



August 31, 2017

The Honorable Scott Pruitt  
Administrator  
U.S. Environmental Protection Agency  
1200 Pennsylvania Avenue, NW  
Washington, DC 20460

Docket ID No. EPA-HQ- OAR-2017-0091

***Sent via email to: a-and-r-docket@epa.gov***

**RE: Request for comment on Renewable Fuel Standard Program: Standards for 2018**

Dear Administrator Pruitt:

On behalf of the members of the American Coalition for Ethanol (ACE), I appreciate the opportunity to comment on the proposed renewable volume obligations (RVOs) for the 2018 Renewable Fuel Standard (RFS) program.

ACE is a grassroots advocacy organization, powered by rural Americans from all walks of life who have built an innovative industry that delivers homegrown biofuel and food for a growing world. Our 500 members include U.S. ethanol biorefineries, investors in biofuel facilities, farmers, and companies that supply goods and services to the U.S. ethanol industry.

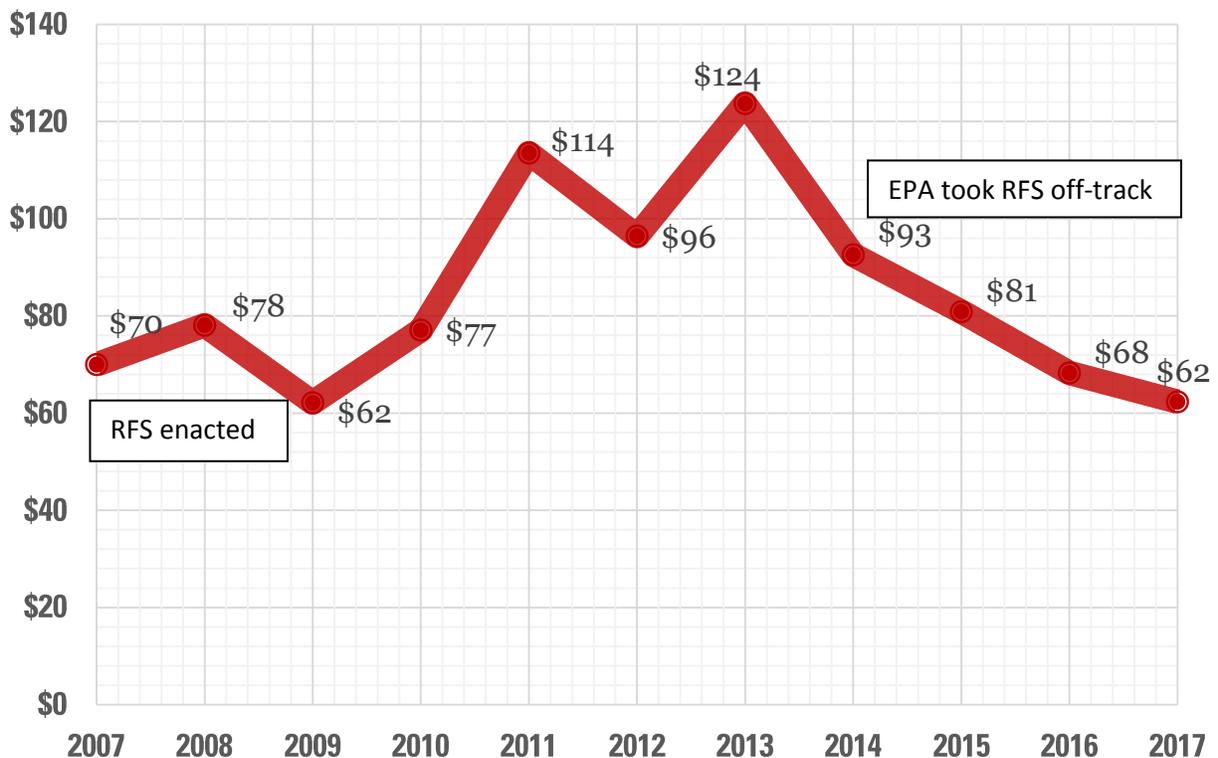
We are commenting on several facets of the proposed rule, including the economic benefits of the RFS, the conventional biofuel level, use of the general waiver authority given the recent decision by the U.S. Court of Appeals for the D.C. Circuit in *Americans for Clean Energy et al. v. EPA*, discussion of a potential future “reset” of the RFS, and the advanced and cellulosic biofuel levels, including the Agency’s handling of cellulosic waiver credits. We also offer comment on some critical issues related to the RFS such as the importance of clearing regulatory bottlenecks which are constraining the production of cellulosic biofuel, the need to update lifecycle greenhouse gas modeling for corn ethanol, why EPA should provide Reid vapor pressure (RVP) relief for E15 and higher blends, and the RFS point-of-obligation.

