September 3, 2021

Honorable Chair Liane Randolph
Honorable Board Members
California Air Resources Board
1001 “I” Street
Sacramento, CA 95814

Honorable Co-Chairs Martha Dina Arguello,
Paulina Torres, and Sharifa Taylor
Honorable Members of the Environmental Justice
Advisory Committee

RE: Initial Response to Scenario Concepts Technical Workshop

Dear Chair Randolph, honorable members of the Board, and Environmental Justice Advisory Committee,

We’d like to take this opportunity to provide initial feedback to the questions posed and assumptions made during the August 17, “2022 Scoping Plan Update - Scenario Concepts Technical Workshop”. While, these priorities are by no means responsive to the full scope of questions posed, nor are they exhaustive of environmental justice priorities as they relate to the Scoping Plan, we hoped our initial feedback would be helpful to both California Air Resources Board (CARB) and the Environmental Justice Advisory Committee (EJAC) as you consider scenario inputs and options. In this letter we will briefly summarize promising pathways as presented by CARB, deficiencies in the scope of inputs, and assumptions that we reject.

In summary, we urge CARB to incorporate the following into the scenario input modeling:

1. Do not include Carbon Capture, Utilization, Sequestration, or Storage as a means of achieving GHG goals or equate CCS as direct emissions reductions.
2. Include all agricultural emissions—including pesticides—in the reduction assumptions of the Scoping Plan scenarios.
3. Guarantee that reliable and affordable mass transit will be a central strategy for solutions to
reduce transportation sector emissions

4. Prioritize energy democracy as a necessary complement to building decarbonization

5. Eliminate the assumption of dairy biogas capture and address dairy emissions through direct emission reduction strategies

6. Eliminate reliance on biomass-to-energy production that implicates pollution in EJ communities or monetizes creation of waste and/or pollution

7. Address land uses practices, permitting of polluting facilities, and other patterns of industrial development that perpetuate and expand GHG emissions and air and water pollution

8. Reject the assumption that "alternative fuels" promote climate goals as many such fuels produce climate warming and harmful emissions

9. Phase out all oil and gas extraction and refining in the state

1. Do not rely on Carbon Capture, Utilization, Sequestration, or Storage as a means of achieving GHG goals or equate CCS as direct emissions reductions

Carbon capture or sequestration are not solutions to the root issue of continually emitted GHGs, and must be excluded from all scenarios. We urge CARB to develop scenarios that rely on emissions reduction as the most effective and just means of meeting our goals. While GHG emissions reductions also reduce co-pollutants, CCS does not. It is irresponsible to rely on this expensive and failed technology that detracts from investing in ecological solutions. We urge CARB and the EJAC to review recent letters submitted by environmental justice organizations in response to the Engineered Carbon Removal Technical Workshop held on August 2nd, which detail how CCS thwarts the AB 32 targets California must achieve.

2. Include all agricultural emissions including pesticides, in the scoping plan along with equitable, emission reduction strategies.

The Scoping Plan must address toxic and warming emissions from agricultural industries, including emissions from pesticides, animal agriculture, and agricultural waste management. Synthetic pesticides
contribute significantly to greenhouse gas emissions when applied,\textsuperscript{1,2} severely damage the microbial processes in soil that allow it to stably and naturally sequester carbon, and are produced from highly polluting and atmosphere-warming petrochemicals, such as ethylene, propylene, and methane. Solutions like integrated pest management, sustainable herd sizes and crop types, and locally based agricultural and food delivery systems must be integrated as assumptions in the Scoping Plan scenarios, in addition to regulatory strategies focused on direct emissions reduction.

3. Guarantee that reliable and affordable mass transit will be a central strategy for solutions to reduce transportation sector emissions

The 2017 CARB Scoping Plan heavily relied on cap-and-trade, which has failed to deliver emission reductions for environmental justice communities, and strategies to increase use of mass transit are missing from the scenarios presented to date. The transportation sector’s GHG emissions are 40% of total statewide emissions and have not gone down over time. Electrifying passenger cars will not solve the climate crisis, and car dependency remains an unsustainable reality. CARB needs to include strategies that invest in reliable and affordable zero-emission mass transit that creates real public transit choice for residents. According to CARB’s 2018 progress report on SB150, we are not meeting our vehicle miles traveled (VMT) targets, and housing affordability issues have led to further displacement of residents in environmental justice communities—which in turn increases VMTs, along with transportation costs and other burdens.

