated with the conveyance and treatment of wastewater are to be independently managed by Regional San and SASD. Because of this, both Districts respectfully request that Regional San and SASD not be identified as responsible parties in the Sacramento County CAP.

Todd Smith
April 9, 2021
Page 2

We hope that the above comments will be considered in the development and implementation of the Sacramento County CAP. We look forward to working with the County to reword the references to Regional San and SASD to be geared more towards collaboration rather than as responsible parties.

If you have any questions please contact me at (916) 876-6118 (nebozucs@sacsewer.com).

Sincerely,

DocuSigned by:



CF5503499AD2415...

Steve Nebozuk
Senior Civil Engineer

Attachment: Sacramento County CAP District References

cc: Christoph Dobson
Terrie Mitchell
Dave Ocenosak
Heidi Oriol
Jose Ramirez
Piper Crawford
Todd Taylor, Office of Planning and Environmental Review
John Lundgren, Office of Planning and Environmental Review
Dan Krekelberg, Ascent Environmental
Honey Walters, Ascent Environmental

Todd Smith
 April 9, 2021
 Page 3

Agency	Page Number	Section	Districts Listed as Responsible Parties?	Reference
Regional San	Page 6	Existing Regional Actions		Regional San Sustainability and Innovation programs, which reduce GHG emissions from wastewater produced by Sacramento County residents through water, biogas, biosolids recycling. (taken from our website)
Regional San	Page 40	Climate Change Adaptation Strategy: Prepare for Increased Drought	Y (Regional San)	Coordinate with the Sacramento Regional County Sanitation District (Regional San) or other appropriate agencies to develop a standard to deploy innovative options to meet future water demand for all County-owned facilities (e.g., reclaim and purify wastewater, on-site graywater reuse systems, or use of recycled water from the regional or local treatment plants).
Regional San	Page 41	Climate Change Adaptation Strategy: Prepare for Increased Drought	Y (Regional San)	Partner with Regional San to expand the existing recycled water system service areas by 50 percent.
Regional San SASD	Page 43	Climate Change Adaptation Strategy: Prepare for Increased Flooding	Y (Regional San & SASD)	Improve sewage and solid-waste management infrastructure to reduce vulnerabilities to flooding and inundation, especially within older portions of the County where infrastructure is undersized or inadequate.
Regional San	Page 49	Climate Change Adaptation Strategy: Prepare for Sea-Level Rise	Y (Regional San)	Following the completion of Measures SLR-1 and SLR-3, update capital improvement plans for critical infrastructure to address the effects of future sea-level rise and associated hazards in potentially affected areas. SLR-1: Coordinate with the applicable Reclamation Districts (RDs), FEMA, and CA DWR to regularly update floodplain mapping for potentially affected areas to reflect changes in Base Flood Elevations that account for sea-level rise. Partner with the applicable RDs to establish measures to protect populations, functions, and structures within the affected areas including continued maintenance of RD levee systems and relocation of vulnerable communities, infrastructure, and facilities where applicable. SLR-3: Require that future updates to the County's LHMIP incorporate a comprehensive evaluation of sea-level rise in the County and associated risk management processes as the degree of sea-level rise manifests and as more data becomes available.
Regional San	C-33	Appendix C: Delta Protection		Partner with Sacramento Regional County Sanitation District and other partners to promote and encourage the use of recycled water for agricultural, habitat and water conservation purposes where feasible.
Regional San	C-40	Appendix C: Energy		Coordinating and encouraging appropriate federal, state, county, and other local governmental agencies to conserve energy in water treatment and wastewater treatment and reclamation. Reference to GHG-25: Electric Irrigation Pump (though no reference to wastewater/Regional San here).
Regional San		Appendix E		Scales a conservative estimate of GHG emissions due to wastewater treatment to a 2030 number

Taylor. Todd

Subject: Sac Metro Air District comments on the CAP
Attachments: Sacramento County CAP_Sac Metro Air District Comments.pdf

From: Rachel DuBose <RDubose@airquality.org>
Sent: Friday, April 9, 2021 4:00 PM
To: Smith. Todd <smithtodd@saccounty.net>
Cc: Paul Philley <PPhilley@airquality.org>; Rachel DuBose <RDubose@airquality.org>; Karen Huss <KHuss@airquality.org>; Shelley Jiang <SJiang@airquality.org>; Molly Wright <MWright@airquality.org>
Subject: Sac Metro Air District comments on the CAP

Todd,
Attached are the Sac Metro Air District's comments on the public draft of the Sacramento County Climate Action Plan. Please let me know if you have questions.
Best regards,
Rachel DuBose

Rachel DuBose
Air Quality Planner/Analyst
Desk: (916) 874-4876
www.AirQuality.org





April 9, 2021

SENT VIA E-MAIL ONLY

Todd Smith, Principal Planner
Sacramento County Office of Planning and Environmental Review
727 7th Street, Room 225
Sacramento, CA 95814
smithtodd@saccounty.net

Re: Sacramento County Draft Communitywide Climate Action Plan

Mr. Smith,

Sacramento County released the Draft Communitywide Climate Action Plan (draft CAP or CAP) for public review on March 8, 2021. The draft CAP represents the County's commitment to implement Mitigation Measures CC-1 and CC-2 of the 2030 General Plan, and to respond to the County's adoption of a Climate Emergency Resolution in December 2020. The draft CAP focuses on reducing greenhouse gas (GHG) emissions from communitywide activities and government operations through a suite of policies, programs and aspirations. The draft CAP also contains a Climate Adaptation Strategy to address vulnerabilities to climate change impacts such as the effects of extreme heat and sea level rise.

The Sacramento Metropolitan Air Quality Management District (Sac Metro Air District) commends the County for undertaking the momentous task of developing a climate action plan, and we are pleased to provide the following comments and suggestions.

General Comments

- It is of utmost importance to establish a mechanism to monitor the CAP's progress toward achieving each measure's quantified target, as well as cumulative GHG reductions at set years, and to require amendment if the CAP is not achieving specified levels (also known as contingency or fallback measures). In addition to ensuring the CAP's success, ongoing monitoring can help ensure that proposed land use development projects are eligible for streamlining under the California Environmental Quality Act (CEQA).
- While many of the draft CAP's measures can effectively reduce GHGs, the implementation strategies lack detail and instead focus on soft actions such as education, outreach, and promotion. Most measures do not have concrete, enforceable requirements, policies, ordinances, or other hard mechanisms necessary to achieve quantifiable reductions. Moreover, for many measures, responsibility and leadership are devolved onto partner organizations and programs. Ultimately, these measures rely

upon voluntary actions by the community in response to the County's outreach efforts, but behavior change is extremely difficult and requires considerable investment in marketing, public relations agencies, and advertisements to effectively make an impression amidst the inundation of information that surrounds us. Without a doubt, it is possible to achieve the GHG emissions reductions estimated from building retrofits, for example, but at the current level of implementation suggested in the draft CAP, it appears unlikely that these specific strategies could lead to the levels of action and participation needed. To fully support its declaration of a climate change emergency, the County should develop mandatory strategies that would help deliver real, ambitious reductions.

- Measures proposing modification of Sac Metro Air District rules or involvement with Sac Metro Air District staff or programs must be discussed with air district staff, with citations of the discussions in CAP footnotes or endnotes. The measures include GHG-09 (Electric Landscaping Equipment) and GHG-25 (Electric Irrigation Pumps). As far as we are aware, such discussions have not occurred.
- The County's carbon neutrality target should be more explicitly discussed in the document's introduction.
- The Sac Metro Air District recommends that the County provide additional detail regarding the County's population estimates and the 2030 targets for Community and Government operations as reported in Appendix E. It is unclear what the targets are: the 4.8 metric tons of carbon dioxide equivalents (MT CO₂e) per capita noted in Section 1.3 or Appendix E's 4.0 MT CO₂e per capita?
- The Sac Metro Air District recommends using the terms "cleaner, more sustainable" in place of "alternative" throughout the document, since alternative fuels could in fact be more emissive and less sustainable. For example, a Sustainable Planning Strategy noted in Section 2 could read: "Support electrification and cleaner, more sustainable alternative fuels in on-and off-road vehicles and equipment, as well as fuel efficiency measures that would reduce the amount of gasoline and diesel fuel consumed."
- The Sac Metro Air District would like to review the detailed methodology underlying the quantified reductions. The technical documentation that was provided to us upon our request does not include detailed calculations.

Comments on Section 2.1, Community Greenhouse Gas Reduction Measures

GHG-01: Carbon Farming (p.8)

The County is relying on this measure to deliver nearly 50 percent of its reductions, but we have concerns with this measure. Soil carbon sequestration is inherently uncertain: a ton of carbon emissions reduced is permanently avoided, but a ton of carbon sequestered can be released in the future due to land use change, development, changes in soil management practices, or other disturbances. The carbon stored in no-till farms are largely lost again, for example, if the land is tilled again; fallowed land, too, will lose its stored carbon if the land returns to agricultural use.¹ For this strategy to be effective, the County must be able to guarantee permanence – that the agricultural lands will not be developed, and that any adopted farming practices be maintained for decades, if not more. We recommend agricultural easements, preserves, or other permanent mechanism to ensure consistent land use in carbon farming areas.

Carbon farming comes with other challenges. The costs of measurement and verification of soil carbon storage can be high; the County should consider who will pay for these costs, and the

¹ <https://thebreakthrough.org/issues/food/carbon-farming>

timeframe over which it will be measured, which, again, leads back to the permanence question. What happens if the land is sold, developed, or the farmer or rancher decides to abandon carbon-farming practices at the end of the measurement period? As carbon sequestration cannot be guaranteed with certainty to be permanent, and no emissions are being reduced, only removed from the atmosphere (temporarily), this should not count as a carbon reduction strategy without significant changes. If this is intended as offsets to help meet the County's carbon neutrality goal, note that the California Air Resources Board requires offsets generally to be permanent, real, verifiable, and quantifiable.

These caveats aside, this measure contains only light actions such as providing education on co-benefits and available resources and is generally lacking in detail. It seems unlikely that without more robust actions – such as direct incentives or prescriptive regulation from the County – that a sufficient scale of farmer participation will be mobilized to achieve the quantity of carbon sequestration currently envisioned.

We recommend the County consider augmenting this measure with more direct strategies, such as financial incentives, policies, and ordinances to minimize or eliminate farmland conversion from land use development, and strategies to expand compost use. Farmers and other stakeholders will likely need financial mechanisms to provide compensation for any losses, should any change in practice (e.g., organic composting) result in a decline in yield. This type of insurance can help assuage any hesitancy stakeholders may feel about the risks of adopting new practices.

The County should also develop interim targets for carbon farming acreages, as well as contingency strategies should participation in carbon farming practices remain low.

GHG-02: Urban Forestry (p.8)

This measure commits the County to maintaining and enhancing the urban forest to provide shading for energy conservation and urban heat island reduction to achieve 1,681 MT CO₂e per year by 2030. It is worth noting that the lower temperatures afforded by a robust urban forest contribute to improved air quality by reducing ground level ozone formation from motor vehicles, which forms in the presence of sunlight.

The County should clarify if the assumed CO₂e reductions come from carbon sequestration only, or also from building energy use reductions as a result of direct tree shading as well as overall heat island reduction.

The Target Indicator states that the County will “track projects where the County has participated in preserving or adding to the urban forest” but does not commit to tracking projects that do *not* preserve or add to the urban forest. This is important because many projects include tree removal. Tracking removals, tree deaths, and preservations within the same program is necessary to gauge overall progress and net gains in urban forestry.

Also, the measure needs interim or annual tree-planting targets and a fallback mechanism in case the County does not achieve 1,681 MT Co₂e per year by 2030.

Finally, the County should also consider prioritizing planting trees on public lands or commercial lands to reduce the burden of tree maintenance for individual households.

GHG-04: Energy Efficiency and Electrification of Existing Nonresidential Buildings (p.9)

Like GHG-01, this measure relies largely on education and outreach, without any enforceable or required measures. Energy efficiency upgrades and building electrification *can* deliver significant greenhouse gas emissions reductions as well as savings for building occupants, but it is unclear if the County's strategy will effectively persuade building occupants to undertake such actions. Effective outreach depends on more than developing videos; it also depends on a good marketing strategy, well-phrased communications, and enough funding. There are already many videos on the internet regarding energy conservation – what would make the County's videos different, better, or have broader reach?

We recommend the County consider a more detailed implementation strategy with mandatory requirements to achieve this measure's goal. Potential triggers for retrofits and electrification can include point-of-sale, renovations, the rental inspection ordinance, and building additions exceeding a certain threshold.

GHG-05: Increase Energy Efficiency in New Commercial Buildings (p.9)

The measure states that it will also include new high-rise buildings, but the term is not reflected in the title of the measure.

GHG-06: Energy Efficiency and Electrification of Existing Residential Buildings (p.10)

The implementation details for this measure do not include electrification – we suggest the County explicitly call out whole-home electrification and its benefits, and collaborate with SMUD on home electrification programs, education, and incentives. We also recommend that the County include cool walls in its list of recommended or incentivized actions: cool walls help to lower building temperature in the summertime by reflecting solar heat, which also reduces energy costs. Particularly for older homes, painting exterior walls with a cool paint – which comes in a range of colors – is significantly less expensive and less involved than improving wall insulation. We also recommend the County consider including cool roof rebates for retrofits and renovations. Potential triggers for weatherization, retrofits, and/or electrification can include rental inspection ordinances, point-of-sale requirements, renovations, and building additions exceeding a certain threshold.

Like the comment for GHG-04, it is unclear how videos would be a good use of County resources or would differentiate themselves from the myriad existing videos on the internet.

GHG-07: Eliminate Fossil Fuel Consumption in New Residential Buildings (p.10)

The Sac Metro Air District commends the County for striving to improve community health and the environment through this measure, which is consistent with the Sac Metro Air District's greenhouse gas emissions best management practice (BMP 1) for new projects with no natural gas infrastructure.

The Sac Metro Air District encourages the County to consider a CAP measure requiring all electric construction for other building types. In September 2018, Governor Brown signed Executive Order (EO) B-55-18, which established a new statewide goal “to achieve carbon neutrality as soon as possible, and no later than 2045, and achieve and maintain net negative emissions thereafter.” Further reducing natural gas use would be consistent with EO B-55-18 and the Statewide Scoping Plan and is of utmost importance since Sacramento County already exceeds its inventory for natural gas with existing development as calculated in the Sac Metro Air District's GHG thresholds inventory work. Moreover, natural gas appliances contribute significantly to poor air quality in Sacramento County, producing 470 tons of carbon monoxide,

106 tons of NO₂, and 716 tons of NO_x per year.² However, the County dismissed such a measure in Appendix F (Measures Considered but Eliminated from The Climate Action Plan) stating: “Cost effectiveness for reach all electric buildings has not been broadly demonstrated for all commercial building types. Precedents for local government ordinances to ‘ban’ natural gas in commercial buildings contain language that allows exemptions based on technological, economic, and political factors.” An ordinance eliminating natural gas from non-residential buildings would provide certainty that greenhouse gas emissions from that sector will be reduced, either on-site or off-site if the County, working with a project proponent, determines it is not feasible for the commercial building type being proposed to eliminate natural gas usage.

GHG-08: Tier 4 Final Construction Equipment (p.11)

This measure intends to reduce emissions from diesel-powered construction equipment by requiring EPA-rated Tier 4 final diesel engines in new construction projects, where feasible, and directs project applicants to provide a list of equipment prior to building permits. Because engine technologies and EPA classifications may evolve over time, we caution against constraining the measure to Tier 4 engines. We also recommend that the construction lists be required prior to approval of grading or improvement plans instead of prior to building permits, since grading is usually the most emissive construction activity. Our concerns could be resolved with the following suggested revisions shown in underline and strikeout: “*EPA-rated Tier 4 final diesel engines or cleaner required in new construction projects when electric-powered construction equipment is infeasible or unavailable. Applicants will include Tier 4 final engines or cleaner in construction lists prior to approval of grading or improvement plans ~~building permits.~~”*

The Target Indicator requires that 100 percent of Tier 4 final construction be Tier 4 by 2030. How will the County know that it is on track to achieve the stated 6,370 MT CO₂e by 2030? Will it require a certain percentage of equipment to be Tier 4 final in earlier years, ramping up to 100% in 2030? In addition, please the tracking mechanism that will be used.

GHG-09: Electric Landscaping Equipment (p.11)

This measure states that the County will work with SMAQMD [Sac Metro Air District] to establish a landscaping equipment incentive program. Any measure proposing modification of Sac Metro Air District rules or involvement with Sac Metro Air District staff or programs must be discussed with air district staff. As far as we are aware, such discussions have not occurred.

GHG-12: Transportation System Management Plan for Non-Residential Projects (p.12)

The Sac Metro Air District commends the County’s commitment to review and update Section 5.9.6.F of the Zoning Code requiring a Transportation System Management Plan (TSM Plan) for new non-residential development projects. The County has had difficulty enforcing and monitoring the current TSM Plan requirements, so we are pleased that the draft CAP commits to a review and update of the zoning code. By reducing vehicle trips, TSM Plans not only reduce greenhouse gases; they also reduce emissions of ground-level ozone precursors.

This measure and the updated ordinance must describe contingency measures to be taken if the County is not on track to meet the 15,750 MT CO₂e reduction commitment by 2030.

GHG-13: Revise Parking Standards for Non-Residential Development (p.13)

² <https://coeh.ph.ucla.edu/effects-residential-gas-appliances-indoor-and-outdoor-air-quality-and-public-health-california>

The County should eliminate parking minimum requirements altogether, allowing developers and the market to determine the right amount of parking to provide.

GHG-21: Update Community and Corridor Plans (p.17)

This measure commits to updating Community Plans and Corridor Plans but does not specify when updates will occur other than it being a mid-term goal. The measure should specify the triggering mechanisms for plan updates. For example, will the County review them all at once, or when a development within the boundaries is proposed?

GHG-19: EV Parking Code (p.17)

The Sac Metro Air District encourages the County to require minimum EV charging capability in multi-family residential and commercial projects consistent with Tier 2 Standards contained in the CALGreen Code rather than Tier 1 and require the spaces to be EV ready rather than EV capable. Tier 2 Standards with EV ready spaces would be consistent with the Sac Metro Air District's greenhouse gas emissions best management practice regarding EV infrastructure (BMP 2) and would be more supportive of CAP measure GHG-10, Electric Vehicle Infrastructure Program, by providing more spaces ready to accept EV charging equipment. Additional EV infrastructure would help the Sacramento Region achieve its SB 375 targets in the 2020 Metropolitan Transportation Plan/Sustainable Communities Strategy, which anticipates higher EV penetration rates than projected by the state.

GHG-24: Increase Organic Waste Diversion (p.19)

Additional composting sites may be difficult to permit due to VOC emissions and other issues. Please work with the Sac Metro Air District to identify potential barriers and solutions should the County move forward with this measure.

GHG-25: Electric Irrigation Pumps (p.20)

This measure states that the County may work with SMAQMD [Sac Metro Air District] to convert stationary diesel- or gas-powered irrigation pumps to electric pumps that are either connected to the grid or use off-grid alternative/renewable energy sources, such as solar. Any measure proposing modification of Sac Metro Air District rules or involvement with Sac Metro Air District staff or programs must be discussed with air district staff, with citation of discussion in draft CAP footnotes or endnotes. As far as we are aware, such discussions have not occurred.

GOV-EC-01: Employee Transportation Program (p.21)

This measure commits to improving the County employee commute transportation program. One of the ways the County intends on identifying improvements is to review feedback from an employee survey conducted in 2010. The Sac Metro Air District recommends that the County conduct an updated survey.

GOV-FL-01: Fleet Conversion Program (p.23)

This measure says it will convert the entire County fleet to alternative low-carbon fuels, electricity, fuel cells, and other technologies, but the target indicator only mentions that 30 percent of new fleet purchases will be EVs by 2030. What is the timeline for the County to convert its entire fleet, and what are the other interim targets that will get to 100 percent?

GOV-BE-01: Green Building Policy (p.24)

The measure calls for the County's new buildings to exceed the energy performance of the 2019 California Energy Code by 10 percent. This measure should be benchmarked to the current edition of the Energy Code in effect at the time of construction.

Other Measures Not Quantified, Measure: Electric Agricultural Equipment (p.27)

This measure states that the County may work with SMAQMD [Sac Metro Air District] to provide incentives for replacing gas- or diesel-powered agricultural equipment with electric or alternatively fueled equivalents. As discussed previously in this letter, the Sac Metro Air District recommends using the terms “cleaner, more sustainable” in place of “alternative”, and measures proposing modification of Sac Metro Air District rules or involvement with Sac Metro Air District staff or programs must be discussed with air district staff, with citation of discussion in draft CAP footnotes or endnotes.

Section 3. Climate Adaptation Strategy

Extreme Heat:

The Sac Metro Air District appreciates the County adopting some of the strategies from its Capital Region Urban Heat Island Reduction Plan into the CAP.

We offer the following additional strategies to consider:

- Develop an emergency heat health response plan, with clear heat index thresholds for triggering escalating levels of response actions from county departments.
- Provide free transportation to cooling centers.
- Provide funding to community-based organizations and other service organizations to establish ad-hoc cooling centers in spaces community members are already familiar with.
- Provide additional information, education, and recommendations on cool walls, which can help to cool buildings as well as reduce the urban heat island effect. The Cool Roof Rating Council is currently developing a rating system for cool paints, and the Lawrence Berkeley National Lab has additional research related to cool walls: <https://heatisland.lbl.gov/coolscience/cool-walls>.
- Establish additional parks, community gardens, and green spaces in low-income and under-served communities, which are both more likely to have high levels of paved surfaces and to be vulnerable to heat impacts. Parks and green spaces can help to reduce the urban heat island effect, while providing a gathering space for neighbors, promoting social resilience – a key element in extreme heat response.
- In TEMP-03, please consider using a generic term such as places of worship or religious building instead of church.
- Finally, we recommend that the County also partner with the Capital Region Climate Readiness Collaborative, a regional network of agencies, organizations, and other stakeholders that are working to elevate the region’s response to extreme heat and other challenges.

Wildfire:

- We recommend an additional strategy to address the air quality and smoke impacts of wildfire season. The County should coordinate with SMAQMD and develop a wildfire smoke response plan that provides specific triggers for action at different AQI levels and focuses on protecting the health of the most vulnerable, including youth, seniors, and outdoor workers. Potential guidance could address the safety of outdoor employees, mask-wearing, outdoor activities, and other topics. Like cooling centers, the County should work with schools, community-based organizations, local businesses, places of worship, and other community destinations to set up clean air centers, such as by providing funding to support the purchase of MERV-13 or higher rated air filters or CARB-certified air-cleaning devices. The County should also have effective coordination

across its internal departments and with school districts and other departments to ensure clear, consistent, multi-channel messaging.

- Consider recommending California's fire-resistant building code for homes located in high wildfire severity zones, not just very high zones.

Drought:

- The County should also evaluate the impact of drought on Sacramento County levees, as prolonged drought can weaken levees by causing subsidence and internal levee erosion below the surface.³

Flood:

- Many of the measures here, such as FLOOD-01 through 05, should be prioritized in environmental justice, low-income, and other vulnerable communities, as identified by AB 1550, CalEnviroScreen, Opportunity Zones, Promise Zones, and median household income. Low-income and formerly redlined communities have historically had lower levels of investment and development, including in their stormwater infrastructure, rendering these neighborhoods more vulnerable to localized flooding. Additionally, lower-income residents are more vulnerable to natural disasters, and have less capacity, savings, and resources to respond and recover. Finally, disaster damage to lower-income communities is often undervalued as damage costs are typically estimated in terms of property value, which is typically lower in low-income communities, and thus, recovery and disaster response funding is more likely to go to higher-income areas.
- FLOOD-11: This measure is about naturalizing existing concrete river channels, but it starts with "Identify and construct concrete channels..."

Appendices

Appendix C, Sacramento County 2030 General Plan Policies Supporting Climate Action

Sac Metro Air District recommends the County update General Plan Policy AQ-4 in Appendix C with the most current version, adopted in December 2020, which includes reference to the Sac Metro Air District's greenhouse gas emissions thresholds of significance. Additionally, the County should list CAP measures that are supportive of AQ-4 including GHG-07, GHG-11 and GHG-19.

Appendix H, Glossary

The Sac Metro Air District requests that SMAQMD be added to the Glossary and defined as the Sacramento Metropolitan Air Quality Management District. Additionally, Sac Metro Air District encourages the County to review the following glossary terms: CRC/CRCRC (both abbreviations are used in the document), Commercial, GIS and PG&E.

Conclusion

The Sac Metro Air District again commends the County for undertaking the task of developing this draft CAP. The County has set itself ambitious goals for the next ten years, and we believe that with additional refinement and improvement, this document can help set Sacramento County on a path of sustained progress toward achieving carbon neutrality, healthier and more sustainable quality of life for all its residents, and a climate-resilient economy and community.

³ <https://www.earthmagazine.org/article/protracted-drought-threatens-california-levees>

The Sac Metro Air District looks forward to collaborating with the County on the programs needed to help realize these goals.

