



The American Fuel & Petrochemical Manufacturers ("AFPM")¹ and the American Petroleum Institute ("API")² submit these comments in response to the Environmental Protection Agency's ("EPA") proposed rule entitled, *Renewable Fuel Standard Program: Standards for 2018 and Biomass-Based Diesel Volume for 2019*.³ AFPM's and API's members are directly regulated as obligated parties under the Renewable Fuel Standard ("RFS") and will be substantially affected by the percentage standards EPA sets in the final rule.

The RFS is at a crucial juncture. As the Agency is well aware, the problems facing the RFS have multiplied over the ten years that the program has been implemented. EPA has been required to continuously invoke its waiver authority to reduce statutory volumes in every compliance year since 2010. Cellulosic biofuel production has either been nonexistent or *de minimis* since the volumetric requirements first took effect, forcing the Agency to cumulatively waive 15.65 billion gallons of cellulosic biofuel requirements through 2017. From 2014 to 2017, EPA was further compelled by the circumstances to cumulatively waive 14.30 billion gallons of total renewable fuel and 12.06 billion gallons of advanced biofuel.

This is plain evidence of a severely flawed statutory scheme, emanating from an unjustified expansion of the RFS program in the Energy Independence and Security Act of 2007. But EPA has compounded the problem, for instance by failing to take "neutral aim at accuracy" in projecting volumes of cellulosic biofuel and by failing to set appropriate standards accordingly.⁴ The statutory flaws of the RFS have been further exacerbated by real-world constraints on producing renewable fuels and integrating them into transportation fuel. The current and ever-increasing required volumes of renewable fuels volumes simply cannot be forced into a system in which there is a flat or decreasing consumer demand for transportation fuel and an inability of vehicles and equipment to use such fuels. Obligated parties and consumers will pay a severe economic price if they are forced

¹ AFPM is a national trade association representing virtually all U.S. refiners and petrochemical

manufacturers. AFPM's refinery members comprise more than 95 % of U.S. refining capacity.

² API is a national trade association representing more than 625 member companies involved in all aspects of the oil and natural gas industry. API's members include producers, refiners, suppliers, pipeline operators, and marine transporters, as well as service and supply companies that support all segments of the industry.

³ 82 Fed. Reg. 34,206 (July 21, 2017), referenced as "proposed rule" or "2018 RFS."

⁴ API v. EPA, 706 F.3d 474, 476 (D.C. Cir. 2013).

to absorb the volumes and attendant costs otherwise mandated by the statute and EPA through its rulemakings.

Most recently, the United States Court of Appeals for the District of Columbia Circuit ("D.C. Circuit") vacated EPA's use of its general waiver authority with respect to setting 2016 renewable fuel volumes while upholding the Agency's use of cellulosic waiver authority to set total renewable, advanced biofuel, and cellulosic biofuel standards for the 2014, 2015, and 2016 compliance years.⁵ The court also agreed with EPA's determination not to consider the number of "banked" Renewable Identification Numbers ("RINs") in setting annual RFS volume requirements.

AFPM and API disagree with several aspects of the court's opinion including the court's analysis of the limits on EPA's general waiver authority. But even under the constraints the court articulated, EPA has the statutory authority to reduce RFS standards for 2018 beyond the levels it has proposed. Our specific recommendations on the appropriate levels for total renewable, advanced biofuel, biomass-based diesel ("BBD"), and cellulosic biofuel levels for 2018 are contained in the comments that follow.

To promulgate a final rule that includes achievable volumes of renewable fuel, EPA may utilize its general waiver authority on the basis of both "severe economic harm" and "inadequate domestic supply." Exercise of the "severe economic harm" prong of its general waiver authority requires EPA to find that enforcing any of the four required renewable fuel volumes would cause severe economic harm on a national, regional, or state level. EPA need only find that such harm would occur through imposition of the statutory renewable fuel volumes in order to avail itself of authority to waive volumetric requirements "in whole or in part."⁶ Such harm will occur if EPA imposes the statutory volumes for 2018, and EPA may therefore waive those volumes pursuant to this provision.

The second prong of the general waiver authority may permissibly be used based solely on consideration of "domestic" supplies of renewable fuel, disregarding the availability of foreign-origin renewable fuels to set annual standards. When the RFS was amended in 2007 to greatly expand requirements related to renewable fuel, Congress indicated that its purpose was to "move the United States toward greater energy independence and security, to increase the production of clean renewable fuels, [and] to protect consumers."⁷ A waiver based on "inadequate *domestic* supply" must be understood in this context and with reference to the plain meaning of the adjective "domestic." Thus, EPA may further reduce the volumes of renewable fuel it has proposed to the extent achieving those volumes requires reliance on foreign imports.

We note that, while Congress directed EPA to consider "domestic" supplies in setting the volumetric requirements, it expressly allowed consideration of imported renewable fuels for purposes of RIN generation and compliance. This dichotomy helps to accomplish two congressional purposes: increasing energy independence by focusing on domestic production of renewable fuels in setting the volumetric requirements while addressing costs to consumers and the impact of renewable fuel on job creation and rural economic development.

⁵ Americans for Clean Energy v. EPA, No. 16-1005, July 28, 2017 (D.C. Cir.).

⁶ CAA 211§(0)(7)(A).

⁷ Energy Independence and Security Act of 2007, Pub. Law 110-140.

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COMMENTS OF THE

AMERICAN FUEL & PETROCHEMICAL MANUFACTURERS AND THE AMERICAN PETROLEUM INSTITUTE

Renewable Fuel Standard Program: Standards for 2018 and Biomass-Based Diesel Volume for 2019 Docket ID No. EPA-HQ-OAR-2017-0091

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I. Summary of Comments

AFPM and API appreciate EPA's continuing recognition of the real-world constraints, including anticipated costs that affect the RFS program.⁸ For 2018, EPA has relied on its cellulosic waiver authority⁹ to propose reductions in statutory volumes for total renewable fuel, advanced biofuels, and cellulosic biodiesel, but they are not enough. EPA must consider all effects of the E10 blendwall and other constraints and conditions that limit the use of ethanol and other renewable fuel, such as BBD, in transportation fuel. This recognition is key to understanding the real-world limitations on renewable fuel mandates in 2018 and future compliance years.

We also support EPA's proposal to maintain the full amount of RINs that have been reserved, or "banked," for future use. Clean Air Act ("CAA") §211(o)(5), which provides for the generation of renewable fuel credits, requires this action. In addition, maintaining a sufficient RIN bank will help mitigate some of the costs imposed by the RFS program, improve flexibility in compliance, and improve the functionality of the RIN marketplace.

AFPM and API support EPA's reduction of the required volumes of renewable fuel in recognition of the real-world constraints on their consumption. We also support EPA's decision to maintain a sufficient level of "banked RINs" to ensure compliance flexibility and a functioning RIN market. The Agency, however, should further revise the required volumes downward and make several improvements to the proposed rule including the following:

- Use the general waiver authority to reduce statutory volumes of total renewable fuel and advanced biofuels. Fully implementing the statutory volumes of renewable fuel would result in severe economic harm. EPA may also use its general waiver authority on the basis of an inadequate *domestic* supply.
- Base its assessment of total ethanol volumes in 2018 on the assumption that ethanol blended in gasoline will be limited to 9.7% by volume.¹⁰ As AFPM and API have pointed out in past comments, 9.7% ethanol blended gasoline, on average, represents a practical limit on ethanol use in the nation's pool of gasoline when consideration is given to the demand for E0 and compliance margins for E10 fuel. It also reflects legal and practical constraints, including refueling infrastructure and other environmental regulatory requirements that limit the use of ethanol blends above 10 percent.
- Lower projected volumes for cellulosic biofuel beyond the levels proposed to reflect the continuing, extremely limited production of liquid cellulosic biofuel and an overall production shortfall of 39 million gallons in 2016. Under applicable precedent, EPA must

https://www.cadc.uscourts.gov/internet/opinions.nsf/5F1D8BC9815C4C698525816B00543925/\$file/16-1005-1686284.pdf, "[t]he cellulosic waiver provision grants EPA 'broad discretion' to consider a variety of factors –

⁸ *Id.* at 34,309.