- Greater GHG reduction targets for Metropolitan Planning Organizations (MPO) increased to 25% GHG reduction by 2035.
- **Mass Transit:** Increased use of mass transit needs to be a core strategy for reducing GHGs by shifting mobility in California away from dependency on single occupancy vehicles, which makes up 28% of total statewide GHG emissions. Increased accessible public transit options must include micro-mobility strategies that work for rural communities.
- **Active Transportation**: In tandem, a substantial increase in active transportation must be analyzed to substantially reduce the use of single-occupancy vehicles, particularly for short trips which make up a large portion of all trips, especially in our big cities.
- **Localizing Goods & Services.** CARB must also input into the scenarios, community development policies that will increase access to essential goods and social services within neighborhoods,

\textsuperscript{1} The application of 3 fumigant pesticides alone (chloropicrin, metam sodium, dazomet) causes anywhere from 7- to 100-fold increases in nitrous oxide (N2O), a greenhouse gas considered 300 times more potent than carbon dioxide. Spokas K., Wang D. 2003. Stimulation of nitrous oxide production resulted from soil fumigation with chloropicrin. *Atmospheric Environment* 37 (2003) 3501–3507. [https://doi.org/10.1016/S1352-2310(03)00412-6](https://doi.org/10.1016/S1352-2310(03)00412-6).


\textsuperscript{2} Approximately 20 million pounds of chloropicrin, metam sodium, and dazomet fumigants are applied to California fields each year. Department of Pesticide Regulation annual Pesticide Use Reports. [https://www.cdpr.ca.gov/docs/pur/purmain.htm](https://www.cdpr.ca.gov/docs/pur/purmain.htm).
build climate resilience, and reduce VMT all at once. This should include strategies to shift local/last-mile delivery of goods to lower VMT options where possible.

4. **Prioritize energy democracy as a necessary complement to building decarbonization**

As part of the transition to electric appliances and all electric buildings, it is critical to prioritize energy democracy in building decarbonization strategies. This can be achieved through the following actions:

- **Ensure Affordability and Remove Barriers to Accessing Clean Appliances.** The vast majority of the people we represent are renters who live in older buildings, multifamily affordable housing, or mobile homes. Upfront costs are one of the most significant and prohibitive barriers that prevent lower income households from accessing clean energy technologies (e.g., electric appliances). Lack of upfront capital and credit further restricts household ability to transition. Working class communities of color are already burdened by pollution and economic insecurity; they must not also be saddled with high prices for new appliances during the transition towards a decarbonized economy. Additionally, lower income people of color are disproportionately in dilapidated homes with outdated electricity infrastructure. It’s critical that decarbonization strategies build in funding and incentives to ensure that people living in older homes can take advantage of advances in clean energy.

- **Promote High-Road Jobs, Workforce Development, and Family-Sustaining Wages.** Building decarbonization strategies must support high-road labor and job quality standards, including family-sustaining wages and employer-provided benefits, career pathways, and safe and healthy working conditions.

- **Protect Lower Income Households Against Harms.** Amidst worsening housing unaffordability, there is a critical need to explicitly embed tenant protections and anti-displacement requirements for existing residents in the design of any program deploying new technologies and upgrades in order to safeguard against gentrification and protect renters from rent increases and related pressures.

5. **Eliminate the assumption of dairy biogas capture and address dairy emissions through direct emission reduction requirements**

Dairy biogas does not constitute clean energy and must not be included in California’s climate change strategies. Dairy biogas relies on the production, consolidation, and storage of polluting, wet manure. Any incentives designed to sustain or increase biogas production implicates ongoing, unsustainable dairy practices and manure management that exacerbate air and water pollution from dairy operations, including from the production, storage, and application of manure. Additionally, CARB’s and other agencies’ branding of biogas as “clean” and “zero carbon” allows the fossil fuel industry to brand and market its product as clean, and serves as an excuse and justification to critically delay our full transition to truly clean energy. The extremely expensive taxpayer and ratepayer incentives targeting dairies are only available by virtue of the fact that the dairy industry’s GHG emissions are unregulated, unlike other
industries that emit GHGs including the potent methane, such as, for example, the waste sector. Instead of subsidizing continued and expanded pollution from the dairy industry, Scoping Plan scenarios must include regulatory approaches to emissions reductions from dairies and must assume eliminated rate-payer and tax-payer subsidies that prop up the factory farms and fossil fuel industry.

