

**Comment 1 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 3rd Workshop.**

First Name: Yichao

Last Name: Guo

Email Address: yichao.guo@stellantis.com

Affiliation:

Subject: question on ZEV Assurance Proposals

Comment:

Slide 46 is too brief on ZEV Assurance Proposals.

Can you provide more details on:

Minimum warranty requirements,

Service information and data requirements, and

Vehicle and battery state-of health monitoring

Are they the same as 09/16/2020 workshop? Any updates since then?

Thanks.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-11 16:15:43

No Duplicates.

**Comment 2 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 3rd Workshop.**

First Name: Vanessa

Last Name: Warheit

Email Address: vwarheit@gmail.com

Affiliation: EV Charging Access for All

Subject: EJ concern: affordability of charging

Comment:

What is CARB doing to ensure equitable access to charging? Will the EJ credits be provided to charging infrastructure providers (EVSPs) as well as to EV manufacturers? The cost to charge an EV from home, using utility rates, is far less than the cost of gas -- but DC Fast Charging costs are on par with gas costs. It is important that low-income frontline communities not be unduly burdened with high-cost charging.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-11 16:08:22

No Duplicates.

## **Comment 3 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Vanessa

Last Name: Warheit

Email Address: vwarheit@gmail.com

Affiliation: EV Charging Access for All coalition

Subject: Additional Comments

Comment:

Here are some additional comments based on today's workshop:

- 1) Do not wait until 2026 to begin the EJ credits programs. Put these in place ASAP.
- 2) Do not use EJ credits to lower standards - this pits the climate issue against the imperative to address structural inequities. Maintain strict standards! Use some other incentive for EJ.
- 3) Include fleets in your incentive structure. Rental car fleets in particular need to be incentivized to electrify.
- 4) If NEVs no longer count toward OEM compliance, how will CARB ensure that NEVs continue to be electrified? This is particularly important for city 'meter maid' parking vehicles.
- 5) Lower the minimum range for compliance to 100 miles EPA rating. (As one example: our family has a long-range EV that we purchased new, and we are now in the market for a cheaper, short-range used EV as a second car, for which a 100-mile range is plenty.) If the mass market is pushing OEMs to create longer-range vehicles, it's extra important for CARB to ensure cheaper/lower range vehicles continue to be manufactured to serve lower-income drivers.
- 6) Mimicking the EU's limit of 150 GWP for refrigerants is not aggressive enough and based on out of date data. That EU law has been in effect since 2017; today there are many refrigerants on the market with GWP below 10.

Thank you for taking these comments!

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-11 17:54:29

No Duplicates.

**Comment 4 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 1st Workshop.**

This comment was posted then deleted because it was unrelated to the Workshop item or it was a duplicate.

## **Comment 5 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Christine

Last Name: Viterelli

Email Address: cviterelli@arvin.org

Affiliation: City of Arvin

Subject: Reducing Overall Emissions

Comment:

I think more needs to be done right now to forward the purchases and leases of BEVs. I have test-driven and researched multiple full electric vehicles, plug-in Hybrids, and SULEVs. An average person cannot afford even plug-in hybrid vehicles.

The plug-in hybrids are about \$ 10K more than a standard gasoline engine vehicle. They are all in the \$ 38,000- \$ 40,000 range. Moreover, when you look at the cost of BEVs, that price has skyrocketed. The least expensive BEV I test drove was \$ 45,000, and presently the dealerships are adding dealer mark-ups at a minimum of \$ 5,000, and I've seen dealer mark-ups as much as \$15,000 over MSRP. That is cost-prohibitive, and until these practices are stopped and more incentives are offered, there is virtually no incentive to the average consumer to purchase these vehicles. Additionally, the battery range tops out at around 225-250 miles per charge on the BEVs for the standard range. I am a strong supporter of fully electric vehicles and have gone to great lengths to transition after months of researching and test driving many clean cars. Still, most people do not have the means to afford a BEV to reduce their carbon footprint.

Also, the tax incentives must be increased, both on the State and Federal levels, if these goals of becoming fully electric by 2035 are to be achieved. I also think the \$40K cap for 2026 is unrealistic given the vehicles' cost.

Finally, people who live in attainment areas but work in non-attainment areas and drive in those areas daily are not getting enough incentives. They are still driving gasoline and diesel in non-air attainment areas, and their incentives are extremely limited due to where they reside.

I think more communication with automakers and dealers is needed as well. In my opinion, the dealers are increasing the cost of the vehicles in response to the incentives.

We need to be more realistic about lifting all criteria limiting incentives and looking at the big picture. Every electric and hybrid vehicle on the road is a win for reducing carbon emissions in California and addressing Climate Change.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-18 10:26:29

No Duplicates.