⁹ As the D.C. Circuit recently affirmed in *Americans for Clean Energy v. EPA*, No. 16-1005 (D.C. Cir. July 28, 2017) (slip op.), available at

including constraints on the demand for advanced biofuel – when determining 'whether and in what circumstances' to reduce the advanced biofuel volume requirement." Slip op. at 76 (quoting *Monroe Energy, LLC v. EPA*, 750 F.3d 909, 915 (D.C. Cir. 2014)).

¹⁰ EPA does not consider E85 in the definition of gasoline.

take a "neutral aim at accuracy"¹¹ with respect to cellulosic biofuel volumes.¹² EPA, however, has in fact overestimated cellulosic biofuel production in every year for which it projected production levels since 2010.

- EPA should better utilize information developed by the Energy Information Administration ("EIA") and further increase its projection of the actual volume of E0 consumed in the U.S. While EPA has revised its E0 projections upwards in the proposed rule compared to the projections EPA used in prior years, a significant discrepancy with EIA's estimates of E0 consumption remains. This discrepancy needs to be resolved between the two agencies so that the final rule can incorporate more precise information on actual E0 use and what amounts of E0 are reasonable to project will be used in 2018.
- Set reasonable volumetric obligations for advanced biofuels, including BBD, that consider the impact of such obligations on the energy independence of the United States, focusing on the domestic production of such fuels. Excessive mandates serve to encourage imports of renewable fuel over time, particularly of biodiesel. Per Congress's express instruction, RINs generated from imported fuel should continue to be allowed to be used for compliance purposes.
- Recalculate renewable fuel volumes for total renewable fuel and advanced biofuels in 2018 based on lowered volumetric requirements for cellulosic and biodiesel that more accurately reflect expected domestic production. Consistent with the proposed rule, EPA should reduce both total renewable fuel and advanced biofuel volumes by the full amount of the 2018 cellulosic biofuel waiver due to both supply and demand constraints. EPA should also lower the proposed level of the 2019 volume for BBD to reflect the anticipated domestic production of BBD.
- Review and adjust guidance documents and relevant regulations that have resulted in requirements for obligated parties to replace "invalid RINs" despite those parties' lack of any actual knowledge of the RINs' invalidity.
- Recognize that maintaining the confidentiality of the EPA Moderated Transaction Sytem ("EMTS") RIN generation data is essential and is necessary to ensure a level playing field. AFPM and API support any additional safeguards or protocols to ensure these data are made available to all industry participants at the same time. EPA should consider announcing in advance when RIN generation data will be published each month, or adopting a schedule for releasing the data at a regular fixed date and time to facilitate equal market access.

¹¹ 706 F.3d 474 (D.C. Cir. 2013).

¹² CAA 211§(0)(7)(A).

AFPM and API recommend that EPA determine "reasonably attainable" volumes of renewable fuel and utilize its available waiver authorities to finalize the following volumes in connection with the 2018 RFS implementation rule:

	Million RINs
Ethanol	13,960
Non-Ethanol Cellulosic	200
Biomass-Based Diesel	2,360
Other Advanced Biofuel	30
D6 Biodiesel/Renewable Diesel	500
Total Renewable Fuel Volume 2018	17,050

II. 2018 Proposed RFS Standards

A. EPA Must Continue to Comply with Statutory Deadlines

We are pleased that EPA issued the 2018 proposal in a timeframe that should allow the Agency to meet the November 30 statutory deadline for promulgating a final rule. We note that the statute specifies an earlier deadline of October 31, 2017, for setting the final 2019 volume for BBD. We believe that if the Agency acts promptly, it may be able to meet that clear statutory deadline. While EPA did not meet the deadline for promulgation of 2017 RFS standards, missing the required date by approximately 2 weeks,¹³ AFPM and API recognize that the Agency has made substantial improvements in bringing the RFS program more in line with the applicable statutory schedule.

We urge the Agency to continue down this path toward consistent timeliness. Regulatory certainty is critically important to obligated parties, who must develop their RIN compliance strategies well before a compliance period begins. In the past few years, obligated parties have suffered as EPA: (1) proposed a rule for 2014 that was subsequently withdrawn; (2) abruptly announced that it would combine three years of RFS requirements into a single rulemaking; (3) substantially delayed promulgating a final, combined 2014-2016 rule; (4) imposed two years of retroactive volumetric requirements for 2014 and 2015; and (5) created chronic uncertainty as to how the Agency would approach the use of prior year RINs and when compliance with retroactive standards would be required. While EPA ultimately "rolled forward" RFS annual requirements to mitigate the effects of its long delays in promulgating RFS standards, the RIN market has experienced continuing volatility over the last four years as well as periods when prices rapidly escalated.

B. EPA Should Consider the Overall Cost of the RFS Program in Setting Volumetric Requirements for 2018

As EPA readily acknowledges, the RFS program necessarily imposes a cost to the extent that "renewable fuels cost more than the petroleum fuels they displace."¹⁴ This cost is substantial, and we

¹³ Renewable Fuel Standard Program: Standards for 2017 and Biomass-Based Diesel Volume for 2018, 81 Fed. Reg. 89,746 (Dec. 12, 2016).

¹⁴ Screening Analysis for the Renewable Fuel Standard Program Renewable Volume Obligations for 2018, Burkholder, Parsons and Sutton ("Screening Analysis") at 5.

are pleased that EPA is taking these costs into account in setting the volumetric requirements for 2018.

For example, since CAA 211(0) does not provide applicable volumes for BBD past calendar year 2012, EPA is required to set such levels in accordance with the criteria contained in CAA 211(0)(2)(B)(ii). These criteria include "the impact of the use of renewable fuels on the cost to consumers of transportation fuel and on the cost to transport goods."¹⁵ Therefore, EPA is required to take into account the large differential in costs between petroleum diesel and BBD when setting applicable volume requirements.

EPA has estimated the cost difference between soybean biodiesel and petroleum diesel at \$1.34 to \$1.83 per gallon on a diesel-gallon equivalent basis.¹⁶ The 2017 BBD volume is 2.1 billion gallons, and EPA proposes to maintain this volume in 2018. Given the cost differential between petroleum diesel and soybean biodiesel, EPA's biodiesel volumetric requirement for 2018 likely would impose substantial additional costs¹⁷ on obligated parties and American consumers who would otherwise use petroleum diesel.¹⁸

With regard to cellulosic biofuel, the CAA requires EPA to reduce the applicable volume of cellulosic biofuel to the "projected volume available during the calendar year."¹⁹ EPA has used a variety of methodologies to project the volume of cellulosic biofuel in different RFS rulemakings. In the 2018 proposed rule, EPA relies on a narrower range of projected production volumes for both new facilities and "consistent producers" of liquid cellulosic biofuel.²⁰ EPA then projects volumes for liquid cellulosic biofuel producers on this basis, while using a separate methodology to project production for compressed natural gas and liquid natural gas from biogas.²¹

Since the statute requires projection of the "available" cellulosic biofuel volume, in making volume projections for 2018 EPA must consider costs; simply stated, costs are an appropriate consideration when deciding whether something is "available."²² Indeed, EPA would err if it failed to consider "an important aspect of the problem," like cost considerations here, when deciding whether regulation is appropriate.²³ In the proposed rule, EPA estimated that cellulosic biofuel costs \$3.06 to \$4.31 on a gasoline-gallon energy equivalent basis, compared with a projected wholesale cost of gasoline for 2018 of \$1.69 per gallon.²⁴ Thus, to the extent that cellulosic biofuel is mandated, substantial costs

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¹⁵ CAA §211(o)(2)(B)(ii)(V).

¹⁶ Cost Impacts of the Proposed 2018 Annual Renewable Fuel Standards, Michael Shelby, Dallas Burkholder and Aaron Sobel ("Cost Impact Memorandum") at 5.

¹⁷ Using EPA's cost impact data cited above in nt. 14, 2.1 billion gallons * \$1.34/gallon = \$2.814 billion; 2.1 billion gallons * \$1.83/gallon = \$3.834 billion.

¹⁸ EPA has proposed a minimum requirement that is more than double the statutory minimum of one billion gallons. CAA 211§(o)(7)(A). EPA also projects that the minimum required level of the advanced biofuel requirement will drive additional BBD use. But unlike ethanol, which may be added to boost octane levels in finished fuel, BBD is a costlier *substitute* for conventional diesel, has a lower energy content, and performs poorly in cold weather. Thus, the market for BBD in the absence of the RFS would be more limited.

¹⁹ CAA §211(o)(7)(D)(i).