Finally, the Sac Metro Air District looks forward to seeing General Plan updates, zoning updates and other programs designed to support the greenhouse gas reductions committed to in the CAP.

Thank you for your attention to these comments. If you have questions, please contact Rachel DuBose at rdubose@airquality.org or 916-874-4876.

Sincerely,

A handwritten signature in cursive script that reads "Paul Philley".

Paul Philley, AICP
Program Supervisor, CEQA and Land Use Section
Sac Metro Air District

Taylor. Todd

From: Muriel Strand <ecoengr@comcast.net>
Sent: Friday, April 9, 2021 11:40 AM
To: PER. climateactionplan
Subject: comments on sacramento county's proposed CAP
Attachments: sac county CAP comments.docx

EXTERNAL EMAIL: If unknown sender, do not click links/attachments.

Muriel Strand, P.E.

Advertising is a private tax.
- Andre Schiffrin

Good science and financial profit are mutually exclusive.
- me

April 8, 2021

To: Sacramento County
From: Muriel Strand, P.E.
Re: Proposed Sacramento County Climate Action Plan

The County's plan falls short of what will be needed for future ecological and social sustainability. In my engineering opinion, radical change will be necessary to achieve such sustainability.

Information such as described in these three websites is indicative of these predictions:

Governments have identified commodities essential to economic and military security
Obtaining them is another matter

<https://www.economist.com/finance-and-economics/2021/03/31/governments-have-identified-commodities-essential-to-economic-and-military-security>

Consumer boycotts warn of trouble ahead for Western firms in China

"Nearly half of the polysilicon in solar panels globally comes from Xinjiang. China's largest wind-turbine maker, Goldwind, is based there. Xinjiang's oil and gas power factories around China."

<https://www.economist.com/business/2021/03/31/consumer-boycotts-warn-of-trouble-ahead-for-western-firms-in-china>

Peak mining & implications for natural resource management

<https://www.youtube.com/watch?v=TFyTSiCXWEE>

In effect, we cannot graft our fossil fuel lifestyles onto PVs and windmills. We must go back to the drawing board and redesign our technology from the ground up.

Please find more in-depth discussion of what may be needed in the following papers:

https://www.researchgate.net/publication/256048802_Sustainable_Investment_Means_Energy_Independence_From_Fossil_Fuels

and

https://www.researchgate.net/publication/333581837_Is_it_true_that_'Small_Is_Beautiful'

Another excellent discussion of the kind of changes that are needed can be found in Charles Eisenstein's recent book, "Climate – A New Story." On the foundation of a deep and wide-ranging bibliography, mostly recent and apparently peer-reviewed, his basic thesis is that what we have done to the natural world with our cheap fossil fuel energy is at least as damaging as the global warming caused by GHG emissions.

His recommendation for action has four basic steps, in the following order:

1. Protect what's still intact, like the rainforests in the Amazon and the Congo, where Gaia is still healthy, where ecological memory yet endures and from where it can still spread.
2. Come back into relationship with Gaia and all the plants and animals, and regenerate and heal all the ecological wounds that humans have inflicted.
3. Stop poisoning everything with pesticides, herbicides, trash, plastic, etc.
4. Cut GHG emissions that are adding to Gaia's stress and trauma.

As a taste and summary of the book's contents, I recommend this short video:
<https://www.youtube.com/watch?v=8IO6Y5baPO0>

Lastly, I offer a few comments on some of the specific Community GHG Reduction Measures:

Measure GHG-16: Traffic Calming

Some traffic calming measures will discourage cyclists, such as curb extensions, speed tables, and bulb-outs. Remove them from the plan.

Complete streets plans and construction should NEVER involved installing new pavement, as this reduces the potential for natural biological carbon sequestration, and natural cooling.

While existing structures may slow vehicles, they do not seem to make drivers feel calmer.

Measure GHG-17: Bicycle Facilities

GOV-EC-04

Too often, bicycle parking structures seem to have been designed, selected and located without consulting actual cyclists. People who don't ride bicycles should not be making any such decisions.

Measure GHG-20: Safe Routes to School

Ensure that ALL neighborhood schools remain in use so as to reduce walking and cycling distances for students. Pedestrian walkways should never be adjacent to traffic lanes, and should never be located between parking and roadways.

Measure GHG-21: Update Community and Corridor Plans

GOV-EC-01:

GOV-EC-02:

GOV-EC-03:

GOV-EC-05

Identify the sustainable jobs and their locations that will be needed and available in the future so as to better understand where transportation demand will be and where it won't be. Focus on **access** to goods and services, **not** mobility.

Affordable housing should be owner-occupied, as rental housing is reliably characterized by rents that increase more than the minimum wage, more than the cost of living, and are regularly upended by gentrification.

Measure GHS-22 Connection Key Destinations

Focus on **access** to goods and services, **not** mobility and travel.

GHG-23 Incentivize Infill Development

Urban farming should qualify as desirable infill development, as it has great potential to reduce freight and shopping travel. The vast acreage of suburban lawns offers huge potential for conversion to urban farming.

Measure GHG-24 Increase Organic Waste Diversion

Calculate waste fees to be proportional to actual waste disposed of.

Measure GOV-FL-01

GOV-AR-01

Include bicycles as part of the County's fleet. Identify all possible work-related bicycle uses and trips.

Measure GOV-BE-01:

GOV-BE-02:

2.4 Measure: Electrification of Municipal Buildings

Require passive solar design and construction for all renovation and construction of county buildings, to the extent possible.

Measure GOV-BE-03

Require training in passive solar design for all County employees.

Measure GOV-WA-01:

All Measures: WATER

Charge water users according to actual use in terms of gallons, and charge higher rates for higher volumes.

GOV-WA-02

Invent a sprinkler head design that will turn itself off when it malfunctions. Identify and install alternative drought-tolerant replacements for turf.

Measure: Electric Agricultural Equipment

2.4 Measure: Electric or Alternatively-Fueled Construction Equipment

Provide incentives for replacements of fossil fuel equipment that are manual, human-powered tools.

2.5 Carbon Neutrality

Emissions estimates are insufficient for accurately assessing actual emissions reductions and carbon neutrality. Moreover, precise quantitative assessment of carbon absorption by natural and working lands is almost impossible. Qualitative cultural change is in order.

SMUD's goal of a zero-carbon power supply by 2030 is ambitious and inaccurate. Fossil fuels are required for the mining and refining of the metals and minerals required to manufacture PVs and windmills. As well, this approach cannot scale up nationally, let alone globally.

Adaptation Measures

Cultural change is needed. Again, see Charles Eisenstein's excellent book, *Climate – A New Story*, explains why we cannot graft superficial changes such as nonrenewable harvesters (PVs and windmills) of renewable energy onto our fossil fuel lifestyles. Fundamental cultural and technological changes are essential. Thus, we should expect fundamental change in the total set of jobs, as the future set of sustainable jobs will be quite different than the current set of unsustainable ones.

Ensure that insurance company premiums reflect actual rebuilding costs in the wake of fire and flood.

Measure Water-02

Measure Water-03

Include groundwater recharge

All Measures: FLOOD

Identify and implement measures to maximize water infiltration and groundwater recharge during and after rain events.

Measure Flood-02:

Modify building codes to permit composting privies with specified management practices, and to maximize greywater installations.

Measure FLOOD-12

Never permit new or additional exposure of bare ground without a verified and funded plan for replanting as soon as possible.

Taylor. Todd

From: Dale Steele <info@email.actionnetwork.org>
Sent: Friday, April 9, 2021 2:33 PM
To: PER. climateactionplan
Subject: Draft County Climate Action Plan Inadequate

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

I am writing to provide comments on the draft Sacramento County CAP. I am extremely disappointed with the draft which falls far short of the needs to address the climate emergency that the County declared recently.

As a long time resident of Sacramento County I am very concerned about the increasing health threats and worsening air quality that are linked to the climate emergency we are experiencing. I have family living in Sacramento County including my children and grandchildren and know that we must do better so that they don't bear the brunt of these increasing impacts. I expect the County to take an aggressive lead role in addressing climate change mitigation and adaptation measures. The draft CAP falls very far short as written. It's not too late to improve the final report and address these important responsibilities.

Specific comments follow:

The draft CAP not reflect the County's Climate Emergency Declaration (CED). There is weak language but no real action based on the specified 2030 carbon-neutral goal. The draft would defer the CED provisions until a proposed 2024-25 CAP update. That is totally unacceptable. The CAP just passes the responsibility into the future, where implementing measures to avoid runaway climate change will be even more difficult.

Carbon offsets are not a long term solution and should be used only as a last-ditch effort when other actions have failed. Offsets need to provide real local values too. Offsets should not be part of the initial set of actions to address the climate crisis. If offsets are used, they must be kept local to both reduce GHG emissions and provide benefits to disadvantaged communities.

Most of the CAP measures would be impossible to enforce and monitor because they are described in aspirational terms, defer mitigation, don't identify costs and funding, propose partnership or collaboration with uncertain effect, do not identify or commit to a schedule of performance, and state final 2030 goals without interim milestones.

The CAP does not offer actions to prioritize infill over sprawl development. Sprawl is the major driver of passenger vehicle miles travelled, the County's biggest source of greenhouse gases. The draft CAP does not provide robust public involvement in the CAP's development. Addressing climate change will take the whole community working together.

The draft CAP does not provide an adequate Implementation Plan. Implementation is critical and must be focused on real actions that can be measured.

The draft CAP assumes SMUD will meet its ambition but necessary 2030 carbon-zero goal, and that would reduce the need for County action. That's not the case and can't be counted on. The County must plan for taking real action. We have only a small window of time to avoid runaway climate change. SMUD is leading with their planned actions but no matter what SMUD achieves, the County must do as much to address this threat.

In summary, the draft CAP falls far short and is an embarrassing and inadequate effort to address a very real climate emergency. Please take a real lead role with the final CAP. The public is watching and will demand aggressive effort by the County. We are in a climate emergency!

Dale Steele
dtsteele@mac.com
301 27th Street
Sacramento, California 95816

Taylor. Todd

From: Meghan Cook <info@email.actionnetwork.org>
Sent: Friday, April 9, 2021 3:47 PM
To: PER. climateactionplan
Subject: Re: Sacramento County Climate Action Plan (CAP)

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

As a resident of District 1, I am writing to express my concern with the County's draft climate action plan (CAP). As drafted, the plan is weak in a number of ways and does not address some of the biggest actions the County could take to tackle climate emissions.

Last summer, I watched the skies turn orange and ash rain down on my car for weeks, as record-breaking fires tore across California. I stayed trapped inside, but many of my friends and neighbors were forced outside for work, coughing from the smoke. I shudder to think of the health consequences in the County for years to come. This is not normal. It was caused by climate change, and it is getting worse every year.

But, we have a chance to do our part to stop this nightmare and save lives in our county and globally. We need a strong County CAP now. The CAP should include a clear plan for reaching the goals adopted in the Climate Emergency Declaration. The CAP should prioritize infill development, as zoning and planning are one of the strongest tools the County has to address emissions. Goals should be specific and enforceable, with a clear implementation plan. Lastly, public involvement, particularly of our most vulnerable communities, should be a cornerstone through every step of CAP implementation. These measures would make our CAP far stronger and more impactful.

We can tackle climate change and build a safer, more prosperous economy for all County residents, but we must invest now. Sacramento County residents have been waiting on a meaningful CAP for almost a decade. We have no more time to waste. I am asking you to please take this issue as seriously as if your lives depended on it. Because mine does, your children's and grandchildren's do. Thank you for your time and consideration.

Sincerely,
Meghan Cook
Sacramento County Resident
District 1

Meghan Cook
meghan.o.cook@gmail.com
3644 H St., Apt. 2
Sacramento, California 95816

Taylor. Todd

From: Laurie Heller <info@email.actionnetwork.org>
Sent: Friday, April 9, 2021 3:50 PM
To: PER. climateactionplan
Subject: What will your grandchildren say about your actions today?

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

Dear Supervisor:

You chose to run for office. You put your hand up and said “I will be a leader.” Whatever benefit you assumed for taking on this role came with equal or greater responsibility. We ARE in a crisis. We ARE in an emergency. But the people who will feel the brunt of your action – or inaction – will be in your grandchildren’s generation. What you don’t do today they will suffer for tomorrow.

You are in the last generation of leaders to have the choice to continue 'business as usual'. I hope you understand what your grandchildren’s world will look like if leaders like you choose the path of least resistance (i.e., accept the Climate Action Plan as proposed.)

If you don’t, it’s time to get educated.

Laurie Heller
laurierivlinheller@gmail.com
1401 Perkins Way
Sacramento, California 95818

Taylor. Todd

From: Nicholas Avdis <NAvdis@thomaslaw.com>
Sent: Friday, April 9, 2021 4:36 PM
To: PER. climateactionplan
Cc: Robert P Thomas
Subject: Comments to Draft CAP

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

On behalf of Upper Westside, LLC and the Upper Westside Specific Plan (UWS), I provide the following comments to the County's Draft Climate Action Plan:

Overall general comment 1: The current draft of the CAP does not provide sufficient detail regarding the implementation measures identified so that overall feasibility and costs of compliance can be determined.

Overall general comment 2: More detail should also be provided in terms of establishing the legal nexus for imposition of any particular measure.

Measure GHG-14: Improved Transit Access – Promotion of regional mobility choices, including support of the RT network, will be important for improving the region's air quality into the future. Mobility, including in the way the project is designed, is one of the key design principles of the UWS project. Important to our project's overall mobility strategy is in addition to utilizing the services of RT, positioning the to take advantage of the successes of and proximity to Jibe, the existing Transportation Management Association (TMA) in Natomas. This measure should be modified to appropriately take into account the important roles that Transportation Management Associations (TMAs), like Jibe in N. Natomas, play in filling the gaps in public transit networks in our region.

Measure GHG-24: Incentivizing Infill Development - This measure proposes imposition of a \$1,000 per dwelling unit equivalent (DUE) fee for all development in County master plan areas, approved and proposed, including UWS. The CAP identifies the need to facilitate and incentivize high quality infill development so as to likely reduce VMT and improve air quality (AQ) and greenhouse gas emissions (GHG) in the County. The UWS project, which is a proposed Master Plan development, takes advantage of its geographic location and proximity to existing development and mobility infrastructure, like bicycle, pedestrian and transit networks by designing a community that will be less auto-dependent, more walkable and bikeable, and thus having a regional benefit from a vehicle miles traveled (VMT) perspective. Specifically, the traffic analysis for UWS indicates that its project VMT is lower than 15% of the average of existing development in the County and as such does not exceed the County's VMT threshold of significance for CEQA. It is my understanding that it is the only master plan proposed in the County that exceeds the County's VMT goals. The proposed measure, therefore, ignores the regional VMT, and AQ and GHG, benefits that a project like UWS would provide. This measure should be modified to provide a definition for infill. That definition should include projects for which VMT is 15% below the regional average consistent with applicable local and state guidelines. Furthermore, the measure should provide that projects located within such infill areas should not be subject to the infill in-lieu fee and, in facts, such project should be able to access these funds to promote development in these areas.

Measure WATER-2: Increase On Site Gray Water and Rainwater Resuse, and Recycled Water Systems- This measure is an example of benefit analysis should be provided so that its AQ/GHG benefits are better understood. It calls out specific measures for implementation, including requiring new construction to include holding tanks, pumps and redundant plumbing in buildings which would add considerable costs to new construction. As to rainwater reuse, it should be noted that our regional climate is generally comprised of wet winters and dry summers – the time when water is needed most and when it is not raining, thus calling into question the efficacy of rainwater reuse.

Measure FLOOD -05: Invest in Use of Pervious Pavements and Landscaping in Developed Area and Restrict the Use of Paved Surfaces. This measure should be modified to accommodate project specific instances where high ground water or clay soils exist thus limiting the benefits from the use of such surfaces. High ground water and clay soils limit the infiltration benefits of a pervious surface in these areas.

Thank you for the opportunity to provide the above comments. We look forward to working with the County on adequately addressing these concerns with the current draft document.

Nicholas S. Avdis
Of Counsel

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Taylor. Todd

From: Oscar Balaguer <oscarbal@hotmail.com>
Sent: Friday, April 9, 2021 4:44 PM
To: PER. climateactionplan
Subject: SAC CO CAP PUBLIC DRAFT: 350 CMMT
Attachments: 2021-04-09, SacCoCAP PubDft-Comment.docx

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Dear Todd et al,

Please see subject attached comments, submitted on behalf of 350 Sacramento.
Please respond to confirm receipt.

Thank you very much,
O



April 9, 2021

Todd Smith, Senior Planner
Sacramento County Planning and Environmental Review
700 H Street, Sacramento, CA 95814

Via Email

SAC COUNTY CAP, PUBLIC DRAFT: COMMENTS

Dear Todd,

We appreciate the opportunity to comment on the subject draft CAP. There are improvements over the previous version, but we are disheartened by its continued lack of urgency and uncertain measures, as pointed out in our earlier comments.¹ The need for rapidly de-carbonizing our economy, well documented in County documents and elsewhere, is not reflected in the CAP.

A more ambitious CAP would speak to the pressing planning needs of our time, and would position the County to successfully compete for federal climate action funding now being negotiated in Congress.

Our comments address the Community CAP and touch briefly on the Government Operations plan.

SECTION ONE: COMMUNITY CAP COMMENTS

Our comments, developed in consultation with ECOS, Sierra Club, and Citizen’s Climate Lobby, are presented under three broad headings, each of which ends with a “What’s Needed” listing:

- I. County Climate Emergency Declaration
- II. Land Use/VMT
- III. Accountability

I. THE CAP DOES NOT REFLECT THE COUNTY’S CLIMATE EMERGENCY DECLARATION

There is fig-leaf verbiage but no substantive response to the Climate Emergency Declaration (CED)’s policy directions re:

- a 2030 carbon-neutral goal;
- urgent short-term measures;
- expert consultation;
- funding analysis;
- task force to oversee plan; and
- “unprecedented” public involvement.

¹ 350 Sac, ECOS, Sierra Club, July 16, 2020; 350 Sac, September 24, 2020; 350 Sac, November 19, 2020.

The draft would defer the CED provisions until a proposed 2024-25 CAP update, far too late to meet the CED's overall intent and specific aims. Attachment 1 provides further analysis.

What's Needed:

The CAP should present a serious effort to address both the CED's challenging 2030 goal and specific direction. Each item of the CED should be addressed in this CAP, and steps identified to achieve it. Constraints should be identified, alternatives analyzed, and a pathway proposed. SMUD staff is addressing a similarly challenging goal in a professional and responsible manner, while the CAP merely 'kicks the can down the road'.

II. THE CAP DOES NOT ADEQUATELY PRESENT LAND USE-RELATED MEASURES

A. Planning Background

1. **The County's Current Growth Plans will Increase GHG Emissions.** The County's *de facto* growth strategy is outlying ("sprawl") development. Such development will increase passenger car traffic, which is the County's single greatest GHG source. Also, the County's approved and planned sprawl far exceeds projected market demand for housing. Most of that greenfield development would occur beyond the County's Urban Policy Area (UPA)², in expectation of being granted project-specific general plan amendments.³

The likely result of the over-abundance of entitled housing starts far from the urban core will be numerous far-flung, partially built-out tracts. Such a land use pattern would:

- be impossible to service with transit;
- cause increased traffic and GHG emissions;
- require more energy to build and operate than compact development;
- create more environmental impact than the same number of infill homes;
- make rational infrastructure planning difficult and construction costly; and
- be more difficult and expensive to provide with County services.

3. **Most County Growth Could be Accommodated by Infill.** The County's projected need for new homes through 2040 is for 37,230 dwelling units⁴; hardly more than the County's current estimated infill capacity of 33,000 units.⁵
4. **Numerous General Plan (GP) Policies Support Infill Development.** E.g., Policies EN-10G, LU-1, LU-3, LU-4, LU-5, LU-6, LU-7, LU-8, LU-11, LU-23, LU-26, LU-60, LU-81, LU-33, LU-34, LU-90, LU-57, LU-68, LU-74, LU-82, LU-108B support infill. County staff has stated there are 27 such policies.⁶
5. **Two Primary General Plan Policies Support Sprawl.** The GP directs that urban growth will be accommodated within the established UPA; but GP Policies LU-119 and LU-120 allow project-specific GP amendments to extend the UPA boundary so as to include

² The Urban Policy Area (UPA) defines the area expected to receive urban levels of public infrastructure and services within the planning horizon and provides the geographic basis for rational planning of such services and infrastructure.

³ Sacramento County, *2030 General Plan Annual Report for Calendar Year 2020*, March 2021.

⁴ SACOG, *Sustainable Community Strategy*, 2019.

⁵ Sacramento County, *op. cit.*

⁶ Sacramento County, *op. cit.*

proposed project areas. The result is that the boundary meant to define the limit of urban growth for the planning period (2030 for the current GP) becomes the baseline from which growth can occur outward, farther from the urban core. That new UPA boundary can then become the baseline for progressive further outward expansions, in “leapfrog” fashion. These two policies set forth measures to limit or mitigate the environmental impacts of such development. However these measures do not avoid the potential for “leapfrog” development, and are limited to the onsite character of the projects. They do not address the inherent, unavoidable impacts of disjunctive development, particularly given the incomplete build-out pattern described above. We are unaware of prior environmental analysis of these impacts.

D. The CAP’s LU-Related Measures are Not-Credible, or are Incomplete

Measures GHG-21, and GHG-22, (“Update Community and Corridor Plans”, and “Connecting Key Destinations” respectively), propose future planning of uncertain effectiveness.

Measure GHG-23, “Incentivize Infill Development”, proposes a per/home fee on new greenfield development, with proceeds used to incentivize infill. It is credible but incomplete, because it will incentivize infill only to extent that sprawl continues, and because without a policy commitment to change current growth priorities its effectiveness is uncertain.

These three measures are “un-quantified”, indicating their effectiveness cannot be substantiated and/or implementation is uncertain

E. The CAP does Not Discuss Other Relevant Planning and Mandates

CAP Section 1.4 and Appendix B fail to discuss County and Regional planning efforts directly relevant to climate change planning and GHG-reduction:

1. **County infill planning.** Such planning is not mentioned among the other identified County activities, and includes, e.g.:
 - The County’s current LEAP-funded grant to develop a comprehensive inventory of infill sites, and identify and remove development barriers;
 - Staff’s recent proposal that 27 measures in the GP’s Land Use element should be part of a formal infill program in order to be fully implemented;
 - The pending completion of the *Re-Envision West Arden Arcade* plan;
 - Actions taken to-date on the *Fair Oaks Blvd. Project*;
 - The County’s 2008 adoption of an infill program and principles;
 - Other past planning exercises for the County’s deteriorating road corridors.
2. **County Local Hazard Mitigation Plan.** The LHMP attempts to assess and prepare for natural disasters including flood, drought, wildfire, and severe weather, al of which are exacerbated by climate change. Disaster planning is increasingly necessary, but the most effective, and ultimately the only, way to protect the community is to through aggressive GHG-reduction measures.
3. **Regional MPO/SCS.** SACOG’s mandated *Sustainable Community Strategy (SCS)* is listed, but without any discussion of the CAP’s consistency. The SCS calls upon jurisdictions in the Sacramento region to do their part to lower GHG emissions “*by accelerating infill development, reducing vehicle trips, and electrifying remaining trips.*”

4. ***Other Applicable Mandates.*** Appendix A, "... Regulatory Background" does not include commonly-cited statutory requirements affecting local GHG-reduction programs, including SB 375 (Sustainable Communities), SB 743 (VMT Thresholds), and AB 1826 (Organics Recycling).

What's Needed:

1. ***Cumulative impact analysis.*** The environmental document for the CAP should include a cumulative impact analysis of project-specific extensions of the UPA for currently planned projects, considering impacts to VMT, GHG emissions, and other potential environmental effects, insofar as such analysis has not been previously provided.
2. ***Analysis of partial build-out impacts.*** The environmental document for the CAP should consider impacts associated with partial project build-out resulting from approval of development beyond market demand, as described above.
3. ***Balanced Growth Policy.*** The CAP should include a balanced growth policy measure to ensure that greenfield development does not continue to outpace infill by requiring that successive infill development goals be met before a succeeding increment of greenfield development is approved.
4. ***Early Completion of LEAP-funded work.*** The CAP should commit to expediting this work to promptly resolve the County's uncertainty about infill capacity, constraints, and needed support.
5. ***Discussion of CAP/SCS consistency.*** The CAP or its environmental document should evaluate the CAP's consistency with the SCS.
6. ***Regulatory Background.*** The CAP should list and summarize all mandates directly relevant to climate action planning.

III. ACCOUNTABILITY

A The CAP Provides No Evidence to Support GHG-Reductions Assumed Under the Adjusted BAU Scenario.

CAP Table 1, and related tables in Appendix E, project 2030 emissions based on assumptions of GHG-reductions achieved by seven non-County agencies which are identified in CAP Table 2. However no evidence or explanation is provided for how the reductions from each agency were calculated, and with one exception (SMUD) the reductions attribute to each agency are unstated .