**Economic Benefits of the RFS**

Enactment of the RFS in 2007 helped boost demand for corn and soybeans which in turn increased prices received by farmers and spurred economic growth in rural America. But from 2013 through 2016, economic insecurity gripped U.S. farmers because previous leadership at EPA took implementation of the RFS off-track, reducing annual volume obligations below levels established by Congress. During this period, EPA illegally claimed infrastructure constraints and the mythical E10 “blend wall” prevented higher ethanol blends, such as E15 and E30, from being used in the marketplace. As a result, leading biofuel groups were forced to sue the Obama administration, filing a petition for review on Jan. 3, 2016. We recently prevailed in this case (*Americans for Clean Energy et al. v. EPA*) and will discuss the implications of that Court decision later in our comments.

We believe EPA's previous mismanagement of the RFS contributed to an economic slump in rural America because as the Agency used the general waiver authority to reduce renewable fuel volumes below statutory levels, farmers produced more than 56 billion bushels of corn from 2013 through 2016, including record-high crops in 2014 and again in 2016. According to USDA, corn production will exceed 14 billion bushels this year, surplus stocks of corn will swell to a 30-year high of 2.4 billion bushels, and corn prices will fall to a 10-year low in 2017. Liquidity ratios and working capital have deteriorated to their weakest levels since 2002 and the value of farm sector assets is expected to decline by \$32 billion in 2017. Iowa farmland values dropped 6 percent in 2016, making it the third straight year land values fell. As the chart below illustrates, net farm income has dropped from \$124 billion in 2013 to an expected \$62 billion in 2017, a decrease of nearly 50 percent since EPA took the RFS off-track.

### NET FARM INCOME FALLS WHEN EPA TAKES RFS OFF-TRACK



Since EPA took the RFS off-track in 2013, taxpayer-funded payments to farmers that compensate for low crop prices have been on the rise. History has shown that increasing the demand for biofuels leads to higher market prices for crops and reduced government spending on farm program payments. Growing the renewable fuels market in 2018 is even more critical given the uncertainty created by efforts to renegotiate existing trade pacts. While we are hopeful that these new negotiations will lead to better trade opportunities, the uncertainty in the near term will impact the U.S. farm economy which makes a strong biofuels market even more important. Simply put, a strong rural economy depends upon growing the use of renewable fuels. To restore economic security in rural America, EPA needs to implement the program as enacted by Congress and take regulatory steps so E15 and higher blends of ethanol have access to the market.

### **Conventional Biofuel Level for 2018**

We are extremely pleased that the proposed rule maintains the 15-billion-gallon volume for conventional renewable fuel. The ethanol industry has a current production capacity of more than 16 billion gallons with nearly 200 million gallons of capacity under construction. The pace of U.S. ethanol production consistently indicates annual totals will be 15.4 to 15.7 billion gallons in 2017 which easily exceeds the domestic supply necessary to meet the 15 billion level called for in the statute and would contribute toward meeting the relatively modest pool-wide ethanol concentration of 10.13 percent assumed by the Agency in the proposed rule.

As detailed in our earlier comments, ethanol production remains a critical market for U.S. farmers. Enactment of the original RFS in 2005 restarted a teetering rural economy in the early 2000s. USDA is projecting that corn exports will fall by at least 350 million bushels in the 2017-'18 marketing year and that surplus stocks will again exceed 2 billion bushels. These factors further depress corn prices and farm income. Ensuring a properly functioning RFS and increasing demand for renewable fuels in 2018 and beyond is critical to the economic success of the rural economy. Maintaining 15 billion gallons in 2018 is imperative to this effort.