6. Eliminate reliance on biomass-to-energy production that increases pollution in EJ communities or monetizes creation of waste and / or pollution

Combustion-based biomass-to-energy production must not be incorporated in the Scoping Plan scenarios. CARB must exclude combustible biomass-derived energy and fuels from the scenarios, particularly in areas of non-attainment of air quality standards, and must assume swift adoption of the most regenerative, sustainable, non-combustion uses for biomass, such as composting and soil incorporation. Burning wood and other carbon-based materials only worsens our air pollution and climate challenges. Industrial biomass plants are major emitters of greenhouse gases and health harming air pollutants, especially fine particulate matter and nitrogen oxides. These pollutants contribute to numerous adverse health impacts like heart disease, stroke, aggravated asthma, and premature death, particularly in the environmental justice neighborhoods many of these facilities are located in. Additionally, industrial biomass plants increase overall CO2 emissions without significant energy production, and at an exorbitant cost. Energy generated from industrial biomass plants in California averages more than three times the cost of solar or wind power, making it California's most expensive source of electricity. Industrial biomass plants rely on taxpayer and ratepayer subsidies and divert investment from truly clean energy sources. In the analysis of scenarios, CARB must assume that polluting bioenergy production will perpetuate localized and discriminatory pollution burdens.

7. Address land uses, facilities, and patterns of industrial development that generate and perpetuate GHG emissions and other forms of pollution

The Scoping Plan must address unsustainable land uses that perpetuate and increase GHGs (in addition to criteria and toxic air emissions) from the industrial and commercial operations themselves and from the associated truck traffic. For example, the continued expansion of goods movement continues to increase GHG emissions while concentrating air and water pollution in already environmentally stressed communities and neighborhoods. The Scoping Plan scenarios must incorporate increased regulatory measures on direct emissions from polluting facilities, electrification requirements for heavy industry, policy interventions to prevent continued freeway expansions, and increased policy interventions to prevent continued citing and expansion of polluting industries in environmentally burdened communities.

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8. Reject the assumption that "alternative fuels" promote climate goals as many such fuels produce climate warming and harmful emissions

So called “alternative fuels” including biogas and biodiesel are deceptively named “near zero,” “low carbon,” “zero carbon,” “renewable,” and even “green.” Trading and paper schemes aside, many alternative energy sources emit GHGs at the same rate as their fossil fuel counterparts upon combustion, emit criteria air pollutants and toxic air contaminants like their fossil fuel counterparts, and create perverse incentives that monetize creation and sale of polluting fuels and feedstocks. To that end, we support aggressive actions to transition away from all combustion and polluting fuels in all sectors, including a complete transition to 100% of ZEV sales by 2030 for light-, medium-, heavy-duty vehicles, transit buses and drayage.

9. Phase out all oil and gas extraction and refining in the state

Fossil fuel extraction and refining creates substantial direct climate pollution as well as contributing significantly to local harms to public health, air quality, water quality, and soil health. Moreover, continued oil and gas reliance are rapidly intensifying climate change, and we cannot realistically expect to prevent the worst effects of climate change without ending the combustion of fossil fuels, which in turn requires that we stop producing them. All Scoping Plan scenarios must assume that oil and gas extraction is phased out by 2035, and that all refineries in the state will be decommissioned.

At the same time, it is essential that the state establish programs to ensure that workers and communities are not left behind. We need a safety net for workers that provides wage insurance, retraining, health insurance, and other programs to ensure that oil and gas workers are kept whole. We also need tax base replacement, especially in Kern County, so that local and county governments can weather the lost revenue until sustainable community development has time to build a new tax base. The phase-out process for decommissioning refineries must start now to minimize the impact of job losses, tax revenue losses, and other economic costs. This is the case in many regions across the State, including Contra Costa County, where communities are demanding protections to minimize adverse impacts from a sudden refinery closure. The recent PERI report provides many great policy tools to ensure a just transition for workers and communities. While CARB is not in charge of such programs, CARB should work with OPR, CalGEM, LWDA, and other agencies to ensure that the phaseout timeline cooperates with the just transition without compromising the ambition of what is possible.

Respectfully,

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