B. The CAP does not present substantiated, complete, specific, and enforceable mitigation measures.

The CAP provides no evidence or explanation for the GHG-reductions claimed for its quantified measures.⁷ In additions, many if not most CAP measures would be impossible to enforce and monitor because they:

⁷ During the review period for the CAP, County staff provided us with an untitled, undated, un-attributed consultant product as a PDF file ("*Quantified Community GHG Reduction Modeling Assumptions.pdf*").

- are described ambiguously or in aspirational terms;
- are voluntary
- defer formulation of mitigation;
- do not identify costs and funding;
- proposes partnership or collaboration with uncertain effect
- do not identify or commit to a schedule of performance, and state only final 2030 goals without interim action dates or milestone target;
- do not include, “*economic analysis and detailed programs and performance measures*” as promised in the GP’s 2011 DEIR and GP Policy LU-115, Implementation Measure H.

Examples. Our present comments focus on the CAP’s broader needs rather than on measure-specific critiques. However, for illustrative purposes we offer the following reviews of two problematic measures, chosen among many:

1. ***Measure GHG-01: Carbon Farming.*** This quantified measure is credited with sequestering 77,692 MT CO₂e per year by 2030, which is by far the most substantial reduction of any of the CAP’s measures, and is described as, “... *essential for putting the County on a path to achieving the objectives of the community 2030 carbon neutrality goal*” (CAP, Sect 1.3). However, the measure lacks credibility because:
 - It would be entirely voluntary;
 - It would rely on an outreach/educational program, the specifics of which are entirely lacking;
 - Neither cost or funding source for the outreach program are identified;
 - It assumes without evidence or explanation high rates of program acceptance (30-70%) by County farmers and ranchers – a group who are likely be slow, with good reason, to adopt new soil management practices not directly yielding enhanced return on investment. The US National Resource Conservation Service has been promoting many of the proposed cultural practices thorough educational outreach and Farm Bill incentives for nearly a century, achieving only partial acceptance.
 - It assumes without evidence or explanation that 60 percent of the County’s total agricultural land will have adopted the identified soil-management practices by 2030.
 - It would develop the program by 2024, leaving only six years to accomplish its goals from a dead start.
 - No interim success measures are identified, making it impossible to determine progress, or lack thereof, until 2030.
2. ***Measure GHG-11: Reduce Emissions from New Residential and Office/ Business Professional Development (sic) Vehicle Miles Traveled.***

As previously noted, the County’s largest single source of GHG is passenger vehicle traffic, comprising about 34 percent of total emissions (1,671,596 MTCO₂e/year).

This measure does not reduce existing GHG emissions. It would implement the regulatory requirement of SB 743 to reduce growth-induced VMT generated by new development by 15 percent of regional average, and is credited as reducing the increase in GHG caused by growth by 22,037 MT CO₂e per year by 2030. Insofar as the County has adopted implementing guidelines to be imposed during the CEQA

We have not had time to comprehensively review this file, but referred to it for our analyses of Measures GHG-01 ad GHG-11.

process, this measure would be credible, although the reductions achieved would be insignificant effect in reducing total County VMT.

However, the measure allows developments which have applied “*feasible on-site VMT mitigation measures*”, but don’t meet the reduction target, to instead buy carbon offsets through a “*VMT mitigation program (e.g., VMT mitigation fee, bank, or exchange)*”. This renders the measure non-credible because:

- “Feasible on-site VMT mitigation measures” are not identified, rendering the practical application of this measure uncertain. The CAP and its environmental document should present specific measures which the County proposes are feasible, rather than defer that determination to a future process out of public view.
- No evidence or explanation is provided to substantiate the presumed GHG reductions.
- As noted above, the great majority of planned County growth is in sprawl development, almost certainly generating VMT well above the regional average. It’s likely that such projects would rely on the proposed “VMT mitigation program”. However, because the specifics of this program are undetermined there is no evidence that it would be feasible or effective.
- The use of any carbon-offset funds is of local concern but is left unclear in the CAP, which discusses carbon offsets in disparate ways: Measure GHG-11 does not limit where such in-lieu mitigation could occur; Measure GHG-15 implies that offsets may be for used for local projects; but CAP Sect. 2.3 specifies that offsets will be “outside of the County’s control”.

B. The CAP Assumes Without Evidence that SMUD will meet its 2030 Carbon-Zero Goal

The CAP assumes SMUD will meet its aspirational 2030 carbon-zero goal, providing 32 percent of the CAP’s total claimed GHG reductions. This substantially reduces the need for County action, but is problematic because:

- Claimed GHG reductions based on other entities’ programs should be assured. A CAP’s “adjusted business as usual” scenario normally includes only approved legislative actions, which the SMUD goal is not (SMUD’s goal is the only non-mandated program among the seven listed in CAP Table 2).
- SMUD own staff has:
 - stated that there is no clear pathway to reaching the 2030 goal;
 - identified numerous risks and unknowns which will have to be successfully resolved to reach that goal;
 - made no assertion that meeting the goal is certain or even probable.

CAP section 2.3 acknowledges that clear uncertainty, but only with vague reference to requiring carbon offsets if SMUD does not reach its goal, without stating when such offsets would be required, of whom, by what authority, at what cost, and how used.

C. The CAP’s Implementation Plan is Inadequate

The CAP’s “Implementation and Monitoring Strategy” lacks:

- Identification of needed resources to implement CAP measures;
- Identification of proposed funding for CAP measures;

- Reference to the County's GP commitments to; "...develop sustainable funding sources for this Program ..., which may include a fee assessed for development projects" (GP Policy LU-115).
- Schedule of interim actions and milestones;
- Dates certain for reporting and for CAP and GHG Inventory updates;
- Identification of resources and funding needed to provide ongoing CAP administration, monitoring and reporting.
- A measure consistent with the GPs commitment to, "Enact and fund a Sustainability Program to provide ongoing oversight, monitoring and maintenance of the Climate Action Plan, including ... updates to the GHG emissions inventory, and future updates to the... Climate Action Plan as necessary. The County shall develop sustainable funding sources for this Program and associated activities, which may include a fee assessed for development projects" (GP Policy LU-115, Implementation Measure I).

In addition, this section states implementation "will entail ... tracking the payment of relevant assessments on new development to ensure that these funds are being invested into high-density infill projects" However as noted in our comments on Measure GHG-23, the assessment of any such fee is uncertain.

What's Needed:

1. **Credible Measures.** The CAP should provide clear, fully developed mitigation measures which include schedules of key implementing actions and interim targets, present evidence for claimed effectiveness, and are consistent with GP commitments.
2. **GHG-11, Offsets.** The CAP should provide justification for allowing offsets instead of requiring direct GHG-reductions; detailed clarification of proposed offset funding and the implementation process; discussion of potential local use of offset funds to reduce County GHG emissions and provide co-benefits, especially directed to County environmental justice communities.
3. **SMUD Goal.** The CAP should provide substantial evidence demonstrating that assumed SMUD reductions meet CEQA requirements for mitigation certainty.
4. **Implementation Plan.** The CAP should include the provisions which are identified above as lacking.

SECTION TWO: COUNTY OPERATIONS PLAN COMMENTS

- A. **Accountability.** The CAP presents 18 in-house measures with no mention of the County *Government Operations CAP* adopted in 2012. Whether the proposed measures are carried over from the adopted plan, are updated, or are new is unstated. Likewise unstated is the status of implementation of the existing plan's measures, or an assessment of their effectiveness over the last nine years. With no attempt at such accountability, the success of both the current program and the proposed measures is uncertain. As with the Community CAP, no evidence or explanation is provided for the GHG reductions attributed to the operational measures.
- B. **Green Procurement.** The State of California encourages and supports local green procurement purchasing to reduce GHG emissions and other environmental impacts⁸. No such measure is included in the Operations CAP.

⁸ CARB, CoolCalifornia Portal, "Green Purchasing"; <https://coolcalifornia.arb.ca.gov/article/buy-green-0>

What's Needed:

1. **Operations CAP Audit.** The CAP should include an audit of the County's Government Operations CAP, such as the one conducted by the City of Sacramento on its City operations CAP which found:⁹
 - Improved monitoring and reporting is essential;
 - Centralized management and oversight should be considered;
 - Awareness and compliance need to be strengthened.

Since the County's Operations CAP also lacks monitoring, reporting, and central management, its implementation likely suffers identical problems. To proceed after nine years of unreported experience without a program assessment would be irresponsible.
2. **Green Procurement Purchasing.** A measure should be added to the Operations CAP providing for adoption and implementation of an Environmentally Preferable Purchasing Policy or similar.

The County has correctly identified climate change as an emergency because it presents a stark and imminent threat. The current draft's business-as-usual response is incompatible with that reality. We look forward to continued work with the County to deliver a CAP that authentically engages the challenge forced on us by climate change.

Sincerely,



Justin Tweet, Co-Chair
350 Sacramento CAP Team



Oscar Balaguer, Co-Chair
350 Sacramento CAP Team

Cc: County Supervisors via Clerk of the Board
Ann Edwards, Interim County Executive
Leighann Moffitt, Planning Director

⁹ City of Sacramento Performance Audit Division, *Audit of the City's Green Efforts*, December 2020. Online: <https://www.cityofsacramento.org/-/media/Corporate/Files/Auditor/Audit-Reports/Audit-of-the-Citys-Green-Efforts.pdf?la=en>

SACRAMENTO COUNTY'S DRAFT CAP DOES NOT REFLECT THE COUNTY'S CLIMATE EMERGENCY DECLARATION

Sacramento County adopted a *Climate Emergency Declaration* (CED) on December 16, 2021, citing the, “*risk of experiencing the devastating effects of extreme heat and weather events caused by rising atmospheric greenhouse gasses*”, and the associated, “*increased demand on public sector resources and emergency response capacity*”.

The CED set an ambitious goal, commensurate with scientific opinion, of achieving community-wide carbon-neutrality by 2030, and also provides specific policy direction to meet the goal.

The County released a public draft of its *Climate Action Plan* (CAP) on March 8, 2021. The CAP fails to substantively respond to the CED's guidance, as detailed below:

1. URGENCY

The CED states: “*Supervisors ... declare [a] climate change emergency requiring urgent and immediate mobilization of public and private resources to develop and implement a climate and sustainability plan that ...achieve[s] ... countywide carbon neutrality ... by 2030....*”

However, the CAP:

- does not identify any measures for “urgent and immediate” early action;
- presents GHG-reduction measures of unsubstantiated and doubtful effectiveness;
- and would defer planning to achieve the 2030 goal until 2024-25.

2. SHORT-TERM MEASURES

The CED states: “*the County of Sacramento commits to ... significant steps to ... accelerate short term communitywide carbon elimination, and ... eliminate emissions by 2030 ... through regional collaboration....*”

However, the CAP:

- does not identify any short-term measures;
- would defer planning to achieve the 2030 goal until 2024-25;
- presents no proposals re regional collaboration.

3. 2030 GOAL

The CED states: “*the Communitywide Climate Action Plan shall explain the County's approach to ... achieve carbon neutrality by 2030, building on recommendations and analysis from community partners, ... climate experts, ... planners, community members, and economists ... guided by science, data, best practices, and equity concerns.*”

However, the CAP:

- Would defer planning to achieve the 2030 goal until 2024-25;

- does not incorporate on-the-record recommendations from environmental community organizations;
- Was drafted without input from the identified professionals, and does not identify a process for future consultation;
- Is inconsistent with scientific consensus re the need for urgent climate action;
- Does not address equity concerns.

4. □ RESOURCE ANALYSIS

The CED states: “County staff shall evaluate the resources necessary to achieve carbon neutrality ..., and the emergency actions required ... by 2030. ... County staff shall identify [funding or resources] gaps and provide recommendations to the County Executive and Board of Supervisors.

However, the CAP:

- Does not discuss resources or funding for any CAP measures, or identify gaps
- Provides no funding-related recommendations.

5. EXPERT TASK FORCE

The CED states: *“the County ... will establish, within 60 days, a permanent Climate Emergency Mobilization Task Force ... of climate experts ... to oversee the ... climate emergency response plan ... all departments within the County ... shall ... provide regular updates to the Task Force and ... Supervisors concerning departmental progress....”*

However, the CAP:

- Makes not mention of the Task Force, or plans to convene it.

6. FARMER SUPPORT

The CED states: *“it is vital that farmers ... be supported ... in necessary conservation and regenerative practices that will reduce emissions and improve resilience....”*

However, the CAP:

- Presents one measure relating to agricultural support, which is neither credible or substantiated, as specified in 350 Sac’s comments on the CAP.

7. COMMUNITY OUTREACH.

The CED states: *“... the County ... commits to support outreach ... for County residents and staff on the urgent need to reduce GHG emissions, and the policies and strategies necessary the County ... shall [engage] ... community-based and grassroots organizations ... inclusive economic development partners, ... low-income and disadvantaged communities, youth, communities of color, and environmental justice.”¹*

¹ This policy direction is further informed by the CED’s fourth Whereas: *“... the scope and scale of action necessary to stabilize the climate will require unprecedented levels of public awareness, engagement, and deliberation to develop and implement effective, just, and equitable policies to address the climate crisis”*.

However, the CAP:

- Has no measures relating to future outreach.
- CAP development itself has proceeded with inadequate public participation.²

8. AGENCY AND ORGANIZATION SUPPORT

The CED states: *“The County shall ... support ... local climate mitigation and adaptation efforts, ... including ... SMUD, the ... AQMD, ... SACOG, ... other regional agencies and associations [and] ... environmental and social justice ... organizations.”*

The CAP:

- Includes several measures of varying credibility involving “working with” SMUD and SMAQMD to support their programs (GHG-06, GHG-09, GHG-25).

² The current CAP process offers substantially less opportunity for public involvement than other current plans, e.g., the *West Arden Arcade Re-envisioning Plan*; the *Active Transportation Plan Update*; and the *Natural Resource Management Plan for the American River Parkway*; and far less than the City of Sacramento is offering for its CAP.

The County made a good start in 2016 and early 2017 with four public CAP workshops, and subsequently staff has met with stakeholders. However, since early 2017 there has been only one County-convened opportunity for the general public to question staff about the CAP, with a three-minute time limit placed on public input due to large number of participants.

Due to unprecedented and well-publicized fires, hurricanes, floods, and other disasters and extreme weather since 2017, public concern about climate change has grown.

Taylor. Todd

From: Faye Wilson Kennedy <fayek@springmail.com>
Sent: Friday, April 9, 2021 4:49 PM
To: PER. climateactionplan
Cc: Serna. Phil; Kennedy. Supervisor; Chris Brown
Subject: Comments on Sacramento County's (Public Draft) Climate Action Plan from the Sacramento Poor People's Campaign (Sac PPC)

Importance: High

The Sacramento Poor People's Campaign (Sac PPC) would like to offer the following comments regarding Sacramento County's (Public Draft) Climate Action Plan dated March 2021.

The Sacramento County's Climate Action Plan must address and use Environmental Justice (EJ) concepts and language such as: **ENVIRONMENTAL JUSTICE**. There is no definition of environmental justice in the draft document. Environmental Justice (or EJ) is defined by the California Environmental Justice Alliance as:

"The basic right of people to live, work, go to school, and pray in a healthy and clean environment—regardless of race, gender, sexual orientation, age, culture, ability, nationality, or income."

The Sacramento County's Climate Action Plan only refers to environmental justice twice throughout the document, and just refers the reader to the County General Plan. The County's General plan focuses on several distinct communities as environmental justice communities.

The impacts of climate change: heat, excessively strong storms, and smoke during wildfire season affect all disadvantaged people regardless of where a district boundary is drawn. This is especially true of the homeless who live throughout the entire community regardless of the designation in the County General plan.

Similarly, there's a dearth of reference to the homeless. And there's no reference at all to the impacts of poverty and living in substandard housing and older housing on the communities, and the impact of heat and other weather events like bad air on those who are disadvantaged. The sole focus on flood events as climate emergencies is also misguided as a number of homeless have died in the past year from heat waves and excessive cold and exposure to high winds and falling tree limbs.

Here are 4 specific changes that we call on you to incorporate in the revised CAP:

1. **The issue of Poverty must be addressed.** Social determinants of health (SDOH). Poverty is the single largest determinant of a person's health, and ill health is an obstacle to social and economic development. Additionally, poor people live shorter lives and have poorer health than affluent people. This disparity has drawn attention to the role of health to the social environment.
2. Older homes: community members living in older homes without access to air conditioners or cooling systems must cope with the oppressive heat in Sacramento County and throughout the region.
3. Providing shelters for the unhoused must be considered and addressed due to climate factors such as extreme weather conditions: heat, flood, rain and cold in Sacramento County.

4. Air Quality: community members living in neighborhoods impacted by poor air quality due to climate change are at risk to health issues such as asthma and other upper respiratory disorders; and limited access to outdoor activities.

Sacramento County's Climate Action Plan will not be adequate for the challenges in front of us, which already affects the health of Sacramento County residents, until it correctly and adequately addresses the impacts on the disadvantaged, the poor, people who have historically suffered from injustice in our community in the housing stock and neighborhoods regardless of whether or not they live in one of the designated environmental justice neighborhoods.

Thank you for the opportunity to provide input to Sacramento County's Climate Action Plan.

Sacramento Poor People's Campaign (Sac PPC)

Faye Wilson Kennedy, Lead Organizer

916 812-7429

Taylor. Todd

Subject: Public Comment on CAP

From: weslum@aol.com <weslum@aol.com>

Sent: Friday, April 9, 2021 4:52 PM

To: PER. climateactionplan <climateactionplan@saccounty.net>; Rich Desmond <RichDesmond@saccounty.net>

Cc: weslum@aol.com

Subject: Public Comment on CAP

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

To Sacramento County Staff and Supervisors,

I appreciate the opportunity to comment on the Climate Action Plan, dated March 2021. I am a 41 year resident of the County and raised a family here. My 41 year career has been in transportation planning, design, environment, operations and research. I've worked for the private sector and in various levels of government including city, county, state and federal. For 31 years I commuted daily to Caltrans offices by bicycle.

I have read the CAP and congratulate staff on a comprehensive effort in this Plan. It addresses most every aspect of the County's area of influence and responsibility towards a future livable community. I am also appreciative of the adaptation measures included in the CAP; these are the everyday issues in our lives.

I believe the Climate Crisis to be real and am reminded of it in the last decades as I experience the more frequent heat waves, more frequent droughts, and recently the wildfire smoke. As I actively study climate in my retired life I believe life on earth is and will be drastically affected. To that end, I highly recommend the County create a organization and increase staff so they can understand the changing nature of this issue; keep up to date with laws and regulations; incorporate changes from industries addressing climate; coordinate with partners and stakeholders; and be a leader in governments and communities to save our quality of life.

I also recommend the staff be aware of the Zero Carbon Action Plan released in the fall of 2020. Developed by over 90 researchers throughout the country it provides a overarching view of the policies and actions needed to meet the Carbon Zero target by 2050. See [https://www.unsdsn.org/Zero-Carbon-Action-Plan?utm_source=BenchmarkEmail&utm_campaign=ICYMI%3a National Zero Carbon Transportation Plan&utm_medium=email](https://www.unsdsn.org/Zero-Carbon-Action-Plan?utm_source=BenchmarkEmail&utm_campaign=ICYMI%3a%20National%20Zero%20Carbon%20Transportation%20Plan&utm_medium=email).

Lastly, I offer a few comments of detail to the CAP:

1. Regarding buildings — existing and new, residential and non-residential, can policies and programs provide incentives for owners to incorporate greener features and that can be rewarded (property tax or permit fees)?
2. Are there enforcement programs being considered to the policies and programs?
3. What policies for inorganic waste are being considered?
4. Can county facilities for employees include showers and lockers for bikers and others?

5. Will life cycle analysis reflect the priority needed to fairly represent societal cost that are typically not included in traditional cost/benefit calculations?
6. Regarding evacuation plans for emergencies can the County include regular dry runs involving stakeholder agencies, media, and the public?
7. Can the County consider additional public input in the form of advisory committees for subject areas? I'd be willing to volunteer.

Sincerely,

Wesley Lum
916-243-9824
weslum@aol.com
1437 El Nido Way
Sacramento, CA 95864

Taylor. Todd

From: Jennifer <doncald@hotmail.com>
Sent: Friday, April 9, 2021 5:43 PM
To: PER. climateactionplan
Cc: Slothower. Laurie; Nava. Lisa; Supervisor Serna; John Ching Sac AQMD; Sac AQMD; AQMD Kennard; Jeff S. Harris
Subject: CAP comment on fossil fuel emitting and particulate matter generating devices

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

To whomever is to construct & implement our County's — critical to both wildlife and people's public health & safety — climate action plan (CAP). My comment/request is regarding fossil fuel emitting and particulate matter generating devices.

Somewhere (perhaps here: GHG-09 on page 12, addressing gas-powered landscaping equipment is a weak and vague statement: "*The County will work with SMAQMD to establish an incentive program to trade in fossil fuel-powered landscaping equipment with electric versions.*" - This draft statement is far too weak!) in this plan should be a clearly stated deadline ending the use of gas powered lawn devices including leaf blowers, mowers & limitations as to when (*similar to the "no burn days" concept*) any type of blowing device can be used. The latter, considering particulate matter and the Sacramento Valley's chronic air inversion issues. My back patio accumulates a layer of filth on at least a weekly basis.

As you're likely aware, we frequently have very unhealthy air. Thus the use of these devices needs to end sooner than later = within the next few years, please. No vague statements on it, please set some very clear dates, terms and conditions.

Please work to end this air quality issue that has been known & documented by the state since the Year 2000, per: <https://ww2.arb.ca.gov/sites/default/files/classic/research/apr/reports/l828.pdf>

GAS LEAF BLOWERS

...will become
the leading source of
ozone-forming emissions in
the state by 2020,
ahead of cars.

California Air Resources Board



Thank you for your consideration.
J. Caldwell
doncald@hotmail.com
Sacramento, 95833

Taylor. Todd

From: PER. climateactionplan
Subject: Comments on County Climate Action Plan.

From: Maggie Coulter <mcoulter@dcn.org>
Sent: Friday, April 9, 2021 6:38 PM
To: Slothower. Laurie <SlothowerL@saccounty.net>
Subject: Comments on County Climate Action Plan.

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Sac County needs to eliminate two stroke engines and gas blowers.
The CA Air Resources Board has [already documented](#) how bad they are for air quality.
They also are noise polluting and completely unnecessary.
They should be banned as soon as possible.
Please include these comments on the Climate Action Plan.
Thank you.
Maggie Coulter
Sacramento, CA 95817

Taylor. Todd

From: Anthony DeRiggi <tderiggi50@yahoo.com>
Sent: Friday, April 9, 2021 8:45 PM
To: PER. climateactionplan
Cc: Supervisor Serna
Subject: comments on draft CAP

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Thank you for the opportunity to comment. My only comment is for: MEASURE GHG-09: ELECTRIC LANDSCAPING EQUIPMENT:

Gasoline-powered landscaping equipment is a significant source of air pollution and GHG emissions. A 2017 report by the CARB estimated that the air pollution emissions from small gas engines such as the ones used in landscaping will soon exceed the amount of emissions from all the cars on the road today in California.

Over 20 cities in California have already banned gas-powered leaf blowers. So, in comparison to what many cities are already doing, GHG-09 appears to be a weak and ineffective voluntary measure.

My suggestion for an effective GHG-09:

Measure: The county staff will work with Supervisors and stakeholders to develop an county ordinance to phase out the use of gas-powered leaf blowers by 2025. The County will also work with SMAQMD to establish an incentive program to trade in fossil fuel-powered landscaping equipment with electric versions.

Anthony DeRiggi, MD
932 46th St
Sacramento, CA 95819

Taylor. Todd

From: Nora Juhasz <ms.norajuhasz@gmail.com>
Sent: Friday, April 9, 2021 10:31 PM
To: PER. climateactionplan
Subject: Climate plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Hello,

I have read the plan, but would like it to go further in the area of gas leaf blowers. I would like to see them completely banned, asap, like 21 other cities in California have already done. They are not only polluting with their engines, but they blow off the top soil, with possible pesticides and contaminants, all over the air for us to breath, along with all over our houses and cars, and are very noisy to boot. They are used all year round, when there are no leaves, in place of a broom, and in place of actually sweeping up the dirt and putting it in the green recycling. Just blown off the property and onto others.

Can we please do more then encourage owners to go electric and just flat out ban them?

Thank you,
Nora Juhasz

Taylor. Todd

From: PER. climateactionplan
Subject: Gas Leaf Blowers

From: Clara Smith <outlook_F51710552DC3ADBB@outlook.com>
Sent: Friday, April 9, 2021 8:20 PM
To: Slothowerl@saccounty.net
Subject: Gas Leaf Blowers

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Dear One:

The debris these machines put in our air and settle over our bodies, invade our air passages, beautiful gardens, homes, and cars is unhealthy. Plus the noise is awful! If there is anything at all you can do to stop this invasion of my health and property I would deeply appreciate it!

Thanking you in advance.