**Comment 6 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 3rd Workshop.**

First Name: Glenn

Last Name: Passavant

Email Address: gpassava@comcast.net

Affiliation: U.S. EPA, retired

Subject: Puff Loss Control

Comment:

please see attached

Attachment: [www.arb.ca.gov/lists/com-attach/7-accii-comments-w3-ws-BmUHblE+UnUBdVQ7.pdf](http://www.arb.ca.gov/lists/com-attach/7-accii-comments-w3-ws-BmUHblE+UnUBdVQ7.pdf)

Original File Name: Controlling Puff Loss Emissions GWP August 18 2021.pdf

Date and Time Comment Was Submitted: 2021-08-18 12:27:21

No Duplicates.

## **Comment 7 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Michael

Last Name: Nicholas

Email Address: mnicholas@hotmail.com

Affiliation:

Subject: Minimum onboard charger and convenience cord standards

Comment:

This comment is directed at two topics. First the proposed minimum onboard charging speed standards for BEVs and PHEVs should be increased. Second, the amperage that the convenience cord draws could be selectable to allow better use of home electrical circuits.

These are two separate issues. It seems in the proposed ruling that the same power minimums are applied to the onboard charger and the convenience cord - 5.76kW, but they could be different to address two different issues. The onboard charger should increase in power to enable faster public charging and to encourage faster charging to be installed. Whereas the convenience cord is most applicable to residential charging where existing dryer plugs can be used, or low-cost upgrades can be installed. In this case, circuits or electrical panels may not be able to handle higher power than 5.76kW. Owners may have to buy additional convenience cords if those supplied by the manufacturer are too high power. Simple changes to the requirements are low cost and allow more flexibility for charging to the first AND second owners.

First, some terminology for this comment. There are different voltages, amperages and power and it gets confusing to write about. The regulation is written in kW, but circuits are typically talked about in amperages. For example, 5.76kW refers to 24 amps at 240V with a 30 amp breaker. These are all relevant, but I'll use CAR AMPS (80% of breaker capacity) since we are talking about the interface between cars and infrastructure. Commercial voltage is 208V whereas home voltage is 120/240V. So, if I reference 24 amps this is equivalent to 5.8kW (or really 5.76kW) in regulation terminology. Here is a table to interchange between terms.

Breaker	amps	Car Amps	Voltage	kW
15	12	120	1.4kW	
15	12	208	2.5kW	
15	12	240	2.8kW	
20	16	208	3.3kW	
20	16	240	3.8kW	
30	24	208	5.0kW	
30	24	240	5.8kW*^	
40	32	208	6.6kW	
40	32	240	7.7kW@	
50	40	208	8.3kW	
50	40	240	9.6kW	
60	48	208	10.0kW	
60	48	240	11.5kW+	



- \* Current proposed regulation
- ^ Suggested selectable amperage for convenience cord
- @ Suggested minimum PHEV onboard charger standard
- + Suggested minimum BEV onboard charger standard

#### Onboard charger

Currently the suggested minimum onboard charger power is 24A. The minimum for BEVs could be 48A. The minimum for PHEVs could be 32A.

The primary rationale for this is that it will increase the use and effectiveness of public charging. Currently, the de-facto public chargers are 32A. This is fine for many situations. However, this speed is too slow to make plugging in worth it on short stops such as for a one-hour lunch. At 6.6kW only about 20 miles would be recovered. At 10kW, about 30 miles are recovered. Studies show that each mile recovered during charging may increase the likelihood of plugging in by 1.4% (<https://escholarship.org/uc/item/9c28789j>). Comparing 18 miles recovered to 30 miles recovered, for one hour of charging, the likelihood of plugging in increases by 17%. From an infrastructure perspective, two 48-amp chargers could theoretically take the place of three 32-amp chargers as long as cars were ideally plugged in. But any reduction in the number of chargers depends on the cars being able to accept higher power.

The rationale for PHEVs is the same, but given a battery size for the minimum 50 miles range in 2026, a 7.7kW minimum onboard charger speed may be more feasible. Since BEVs can fast charge at speeds greater than the proposed AC charging speed, this concern over accepting higher power from the onboard charger should be less of an issue.

By increasing minimum onboard charging speeds, meaningful range can be added to a car at a greater variety of location types such as grocery stores, restaurants, and other shopping where dwell time is often less than an hour. This is especially important for those with no home charging. By 2026, early adopters with home charging will be less of the market than they are today. Increasingly, renters and apartment dwellers with no home charging will be more common. Fast charging can be expensive to install, and is not necessary in many cases. But with low AC charging speeds, DC may be the only rational choice given time constraints. Homeowners with overnight charging may not typically need the faster onboard charging speeds and won't choose it as an option at purchase. However, this first-owner choice precludes the second owner from being able to take advantage of higher charging speeds. The second owner may be lower income and may rely on public charging more than the first owner. We can design cars to be useful to all owners.