²⁰ 82 Fed. Reg. at 34,218.

 $^{^{21}}$ *Id.* at 34,220.

²² CAA 211§(0)(7)(A).

²³ Michigan v. EPA 135 S. Ct. 2699, 2707 (2015), citing State Farm Mut. Automobile Ins. Co, 463 U.S. 29,

²⁴ Cost Impact Memorandum at 11. While required volumes for cellulosic biofuel are much lower than for BBD, costs have risen in recent years as EPA has substantially increased annual cellulosic biofuel requirements.

are imposed on obligated parties and consumers that would otherwise have no economic incentive to use a much more expensive fuel.

In addition to the costs borne by those who purchase renewable fuels for blending, costs are also imposed on obligated parties who must purchase RINs for compliance. EPA has estimated that in the period from May 2016 to April 2017, prices for RINs averaged \$0.76 per gallon-RIN for conventional biofuel to \$2.25 per gallon-RIN for cellulosic biofuel.²⁵ The extent to which any obligated party must purchase RINs for compliance varies, but the overall number of RINs that must ultimately be surrendered to EPA for compliance *-- 19.28 billion RINs in 2017*– inevitably imposes additional costs.²⁶ Some refiners may be able to pass through part of these costs to the consumer while some may not. In either case, the RFS raises costs compared with a fuel market that is not subject to annual renewable fuel mandates.²⁷

When considered in the aggregate, the RFS ranks among the nation's more expensive energy/environmental programs.²⁸ We are therefore encouraged that EPA has considered costs among the other factors in proposing the total renewable fuel, advanced biofuel, and cellulosic biofuel volume requirements for 2018.²⁹

C. EPA Should Further Reduce Advanced Biofuel and Total Renewable Fuel Volumes for 2018

For 2018, EPA has proposed small reductions in the RFS volumetric standards for cellulosic biofuel, advanced biofuel, and total renewable fuel when compared to the final standards EPA promulgated for the 2017 RFS.

	Statutory	Proposed 2018	Proposed 2019
	(billion gallons)	(billion gallons)	(billion gallons)
Cellulosic biofuel	7.0	0.238	n/a

²⁵ Screening Analysis, Table 7.

 26 There are also additional costs that obligated parties must bear to secure and demonstrate compliance with the RFS (*e.g.*, transactional costs of acquiring RINs, recordkeeping, and other internal compliance costs). Obligated parties must also bear costs related to EPA's Quality Assurance Plan, which was created in response to widespread fraud in the generation of RINs. These costs must either be borne by obligated parties or recovered, if possible, through the sale of transportation fuel.

²⁷ While asserting the costs for RINs represent a transfer payment as between obligated parties and blenders, EPA has conceded that there is a direct cost impact by virtue of imposing the RFS mandate itself. "If renewable fuels cost more on an energy-equivalent basis than the petroleum fuels they displace, as they did in 2013, there is a cost to using these renewable fuels. The higher the required volume of these fuels, the higher this cost will be. As a result, blending increasing volumes of renewable fuels likely increased the total cost of transportation fuel in the United States in 2013, relative to a scenario where there was no mandate for renewable fuels." A Preliminary Assessment of RIN Market Dynamics, RIN Prices, and Their Effects, Dallas Burkholder, Office of Transportation and Air Quality, May 14, 2015 at 31. EPA-HQ-OAR-2015-0111-0062.

²⁸ EPA contends that obligated parties, including small entities, are "generally recovering the cost of acquiring the RINs necessary for compliance with RFS standards through higher sales prices of the petroleum products they sell than would be expected in the absence of the RFS program." *Id.* at 1, citing Burkholder memorandum (EPA-HQ-OAR-2015-0111-0062) and Knittel, Meiselman, Stock Working Paper. To the extent that this is or is not the case with respect to any individual obligated party, the RFS program as a whole imposes costs through mandating displacement of economical fuels with more expensive fuels that, in many cases, also contain less energy on a per-gallon basis.

²⁹ 82 Fed. Reg. at 34,209.

Biomass-based diesel	<u>≥</u> 1.0	2.1	2.1
Advanced biofuel	11.0	4.24	n/a
Total Renewable Fuel	26.0	19.24	n/a

The most sizeable reduction for 2018 compared to RFS statutory applicable volumes - in terms of both absolute volume and percentage requirements - is for cellulosic biofuel, a renewable fuel for which EPA has consistently over-predicted available volumes in *every* year since the program was implemented in 2010. Although AFPM and API support EPA's proposal to make such year-over-year reductions in renewable fuel volumes, we believe that EPA can and should reduce these volumes further. Initially, EPA should further revise cellulosic biofuel volumes downward to correct the Agency's historical pattern of over-predicting the volume of this renewable fuel and should make corresponding downward adjustments to the volumes of other advanced biofuels.

EPA has, for the most part, employed the same methodology it has used before in calculating the total renewable fuel requirements for 2018. In doing so, we believe that EPA has acted in accordance with its available authority under the cellulosic waiver provision and in recognition of the multiple constraints on the volume of total renewable fuel that may be reasonably produced and blended, including constraints on the demand for advanced biofuel and total renewable fuels.³⁰

As evidenced by the chart below, EPA has also calculated and considered the level of "conventional biofuel" (*i.e.* corn ethanol) and "non-cellulosic advanced biofuel" as part of its analysis of the proposed RFS standards. While EPA accurately notes that conventional biofuel is not a fuel category for which a percentage standard is explicitly established, EPA asserts that an "implied volume requirement . . . [of 15 billion gallons is] equal to that envisioned by Congress in 2018."³¹ Therefore, EPA proposes to use its authority to adjust advanced biofuels in such a way as to avoid requiring non-cellulosic advanced biofuels to "backfill" for unmet cellulosic biofuel requirements.³² EPA has explained that:

Since the advanced biofuel volume requirement is nested within the total renewable fuel volume requirement, the statutory implied volume for conventional renewable fuel in the statutory tables can be discerned by subtracting the applicable volume of advanced biofuel from that of total renewable fuel. Performing this calculation with respect to the tables in CAA section 211(o)(2)(B) indicates a Congressional expectation that in the time period 2015–2022, advanced biofuel volumes would grow from 5.5 to 21 billion gallons, while the implied volume for conventional renewable fuel would remain constant at 15 billion gallons.³³

³⁰ "The cellulosic waiver provision grants EPA 'broad discretion' to consider a variety of factors – including constraints on the demand for advanced biofuel – when determining 'whether and in what circumstances' to reduce the advance biofuel volume requirement." *Americans for Clean Energy v. EPA*, No. 16-1005 (D.C. Cir. 2017), *Slip Op.* at 76, citing *Monroe Energy* at 915.

³¹ 82 Fed. Reg. at 34,212-3. In discussing this implied volume, however, EPA fails to acknowledge that Congress contemplated 15 billion gallons of ethanol would be blended into approximately 150 billion gallons of gasoline, based on projections of gasoline supply at the time Congress passed the Energy Security Independence Act of 2007. This would result in roughly a 10% blending level. Simply put, Congress did not intend for ethanol to bust the blendwall.

³² *Id.* at 34,207.

³³ *Id.* at 34,229-30, nt. 80.

AFPM and API believe this is a reasonable and eminently sensible interpretation of CAA §211(o). As the Agency has noted, between 2015 and 2022, the differential between the statutory schedules for total renewable fuel and advanced biofuel is held constant at 15 billion gallons each year. Other provisions of the RFS also support limited reliance on non-advanced and non-cellulosic biofuels. For example, "conventional biofuel" is defined as "renewable fuel that is ethanol derived from corn starch,"³⁴ and such conventional biofuel is explicitly excluded from the definition of "advanced biofuel."³⁵ Congress additionally limited the number of facilities that are "grandfathered" with respect to complying with required reductions in lifecycle greenhouse gas emissions. New facilities commencing construction after the date of enactment of the Energy Independence and Security Act of 2007 must achieve at least a 20% reduction in such lifecycle emissions.³⁶ Both provisions evince Congress's intent to limit the participation of non-advanced biofuels in the RFS program.

