POET
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January 7, 2022

Cheryl Laskowski
Chief, Transportation Fuels Branch
California Air Resources Board
1001 I Street
Sacramento, CA 95814

RE: Comments on Public Workshop to Discuss Potential Future Changes to the LCFS Program

Dear Ms. Laskowski:

POET, the world's largest producer of biofuels, is pleased to submit comments in response to the California Air Resource Board's ("CARB's") December 7, 2021, Public Workshop relating to Potential Future Changes to the LCFS program. POET strongly supports CARB's dedication to the decarbonization of the transportation sector and believes the low-carbon fuel we produce will play an integral role in CARB's decarbonization strategy.

These comments respond to issues raised in the workshop presentation and suggest other ways the LCFS should be modified to maximize its greenhouse gas ("GHG") reduction potential.

I. About POET

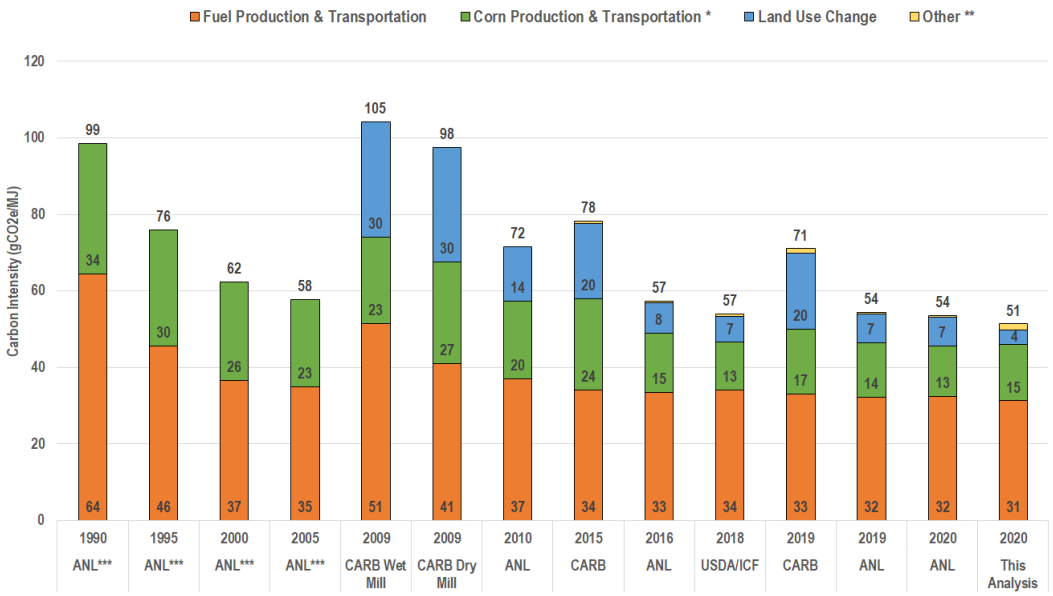
POET's mission is to be a good steward of the Earth by converting renewable resources to energy and other valuable goods as efficiently as humanly possible. POET owns and operates 33 bioethanol plants and is the world's largest producer of plant-based biofuels with three billion gallons of annual production capacity. Started in 1987, the company currently operates in eight states and markets biofuels and renewable co-products in the U.S. and internationally. In 2019, Fast Company recognized POET on its annual list of "Most Innovative Companies" for transportation, and FORTUNE recognized POET on its list of companies that are changing the world. While the scope of our vision has grown, we remain focused on reducing reliance on petroleum products, revitalizing global agriculture, and providing cleaner, affordable alternatives to fossil fuels.

II. POET Thanks CARB for Recognizing the Role of Bioethanol in LCFS Success and Believes that Bioethanol is Poised to Continue to Contribute to Decarbonization

POET is pleased that CARB recognized the role of bioethanol in the LCFS program's success during the workshop presentation. As CARB noted, bioethanol has effectively displaced fossil fuels to reduce net GHG emissions. In 2020, bioethanol continued to be the largest source of LCFS compliance by volume and the second-largest source by number of credits.