Faster EVSE are beginning to appear already, and cars with faster charging ability are appearing as well, but only very slowly. Blink is deploying 64A chargers at some fast-food restaurants for example. In Europe more than half of all public chargers are between 11kW and 22kW. 64A in the U.S. is about 11kW as noted above. Many cars are built in Europe to take advantage of these available power levels suggesting complying in the U.S. would not be all that difficult. On the car side, Ford's f-150 lightning will charge at 80A. The Ford Mach e can charge at 48A. A minimum requirement for faster onboard AC charging speeds will amplify this trend and encourage the installation faster public AC charging. The

additional cost on the car side is expected to be in the low 100s of dollars (<https://neo.ubs.com/shared/dlwkuDlEbYPjF/>).

The current proposal for minimum charging speeds of 5.76kW will limit the public charging options drivers can take advantage of and limit the market for electric vehicles, especially for those with no home charging. If cars can't accept a certain power widely, public chargers with higher power won't be installed widely. Higher AC charging speeds are appropriate in several location categories, but if cars can't accept higher speeds, then cars will be the bottleneck at these locations.

#### Convenience cord

On the other hand, power may be limited in residential situations. A convenience cord with selectable amperage level will help those with home charging get the most out of their situation without buying an extra mobile charger. Currently, at least two manufacturers supply 240V convenience cords, however, the convenience cord is set to draw 32 amps. Many older homes and even newer homes can only safely draw 24A through a dryer plug. For these people, the supplied 32 amp cord is useless and a new convenience cord must be purchased for hundreds of dollars.

Many people will defeat the circuit protection by using a dongle which allows a 32 amp plug to plug into a 24 amp circuit causing potential fire danger. One manufacturer however allows selectable amperage via the car and via the convenience cord. Via the car, users can select any safe amperage on screen. And the convenience cord has dongles for different plug shapes (e.g. a 24 amp plug shape versus 32 amp plug shape). Each dongle communicates with the convenience cord indicating the safe amperage, and the convenience cord relays that information to the car.

In order to avoid hazardous situations and allow owners to take advantage of available amperage, charging amperage should be allowed to not exceed 24 amps using 4 possible compliance paths

1. Provide a single-speed convenience charger that signals to the car to not draw more than 24 amps
2. Provide a multi-speed convenience cord with selectable amperage via buttons on the convenience cord
3. Provide dongles that indicate safe charging amperage to the cord and car
4. Provide user selectable amperage via a car interface that allows the car to set default amperage less than the amperage signaled by the charger.

Options 3 and 4 are probably the best and safest options. This allows convenience cords to be 32 or even 40 amps while allowing the possibility to reduce amperage as needed.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-23 14:46:44

No Duplicates.

**Comment 8 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 3rd Workshop.**

First Name: Joshua

Last Name: Allen

Email Address: jallen900@yahoo.com

Affiliation: 5109406280

Subject: California Air Resource Board (Clean Cars II 2021 workshop)

Comment:

Pollution is not good, bad for ozone layer.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-08-24 15:56:12

No Duplicates.

**Comment 9 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws)  
- 3rd Workshop.**

First Name: Kelly

Last Name: Davis

Email Address: kdavis@ethanolrfa.org

Affiliation: Renewable Fuels Association

Subject: RFA comments Advanced Clean Cars II August 2021

Comment:

our comments are in file upload.

Attachment: [www.arb.ca.gov/lists/com-attach/10-accii-comments-w3-ws-UCIAYFY2V1sBZgBj.pdf](http://www.arb.ca.gov/lists/com-attach/10-accii-comments-w3-ws-UCIAYFY2V1sBZgBj.pdf)

Original File Name: RFA ACCII Workshop Comments\_090121.pdf

Date and Time Comment Was Submitted: 2021-08-31 12:24:03

No Duplicates.

**Comment 10 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Ruben

Last Name: Aronin

Email Address: ruben@betterworldgroup.com

Affiliation: Better World Group

Subject: Cost Modeling Workbook Comments & Recommendations

Comment:

Please find attached a letter from members of the California Clean Cars coalition representing consumer, scientific and environmental organizations.

Attachment: [www.arb.ca.gov/lists/com-attach/11-accii-comments-w3-ws-UDEHYIEzVloFalU8.pdf](http://www.arb.ca.gov/lists/com-attach/11-accii-comments-w3-ws-UDEHYIEzVloFalU8.pdf)

Original File Name: ACC II Coalition Final ARB cost modeling comments 8.6.21 .pdf

Date and Time Comment Was Submitted: 2021-09-01 11:56:33

No Duplicates.