Clara Smith
2604 N Street
Sacramento, CA 95816
(916) 737-6666
KUNSCH.clara@sbcglobal.net

Sent from [Mail](#) for Windows 10

Taylor. Todd

Subject: Please make a Climate Action Plan that reflects the climate emergency declaration, and please include nuclear disarmament as part of the Climate Action Plan

From: Bruce Burdick <info@email.actionnetwork.org>

Sent: Saturday, April 10, 2021 1:51 PM

To: PER. climateactionplan <climateactionplan@sacounty.net>

Subject: Please make a Climate Action Plan that reflects the climate emergency declaration, and please include nuclear disarmament as part of the Climate Action Plan

Public Comment,

Dear Supervisor Rich Desmond and all Sacramento County Supervisors,

The world is in a climate emergency with melting glaciers and increasing California wildfires. The Paris Climate Agreement focused on trying to limit global warming to 1.5 degrees C. To limit global warming, we must stop putting greenhouse gases into the air, and each world citizen must emit less than 14.4 pounds of CO2 per person per day. The average Californian emits many greenhouse gases, and the average Californian emits about 82 pounds of CO2 per person per day. How can the average Californian decrease their CO2 emissions from 82 pounds of CO2 per person per day to below 14.4 pounds of CO2 per person per day? The Sacramento County Climate Action Plan should educate Sacramento County Residents about Project Drawdown and recommend Sacramento County Residents watch the you tube video Kiss the Ground. <https://www.youtube.com/watch?v=39akrHEIDBM> The Sacramento County Climate Action Plan should include nuclear winter after nuclear war as a cause of climate change. Alan Robock; Ph.D. in Meteorology, MIT; Professor II, Rutgers University, New Brunswick, NJ; Lead Author, upcoming Intergovernmental Panel on Climate Change Fifth Assessment Report; Editor, Reviews of Geophysics; Fellow, American Geophysical Union, American Meteorological Society, American Association for the Advancement of Science.

<http://people.envsci.rutgers.edu/robock/> has a you tube video <https://www.youtube.com/watch?v=qsrEk1oZ-54> describing how a nuclear war (like between India and Pakistan) with just 100 nuclear weapons would be enough to cause 1 degree C of global cooling and threaten the lives of 1 billion people with crop failures from global cooling. The Sacramento County Climate Action Plan should inspire residents to write their representatives, asking them to negotiate taking nuclear weapons off of hair trigger alert, and asking them to negotiate the end of all nuclear weapons. Please give Sacramento County Residents a Climate Action Plan that can help them address the climate challenges of the future, Sincerely, Bruce Burdick, M.D.

Bruce Burdick

brucenburdick@icloud.com

5104 Keane Drive

Carmichael, California 95608

Taylor. Todd

From: Cynthia Shallit <info@email.actionnetwork.org>
Sent: Sunday, April 11, 2021 1:50 PM
To: PER. climateactionplan
Subject: Climate Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Public Comment,

Can you strengthen the CAP to put more emphasis on infill housing. This is being done within the City limits of Sacramento, but NOT ANY WHERE ELSE. That is not fair. The rest of the County should have infill housing (and more homeless housing)

The County's general plan supports both infill and outlying ("sprawl") development, but the County's actual growth strategy is overwhelmingly sprawl. Sprawl development is the major driver of passenger VMT -- the County's biggest source of GHG. Moreover, the County has approved housing plans and planning for sprawl far exceeding projected market demand, likely worsening impacts. The CAP does not present initiatives that would directly prioritize infill over sprawl development.

. What's needed: Policy measures actually prioritizing infill before sprawl development.

Cynthia Shallit
cynthiashallit@gmail.com
1423 8th Avenue
Sacramento, California 95818

Taylor. Todd

Subject: Feedback on County CAP - SacTree

From: Rachel Patten <Rachelp@sactree.com>

Sent: Monday, April 12, 2021 10:27 AM

To: Smith. Todd <smithtodd@saccounty.net>; PER. climateactionplan <climateactionplan@saccounty.net>

Subject: Feedback on County CAP - SacTree

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Hello Todd,

We are excited about the content and direction of the County's Climate Action Plan and enjoyed reviewing the draft document. We had a few comments and questions regarding the urban forestry elements.

- Section 2.1
 - Where are the carbon numbers coming from for urban forestry? This projection seems low to us.
 - Does it account for current trees?
- Measure GHG-02
 - Our program is spelled as NeighborWoods
 - We discussed parking lot conversions and street tree corridors. Is this something that could be called out directly?
- Measure GHG-06
 - Could encouraging residents to utilize the Sacramento Shade program for building cooling through strategic tree planting be added to this section?
- Measure TEMP-02
 - Sacramento Shade rather than Shade Tree program
 - Spelled as NeighborWoods
- Measure TEMP-08
 - Suggest that the rebate program address both PV and parking lot retrofits to plant and irrigate trees (rather than just identify incentives for parking lot trees)
 - Do not recommend allowing PV carports to fulfill all parking lot shade requirements
- Measure FIRE-03
 - <https://www.readyforwildfire.org/prepare-for-wildfire/get-ready/fire-resistant-landscaping/>
Recommend adding consult with CAL FIRE

We look forward to continuing to partner together.

Thank you,



Rachel Patten

NeighborWoods Program Manager

Sacramento Tree Foundation

Mobile: 916-417-7139 | Office: 916-974-4323

Pronouns: she/her

An equitable urban forest ensures that all of our neighborhoods experience the positive health, climate, and community benefits of trees. [Please make a gift to our 2021 Tree Heroes fund-a-need](#) to support our work in under-canopied communities and grow livable and lovable neighborhoods for everyone.

Taylor. Todd

From: PER. climateactionplan
Subject: County Climate -Action Plan

From: Kathleen Green <kd2010green@gmail.com>
Sent: Monday, April 12, 2021 12:32 PM
To: Slothower. Laurie <SlothowerL@saccounty.net>
Subject: County Climate -Action Plan

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

It may be past the date to submit comments for the Climate-Action Plan but one of the major polluters is landscaping equipment! The exhaust fumes are so bad after they have been in the area it is worse than a car or truck. If studies were done they are far worse. They are NOISE pollutions too. Plus the destruction to top soil.

PLEASE **ADD A DATE** REQUIRING ALL GAS OPERATED MAINTENANCE EQUIPMENT BE CONVERTED TO BATTERY OPERATED

The States Parks Department is working on converting their equipment.

Thank You
Kathleen Green
kd2010green@gmail.com
916-442-1117

Taylor. Todd

From: Chris Holm <cholm@walksacramento.org>
Sent: Wednesday, April 14, 2021 2:09 PM
To: PER. climateactionplan
Subject: Comments on Draft CAP
Attachments: Sac County Draft CAP WALKSac 20210414 Letter.pdf

EXTERNAL EMAIL: If unknown sender, **do not** click links/attachments.

Attached is a short letter on the draft Climate Action Plan. Thank you reviewing these late-arriving comments.

Chris Holm, Project Manager
[WALKSacramento](#)
909 12th Street, Suite 203
Sacramento, CA 95814

We're working remotely, but you can leave voice messages at (916) 446-9255



4/14/2021

VIA EMAIL

Todd Smith
Sacramento County Planning and Environmental Review
827 7th Street, Second Floor
Sacramento, CA 95814

RE: Sacramento County Draft Climate Action Plan

Mr. Smith:

Thank you for the opportunity to comment on the March 2021 draft Climate Action Plan.

Measure GHG-02: Urban Forestry In addition to the climate benefits, trees are very important to the physical and mental health of people, and they moderate local temperatures which makes travelling by active transportation more pleasant. We are pleased to see that EJ communities will be prioritized for planting trees, as those communities are deficient in tree canopy and residents suffer the greatest health problems associated with a lack of trees. We are also pleased to see that proper maintenance of trees planted through the Zoning Code will be ensured. We recommend revising the last sentence of the implementation as follows: Forge partnerships with community cooperatives to organize tree-planting, ~~and~~ maintenance events, and education on the benefits of trees and the proper care and pruning of trees.

Measure GHG-15: Improved Pedestrian Network and Facilities Revise the second bullet as follows: Develop a methodology for prioritizing future pedestrian improvements ~~which could be~~ based on safety, projected pedestrian demand, and deficiency.

Measure GHG-20: Safe Routes to School Revise the last sentence of the implementation as follows: Additionally, the County will include analysis of safe routes to school within the Active Transportation Plan update and future General Plan Transportation Plan updates, and it will factor the analysis in to the prioritization of improvements in those Plans.

Measure GHG-23: Incentivize Infill Development The proposed infill fee to be applied to development that increases VMT and green house gas emissions will provide some funding to facilitate infill development, but the measure doesn't include any implementation actions that would incentivize infill development. Are there actions developed within the County's infill development program that could be implemented and enhanced as part of Measure GHG-23?

GOV-EC-01: Employee Transportation Program The County is the 4th largest employer in Sacramento County and it should take a demonstrative lead in transportation planning for employees by: conducting an employee commute survey rather than using the 2010 survey; adopting Transportation System Management Plans as described by the Zoning Code at a county-wide level and for large individual sites with 500 or more employees as part of the proposed County Employee Transportation Demand Management Program; and including local bike-to-workdays, months, and events in addition to regional and national. Waiving parking fees for employees driving EVs to county facilities may have emission reduction benefits, but it may have little impact on the measure's goal of reducing VMT.

Gov-EC-05: Carpool-at-Work Incentives In addition to incentives, the County should provide a tool for the employees to use scheduling shared travel.

Measure TEMP-08: Increase Parking Lot Shading, Landscaping, and Urban Greening, Prioritizing Communities with Less Tree Cover Add components of the rejected *Reduce Urban Heat Island Effects* measure, including: Amend the Zoning Code to include a more robust shade requirement; Conduct parking lot shade enforcement through site inspection to ensure that 50 percent shading is achieved by 15 years (Zoning Code section 5.2.4.C); and Work with business owners and residents to monitor and ensure landscaping and shading objectives are being met.

WALKS Sacramento is working to support increased physical activity such as walking and bicycling in local neighborhoods as well as helping to create community environments that support walking and bicycling. The benefits include improved public health and physical fitness, better air quality, a stronger sense of cohesion and safety in neighborhoods, and more sustainable communities and local economies.

Sincerely,

Chris Holm
Project Manager



909 12th Street, Room 202
Sacramento, CA 95814
sacramentosierraclub@gmail.com

June 22, 2021

Todd Smith, Principal Planner
John Lundgren, Senior Planner
County of Sacramento
Department of Community Development,
Planning, and Environmental Review
827 7th Street, Room 225
Sacramento, CA 95814

County Board of Supervisors, Chair Frost, Vice-Chair Nottoli, Serna, Kennedy, & Desmond
700 H Street, Sacramento 95814

Sent via email: smithtodd@saccounty.net, lundgrenj@saccounty.net, SupervisorFrost@saccounty.net,
nottolid@saccounty.net, SupervisorSerna@Saccounty.net, SupervisorKennedy@saccounty.net,
richdesmond@saccounty.net

RE: Sacramento County Climate Action Plan (CAP)

Dear Staff and Supervisors,

I am writing in follow up to the discussion that took place during in the most recent stakeholder group meeting with County and Ascent staff during which we received some feedback regarding submitted comments re: the Public Draft of the CAP.

The Sacramento Group of the Sierra Club has expressed ongoing concerns regarding land use and conservation, and the importance of addressing the negative climate change effects that will result if there is insufficient support for existing goals in the County General Plan to reduce greenhouse gas emissions and improve carbon sequestration.

Our previously submitted letter, dated April 9, 2021, detailed how the County could accomplish meeting the goals of its Climate Emergency Plan and achieve more carbon reductions through CAP measures that support the goals of the General Plan. We have concluded that the following measures, some of which have been submitted previously, should be included in the CAP:

- 1) The CAP should include, for the area between the USB and the County border and greenfield within the UPA, calculations of a) the existing carbon sequestration capacity of those lands and b) if this area were developed, the resulting increase in GHG/VMT with the proposed density of development. This would enable an assessment of the actual deficits in carbon reduction that will occur if development is allowed to proceed.

- 2) Any new development into existing greenfield areas must demonstrate that the project will be carbon neutral.
- 3) Any changes to the existing General Plan should not be considered until a CAP is able to demonstrate that the goals of the recently adopted Climate Emergency Plan can be met and sustained.
- 4) The CAP should list and describe the financial incentives for infill the County intends to provide.
- 5) The CAP should list and describe the economic benefits to the County of reducing emissions.
- 6) The CAP should require development to meet the goals that the General Plan has set for environmental sustainability and equity, with acceptable risk assessment profiles for investment.
- 7) All carbon offsets must be done locally, within the County of Sacramento. All mitigation for the loss of carbon sequestering land and forests must be done within the county.
- 8) The CAP should specify how new and retrofit development projects can take advantage of the SMUD incentive plans to electrify all new homes and commercial development. Please see the City of Sacramento Electrification Ordinance, passed on June 1, 2021 linked here: https://www.cityofsacramento.org/Community-Development/Planning/Major-Projects/General-Plan/About-The-Project/Climate_Change/Electrification-Ordinance . The City of Davis Ordinance incentivizing electrification of new construction ordinance is attached.
- 9) Substantial evidence of support for measures to be undertaken to meet the stated goals, and compliance with CEQA standards must be demonstrated.

Thank you for your consideration of these additional comments.

Sincerely,



Barbara Leary, Chair, Sierra Club – Sacramento Group

Attachments:

- 1) ORDINANCE OF THE CITY COUNCIL OF THE CITY OF DAVIS AMENDING SECTION 8.01.0 92 OF THE DAVIS MUNICIPAL CODE TO ADOPT NEW ENERGY EFFICIENCY STANDARDS FOR NEW SINGLE FAMILY AND LOW-RISE MULTIFAMILY DWELLINGS
- 2) Title 24, Parts 6 and 11 Local Energy Efficiency Ordinances 2019
- 3) Cost - effective ness Study: Low - Rise Residential New Construction
- 4) City of Sacramento Electrification Ordinance, passed 6/2/2021, https://www.cityofsacramento.org/Community-Development/Planning/Major-Projects/General-Plan/About-The-Project/Climate_Change/Electrification-Ordinance

APPENDIX E – GHG EMISSIONS INVENTORY, FORECAST AND REDUCTION MEASURE QUANTIFICATION

This appendix describes the GHG emissions inventories, target setting, and assumptions used for GHG reduction measure quantification for the CAP.

E.1 COMMUNITY AND GOVERNMENT OPERATIONS GHG INVENTORIES

An emissions inventory provides a snapshot of the major sources of emissions in a single year, while also providing a baseline from which emission trends are projected. The inventory and forecasts are used to develop reduction targets consistent with State mandates that inform the GHG reduction strategies and measures. Inventories can also be updated periodically to track progress on GHG reductions compared to baselines.

In anticipation of preparing a CAP, the County updated its GHG emissions inventories for community and government operations (also described as “internal” operations). The details of this document were published to the County’s website¹ and served as the baseline for the CAP. A baseline year of 2015 was selected, based on the data available at the time of preparation. The baseline inventories provide detailed accounting of the sources and quantities of GHG emissions generated from activities occurring in the unincorporated County.

The 2015 community GHG emissions inventory is summarized below in Table E-1 and shown in Figure E-1. The total 2015 emissions from all sectors in the unincorporated County inventory were 4,853,647 MTCO_{2e}.

Table E-1 Sacramento County Community GHG Emissions Inventory - 2015

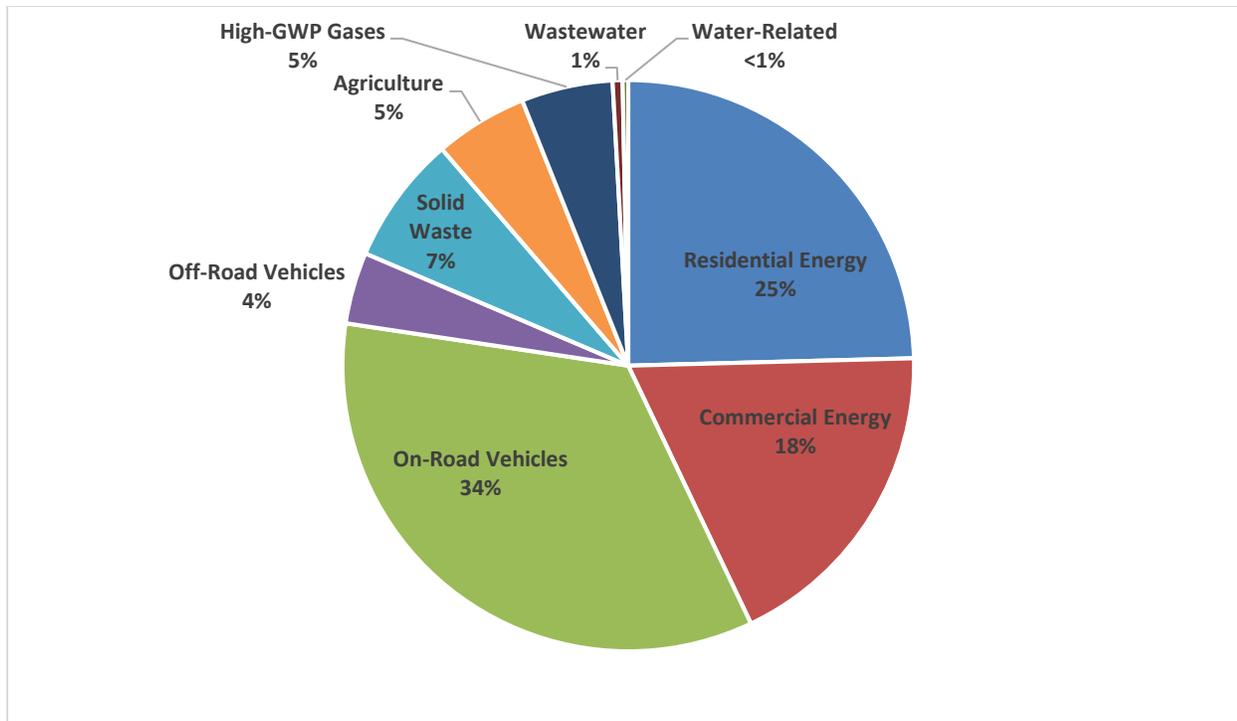
Sector	2015 GHG Emissions (MTCO _{2e} /year)
Residential Energy	1,193,311
Commercial Energy	890,603
On-Road Vehicles	1,671,596
Off-Road Vehicles	196,769
Solid Waste	352,909
Agriculture	254,899
High-GWP Gases	251,085
Wastewater	27,253
Water-Related	15,222
Total	4,853,647

MTCO_{2e} = metric tons of carbon dioxide equivalents, GHG = greenhouse gas, GWP = global warming potential.

Source: Ascent Environmental 2021.

¹ https://planning.saccounty.net/PlansandProjects/In-Progress/Documents/Climate%20Action%20Plan/2015%20Greenhouse%20Gas%20Emissions%20Inventory%20and%20Forecasts_Rev.pdf

Figure E-1 Sacramento County Community GHG Emissions - 2015



Source: Ascent Environmental 2021.

The 2015 government operations GHG emissions inventory is summarized below in Table E-2 and shown in Figure E-2. The total 2015 emissions from all sectors in the County’s operations were 123,397 MTCO₂e.

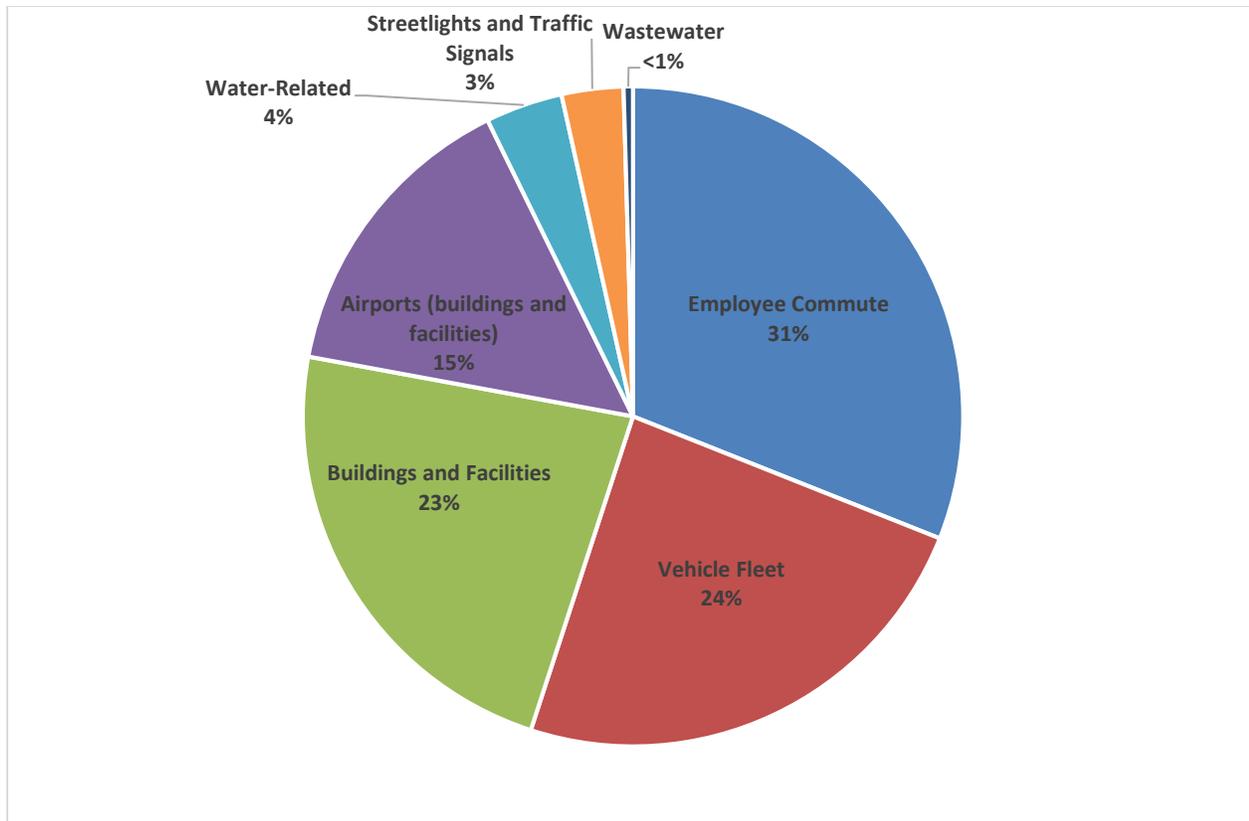
Table E-2 Sacramento County Government Operations GHG Emissions Inventory - 2015

Sector	2015 GHG Emissions (MTCO ₂ e/year)
Employee Commute	38,290
Vehicle Fleet	29,591
Buildings and Facilities	28,247
Airports (buildings and facilities)	18,310
Water-Related	4,665
Streetlights and Traffic Signals	3,729
Wastewater	565
Total	123,397

Notes: Total may not add due to rounding. MTCO₂e = metric tons of carbon dioxide equivalents, GHG = greenhouse gas.

Source: Ascent Environmental 2021.

Figure E-2 Sacramento County Government Operations GHG Emissions Inventory - 2015



Source: Ascent Environmental 2021

E.2 FORECASTS

GHG emissions forecasts provide an estimate of future GHG levels based on a continuation of current trends in activity, population and job growth, and relevant regulatory actions by federal, state, and regional agencies that have been adopted. Emissions forecasts provide insight into the scale of local reductions needed to achieve GHG emission reduction targets. Emissions forecasts were prepared through 2030 for both the 2015 community and government operations emissions inventories. This forecast year was selected because it is consistent with the horizon year of the Sacramento County General Plan and the State’s GHG reduction target year established by State law under Senate Bill (SB) 32. The forecast accounts for a variety of approved federal, State, region, and local policies that will further reduce business-as-usual (BAU) emissions from the County, as shown in Table 2 of the CAP.

A comparison of the 2015 community baseline GHG emissions and the 2030 forecast is shown in Table E-3. A comparison of the 2015 government operations baseline GHG emissions and the 2030 forecast is shown in Table E-4. Based on the projections, community GHG emissions would be 16 percent below 2015 levels by 2030 and government operations emissions would be 12 percent below 2015 levels by 2030.

Table E-3 Comparison of Community GHG Emissions Inventory Baseline and Forecast

Sector	2015 Baseline	2030 Forecast
Residential Energy	1,193,311	500,099
Commercial Energy	890,603	244,903
On-Road Vehicles	1,671,596	1,468,071
Off-Road Vehicles	196,769	253,857
Solid Waste	352,909	280,694
Agriculture	254,899	193,373
High-GWP Gases	251,085	245,175
Wastewater	27,253	17,139
Water-Related	15,222	0
Total	4,853,647	3,202,311
Percent change from 2015 (%)	-	-16%

Notes: Total may not add due to rounding. BAU = business-as-usual, MTCO_{2e} = metric tons of carbon dioxide equivalents, GHG = greenhouse gas, GWP = global warming potential.

Source: Ascent Environmental 2021.

