

March 9th, 2022

VIA ELECTRONIC FILING

Joel Creswell
Climate Policy Section Manager
Washington Department of Ecology
P.O. Box 47600
Olympia, WA 98504-7600

RE: Rulemaking - Informal Comment Period for Chapter 173-424 WAC, Clean Fuels Program Rule

Dear Mr. Creswell:

On behalf of the undersigned companies, we are pleased to provide comments on the development of Washington's Clean Fuels Program (CFP). We appreciate the opportunity to engage with the Department of Ecology (ECY) in this process, and we are encouraged by the diligent work that ECY has done to establish a program that is consistent with the intent of E3SHB 1091 and the Agency's leadership in identifying opportunities to learn from other clean fuel programs.

Introduction

With the right program design, state clean fuel programs – such as Washington's CFP – can create strong incentives for the adoption of electric vehicles (EVs) and investment in EV charging infrastructure, and can reduce the carbon intensity of the electricity used to charge EVs. These programs are most successful when they accurately account for the emissions reductions achieved by powering EVs with low-carbon electricity.

EV manufacturers can play a particularly valuable role in maximizing the benefits of these programs. First, they can collect certain operating data from EVs via on-board telematics and battery management systems, including charging data that may be used to support clean fuel program credit generation. The data collected through these systems provide an accurate measure of the kilowatt-hours (kWh) used during vehicle charging sessions. These data allow for a reliable accounting of the amount of electricity used as a transportation fuel, which in turn offers unique program value in residential settings where 80-90% of charging takes place today. EV manufacturers may therefore facilitate the verification of the environmental impact of the CFP, and including charging data as a distinct program attribute, as ECY proposed as an option

during its recent Stakeholder Meeting on January 27th, 2022, will help ECY avoid significant data errors that are otherwise known to exist.¹

Furthermore, EV manufacturers are especially capable of using participation in clean fuels programs to support a more rapid transition to electric transportation. EV manufacturers have collectively committed to investing hundreds of billions of dollars in EV technology by 2025 and to bringing compelling EV products to market. EV manufacturers enjoy strong relationships with their customers and act as primary distributors of information regarding the myriad benefits of EVs, including the environmental and operating-cost advantages, and are therefore well positioned to reinvest CFP revenue in initiatives that accelerate EV adoption. A program that creates direct incentives for EV manufacturers to accelerate the sale of EVs in Washington would leverage that unique customer relationship.

Credit Generation for Residential EV Charging: Three Options Presented by ECY

During the “Clean Fuels Program Rule Stakeholder Meeting” on January 27th, 2022, ECY staff presented three options for credit generation for residential EV charging. Although EV manufacturers are particularly well positioned to help accelerate EV adoption, and vehicle technology is the principle source of emissions reductions associated with electricity used as a transportation fuel (as described below), we support the third option as a compromise and a more inclusive approach that will increase the likelihood of a successful program overall, bringing together EV manufacturers, electric utilities, and backstop-aggregators as credit generators for residential EV charging. Such a model for credit generation recognizes the unique contributions each of these core stakeholders make to the overall emissions reductions associated with EV adoption. We encourage ECY to implement a version of this third option.

This mechanism for credit generation for residential EV charging under Washington’s CFP would accomplish the following foundational objectives of the CFP:

- Accelerate EV adoption and emissions reductions by involving and incentivizing the core stakeholders most directly responsible for driving emissions reductions, or, as ECY described in its presentation, the “actors in the fuel life cycle”;
- Provide for increased data integrity and more accurate accounting of emissions reductions by using *actual* residential charging data available from the vehicles; and,
- Recognize and reward *all* emissions reductions associated with electricity used as a transportation fuel, including by using accurate estimates for emissions reductions for which data is not available, to maximize the incentive value of the CFP and the impact it may have.

¹ See: Fiona Burlig, et al, “Low Energy: Estimating Electric Vehicle Electricity Use”, Harris School of Public Policy and Energy Policy Institute, University of Chicago and NBER (<https://haas.berkeley.edu/wp-content/uploads/WP313.pdf>).

Clear Benefits to “Option Three”

As proposed, **the third option** described by ECY staff would accomplish the objectives described above by:

- Facilitating the direct participation of EV manufacturers, utilities, and back-stop aggregators in the CFP;
- Incentivizing EV manufacturers to install and maintain data reporting capabilities to improve the CFP’s accuracy and, by extension, the environmental integrity of the overall program; and,
- Enabling credit generation for all residential EV charging by incorporating a methodology for estimating total residential EV charging that uses real data (as described above), ensuring the program is comprehensive.

Significant Drawbacks to “Options One and Two”

The first option described by ECY staff would not best support EV adoption and emissions reductions as it is not inclusive of the key mitigating component towards GHG emissions reductions, the EV manufacturer. It would also fail to make Washington’s CFP as accurate as possible, which may call into question the veracity of the emissions reductions associated with the program.

The second option described by ECY would similarly exclude core “actors in the fuel lifecycle” from the CFP. Furthermore, installation of residential utility submeters to collect charging data would likely be expensive and struggle to achieve sufficient coverage to provide a high degree of accuracy in the CFP; using CFP to incentivize the installation of such meters when EV manufacturers are already capable of providing comparable data is unnecessary and not cost effective.

For these reasons, we view the third option as providing the most cost efficient, accurate, and inclusive approach to credit generation, which will result in a robust CFP, as noted by ECY on slide 23.