III. RIN Carryover

As noted in more detail below, obligated parties began 2017 with a large RIN deficit carryover of 500 million RINs.³⁷ This deficit effectively increases the 2017 standards from 19.28 billion to 19.78 billion RINs, making it vital that EPA follow through on its intent not to intentionally drawdown the carryover RIN bank.³⁸ AFPM and API support this goal and the overall approach of the proposed rule regarding banked RINs. Nevertheless EPA should also recognize, as it has in the past, that the statutory structure of the RFS dictates this approach. As EPA correctly determined when it established the RIN system in 2007, RINs are required to be available in the year generated and the following year. Thus, preserving the RIN bank not only represents good public and economic policy – it is required by statute. EPA must correctly interpret CAA 211(0)(5) provisions regarding the generation and use of credits and act in a manner consistent with this statutory provision.

In addition, EPA should recognize that not all obligated parties are in the same position with regard to banked RINs and the ability to acquire the RINs that are needed for compliance each year. The burden of compliance may fall unevenly on obligated parties in any one compliance year. This is another reason why a robust RIN bank is needed; maintaining a fully "liquid" RIN bank helps ensure that obligated parties will have reasonable access to the means (RINs) by which EPA dictates compliance with the RFS.

³⁴ CAA §211(o)(1)(F).

³⁵ CAA §211(o)(1)(B)(i).

³⁶ CAA §211(o)(2)(A)(i).

³⁷ Source: EMTS Annual Compliance Data for Obligated Parties and Renewable Fuel Exporters under the Renewable Fuel Standard Program, Table 7 (2016 deficits totaling 502.33 million RINs are comprised of 4.4 million cellulosic RINs, 40.9 million BBD RINs, 66.5 million advanced biofuel RINs, and 390.5 million total renewable fuel RINs).

³⁸ 82 Fed. Reg. at 34,214.

A. EPA Must Preserve the RIN Bank to Ensure Compliance Flexibility and a Well-Functioning RIN Market

AFPM and API agree with EPA that "a bank of carryover RINs is extremely important in providing obligated parties compliance flexibility in the face of substantial uncertainties in the transportation fuel marketplace, and in providing a liquid and well-functioning RIN market"³⁹ EPA should maintain its longstanding position on the importance of the RIN bank and not take any action in the final rule that would increase RFS volumes on the basis that RINs generated in a prior year that are still available for compliance, *i.e.*, "carryover RINs" that may be available to obligated parties. EPA should continue to exclude all such carryover RINs – the "RIN bank" – from consideration when setting annual RFS standards.

In the proposed rule, EPA adopted the approach it took to the RIN bank in the final 2017 and 2014-2016 RFS rules. Specifically, in the final 2017 rule, EPA observed that "the RFS program functions best when sufficient carryover RINs are held in reserve for potential use by the RIN holders themselves, or for possible sale to others that may not have established their own carryover RIN reserves."⁴⁰ EPA also noted that many obligated parties lack the ability to separate RINs through blending and that a significant drawdown in the RIN bank "may stop the market from functioning in an efficient manner, even where the market overall could satisfy the standards."⁴¹ These conditions will not change in 2018, and they support EPA's proposed determination to preserve the full amount of the RIN bank. In addition, the continuing volatility in the RIN market demonstrates that banking RINs is and will remain a prudent compliance strategy.

As noted above, the RFS also contains a statutory requirement that any generated credits (*i.e.*, RINs) be "valid to show compliance for the 12 months as of the date of generation."⁴² This provision serves as a statutory bar against constraints on the use of a RIN in the year following its generation. That is, a RIN generated on January 1 or December 31 must be "valid to show compliance" in the subsequent year. And, since compliance with the RFS occurs on a calendar year basis, all RINs generated in year one must necessarily be available for compliance in year two.

If EPA were to require any drawdown of the RIN bank, its action would essentially preclude obligated parties and others from either using or transferring credits that have already been generated (*e.g.*, through a decision not to use the credit in a prior year). To do so would result in the "confiscation" of RINs that are, by statute, required to be treated as valid for compliance in the following year. The statute explicitly provides that an obligated party "shall" be allowed to generate credits and "may use" such credits for purposes of complying with annual RFS

³⁹ 82 Fed. Reg. at 34,213.

⁴⁰ Renewable Fuel Standard Program: Standards for 2017 and Biomass-Based Diesel Volume for 2018, 81 Fed. Reg. 89,746, 89,755 (Dec. 12, 2016).

⁴¹ *Id*.

⁴² CAA 211§(0)(5)(C).

requirements for "12 months as of the date of generation."⁴³ And EPA has recognized this limit on its authority since the inception of the RIN program.⁴⁴

Using the Agency's historical approach to the RIN bank is also in line with the D.C. Circuit's recent decision in *Americans for Clean Energy*, in which the court upheld EPA's treatment of the RIN bank for compliance years 2014-2016. In this recent decision, the D.C. Circuit agreed with EPA that the supply of renewable fuel EPA must consider in determining whether there is an "inadequate domestic supply" for purposes of EPA's general waiver authority under CAA §211(o)(7) does not include the supply of "carryover RINs" from prior years.⁴⁵ The court rejected the biofuel industry's arguments that EPA must consider available carryover RINs to be part of the supply of renewable fuel and that EPA must "ensure" that statutory RFS volumes are met through requiring a drawdown in the amount of RINs available for compliance from prior years. Instead, the court pointed to the requirement in CAA §211(o)(5)(C) that EPA allows obligated parties to carry credits over from one year to the next and recognized that "Congress contemplated that an obligated party would be allowed to carry over credits from one year to the next" for precisely the reasons stated here: to ensure compliance flexibility and a well-functioning RIN market.⁴⁶

Finally, EPA has noted that the RIN bank "balance" is currently approximately 11 percent of the proposed total renewable fuel standards.⁴⁷ This level is far below the 20 % "rollover" limit specified in EPA regulations. EPA has previously determined that such a limit is consistent with the structure of the RFS while recognizing that credits *must* be available in the year generated and the year thereafter. Specifically, when the 20 % limitation was included within the 2007 regulations for "RFS1" EPA commented that:

To be consistent with the Act, we believe that the rollover issue should be addressed in our regulations. However, *we also believe that the limits to preclude such unhindered rollovers should not preclude all previous-year RINs from being used for current-year compliance*. To accomplish this, we must restrict the number of previous year RINs that can be used for current year compliance. To this end, we proposed a 20 percent cap on the amount of an obligated party's Renewable Volume Obligation (RVO) that can be met using previous-year RINs.

As described in the NPRM, we believe that the 20 % cap provides the appropriate balance between, on the one hand, allowing legitimate RIN carryovers and protecting against potential supply shortfalls that could limit the availability of RINs, and on the other hand ensuring an annual demand for

* * *

⁴³ CAA 211§(0)(5)(A)-(B).

⁴⁴ "RINs are valid for compliance purposes for the calendar year in which they are generated, or the following calendar year. This approach to RIN life is consistent with the Act's prescription that credits be valid for compliance purposes for 12 months as of the date of generation, where credits are generated at the end of a year when compliance is determined." Regulation of Fuels and Fuel Additives: Renewable Fuel Program; Final Rule, 83 Fed. Reg. 23,900, 23,909 (May 1, 2007).

⁴⁵ *Slip Op.* at 39-40.

⁴⁶ *Id*. at 38.

⁴⁷ 82 Fed. Reg. at 34,213.

renewable fuels as envisioned by the Act. We believe this approach also provides the certainty all parties desire in implementing the program. The same cap will apply equally to all obligated parties, and the cap will be the same for all years, providing certainty on exactly how obligated parties must comply with their RVO going out into the future.⁴⁸

EPA's approach to preserving the 2017 RIN bank is consistent with the purpose of the credit program and EPA's historic implementation of the program.⁴⁹

B. The Number of Carryover RINs May be Insufficient to Ensure Liquidity in the RIN Market

As noted above, obligated parties began 2017 with a large RIN deficit – a shortfall of 500 million RINs. This deficit effectively increases the 2017 standards from 19.28 billion to 19.78 billion and may result in a significant drawdown of carryover RINs to achieve compliance.

Several factors that led to the buildup of the RIN bank in prior years simply no longer apply. For example, in 2016, an increase in biodiesel production in anticipation of the blender tax credit expiration resulted in a surge in biofuel production and the generation of 200 million BBD RINs. That surge in renewable fuel production will likely not be repeated this year now that the tax credit has expired, reducing expected RIN generation by 200 million compared to last year. Similarly, imports of palm oil biodiesel from Indonesia are uneconomical without the tax credit.⁵⁰ This likely translates to a loss of an additional 200 million RINs (D6). These two factors alone create a 400 million RIN deficit compared to last year. There also is a concern that without the tax credit, many small U.S. biodiesel production facilities will close, putting further pressure on RIN supply.

