April 23, 2018

Via Electronic Submittal to: https://www.arb.ca.gov/lispub/comm/bclist.php

California Air Resources Board 1001 I Street Sacramento, CA 95814

RE: RPMG Comments on 2018 LCFS Proposed Regulatory Package

Dear CARB Board Members and Transportation Fuels Branch Chief Sam Wade,

RPMG, Inc. (RPMG) is a biofuel marketing company representing our owner and marketing partner ethanol facilities located throughout the Midwest. Our combined operations provide both ethanol and distillers corn oil (DCO) as essential inputs to the California fuels market. Since the program's inception over a decade ago, we have supported California's clean transportation fuel policy, including the LCFS through focus on innovation and its real-world impacts. To date corn-based biofuels (ethanol and DCO Biodiesel) are directly responsible for more than 50% of the program's carbon reductions as measured by carbon credit generation. We believe there are still plenty of benefits that can be provided by our industry so long as a level market playing field is maintained. RPMG respectfully requests that the Board direct staff to continue working on the following identified issues through a 15-day amendment process.

Cost vs. Benefit of the Proposed Rule

RPMG recommends the Board direct staff to analyze the issue of increased costs compared to participation in the program, and work to neutralize and minimize their impacts on stakeholders. The examples throughout this comment letter highlight a pattern of the regulation which is to be very conservative at a cost to the producer and to the program. This overly conservative approach presents a cost structure that is punitive. Those new, additional, and yet unknown costs, coupled with a market pricing benchmark in which full CI credit generation potential based on the annual standard are not realized, squeeze low carbon ethanol economics from both sides. Midwest corn ethanol has been a stalwart component of the LCFS, and shall continue to be moving forward, but the cost structures presented send a very strong negative signal to all low carbon fuel producers.

The proposed regulation creates significant additional market barriers to fuel providers. These barriers come in several forms. The proposed LCFS adds costs and regulatory risk to biofuel producers while at the same time removes incentives to incrementally innovate or benefit from actual efficiency gains.

RPMG recommends that the CARB Board direct staff to revisit fuel neutrality, the Buffer Account, CI pathway substantiality requirements and firm rotation in an effort to rebalance the regulation. This is not a balanced regulation. The proposal has removed the reasonable risk vs. reward equation of the current program. Instead of a fuel-neutral program that rewards innovation, the current proposal is unapologetically weighted toward promoting electrification while simultaneously penalizing low carbon alternative liquid fuel economics.

The promise of incremental CI reductions has led to lower and lower ethanol CI scores. These incremental reductions provided the immediate financial gains needed for producers to think more creatively and

encourage the large CI reductions envisioned by CARB staff. That invest/reward relationship is missing from this proposal and must be restored.

RPMG believes that the current proposal is not an appropriate policy for other jurisdictions to follow as fuel producers will no longer be incented to fully participate, take risks, invest capital, or innovate at levels currently seen. The LCFS, as an established regulatory program, has generated interest from other regions to entertain similar programs in meeting their climate objectives. This is a complement to the existing balanced program which demonstrated a continued interest in producers to participate and be rewarded with innovation and efficiency. Regional integration of a proposal that does not provide a balanced approach to fuel provider participation cannot be supported by RPMG.

There is an inherent compliance risk associated with detailed auditing. The more detailed the inspection, the higher likelihood something will be identified, regardless of materiality. This bears a cost. Meanwhile, in this proposal, any benefits in CI that are found are not rewarded. Again, the cost vs. reward for participation is a negative proposition.

Fuel Neutrality

RPMG is gravely concerned the current LCFS proposal signals a shift away from a fuel neutral approach to achieving greenhouse gas reductions and instead champions select fuels: electricity and hydrogen. RPMG strongly advises the proposed regulation be returned to the fuel neutral intent of the adopted LCFS program. A modification to the fuel neutrality of the LCFS program does not represent an amendment to the existing administered program. It is the presentation of a wholesale program change that is beyond the scope amending the existing LCFS. It truly is representative of an entirely new policy structure. It is also worthy of note, this suggested change of scope was not ever understood to be a part of the informal stakeholder process leading up to this proposed rulemaking.

