

March 16, 2018

Chair Mary Nichols and ARB Staff
California Air Resources Board
1001 I Street
Sacramento, CA 95812

RE: Comment Period, Preliminary Discussion Draft of Potential Changes to the Regulation for the California Cap on Greenhouse Gas Emissions and Market-Based Compliance Mechanisms

Dear Chair Nichols and Members of the Board:

Thank you for providing the opportunity to comment on the initial documents related to implementation of Assembly Bill 398 and Board Resolution 17-21. This rulemaking is critically important to the success of the Cap and Trade program. Finite Carbon is an active participant in the California compliance offset market and is currently developing 38 improved forest management projects for the program. We strongly support California's efforts to reduce GHG emissions through a market-based program, including the use of high quality carbon offsets. In its Preliminary Discussion Draft (PDD), the California Air Resources Board (CARB) highlighted a few policy and implementation issues for stakeholder input. Finite Carbon's recommendations are below.

Science Supports a Borderless Interpretation of Direct Environmental Benefit

We applaud CARB's statement in the PDD that science supports the idea that "a GHG reduction anywhere is a benefit everywhere." All projects developed according to CARB's rigorous carbon offset protocols – anywhere in the United States – reduce greenhouse gas emissions, mitigate the adverse impacts of global climate change, and provide a real and tangible direct environmental benefit to California. Interpreting "direct environmental benefits" to give preference to only projects that physically take place in California is contrary to science and inconsistent with the fundamental policy of furthering greenhouse gas reduction efforts.

CARB's understanding that the clause "direct environmental benefits" can be broadly viewed is a positive for California and the ecosystems which extend beyond its political boundaries. If CARB were to develop strict rules focused exclusively on political boundaries – not science – it would expose the program to legal challenges, potentially triggering new lawsuits against the program. This legal determination has, in fact, already been acknowledged by CARB in the original Cap and Trade staff report.¹ Retaining stability and minimizing legal uncertainty will incentivize additional offset projects that will provide benefits to California and its residents.

¹ <https://www.arb.ca.gov/regact/2010/capandtrade10/capv2appd.pdf> (Page 8, Comment D-46).

California Receives Direct Benefits from Projects Outside the State

We support CARB's acceptance of the legislative language that any project which can show "the reduction or avoidance of emissions of any air pollutant in the state or the reduction or avoidance of any pollutant that could have an adverse impact on waters of the state" has a direct environmental benefit (DEBs) on California.² Science has shown that emissions of GHGs outside the state have an adverse impact on California and its waters.³ The State of California has also recognized this. The State Water Board recently issued a Comprehensive Response to Climate Change that stated that "sharp rises in the atmospheric concentration of greenhouse gases" have caused many adverse impacts on California's waters including "declining snowpack and more frequent and longer droughts, more frequent and more severe flooding, changes in the timing and volume of peak runoff, and consequent impacts on water quality and water availability. Vulnerabilities of water resources include, but are not limited to, changes to water supplies, subsidence, increased amounts of water pollution, erosion, flooding, and related risks to water and wastewater infrastructure and operations, degradation of watersheds, alteration of aquatic ecosystems and loss of habitat, multiple impacts in coastal areas, and ocean acidification."⁴ The Resolution further states, "Mitigation, in the context of climate change, refers to actions taken to reduce the concentration of greenhouse gases in the atmosphere. The most effective way to reduce greenhouse gas concentrations in the atmosphere is to reduce emission sources." Noticeably, the Resolution does not say these reductions must take place in California and no distinction is made between in-state and out-of-state GHG sources.

California's waters do not follow strict political boundaries but span large watersheds encompassing multiple states. For example, the watersheds that supply drinking water to 80% of California's residents cover almost 157 million acres and span 8 states.⁵ Likewise, the rivers, streams and oceans comprising

² https://www.arb.ca.gov/cc/capandtrade/meetings/20180302/ct_pdd_02232018.pdf

³ U.S Environmental Protection Agency, What Climate Change Means for California, August 2016, *available at*: <https://www.epa.gov/sites/production/files/2016-09/documents/climate-change-ca.pdf>. The Environmental Protection Agency outlines the ways that increasing greenhouse gas levels have affected California's waters, including decreased snowpack and declining water availability due to decreased rainfall and increased evaporation rates, and notes that increasing temperatures and declining rainfall in nearby states have reduced the flow of water in the Colorado River, a key source of irrigation water in southern California.