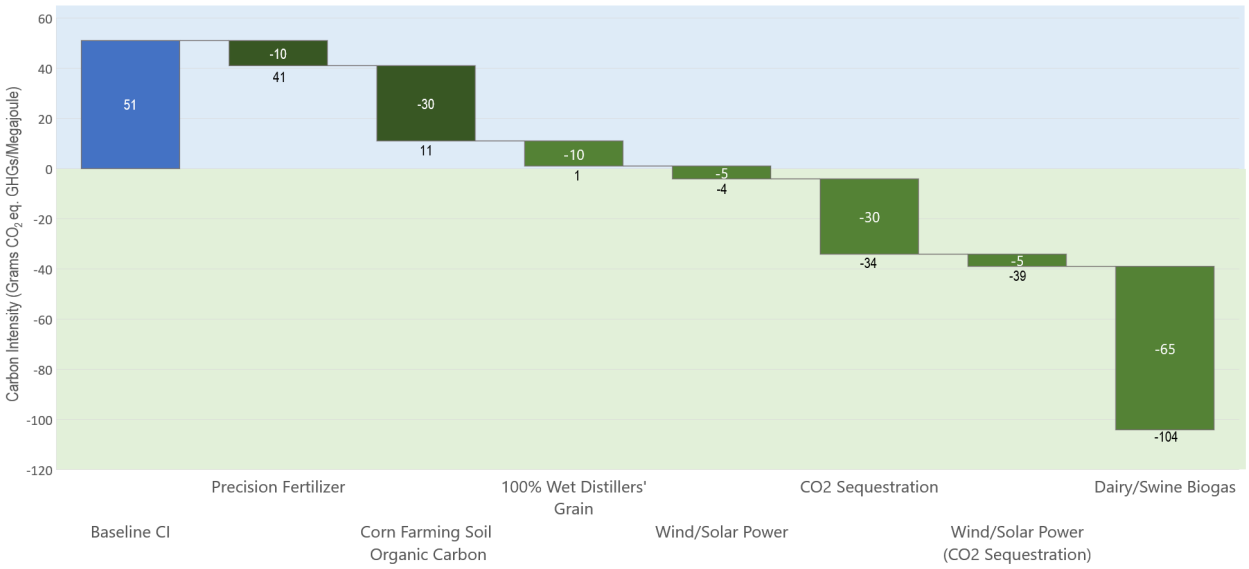
Further, bioethanol is poised to make even greater contributions to the LCFS program moving forward. As shown in the chart below, a recent analysis by Scully *et al.*[1] shows that bioethanol carbon intensity ("CI") values have decreased over time.

[1] Sully, Melissa *et al.*, *Carbon intensity of corn ethanol in the United States: state of the science*, 2021 Environ. Res. Lett 16 043001, 4 (2021), https://iopscience.iop.org/article/10.1088/1748-9326/abde08.



* Corn Production & Transportation includes farming, feedstock transport, and co-product credit.
** Other less significant emission categories account for fewer than 2 gCO_2e/MJ.
*** Models did not incorporate land use change.

With technologies already being implemented or on the cusp of commercialization, bioethanol has the ability to become a zero-carbon fuel.



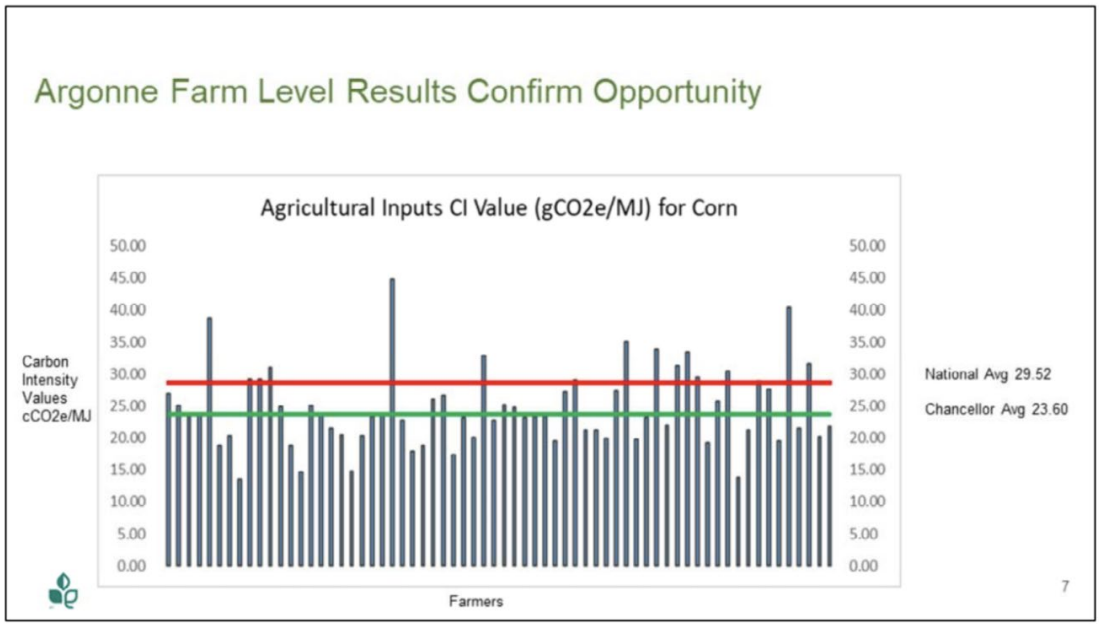
While POET is aware that there is disagreement over aspects of bioethanol's CI, several things are clear: bioethanol has been a key part of the LCFS program's success, bioethanol producers are working hard to lower their product's CI in ways that can meaningfully reduce national and global GHG emissions, and bioethanol is poised to remain a key element of the low-carbon fuels market for decades to come.

