



April 23, 2018

Richard Corey
California Air Resources Board
1001 I Street
Sacramento, CA 95814

Re: Verification Requirements in Proposed Amendments to the LCFS

Dear Mr. Corey,

KAAPA Ethanol would like to provide comments on the proposed regulation order for the low carbon fuel standard regarding the verification of carbon intensity for corn ethanol plants. First, we thank the ARB for including many provisions that will enable the recognition of lower carbon intensity for ethanol to California. Among these is the opportunity to develop separate pathways for wet and dry distillers grains (DGS) ethanol. These pathways are important because ethanol plants may encounter swings in the amount of drying of the co-product distillers grains depending on weather, operating, and market conditions.

The ARB has developed verification spreadsheets that enable the recording of energy used for drying. Several ethanol plants have taken advantage of this fuel pathway and we are investigating it for one of our facilities. Over the past several years several applications have been submitted and rejected because they did not provide direct measurements to document energy use associated with drying¹. The ideal approach would be for ethanol plants to install flow meters on all of their gas combustion equipment and amp meters on all of their electricity uses, which was communicated to ethanol producers that applied for such pathways.

Natural gas used for drying is obviously the primary energy that distinguishes the production of ethanol associated with dry and wet. However, electricity used to operate conveyors and equipment associated with drying is also a significant energy use and has a significant contribution to the carbon intensity of dry DGS ethanol.

We are requesting that the ARB modify its verification spreadsheet to include the opportunity or option to add electricity used for drying based on amp meters and data loggers. This opportunity is made available to other biorefineries also, i.e. soybean crushers that produce both biodiesel and soybean oil internal to one facility might also measure their electricity consumption and natural gas usage to separate the energy requirements for biodiesel production. We are requesting the same treatment as an option for facilities that have installed this equipment. The opportunity to monitor electricity usage provides an incentive for continuous improvement and helps fuel producers understand the contribution of all of their energy and inputs to their carbon intensity and motivates the further reduction of greenhouse gas emissions. Measuring power consumption for drying will not complicate verification and will only motivate fuel producers to further reduce GHG emissions.

Thank you for considering our suggestion.

Sincerely,

A handwritten signature in blue ink, appearing to read "Charles Woodside".

Charles Woodside
Chief Executive Officer

¹ For example, one applications solved a system of equations for ethanol plant operation with and without DGS drying to determine the amount of natural gas and electric power associated with DGS drying.