**Comment 11 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Ruben

Last Name: Aronin

Email Address: ruben@betterworldgroup.com

Affiliation: Better World Group

Subject: Comments on Advanced Clean Cars II Equity Components

Comment:

Please find attached a letter from members of the California Clean Cars coalition representing environmental justice and environmental organizations.

Attachment: [www.arb.ca.gov/lists/com-attach/12-accii-comments-w3-ws-VjAFalI9BzUKYAdY.pdf](http://www.arb.ca.gov/lists/com-attach/12-accii-comments-w3-ws-VjAFalI9BzUKYAdY.pdf)

Original File Name: Final Comments on Advanced Clean Cars II Equity Components.pdf

Date and Time Comment Was Submitted: 2021-09-01 11:56:33

No Duplicates.

**Comment 12 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Angela

Last Name: Gibson

Email Address: angela@glaaacc.org

Affiliation: GLAAACC

Subject: Support for Advanced Clean Cars Project

Comment:

The Greater LA African American Chamber of Commerce lends its support to the clean cars project and offers suggestions.

Attachment: [www.arb.ca.gov/lists/com-attach/13-accii-comments-w3-ws-VjVcO1ckBDUEXVUm.pdf](http://www.arb.ca.gov/lists/com-attach/13-accii-comments-w3-ws-VjVcO1ckBDUEXVUm.pdf)

Original File Name: CARB Support Letter GLAAACC.pdf

Date and Time Comment Was Submitted: 2021-09-01 12:51:53

No Duplicates.



**Comment 13 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Daniel

Last Name: Witt

Email Address: DanielWitt@lucidmotors.com

Affiliation: Lucid Motors

Subject: ACC II August Workshop Comments

Comment:

Please find our comment letter attached. Thank you.

Attachment: [www.arb.ca.gov/lists/com-attach/14-accii-comments-w3-ws-UT0Fd1Y0VG4HZQ1W.pdf](http://www.arb.ca.gov/lists/com-attach/14-accii-comments-w3-ws-UT0Fd1Y0VG4HZQ1W.pdf)

Original File Name: Lucid\_ACC II August Workshop Comments.pdf

Date and Time Comment Was Submitted: 2021-09-01 13:43:17

No Duplicates.

**Comment 14 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Adam

Last Name: Lenz

Email Address: [adamlenz@waymo.com](mailto:adamlenz@waymo.com)

Affiliation: Waymo LLC

Subject: Advanced Clean Cars II - Waymo Comment Letter

Comment:

Please find attached Waymo's comments in response to the Advanced Clean Cars II workshop held on August 11, 2021.

Attachment: [www.arb.ca.gov/lists/com-attach/15-accii-comments-w3-ws-AWAFZ1UiUmAFbVU2.pdf](http://www.arb.ca.gov/lists/com-attach/15-accii-comments-w3-ws-AWAFZ1UiUmAFbVU2.pdf)

Original File Name: Advanced Clean Cars II - Waymo Comment Letter.pdf

Date and Time Comment Was Submitted: 2021-09-01 15:58:59

No Duplicates.

**Comment 15 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Meredith

Last Name: Alexander

Email Address: malexander@calstart.org

Affiliation: Calstart

Subject: Comments of Calstart, CEERT, Coalition for Clean Air & Sierra Club on ACC II  
Comment:

Attached is a comment letter addressing the need for LDV Fleet  
Purchase REquirements from CALSTART, CEERT, Coalition for Clean Air  
and the Sierra Club

Attachment: [www.arb.ca.gov/lists/com-attach/16-accii-comments-w3-ws-BmdWM1U3VVIRZQBf.pdf](http://www.arb.ca.gov/lists/com-attach/16-accii-comments-w3-ws-BmdWM1U3VVIRZQBf.pdf)

Original File Name: ACC 2 comment letter calstart et al.pdf

Date and Time Comment Was Submitted: 2021-09-01 16:39:02

No Duplicates.

**Comment 16 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Leah

Last Name: Silverthorn

Email Address: leah.silverthorn@calchamber.com

Affiliation: California Chamber of Commerce, et al

Subject: Advanced Clean Cars II Workshop Comments

Comment:

Comments on behalf of California Chamber of Commerce and TechNet

Attachment: [www.arb.ca.gov/lists/com-attach/17-accii-comments-w3-ws-UTAAAYIMkAjAAaFQ3.pdf](http://www.arb.ca.gov/lists/com-attach/17-accii-comments-w3-ws-UTAAAYIMkAjAAaFQ3.pdf)

Original File Name: Advanced Clean Cars II.Workshop Comments 9.1.21.pdf

Date and Time Comment Was Submitted: 2021-09-01 16:40:46

No Duplicates.