III. CARB Should Incentivize Sustainable Low-Carbon Farming Practices

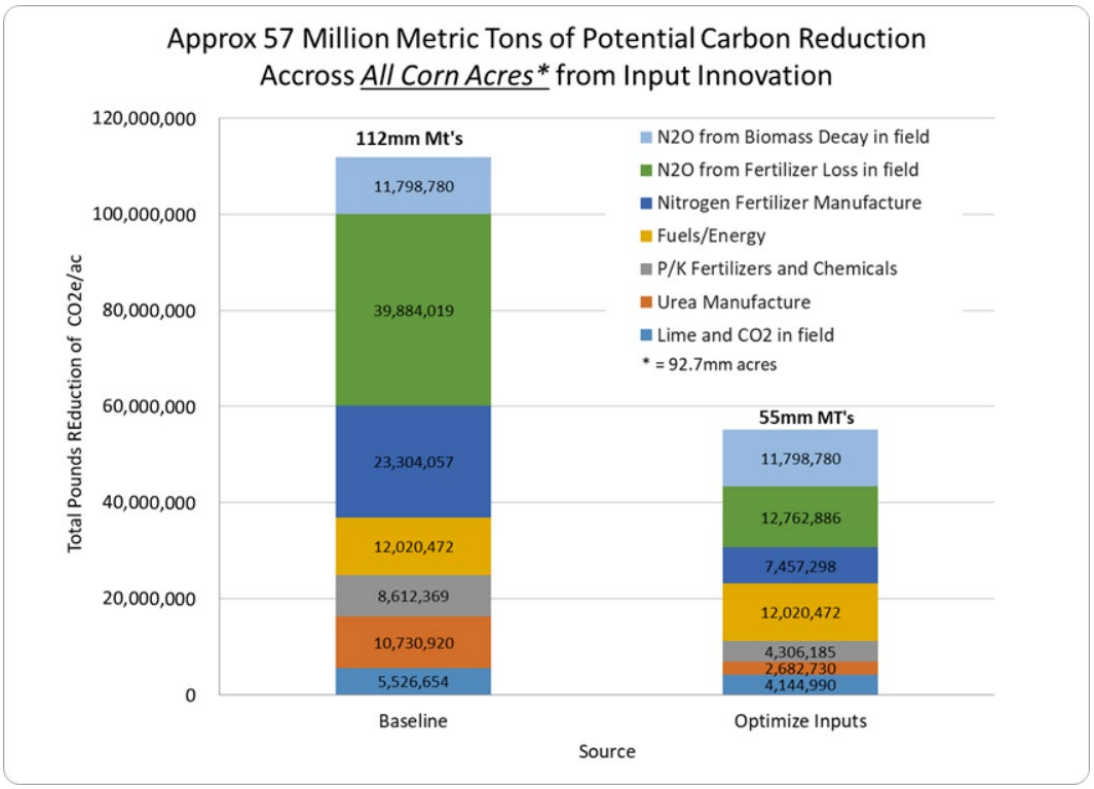
In its workshop presentation, CARB noted that many stakeholders had requested consideration of site-specific agricultural inputs in fuel pathway lifecycle analyses. POET, in fact, presented on this topic at a CARB workshop in October 2020. POET is among the stakeholders who believe that CARB is in a position to incentivize enormous changes in the agricultural supply chain that would lead to significant reductions in agricultural GHG emissions. By allowing site-specific agricultural inputs, CARB can encourage reduced agricultural GHG emissions through readily available technologies such as better tillage practices and nitrogen and biodiversity management, as well as incentivize the agricultural supply chain to reduce GHG impacts in new and innovative ways.

Gradable illustrates the potential GHG emissions reductions achievable through sustainable farming. POET worked with the Farmers Business Network and Argonne National Labs to create Gradable, a pilot program to encourage sustainable farming, validate data inputs, and calculate CI scores for agricultural inputs.

Gradable's trial involving 64 area farms supplying corn to POET–Chancellor resulted in a 25% reduction in GHG emissions from corn cultivation and farm energy use compared to the assumptions embedded in CA-GREET:



Gradable illustrates that CI values are highly sensitive to different agronomic practices, even within the same area with similar soil types and weather patterns. This suggests that if farmers had the incentive to engage in such practices, widespread adoption of low-CI farming practices could readily result in CI reductions. The prospect of extrapolating these lessons to the entire industry is worthy of CARB's focus in this rulemaking process. The below graphic illustrates the potential carbon reduction possible with sustainable farming techniques.