⁴ State Water Resources Control Board, BOARD RESOLUTION NO. 2017-0012, Comprehensive Response to Climate Change, *available at*: https://www.waterboards.ca.gov/board_decisions/adopted_orders/resolutions/2017/rs2017_0012.pdf. The State Water Board's resolution also noted that impacts on water quality included, but were not limited to, "dry periods and drought lowering stream flow and reducing dilution of pollutant discharges, harmful algal blooms due to a combination of warm waters, reduced ability of warm water to hold dissolved oxygen, and nutrient pollution, more erosion and sedimentation caused by intense rainfall events, especially following wildfire, and increased velocity of stream flow, potential sewer overflows due to more intense precipitation and increased storm water runoff, rising sea levels inundating lowlands, displacing wetlands, and altering tidal ranges, and increasing areas subject to saltwater intrusion into groundwater, and water pollution and increased absorption of carbon dioxide creating coastal zone 'hotspots' of acidification and hypoxia."

⁵ Where Does California's Drinking Water Come From? Land Conservation and the Watersheds that Supply California's Drinking Water, The Nature Conservancy, October 2012, *available at*: https://www.nature.org/media/california/california_drinking-water-sources-2012.pdf. A study by The Nature

healthy salmon habitat stretch from California through the entire Pacific Northwest, including Oregon, Washington, and coastal Alaska.⁶ And thousands of waterfowl and migratory birds are dependent upon water and wetlands conditions throughout the Pacific Flyway, spanning 12 states.^{7,8} A project located in any one of these geographic areas should be considered one that provides direct environmental benefits to California and its residents.

These are just a few examples of how offset projects outside California could reduce or avoid GHGs that negatively impact California's waters, and thereby provide a direct benefit to California. A flexible and holistic approach to evaluating projects will make sure these projects are positively identified as benefiting California and its residents. Once a project has been determined to have a direct environmental benefit, we urge CARB to implement a streamlined system where substantially similar projects are awarded DEBs determinations with minimal additional time or expense.

The DEBs Analysis Should Only be Implemented for New Projects

The implementation of the DEBs evaluation for offsets will necessitate significant expenditures of time, energy, and money from all stakeholders in the offset market including CARB. We have serious concerns about CARB's proposal to retroactively evaluate over 90 million previously issued offset credits. California has long adhered to the basic rule that statutes operate prospectively unless the Legislature has clearly indicated it intended retroactive or retrospective application.⁹ In AB 398, there is no such express statement that it applies retroactively. Furthermore, this retroactive evaluation could cause serious market disruption. These compliance instruments are already in the marketplace, have influenced market expectations, have value, and represent early actions and investments by both the offset developer and the current offset owner. Applying AB 398 to existing projects that would not qualify as DEBs projects could significantly undermine the value of issued credits for such projects and subject them to a set of rules that did not exist when investment decisions were made. Since existing and pending projects may not receive a DEBs designation until 2021 or later, this could create unwarranted market volatility,

Conservancy found that California's drinking water supply system relies on approximately 157 million acres of land spanning 8 states - Arizona, Colorado, California, Nevada, New Mexico, Oregon, Utah, Wyoming, - to collect, filter, and deliver water.

⁶ <http://www.nmfs.noaa.gov/pr/species/fish/chinook-salmon.html>

⁷ <http://www.pacificflyway.gov>. The 4,000-mile-long Pacific flyway—one of four main routes in North America for migrating birds— includes the states of Alaska, Arizona, California, Idaho, Nevada, Oregon, Utah, Washington, Colorado, Montana, New Mexico, and Wyoming.

⁸ How Climate Change Affects Waterfowl: Flyway Impacts, Ducks Unlimited, *available at*: <http://www.ducks.org/conservation/public-policy/climate-change-and-waterfowl/how-climate-change-affects-waterfowl-flyway-impacts>. Climate change impacts include warmer temperatures in the Pacific Flyway, which would likely cause more precipitation to fall as rain rather than snow, leading to more extreme flood events in the winter, altering the timing, quantity, and quality of water in this region. It's observed that this may be particularly troublesome in California's Central Valley, a continentally important waterfowl wintering area where water shortages are already commonplace.

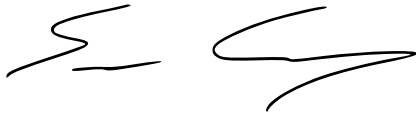
⁹ *Evangelatos v. Superior Court* (1988) 44 Cal. 3d 1188, 1207

speculation, and manipulation which could lead to direct environmental harm by dissuading new projects under development from completing the offset registration process.

Therefore, we recommend that the DEBs evaluation should only be applied to new projects. All offsets generated from projects listed prior to the finalization of this rulemaking should not be subject to the DEBs analysis and instead should be categorized in such a way that does not subject them to the new DEBs usage limitations imposed for offsets post-2020. This is consistent with the AB 32 principles of recognizing early action and the financial risks taken by early actors and will send a signal to capital sitting on the sidelines of emerging environmental markets that unforeseen changes will be carefully managed.

We thank you for your consideration and would be happy to answer any questions you may have.

Sincerely,

A handwritten signature in black ink, consisting of a stylized 'S' followed by a horizontal line and a flourish.

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