Table E-4 Comparison of Government Operations GHG Emissions Inventory Baseline and Forecast

Sector	2015 Baseline	2030 Forecast
Employee Commute	38,290	31,818
Vehicle Fleet	29,591	30,808
Buildings and Facilities	28,247	23,736
Airports (buildings and facilities)	18,310	15,920
Water-Related	4,665	3,498
Streetlights and Traffic Signals	3,729	2,796
Wastewater	565	597
Total	123,397	109,172
Percent change from 2015 (%)	-	-12%

Notes: Total may not add due to rounding. BAU = business-as-usual, MTCO_{2e} = metric tons of carbon dioxide equivalents, GHG = greenhouse gas.

Source: Ascent Environmental 2021.

E.3 GHG REDUCTION TARGETS

As directed in in the SB 32 legislation, described in Appendix A, the State aims to reduce annual GHG emissions to 40 percent below 1990 levels by 2030. The County aims to, at a minimum, reduce its emissions in proportion to the State’s goals. Establishing a GHG reduction target is also a requirement for creating a plan for the reduction of greenhouse gases eligible for CEQA streamlining under CEQA Guidelines 15183.5(c).

E.3.1 Community Target

A proportional per capita target for the CAP was developed that would be achieved in 2030 consistent with the State’s goal. This is in alignment with the State’s recommended per capita target of 6 MTCO_{2e} by 2030, adopted by the California Air Resources Board (CARB) in California’s 2017 Scoping Plan (CARB 2017). For the purposes of target setting for the County, three non-applicable sectors were removed from the per capita target calculation. Forestry-related emissions from timber-harvesting in the Natural and Working Lands Sector were removed because this activity does not occur in the County. Large industrial and cap-and-trade sectors were removed because these activities are regulated by the State under CARB’s cap-and-trade program. Applying the 2017 Scoping Plan’s per capita target specifically to the sectors included in County’s GHG emissions inventory results in emissions target of 4.8 MTCO_{2e} per capita by 2030, or 3,205,398 MTCO_{2e}, as shown in Table E-5. Comparing this figure to the community 2030 forecast of 3,202,311 MTCO_{2e}, shows that the County’s forecast emissions are 3,088 MT CO_{2e} under the target. This means the County is on track to have GHG emissions lower than a target aligned with the 2017 Scoping Plan, without the addition of GHG mitigating strategies and measures contained in a CAP.

Table E-5 Sacramento County Community GHG Emissions, State Reduction Target

Source	2015	2030
Baseline Emissions and Legislative-Adjusted BAU Forecast (MTCO _{2e})	4,817,567	3,202,311
Population	576,007	668,726
Adjusted State Target Per Capita Emissions (MTCO _{2e} / per person)	N/A	4.8
Per Capita Annual Emissions aligned with State Target (MTCO _{2e})	N/A	3,205,398
Per Capita GHG Emissions with Legislative Reductions (MTCO _{2e} / per person)	N/A	4.8
Reduction needed to meet Target (MTCO _{2e})	N/A	-3,088

Notes: MTCO_{2e} = metric tons of carbon dioxide equivalent; N/A = not applicable; BAU = Business-As-Usual; GHG = greenhouse gases.

Source: Ascent Environmental 2021.

E.3.2 Government Operations Target

Because the County’s 1990 emissions levels for internal operations were not estimated, a proportional target for the CAP was developed to compare with the estimated 2015 emissions inventory. To determine the reduction needed from 2015 emissions levels that would be equivalent to the State’s targeted reduction from 1990 levels, the State’s GHG inventories for 1990 and 2015 were compared. According to the inventories from CARB, the State emitted approximately 431 million MTCO_{2e} in 1990 and 440 million MTCO_{2e} in 2015, an increase of 2 percent over 1990 levels. Consequently, to reach 40 percent below 1990 levels, 2015 levels would have to be reduced by 40 percent. Thus, the County’s 2030 government operations GHG emissions target is 73,348 MTCO_{2e}, as shown in Table E-6. The County would need to reduce annual emissions by 35,824 MTCO_{2e} in 2030, beyond the reductions provided by external policies at the federal, state, regional, and local levels. This gap in GHG reductions needed is shown in Figure E-3 below.

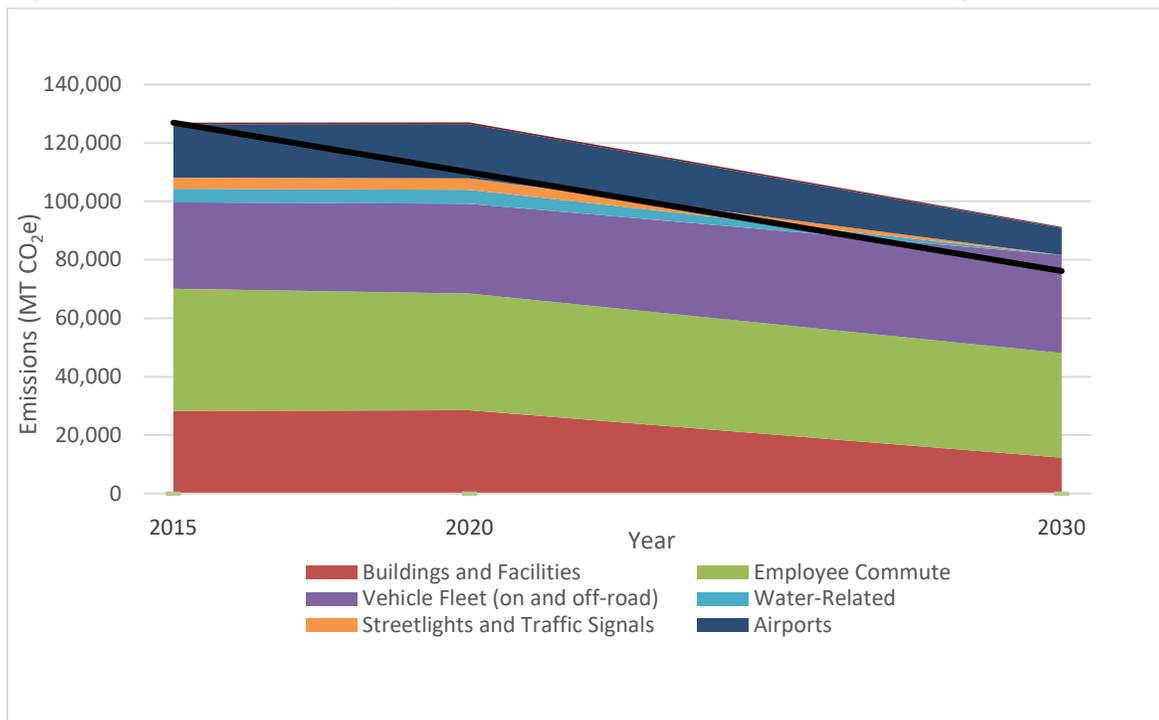
Table E-6 Sacramento County Government Operations GHG Emissions Reduction Targets

Source	2015	2030
Baseline Emissions and Legislative-Adjusted BAU Forecast (MTCO ₂ e)	122,247	109,172
Target Percent Reduction below Baseline (%)	N/A	40
Target Annual Emissions (MTCO ₂ e)	N/A	73,348
Reduction needed to meet Target (MTCO ₂ e)	N/A	35,824

Notes: MTCO₂e = metric tons of carbon dioxide equivalent; N/A = not applicable; BAU = Business-As-Usual; GHG = greenhouse gases.

Source: Ascent Environmental 2021.

Figure E-3 Government Operations GHG Forecast and Reduction Target



Source: Ascent Environmental 2021

E.4 QUANTIFIED GHG REDUCTION MEASURES

The quantified GHG reduction measures in Section 2 of the CAP will allow the County to make progress toward closing an emissions gap for government operations and advance toward community carbon neutrality goals described in the County’s Climate Emergency Resolution. While the County is on track to meet 2030 community targets aligned with the 2017 Scoping Plan without additional action, the quantified measures will additionally serve as a backstop address to address uncertainty in the GHG reduction benefits of external policies.

SMUD’s recently adopted 2030 Zero Carbon Policy serves as an example of how the County’s GHG measures will address uncertainty. SMUD is the first public utility in California to adopt an aggressive plan to eliminate GHG emissions associated with electricity generation by 2030. While the County has full confidence in SMUD’s ability to meet their goals, contingencies have been considered in the development of the County’s GHG reduction strategy that would respond to alternative outcomes.

For example, using building electricity data provided by SMUD the County estimated that SMUD’s plan to transition to a zero-carbon electricity source would result in additional GHG reductions of 852,975 MT CO₂e in 2030. With the County’s target exceeding GHG reduction measures totaling 772,095 MT CO₂e, the SMUD Zero Carbon Policy could severely underperform and deliver only a portion of the estimated reductions assumed for the County’s GHG inventory forecast, but the County could stay on track to meet an emissions target of 4.8 MT CO₂e per capita in 2030 by implementing all quantified GHG reduction measures in the CAP. While this scenario is unlikely, it has nonetheless been considered in the development of the CAP, and external policy performance would continue to be evaluated as part of the Implementation and Monitoring protocols described in Section 4 of the CAP.

E.4.1 Modeling Assumptions for Quantified Community GHG Reduction Measures

Table E-6 Modeling Assumptions for Quantified Community GHG Reduction Measures

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
GHG-01	Carbon Farming	Agriculture	377,692	<p>GHG emissions reductions are calculated using per-acre carbon sequestration rates for several conservation practice standards from the USDA’s Natural Resource Conservation Service’s COMET-Planner Tool. This is applied to 622,858 acres of cropland in 2030, projected from a 2009 baseline with a 1% decline per decade.</p> <p><u>Conservation Measure</u></p> <p>Carbon Sequestration Rate per COMET-Planner¹/ (MT CO₂e/acre-year) / Participation Rates (%) / Acres / MT CO₂e Reduced</p> <p><u>Decrease Fallow Frequency or Add Perennial Crops to Rotation</u></p> <p>0.26 / 50 / 65,632 / 17,064</p> <p><u>Intensive Till to No Till or Strip Till on Irrigated Cropland</u></p> <p>0.49 / 30 / 4,557 / 2,233</p> <p><u>Intensive Till to Reduced Till on Irrigated Cropland</u></p> <p>0.059 / 70 / 10,634 / 627</p> <p><u>Compost (C/N < or = 11) Application to Annual Crops</u></p> <p>2.135 / 50 / 65,631 / 140,123</p> <p><u>Compost (C/N > 11) Application to Annual Crops</u></p> <p>4.55 / 30 / 39,379 / 179,174</p> <p><u>Grazing Management to Improve Irrigated Pasture Condition</u></p> <p>0.188 / 50 / 8,275 / 1,556</p> <p><u>Compost (C/N > 11) Application to Grazed, Irrigated Pasture</u></p> <p>4.461 / 50 / 8,275 / 36,914</p>

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
GHG-02	Urban Forestry	Agriculture	1,681	<p>GHG emissions reductions are calculated using the anticipated addition of trees associated with new construction based on historic trends, which is converted into carbon dioxide (CO₂) reductions using default carbon sequestration rates for trees in the California Emissions Estimator Model (CalEEMod).</p> <p>Total trees planted 2017: 9911 Total New Houses 2017: 5356 New trees per house: 1.850448 Forecasted new single-family houses by 2030: 25,669 Forecast number of new trees 2030: 47,498 Default Annual CO₂ accumulation per tree for Miscellaneous Trees (MT CO₂e/tree/year) (From Appendix A of CalEEMod v2016.3.1): 0.0354</p>
GHG-04	Increase Energy Efficiency and Electrification of Existing Commercial/ Non-Residential Buildings and Facilities	Energy - Commercial	16,006	<p>GHG emissions reductions are calculated from reductions in natural gas use associated with the conversion of water and space heating to electric heat pump technologies. The modeling assumes a 10 percent participation rate in retrofitting programs and targeted outreach to encourage commercial businesses to reduce natural gas use.</p> <p>Square feet per employee: 500, using average of 100,000 sq ft per 200 employees per Sac County development standards Estimated square feet nonresidential existing buildings, 2030: 73,868,938 Therms per sq ft: 0.41 Carbon emissions factor: 0.00676 MT CO₂e per therm Target participation in outreach program: 10% Percent savings per sq ft from aggressive outreach: .01 per sq ft. Energy Efficiency Natural Gas Savings (therms) 0.004 per sq ft. Total natural gas savings (therms) 28,073 Decarbonization Retrofit Program Therms of natural gas consumption avoided through upgrades to heat pump water and space heating, 2030. Therms reduced are categorized by land use type based on existing building stock in unincorporated Sacramento County. Large Office: 547117.85, Small Office: 101302.58, Restaurant: 140280.21, Grocery: 38208.61, Hospital: 480774.07, Hotel: 571127.86, K-12 Schools: 171260.79, College: 186301.55, Retail: 90001.65, Warehouse: 12776.15 Total: 2,339,151 therms</p>
GHG-05	Increase Energy Efficiency and Electrification	Energy - Commercial	3,177	<p>GHG emissions reductions calculated based on targets of 230,000 therms of forecast natural gas consumption to be avoided by 2026, and 470,000 therms to be avoided by 2030. New natural gas (therms) 4,697,801</p>

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
	of New Commercial/ Non-Residential Buildings and Facilities			Natural gas savings (therms): 469,780 Carbon emissions factor: 0.00676 MT CO ₂ e per therm
GHG-06	Energy Efficiency and Electrification of Existing Residential Buildings	Energy - Residential	177,187	<p>Natural gas consumption (therms) in existing buildings 67,905,458 Number of DU 183,674 therms/DU 379 370 Target DU participation in outreach program 15% Target DU participation in monitoring program -15% Percent savings per DU from aggressive outreach - 1% Percent savings per DU from in-home monitoring -4% Energy Savings per DU Outreach - Natural Gas (therms) 3.70 Monitoring - Natural Gas (therms) 14.79 Outreach - Total natural gas savings (therms) 101,858 Monitoring - Total natural gas savings (therms) 407,433 Total natural gas savings (therms) 509,291 GHG Reductions from natural gas savings (MTCO₂e) 3,443.67</p> <p><u>Single Family</u> Electrification of Existing Residential 2030 Percent Electrification of Existing Buildings -30% Existing Single Family Houses (Dwelling Units) 154,377 Existing Multifamily Houses (Dwelling Units) 29,297 Single Family Housing Energy Savings (Annual Therms Avoided) Heat Pump Water Heater (189) Heat Pump Space Heater (305) Electric Oven and Induction Cooktop (24) Total Heat Pump Water Heater Savings (8,753,148) Total Heat Pump Space Heater Savings (14,125,450) Total Electric Oven and Induction Cooktop Savings (1,111,511) Total (23,990,108) GHG Emissions Reduced from natural gas avoidance Single Family GHG emissions reduced by 2030 162,214 MTCO₂e</p> <p><u>Multi-Family</u> Total Heat Pump Water Heater Savings (870,136)</p>

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
				Total Heat Pump Space Heater Savings (685,561) Total Electric Oven and Induction Cooktop Savings (149,417) Total (1,705,114) GHG Emissions 11,529 MT CO ₂ e
GHG-07	Eliminate Fossil Fuel Consumption in New Residential Buildings	Energy - Residential	66,964	GHG emissions reductions are determined by calculating the avoided GHG emissions associated with forecast natural gas consumption in newly constructed buildings in 2030. Single Family Housing 2030 Annual therms demand per dwelling based off a CEC prototype, single-family home modeled for compliance with 2019 Title 24 building energy efficiency code using CBECC-Res: 380.5 New Sac County dwelling units forecast: 23,210 Total therms reduction: 8,831,557 GHG Reductions from All Electric Single Family (MT e) 59,716.34 Multifamily Housing 2030 Annual therms demand per dwelling unit Annual therms demand per dwelling based off a CEC prototype, 8-unit dwelling modeled for compliance with 2019 Title 24 building energy efficiency code using CBECC-Res: 146.23 New Sac County multi-family dwelling units 2030 7,330 Total therms reduction 1,071,862 GHG Reductions from All Electric Multifamily (MT e) 7,248
GHG-08	Tier 4 Final Construction Equipment	Vehicles - Off-Road	6,370	Off-road Construction and Mining Emissions 127,399 MTe Percent of equipment that are Tier 4 Final 100% Average percent improvement in fuel efficiency with Tier 4 equipment: 5%
GHG-10	Electric Vehicle Infrastructure Program	Vehicles - On-Road	34,867	Number of New Chargers 2486 Number of Connections per Charge 2 Average Charging hours per Connection per day 2.8 Number of hours of charge per year for all chargers (h/year) 5,081,804 Average Efficiency of EV LDV (kWh/100-mi) 34 Average Efficiency of Gasoline LDV (mpg) 42 GHG Emissions per mi for average gasoline LDV (g/mi) 325 Percent Breakdown of Charger Types Type of EV Charger % Installed / kW / kWh charged amount / Equivalent VMT / MT e Reduced

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
				Level 2 (low) 47% / 3.3 / 7,933,120 / 23,590,815 / 7,657.25 Level 2 (high) 47% /6.6 / 15,866,240/ 47,181,629 / 15,314.51 DC Fast Charging 5% / 45 / 12,323,370 / 36,646,154 / 11,894.84
GHG-11	Reduce Emissions from New Residential and Office/ Business Professional Development Vehicle Miles Traveled	Vehicles - On-Road	22,037	This measure assumes that all new development will demonstrate that project daily VMT per service population is 15 percent less than the forecasted VMT estimates provided by SACOG for the region. The County's protocol could amend the General Plan to add a policy requiring such reductions in VMT or adopt Transportation Analysis Guidelines. By establishing VMT thresholds for new development, the policy works to limit new VMT in the County, while prioritizing low-VMT projects that promote more sustainable transportation modes such as walking, biking, transit, car-sharing, and the use of other innovative/emerging technologies.
GHG-12	Transportation System Management Plan for Non-Residential Projects	Vehicles - On-Road	15,570	This measure assumes that 4.2 percent of commute-related VMT would be reduced through a required TSM Plan (CAPCOA 2010). This reduction in VMT would result in a reduction in GHG emissions due to an increase in alternative modes of transportation. Implementation could be achieved through a plan check or identifying a TSM specialist.
GHG-13	Revise Parking Standards for Non-Residential Projects	Vehicles - On-Road	4,634	This measure assumes that limiting parking supply reduces commute-related VMT by 2.5 percent (CAPCOA 2010). This reduction in VMT would result in a reduction in GHG emissions due to a decrease in single-occupancy vehicle use.
GHG-14	Improved Transit Access	Vehicles - On-Road	1,854	GHG reductions determined by calculating a 0.5% percent reduction to commute passenger VMT for 2030 using the LUT-5 methodology from CAPCOA's Quantifying GHG Mitigation Measures guidance. This assumes a low-range scenario with transit states located within 3 miles of user. Commute VMT is 45% of the total for unincorporated Sacramento County under SACOG's MTP/SCS. GHG emissions factors per VMT derived from EMFAC emissions modeling for passenger vehicles. http://www.aqmd.gov/docs/default-source/ceqa/handbook/capcoa-quantifying-greenhouse-gas-mitigation-measures.pdf
GHG-15	Improved Pedestrian Network and Facilities	Vehicles - On-Road	1,390	GHG reductions determined by calculating a 0.5% percent reduction to commute passenger VMT for 2030 using the SDT-1 methodology from CAPCOA's Quantifying GHG Mitigation Measures guidance ² . Assumes a 75 percent build out of pedestrian plan improvements by 2030. Commute VMT is 45% of the total for unincorporated Sacramento

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
				County under SACOG's MTP/SCS. GHG emissions factors per VMT derived from EMFAC emissions modeling for passenger vehicles.
GHG-16	Traffic Calming Measures	Vehicles - On-Road	927	GHG reductions determined by calculating a 0.25 percent reduction to commute passenger VMT for 2030 due to increased traffic calming improvements pursuant to SDT-5 methodology described in CAPCOA's Quantifying GHG Mitigation Measures guidance. Assumes 25% of streets and 25% of intersections improved. Commute VMT is 45% of the total for unincorporated Sacramento County under SACOG's MTP/SCS. GHG emissions factors per VMT derived from EMFAC emissions modeling for passenger vehicles. http://www.aqmd.gov/docs/default-source/ceqa/handbook/capcoa-quantifying-greenhouse-gas-mitigation-measures.pdf
GHG-17	Improved Bicycle Network and Facilities	Vehicles - On-Road	348	GHG reductions determined by calculating the VMT reductions from commute passengers using the SDT-5 methodology described in CAPCOA's Quantifying GHG Mitigation Measures guidance. This calculation assumes half of CAPCOA's suggested VMT reduction due to rural context. Commute VMT is 45% of the total for unincorporated Sacramento County under SACOG's MTP/SCS. GHG emissions factors per VMT derived from EMFAC emissions modeling passenger vehicles. http://www.aqmd.gov/docs/default-source/ceqa/handbook/capcoa-quantifying-greenhouse-gas-mitigation-measures.pdf
GHG-24	Increase Organic Waste Diversion	Solid Waste	39,186	GHG reductions determined by calculating the avoided methane emissions (CH ₄) associated with the landfilling of organic wastes. Calculations were based on the tonnage of commercial and residential generated waste, forecast from a 2015 baseline and scaled through 2030 using a population growth rate of 1.1 percent per year. CalRecycle Waste Characterization data for 2017 was used to determine the percentage of waste that is specifically organic and converted this into GHG emissions using a conversion factor of .0128 MT CH ₄ per ton. http://www.aqmd.gov/docs/default-source/ceqa/handbook/capcoa-quantifying-greenhouse-gas-mitigation-measures.pdf
GHG-25	Electric Irrigation Pumps	Water	2,205	Data provided by SMAQMD indicates that there were 101 diesel-powered irrigation pumps operating in Sacramento County in 2006. The CAP measure seeks to convert all of these to electric. Modeling assumed that 40 percent of these existing diesel pumps (n=40) could be converted to electric by 2030. GHG reductions were calculated by applying an emissions factor of 10.21 kg per gallon of diesel fuel from the

Measure Number	Measure Name	GHG Emissions Sector	GHG Reductions (MTCO ₂ e/year) in 2030 ¹	Calculation Assumptions
				Climate Registry default values to the estimated fuel consumption associated with these pumps.
Total GHG Reduction from Quantified Measures			772,095	

¹ http://bfuels.nrel.colostate.edu/health/COMET-Planner_Report_Final.pdf

² <http://www.aqmd.gov/docs/default-source/ceqa/handbook/capcoa-quantifying-greenhouse-gas-mitigation-measures.pdf>

E.4.2 Modeling Assumptions for Quantified Government Operations GHG Reduction Measures

GOV-EC-02 TRANSIT SUBSIDY PROGRAM

Transit Subsidy Program	2015	2030
Participation rate	4%	10%
Employee Commute Emissions (MT e)	50,661	43,403
Percent Reduction in employees driving for increased participation in alternative modes	86%	80%
Effect of transit subsidy for part time employees on total employee commute activity	4%	
Total MT e adjusted for increase in participation rates	41,826	33,334
Total MT e with constant participation rate from 2015		35,834
GHG Reductions from GOV-EC-02 (MT e)		2,500

Note: 86% of employees commute by car, remaining 14% broken down by 1% bike/ped, 4% transit, 8% commute (from commute survey results)

GOV-FL-01 FLEET CONVERSION PROGRAM

Fleet Conversion Program	2015	2030
Average Annual VMT per Light Duty Auto vehicle (excluding police and emergency service vehicles)	7,375	
Number of EVs replacing LDA vehicles in the County's fleet	30	628.2
Total VMT of Evs that replaced Gasoline LDA's		4,632,741
EV Fuel Efficiency (kWh/100 miles)	31.0	
EV Emission Factor (g /mile)		-
Emissions from LDA (gasoline) g /mile (based on fleet data)		552.10
Saving per mile from switch from gasoline LDA to EV		552.10
GHG Reductions from Fleet Conversion		2,558
Designated Parking and Charging for EVs and Alternative Vehicles		
		2030
Number of Chargers	30	
Number of Connections per Charge	2	
Average Charging hours per Connection per day	2.8	
Number of hours of charge per year for all chargers (h/year)	61,320	
Average Efficiency of EV LDV (kWh/100-mi) (1)	34	
Average Efficiency of Gasoline LDV (mpg)	42	
GHG Emissions per kWh in Sacramento (MT e/kWh)	0	
GHG Emissions per mi for average gasoline LDV (g /mi)	325	
Emissions reductions per EV mi (kg /mi)	0.965226058	

Percent Breakdown of Charger Types	Type of EV Charger	Charger Power (kW or kWh/h) (2)	Equivalent VMT (mi)	EV emissions (MT e)	Equivalent Gasoline emissions (MT e)	Emissions reductions (MT e)
0%	Level 1	1.4	-	-	0	-
50%	Level 2 (low)	3.3	300,874	-	97.65964	97.66
50%	Level 2 (high)	6.6	601,748	-	195.3193	195.32
0%	DC Fast Charging	45	-	-	0	-
					TOTAL	292.98
GHG Reductions from Fleet Conversion						2,558
GHG Reduction from EV Charging						292.98
Total GHG Reductions for GOV-FL-01						2,851

Source: fueleconomy.gov, EMFAC2014

GOV-FL-02 RENEWABLE CNG FOR ON- AND OFF-ROAD FLEETS

Renewable Compressed Natural Gas for On- and Off-Road Fleet	2015	2030
Volume of LNG replaced with renewable LNG (gallons)		1,000,000
LNG Demand in On-Road Fleet (gallons)		955,094
LNG Demand in Off-Road Fleet (gallons)		16,624
Total LNG Displaced (gallons)		971,718
LNG emissions per gallon (kg /gal) (from the Climate Registry)	4.46	
Renewable LNG emissions per gallon (kg/gal) (assume biogenic)	0	
Emission Savings per gallon of LNG switched to renewable LNG (kg /gal)	4.46	
GHG Reductions from GOV-FL-02 (MT e)		4,333.86

GOV-FL-03 RENEWABLE DIESEL FOR ON- AND OFF-ROAD FLEETS

Renewable Diesel for On- and Off-Road Fleet	2015	2030
Volume of Diesel replaced with renewable Diesel (gallons)		500,000
Diesel Demand in On-Road Fleet (gallons)		204,671
Diesel Demand in Off-Road Fleet (gallons)		282,596
Total Diesel Displaced		487,267
Diesel emissions per gallon (kg /gal) (from the Climate Registry)	10.21	
Renewable Diesel emissions per gallon (kg/gal) (assume biogenic)	0	
Emission Savings per gallon of LNG switched to renewable LNG (kg /gal)	10.21	
GHG Reductions from GOV-FL-03 (MT e)		4,975.00

GOV-BE-01 GREEN BUILDING POLICY

Green Building Policy	2030
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New Buildings	
Electricity consumption from new buildings (MWh)	10,304
Natural gas consumption from new buildings (therms)	235,571
Electricity reduction from CALGreen Tier 1 compliance	10%
Natural gas reduction from CALGreen Tier 1 compliance	10%
Reduced electricity consumption from new buildings (MWh)	1,030
Reduced natural gas consumption from new buildings (therms)	23,557
Existing Buildings	
Reduction policy for all existing municipal buildings	30%
Reduced electricity consumption (MWh)	20,533
Reduced natural gas consumption (therms)	814,630
Total Emissions Reductions	
Emissions reduction from reduced electricity consumption (MT e)	-
Emissions reduction from reduced natural gas consumption (MT e)	5,668
GHG Reductions from GOV-BE-01 (MT e)	5,668

GOV-AR-01 AIRPORT FLEET REPLACEMENT

Airport Fleet Electric Vehicle Replacement	2015	2030
Average annual mileage of transit bus per bus	30,000	30,000
Average emissions of CNG bus (MT e)	48	48
Electricity usage from electric bus (MWh)	64.5	64.5
Emissions factor electric buses (kWh/mile)	2.15	
Emissions from electric buses (MT e)		-
Number of CNG buses replaced by electric		15.00
GHG Reductions from GOV-AR-01 (MT e)		713

Source: GREET Fleet Footprint Calculator

Source: <http://www.nrel.gov/docs/fy16osti/65274.pdf>

Source: <http://ngvamerica.org/pdfs/CNG%20Transit%20Bus%20Survey.pdf>

APPENDIX F – ADDITIONAL OPTIONS CONSIDERED FOR THE CAP

Sacramento County (County) carefully considered a wide variety of potential greenhouse gas (GHG) reduction strategies and measures in the process of developing the Climate Action Plan (CAP). These were evaluated to determine whether they could be feasibly implemented by the County as suggested and would further the goals of the CAP. These include measures identified by the team, as well as suggestions provided by the public.