POET encourages CARB to include a pathway for "identity-preserved" feedstocks (i.e., those used by renewable fuel producers because of their verifiably lower CI characteristics) in its LCFS proposed rule. Below are amendments POET suggests could be made to California's LCFS program to provide greater regulatory certainty regarding the recognition of the value of innovative lower CI farming practices:

- **17 C.C.R. § 95488.1(d)(7)** – Tier 2 pathway requirements: Amend to identify use of identity-preserved feedstocks as an innovative production method.
- **17 C.C.R. § 95488.7(a)(2)** – Tier 2 pathway registration requirements: Amend to address requirements specific to how a lifecycle analysis report should reflect low-CI feedstocks that may be subject to fluctuation year-to-year.
- **17 C.C.R. § 95488.7(d)** – Certification for Tier 2 pathways: Amend to address steps CARB must take for certification of a Tier 2 pathway that relies on low-CI feedstocks for the calculated CI score.
- **17 C.C.R. § 95488.8(g)** – Specified Source Feedstocks: Amend to include low-CI feedstocks as an enumerated specified source feedstock and to address requirements applicable to a producers' use of low-CI feedstocks, e.g., feedstock transfer documents.
- **17 C.C.R. § 95500** – Verification: Amend to include applicable verification requirements. Verification of CI reductions associated with innovative farming practices is important both for the pathway holder/renewable fuel producer and CARB. The biofuel producer must be able to substantiate all inputs into the fuel's CI score and must have arrangements in place to ensure the practices undergirding the CI score associated with the feedstock are followed. The agency could build upon the LCFS's existing verification requirements through use of audits and farming data analytics (or other available data) to ensure the verification step appropriately extends to the feedstock level.

Other commenters may encourage CARB to include assessments of soil organic carbon ("SOC") in farming related CIs and to credit farms that sequester carbon in the form of SOC. POET agrees that SOC is a potential tremendous reservoir to sequester CO_2 emissions. However, we also understand that some have pointed to technological challenges in measuring SOC and SOC fluctuations over time. If CARB believes that current SOC measurement methodologies are too unreliable to be included in farming CI scores, POET strongly encourages CARB to allow for individually tailored farming CIs for other farming inputs (such as those mentioned in the above discussion of Gradable) in its rulemaking and to return to the consideration of SOC at a later date.

CARB has expressed concern that allowing site-specific agricultural inputs could result in a leakage problem where projects with low-CI farming practices would report site-specific data while projects with higher emissions would report average values. The LCFS program's success illustrates that industry will follow market incentives toward compliance. To that end, POET recommends that feedstocks not participating in the identify-preserved program could be assigned a CI value of the default CA-GREET score with an adder or multiplier supplementing the CI value to correct for this leakage effect. This will send the appropriate market signal to farmers, incentivizing them to adopt individualized scoring and the accompanying sustainable farming techniques that reduce scores. Even in the absence of a multiplier or adder, however, POET believes that average CI values for farming practices will decrease as lower CI farming practices gather momentum and usage. If the LCFS program's farming practices average values are accurate and updated periodically, leakage will not be a significant issue because the widespread adoption and standardization of lower-CI farming practices will drive the down the average.

IV. CARB Should Update the CA-GREET Model to Reflect Best-Available Science on Land Use Change

In its workshop presentation, CARB noted that many stakeholders have requested that CARB reevaluate CI values associated with land use change ("LUC"), and that it is open to considering new data and research related to this topic. While POET understands that CARB has heard a diversity of views on LUC, POET does not believe that the divergent positions deserve equal weight. POET believes that the body of scientific evidence, when vetted for evidentiary basis and analytical rigor, clearly indicates that CARB's prior LUC assessments with respect to corn starch bioethanol are too high, skewing the LCFS program's incentives.

More specifically, current scientific literature indicates that California's LCFS 2019 iteration of GREET (CA-GREET3.0) overstates CI values for LUC for corn starch bioethanol. While CA-GREET's model incorporates a LUC value of 19.8 gCO2e/MJ, the best-available scientific literature supports far lower values of approximately 4 gCO2e/MJ taking into account direct and indirect LUC. Some studies go further and indicate biofuel production does not induce any ILUC.[2]

Since 2008, scientific assessments of LUC associated with corn starch bioethanol production have changed substantially. These studies have shown downward trends in LUC carbon impacts:[3]

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[2] Kim S, Dale BE. 2011. *Indirect land use change for biofuels: Testing predictions and improving analytical methodologies.* BIOMASS AND BIOENERGY, 35(7):3235-3240. 10.1016/j.biombioe.2011.04.039; Kline KL, Oladosu GA, Dale VH, McBride AC. *Scientific analysis is essential to assess biofuel policy effects: In response to the paper by Kim and Dale on "Indirect land-use change for biofuels: Testing predictions and improving analytical methodologies"*. (10):4488-4491. 10.1016/j.biombioe.2011.08.011.