### **Use of the General Waiver Authority in Light of Americans for Clean Energy et al. v. EPA**

We would like to acknowledge that the proposed rule does not rely on the general waiver authority related to “insufficient domestic supply” which was impermissibly applied by EPA in previous rulemakings.

ACE was one of several petitioners in *Americans for Clean Energy et al. v. EPA*. According to the D.C. Court of Appeals ruling on July 28, 2017, “EPA erred in how it interpreted the ‘inadequate domestic supply waiver provision...’ It does not allow EPA to consider the volume of renewable fuel that is available to ultimate consumers or the demand-side constraints that affect the consumption of renewable fuel by consumers.”

As the Court concisely states, “[t]he central problem with EPA’s ‘supply equals demand’ argument (in addition to the text of the statute, of course) is that it runs contrary to how the Renewable Fuel Standard is supposed to work.” The Court reaffirmed Congress’ intent that the RFS’s “increasing requirements are designed to force the market to create ways to produce and use greater and greater volumes of renewable fuel each year. EPA’s interpretation flouts that statutory design: instead of the statute’s volume requirements forcing demand up, the lack of demand allows EPA to bring the volume requirements down.”

The Court also ruled that the “inadequate domestic supply” waiver provision is not ambiguous with respect to the “person” at issue. To that end, the Court stated that it is impermissible for EPA to consider availability of renewable fuel to market actors downstream from refiners, importers and blenders such as retailers or consumers. EPA cannot consider constraints on infrastructure to distribute fuel from blenders to gas stations, the number of retail outlets that offer renewable fuel blends, pricing of renewable fuel, prevalence of vehicle engines that can use renewable fuel, and marketing efforts of those promoting renewable fuel products.

While the proposed rule does not reduce total volumes based on the legally flawed interpretation of “insufficient domestic supply,” the rule does extensively discuss inappropriate demand-side factors such as gasoline demand, retail stations, vehicle engines, pricing, and marketing efforts in its determination

to not use the authority. EPA's discussion of assessing attainable volumes based on these factors in the proposed rule (pages 34229 through 34232 of the Federal Register) is legally barred and should be struck from the final rule. We further encourage EPA to affirmatively acknowledge in the final rule that it shall only consider supply to refiners, blenders and importers such as the availability of feedstocks, the production capacity of renewable fuel producers, and imports from foreign producers.

#### **Discussion of a Potential Future "Reset" of the RFS**

As the D.C. Court of Appeals stated in *Americans for Clean Energy et al. v. EPA*, the intent of the RFS's "increasing requirements are designed to force the market to create ways to produce and use greater and greater volumes of renewable fuel each year." EPA must not use the perceived lack of demand as justification to bring volume requirements down.

We are concerned that this proposed rule is a step toward using the RFS authority to reset the statutory levels if there is a reduction in total volumes of more than 20 percent in two subsequent years. The operative statutory language regarding the so-called "reset" is below:

"(F) MODIFICATION OF APPLICABLE VOLUMES – For any of the tables in paragraph (2)(B), if the Administrator waives-

(i) At least 20 percent of the applicable volume requirement set forth in any such table for 2 consecutive years; or

(ii) At least 50 percent of such volume requirement for a single year,

the Administrator shall promulgate a rule (within 1 year after issuing such waiver) that modifies the applicable volumes set forth in the table concerned for all years following the final year to which the waiver applies, except that no such modification in applicable volumes shall be made for any year before 2016. In promulgating such a rule, the Administrator shall comply with the processes, criteria, and standards set forth in paragraph (2)(B)(ii)."

We acknowledge reset waiver levels have been triggered for advanced and cellulosic biofuel and that EPA is proposing to reduce the total volume for 2018 by more than 20 percent. We don't believe EPA's proposed reduction in total volume is justified (which will be addressed later in our comments) and call attention to the fact that the final total volume in 2017 was not reduced by a full 20 percent, rather it was reduced by just 19.67 percent which is less than the trigger specified in the statute. In other words, even if EPA issues a final rule for 2018 which maintains a 20 percent or greater reduction for total biofuel (which we strongly oppose), it will not trigger the reset waiver for total volume.