F.1 STRATEGY OPTIONS

Strategy options described in this section entail changes to the underlying assumptions used to prepare the CAP, such as modified land uses or setting targets for GHG reduction that were not identified as part of the Phase 1 Strategy and Framework document and General Plan EIR mitigation which served as the basis for preparing this Phase 2 CAP. Because the selection of these options may have implications to resource areas beyond GHG emissions and could be incorporated into the CAP at the discretion of the County Board of Supervisors, they have each been screened for impacts to other resources as part of the EIR addendum associated with this CAP.

F.1.1 Infill Development Focus

Under this proposed option the County would pursue a strategy that strongly encourages new growth to occur at sites that are designated as infill. While infill development is already encouraged as part of the County's General Plan (Land Use Strategy II, LU-68, LU-82) and in the CAP (GHG-23), this strategy option would revise the proposed CAP and introduce additional policies intended to promote an increased share of anticipated new development toward underutilized sites within existing urbanized areas of the County. Selection of this option would approve the CAP in its current form along with the following changes and additions.

- ▶ The Infill Development fee described in GHG-23 would be increased from \$1,000 to \$2,500 for each Dwelling Unit Equivalent.
- ▶ The fees collected from the infill program would be used for a competitive grant program specifically for compact, mixed-use affordable housing projects near transit stations, consistent with General Plan Policy LU-44.
- ▶ The Sacramento County Zoning Code would be amended to include a definition for "Infill Development" that is aligned with the goals of General Plan Land Use Strategy II, which should include vacant lots within with UPA.
- ▶ Language would be inserted into CAP Sections 1.1 Climate Action Plan Purpose and Components and 4 Implementation and Monitoring specifying that the CAP should only be used for streamlining future GHG analyses under CEQA Guidelines Section 15183.5 for projects meeting the County's definition of infill.

F.1.2 Communitywide Carbon Neutrality

As described in Section 4 of the CAP, the Climate Emergency Resolution adopted by the BOS commits the County to take several steps to transition to a countywide carbon neutrality footprint by 2030. Under this option, the following sections of the CAP would be amended to include the following changes aimed at supporting a more immediate transition to carbon neutrality by 2030.

Section 1.3 Greenhouse Gas Reduction Targets for 2030

- ▶ Add to this section a target for communitywide carbon neutrality by 2030 that becomes effective upon Board of Supervisors' approval of the Climate Emergency Response Plan (CERP) described in the County's adopted climate emergency resolution.

Section 2 GHG Reduction Strategy

- ▶ Add a measure to the GHG Reduction Strategy that specifies the submittal of the CERP to the Board of Supervisors for consideration no later than January 1, 2023. Specify that the CERP evaluate the feasibility of additional County actions for GHG reduction supplemental to those indicated in Section 2 of the CAP. These actions would be aimed at closing the emissions gap necessary to reduce Countywide emissions to carbon neutrality by 2030. Actions that should be evaluated for feasibility in the CERP would include but not be limited to:
 - Prohibiting issuance of business licenses to companies that provide fuels, equipment, and services that result in the combustion of fossil fuels.
 - Adopting an ordinance that requires all existing residential and non-residential buildings to undergo retrofitting to eliminate natural gas consumption when the property is sold to another party (point-of-sale).
 - Modified versions of the measures described in section F.2 of this appendix that would allow the measures to become feasible for implementation by the County.
 - Implementing toll roads on major County thoroughfares with congestion pricing to reduce GHG emissions from VMT associated with daily commuting.
 - Issue a moratorium on new building permits if Countywide emissions are exceeding 2.0 MTCO_{2e} per capita in 2026. This is based on the projection shown in Table 4.2-1 illustrating a linear drawdown of community GHG emissions from an observed baseline of 8.4 MTCO_{2e} in 2015 to a carbon neutral level of 0 MTCO_{2e} per capita in 2030.

Table F.1 Carbon Neutral GHG Reduction Projection

Year	MT CO _{2e}	County Population	MTCO _{2e} Per Capita
2015	4,817,567	576,007	8.4
2016	4,496,396	582,188	7.7
2017	4,175,225	588,370	7.1
2018	3,854,054	594,551	6.5
2019	3,532,882	600,732	5.9
2020	3,211,711	606,913	5.3
2021	2,890,540	613,095	4.7
2022	2,569,369	619,276	4.1

Year	MT CO ₂ e	County Population	MTCO ₂ e Per Capita
2023	2,248,198	625,457	3.6
2024	1,927,027	631,638	3.1
2025	1,605,856	637,820	2.5
2026	1,284,685	644,001	2.0
2027	963,513	650,182	1.5
2028	642,342	656,363	1.0
2029	321,171	662,545	0.5
2030	0	668,726	—

Source: Ascent Environmental 2021.

Section 4 Implementation and Monitoring Strategy

- ▶ Assign the Climate Emergency Mobilization Task Force to begin immediate work on preparing the Climate Emergency Response Plan under guidance of the CEO and Sustainability Manager.
- ▶ Expand the list of eligible Task Force participants to include professionals with backgrounds in sociology, law, environmental justice, energy, and economics.

F.1.3 Carbon Neutral New Development

Under this strategy option the CAP would be amended to add a new GHG reduction measure that would require future development projects needing an amendment to the Urban Policy Area (UPA) and/or Urban Services Boundary (USB) to demonstrate zero net GHG emissions from project construction and operation. To demonstrate this, a GHG analysis would be required for inclusion in project applications that calculates project GHG emissions during construction and full buildout and reduces these emissions to 0 MT CO₂e through advanced project designs that incorporate energy efficiency, renewable energy generation, clean transportation, carbon sequestration and/or investments in initiatives with validated GHG reduction benefits. The GHG analysis would also calculate the loss of carbon sequestration capacity of the proposed development project area. The combination of these analyses would take into account the loss of carbon sequestration as well as the increase in GHG emissions associated with the development proposals. Under existing General Plan policies, proposed master plans outside of the UPA and USB are already required to submit justification statements (LU-119) and demonstrate compliance with design and performance standards (LU-120) prior to the County considering approval of the project.

A carbon neutral development standard identified in the CAP would become part of these existing requirements. Specifically, LU-120 states “the County shall only consider approval of a proposed UPA expansion and/or Master Plan outside of the existing UPA if the Board finds that the proposed project is planned and will be built in a manner that: meets all of the requirements per PC-1 through PC-10 and meets ONE of two alternative performance metrics: Alternative #1- Criteria-Based or Alternative #2 VMT/GHG Emissions Reduction Metric.” Within these requirements PC-8, contained in the General Plan Land Use Element, specifies that the project must demonstrate “consistency with all applicable County adopted plans not sought to be amended by the proposed project.” A plan consistency check at this stage could include a County-adopted CAP that contains a measure requiring carbon neutrality in new development outside of the UPA established in the General Plan. Such a requirement could be supplemental to the existing Alternative #2 VMT/GHG metric, which addresses GHG emissions exclusively from the transportation sector of project construction and operations. To ensure that applicant-submitted

carbon neutrality plans are proposing GHG reduction strategies with legitimate long-term benefits, the implementation and responsibility details of CAP Measure GHG-30 would specify the involvement of a third-party agency or registry body to assist County staff with reviewing that portion of the application.

F.1.4 Adaptation-Focused CAP

The CAP's GHG forecast shows that the County is already on track to meet the 2020 General Plan target and a 2030 GHG target aligned with California's SB 32 target and the 2017 Climate Change Scoping Plan without further action. The County could pursue a strategy option that focuses on the adaptation measures contained in Section 3 of the CAP. This plan would remain responsive to the climate risks identified in the vulnerability assessment but would not adopt additional GHG reduction measures. Instead, the GHG reduction measures would be reported in an appendix for use if periodic re-inventorying of GHG emissions shows the 2030 target is no longer met and additional reductions are necessary. This would maintain the ability to retain CEQA streamlining.

Community and Municipal GHG reduction strategies currently contained in Section 2 would be moved from the main CAP document and placed into a separate appendix. The Climate Change Adaptation strategy in Section 3 and associated implementation measures in Section 4 would remain in the main CAP document to comprise the County's primary strategy for addressing climate change. GHG reduction plans and programs contained in the appendix could then be considered for implementation on a case-by-case basis, contingent on the availability of staffing and funding. This option would not position the County to achieve the Climate Emergency Resolution's goal of carbon neutrality by 2030. This option would be consistent with the County's adopted General Plan and climate change mitigation described in the GP EIR. The adopted General Plan specifies that the CAP must work toward a 2020 GHG reduction goal but does not mention 2030 as a target year. General Plan Policy LU-115, which was added in response to GP EIR mitigation measure CC-1 states "it is the goal of the County to reduce greenhouse gas emissions to 1990 levels by the year 2020. This shall be achieved through a mix of State and local action". A 2020 target for GHG emissions was further discussed in a first-phase CAP adopted by the County in 2011 in compliance with GP EIR mitigation measure CC-2. The second-phase CAP now under consideration is required by CC-2 to contain information on measures and programs, timelines, economic analyses, and estimated reductions. This information would be included as part of the appendix containing GHG reduction strategy and measure options.

F.2 MEASURE OPTIONS

F.2.1 SMUD Greenergy - Residential

Encourage residential users to enroll in the Greenergy program, by providing a rebate of \$72 to residents to offset the first year of enrollment in the program. To qualify, residents will be required to complete a form and submit one year of utility bills to the County to validate enrollment in the program.

REASONS FOR DISMISSAL

This measure lacks an identified funding source and would require development of a County program to administer the rebate and further develop the requirements and restrictions. This measure is also specific

to a program that SMUD could change or suspend, at their discretion. Further, the Greenergy program will be obsolete by 2030 with SMUD’s carbon neutral targets.

F.2.2 SMUD Greenergy - Commercial

Encourage commercial users to enroll in the Greenergy program or the SMUD Solar Shares Program to obtain 100 percent of their electricity use from renewable energy sources. To encourage this participation the County will support SMUD with marketing this program. Additionally, the county can provide information to SMUD about locations where solar development may be preferred and provide outreach to businesses about opportunities to develop solar on empty lots, parking lots and on building rooftops.

REASONS FOR DISMISSAL

Identification of preferable locations for solar development should occur in conjunction with an update of the Energy Element as was called for in the GP and its EIR in 2011. This measure is also specific to a program that SMUD could change or suspend, at their discretion. Further, the Greenergy program will be obsolete by 2030 with SMUD’s carbon neutral targets.

F.2.3 Require all Electric Construction for Other Building Types

Establish targets for when commercial and high-rise residential buildings should be required to go all electric. This could be tied to CEC cost-effectiveness determinations. A phase-in approach like this, linked to future CEC actions, provides more guidance for public and private actors looking to move development forward under the Plan, and provides enough specificity to determine when an action or ordinance is not in compliance with the Plan.

REASONS FOR DISMISSAL

Cost effectiveness for reach codes for all electric buildings has not been broadly demonstrated for all commercial building types. Precedents for local government ordinances to “ban” natural gas in commercial buildings contain language that allows exemptions based on technological, economic, and political factors.

F.2.4 Electric School Buses

The County will work with regional partners, such as the Board of Education, Sacramento Regional Transit District (RT), SMUD, SACOG, the SMAQMD, and local school districts, to find initial startup and continual operating funding for electric-powered school buses.

REASONS FOR DISMISSAL

The County’s Office of Education is focused on curriculum development and training. School districts have greater discretion regarding electrification of school buses. This measure was dismissed because it was identified as undesirably ambiguous, with unspecified enforcement and schedule.

F.2.5 Park-and-Ride Lots

The County will work with cities, SACOG, and neighboring regions to increase presence of park-and-ride facilities near residential centers, in order to increase ridesharing.

REASONS FOR DISMISSAL

There is a lack of evidence that there is a deficit of parking near transit hubs, which could limit the effectiveness of this measure. Moreover, park-and-ride lots may be in conflict with emerging mobility technology and other CAP policies focused on reducing parking. The measure is also depended on the presence of functional transit near established residential areas.

F.2.6 Improve Bus Infrastructure

Install bus-only lanes and signal prioritization along major thoroughfares, and work with transit agencies and neighboring jurisdictions to plan and install full bus rapid transit infrastructure along priority corridors, as appropriate.

REASONS FOR DISMISSAL

Public bus fleets fall under the jurisdiction of Sacramento Regional Transit, not the County.

F.2.7 Public Transportation for Tourists

Collaborate with the Sacramento Transit Authority, Sacramento Regional Transit District, AMTRAK, and the Federal Railroad Administration to bring tourists to, from and within Sacramento on public transportation.

REASONS FOR DISMISSAL

Connection to GHG reduction cannot be demonstrated. Unclear which County destinations would draw consistent tourism.

F.2.8 Limit Refrigerants in Stationary Air Conditioning With a Global Warming Potential Greater Than 750

Support implementation of the State's regulation regarding refrigerants with global warming potential (GWP) values over 750.

REASONS FOR DISMISSAL

New State regulations approved in December 2020 cover the intent of this measure. This measure was dismissed from further evaluation because it would not result in GHG reductions beyond levels that compliance with State regulation would otherwise achieve.

F.2.9 Drought Tolerant Landscaping

The County will coordinate with water districts to develop County-specific incentives for drought-tolerant landscaping in new and existing residential developments.

REASONS FOR DISMISSAL

This measure unnecessarily incentivizes compliance with established State guidance for drought tolerant landscaping in new developments and extends the incentive to existing development. The County has limited ability to implement and track conversion of landscaping in existing development.

F.2.10 Existing Structure Reuse

The County will encourage the retention of existing structures and promote their adaptive reuse and renovation with green building technologies.

REASONS FOR DISMISSAL

This measure was dismissed because it was identified as undesirably ambiguous, with unspecified priorities for preservation. Further, the measure has limited GHG reduction potential and preservation of these structures is already covered by historic preservation regulations.

F.2.11 Reduce Urban Heat Island Effect

The County will reduce urban heat island effects through the following actions:

- ▶ Encourage solar parking canopies to provide shade in urban areas.
- ▶ Amend the Zoning Code to include a more robust shade requirement.
- ▶ Conduct parking lot shade enforcement through site inspection to ensure that 50 percent shading is achieved by 15 years (Zoning Code section 5.2.4.C).
- ▶ Work with business owners and residents to monitor and ensure landscaping and shading objectives are being met.

REASONS FOR DISMISSAL

This measure was dismissed because it was identified as undesirably ambiguous and duplicative of established County programs, including the zoning code and design review process. Similar actions are already included in CAP Measure TEMP-08.

F.2.12 Expedite, Reduce, and Exempt Permits

The County will expedite the permit process, reduce or waive fees, or exempt permits associated with water conservation installations in existing facilities.

REASONS FOR DISMISSAL

This measure was dismissed because permits are required where an underlying public health or safety concern creates a nexus for County oversight. It would not be appropriate to exempt a permit to incentivize a desired outcome. Additionally, fees are in place to recuperate costs of implementation. A separate program would be necessary to identify and procure funding to offset the cost of fee reductions that would be applied to permits that improve water conservation.

F.2.13 Streamline Permitting for Electrification of Existing Residential and Commercial Buildings

The County shall review its existing permitting processes for residential building owners seeking to replace gas home appliances with electric appliances, as well as capping gas meters and modify as needed to reduce complexity, cost, and processing time for any required permits.

REASONS FOR DISMISSAL

This measure was dismissed because permits are required where an underlying public health or safety concern creates a nexus for County oversight. It would not be appropriate to exempt a permit to incentivize a desired outcome. Additionally, fees are in place to recuperate costs of implementation.

F.2.14 River-Friendly Landscaping

The County will collaborate with watershed organizations, school districts and others to seek funding to construct river-friendly community demonstration gardens throughout the Sacramento County Water Agency (SCWA) service area.

REASONS FOR DISMISSAL

This measure was dismissed because there is not a clear connection to substantial GHG reduction.

F.2.15 Rain Capture

The County will promote the use of rain barrels and rain gardens, which allow for capture of rainwater for reuse in landscaping.

REASONS FOR DISMISSAL

This measure was dismissed because the GHG reductions could not be substantiated. Further, other County departments already have similar programs. The County has already published guidance on this and included this in the municipal code. CAP Measure Water-02 includes similar actions.

F.2.16 Low Impact Development

The County will develop and adopt low impact development (LID) standards, policies, and update codes and ordinances to require LID for new development and redevelopment priority projects to reduce stormwater runoff.

REASONS FOR DISMISSAL

This is a requirement of compliance with the 2018 Stormwater Quality Design Manual. This measure is redundant and would not result in additional GHG reductions.

F.2.17 Water Conservation Regulations

The County will amend Section 5.2.4 of the Zoning Code to comply with the State MWELo to ensure new development increases water conservation, as is stated in General Plan Policy CO-16.

REASONS FOR DISMISSAL

The County operates under, and is required to enforce, the MWELo as it is now part of CALGreen. This measure is redundant and would not result in additional GHG reductions.

F.2.18 Electrification of Existing Buildings

By 2021, the County will develop policies or incentive programs in partnership with utilities, nonprofits, and the private sector, estimated to result in 25 percent of existing residential and small commercial buildings transitioning to all-electric by 2030.

REASONS FOR DISMISSAL

This measure is similar to two measures already included in the CAP. Through ENERGY EFFICIENCY AND ELECTRIFICATION OF EXISTING RESIDENTIAL BUILDINGS, the County will assist local utilities with increasing participation in residential retrofit programs to achieve a reduction in energy consumption, with a 2030 participation goal of 50 percent for energy efficiency upgrades. Through ENERGY EFFICIENCY AND ELECTRIFICATION OF EXISTING COMMERCIAL/NONRESIDENTIAL BUILDINGS the County will develop a program aimed at assisting local utilities with implementing commercial energy efficiency and electrification programs to achieve reductions in energy consumption with the goal of 10 percent of existing businesses participate in energy efficiency upgrades by 2026 and 25 percent by 2030.

F.2.19 Sustainable Land Use Strategy

Support infill growth that is consistent with the regional Sustainable Communities Strategy to ensure: 90 percent of the County's growth is in the established and center/corridor communities and is 90 percent small-lot and attached homes by 2040.

REASONS FOR DISMISSAL

The County is a member of SACOG and is already participating the Sustainable Community Strategy. A CAP measure reinforcing the strategy is unnecessary and would not result in additional GHG reductions.

F.2.20 Encourage Infill Development in Transit Priority Areas, Designated-Green Zones, And in the County's Commercial Corridors

Between now and 2030, the County will focus its limited development resources on infill housing and mixed-use development in designated Commercial Corridors, transit-priority areas, and Green Means Go zones. This development is broadly characterized as three- to ten-story housing and mixed-use structures in transit-served areas.

REASONS FOR DISMISSAL

Not clear what "limiting development resources" entails. County staff reviews development proposals, but the resources (e.g. capital and labor) to develop projects typical comes from private entities. Limitations on types of development could inhibit the County's ability to meet housing needs identified in the 2030 General Plan and 2021-2029 Housing Element. The County has already adopted a resolution identifying Green Zones in support of Green Means Go.

F.2.21 Increase the Number of Residents Near Parks And Open Space

Increase to 65 percent the proportion of residents within half a mile of parks and open space.

REASONS FOR DISMISSAL

This measure was dismissed from further analysis due to concerns with the feasibility of creating new parks and open areas within developed communities.

F.2.22 Measure Jobs Housing Balance

The County will encourage a balance between job type, the workforce, and housing development to reduce the negative impacts of long commutes and provide a range of employment opportunities for all county residents through Policies ED-3 and ED-8 of the General Plan Economic Development Element and associated implementation measures.

REASONS FOR DISMISSAL

This measure would encourage a jobs to housing balance through implementation of existing General Plan policies related to sustainable development patterns and planning for mixed land uses in new growth areas. This measure was dismissed from further consideration due to concerns about necessity and feasibility in light of the State's goal to streamline housing development.

F.2.23 Civic Lab

The County will apply to participate in SACOG's annual Civic Lab to tackle issues affecting land use and transportation.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to concerns about efficacy and the GHG reduction achieved for the investment.

F.2.24 Green Job Training

The County will support the efforts of local colleges, universities, and community-based organizations to provide green job training in disadvantaged communities.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to concerns about efficacy and feasibility. The County cannot, at this time, articulate what supporting green jobs training would entail.

F.2.25 Develop McClellan as a Research, Education, and Job Training Facility

Develop McClellan as a research, education and job training facility for low-income residents to learn skills and accept jobs in regenerative agriculture for home gardens and commercial enterprises, solar development and installation services, hydroponic food production, tree planting for food and carbon sequestration, green construction, staffing and running resiliency hubs for emergency response including extreme heat, flooding, wildfires and poor air quality, food or water scarcity.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to feasibility, cost, and anticipated GHG reductions. In addition, McClellan Park is privately owned.

F.2.26 Renewable Energy Development Center

Partner with universities, community colleges and businesses to become a renewable energy development center that can consult to other communities locally and internationally. Develop expertise in green construction and green chemistry similarly that produce local jobs and bring revenue into Sacramento County for consulting services supplied outside of the County.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to feasibility, cost, and anticipated GHG reduction.

F.2.27 Innovation Center at Mather Airfield

Assess and develop opportunities for Mather Airfield to become an innovative center for solar-powered (and other alternatives to fossil fuel energy generation) aircraft development, production and passenger flights.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to feasibility and cost.

F.2.28 American River Preservation

Stop all development along the American River and preserve or reclaim the natural habitat on each side of the river to a prescribed distance to draw tourists seeking peace and tranquility away from urban congestion, to improve the quality of life in Sacramento and to eliminate carbon release and sequester carbon.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to feasibility and cost. The adopted American River Parkway Plan already exists, and a Natural Resources Management Plan is being developed for the American River Parkway.