Unlike the early years of the RFS when required levels were below the E10 blendwall, available opportunities to "build" the RIN bank going forward are now constrained by the E10 blendwall and other blending constraints.

Another circumstance likely to reduce the availability of RINs stems from the National Biodiesel Board's legal challenge to the importation of biodiesel. On August 23, 2017, the Department of Commerce issued a preliminary determination in the countervailing duty investigations. The Department found that Argentina and Indonesia provided subsidies to their biodiesel producers

⁴⁸ 72 Fed. Reg. 23,000, 23,934-5 (May 1, 2007) (emphasis added).

⁴⁹ We would note further that EPA has not proposed any rationale or justification for changing its approach in the proposed rule and would need to do so in order to change its interpretation of the statute. EPA would need to adequately explain why it had decided to "change course" with regard to its previous waiver decisions. *See Motor Vehicle Mfrs. Ass 'n v. State Farm Mutual Auto Ins. Co.*, 463 U.S. 29, 42 (1983). Moreover, as the D.C. Circuit has recognized, "an agency issuing a legislative rule is itself bound by the rule until that rule is amended or revoked" and "may not alter [such a rule] without notice and comment." A final rule cannot depart from past practice because such a result would not constitute a "logical outgrowth" of the proposed rule. As the D.C. Circuit has recognized, "an agency issuing a legislative rule is itself bound by the rule until that rule is amended or revoked" and "may not alter [such a rule] without notice and comment." *Nat'l Family Planning & Reprod. Health Ass 'n, Inc. v. Sullivan*, 979 F.2d 227, 234 (D.C. Cir. 1992).

⁵⁰ According to EPA EMTS data, D6 imports in 2017 constitute ~0.1% of total D6 RINs generated in 2017 versus ~3% in previous years.

for biodiesel imported into the U.S.⁵¹ If the International Trade Commission ("ITC") rules in favor of the National Biodiesel Board Fair Trade Coalition and a tariff is imposed on imported Argentinian and Indonesian biodiesel, these imports would be reduced, which could reduce the quantity of D4 RINs available for compliance by an additional 666 million.⁵² Combined with the factors above, these conditions represent a 1.066 billion cumulative RIN generation deficit versus last year.⁵³

There also is an expected shortfall in cellulosic RINs. Cellulosic biofuel production through the first half of 2017 was only 95 million gallons. If that production level continues for the balance of the year, cellulosic production will fall short of the 311 million-gallon standard by a substantial margin.

In addition, the continuing problem with invalid RINs will put further pressure on RIN supply and prices. In January, EPA said that it intends to revoke Genscape's authority to verify RINs as a third-party auditor and ordered the company to replace 68 million RINs generated by Gen-X and SRC that were verified by Genscape. Genscape must now enter the market to acquire these RINs, reducing the supply available to obligated parties for compliance. Future enforcement actions could also reduce the number of available banked RINs.

Finally, the percentage of the obligation met using prior year RINs has declined. In 2015, ten % of the obligation was met using prior year RINs. In 2016, obligated parties met the 2016 RVO using 91 % 2016 vintage RINs and nine % prior year RINs from the RIN bank. It is reasonable to expect that all prior year RINs available for use are used because they cannot be used for compliance after that year and become worthless. The declining use of carryover RINs therefore suggests that the balance in the RIN bank for 2018 will not be sufficient to offset the supply reductions discussed above and preserve market liquidity.

C. EPA Should Ensure the 2017 RIN Bank Will be Sufficient to Allow Obligated Parties to Comply with their 2018 RFS Obligations, as Contemplated by the Statute

EPA has *estimated* that the 2016 RIN bank (*i.e.*, the number of carryover RINs available to demonstrate compliance with 2017 RFS standards on March 31, 2018⁵⁴) will comprise 2.06 billion RINs.⁵⁵ This is 520 million more RINs than EPA *projected* would be available when the 2017 RFS was finalized in December 2016, but is still only about 11% of the proposed 2018 standards. EPA notes, however, that there is "considerable uncertainty" regarding the number of

⁵¹ See <u>https://www.commerce.gov/news/press-releases/2017/08/us-department-commerce-issues-affirmative-preliminary-countervailing-1</u>. *See also* <u>http://ia.ita.doc.gov/download/factsheets/factsheet-multiple-biodiesel-ad-cvd-initiation-041317.pdf</u>

⁵² EIA: 444 million gallons of biodiesel from Argentina in 2016 (444 x 1.5 equivalence value = 666); <u>https://www.eia.gov/dnav/pet/pet_move_impcus_a2_nus_ep00_im0_mbbl_m.htm</u>.

⁵³ See <u>https://in.finance.yahoo.com/news/u-finds-argentine-indonesian-biodiesel-200226922.html</u>

⁽Argentine biodiesel association Carbio stated "The compensatory duties imposed result in an immediate stoppage of sales to the United States ").

⁵⁴ 82 Fed. Reg. at 34,213; See also 40 C.F.R. §80.1451.

⁵⁵ Carryover RIN Bank Calculations for 2018 NPRM, Nick Parsons, July 5, 2017 at 3 (hereinafter referenced as "Carryover memo").

carryover RINs that will be available for compliance with the proposed 2018 RFS.⁵⁶ Thus, it is very difficult to predict at this point how many valid carryover RINs will be in the RIN bank to help obligated parties demonstrate their compliance with the 2018 RFS, and the Agency should take no action that could increase that uncertainty by seeking to draw down or limit the size of the RIN bank.

EPA has not proposed any intentional drawdown of the RIN bank for 2018, and AFPM and API fully agree with this course. The fact that there may have been an increase in the size of the RIN bank from 2016 to 2017 should not alter this determination. In this regard, there is no statutory limit on the number of RINs that may be banked. And the number of 2017 RINs that EPA projects may be available for compliance with the 2018 RFS is far from the highest number of carryover RINs EPA has allowed to be banked in the past. For example, EPA has calculated that the net carryover 2012 RIN bank comprised 2.47 billion RINs.⁵⁷ This is about 400 million more banked RINs than EPA projects will be available for compliance with the 2018 RFS when overall requirements (a proposed volume of 19.24 billion gallons) far exceed the requirements imposed in 2013 (16.55 billion gallons).

In sum, based on the statutory requirements of the RFS program, past practice in implementing the RFS program, and the policy goals (*e.g.*, RIN market liquidity) EPA has expressed regarding maintenance of the RIN bank, EPA must not take any actions that would decrease the amount of RINs that are available for carryover in 2018 for 2019 compliance.

IV. EPA Must Limit the Average Rate of Ethanol Blending for 2018 to 9.7 Percent

EPA should employ its general wavier authority to further reduce the total renewable fuel volume to account for the significant costs being imposed on obligated parties due to the practical limits on blending ethanol into gasoline. Ethanol remains "the most widely produced and consumed biofuel, both domestically and globally."⁵⁸ Thus, consideration of projected ethanol use remains central to the analysis of reasonably achievable RFS volumes. In the proposed rule and previous rulemakings, EPA has accurately observed that: (1) the rate of growth of ethanol use has declined as the gasoline market has become saturated with E10, and (2) substantial barriers remain to the use of E15, including legal constraints.

As indicated by the analysis below, however, while EPA has recognized some previous errors in estimating ethanol use in the proposed rule – most notably EPA's prior significant underestimations of the use of E0 – the Agency must further refine its assessment of projected total ethanol use for 2018. AFPM and API believe that a correct analysis of historic ethanol use and current market conditions should lead EPA to conclude that a reasonable estimate of the attainable average rate of ethanol blending into gasoline for 2018 is 9.7%. Total renewable fuel volumes for 2018 should accordingly be reduced consistent with this percentage. Our detailed analysis follows.

⁵⁶ 82 Fed. Reg. at 34,213.

⁵⁷ *Id.* at A-3.

^{58 82} Fed. Reg. at 34,229.

A. Total Renewable Fuel

In the proposed rule, EPA determined that a volume of 19.24 billion gallons for total renewable fuel was "reasonably attainable given assessments of individual fuel types, including biodiesel, renewable diesel, ethanol (in the form of E10 or higher ethanol blends such as E15 or E85), and other renewable fuels."⁵⁹ EPA thus reduced both the total renewable fuel volume (as well as the advanced biofuel volume for 2018) by 6.762 billion gallons based on the Agency's decision to waive cellulosic biofuel requirements by that amount under the authority of CAA §211(o)(7)(D).