**Comment 17 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Chelsea

Last Name: Lee

Email Address: chelsea@betterworldgroup.com

Affiliation:

Subject: CA Clean Cars Coalition Overarching Comments on August 11th Workshop

Comment:

I am submitting this letter on behalf of a coalition of environmental justice, scientific and environmental leaders.

Attachment: [www.arb.ca.gov/lists/com-attach/18-accii-comments-w3-ws-UGkHLAAwUixRZVVk.pdf](http://www.arb.ca.gov/lists/com-attach/18-accii-comments-w3-ws-UGkHLAAwUixRZVVk.pdf)

Original File Name: 9-1-21 ACC II Cover Ltr Comments Final.pdf

Date and Time Comment Was Submitted: 2021-09-01 16:51:25

No Duplicates.

**Comment 18 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: Tiffany

Last Name: Roberts

Email Address: troberts@wspa.org

Affiliation: Western States Petroleum Association

Subject: ACC2 Comments

Comment:

Attached please find our comments on the August 2021 workshop.

Attachment: [www.arb.ca.gov/lists/com-attach/19-accii-comments-w3-ws-BXJVIF0sBDZWDwVm.pdf](http://www.arb.ca.gov/lists/com-attach/19-accii-comments-w3-ws-BXJVIF0sBDZWDwVm.pdf)

Original File Name: WSPA Comment Letter FINAL Aug 2021 Workshop.pdf

Date and Time Comment Was Submitted: 2021-09-01 21:35:58

No Duplicates.

## **Comment 19 for Advanced Clean Cars II Rulemaking (accii-comments-w3- ws) - 3rd Workshop.**

First Name: David

Last Name: Hamilton

Email Address: david@mightytreemovers.com

Affiliation: ISA-Intl Society of Arborculture

Subject: Restrictions on small owner/operator companies

Comment:

Hi,

My company owns a 1 truck company. It is a truck-mounted tree spade or tree moving machine. Please take into account some kind of exemption for small (non-fleet) trucking companies when designing and approving into law regulations that that would squash the little guy. I had to spend \$250K to buy a new truck from the last set of CARB laws. Any more expenses and I am outta CA.

Sincerely,

CA Native and Business owner and tree saver.

David Hamilton

CEO Mighty Tree MOvers

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-09-07 11:15:53

No Duplicates.

**Comment 20 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 3rd Workshop.**

First Name: john

Last Name: Tillman

Email Address: john.tillman@nissan-usa.com

Affiliation:

Subject: Nissan North America ACC2 Charge Interface Workshop Comments (9-21-2021)

Comment:

Nissan would like to submit the attached comments for the August 11 ACC2 workshop.

Attachment: [www.arb.ca.gov/lists/com-attach/24-accii-comments-w3-ws-WzVdMlAiBSVVMgdp.pdf](http://www.arb.ca.gov/lists/com-attach/24-accii-comments-w3-ws-WzVdMlAiBSVVMgdp.pdf)

Original File Name: Nissan North America ACC2 Charge Interface Workshop Comments (9-21-2021) - signed.pdf

Date and Time Comment Was Submitted: 2021-09-23 09:54:02

No Duplicates.



## **Comment 21 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Ellen

Last Name: Kennedy

Email Address: ellen.morrison.kennedy@gmail.com

Affiliation:

Subject: California Needs a Ramping Up EV Requirement for Rental Cars

Comment:

California is a pacesetter for low and zero emission transportation nationwide with the highest number of privately registered electric vehicles (EVs) in the country. Recognizing the serious impact that gas-powered transportation has on air quality and climate change, the state has mandated that as of 2035 all new cars and passenger trucks sold must be zero emission. Still, there is no policy to spur rental car fleets to go electric in the next fifteen years. Why is this important? Because "rental car companies are the largest purchasers of cars and trucks in the United States," so there is significant potential to influence future buyer behavior. After all, customers who rent a car "are 55% more likely to purchase a new vehicle within six months of their rental." Thus, California needs to mandate a minimum percentage, ramping up over time, for electric vehicles in rental car fleets to help introduce more used EVs into the market, encourage EV adoption, and clean up the air we breathe.

Attachment: [www.arb.ca.gov/lists/com-attach/25-accii-comments-w3-ws-VzxSMVE+Um9XNFUx.docx](http://www.arb.ca.gov/lists/com-attach/25-accii-comments-w3-ws-VzxSMVE+Um9XNFUx.docx)

Original File Name: Kennedy\_Ellen\_policy\_memo.docx

Date and Time Comment Was Submitted: 2021-10-08 13:58:31

No Duplicates.

