

From: [Sakazaki, Ryan@ARB](mailto:Sakazaki.Ryan@ARB)
To: [Sakazaki, Ryan@ARB](mailto:Sakazaki.Ryan@ARB)
Subject: RE: Technical Issues with Docket
Date: Tuesday, December 8, 2020 9:29:33 AM

From: Dan Chia <dchia@tesla.com>
Sent: Monday, December 7, 2020 7:37 PM
To: Gress, Jennifer@ARB <Jennifer.Gress@arb.ca.gov>
Subject: RE: shift to 9:45

Cheers, Dan

Tesla is directionally supportive of the Governor's Executive Order N-79-20 establishing a goal for 100 percent of in-state sales of new passenger cars and trucks to be zero-emission by 2035 and new medium/heavy duty trucks by 2045. Given the significant need to address the accelerating impacts of climate change Tesla believes the statewide the 2020 Mobile Source Strategy (MSS) should assess the feasibility of a more ambitious 2030 goal for all vehicle classes. At the very least, we request that CARB include 2030 scenarios for both LD and MD/HD in its sensitivity analysis.

Only through robust new standards and complementary programs will the state overcome the gap in ZEV deployment that CARB recognizes, as of now, "will only achieve approximately half of the 5 million ZEVs and PHEVs by 2030 directed in the Governor Brown's Executive Order B-48-18," and put the State on the path needed to meet its statutory climate requirements (See at 48-49).

Below, we comment on additional areas of the MSS.

At p. 50: Tesla strongly agrees with the finding that "BEVs have much lower emissions, and that for GHG emissions the difference is growing over time as emissions from producing electricity are expected to become lower." Indeed, this is precisely why the LD/MD/HD strategies should focus on establishing 100% EV sales by 2030.

At p. 52: Tesla notes that it is the only OEM with vehicles on the road in CA that has stood by the state and legally opposed the rollback of the federal CAFE and GHG standards and the Trump Administration revocation of the GHG and ZEV waivers.

At p. 58, NOx backsliding: As we stated in our comments responsive to CARB's September 2020 Advanced Clean Cars 2 workshop, Tesla supports keeping ZEVs in the baseline of the NMOG + NOx emissions standards (i.e., Option A). Failure to adopt an Option A regulation would unfairly penalize ZEVs by eliminating their NMOG credit generation and the incentive for ZEV adoption that averaging, banking, and trading creates. To ensure overall emissions reductions of the NMOG + NOx standard, the standard should set a declining fleet average that increases in stringency consistent with the projected levels of ZEV vehicle fleet penetration of 100% ZEV sales by 2030.

At p. 58, FCEVs penetration: CARB's proposed ratio of 90% BEVs vs. 10% FCEVs sales in 2030 seems unreasonable particularly since FCEVs only make up about 1% of ZEVs on the road today (as of 2019)

and 0.00024% of all LD vehicles. CARB defends this ratio by assuming that FCEV adoption will increase as fueling infrastructure expands. Today, there are only 42 LD hydrogen fueling stations theoretically servicing 6,933 FCEVs (as of 2019). Assuming 10% of 2019 new vehicle sales of about 2 million, FCEVs sales would have to reach 200,000 in roughly 9 years. This represents a 2757% increase from 2019 levels, which seems entirely unsupported by even the most optimistic sales forecasts.

At p. 58, eVMT of PHEVs: The PHEVs are assumed to have a percent eVMT of 48 percent (approximately less than 28 miles) in 2020 and 70 percent (or 52 miles) in 2030. This assumption is overly optimistic and should be reduced by at least 50%, consistent with a recent ICCT study finding that the real-world share of electric driving for PHEVs, on average, is about half the share considered in their type approval or certification standard. See: <https://theicct.org/publications/phev-real-world-usage-sept2020>

At p. 63, Accelerated Retirement: Tesla supports additional programs to accelerate LD vehicle retirement. In particular, OEMs should be incentivized to retire trade-in LD ICE vehicles in lieu of selling them at auction and extending their useful lives.

At p. 65: Scope of ACC 2 regulation. As we have previously stated in comments to CARB, we greatly appreciate our collaborative working relationship with CARB staff on the ACC2 rulemaking but respectfully ask that CARB carefully consider the potential negative impacts the proposed regulatory concepts may have on ZEV development particularly since BEVs inherently have zero emissions. Compliance with some of these concepts will likely lead to increased EV prices at the exact wrong time. For example, mandating a common charging connector type will increase the price of ZEVs while doing nothing to decrease emissions.

Thank you for considering our comments.