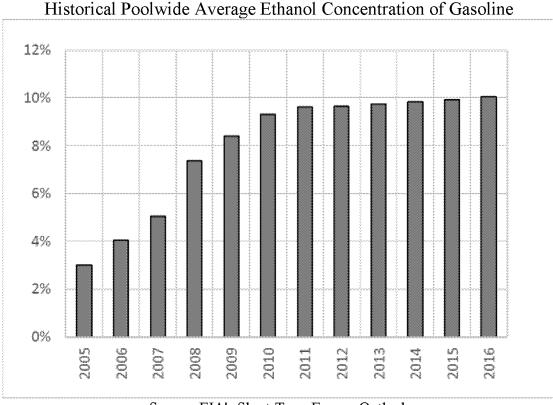
In this regard, for the purposes of determining whether 19.24 billion gallons of renewable fuel is attainable in 2018, EPA uses an ethanol percentage concentration of 10.13%, the same level of concentration as used in the final 2017 standards.⁶⁰ But EPA should also take into account two additional factors. First, the projection of total gasoline energy use in 2018 has *decreased* from the amount projected in 2017. Total quad Btu of gasoline energy is projected to decrease by 90 quad Btu from 2017 to 2018 (17,288 quad Btu to 17,198 quad Btu), meaning that the volume of ethanol that will be used in E10 and E15 will be directionally lower. Second, EPA's projection of an ethanol concentration in 2016 were lower, specifically 9.81%.⁶¹ In general, EIA's analysis of ethanol concentrations in gasoline has shown a leveling off of the average ethanol concentration in gasoline since 2011 after initial "ramping up" from 2005 to 2010.

⁵⁹ *Id.* at 34,210.

⁶⁰ *Id.* at 34,232.

⁶¹ Refinery & Blender Net Input of fuel:

ethanol: https://www.eia.gov/dnav/pet/pet_pnp_inpt_a_epooxe_yir_mbbl_a.htm; Product Supplied of Finished motor: gasoline: https://www.eia.gov/dnav/pet/pet_cons_psup_a_EPM0F_VPP_mbbl_a.htm.



Source: EIA's Short-Term Energy Outlook

EPA should therefore *not* assume that the average ethanol concentration for 2018 will be 10.13% as it did for the 2017 RFS⁶² nor that this will result in consumption of 14.479 billion gallons of ethanol in 2018. In short, projecting this level of ethanol use in 2018 is supported neither by the overall trend in gasoline consumption, nor by any ability of the current marketplace to absorb additional amounts of E15.

EPA's assumption that ethanol concentration will reach 10.13% in 2018 is not based in fact, but rather an estimate used to illustrate a hypothetical example of how the 2017 RFS could be achieved. EPA's assumption is flawed, at least partly, because it is based on fuel ethanol or denatured ethanol. The quantity of the denaturant, a hydrocarbon additive, should not be counted as ethanol volume when calculating the average ethanol content of the gasoline pool.

More broadly, EPA should not assume that the market can simply absorb an ethanol concentration of 10.13% in 2018. History shows that E15 and E85 have not displaced the primary gasoline/ethanol blend, E10, nor as pointed out in Section IV.A. *infra*, driven E0 use down to the previously assumed level of 200 million gallons. Specifically, as referenced below, there is little growth in E15 or E85 utilization that could support the total renewable fuel volume

⁶² 82 Fed. Reg. at 34,232. EPA's analysis in the docket contends that there is a steadily increasing trend in average ethanol concentration since 2010 that means that 10.13% is reasonably attainable in 2017 based on a gradual increase in the average percentage of ethanol in those years. *See* Ethanol Supply scenarios for 2018, David Korotney, July 5, 2017. EPA assumes that the pool wide concentration in 2018 will be the same as 2017 and that this level will result in 14.479 million gallons of ethanol in 2018. *See* 82 Fed. Reg. at 34,232.

EPA has proposed. EPA also continues to underestimate the consumer demand for E0 and its utilization for many types of vehicles and nonroad equipment. High E0 usage has a continuing depressive effect on the demand for renewable fuels. In addition, as described in more detail below, there are real-world limitations to the utilization of advanced biofuels, including BBD.

While we disagree on the amount of ethanol that EPA estimates can be utilized in 2018, EPA's approach to setting the total renewable fuel level for 2018 – in which it utilized its cellulosic waiver authority fully – is completely in accord with the statutory text. The statute plainly provides that, whenever EPA makes a reduction in the applicable volume for cellulosic biofuel, it "may *also* reduce the applicable volume of renewable fuel and advanced biofuels requirement … by the same or lesser volume."⁶³ EPA's proposed approach is also supported by the D.C. Circuit's recent decision in *Americans for Clean Energy* and its decision in *Monroe*.

EPA also has the authority to utilize the statute's general waiver provision in two circumstances relevant here, *i.e.*, "based on a determination . . . that implementation of the requirement would severely harm the economy or environment of a State, a region, or the United States . . . [or based on a determination] that there is an inadequate domestic supply."⁶⁴ The prospect for such severe economic harm exists should EPA not reduce the renewable fuel volumes for 2018 and therefore EPA should exercise its general waiver authority to avoid severe economic harm *concurrently* with its exercise of its cellulosic waiver authority. In addition, to the extent that EPA considers the supply of renewable fuel in exercising its authority under the second prong of the general waiver provision, EPA may focus on the *domestic* supply of such fuel in determining whether the supply is inadequate. EPA's potential use of these waiver authorities to lower the mandated volumes are addressed in Section VI, *infra*.

B. E0 Remains in High Demand, Limiting the Ability to Introduce More Ethanol into Commerce

AFPM and API have commented extensively on the issue of real world production and use of E0 in the past.⁶⁵ Demand for E0 has been and remains far above EPA's projections. We believe, for instance, that actual E0 demand represented almost 4% of gasoline demand in 2015.⁶⁶ And, although E0 consumption declined from 2015 to 2016, substantial use of E0 continues today in the United States. In our previously submitted comments, we referenced projections from the EIA with regard to consumer demand for E0 that are far above EPA's estimates. (EIA estimated 5.3 billion gallons of E0 in 2015 versus EPA's previous estimate of 200 million gallons). We continue to believe that EIA is in the best position to provide accurate projections of E0 demand and recommend that EPA work with EIA to assess its projected use in 2018.

EPA estimates E0 demand based on total ethanol consumption, estimates of E15 and E85 sales, and the ratio of E0 and E10 sales needed to balance the total ethanol consumption. Under this methodology, EPA pegged total E0 demand in 2017 at 200 million gallons. But using EIA's

⁶³ CAA §211(o)(7)(D)(i) (emphasis added).

⁶⁴ CAA §211(0)7)(A)(i)-(ii).

⁶⁵ See Appenidix1 at 17-20.

⁶⁶ See AFPM 2017 RFS Comments at 17 and API 2017 RFS Comments at page 5 (Significant E0 Demand).

methodology for consumption indicates that E0 consumption in 2016 was about 2.0 billion gallons.⁶⁷

AFPM and API have also previously cited the 2015 Iowa Department of Revenue's retailers' report that shows non-ethanol fuel (E0) sales account for more than 200 million gallons in annual sales in Iowa alone.⁶⁸ But the data are also revealing as to the persistence of the demand for E0 when the number of stations offering E0 and other ethanol-blended fuels is considered. For example, the Iowa Report demonstrates that the number of stations selling E0 decreased by 3%, however, the volume of E0 sold during this period only decreased by 0.9%. In contrast, over the same period, the number of E85/E20 stations in Iowa increased by 14%, but the sale of E85/E20 only increased by 5%. In addition, while the number of stations selling E15 increased by 74%, the sale of E15 actually *decreased* by 3.2%. These statistics clearly demonstrate that EPA cannot rely upon the number of stations as a proxy for the amount and types of blended fuels sold. This methodology is arbitrary and capricious in that it does not accurately predict the amount of biofuels actually sold.

Overall, within Iowa, the total volume of E0 sold was an order of magnitude greater than the combined sale of E15, E20, *and* E85. The data show that there is a very strong consumer preference for E0 even when outlets selling higher ethanol blends increase. These data support the need for EPA to reassess its estimate of the current demand for E0 in the nation.