**Comment 22 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Simon

Last Name: Mui

Email Address: smui@nrdc.org

Affiliation: Natural Resources Defense Council

Subject: Comments on ACCII Public Workshop

Comment:

Dear Mr. Cunningham,

On behalf of the Natural Resources Defense Council (NRDC), I am submitting these comments in response to the California Air Resources Board's on-line, public workshop on Advanced Clean Cars II held on October 13, 2021. We thank ARB for the opportunity to provide public comments.

Please feel free to reach out if you have any questions.  
Simon Mui

Attachment: [www.arb.ca.gov/lists/com-attach/26-accii-comments-w3-ws-VDpdKVYzWWkGXwJh.pdf](http://www.arb.ca.gov/lists/com-attach/26-accii-comments-w3-ws-VDpdKVYzWWkGXwJh.pdf)

Original File Name: NRDC Comments on ACC2\_October 2021 Workshop.pdf

Date and Time Comment Was Submitted: 2021-10-26 19:17:47

No Duplicates.

**Comment 23 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Sophie  
Last Name: Ellinghouse  
Email Address: sophie@wspa.org  
Affiliation:

Subject: WSPA Comments on Advanced Clean Cars II Regulation October Workshop  
Comment:

Hello,

Attached are WSPA's comments on the Advanced Clean Cars II Regulation October Workshop.

Thank you,  
Sophie Ellinghouse

Attachment: [www.arb.ca.gov/lists/com-attach/27-accii-comments-w3-ws-UwxTMwFpAz5XMAhk.pdf](http://www.arb.ca.gov/lists/com-attach/27-accii-comments-w3-ws-UwxTMwFpAz5XMAhk.pdf)

Original File Name: [Final] WSPA Comment Letter October ACC II Workshop.pdf

Date and Time Comment Was Submitted: 2021-10-27 12:49:34

No Duplicates.

**Comment 24 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Laurie

Last Name: Holmes

Email Address: lholmes@mema.org

Affiliation: MEMA

Subject: MEMA Comments on ACC II October Workshop

Comment:

Please find attached Motor & Equipment Manufacturers Association (MEMA) feedback to CARB on the ACC II October 2021 workshop.

Attachment: [www.arb.ca.gov/lists/com-attach/28-accii-comments-w3-ws-BmtTMANvWGpWD1c0.pdf](http://www.arb.ca.gov/lists/com-attach/28-accii-comments-w3-ws-BmtTMANvWGpWD1c0.pdf)

Original File Name: MEMA Comments to CARB ACC II Workshop October 27 2021 Final.pdf

Date and Time Comment Was Submitted: 2021-10-27 16:51:13

No Duplicates.

**Comment 25 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Daniel

Last Name: Witt

Email Address: DanielWitt@lucidmotors.com

Affiliation: Lucid Motors

Subject: Comments on October 13 ACC II Workshop

Comment:

Please see attached comment letter.

Attachment: [www.arb.ca.gov/lists/com-attach/29-accii-comments-w3-ws-BmpXJFc1AjhQMglW.pdf](http://www.arb.ca.gov/lists/com-attach/29-accii-comments-w3-ws-BmpXJFc1AjhQMglW.pdf)

Original File Name: Lucid 10-13 ACC2 Workshop Comments.pdf

Date and Time Comment Was Submitted: 2021-10-27 21:36:24

No Duplicates.

**Comment 26 for Advanced Clean Cars II Rulemaking (accii-comments-w3-  
ws) - 4th Workshop.**

First Name: Richard

Last Name: Vargas

Email Address: richarddvargas@yahoo.com

Affiliation: NONE

Subject: Opposition to this piece of proposed legislature.

Comment:

I would like to include my opposition to this piece of proposed legislature. California is already a very expensive state to live every year it gets more expensive to do anything in this state. This proposal will mandate that some of these older vessels be removed and replaced for newer vessels putting an outdoor activity that thousands enjoy out of our reach because vessel operators if they can afford to purchase new vessels will only pass on the cost to the consumer or they will go out of business all together. The sport fishing industry is a multi-million industry that not only employs vessel owners and operators but tackle shops, marinas, parking structures, hotels, restaurants, and various local shops to name a few and contributes to the overall economy. Imposing these mandates will not only have a devastating effect on vessel owners but entire community economies. The removal of a few older boats is not worth the economic burden it will create in some of these communities that depend on the fishing industry. The State of California should be focusing on ways to encourage more job creations not the depletion of well paying jobs.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-10-28 21:12:10

No Duplicates.