[3] Sully, *supra* note 1 at pg. 6.

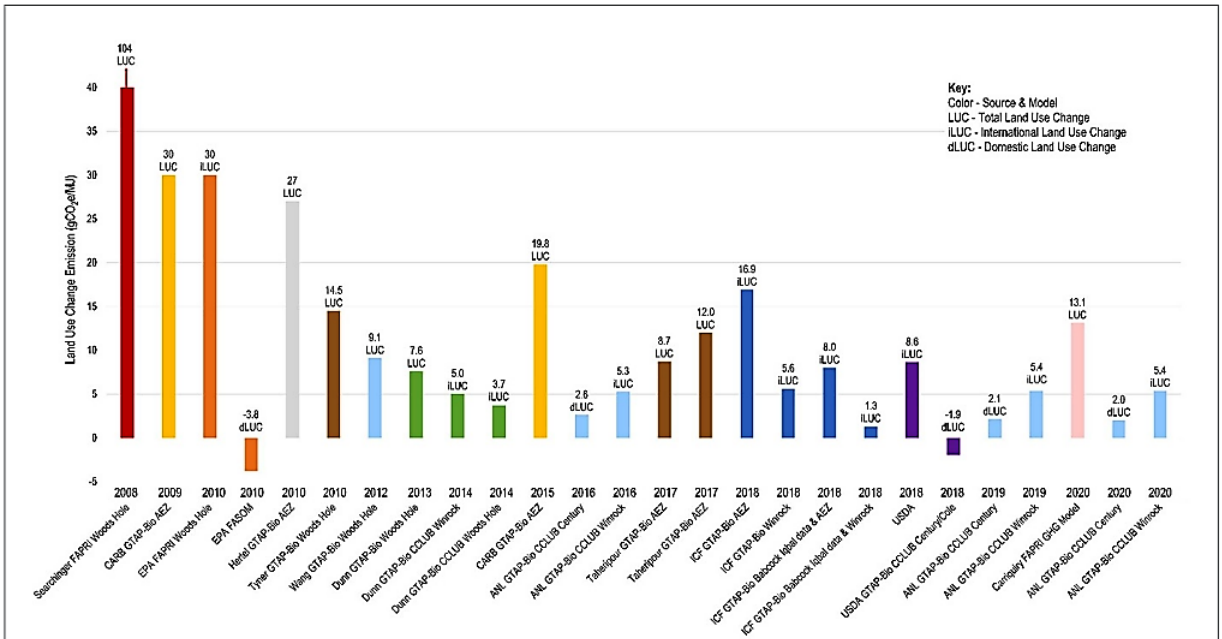

Figure 2. Timeline of estimated GHG emissions associated with corn ethanol-related LUC, 2008–2020.

LUC estimates are now converging on substantially lower estimates than those established through CARB's prior analysis in the March 2015 Staff Report on ILUC values.[4] Specifically, reliable analyses of LUC impacts generally draw from the GTAP agro-economic model, and have consistent approaches to the economic baseline year (2004), incorporation of yield price elasticity (of approximately .25), and, significantly, address the concept of land intensification.[5] Scientific literature supports that land intensification, producing greater volumes of a crop or multiple crops on existing land, is a key factor in appropriately assessing LUC.[6] Studies indicate that from 2005 to 2012 during which the United States experienced a significant increase in bioethanol production, the surge in harvested crop was due primarily to land intensification rather than conversion of land to agricultural uses both domestically and internationally.[7] Land intensification, a critical model feature, is not currently addressed in CA-GREET3.0.

POET strongly encourages CARB to engage in additional dialog on LUC now rather than putting off such analysis to the future. As discussed in greater detail below, bioethanol's CI value has wide-ranging impacts beyond the simple incentivization of bioethanol use. LUC corrections can allow the LCFS program to become more stringent and allow bioethanol-derivatives to access hard to decarbonize sectors such as aviation more easily.

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[4] California Environmental Protection Agency Air Resources Board, *Staff Report: Calculating Life Cycle Carbon Intensity Values in Transportation Fuels in California,* (March, 2015), https://ww2.arb.ca.gov/sites/default/files/classic//fuels/lcfs/peerreview/050515staffreport_ca-greet.pdf.

[5] *See* e.g., Rosenfeld J, Lewandrowski J, Hendrickson T, Jaglo K *et al.*, *A Life-Cycle Analysis of the Greenhouse Gas Emissions from Corn-Based Ethanol.*, ICF (2018) (under USDA contract No. AG-3142-D-17-0161); Taheripour F, Zhao X, Tyner WE, *The impact of considering land intensification and updated data on biofuels land use change and emissions estimates.* BIOTECHNOL. BIOFUELS, (2017) DOI: 10:191. 10.1186/s13068-017-0877-y.

[6] Sully, *supra* note 1 at pg. 7.