F.2.29 South Sacramento Habitat Conservation Plan

The County will implement the SSHCP to preserve 6,351 acres of land that would otherwise be developed for urban uses.

REASONS FOR DISMISSAL

This measure was initially dismissed because it captures the County's existing preservation commitment. Further, the preservation strategy of the SSHCP was intended to maximize the preservation of vernal pool habitat while minimizing edge effects. Following further discussion, this measure was included as Measure GHG-26 in the Final Draft CAP.

F.2.30 Preserve Lands Identified in the SSHCP Voluntary Conservation Targets

Prioritize work to ensure that the blue oak woodland and associated habitats conservation goal in the northeast portion of the SSHCP Plan area laid out in the Appendix J "above and beyond" conservation" targets are realized. This will have the benefit of preserving important GHG sequestration resources while also providing protection for the only large remaining connectivity corridor to join the south and the north county in the eastern portion of the county.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration due to feasibility and cost.

F.2.31 Connected Open Space System

The County will ensure that new development increases connections and removes barriers to open space, and increases green and open spaces including trails, in all new communities, connecting with existing communities through Policies OS-11 and OS-12 of the General Plan Open Space Element and associated implementation measures.

REASONS FOR DISMISSAL

General Plan Policies OS-11 and OS-12 currently require that the County establish trail connections and linkages within the County and across jurisdictional boundaries that are compatible with existing land uses and seek to establish greenbelts to serve as habitat corridors and community separators. This measure would not provide any enhanced potential for the County to enforce these existing requirements and was dismissed from further consideration.

F.2.32 Electrification of Agriculture

Require 100 percent of agricultural equipment to be converted to electric and 100 percent electrification of irrigation pumps by 2030.

REASONS FOR DISMISSAL

This measure was dismissed because it is not feasible for the County to mandate conversion of private equipment.

F.2.33 County Composting Program

Establish a County Composting Program that incorporates the community food waste and green waste which can then provide quality compost for the community and the County's use.

REASONS FOR DISMISSAL

This measure was dismissed because it is similar in intent to MEASURE GHG-02: INCREASE ORGANIC WASTE DIVERSION in the CAP, implementation of which would require the County to increase local capacity for composting and processing of organic wastes.

These GHG reduction strategies and measures would be implemented by Sacramento County to reduce emissions from internal operations.

F.2.34 Produce Energy on County Property

Produce 3 GW of new distributed energy resources on County property in the first three years of the CAP.

REASONS FOR DISMISSAL

Already covered by General Plan Policies PF-76, PF-77, and Measure GOV-BE-02.

F.2.35 Buy Clean Policy

The County will adopt a buy clean policy pursuant to AB 262 for the County to purchase construction materials from manufacturers that have invested in cutting their GHG emissions for all County projects.

REASONS FOR DISMISSAL

This recommendation describes legislation, AB 262, that is applicable State government agencies. Measures GOV-FL-01, GOV-FL-02, GOV-FL-03, GOV-WA-03, and GOV-BE-01 will commit the County to making procurement choices for vehicle fleets and fuels, water equipment and green buildings that result in reduced GHG emissions.

F.2.36 Energy-Efficient Taxiway Lighting

The County will install and maintain LED taxiway lighting and signage during major taxiway renovations and upgrades.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration because it is continuation of existing practice and would not result in substantial GHG reductions.

F.2.37 Solar Power at Sacramento International Airport

The County will continue to procure at least 30 percent of airport electricity demand from renewable energy sources.

REASONS FOR DISMISSAL

This measure was dismissed from further consideration because it is continuation of existing practice and would not result in substantial GHG reductions.

F.2.38 EV Charging at SMF

The County will install EV chargers accessible to visitors at the Sacramento International Airport.

REASONS FOR DISMISSAL

This measure was dismissed because it is not aligned with County Department of Airports planning. This type of charging is expensive to install and requires large quantities of power which may conflict with existing energy reduction goals. Further, it is difficult to identify the most appropriate target number and type of charging spots. Higher numbers of Level 1 charging are better suited for longer dwell times such as those working for a shift, or in long- and short-term parking lots where parking norms are 8 hours or

more. DC Fast EV chargers are currently provided by private entities for a fee. The State Green Building Code requires that 10 percent of the parking spaces in any new construction or alteration be EV ready. Exceeding these requirements would not yield substantial GHG reduction.

F.2.39 Replace Turf with Plants that are Low Water Use

Replace turf with natives and plants that reduce water demands, not just maintaining turf more efficiently.

REASONS FOR DISMISSAL

The County had adopted the California Department of Water Resources' Model Water Efficient Landscape Ordinance (MWELO) which contains standards for drought tolerant vegetation types. The intent of this measure is covered by CAP Measure GOV-WA-02 requires the County to evaluate irrigation practices for existing turf to achieve water savings.

F.2.40 Engage in Research on the Effects of a Warmer Climate on the Agricultural Industry

- ▶ Subsidize research efforts on breeding crops that are resilient to high heat and low-chill winters, shading of crops and installation of light reflectors, and reducing rates of tilling to promote soil health and combat increased temperatures as recommended by the Climate Change Consortium and CalCAN, (California Department of Food and Agriculture [CDFA] 2013; CalCAN 2011).
- ▶ Engage in research on the potential effects of a warmer climate on the agricultural industry as well as the resulting challenges and opportunities with existing organizations and groups including, but not limited to, the California Climate and Agriculture Network (CalCAN). Challenges facing the agricultural industry are loss of chill hours, increased populations of or new species of pests, and higher rates of evapotranspiration. Conversely, a warmer climate could produce opportunities for Sacramento County to grow crops that were previously unsuitable to the historical climate.

REASONS FOR DISMISSAL

This measure was dismissed from further analysis due to concerns related to the County's ability to feasibly implement a measure that requires subsidizing and participating in scientific research.

F.2.41 Map Critical Infrastructure in Previously Burned Areas and in Locations Vulnerable to Wildfires and Upgrade Infrastructure Where Applicable

- ▶ Map locations of communication, energy, public service, and transportation infrastructure in previously burned areas and in areas that are vulnerable to wildfires.
- ▶ In cases where existing communication, energy, public service, and transportation infrastructure are located in previously burned areas, work with providers to allocate resources to repair damaged infrastructure (e.g., replace signage and guardrails, repair roads, reconnect electrical wiring).

-
- ▶ In cases where existing communication, energy, public service, and transportation infrastructure are found to be vulnerable to wildfires, work with providers to bolster and/or upgrade associated infrastructure to be more resilient to wildfire damage (e.g., use of materials that are resistant to high heat levels).

REASONS FOR DISMISSAL

This measure was dismissed from further analysis due to concerns related to the County's ability to feasibly implement a measure that requires upgrade of infrastructure that is not owned or operated by the County.

APPENDIX G – GHG REDUCTION MEASURE COST ANALYSIS

Costs and benefits can be an important consideration for communities to determine the resources needed to implement GHG reduction measures. A qualitative cost-benefit analysis is included for GHG community measures in Table G-1 and for government operations measures in Table G-2. This analysis includes a high-level assessment of the administrative costs for the County to implement the measures, considering staff time and resources needed to create policies and enforce actions associated with the measure. The total staff time and resources needed are estimated and reported using a ranking of low (\$), medium (\$\$) or high (\$\$\$), focusing on measures where information could be obtained. The analysis also describes the costs and/or benefits of these measures to the community based on a review of academic research, white papers, and articles and cites the sources used to obtain this information. Tables G-3 and G-4 provide information on SMUD energy efficiency and decarbonization incentives.

Table G-1 Cost Analysis of Community GHG Reduction Measures

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GHG-01	Carbon Farming	\$\$\$		
GHG-02	Urban Forestry	\$	A 25 foot tree reduces annual heating and cooling costs of a typical residence by 8 to 12 percent, producing on average a \$10 savings per household. A mature tree canopy reduces air temperatures by 5-10° F, influencing the internal temperatures of nearby buildings	https://www.naturewithin.info/Policy/EconBens-FS3.pdf
GHG-03	Urban-Rural Connections	\$		
GHG-04	Energy Efficiency and Electrification of Existing Commercial Buildings	\$\$	Retro-commissioning costs up to \$0.40 per square foot but saves around \$0.27 sq ft from 15% energy savings with a payback period of 0.7 years. Annual non-energy savings, such as extended equipment life and improved air quality are valued at approximately \$0.26 sq ft.	Rules of Thumb Energy Efficiency in Buildings, EPA, 2016 https://www.epa.gov/sites/production/files/2016-03/documents/table_rules_of_thumb.pdf
GHG-05	Increase Energy Efficiency in New Commercial Buildings	\$	Incremental cost increases for bringing a medium size office building 10 percent above the 2016 code were \$51,988. The largest contributor to these costs are upgrades to higher efficiency windows. Study based on IOU utility rates in 2016 showed that CALGreen Tier 1 in Sacramento's Climate Zone 12 were cost effective in the long-term. To support a reach code this study would need to be recreated to consider new 2019 energy codes and SMUD utility rates.	https://efiling.energy.ca.gov/GetDocument.aspx?tn=223015-5 (page 142)

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GHG-06	Energy Efficiency and Electrification of Existing Residential Buildings	\$\$\$	Costs for building efficiency retrofits are highly variable, but SMUD offers a wide range of rebates to offset these costs. See Table G-3	https://www.smud.org/en/Rebates-and-Savings-Tips/Rebates-for-My-Home
GHG-07	Eliminate Fossil Fuel Consumption in New Residential Buildings	\$\$\$	Incremental cost increases for electrifying new residential construction are \$3,081 for single family and \$3,088 per unit for multi-family. Cost savings are achieved by eliminating natural gas connections and bill reductions. These savings offset incremental costs, in the long term and lead to cost effectiveness for single-family electrification, according to a 2018 study in the city of Palo Alto.	https://cityofpaloalto.org/civica/x/filebank/documents/66742
GHG-08	Tier 4 Final Construction Equipment	\$\$\$	Manufacturers have estimated the cost increases for Tier 4 equipment to be between 2 and 7 percent of the total purchase price of a given machine. The incremental cost to reach Tier 4 from Tier 3 is estimated to be less than \$785 for heavy duty vehicles. Off-road equipment rated at the higher end of the power range shows similar cost numbers. (ICCT 2018)	http://www.rentalmanagementmag.com/Art/tabid/232/ArticleId/18896 https://www.theicct.org/sites/default/files/publications/Non_Road_Emission_Control_20180711.pdf
GHG-09	Electric Landscaping Equipment	\$\$	AGZA estimates for a single commercial-grade electric leaf blower, a busy contractor can expect a return on investment as early as 12 months. After that, the savings that come from eliminating gas and oil alone range from \$800 to \$1,600 per year. If you include maintenance costs, the savings become even greater. " Comparison of lawnmower types based on 10 year total cost of ownership: Gas push mower: \$725, Corded electric push mower: \$359, Cordless electric push mower: \$506	American Green Zone Alliance (AGZA) 2015, Can Electric Equipment Revolutionize Landscape Maintenance? We Do the Math: Will an Electric Mower Trim Lawn Care Costs? https://www.wisebread.com/we-do-the-math-will-an-electric-mower-trim-lawn-care-costs
GHG-10	Electric Vehicle Infrastructure Program	\$\$\$	-The electric vehicle market continues to grow where public and workplace charging infrastructure is the most extensive. -Costs to produce a cost-effectiveness report that allows above code ordinances to be adopted. -Costs for EV chargers: Level 1 \$300-\$1,500 Level 2 \$400-\$6,500 - The cities with the highest electric vehicle sales have seen the implementation of abundant, wide-ranging electric vehicle promotion	Pike, E. 2016 Plug-In Electric Vehicle Infrastructure Cost-Effectiveness Report - City of Oakland - https://energy-solution.com/wp-content/uploads/2016/09/PEV-Infrastructure-Cost-Effectiveness-Summary-Report-2016-07-20b.pdf https://www.nrdc.org/sites/default/files/electric-vehicle-cost-benefit-analysis_2017-09-27.pdf https://www.next10.org/sites/default/files/evs-ca-grid.pdf

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
			programs involving parking, permitting, fleets, utilities, education, and workplace charging.	https://luskin.ucla.edu/sites/default/files/Non-Residential%20Charging%20Stations.pdf
GHG-11	Reduce Vehicle Miles Traveled from New Development	\$\$\$	<ul style="list-style-type: none"> -Reductions in negative externalities associated with traffic congestion. - Increased pedestrian activity can lead to more opportunities for walk-by or pass-by visits to retail businesses. -High levels of traffic congestion has a negative effect on city growth and employment growth -Higher density planning that reduces VMT can allow for the development of employment hubs with higher economic output across all employment sectors 	https://ncst.ucdavis.edu/research-product/economic-benefits-vehicle-miles-traveled-reducing-placemaking-synthesizing-new
GHG-12	Transportation System Management Plan	\$\$	Investment in retiming traffic signals may result in a decrease in travel time from between 5% to 10% for a corridor at a small fraction of the cost of roadway widening. Benefit-to-cost ratios range from 55:1 to 75:1.	http://www.metroinix.com/en/regionalplanning/rtp/technical/TSM.PDF
GHG-13	Minimum Parking Standards	\$	<p>"Minimum parking requirements bundle the cost of parking spaces into the cost of development, and thereby increase the cost of all the goods and services sold at the sites that offer free parking (Shoup 1999)</p> <p>Minimum parking requirements have been shown to decrease land values by 30 percent based on studies in two California communities.</p> <p>Parking requirements for multifamily buildings can reduce affordability. (Litman 2016)"</p>	"Shoup 1999 , http://shoup.bol.ucla.edu/Trouble.pdf Litman 2016 http://www.vtpi.org/park-hou.pdf "
GHG-14	Improved Transit Access	\$\$	An increase in transit ridership will provide revenues for transit agencies	http://www.dot.ca.gov/trafficops/tm/docs/Park_and_Ride_Program_Resource_Guide.pdf (pg 8)
GHG-15	Improved Pedestrian Network and Facilities	\$\$	In one study, retail properties with a Walk Score® ranking of 80 were valued 54 percent higher than properties with a Walk Score® ranking of 20. Similar findings have been observed across all types of properties. A study of 15 U.S. cities found homes in more walkable neighborhoods to be worth \$4,000 to \$34,000 more than those in less walkable neighborhoods.	http://www.ipenproject.org/documents/conferences_docs/active-cities-full-report.pdf
GHG-16	Traffic Calming Measures	\$\$	Surveys of small businesses indicate that traffic calming measures, particularly reduced traffic speeds contribute to increased business. Calming measures encourage local residents to shop in their own neighborhoods.	https://web.archive.org/web/20200507084956/https://cedik.ca.uky.edu/files/effectsofdowntowntrafficalming.pdf

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GHG-17	Improved Bicycle Network and Facilities	\$\$\$	In one U.S. city, a \$70 million investment to revitalize a river greenway stimulated \$2.5 billion in residential, commercial, retail, sports and entertainment projects along the corridor. Likewise, businesses along a trail on the Atlantic coast of the United States attributed 30 percent of their gross revenues to being located along the trail.	https://nacto.org/wp-content/uploads/2016/02/2014_Buehler-and-Hamre_Economic-Benefits-of-Capital-Bikeshare.pdf
GHG-18	Improve Fuel Efficiency Standards	\$\$	CAFE standards save consumers \$7,300 in fuel costs and a net savings of \$4,600 over the lifetime of a new vehicle, and \$700 annually in fuel costs, according to a consumer reports study. - Purchase of new, more fuel efficient vehicles by businesses and consumers within the county contributes to more sales tax revenues.	https://consumersunion.org/wp-content/uploads/2013/06/FuelEconomyStandards.pdf
GHG-19	EV Parking Code	\$	The electric vehicle market continues to grow where public and workplace charging infrastructure is the most extensive. -Costs to produce a cost-effectiveness report that allows above code ordinances to be adopted. Costs for EV chargers: Level 1 \$300-\$1,500 Level 2 \$400-\$6,500	NREL 2015 November Costs Associated With Non-Residential Electric Vehicle Supply Equipment ICCT 2016, Leading Edge of Electric Vehicle Market Development in the United States; an analysis of California Cities"
GHG-20	Safe Routes to School	\$	Reduced fuel costs, Decreased traffic congestion in neighborhoods, Decreased number of accidents and fatalities leading to reduced health care costs.	Safe Routes to School National Partnership (2012) Economic Benefits of Safe Routes to School https://www.saferoutespartnership.org/resources/webinar/economic-benefits-srts
GHG-21	Update Community and Corridor Plans	\$\$	A ULI study on the fiscal impacts of TOD showed TOD developments require less funding for public services. TOD project apartments generated between \$1.13 and \$2.20 in tax and nontax revenues for their respective jurisdictions for every \$1 spent on public services for the residents and employees.	https://web.archive.org/web/20190512232554/https://arlingtonva.s3.dualstack.us-east-1.amazonaws.com/wp-content/uploads/sites/31/2017/01/ULI_WashBalt_TODFiscalReport_Jan2017.pdf
GHG-22	Connecting Key Destinations	\$	Increased productivity from employees by avoiding commutes on congested freeways (Lewis 2000) Businesses connected to transit nodes have access to a larger pool of qualified labor, increasing employee retention and reducing recruitment costs. Costs associated with planning and designing connections. May include costs for acquiring easements and constructing new trails in urbanized settings.	Lewis, David, Khalid Bekka et al. Transit Benefits 2000 Working Papers: A Public Choice Policy Analysis. Federal Transit Administration Office of Policy Development, 2000. Center for Transit Oriented Development (2011) https://www.apta.com/resources/reportsandpublications/Documents/Economic-Impact-Public-Transportation-Investment-APTA.pdf

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GHG-23	Incentivize Infill Development	\$	Higher upfront capital costs can be offset by higher sales and rental prices, and developers willing to hold properties for longer periods can take advantage of rising property values spurred by successful redevelopment projects. As infill becomes more prevalent, more lenders are developing products and services to help overcome financing challenges associated with mixed-use projects. Overall, developers are learning how to create profitable projects that meet a growing demand for housing and offices in walkable neighborhoods near transit, cultural attractions, restaurants, and other amenities.	Smart Growth and Economic Success https://www.epa.gov/sites/production/files/2014-06/documents/developer-infill-paper-508b.pdf
GHG-24	Increase Organic Waste Diversion	\$	A cost benefit analysis for an organic waste diversion policy in New York State showed net benefits of \$36.50 per ton of waste for composting, and \$54.16 per ton of waste for anaerobic digestion	https://s3.amazonaws.com/dive_static/diveimages/Benefit-Cost-Analysis-of-Potential-Food-Waste-Diversion-Legislation.pdf
GHG-25	Electric Irrigation Pumps	\$\$\$	Electric systems tend to have a longer life with fewer repair and labor expenses. (Amosson, et al. 2011) Electricity prices fluctuate somewhat with natural gas prices, but they tend to be more stable overall (Amosson, et al. 2011)	Amosson, 2011 http://amarillo.tamu.edu/files/2011/10/Irrigation-Bulletin-FINAL-B6113.pdf

Source: Ascent Environmental, 2021.

Table G-2 Cost Analysis of Community GHG Reduction Measures

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GOV-EC-01	Employee Transportation Program	\$	Can be used to attract and retain employees. County as a large employer in the region can have an influence on achieving the benefits of community VMT reduction. May reduce the number of parking spaces needed at county facilities.	http://vtpi.org/tdmecomdev.pdf
GOV-EC-02	Transit Subsidy Program	\$\$	Employees can receive up to \$260 per year for commuting as pretax fringe benefit according to the National Center for Transit Research.	https://www.nctr.usf.edu/programs/clearinghouse/commutebenefits/
GOV-EC-03	Employee Shuttle System	\$	County as a large employer in the region can have an influence on achieving the benefits of community VMT reduction.	
GOV-EC-04	Secure Bicycle Storage Facilities	\$\$	Bicycle lockers cost between \$1,280 to \$2,680 with an average of \$2,090 per unit.	http://www.pedbikeinfo.org/cms/downloads/Countermeasure_Costs_Summary_Oct2013.pdf

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
GOV-EC-05	Carpool-at-Work Incentives	\$	Some organizations use monetary prizes to encourage carpooling, but there are other, non-monetary solutions that can be offered as well including preferred parking and setting up a rideshare matching system within the organization's internal network. The county benefits from carpooling through increased productivity and reduced mileage reimbursement costs from employees that would otherwise travel in single occupant vehicles to projects.	http://www.cleanairpartnerstx.org/resources/Carpool%20Incentive%20Programs%20-%20EPA.pdf
GOV-FL-01	Fleet Conversion Program	\$\$\$	Light duty electric fleet vehicles (sedans, SUVs and light trucks) are on average 87 percent more expensive than internal combustion engine equivalents when purchased new (\$23,384 vs \$43,800). However, EV's are also 4.3 times more fuel efficient when gas and electricity are converted into equivalent units. When gas and electricity costs are compared EV's are about 75 percent less expensive to fuel annually (avg. \$880 vs \$211/yr). Maintenance costs for EVs are about 35 percent less annually (avg. \$1260 vs \$819) due to less moving parts. The payback period for light duty EV's is estimated to be: Sedans = 25 years, SUVs =13 years and Light Pickups = 14 years. Lowering the initial costs of initial purchase through rebates, grants or bulk purchasing could help lower the payback period.	Calculated by Ascent using results from the City of Minneapolis' Electric Vehicle Study, Final Report October 2017 https://lms.minneapolismn.gov/Download/RCA/2361/10_Municipal%20Fleet%20Electric%20Vehicle%20Study.pdf
GOV-FL-02	Renewable Compressed Natural Gas for On- and Off-Road Fleet	\$	Retail costs for CNG average \$2.47 per gallon (DOE). The pricing of renewable CNG is tied to the commodity prices of natural gas, plus additional premiums for production from mixed solid waste, landfill, wastewater treatment, or dairy. These premiums are offset by credits for production from the CA Low Carbon Fuel Standard and EPA Renewable Fuel Standard programs to help bring the retail price to the same level as non-renewable versions.	DOE 2018, https://www.afdc.energy.gov/uploads/publication/alternative_fuel_price_report_july_2018.pdf Feasibility of Renewable Natural Gas Study UC Davis 2017 https://steps.ucdavis.edu/wp-content/uploads/2017/05/2016-UCD-ITS-RR-16-20.pdf Waste-to-Fuel Sacramento CleanWorld Sacramento BioDigester Case Study, 2017 https://www.afdc.energy.gov/uploads/publication/waste_to_fuel.pdf
GOV-FL-03	Renewable Diesel for On- and Off-Road Fleet	\$	Renewable diesel (also referred to as Biodiesel or B99/B100) is slightly less expensive (-\$0.18/gallon) than diesel on the west coast according to the Department of the Energy \$3.69 v \$3.87/gallon). However, B99/B100 also produces 10 percent less energy per gallon, resulting in increased fuel consumption. This	Alternative Fuels Price Report DOE, July 2018 https://www.afdc.energy.gov/uploads/publication/alternative_fuel_price_report_july_2018.pdf

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
			can be accounted by adjusting to a price per energy equivalent. When adjusted on an energy-equivalent basis B99/B100 is slightly more expensive per gallon than diesel at \$4.06, +\$0.19/gallon	
GOV-BE-01	Green Building Policy	\$\$	Costs of retrocommissioning (RCx) needed to achieve the 30 percent energy reduction can range from \$0.13 to \$0.50 per sq. ft. based on an evaluation of 14 projects in California. Implementation is ~30 percent of the cost, ~70 percent is planning and monitoring. Benefits come in the form of energy savings ranging from \$0.11 to \$.72 per sq ft.	https://www.documents.dgs.ca.gov/green/eeproj/retrocommfactsheet.doc
GOV-BE-02	Solar for County Buildings	\$\$	County has existing agreement with SMUD for solar shares. Additional solar beyond what is available through SMUD can be developed on-site. Commercial installs estimated at \$1.85 /sq ft. for commercial rooftop up to \$3.00 sq ft for parking lot solar canopies. Costs offset by on-bill credits for energy savings or through negotiated power purchase agreements.	https://www.nrel.gov/docs/fy17osti/68925.pdf
GOV-BE-03	Employee Green Building Training	\$	Costs for CALGreen Certification exam are \$205 per employee. CALBO Class I Tier I Memberships are \$375 per employee. Many LEED training materials are available for free though the US Green Building Council. Utility or state sponsored green building trainings are generally free of charge.	CalGreen Certification - https://www.iccsafe.org/certification-exam-catalog/#examinfo150279 CALBO - https://members.calbo.org/ap/Membership/Application/Z9pQ81r8 SMUD - https://www.cvent.com/c/calendar/ab92b1d7-0e44-4480-b830-cb3b956c29a5 LEED - https://www.usgbc.org/resources/grid/leed
GOV-AR-01	Airport Fleet Replacement	\$\$\$	See Measure GOV-FL-01 and GOV-FL-02 for comments on costs and benefits for fleet conversion.	
GOV-WA-01	Water Efficiency Policy	\$\$	Cost of measures varies based on implementation strategy. Water reduction can be translated to cost savings using energy intensity factors and local utility rates.	http://www.cpuc.ca.gov/WorkArea/DownloadAsset.aspx?id=5356 https://www.smud.org/en/Rate-Information/Business-rates#4c57fb9f-1738-4224-993c-cc6b19e5e882-29f2a01c-7566-4ece-a674-27338339f76e
GOV-WA-02	Turf Landscape Irrigation Audit	\$	Water reduction can be translated to cost savings using energy intensity factors and local utility rates.	http://www.cpuc.ca.gov/WorkArea/DownloadAsset.aspx?id=5356

Measure Number	Measure Name	Administrative Costs	Community Cost Considerations	Sources
				https://www.smud.org/en/Rate-Information/Business-rates#4c57fb9f-1738-4224-993c-cc6b19e5e882-29f2a01c-7566-4ece-a674-27338339f76e
GOV-WA-03	Water-Efficient Equipment	\$\$	Cost of measures varies based on implementation strategy. Water reduction can be translated to cost savings using energy intensity factors and local utility rates.	http://www.cpuc.ca.gov/WorkArea/DownloadAsset.aspx?id=5356 https://www.smud.org/en/Rate-Information/Business-rates#4c57fb9f-1738-4224-993c-cc6b19e5e882-29f2a01c-7566-4ece-a674-27338339f76e
GOV-ST-01	Streetlight Conversion	\$	Costs can be quantified using DOE's Streetlight Retrofit Cost Analysis tool. Costs for and LED retrofit program for the City of Los Angeles in 2013 estimated at \$407.14 per streetlight, including equipment, labor and administration. Energy savings estimated at \$53.47 per light annually. Maintenance savings estimated at \$17.85 per light annually. Payback period of 5 to 7 years.	https://www.energy.gov/eere/ssl/downloads/street-and-parking-facility-lighting-retrofit-financial-analysis-tool City of LA Retrofit Program https://photos.state.gov/libraries/finland/788/pdfs/LED_Presentation_Final_June_2013.pdf

Source: Ascent Environmental, 2021.