**Comment 27 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: David

Last Name: Reichmuth

Email Address: dreichmuth@ucsusa.org

Affiliation: Union of Concerned Scientists

Subject: Union of Concerned Scientists comments on the October ACCII workshop

Comment:

I am submitting the attached comments on behalf of the Union of Concerned Scientists in response to the October ACCII workshop. We thank CARB for the opportunity to provide comments and look forward to further discussions.

Sincerely,

David Reichmuth

Senior Engineer

Union of Concerned Scientists

Attachment: [www.arb.ca.gov/lists/com-attach/31-accii-comments-w3-ws-Wi9RNFQmUFwEYQJt.pdf](http://www.arb.ca.gov/lists/com-attach/31-accii-comments-w3-ws-Wi9RNFQmUFwEYQJt.pdf)

Original File Name: UCS comment on Oct 2021 ACCII Workshop.pdf

Date and Time Comment Was Submitted: 2021-11-03 17:54:30

No Duplicates.

**Comment 28 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Neil

Last Name: Koehler

Email Address: neil.koehler@kbe-llc.com

Affiliation: Renewable Fuels Association

Subject: RFA comments on October 13, ACC II Workshop

Comment:

RFA comments on October 13, ACC II Workshop attached

Attachment: [www.arb.ca.gov/lists/com-attach/32-accii-comments-w3-ws-WykCYIQ0UFwAZwNg.pdf](http://www.arb.ca.gov/lists/com-attach/32-accii-comments-w3-ws-WykCYIQ0UFwAZwNg.pdf)

Original File Name: RFA ACC II Comments 11-5-21.pdf

Date and Time Comment Was Submitted: 2021-11-05 10:32:53

No Duplicates.



**Comment 29 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: LANCE  
Last Name: TUNICK  
Email Address: tunick@vsci.net  
Affiliation: ACCII SVM GROUP

Subject: Comment of ACCII SVM GROUP  
Comment:

Dear sir or madam:  
Attached is the comment of the ACCII SVM Group, an ad hoc alliance of small volume manufacturers (SVMs).

The comment addresses the CARB proposals as presented at the October 2021 ACCII Workshop.

Sincerely,  
Lance Tunick

Attachment: [www.arb.ca.gov/lists/com-attach/33-accii-comments-w3-ws-VzYGY1w+AjhXOFMM.pdf](http://www.arb.ca.gov/lists/com-attach/33-accii-comments-w3-ws-VzYGY1w+AjhXOFMM.pdf)

Original File Name: ACCII SVM GROUP comment.pdf

Date and Time Comment Was Submitted: 2021-11-05 11:24:35

No Duplicates.

**Comment 30 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Zoe

Last Name: Bultman

Email Address: zbultman@rivian.com

Affiliation: Rivian Automotive, LLC

Subject: Advanced Clean Cars II October Workshop Comments - Rivian  
Comment:

Please find Rivian's comment letter attached. Thank you.

Attachment: [www.arb.ca.gov/lists/com-attach/34-accii-comments-w3-ws-VCZSPVUiVG4DZARq.pdf](http://www.arb.ca.gov/lists/com-attach/34-accii-comments-w3-ws-VCZSPVUiVG4DZARq.pdf)

Original File Name: Rivian\_Comments\_ACC2\_October\_Workshop.pdf

Date and Time Comment Was Submitted: 2021-11-05 14:03:45

No Duplicates.

**Comment 31 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Erin

Last Name: Rodriguez

Email Address: erodriguez@ucsusa.org

Affiliation:

Subject: ACCII comments

Comment:

Good afternoon,

Please find the comments attached.

Attachment: [www.arb.ca.gov/lists/com-attach/36-accii-comments-w3-ws-VDEFelMiVmALfwRw.pdf](http://www.arb.ca.gov/lists/com-attach/36-accii-comments-w3-ws-VDEFelMiVmALfwRw.pdf)

Original File Name: Expert Letter for Stronger ZEV Standards 11-5-2021.pdf

Date and Time Comment Was Submitted: 2021-11-05 15:34:34

No Duplicates.

**Comment 32 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: William

Last Name: Barrett

Email Address: [william.barrett@lung.org](mailto:william.barrett@lung.org)

Affiliation: American Lung Association in California

Subject: Comment on ACC II Workshop

Comment:

Please see attached.

Attachment: [www.arb.ca.gov/lists/com-attach/37-accii-comments-w3-ws-UDwBcgBvWW1SCwNi.pdf](http://www.arb.ca.gov/lists/com-attach/37-accii-comments-w3-ws-UDwBcgBvWW1SCwNi.pdf)

Original File Name: Lung Assn ACC 2 workshop comments 11.5.21.pdf

Date and Time Comment Was Submitted: 2021-11-05 15:47:14

No Duplicates.

