

Transportation Solutions Defense and Education Fund

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April 5, 2014
By E-Mail

Mary Nichols, Chair
Air Resources Board
P.O. Box 2815
Sacramento, CA 95812

Re: Proposed First Update to Climate Change Scoping Plan

Dear Ms. Nichols:

The Transportation Solutions Defense and Education Fund, TRANSDEF, is a California non-profit advocating for reducing greenhouse gases through the regional planning of transportation, land use and air quality. The Proposed First Update to Climate Change Scoping Plan ("Update") contains an amazingly comprehensive collection of well thought-through measures and programs. We appreciate its thorough and thoughtful approach to the challenges of climate change. However, our in-depth knowledge of two of the program elements raises doubts about the effectiveness of the overall program. We offer suggestions on improving confidence in the Plan:

Urgency for Action

We agree with the cited "need to stabilize at about 400 ppm CO₂e [the current atmospheric level] in order to likely avoid exceeding the 2°C threshold" (p. 14), and are convinced of the need for urgent action by the statement "Because of the cumulative effects of greenhouse warming and the inertia in the climate system, delaying efforts to reduce emissions will likely mean that global average temperature will increase by more than 2°C ..." (p. 15 of Update.) We are relieved to hear that mitigation of the four SLCPs could reduce near-term CO₂e levels enough (p. 18) to allow more time for a global reduction of CO₂ emissions. We urge ARB to set the reduction of emissions of these pollutants as its highest priority.

We agree that adopting interim goals will make program management and evaluation much more effective: "We need to meet strict, science-based targets not just in 2020 and 2050, but at every point in between, as well." (p. 38.)

Effectiveness of the First Scoping Plan

We vigorously applaud ARB for stating that "Progressing toward California's long-term climate goals will require that GHG reduction rates be significantly accelerated" (p. 6)

and "Emissions from 2020 to 2050 will have to decline several times faster than the rate needed to reach the 2020 emissions limit." (p. 37.) Operationalizing these statements, however, requires an understanding of the GHG reduction rates achieved by the first Scoping Plan. Unfortunately, the Update does not tease apart the emissions reduction contributions of the economic recession (p. 99) and historically high fuel prices. (p. 100.)

This Update has not established a causal connection between the first Scoping Plan and the reduction in emissions. For such a far-reaching and expensive program, a much greater level of scientific confidence in the effectiveness of the measures is needed. An analysis of VMT/ employed person and VMT/ \$CA GDP for target years before, during and after the recession would begin to point towards causation. Similarly, electrical consumption/ \$CA GDP before, during and after the recession would help determine how permanent (structural) these GHG reductions have become.

While the Update claimed to "measure progress towards the 2020 statewide limit" (p. 96), it offered no measurement of the Progress to Date of the Scoping Plan's measures. The Update's avoidance of quantification at the measure level was apparently a stylistic choice, but it harms the Update's ability to convey confidence that the Plan will achieve the state's goals.

The Update very much needs a compilation of the data readily available in the California Greenhouse Gas Report Card (p. 96). In addition, the Update desperately needs its own Table 2, Recommended Greenhouse Gas Reduction Measures, just like the first Scoping Plan, to set out expectations for all the proposed measures. An updated table should contain a column indicating progress to-date.

Energy

Feed-in tariffs have been extremely effective in spurring PV and wind resources in Germany. The Update should call for them to be adopted in California.

We see no justification for the continued expenditure of public funds for hydrogen infrastructure in support of automotive fuel cells. It is obvious that infrastructure costs make hydrogen a much more expensive transportation fuel than electricity. Because a new Governor took office after the initial Scoping Plan, the benefit/cost and viability of this program need to be reevaluated.

SCS Targets

The depth of quantitative information suggested above will be essential when the Board considers revising the regional GHG emissions reductions targets later this year. Given the MPOs' resistance to doing more to reduce emissions, a case for the statewide need for more reductions must be made if the targets are to be ramped up. As only 3.0 MMTCO₂e of the Scoping Plan's goal of 5 MMTCO₂e from Regional Transportation-Related GHG Targets was accomplished by the recent round of SCSs (2013 CA GHG Report Card, p. 24/41), setting a new goal requires the context of a data-rich Plan.

The Update is sorely lacking an evaluation of the political dimension of SCS planning. The low priority that SANDAG placed on its transit investments resulted in an EIR challenge to its SCS. The Bay Area's catering to single-occupant vehicles with its HOT lane program was a factor in its SCS EIR being challenged. In addition to disagreements on transportation investments, other members of the public are opposed to regional planning, *per se*. Because this contentiousness impacts the feasibility of this sector's proposed emissions reductions, the Update needs to discuss these issues.

High-Speed Rail

TRANSDEF is a transit advocacy organization. We strongly support passenger rail as a key low-carbon transportation mode of the future. We work towards the day when a tightly integrated Northern California rail network is connected to a tightly integrated Southern California rail network by high-speed rail. In theory, HSR is great. If designed with a direct-enough route, HSR could be built at a modest cost and run without an operating subsidy.