As mentioned, corn ethanol production capacity already exceeds the implied levels called for in the proposed rule. Any effort to reset RFS levels below what can be produced by the industry runs counter to the statute. EPA should focus its attention in helping clear obstacles to using the ethanol supply being made available to refiners, importers and blenders. One such issue is removing the regulatory barrier for using E15 year-round. EPA's current interpretation of Reid vapor pressure handcuffs retailers in conventional gasoline areas because it inexplicably prevents retailers from selling E15 in summer months even though it is less-emitting and lower cost than E10 and E0. We encourage EPA to address this issue expeditiously in order to help refiners, importers and blenders in the expansion of renewable fuel use.

Importantly, Congress directed EPA to take seriously the impact any reductions of RFS volumes would have on rural economies. Congress requires EPA to make decisions on setting RFS levels in consultation with the Secretary of Agriculture to ensure that there are no negative impacts. EPA, in consultation with

the Secretary of Agriculture, must look at issues such as job creation, economic development and commodity prices. Reductions in total volumes that negatively impede the development of increased ethanol usage – whether it be via annual RVO rulemakings or using the reset provision – run counter to the law. As discussed above, the rural economy sets at a perilous point and EPA is bound by the law to ensure that it does not do anything that suppresses commodity prices or the rural economy.

### **Advanced and Cellulosic Biofuel Levels**

We believe EPA is underestimating the production of advanced and cellulosic biofuel in 2018 and encourage the Agency to use a forward-looking methodology for establishing these volumes instead of the backwards-looking approach used to propose levels for 2018. Specifically, we urge EPA to finalize 19.38 billion gallons of total renewable fuel for 2018 of which at least 380 million gallons would be cellulosic biofuel and 4.38 billion gallons would be advanced biofuel. This would avoid nearing the 20 percent threshold for the so-called “reset” waiver of the total volume.

When establishing advanced and cellulosic targets, it is not appropriate only to consider gallons produced in prior years. EPA must also consider the development and adoption of technology that will lead to increased supplies of these fuels in the future. The most promising technology is the ability for existing corn ethanol plants to “bolt-on” corn kernel fiber processing.

In 2013, ACE member Quad County Corn Processors (QCCP) successfully developed one such bolt-on technology to convert corn kernel fiber into cellulosic ethanol, additional corn oil, and a high-protein, low-fiber feed. On July 1, 2014, QCCP became the very first cellulosic ethanol producer to generate D3 RINs from corn kernel fiber. QCCP’s technology, first named “Adding Cellulosic Ethanol” and now called “Cellerate” achieves GHG reductions of 126 percent compared to gasoline. To date, QCCP has generated approximately 5 million QAP-certified D3 RINs. Another ACE member, Edeniq, has also developed corn kernel fiber technology and has run successful trials at multiple existing ethanol plants, many of which will be taking the step to commercialize this technology in the near future.

Simply put, dozens of existing corn ethanol plants in the U.S. are on track to produce between 30 and 40 million gallons of cellulosic biofuel from corn kernel fiber in the near future. If the ethanol industry adopted this technology across-the-board, between 1 and 2 billion gallons of cellulosic biofuel would be produced nationwide. Despite the progress being made with corn kernel fiber and the promise of significantly more cellulosic biofuel from this technology, the unfortunate reality is that EPA red tape is creating a regulatory bottleneck that is constraining the availability and production of this fuel. It can take EPA more than 1,000 days to approve new pathways for cellulosic feedstocks. This needs to improve. For plants that have a pathway approved, they face additional red tape with EPA’s registration and RIN generation requirements. We applaud the administration for focusing on ways to provide regulatory relief to U.S. businesses and we urge EPA to streamline and improve the pathway and registration bottlenecks that are hindering the production and use of cellulosic biofuel.

Another challenge which must be addressed to help increase the production of cellulosic biofuel is for EPA to reconsider how it enables obligated parties use cellulosic waiver credits (CWC) instead of physical gallons of D3 RINs to comply with the RFS. Enabling obligated parties to acquire CWCs in lieu of purchasing physical gallons of cellulosic ethanol deflates the value of D3 RINs which in turn makes future investment and expansion of cellulosic ethanol uncertain. Waiver credits are only intended for use when physical gallons of cellulosic biofuel are not available. ACE endorses the advice and comments of QCCP regarding how EPA should handle CWCs: First, EPA should limit CWCs to cellulosic biofuel

shortfalls. Second, the Agency should utilize a trading platform where cellulosic biofuel producers receive the same price that CWCs are being issued to obligated parties.