The proposed regulations are not consistent with the expressed intent of the LCFS program and shifts away from a fuel neutral program. A complete shift to a stated purpose of the program warrants further discussion with the California public and regulated community. RPMG requests that CARB revise the proposed regulations to be consistent with the LCFS's stated purpose and continue to take a fuel neutral approach to GHG reductions. RPMG does not support special treatment for any select fuel type, including electricity and hydrogen pathways. Likewise, the Governor's ZEV Executive Order promoting electrification does not call for disparate treatment of other fuel types. If an administrative mechanism is allowed for one fuel type, then it should be valid for all fuel types. Fuel neutral regulations that allow all industries to reduce CI equally with renewable or low CI process energy is a fundamental cornerstone of the LCFS and it should be upheld in this and all future amendments.

The original spirit of the LCFS is captured in a quote from the 2015 LCFS Initial Statement of Reason (ISOR) and the current LCFS website:

"The LCFS is designed to encourage the use of cleaner low-carbon fuels in California, encourage the production of those fuels, and, therefore, reduce GHG emissions. The LCFS is performance-based and fuel-neutral, allowing the market to determine how the carbon intensity of California's transportation fuels will be reduced."

A fuel neutral approach promotes innovation and encourages development across all fuel industries. However, the proposed regulations provide leniency to electricity and hydrogen pathways but not to other fuel pathways,

including ethanol. According to the ISOR, this preferential treatment is designed to "promote Zero Emission Vehicle Infrastructure and Renewable Electricity to ZEVs."

Achieving maximum carbon reductions should also include market access of higher level ethanol blends, like E15 and beyond. RPMG and our member producers are committed to providing the lowest CI, high octane ethanol we possibly can. Market access necessitates a level playing field for all fuel types.

Indirect Accounting Mechanisms

RPMG strongly advises that the proposed regulations be revised to extend the use of indirect accounting mechanisms to all pathway types for process energy. There is preferential treatment provided in § 95488.8 (i)(1) Book-and-Claim Accounting, which specifically allows for "indirect accounting mechanisms for renewable electricity to reduce the CI of electricity supplied as transportation fuel or for hydrogen production through electrolysis." This preferential treatment is further disallowed in § 95488.8 (h) Renewable or Low – CI Process Energy prohibiting indirect accounting mechanisms for renewable or low-CI process energy to reduce CI for all other low carbon fuel types. The ISOR states this assistance is necessary because there has been very little interest in such ZEV pathways under the current rule. By tipping the scale, the proposed regulation is not "allowing the market to determine how the carbon intensity of California's transportation fuels will be reduced."

Under the proposed regulation, a reporting entity may generate credits for renewable electricity supplied to the grid in the previous quarter, despite having no physical traceability. While the LCFS proposal extends this benefit to electricity and hydrogen pathways, it requires other fuel pathway holders to go great lengths to trace and verify the source of their feedstock, have a direct connection to renewable power, or use a default value so conservative it may put the economic viability of many pathways into question. RPMG strongly advises the proposed regulation be revised to extend these forms of indirect accounting mechanisms to all pathway types for process energy.

Buffer Account

RPMG strongly opposes mandated injection of operational CI differentials of certified CI verification results into the Buffer Account. Operational CI credit should be awarded to the fuel producer first in all instances. Individual fuel producers should be allowed to pledge excess credits to the buffer pool if they so choose. Unclaimed credits may be deposited to the buffer account on a predefined schedule <u>after</u> allowing the stakeholder sufficient time to claim the verified CI differential. This would leave intact the ability to populate the buffer account as deemed necessary by CARB, while also retaining incentive for the generator to outperform their CI score whenever possible. There are examples of post period crediting today with non-metered electric utility providers that is analogous to providing verified credits to producers at the end of the verification engagement.

The buffer account concept as constructed and defined in § 95486(b) is both punitive and ineffective. Its concept is to provide an insurance risk pool against potentially invalidated credits. As with any insurance policy, it comes with a cost. In this instance that cost is the mechanism of scooping up differential Cl's that are produced as a result of actual efficiency gains generated by biofuel facilities and their inherent real market value. The cost borne by pathway holders, whereby CARB pilfers these operational credits and disallows any retroactive credit recognition, is an innovation killer. When there is no incentive to get incrementally better, Cl's will stagnate at a greater cost to the program. This dampening effect is amplified further with the rule's substantiality provisions.

If the credits are deemed to be valid enough to be used as a backstop for the program, then they should be considered valid enough to be given to the facility that produced them. It is true that previously if a facility produced a fuel below their certified CI score that those "additional" credits were not given to the facility, but it is also true that those additional credits were not certified by a third party and deemed worthy of regulatory consideration.