The actual project proposed by the HSR Authority, however, is seriously problematic: it is so expensive and overly long that it will need a subsidy to operate. It is highly unlikely that it can deliver the promised benefits. The project was developed in a process that was so politicized that the resulting design is not economic. As a result, the private sector is unwilling to invest, making it unlikely that more than a short segment in the Central Valley will ever be built.

Even as proposed, though, the project's construction emissions will make the project a net GHG emitter for two or more decades. Rather than debate the merits of the project here, we think the policy direction provided in the Update should simply be followed: "California must plan how best to invest the numerous sources of potential funding... and investing in areas that maximize GHG emission reductions and co-benefits. ... Funding should be focused on specific programs that can quickly and effectively support AB 32 objectives." (p. 119-120.)

The Authority produced a GHG report in response to a legislative mandate to identify the project's net GHG benefits. Despite an endorsement by ARB's Chair, this report (FN 72, p. 63) is so profoundly flawed that it cannot not be relied on by the Update as evidence for statements such as "It is projected to realize GHG emissions reductions its first year in operation, with annual increases in GHG emission reductions as the system expands." (p. 63. See attached in-depth analysis of the CHSRA report for why this statement--and any claims of GHG emissions reductions--are misleading and wrong.)

Obviously, a project that increases GHG emissions for the next several decades should not be an emissions reduction measure in the Scoping Plan. It also should not be funded with cap and trade auction revenues.

The HSR bond also made available nearly a billion dollars of funds to transit operators to connect with HSR. Unfortunately, the selection process was so politicized that some funded projects actually reduce connectivity. For example, San Francisco's Central

Subway project disconnects the Third Street light rail line from the Muni subway, forcing a long walk. Its GHG emissions reductions should therefore be suspect.

Caltrans

The external review of Caltrans, currently being conducted by the State Transportation Agency, found that Caltrans' mission is not compatible with the state's climate change policies. (See TRANSDEF letter, attached.) As part of ensuring plan feasibility, the Update should evaluate the profound institutional culture change that would be required for Caltrans to "consider lifecycle benefits and impacts (including environmental, construction, operation, and maintenance costs) for transportation infrastructure projects ... [and] increase investment in expanded transit and rail services." (p. 65.)

Freight Transportation

We offer additional questions for the list on p. 61: What are the determinants of the proportion of highway freight that can be shifted to rail? Could incentives be created that address these determinants, to achieve the secondary benefit of regained highway capacity? What would be the benefits and costs of electrification of freight railroads?

Agriculture

Because livestock is the biggest generator of methane (p. 24), this sector needs to be placed under the cap and trade regime. While this will undoubtedly be politically challenging, this "second most important anthropogenic GHG in the atmosphere" (p. 22) cannot be allowed to remain outside the control of the state's climate change program. Just like petroleum, the economics of meat production must be altered to reflect its significant impact on climate.

Water Supply

California needs more than policy on groundwater extraction. (p. 73.) The state needs regulation to deal with long-term supply concerns, land subsidence and fairness between neighbors.

The subsidies for agricultural water need to be rationalized as part of the implementation of conservation-oriented rate structures. Prices need to go up to incentivize efficient use. Vast quantities of water are lost through evaporation by daytime spray irrigation. This is able to continue only because excessive subsidies cushion the cost.

Waste

Please explain: "Efforts to expand urban-based waste recycling and reuse programs may have implications for the transportation, fuels, and land use focus area." (p. 77.)

Natural and Working Lands

We were surprised and alarmed to find that "emissions from wildfires, land use conversion, management practices, and other sources may significantly outweigh the current carbon uptake ability in this sector, as currently managed." (p. 80.) Sequestration must become a major state goal for its natural and working lands, as proposed for the Forest Carbon Plan.

We strongly agree that "Farmland and open space conservation can be an important policy to support the objectives of the Sustainable Communities Strategies, including reducing vehicle miles traveled. This could be accomplished by using incentives for conservation easements, supporting urban growth boundaries, and maintaining agricultural zoning." We support the convening of a climate investment working group, whose top priority should be to determine the additional funding needed to proceed with measures that are identified as near-term (e.g., wetlands restoration and tree planting).

Green Buildings

What is the statewide market penetration of LEED buildings? (p. 91.) What is the potential contribution of incentives, including PACE, and public education/marketing?

Short-Lived Climate Pollutants

We are very glad ARB has taken notice of research on the underestimation of fugitive methane emissions (p. 86) and is determining the appropriate regulatory response.

Copy Editing

The Update had excellent copy editing. The only error I spotted was "finical" instead of "financial." (p. 83.)

Conclusions

Our August 2, 2013 letter (attached) provided the Board with a more detailed set of suggestions on improving the Scoping Plan Update.

ARB faces difficult management challenges: proceeding with all these programs simultaneously, keeping them coordinated and integrated, setting priorities for the use of scarce incentive funding and fighting off inevitable political pressures that seek to distort the Plan, game it and take advantage of it. Preserving the effectiveness of the Plan will require steering these programs with strong science-based decision-making. The Plan deserves a meticulous and committed follow-through. We stand ready to assist.

Sincerely,

/s/ DAVID SCHONBRUNN

David Schonbrunn,
President

Attachments

2013 TRANSDEF letter on Scoping Plan Update
"Analysis of the CHSRA's GHG Report"