Many advanced biofuel projects are also linked to the success and strength of the existing corn ethanol industry. Several ACE-member companies, including Adkins Energy of Lena, Illinois, East Kansas Agri-Energy of Garnett, Kansas, and Prairie Horizon Agri-Energy of Phillipsburg, Kansas, have invested in advanced biofuel projects at their existing corn ethanol facilities. In the case of Adkins Energy, corn oil is separated from the distillers grains to make 2 million gallons of biodiesel along with more than 50 million gallons of corn-based ethanol. Prairie Horizon Agri-Energy is integrating a 3-million-gallon renewable diesel facility into its existing 40-million-gallon ethanol plant. East Kansas Agri-Energy is poised to begin production of renewable diesel with technology bolted onto their existing corn ethanol facility. As then-EKAE President and CEO Jeff Oestmann remarked at the June 9, 2016 hearing EPA conducted in Kansas City, "...let us not forget that our renewable fuels' future will continue to be built on the foundation of conventional ethanol production. Renewable diesel allows us to create two different fuels from one kernel of corn. That means corn is the feedstock for both conventional biofuel and advanced biofuel. If EPA truly wants advanced biofuels to succeed, the RFS must follow the pathway outlined in the statute approved by Congress. We cannot take the detour EPA has proposed through its novel use of the general waiver authority."

#### **EPA Needs to Update the Lifecycle Greenhouse Gas Modeling of Corn Ethanol**

Nearly three decades ago, the U.S. Department of Energy (Argonne National Lab) developed a full lifecycle greenhouse gas and regulated emissions accounting model (Greenhouse gas and Regulated Emissions and Energy use in Transportation - GREET). The GREET model is used to calculate the energy use, GHGs and other regulated emissions that occur during the full lifecycle production and combustion of all current and potential transportation fuels. The assumptions used by Argonne scientists in the GREET model are under constant review and updates to the model occur frequently.

As a requirement with enactment of the RFS, EPA also had to conduct modeling of the lifecycle GHG emissions for various categories of renewable fuels. However, unlike the Argonne GREET model, EPA has not reviewed or updated their original (2010) corn ethanol GHG assessments. At that time, EPA estimated corn ethanol's carbon intensity (CI) was approximately equal to gasoline and that it would take until 2022 to be 20 percent below gasoline. In comparison, Argonne's scientists estimated that corn ethanol's CI was already 20 percent below gasoline in 2010.

In addition to Argonne's GREET modeling, the USDA contracted with ICF International to conduct an independent analysis of the GHG emissions of corn-based ethanol. The report was released in January of 2017. ICF estimated that in 2014, lifecycle corn ethanol GHG emissions were 43 percent below 2005 gasoline. ICF also estimated that by 2022, top performing corn ethanol facilities' CI could be 70 percent below EPA's 2022 estimation.

This is noteworthy given the proposed rule's discussion of the difficulty in accurately estimating imports of Brazilian sugarcane ethanol and its relationship to advanced and total renewable fuel volumes. Varied levels of imports of sugarcane ethanol year to year is one of the factors cited by EPA for proposing to lower the advanced and total volume levels in 2018 while at the same time sending signals to U.S. corn ethanol producers not to rely on the RFS to further expand. RFS volumes should not be lowered to serve as a de-facto barrier to free and fair trade. That is not good public policy and is inconsistent with Congressional intent. Instead, we encourage EPA to update its greenhouse gas modeling for corn starch ethanol. We believe it will show comparably, if not better, reductions in GHG

emissions than sugarcane ethanol. As a result, EPA would not need to lower the advanced and total renewable fuel volumes based on uncertain sugarcane ethanol, but instead free up the marketplace to use a clean, U.S. produced product with significant GHG savings.