Table G-3 SMUD Residential Electrification Incentives

Program	Total Possible Incentive	Base Incentive	HP HVAC	HPWH	Induction cooktop/range	Bonus
Single Family - New Construction	\$5,000	\$2,250	\$950	\$800	\$1,000	Battery Storage
Single Family - Existing	\$8,750	\$0	\$3,000	\$2,500	\$750	Panel & Efficiency
Multifamily - New Construction	\$1,750	\$1,250	yes	yes	\$500	x
Multifamily - Existing	\$2,500	n/a	\$1,000	\$1,000	\$500	Energy Efficiency
HP-HVAC Equipment Efficiency	\$3,000	n/a	\$3,000	n/a	n/a	Energy Efficiency
HPWH Equipment Efficiency	\$2,500	\$2,500	n/a	yes	n/a	n/a
Panel/Wiring Upgrade	\$2,500	n/a	\$500	\$500	\$500	\$1,000
Induction Energy Efficiency	\$750	\$750	n/a	n/a	yes	x

Source: SMUD, 2021.

Table G-4 SMUD Integrated Design and Express Energy Solutions

Measure	Total Possible Incentive
Single-zone and multi-zone mini-split inverter driven heat pumps	\$500 per ton of cooling capacity
Packaged and split system heat pumps (Commercial systems 5-20 tons are available)	\$550 per ton of cooling capacity
Variable refrigerant flow (VRF) multi-zone systems	\$550 per ton cooling capacity for single mode unit \$1,000 per ton of cooling capacity for units for units with heat recovery
Engineering and permitting support for units with supplemental heat	\$750 per project site
Electrical Infrastructure Support Panel improvements or upgraded circuits to support electric resistance heat.	\$1000 per unit
Commercial induction range	\$450 per hob
Residential-style heat pump water heater 50-80 gallon capacity	\$1,500 per unit
Commercial-style heat pump water heater 80-120 gallon capacity	\$4,000 per unit
Split-system heat pump water heater 80-120 gallon capacity	\$3,000 per unit
Other gas-to-electric heat pump space heating solutions. Complex electrification of water-source heat pumps, heat recovery and customized solutions.	Contact SMUD custoretrofit@smud.org
Performance-based approach based on energy modeling	\$100,000 incentive cap for energy efficiency \$150,000 incentive cap for electrification \$10,000 all-electric design team incentive
Custom Retrofit Program - Go-Electric, Retrocommissioning, pump energy assessment, refrigeration, process improvement, HVAC and lighting.	\$100,000 incentive cap for energy efficiency \$150,000 incentive cap for electrification \$10,000 all-electric design team incentive

Source: SMUD 2021

APPENDIX H – GLOSSARY

AB – Assembly Bill

Adaptation - The process of adjustment to actual or expected climate and its effects. In human systems, adaptation seeks to moderate harm or exploit beneficial opportunities. In natural systems, human intervention may facilitate adjustment to expected climate and its effects.

Adaptive capacity - The ability of systems, institutions, humans, and other organisms to adjust to potential damage, to take advantage of opportunities, or to respond to consequences.

APG – Adaptation Planning Guide

ATP – Active Transportation Plan

BAC – Building Assistance Center

BERC - Business Environment Resource Center

BLM – Bureau of Land Management

BP&I - Sacramento County Building Permits and Inspections

BRI - Business Resiliency Initiative

CA DWR – State of California Department of Water Resources

CAL FIRE - California Department of Forestry and Fire Protection

CALBO – California Building Officials

CalCAN - California Climate and Agricultural Network

CALGreen - California Green Building Standards Code

CAP – Climate Action Plan

CEO – County Executive Office

CEQA – California Environmental Quality Act

CNG – Compressed Natural Gas

CO₂e – Carbon dioxide equivalents

Commercial – a category of development comprised of non-residential buildings that include rail, offices, warehouses, restaurants, and other business-oriented uses.

County – Unincorporated Sacramento County

CRC - Capital Region Climate Readiness Collaborate

CRCRC – Capital Region Climate Readiness Collaborative

DGS - Sacramento County Department of General Services

DHH - Sacramento Department of Health and Human Services

DOE – Department of Energy

DPS – Department of Personnel Services

DWMR - Sacramento County Department of Waste Management and Recycling

DWR - Sacramento County Department of Water Resources

ED – Economic Development

EO – Executive Order

FEMA – Federal Emergency Management Agency

GHG – Greenhouse Gas

GIS – Geographic Information System

GIS - Sacramento County Geographic Information Services

HPS – High-pressure sodium (lighting type)

LED – Light emitting diode (lighting type)

LHMP – Local Hazard Mitigation Plan

Multifamily - a category of development comprised of two-, three-, or four-family dwellings, townhouses, rowhouses, individual mobile homes within a mobile home park, apartments or other multiple-family dwellings including condominiums as defined in the Sacramento County Zoning Code.

NOAA - National Oceanic and Atmospheric

NWL – Natural and Working Lands

NWS – National Weather Service

PER - Sacramento County Planning & Environmental Review

PG&E – Pacific Gas and Electric Company

PIO – Public Information Officer

PV – Photovoltaic Solar

Regional San - Sacramento Regional County Sanitation District

RMP – Resource Management Plan

RPS – Renewables Portfolio Standard

RWA – Regional Water Authority

Sac Metro - Sacramento Metropolitan Fire District

SACDOT- Sacramento County Department of Transportation

SacOES - Sacramento County Office of Emergency Services

SACOG - Sacramento Area Council of Government

SacRT – Sacramento Regional Transit

SAFCA - Sacramento Area Flood Control Agency

SB – Senate Bill

SCAS – Sacramento County Airport System

SCWA – Sacramento County Water Agency

Sierra CAMP - Sierra Climate Adaptation and Mitigation Partnership

Single-family – a category of development comprised of detached dwellings including primary residence mobile homes not within a mobile home park, as defined in the Sacramento County Zoning Code.

SM - Sustainability Manager

SMUD - Sacramento Municipal Utilities District

State – State of California

SWRCB – State Water Resources Control Board

TOD – Transit Oriented Development

TSM – Transportation System Management

UCACE – US Army Corps of Engineers

UHIE – Urban Heat Island Effect

USBR – US Bureau of Reclamation

VMT – Vehicle Miles Traveled

Vulnerability - The propensity or predisposition to be adversely affected. Vulnerability encompasses a variety of concepts and elements including sensitivity or susceptibility to harm and lack of capacity to cope and adapt.

APPENDIX I – CLIMATE ACTION PLAN CONSISTENCY REVIEW CHECKLIST

I.1 INTRODUCTION AND PURPOSE

The [Sacramento County Climate Action Plan](#) (CAP) outlines the actions the County will undertake to achieve greenhouse gas (GHG) emissions reductions. As part of CAP implementation, the CAP Consistency Review Checklist (Checklist) has been developed to ensure that new development in the County appropriately incorporates all applicable GHG reduction measures from the CAP on a project-by-project basis. Implementation of these measures will ensure that new development is consistent with the CAP's strategies toward achieving the County's identified GHG reduction targets.

The Checklist, in conjunction with the CAP, provides a streamlined review process for proposed new development projects that are subject to discretionary review that triggers environmental review pursuant to the California Environmental Quality Act (CEQA). Analysis of GHG emissions and potential climate change impacts from new development is required under CEQA. The CAP is a plan for the reduction of GHG emissions in accordance with CEQA Guidelines Section 15183.5. Pursuant to CEQA Guidelines Sections 15064(h)(3), 15130(d), and 15183(b), a project's incremental contribution to cumulative GHG emissions may be determined to be less than significant if it complies with the applicable measures in a "plan for the reduction of GHG emissions" (e.g., CAP). Under these provisions, if a project can show consistency with applicable GHG reduction measures, the level of analysis for the project required under CEQA with respect to GHG emissions can be reduced considerably (i.e., a detailed analysis of project-level GHG emissions and potential climate change impacts is not needed).

If a project is determined to require environmental review pursuant to CEQA, a completed Checklist must be submitted to the County as part of the 884 review process. This Checklist is designed to assist the applicant and the County in identifying the minimum CAP-related requirements specific to the proposed project. However, the final determination of a project's consistency with the Checklist will be made by County staff before the end of the 884 review period. As a result, it may be necessary to supplement the completed Checklist with supporting materials, calculations, or certifications to demonstrate full compliance with the Checklist requirements.

Projects requiring discretionary review that cannot demonstrate consistency with the CAP using this Checklist would be required to prepare a separate, more detailed project-level GHG analysis as part of the applicable CEQA document.

SECTION A. GENERAL PROJECT INFORMATION

Projects required to complete this Checklist must first provide the following information:

Project Name and Control Number:	
Assessor's Parcel No(s):	
Property Address/Location:	
Existing General Plan/ Zoning designations for the project site (as stated in the Sacramento County General Plan and Zoning Ordinance. Please contact staff if you are unsure of the correct designations):	
Gross Acres:	
Project Description: (submit separate attachments if necessary)	
Existing Land Use of the Property: (General Description)	
Identify all applicable proposed land uses:	
<input type="checkbox"/> Single-Family Residential (indicate # of single-family units):	
<input type="checkbox"/> Multi-Family Residential (indicate # of multi-family units):	
<input type="checkbox"/> Commercial (total square footage):	
<input type="checkbox"/> Industrial (total square footage):	
<input type="checkbox"/> Other (describe):	

SECTION B: GENERAL PLAN LAND USE CONSISTENCY

The first step in determining CAP consistency for a discretionary development project is to assess the project’s consistency with the land use assumptions in the County’s General Plan and zoning designations, which were used to calculate the future GHG emissions forecasts and targets for the CAP. If the proposed project requiring CEQA is consistent with both applicable General Plan and zoning designations, the proposed project may be determined to be within the scope of emissions covered under the CAP.

If the project is not consistent with the existing General Plan and zoning designations, it is possible that the land use changes required for the project could still be consistent with the growth projections used in the CAP depending on the level of the proposed changes. The questions below must be completed, as applicable, to determine whether the project is consistent with the County’s General Plan and zoning designations and related GHG emissions forecasts and targets.

<p>1. Are the proposed land uses in the project consistent with the existing General Plan land use and zoning designations?</p> <p><i>If “Yes”, questions 2 and 3 below are not applicable and the project shall proceed to Section C of the checklist.</i></p> <p><i>If “No”, proceed to Question 2 below.</i></p>	<p>Yes <input type="checkbox"/></p>	<p>No <input type="checkbox"/></p>
<p>2. Is a General Plan amendment and/or rezoning required for the project?</p> <p><i>If “No”, question 3 below is not applicable and the project shall proceed to Section C of the checklist.</i></p> <p><i>If “Yes”, proceed to Question 3 below.</i></p>	<p>Yes <input type="checkbox"/></p>	<p>No <input type="checkbox"/></p>
<p>3. If the proposed project is not consistent with the General Plan land use or zoning designations, does the project include a land use plan and/or zoning designation amendment that would result in an equivalent or less GHG-intensive project when compared to the existing designations?</p> <p><i>If “Yes”, attach to this checklist the estimated project emissions under both existing and proposed designation(s) for comparison. Compare the maximum buildout of the existing designation and the maximum buildout of the proposed designation using the California Emissions Estimator Model (CalEEMod). If the proposed project is determined to result in an equivalent or less GHG-intensive project when compared to the existing designations, proceed to Section C of the checklist.</i></p> <p><i>If “No”, the applicant must conduct a full GHG impact analysis for the project as part of the CEQA process. The project shall incorporate each of the applicable measures identified in Section C to mitigate cumulative GHG emissions impacts. STOP</i></p>	<p>Yes <input type="checkbox"/></p>	<p>No <input type="checkbox"/></p>

SECTION C: CAP MEASURES

The completion of this Checklist will document a project's compliance with the GHG reduction measures in the County's CAP that are applicable to new development. The compliance requirements apply to development projects that include discretionary review, require environmental review, and, therefore, are not exempt under CEQA.

All applicable Checklist questions must be answered "Yes", and documentation provided that substantiates how compliance would be achieved. For measures for which a "Yes" is indicated, the features must be demonstrated as part of the project's design and described. All applicable requirements in the checklist will be included in the conditions of approval for issuance of building permit stage of project approval.

If any questions are marked with a "No", the project cannot be determined to be consistent with the CAP, and project specific GHG analysis and mitigation would be required.

If any questions are marked "N/A" (meaning "not applicable"), a statement describing why the question is not applicable shall be provided to the satisfaction of the Office of Planning and Environmental Review or building official.

1. ENERGY EFFICIENCY

Please refer to the [California Green Building Standards Code](#) (CALGreen) for more information when completing this section.

Checklist Requirement by Project Type	Corresponding CAP Measure	Yes	No	N/A
a) For single-family and/or multi-family residential additions or alterations where the building’s conditioned area increases in volume or size, would the new portion of the project comply with CALGreen Residential Tier 1 energy efficiency standards? ¹	GHG-06	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) For nonresidential additions or alterations ≥ \$200,000 building permit valuation or ≥ 1,000 square feet, would the project comply with CALGreen nonresidential Tier 1 energy efficiency standards for additions and alterations? ¹	GHG-04	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>If “N/A” has been checked for this question, please provide a statement explaining why the measure is not applicable.</p> <p>_____</p> <p>_____</p> <p>_____</p> <p>_____</p>				
<p>Notes:</p> <ol style="list-style-type: none"> 1. Refer to Section 301 of CALGreen for specific requirements in the code which apply to additions and alterations. 2. For Energy Budget calculations as part of CALGreen Tier 1 standards, high-rise residential (four stories or higher) and hotel/motel buildings are considered nonresidential buildings. 3. Verification that the requirements of this checklist question are being met will be conducted during the issuance of building permits for the project. 				

2. ALL-ELECTRIC RESIDENTIAL BUILDINGS STANDARD

Checklist Requirement	Corresponding CAP Measure	Yes	No	N/A
<p>a) For new residential projects (single-family and multi-family residential units), would the project or a portion of the project be subject to building permitting (i.e., building permits issued) on or after January 1, 2023?</p> <p><i>If "Yes", proceed to question b of this checklist requirement.</i></p> <p><i>If "No", the project must include pre-wiring for all-electric appliances and equipment to allow future conversion.</i></p> <p><i>If "N/A", please provide explanation below.</i></p>	GHG-07	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>b) Would the project or portions of the project permitted after January 1, 2023 be designed and constructed to comply with County's residential all-electric buildings standard¹?</p>	GHG-07	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>If "N/A" has been checked for this question, please provide a statement explaining why the measure is not applicable.</p> <hr/> <hr/> <hr/> <hr/>				
<p>Notes:</p> <ol style="list-style-type: none"> Although the County has not yet developed a residential all-electric buildings standard, the County will develop such a standard prior to January 1, 2023, pursuant to Measure GHG-07 in the CAP. For purposes of CAP compliance, all new residential projects that include phases for which building permitting would begin after January 1, 2023, compliance with residential all-electric buildings standard as stated herein must be included as a condition of approval and included as a mitigation measure in the project's environmental document (as applicable). Such projects or phases thereof must be designed and built to use exclusively electric appliances for the lifetime of the building. Alternatively, all buildings designed and built as part of the project would need to achieve a Total Energy Design Rating (Total EDR) and Energy Efficiency Design Rating (Efficiency EDR) of zero, consistent with the standards in Title 24, Part 6 of the California Code of Regulations, for all units permitted after January 1, 2023. Verification that the requirements of this checklist question are being met will be conducted during the conditions of approval for the project. 				

3. ALL-ELECTRIC COMMERCIAL/NONRESIDENTIAL BUILDINGS AND FACILITIES STANDARD

Checklist Requirement	Corresponding CAP Measure	Yes	No	N/A
<p>c) For new commercial/nonresidential projects, would the project or a portion of the project be subject to building permitting (i.e., building permits issued) on or after January 1, 2023 if three stories or less, OR on or after January 1, 2026 if four stories or more?</p> <p><i>If "Yes", proceed to question b of this checklist requirement.</i></p> <p><i>If "N/A", please provide explanation below for the limited exemptions for specific uses as identified in the CAP. These are available only for building permits filed on or before December 31, 2025, provided that the associated GHG emissions are offset through an accredited local carbon offset program.</i></p>	GHG-05	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>d) Would the project or portions of the project permitted after January 1, 2023 be designed and constructed to comply with County's nonresidential all-electric buildings standard¹?</p>	GHG-05	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>If "N/A" has been checked for this question, please provide a statement explaining why the measure is not applicable.</p> <hr/> <hr/> <hr/> <hr/>				
<p>Notes:</p> <ol style="list-style-type: none"> Although the County has not yet developed a nonresidential all-electric buildings standard, the County will develop such a standard prior to January 1, 2023, pursuant to Measure GHG-05 in the CAP. For purposes of CAP compliance, all new nonresidential projects that include phases for which building permitting would begin after January 1, 2023, compliance with nonresidential all-electric buildings standard as stated herein must be included as a condition of approval and included as a mitigation measure in the project's environmental document (as applicable). Such projects or phases thereof must be designed and built to use exclusively electric appliances for the lifetime of the building. Verification that the requirements of this checklist question are being met will be conducted during the conditions of approval for the project. 				

4. TIER 4 CONSTRUCTION EQUIPMENT

Checklist Requirement	Corresponding CAP Measure	Yes	No	N/A
a) For the construction of new residential and nonresidential projects, would all off-road construction equipment used during construction include Environmental Protection Agency certified off-road Tier 4 diesel engines?	GHG-08	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
If "N/A" has been checked for this question, please provide a statement explaining why the measure is not applicable. <hr/> <hr/> <hr/> <hr/>				
Notes: <ol style="list-style-type: none"> By answering "yes", the applicant is agreeing to the requirements of this checklist question. During the project's grading permit approval stage, the applicant would be required to provide a list of all pieces of construction equipment that would be used in project construction including equipment manufacturer, equipment model number, type of equipment, and engine model year. Verification that the requirements of this checklist question are being met will be conducted during the issuance of building permits for the project. 				

5. ELECTRIC VEHICLE SERVICE EQUIPMENT (EVSE)

Design and installation of Electric Vehicle Service Equipment (EVSE) as part of this measure will be consistent with all applicable standards established in CALGreen Section 4.106.4.2 for multifamily dwellings and CALGreen Section 5.106.5.3 for nonresidential buildings.

Checklist Requirement by Project Type	Corresponding CAP Measure	Yes	No	N/A
a) For the construction of multifamily dwelling units , would 20 percent ² of parking spaces provided for the project be "EV Ready" ³ ?	GHG-19	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
b) For new developments designated as commercial , would the total required parking spaces support future EVSE charging consistent with section A5.106.5.3.1 of the CALGreen code ⁴ ?	GHG-19	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

If "N/A" has been checked for this question, please provide a statement explaining why the measure is not applicable.

Notes:

- By answering "yes" to this checklist question, it is understood that the project will be in compliance with Measure GHG-19. Upon the update of the County's Building Code and Development Standards regarding EV infrastructure, this Checklist question may need to be modified to reflect the updated compliance mechanisms as defined in the ordinance.
- "EV Ready" is defined as a parking space that is pre-wired with a dedicated 208/240 branch circuit installed in the wall that originates at the electrical service panel or sub-panel with a 40-ampere minimum overcurrent protection device and terminates into a cabinet, box, or enclosure, in a manner approved by the building official.
- A minimum of one space shall be provided. The calculation for spaces shall be rounded up to the nearest whole number.
- Commercial EVSE CALGreen requirements available here: https://codes.iccsafe.org/content/CGBC2019P3/appendix-a5-nonresidential-voluntary-measures#CGBC2019P3_AppxA5_SecA5.106
- For the purpose of this Checklist, EVSE is defined by Article 625 of the California Electrical Code.
- Verification that the requirements of this checklist question are being met will be conducted during the issuance of building permits for the project.

6. VEHICLE MILES TRAVELED (VMT) THRESHOLD

Checklist Requirement	Corresponding CAP Measure	Yes	No	N/A
<p>a) For development projects required to conduct a traffic analysis in accordance with the County’s Transportation Analysis Guidelines, would the project:</p> <ul style="list-style-type: none"> a. achieve a 15 percent reduction in per capita VMT compared to the baseline conditions as defined in the County’s Transportation Analysis Guidelines; or b. include sufficient VMT reduction measures to achieve a 15 percent reduction in per capita VMT compared to baseline conditions as defined in the County’s Transportation Analysis Guidelines? 	GHG-11	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
<p>b) Please provide sufficient information as part of the Checklist submittal to verify the project meets the requirements for this question. Information provided shall be consistent with the methodology included in the County’s Transportation Analysis Guidelines and demonstrate that, at full build out, the project would generate VMT equal to or less than the limit of the project’s General Plan land use designation. The per capita VMT limits for each General Plan land use designation are shown in Table 3-3 of the County’s Transportation Analysis Guidelines. Demonstrating compliance with this checklist question can be achieved by referring to the project’s traffic analysis within the CEQA document or a discussion of the project’s VMT generation as part of the traffic analysis conducted for the project.</p>				
<p>c) Please check the appropriate box to indicate what information if being included as part of the Checklist submittal:</p> <ul style="list-style-type: none"> <input type="checkbox"/> Provide the portion of the project application which demonstrates that the project would generate VMT equal to or less than the limit of the project’s General Plan land use designation. <input type="checkbox"/> Provide the portion of the traffic analysis conducted for the project which demonstrates that the project would generate VMT equal to or less than the limit of the project’s General Plan land use designation. Additional calculations should be provided to demonstrate the project’s consistency with this measure, if this information is not explicitly stated in the traffic analysis. 				
<p>If “N/A” has been checked for this question, please provide a statement explaining why the measure is not applicable.</p> <p>_____</p> <p>_____</p>				
<p>Notes:</p> <ol style="list-style-type: none"> Verification that the requirements of this checklist question are being met will be conducted during the conditions of approval for the project. 				

7. TRANSPORTATION SYSTEM MANAGEMENT (TSM) PLAN

Checklist Requirement	Corresponding CAP Measure	Yes	No	N/A
<p>a) For the construction of nonresidential projects that would include ≥ 200 employees, would the project:</p> <ul style="list-style-type: none"> a. include a Transportation System Management Plan consistent with Section 5.9.6.F of the County’s Zoning Code that has been reviewed and approved by the County Planning Director; or b. demonstrate through the requirements of CAP Checklist 5 that the project would achieve a 15 percent reduction in VMT below the existing conditions baseline or include sufficient VMT reduction measures to achieve a 15 percent reduction in VMT below the existing conditions baseline? 	GHG-12	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

If “N/A” has been checked for this question, please provide a statement explaining why the measure is not applicable.

Notes:

1. The County will update Section 5.9.6.F of the County’s Zoning Code regarding development of a Transportation System Management Plan similar to the requirements in this Checklist question and pursuant to GHG-12 in the CAP. By answering “yes” to this checklist question, it is assumed that the project will be in compliance with Measure GHG-12 by completing a Transportation System Management Plan. However, upon adoption of the County’s forthcoming TSM Plan zoning code update, this Checklist may need to be modified to reflect the updated compliance mechanisms as defined in the ordinance.
2. Verification that the requirements of this checklist question are being met will be conducted during the issuance of building permits for the project. For projects which choose option (b) for this question, verification that the requirements of this checklist question are being met will be conducted during the conditions of approval for the project.