In any given reporting cycle, if a biofuel facility overachieves—potentially significantly—and can show an actual reduced CI, there is no immediate benefit. Rather, the regulation takes those credits and places them in the buffer account. But on the flip side, if an entity is slightly over their certified CI score the enforcement implications are severe. Staff's recommendation for facilities to avoid any possibility of not achieving their CI score is to build in "head room". This headroom guarantees that credits will fund the buffer pool at a cost to liquid fuel producers. All that value is lost from day one. The cost of this lost opportunity is NOT equally borne by electricity generators as they again benefit from a special provision at § 95488.8(i)(1)(a).

The goal of the buffer account is to create a fund of credits to be used in an invalidation event that the market cannot backfill. The proposed construction leaves the cost of invalidation risk in the market AND simultaneously pulls any additional credits that may be generated out of the market. This is a form of double jeopardy that represents significant costs to fuel producers. Further, as currently proposed, this buffer account is not accessible to active fuel producers. It is only a back-stop for insolvent producers. Therefore, liquid fuel producers are funding this risk pool they cannot access themselves.

Carbon Intensity Calculations

RPMG recommends the proposed regulations be reviewed and revised to encourage the continued production of low CI fuels. Limitations within the proposed simplified calculator, substantiality requirements, and overly conservative defaults need to be addressed. Specifically, RPMG requests the following revisions: Remove new pathway application substantiality requirements and establish Simplified CI Calculator default values that are reflective of real world industry practice.

The LCFS program is promulgated to encourage the production of cleaner low-carbon fuels to be used for transportation in California. This design structure is meant to promote innovation in the renewable fuel production process which results in a lower carbon intensity fuel. The proposed LCFS regulations require producers to provide significant amounts of verified data at their own expense. Meanwhile, technical elements of the proposal severely limit recognition of innovation and do not allow for claiming incremental GHG reductions.

Substantiality Requirement

The substantiality requirement outlined in § 95488.9(a) must be removed completely. This provision is unclear in its scope, and can be interpreted to require a significant minimum CI reduction as a prerequisite to apply for any new pathway and therefore is a barrier for producers seeking recognition of their carbon reductions. The proposed provision is a strong signal to the market and investors that the program is not interested in maximizing carbon reductions from all fuel sources. According to the ISOR, the substantiality requirement is designed to limit applicants from submitting multiple pathways with minimal differences in pathway CIs and to limit fuels that could be certified under the Tier 1 framework from requesting consideration under the Tier 2 framework. It is RPMG's position that all producer emission reductions that can be demonstrated and verified be considered for new pathway applications, including Tier 2 modification for Tier 1 eligible pathways. Recognition of all sources of carbon reductions is to the programs benefit. Further, all reported pathway quantities will be dually reconciled between reporting parties by mandated quarterly

reconciliation procedures as well as mandated independent verification engagements for fuel producers and importers. The confidence level of accuracy for this reported data should be significantly high. This provision must be removed from the proposed regulations for the program to continue to encourage the production of cleaner low-carbon fuels.

This proposed regulation is contrary to the LCFS' stated goal to encourage the production of cleaner low-carbon fuels. It is the incrementally small process changes that build on top of one another and the immediate additional funds for reinvestment that allowed the ethanol industry to achieve the historical CI reductions it has contributed to the LCFS program thus far. Unfortunately, ethanol producers are unable to fully capture these reductions due to benchmarks used in the market. The substantiality requirement will prevent incremental reductions from being recognized and monetized to further foster additional modifications for further reductions. The substantiality requirement must be removed to promote and support the continuation of these incremental reductions. Through discussion with Staff, RPMG believes that additional clarification of the proposed language to narrow the scope may help to alleviate concerns with sub-section (a)(1)(A). We look forward to continuing the dialogue on this front.

Use of Overly Conservative Defaults

RPMG requests the default distance for Midwest corn transport be revised to 40 miles and the temporary fuel pathway code CI for corn starch ethanol remain at 75.97 g/MJ. The proposed simplified calculator and regulations create a disadvantage to ethanol producers with overly conservative and inaccurate defaults. The proposed defaults make the carbon intensity of the fuel unrealistically high and as a result, act as a barrier to optimal program contributions.

RPMG requests a default of 40 miles for Midwest corn transport distance in Tier 1 corn ethanol pathways. The proposed simplified calculator has a Midwest corn transport distance of 80 miles. RPMG has previously submitted multiple comments drawing attention to this punitive default and its implications. RPMG appreciates CARB staff's willingness to include site specific optionality, but the calculator must prioritize and include a reasonable default.