Credit Generation for Residential EV Charging: Other Considerations

We encourage ECY to consider an apportionment of credits generated under the third option that comes closer to reflecting the proportional contribution of each stakeholder to the program’s outcomes. In the example presented by ECY staff in the Stakeholder Meeting, an EV manufacturer may receive a maximum of 25% of credits generated for residential EV charging, if the EV manufacturer can provide data from more than 90% of registered vehicles. While we support this option in concept, we believe a more balanced allocation of credits between the EV manufacturers, utilities, and the backstop aggregators would be more consistent with each stakeholder’s role in accelerating EV adoption and the associated emissions reductions.

The data provided by EV manufacturers is valuable to the program in that it allows for substantively improved accounting across all stakeholders: such data may be used to make a statistically sound determination of the average electricity used for all residential EV charging. This benefit is only made possible because EV manufacturers have the capability to collect and aggregate vehicle charging data, incurring a direct cost to do so. Therefore, to encourage greater reporting, EV manufacturers should be eligible to receive as much as 45% of credits generated, proportional to the amount of charging data they supply. The table below summarizes our proposed modification to the ECY proposal.

Residential EV Charging Option 3 - Example from Jan 27 Workshop								
EV charging data provision by OEM, %	%	0	15	30	45	60	75	90
Elec. Utility share of EV charging credit, %		100	98.5	94	89	81	73	64
OEM Share of EV charging credit, %	70	0	1.1	4	8	13	19	25
Backstop Aggregator share of EV credit, %	30	0	0.4	2	3	6	8	11
Total EV Charging credit, in %		100	100	100	100	100	100	100
Residential EV Charging Option 3 - New Proposal								
EV charging data provision by OEM, %	%	0	1 to 15	16 to 30	31 to 45	46 to 60	61 to 75	76 to 100
Elec. Utility share of EV charging credit, %		100	87.5	76.0	66.0	57.5	50.5	45.0
OEM Share of EV charging credit, %		0.0	10.0	19.0	27.0	34.0	40.0	45.0
Backstop Aggregator share of EV credit, %		0	2.5	5.0	7.0	8.5	9.5	10.0
Total EV Charging credit, in %		100	100	100	100	100	100	100

An allocation like what we have proposed here would better align with each stakeholder's relative contributions and therefore result in a more successful program. As ECY staff described, both EV manufacturers and utilities contribute to the emissions reductions associated with EV adoption: EV manufacturers contribute battery system and electric motor technology that materially enhances the efficiency of EVs compared to internal combustion engine (ICE) vehicles, as well as data capabilities that enable verifiable reporting, and electric utilities contribute cleaner electricity and the associated infrastructure used to charge those EVs.

The enhanced efficiency of EVs compared to ICE vehicles contributes to as much as a 70% reduction in energy use and, all else being equal, emissions associated with vehicle miles traveled.² Even in Washington, where the electric grid is generally served by lower carbon intensity sources of electricity, vehicle technology developed by the EV manufacturers is the primary driver of EV adoption and associated emissions reductions. In other words, these emissions reductions would not be possible without the significant investments EV manufacturers have made in battery system and electric motor technology that make inherently more efficient EVs a viable and desirable alternative to ICE vehicles.

² See: 1) [US Department of Energy, Office of Energy Efficiency and Renewable Energy, "Where the Energy Goes: Electric Cars"](#). 2) Kelly, C., Pavlenko, N. "Assessing the potential for low-carbon fuel standards as a mode of electric vehicle support" International Council on Clean Transportation (ICCT), 2020.

Furthermore, both EV manufacturers and utilities are well positioned to reinvest revenue from credit generation in initiatives that will accelerate EV adoption in Washington. In California, EV manufacturers have used California Low Carbon Fuel Standard revenue to support initiatives ranging from investments in charging infrastructure, to smart charging management, to investments in new low carbon electricity projects in rural parts of the State.

There is no clear technical or practical justification for allocating a higher percentage of residential EV charging credits to electric utilities. Emissions reductions from adoption of EVs would not be possible without EV manufacturers, nor would such reductions be possible without electric utilities. Like ECY, we believe that both EV manufacturers and electric utilities can contribute to EV adoption and emissions reductions in unique and important ways, and we therefore encourage ECY to allocate credits between the stakeholder groups in a more balanced way.

Conclusion

The undersigned strongly support ECY's approach to credit generation under the CFP for residential EV charging as outlined in its "Option 3". To best support the program's objectives, the CFP should incentivize the principal stakeholders that can affect outcomes relevant to those objectives. In addition, to ensure program integrity and accurate accounting, data accuracy should be a paramount consideration. Finally, by structuring the CFP so that it is as comprehensive as possible will ensure all emission reductions associated with electricity used as a transportation fuel are recognized and the impact of the program is maximized. A version of Option 3 will result in this outcome and will have the greatest positive impact on EV adoption and emissions reductions.

We thank you again for the opportunity to provide comments regarding the development of Washington's LCFS program. We appreciate the thoughtfulness of staff's approach to the development of the CFP rules and look forward to continued deliberation in support of a program that will best help Washington accomplish its climate and EV adoption goals.

If we can provide additional information or further support your efforts, please contact any of the undersigned.

Sincerely,

[Signature Page Follows]



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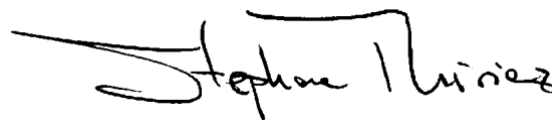
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