Fuel	Locations		Sales as percent of total gasoline and ethanol/gasoline sales		Volume (Million gallons)	
	2015	2016	2015	2016	2015	2016
EO	1797	1745	14%	13.75%	220.4	218.5
E85 and E20*	304	346	1%	1%	15.7	16.5
E15**	92	160	0.4%	0.38%	6.2	6.0
Total ethanol share of	2102	2020	9.2%	9.2%	143.8	146.8
fuel sales						
Total sales gasoline and ethanol			100%	100%	1,561.7	1,588.0

2015 Iowa Fuel Sales⁶⁹

* E85 = For Year 2015, 13.2 million gal. and E20 = 2.5 million gal,

For Year 2016, 13.5 million gal. and E20 = 3.0 million gal

** E15 is defined by the State as E15 and E15 flex (E15 is sold in summer as Ethanol Flex Fuel)

Despite the submission of EIA and other data, in the past EPA has not increased its estimates of E0 sales. In the 2017 RFS, for example, EPA took the position that EIA data was based on

⁶⁷ As noted in more detail, *infra* nt. 84, AFPM and API believe that a conservative estimate of E0 use is approximately 3%.

⁶⁸ See API 2017 RFS comments at page 13.

⁶⁹ Iowa Department of Revenue, "2016 Retailers Fuel Gallons Annual Report, April 2017" and "2015 Retailers Fuel Gallons Annual Report," at page 5.

information from domestic distribution at the terminal level and therefore did not account for downstream blending to create E10.⁷⁰ EPA asserted that its own EMTS data was superior to the EIA data and that this data provided more accurate information on actual use of ethanol in motor fuel. But even as EPA made these assertions and maintained its estimate of 200 million gallons of E0 use in 2017, the Agency conceded that E0 consumption using EMTS data suggested E0 consumption of 700 million gallons in 2015.⁷¹ EPA then justified the use of 200 million gallons of projected E0 use in 2017 on the basis that increasing RFS requirements would force the gasoline market to transition away from the use of E0, which EPA now acknowledges was incorrect.

It should be readily apparent that the gasoline market has not "transitioned" away from E0 in the manner presumed by EPA. Instead, E0 use is driven by consumer demand for multiple end uses. In this regard, EPA has other information available to it justifying a much *higher* projection of E0 utilization than the 500 million gallons assumed in the proposed rule. For example, EPA received comments in response to EPA's solicitation of comment for the Renewables Enhancement and Growth Support Rule from Magellan Midstream Partners, L.P. These informed comments addressed real world, everyday use of E0 indicating that E0 volume from Magellan's central system alone is more than three times higher than EPA's national estimate. Based on the data . . . and other market factors, we believe significant demand for E0 reaches beyond marine applications and extends into the automotive market.⁷²

Extensive information has previously been submitted on this issue from API, AFPM, and various other stakeholders,⁷³ and EPA is required to consider these and other new comments submitted in response to this proposed rule to further consider the level of E0 use in lowering the final 2018 RFS more than proposed.

C. E15 Cannot be Widely Used and Thus Does Not Provide a Solution

EPA continues to acknowledge real world constraints associated with the E10 blendwall, a position that is consistent with the Agency's assessment in the 2014-2016 RFS, as well as the 2017 RFS rulemaking.⁷⁴ As EPA notes, both the limited number of retail stations that offer E15 as well as the limited number of vehicles that are able to use E15 act as constraints on additional volumes of this fuel. In addition, the complexity of the fuels marketplace means that setting RFS standards, in and of itself, will not result in additional use of E15. We agree with EPA that many of the same constraints that were reviewed in the 2014-2016 RFS and the 2017 RFS "will operate to limit growth in the availability of renewable fuel in 2018 as well, both for ethanol and non-ethanol renewable fuels."⁷⁵

⁷⁰ See 81 Fed. Reg. at 89,776.

⁷¹ Id.

⁷² Comment from Magellan Midstream Partners, L.P. filed with respect to Renewables Enhancement and Growth Support Rule, Docket ID No. EPA-HQ-OAR-2016-0041.

⁷³ See, e.g., comments of National Marine Manufacturers Association, EPA-HQ-OAR-2016-0004-1949.

⁷⁴ 82 Fed. Reg. at 34,231.

⁷⁵ *Id.*, referencing 80 Fed. Reg. 77,450 (Dec. 14, 2015) and 81 Fed. Reg. 89,774.

We have commented extensively on the fact that E15 is not a viable solution to the E10 blendwall because E15 is incompatible with most of the existing vehicle fleet and the existing refueling infrastructure, and due to the potential liability issues associated with marketing the fuel.⁷⁶ In fact, automobile manufacturers do not recommend the use of E15 in approximately 85% of the vehicles on the road today, and the potential liability associated with misfueling or damage to such vehicles remains a concern. Further, with regard to the existing retail infrastructure, the Petroleum Marketers Association of America ("PMAA") testified,

To rely on UST system manufacturers to recertify every component of an existing storage system is almost impossible to achieve as they do not want the liability after the fact.⁷⁷

Nearly seven years after EPA granted two partial waivers allowing for the use of E15 in certain light duty vehicles,⁷⁸ it is clear that E15 use has been minimal and that EPA lacks actual data on nationwide E15 use. Instead, EPA attempts to derive an estimate of nationwide E15 sales by relying on the number of retail outlets selling the fuel incorporating further estimates regarding the amount of total sales that are E15.

D. EPA Overestimates the Amount of E85 the Market Can Absorb

EPA estimates of E85 consumption are also far removed from the realities of the fuel market, being based on the relationship between the price of E10 and E85 and a statistical correlation. EPA's continued reliance on flawed methodology, particularly when other data and analysis have been submitted to the administrative record of this rule and other RFS rules over the last several years showing how far EPA's estimates remain from real-world facts, is the epitome of arbitrary and capricious agency action. That the result of its flawed methodology is billions of dollars in additional costs to obligated parties only makes matters worse. EPA has a duty to obtain and base its volumetric requirements on more accurate information.

EPA admits in the proposal that it does not have comprehensive data on the amount of E85 sold in the United States.⁷⁹ Instead, the Agency seeks to either scale data that is available from several states to estimate national usage or correlate data on the "annual average E85 price discount" with E85 sales, taking into account the number of retail outlets selling E85. Using the latter methodology, EPA estimates that 192 million gallons of E85 will be used in 2018.⁸⁰ EPA further indicates that it may receive information regarding the first methodology later this year and take such into account in the final rule.

As discussed in AFPM's and API's extensive comments (in the appendices to these comments) on EPA's approach to determining E85 usage in the proposed 2017 RFS rulemaking, EPA's methodology suffers from several flaws. In summary:

⁷⁶ API 2017 RFS Comments at page 17. API/AFPM Comments on 2014-2016 RFS Rule at 28-34.

⁷⁷ August 1, 2017, "PMAA Testimony before the EPA Public Hearing on the RFS Standards for 2018 and Biomass-Based Diesel Volume for 2019" Hyatt Regency Washington on Capitol Hill, PMAA Executive Committee Member Vern Kelley.

⁷⁸ 75 Fed. Reg. 68,094 (Nov. 4, 2010); 76 Fed. Reg. 4,662 (Jan. 26, 2011).

⁷⁹ Preliminary estimate of E85 consumption in 2016, David Korotney, July 5, 2017.

⁸⁰ *Id.* at 3.

- The stochastic analysis of E85 data from a limited number of states is flawed and produces large uncertainties. Therefore, EPA should not try to scale data that is available from such states to estimate national usage in finalizing the 2018 rule.⁸¹
- EPA has repeatedly overestimated E85 levels in the past compared with relevant EIA data. For instance, in 2015, EIA estimated that only 86 million gallons of E85 were actually sold, which was approximately *half* of EPA's estimated 166 million gallons.
- Infrastructure necessary to facilitate E85 consumption has undergone only modest change. In 2016, EPA estimated that between 3,024 and 3,127 E85 stations operated, according to data from the Alternative Fuels Data Center. As noted in previous comments, this represents only about two % of all gasoline stations. EPA estimates on the number of such stations are higher than those of the Department of Energy.⁸²
- The percentage of flexible fuel vehicles ("FFV") in the U.S. light duty car and truck fleet has not appreciably changed. It has risen, but only from about seven % to about eight % of vehicles. At the same time, regulatory requirements that have incentivized FFV production are phasing out.⁸³
- EPA cannot reasonably rely on unclear consumer response to and acceptance of E85 based on price differential. As we indicated in our 2017 RFS comments, response to lower E85 pricing has varied.⁸⁴
- EPA has also recognized that current marketing of E85 does not support greater use of this fuel. Specifically, due to the withholding of RIN value, consumers do not receive a "pass through" of the RIN value, resulting in little incentive to use the fuel.⁸⁵

The latter point is further supported by the Fuels Institute study that analyzed the retail sale of E85 and found that factors other than price affect E85 sales.