**Comment 33 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Adam

Last Name: Lenz

Email Address: [adamlenz@waymo.com](mailto:adamlenz@waymo.com)

Affiliation: Waymo

Subject: Advanced Clean Cars II - Waymo Comment Letter

Comment:

Please find attached Waymo's comments in response to the Advanced Clean Cars II workshop held on October 13, 2021.

Attachment: [www.arb.ca.gov/lists/com-attach/38-accii-comments-w3-ws-UCdTNAZ+V2kKYwBf.pdf](http://www.arb.ca.gov/lists/com-attach/38-accii-comments-w3-ws-UCdTNAZ+V2kKYwBf.pdf)

Original File Name: Waymo Comment Letter - Advanced Clean Cars II .pdf

Date and Time Comment Was Submitted: 2021-11-05 15:50:15

No Duplicates.

## **Comment 34 for Advanced Clean Cars II Rulemaking (accii-comments-w3- ws) - 4th Workshop.**

First Name: Anthony

Last Name: Trujillo

Email Address: ate2001@sbcglobal.net

Affiliation:

Subject: CARB lies about EVs efficiency

Comment:

Carb lies about EVs efficiency. In ARB/MSD/7-6-94 CARB claims that battery efficiency is 80%. This is not true!! Charging efficiency depends on the charge time. From Joule's Law if charged in one hour

it would be

$80 \times 100 / 20(8/t)(8/t) + 80$  since  $t = 1$  hour this is 5.88%

If charged in less time it would be much less!!

It also claims the motor efficiency to be 90%. This is impossible!!

Every time the motor starts it's efficiency is near ZERO because it is a constant volt time area device, and when starting both frequency and voltage are near zero!! The system is also near zero when the motor starts.

1 The leakage inductance cannot limit the starting current.

2 The magnetizing branch of the motor shunts the load because of the low frequency. The motor efficiency depends on the number of stops!!

3 When the motor starts the system efficiency is also near ZERO because the voltage drop across the inverter semiconductors is almost the same as that of the motor because it is startin at a low voltage!!

4 the high motor starting current hurts the battery efficiency and diminishes it's ampere hour capacity because of the high current.

Attachment:

Original File Name:

Date and Time Comment Was Submitted: 2021-11-05 16:06:59

No Duplicates.

**Comment 35 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Adam

Last Name: Lenz

Email Address: [adamlenz@waymo.com](mailto:adamlenz@waymo.com)

Affiliation: Waymo

Subject: Advanced Clean Cars II - Waymo Comment Letter

Comment:

Please find attached Waymo's comments in response to the Advanced Clean Cars II workshop held on October 13, 2021.

Attachment: [www.arb.ca.gov/lists/com-attach/40-accii-comments-w3-ws-Wi0HYFAoWWdXPIAP.pdf](http://www.arb.ca.gov/lists/com-attach/40-accii-comments-w3-ws-Wi0HYFAoWWdXPIAP.pdf)

Original File Name: Waymo Comment Letter - Advanced Clean Cars II.pdf

Date and Time Comment Was Submitted: 2021-11-05 19:45:39

No Duplicates.

**Comment 36 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Eileen

Last Name: Tutt

Email Address: eileen@caletc.com

Affiliation: CalETC

Subject: Comments

Comment:

See attached.

Attachment: [www.arb.ca.gov/lists/com-attach/41-accii-comments-w3-ws-AWJQNwRpUWdWJAFi.pdf](http://www.arb.ca.gov/lists/com-attach/41-accii-comments-w3-ws-AWJQNwRpUWdWJAFi.pdf)

Original File Name: CalETC ACCII Workshop Comments October 2021 Final.pdf

Date and Time Comment Was Submitted: 2021-11-08 08:32:04

No Duplicates.



**Comment 37 for Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) - 4th Workshop.**

First Name: Jim

Last Name: Metropulos

Email Address: jim.metropulos@asm.ca.gov

Affiliation: California Legislature

Subject: Advanced Clean Cars II Rulemaking

Comment:

Please accept this letter on behalf of Assemblymember Friedman and other members of the CA Legislature.

Attachment: [www.arb.ca.gov/lists/com-attach/42-accii-comments-w3-ws-UTBRNFEzWWNSPQVa.pdf](http://www.arb.ca.gov/lists/com-attach/42-accii-comments-w3-ws-UTBRNFEzWWNSPQVa.pdf)

Original File Name: ACCII\_legletter\_CARB\_11.05.2021.pdf

Date and Time Comment Was Submitted: 2021-11-08 08:46:51

No Duplicates.

**There are no comments posted to Advanced Clean Cars II Rulemaking (accii-comments-w3-ws) that were presented during the Workshop at this time.**