There are at least two additional model improvements EPA should consider with respect to measuring the lifecycle CI of renewable fuels such as ethanol. First, there is a growing body of evidence that continuous corn planted in no-till and low-tillage production systems build organic matter and soil carbon stocks.<sup>1</sup> It is appropriate to consider establishing a credit for corn ethanol production that results in building soil carbon. Second, current models presume low nitrogen (N) fertilizer prices, resulting in assumptions of “heavy” application of fertilizer use and high emissions of nitrous oxide (N<sub>2</sub>O) emissions from corn production. These models therefore assume about 30 percent of applied N fertilizer is “leached” to the air and water. These assumptions are not grounded in today’s reality. Corn farmers respond to market signals and have rapidly adopted precision agriculture technology and employed enhanced efficiency fertilizers in order to reduce N application rates and efficiency, reducing N losses to the air and water. Updating models to reflect this reality would reduce the CI penalty from N<sub>2</sub>O emissions in half.

### **The Need for RVP Regulatory Relief**

We understand this issue is outside the scope of the rulemaking, but it is of such great importance that we would be remiss if we didn’t emphasize to EPA that if ever there was an “Exhibit A” for a regulation in need of reform, it would be the Reid vapor pressure (RVP) limit. The Clean Air Act requires EPA to limit the evaporative emissions of gasoline from June 1 through Sept. 15 because evaporation rates increase in warmer temperatures and these emissions can contribute to summertime air pollution such as ground-level ozone and smog.

To measure the evaporative emissions of fuel, EPA uses the RVP standard expressed in pounds per square inch (psi). The higher the RVP of a fuel, the worse its emissions are. The RVP of gasoline can range from 7 to 15 psi. The RVP of pure ethanol is 2 psi. Most gasoline used in the U.S. today is a blend of 10 percent ethanol and 90 percent gasoline (E10). The E10 blend has a RVP of about 10 psi.

In 1990, Congress amended the Clean Air Act to allow gasoline with 10 percent ethanol a “one-pound waiver” of EPA’s evaporative emission limit [CAA § 211(h)(4)]. In other words, Congress gave EPA the authority to allow the use of E10 (the maximum amount of ethanol allowed in gasoline in 1990) during the June 1 through Sept. 15 season. In 2011, EPA approved the use of E15, a blend of 15 percent ethanol and 85 percent gasoline. Unfortunately, to date, EPA has refused to allow E15 to be used during the summer season per CAA §211(h)(4) even though it has a lower RVP than E10 and straight gasoline.

Prohibiting the sale of E15 from June 1 through Sept. 15 handcuffs many gas station owners who want to offer the fuel to their customers year-round. E15 typically costs 2 to 10 cents per gallon less than E10, so refusing to allow the sale of this fuel in the summer season robs consumers of the opportunity to buy a lower cost product. Not only does E15 cost less and have lower evaporative emissions than gasoline and E10, it has also been approved for use in eight out of every 10 cars on the road today.

EPA could remove a major restriction to ethanol demand by simply treating E15 the same way it treats E10 with respect to summer RVP restrictions. We want to acknowledge that we have had constructive

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<sup>1</sup> Impacts of Corn Yields and No-Till on Carbon Sequestration and Carbon Footprints. Clay et al., 2012.

conversations with EPA staff regarding this important topic and we are encouraged Administrator Pruitt is examining options for potentially providing such relief.

**RFS Point-of-Obligation**

We briefly want to note our support for EPA's decision not to reopen comment on the point-of-obligation issue. We believe that EPA is correct in having the obligation lie with refiners and importers. The current point-of-obligation and RIN trading framework has proven to be a powerful incentive that has allowed some of the most respected independent retailers in the country to offer cleaner, higher-octane fuels such as E15 to their customers at lower prices. Convenience store leaders such as Sheetz, QuikTrip, Kum&Go, RaceTrac, and Casey's are moving the domestic clean fuel market forward and the RFS rewards them for that innovation. It would be wrong to take away that incentive and give it to those few refiners who have made no effort to comply with the law. We look forward to the Agency formally rejecting petitions to move the obligation point downstream.

**Close**

Thank you for your time and consideration of these comments. We stand ready to assist the Agency as it prepares to finalize the RVOs for 2018 and tackles some of the regulatory barriers to ethanol production and use.

Sincerely,

A handwritten signature in black ink, appearing to read "B. Jennings". The signature is fluid and cursive, with a large initial "B" and a long, sweeping underline.

Brian Jennings, Executive Vice President  
American Coalition for Ethanol