[7] Babcock BA, Iqbal Z, *Using Recent Land Use Changes to Validate Land Use Change Models,* CARD Staff Reports (2014); Taheripour F, Cui H, Tyner WE, *An Exploration of agricultural land use change at the intensive and extensive margins: implications for biofuels induced land use change*, BIOENERGY AND LAND USE CHANGE:19-37 (2017a).

V. In Order to Maximize the Greenhouse Gas Reduction Potential of Bioethanol, CARB Should Approve E15 as a Fuel in California and Take Further Measures to Promote Flex Fuel Vehicles

To maximize the potential for bioethanol to reduce greenhouse gas emissions in California, CARB should complete the process it has begun to approve E15 as a fuel in the state. California is one of only three locations in the nation that currently does not allow the sale of E15 (the others are Montana and the greater Phoenix metropolitan area). By expanding the market for the largest source of compliance by almost 50% in California, E15 would ease compliance burdens and even allow CARB to set more stringent GHG reduction goals in coming years under the LCFS.

For the last several years, CARB has been undertaking a multimedia analysis of E15 to ensure that its introduction will not have unanticipated environmental consequences. While CARB has not yet finalized its analysis, POET believes that the results of the analysis show positive net environmental impacts due to E15, such as reductions in PM emissions.[8] So these additional environmental benefits can be realized, CARB should finalize the multimedia evaluation and then update its fuel specifications to allow for the sale of E15.

Additionally, bioethanol has historically sold at rates below petroleum-based gasoline. Bioethanol enjoys an additional price advantage in California due to the LCFS credit market and its lower CI. Thus, all consumers in the state, including those in disadvantaged communities, stand to benefit economically through access to more affordable transportation fuel options, like E15.

Further, CARB should undertake measures to incentivize the production of flex fuel vehicles ("FFVs") in California. While POET understands that California is looking to electrify its passenger vehicle fleet, complete electrification will take decades. In the interim, CARB should seek to take as much petroleum out of the liquid fuel supply as possible. FFVs provide a means to accomplish this end. Because FFVs can take almost any level of bioethanol, they allow consumers to respond to the incentives established by the LCFS and choose higher biofuel blends. Additionally, utilizing renewable naphtha as the blendstock in biofuel blends instead of petroleum creates a 100% renewable fuel. While CARB is shrinking the pool of available liquid fuel to eradicate petroleum from the transportation system, it should also enable the replacement of as much petroleum as possible with low carbon biofuels in FFVs.

VI. CARB Should Recognize the Importance of Bioethanol as It Seeks to Harmonize with Federal Policy Relating to Decarbonization and Aviation

POET agrees that CARB should attempt to harmonize with the federal government's policies on decarbonization, both with respect to restoring the role of bioethanol in RFS compliance and the promotion of sustainable aviation fuel.

With respect to the former, bioethanol has long played a key role in RFS compliance with the largest number of RINs generated by bioethanol derived from corn starch. In its recent proposed rule, EPA is increasing RFS volumes closer to those called for by Congress and laying the groundwork for continued recognition of bioethanol as a significant type of renewable fuel. Through its policymaking, CARB should act in a manner consistent with federal policies promoting bioethanol use.

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[8] *See* Kazemiparkouhi, Fatemeh *et al.*, *Comprehensive US database and model for ethanol blend effects on regulated tailpipe emissions*, SCIENCE OF TOTAL ENVIRONMENT (2021), https://www.sciencedirect.com/science/article/pii/S0048969721065049.

The federal Administration's policies on sustainable aviation fuel also point to a potential long-term role for bioethanol in hard-to-decarbonize markets. A number of companies are deriving ways to turn bioethanol into jet fuel, and the Department of Energy has recently conducted significant research on the potential for bioethanol to jet conversion.[9] As such, CARB's policies with respect to bioethanol no longer impact only the passenger vehicle sector, but also impact aviation fuel and other potential fuel derivatives of bioethanol.

Therefore, CARB must ensure that the CI values associated with corn starch bioethanol are accurate. Assigning CI values for corn starch bioethanol not only impacts the light-duty fuel mix, but also impacts the availability and attractiveness of bioethanol-based jet and other derivatives.

VII. CARB Should Update Its Modeling Tools to Reflect the Best Available Science with Respect to Corn Starch Bioethanol

POET wholeheartedly agrees with CARB's commitment to using the best available science and data. To further this commitment, in its workshop presentation, CARB proposed a number of adjustments to its CI models to reflect changes in technology and data. POET believes that two additional model changes would further CARB's commitment to the best available science and data in the LCFS.