The U.S. Department of Agriculture calculated average distances that corn is shipped to ethanol plants in nine Midwestern states and found the average corn transport distance for ethanol plants in the Midwest is 19.1 miles—four times lower than the default.¹ A map was created for lowa to illustrate this issue. The map shows all of the ethanol plants marked with 80-mile radius drawn around each.² The illustration (attached for reference) clearly shows, if a plant had a corn transport distance anywhere near 80 miles, the corn producer would have to drive past several other ethanol facilities. For a corn producer to be incentivized do this, the ethanol facility would need to outbid all of the closer facilities. This would significantly increase a plant's cost of production and is economically unsustainable. This simple economic concept is true throughout the Midwest.

RPMG requests the temporary CI for corn starch ethanol remain at 75.97 g/MJ. The proposed regulations also introduce an overly conservative temporary fuel pathway code (TFPC) for corn starch ethanol. Despite the average carbon intensity of ethanol experiencing historical reductions, the proposed TFPC CI *increased* from a CI of 75.97 to 90 g/MJ. The 2018 Illustrative Compliance Scenario lists an average CI of 71 for corn starch ethanol. The market further establishes the average CI of fuel sold in California through economics, which provides an available baseline for determining a representative TFPC. However, the proposed TFPC was

¹ 2015 Energy Balance for the Corn Ethanol Industry; Energy Balance Study Appendix B1

² See Attachment A- Map created by Ron Alverson, of the American Coalition for Ethanol.

determined by staff using the most conservative pathway certified, arbitrarily increasing it by five percent and then rounding it up to the nearest five CI points. That methodology is ultra conservative and it should be changed.³

Simplified Calculator

RPMG requests the proposed CI simplified calculator be revised to allow for the use of optional columns that account for individual producer innovations. The ethanol industry runs on innovation. Unfortunately, the proposed Simplified Calculator does not recognize or reward individual producer innovations. Under the proposed regulations, Tier 1 Simplified CI Calculator pathways do not account for biogas use, site specific chemical use, or no till farming. These areas of ethanol industry innovation have demonstrated substantial carbon emission improvement in approved pathways, academic research and documented recommendations submitted to CARB over the past ten years of LCFS program history. Further, if a producer wishes to benefit from a CI reduction through biogas process energy or site specific chemical use, they must do so under a Tier 2 pathway which involves a more expensive and time intensive process. The proposed substantiality requirement for new pathway applications further deters the industry from pursuing these types of innovation. To encourage and reward innovation, the simplified calculator should be revised to include optional columns that recognize and quantify these efforts.

Verified CI Reductions

RPMG supports the addition of verified CI reductions under § 95488.10(a)(6) but requests it be revised to allow producers to generate credits for the period in which their operational CI has been verified to be lower than their certified CI. This section allows a pathway holder to replace their certified CI with the verified operational CI based on the most recent 24 months of operational data. Under the proposed regulations, producers only generate credits for their verified CI reductions to the extent of their certified CI. The proposed regulations increase the cost to producers for verifying data but do not reward the producer when their verified operational CI is below their certified CI for the verified period. This revision would encourage the ethanol industry to do what it has done to help get the LCFS program where it is today, grind day in and out and continue to innovate.

Verification Costs

Every consideration for minimizing or limiting the extent of verification costs should be employed by CARB, this letter highlights and suggests some of those opportunities. Though CARB considers them to be "best practices" for a robust GHG reduction program, mandatory verification costs are not nominal or inconsequential for stakeholders. Individual fuel producers and suppliers will examine these costs very closely when determining whether or not to participate in California's program.

Limitations to verification costs should be considered by CARB, including a suspension of mandated verification where aggregate program costs supersede attributable market economics. Just as LCFS cost containment solutions have been enacted to protect consumers and market participants, so too should cost containment solutions be provided for verification costs.

Verification costs will be inherently inflated by the proposed regulation's limitations on the number of active verification bodies and the onerous forced firm rotation requirement. Both of which work against competitive lowest cost engagement pricing.

³ CARB LCFS ISOR page III-101

Verification Body Rotation Requirements

<u>RPMG remains opposed to mandated firm rotation</u>⁴. Partner or lead verifier rotation is a sufficient alternative. RPMG strongly believes mandated firm rotation is in conflict to CARB's and stakeholders' mutually beneficial desire to leverage efficiencies amongst existing stakeholder verification programs.

CARB has stated their interest in incorporating a firm rotation requirement is to ensure "fresh eyes" and impartiality among firms. The stated benefits of mandated rotation by CARB can be achieved at the partner or lead verifier level. RPMG believes the program's detailed accreditation and CARB approval of verification plans and sampling strategies are sufficient to ensure impartiality.

CARB further elaborates this requirement has been successfully demonstrated through administering the Mandatory Reporting Rule (MRR) under Cap and Trade. RPMG maintains there are crucial differences between Cap and Trade and LCFS. Each LCFS pathway will have undergone an initial validation. LCFS verification, unlike MRR, further requires pre-submission of verification plans and sampling strategies. This requirement will inherently offer CARB the ability to gauge the adequacy of applied verifier program knowledge, verification design, scope and strategy to identify potential errors up front.

Required firm rotation does not adequately allow for a regulated entity to consider a verification body's basic knowledge of an industry or individual business practices. This will result, without question, in a loss of engagement efficiency and overall dissatisfaction of the verification experience. Regulated entities have commercial operations to manage. Excessive time spent on repeated and recurring introductions of a new auditor to those operations is not an effective use of enterprise resources, and it will amount to a loss in productivity and increased costs—costs not considered by CARB. This is unnecessary for all involved. Creating this climate as the foundation for verification interaction is only going to result in strained relationships between the verifier and the stakeholder community.

A firm rotation requirement is not only problematic for regulated parties but also for verifiers. Verifiers already will be required to become accredited and will incur the associated cost of undergoing the necessary training and travel. Once accredited, the verifier will experience a forced reduction in revenue in off years due to loss of clients and resulting in a necessitation of higher base fees. This inflated cost structure will ultimately make its way to California fuel consumers, undermining program cost containment efforts.

For all of these reasons, RPMG urges CARB to incorporate a partner rotation requirement in lieu of a firm rotation requirement for LCFS verifiers.

Conflict of Interest and Lookback Provisions

The five-year lookback period for Conflict of Interest should be removed as they exacerbate the firm rotation requirements highlighted above. RPMG also remains concerned with the practical ramifications of the proposed Conflict of Interest and Lookback provisions. We recommend staff revisit this issue and narrow its scope.

⁴ September 7, 2017 Comments: https://www.arb.ca.gov/fuels/lcfs/workshops/11032017 rpmg.pdf
October 6, 2017 Comments: https://www.arb.ca.gov/fuels/lcfs/workshops/11032017 rpmg.pdf
November 3, 2017 Comments: https://www.arb.ca.gov/fuels/lcfs/workshops/11032017 rpmg.pdf

A five-year lookback from 2022, is in essence retroactively penalizing the regulated parties that have implemented third party conducted assurance programs prior to this rulemaking. Section 95503(b) provides that any number of activities performed by a potential verifier will result in their disqualification subject to firm rotation requirements. The list of potential conflict activities that require mitigation is very broad and will certainly impact the pool of the most competent verifiers.

In particular, Section 95503(b)(2)(U) should be removed in its entirety. This provision states that if a verifier has contracted for certain activities with a Trade Association, of which the verified facility is a member, then the verifier is subject to COI provisions and likely disqualification from the engagement. This provision is entirely unnecessary and is ill advised.

Likewise, there are a number of subparagraphs which disqualify potential firms if they participated in any sort of design consulting related to a facility—information technology, engineering analysis, construction consulting, internal audit procedures, health and safety assistance. There is no time limit for these activities, i.e. if <u>anyone</u> on the verification team ever did <u>any</u> of the 20+ activities at <u>any time</u> in the past, then they are deemed to have a conflict.

In Closing

RPMG would like to again highlight the benefits that our industry has made to California's GHG programs. We would also reiterate that with a regulatory structure which promotes innovation the ethanol industry can continue to lead the way in terms of reducing the Carbon Intensity of the liquid fuel market that will remain in the state for years to come. RPMG looks forward to continuing these conversations after the first Board hearing on April 27th. Please contact me with any questions or comments at (952) 465-3247 or jwhoffmann@rpmgllc.com.

Sincerely,

Jessica W. Hoffmann

Regulatory and Compliance Manager

RPMG, Inc.

Cc Rajinder Sahota

Brieanne Aguila

Anil Prahbu

Renee Lawver

Manisha Singh

Attachment A