A. CARB Should Allow User-Defined Process Chemical Usage for Bioethanol Pathways

CARB should modify its Tier 1 simplified calculator's treatment of process chemicals used in bioethanol pathways. The current CARB calculator does not allow the pathway applicant to specify use of low-CI process chemicals, which distorts the CI value of POET's bioethanol. Specifically, POET's patented BPX process uses a less carbon-intensive group of chemicals than most bioethanol producers. A simple change to the Tier 1 calculator to allow user-defined process chemical usage could cure this inaccuracy. This modification would be consistent with the calculator's accommodation of a variety of other user-defined inputs from denaturant to feedstock transportation distance. As with all CI inputs, verification requirements would apply to user-defined process chemical usage, allowing the verifier and CARB to ensure claimed CI reductions are accurate.

B. CARB Should Distinguish Between Electricity Usage in Wet and Dry DDGS Pathways

Next, we recommend a minor correction to the CA-GREET model's treatment of wet versus dry DDGS produced at the same facility. Specifically, the CA-GREET model distinguishes between wet and dry DDGS pathways for the use of thermal energy but does not do so with regard to electricity usage. Electricity usage for production of wet DDGS is demonstrably lower than that needed to produce dry DDGS. Accordingly, POET recommends that CARB distinguish between electricity usage in wet and dry pathways as the CA-GREET model does with thermal energy.

VIII. CARB Should Undertake Other Changes to the LCFS to Maximize Its Greenhouse Gas Reduction Potential

In addition to the items identified above, CARB should modify the LCFS program in a number of additional respects to maximize the program's ability to reduce greenhouse gases.

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[9] *DOE Announces Nearly $65 Million for Biofuels Research to Reduce Airplane and Ship Emissions*, DEPARTMENT OF ENERGY (2021), https://www.energy.gov/articles/doe-announces-nearly-65-million-biofuels-research-reduce-airplane-and-ship-emissions.

A. CARB Should Recognize Off-Site Renewable Energy Production for Bioethanol Plants

California LCFS regulations prohibit use of indirect accounting mechanisms to demonstrate production of fuel using low-CI process energy.[10] Instead, the regulations require that renewable energy generation equipment be "directly connected through a dedicated line" to the fuel producer's facility.[11] This is technically infeasible for many producers and stymies their use of low-CI electricity to produce lower-CI fuels.

To drive growth in renewable energy generation and facilitate lower-CI fuel production, CARB should remove this regulatory barrier. POET recommends that CARB allow producers to demonstrate use of low-CI process energy through means such as power purchase agreements and book and claim accounting. Recognition of off-site renewable energy production as a means to reduce GHG emissions is common in carbon markets. CARB should use its authority to encourage more renewable energy use in the transportation supply chain, not just with respect to certain fuel types. This would incentivize the generation of low-CI energy through large-scale renewables projects, thereby reducing the transportation sector's lifecycle GHG emissions.

B. CARB Should Expand Emissions Avoidance Credits to Beyond Dairy and Swine Manure

California's LCFS program offers avoidance credits for GHG emissions reductions associated with the installation of biogas control systems for manure management on dairy cattle and swine farms.[12] CARB should expand this program to include other farm animals such as beef cattle. Expanding the program to additional farm animals would incentivize fuel production entities to utilize biogas from nearby farm animals as energy sources for fuel production. Increased usage of biogas from nearby farm animals would reduce fuel production emissions, lowering lifecycle GHG emissions in California's transportation sector.

C. CARB Should Allow for Energy Allocation to Non-Fuel Products

In response to the COVID-19 crisis, a number of bioethanol producers have entered the market for non-fuel bioethanol, and we expect the diversity of biorefined products to increase over time. In many cases, the creation of alternate types of biorefined products, including technical grade bioethanol, will require the utilization of additional processing steps and energy. We encourage CARB to ensure that its CI model does not allocate the energy used for non-fuel product production to biofuels. Doing so would discourage biofuels producers from innovating in new markets where they could supplant petroleum products and reduce GHG emissions.

IX. CARB Should Modify Its CCS Regulations to Expand the Number of Projects that Can Take Advantage of the Program

California's LCFS currently provides a pathway for credit generation for a variety of carbon capture and sequestration ("CCS") projects. Application of CCS at bioethanol plants has been lauded by some as one of the lowest cost and commercial-ready sequestration opportunities.[13] In part, this is because many bioethanol plants already capture CO_2 from the bioethanol fermentation process for use in a variety of commercial products from food processing to beverage manufacture. POET is currently the fifth largest producer of commercial CO_2 in the country.

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[10] *See* 17 C.C.R. § 95488.8(h).
[11] *Id*. § 95488.8(h)(1)(B).
[12] *Livestock Projects*, California Air Resources Board (last visited Nov. 18, 2021), https://ww2.arb.ca.gov/our-work/programs/compliance-offset-program/compliance-offset-protocols/livestock-projects.
[13] *See, e.g*., D. Sanchez et. al., *Near-term deployment of carbon capture and sequestration from biorefineries in the United States,* PROCEEDINGS OF THE NAT'L ACADEMY OF SCIENCES (2018), https://doi.org/10.1073/pnas.1719695115.

A. CARB Should Expand the Carbon Sequestration Credit to Include Beneficial Reuse of CO_2

In addition to carbon sequestration, POET believes that CARB should grant CI credit to projects that beneficially reuse CO_2 such as the capture and use of fermentation CO_2 for commercial purposes. Indeed, the International Sustainability & Carbon Certification ("ISCC") system and Europe's Renewable Energy Directive ("RED") recognize the carbon reduction value of carbon capture and reuse ("CCR").[14] A modest change to the CA-GREET calculator could address this. For example, the RED II recognizes CCR carbon reductions when "it can be proven that the CO_2 replaces fossil-derived CO_2 which is used in the production of commercial products and services." RED II requires that an auditor affirm whether the requirements have been met.[15] Additionally, the federal Internal Revenue Service 45Q tax credit for CCS allocates credit for CCR.[16] The CA-GREET calculator could mirror the 45Q federal tax credit, awarding CI credit to entities that obtain IRS approval under the 45Q tax credit for CCR.

B. CARB Should Allow CCS Operators to Assume Long-Term Liability for the CO_2 Leakage

The California LCFS's CCS Protocol contains detailed regulatory requirements for parties to generate LCFS credits from CCS projects. Given the nascency of this industry, a variety of business arrangements may be contemplated between fuel producers, others generating CO_2 emissions that may be sequestered, and entities with sequestration expertise. In particular, renewable fuel producers generating LCFS credits for CCS may partner with a CCS company to ensure permanent sequestration of emissions. In this scenario, under the California LCFS regulations, only the "alternative fuel producer" may "receive CCS credits," but both parties must "jointly" file a CCS project application.[17]

The CCS Protocol places a variety of additional regulatory requirements related to well and plume monitoring, recordkeeping, post-injection site care, etc., on a "CCS Operator." The Protocol defines a "CCS Operator" as "the operator responsible for the CCS project," where a "CCS project" is defined as "the overall CCS project operations, including those of the CCS capture facility and geologic sequestration site and activities."[18] It would be helpful for CARB to clarify that where separate entities control (1) the CCS capture facility and (2) the sequestration facility and activities, the "CCS Operator" is the party responsible for the geologic sequestration site and all related activities. This regulatory clarification is consistent with CCS Project Operator's responsibilities under the CCS Protocol (e.g., geologic site characterization, monitoring, operation of injection wells, post-injection site care and closure). In contrast, the sole role of the fuel producer is to provide the CO_2 for injection.

Significantly, this clarification would apportion liability for CO_2 leakage to the party that actually controls CO_2 sequestration activities. Such a distinction would give fuel producers greater confidence in engaging in carbon sequestration projects where they do not have ultimate control over sequestration activities.

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[14] *See* ISCC 205, § 4.3.7, https://www.iscc-system.org/wpcontent/uploads/2017/02/ISCC_205_GHG_Emissions_3.0.pdf; RED, Annev V (C)(15) ("Emission saving from carbon capture and replacement, eccr, shall be limited to emissions avoided through the capture of CO2 of which the carbon originates from biomass and which is used to replace fossil-derived CO2 used in commercial products and services.").

[15] Department for Transport, *Renewable Transport Fuel Obligation Guidance Part Two Carbon Sustainability,* 67, (2020), https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment_data/file/942790/rtfo-guidance-part-2-carbon-and-sustainability-guidance-2020.pdf.

[16] 26. U.S.C. § 45Q(f)(5) (2021).

[17] 17 C.C.R. § 95490(a), (c).

[18] *Carbon Capture and Sequestration Protocol under the Low Carbon Fuel Standard, California Air Resources* Board, https://ww2.arb.ca.gov/sites/default/files/2020-03/CCS_Protocol_Under_LCFS_8-13-18_ada.pdf, 9 (emphasis added) (2018).

X. CARB Should Act with All Due Haste to Update LCFS Regulations

As CARB is aware, the time is ticking for climate action. Each incremental unit of petroleum consumed threatens to intensify the dangers of climate change. In the workshop presentation, CARB indicated that administrative law provisions in California may prevent LCFS updates from being effective before 2024. If that is the case, POET strongly urges CARB to enact the changes suggested in this letter by that date. Failure to do so will under-utilize this important tool in greenhouse gas reduction.

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POET strongly supports CARB's LCFS Program. We appreciate CARB's consideration of these comments and look forward to engaging in a productive dialogue with CARB on the LCFS program and the role biofuels play in helping California achieve its GHG reduction goals. If you have any questions, please contact me at Michael.Walz@POET.COM and (202) 756-5602.

Sincerely,

Michael Walz
Vice President of Public Affairs
POET, LLC