Ultimately, consumers are influenced by numerous factors when deciding to purchase E85. Finding the right conditions to attract the 20 million FFV drivers on the road to opt for E85 instead of unleaded requires careful study of prevailing

⁸¹ EPA indicates that it may utilize additional information on 2016 E85 sales when it becomes available in the final rule. Korotney estimate of E85 consumption; *Id.* at 1. AFPM and API are concerned that extrapolating national sales based on this limited subset of states, which may have the majority of E85 sales, is not realistic. ⁸² See https://www.afdc.energy.gov/fuels/ethanol_locations.html.

⁸³ As EPA recognized in its 2012 light duty vehicle standards, pursuant to 49 U.S.C.§ 32905(b), fuel

economy calculations that favor FFVs are subject to a phase-out and are not available after model year 2019. *See* 77 Fed. Reg. 63,020 (Oct. 15, 2012).

⁸⁴ AFPM 2017 comments at 28.

⁸⁵ "[W]e believe that the generally poor pricing of E85 at retail is not due to the poor pricing of E85 at the wholesale level, but is instead the result of the noncompetitive retail market for E85. This non-competitive market often results in an E85 pricing strategy by retail stations that seeks to maximize fuel margins through withholding RIN value leading to greater profitability, rather than a strategy that seeks to maximize sales volumes through lower retail prices by passing a greater portion of the RIN value through to consumers." *See* https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100PUF0.pdf) at 30.

market conditions, consumer behavior and localized strategies to maximize the return on investment for the fuel. Relying upon price experience alone will not necessarily yield predictable results.

The data presented in this report indicates that retail facility analysis is necessary to fully understand why consumers choose to purchase or not purchase E85, and dispels the assumption that price alone will determine the success of an E85 retail fuel offer. ⁸⁶

Additionally, according to a study by MathPro, "E15 and E85 have achieved only limited market acceptance, due in part to vehicle warranty issues with E15 and infrastructure limitations for both E15 and E85. In addition, when higher blends of ethanol are sold alongside E10, ethanol's fuel economy deficit becomes apparent to consumers."⁸⁷

In summary, although EPA's current proposal estimates that lesser amounts of E85 will be reasonably consumed in 2018 (194 million gallons) than in 2017 (275 million gallons),⁸⁸ the Agency continues to overestimate E85 demand.

E. Conclusion Concerning Ethanol Use and Total Renewable Fuel Volumes

EPA's methodology suffers from a number of flaws, including underestimating E0 use, overestimating the use of E15 and E85, and failing to adequately account for the flattening of gasoline demand. Consequently, EPA should not presume that ethanol will be blended into gasoline at an average rate of 10.13% for 2018. Instead, as AFPM and API previously noted, a conservative estimate of the percentage of E0 in the gasoline pool is 3%, meaning only 97% of gasoline may be blended with ethanol.⁸⁹ Because the overwhelming majority of gasoline that contains ethanol is E10, EPA may reasonably use 9.7% as the projected average annual ethanol blending in 2018. Under the July 2017 EIA Short-term Energy Outlook forecast, which projected the use of 143.95 billion gallons of gasoline in 2018, a 9.7% ethanol level would translate into a "requirement" for 13.96 billion gallons of ethanol.⁹⁰ EPA should promulgate final RFS standards on the basis of this ethanol volume, utilizing its general waiver authority to prevent "severe economic harm," discussed in Section VI, *supra*.

⁸⁶ "Retailing E85: An Analysis of Market Performance, July 2014-August 2015," Fuels Institute, p. 37 ⁸⁷ "RENEWABLE FUEL STANDARDS AND THE ETHANOL BLENDWALL," Prepared for API by

MathPro Inc., August 29, 2013.

⁸⁸ 81 Fed. Reg. at 89,780.

⁸⁹ AFPM and API have previously calculated that E0 was approximately 4% of gasoline in 2015; EIA has calculated the E0 percentage as 1.4% in 2016. Averaging these two data points would yield 2.7%. But sales data from one state, Iowa, indicated an E0 level of approximately 14% in 2015 and 2016. Therefore, we believe that a conservative estimate would be a national average of approximately 3%.

⁹⁰ AFPM and API recognize that the RFS does not specifically mandate the use of ethanol in gasoline. But the Agency has also recognized that the total renewable fuel requirement "drives" the use of ethanol in gasoline subject to real world constraints on using E10 in vehicles built before 2001 and other significant nonroad uses.

V. EPA Should Recalculate the Cellulosic and Advanced Biofuel Volumes for 2018 By More Closely Aligning Projected Cellulosic Biofuel Volumes with Actual Production, and Should Fully Exercise Its Cellulosic Waiver Authority

AFPM and API support EPA's proposal to lower the advanced biofuel volume by the full amount of the reduction in cellulosic biofuel volumes following EPA's projection of 2018 volumes of cellulosic biofuel. AFPM and API further support EPA's proposal to adopt more conservative percentile values in projecting 2018 cellulosic biofuel production. Nonetheless, in light of recent actual production data, we believe that EPA's projected 2018 volume for cellulosic biofuel remains too high.

A. EPA's New Methodology to Estimate Cellulosic Biofuel Production

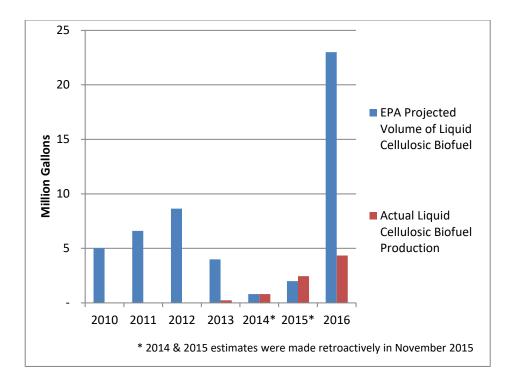
Under CAA §211(o)(7)(D)(i), EPA must project the "volume [of cellulosic biofuel] available during [each] calendar year." Over the years since the cellulosic biofuel requirement first became applicable in 2012, EPA has used various methodologies to implement it. In the proposed rule, EPA has once again revised its methodology for projecting the production of cellulosic biofuel in 2018.

In projecting cellulosic biofuel volumes, EPA must "take a neutral aim at accuracy" and "reflec[t] on the success of earlier applications."⁹¹ But EPA's previous cellulosic biofuel methodologies have invariably overestimated cellulosic biofuel production. For the most recent completed compliance year, EPA projected a total volume of 230 million gallons of cellulosic biofuel would be available in 2016.⁹² Of this amount, EPA projected that 23 million gallons would be in the form of liquid cellulosic biofuel while 207 million gallons would be produced from compressed natural gas/liquified natural gas ("CNG/LNG") facilities. API and AFPM support EPA's decision to evaluate liquid cellulosic and CNG/LNG biogas production separately given fundamental differences between the two markets and fuel types.⁹³ The total amount of liquid cellulosic biofuel in 2016, however, was only 3.8 million gallons.

⁹¹ API v. EPA, 706 F.3d 474, 476-77 (D.C. Cir. 2013).

⁹² 80 Fed. Reg. at 77,508.

⁹³ See 80 Fed. Reg. at 77,499-77,509.



While the production of CNG/LNG cellulosic biofuel in 2016 was much closer to the EPA estimate (188.12 million gallons), EPA *still* overestimated production in this segment of the industry, which it considers to be largely mature.

For 2018, EPA proposes a cellulosic biofuel volume requirement of 238 million gallons, of which 221 million gallons is attributed to CNG/LNG biofuel producers. This represents a significant reduction from the 2017 volume requirement. In projecting 2018 production of *liquid* cellulosic biofuel, EPA has used a methodology similar to that which it has in the past - namely, assembling information concerning the production estimates downward based on actual liquid cellulosic biofuel production in 2016.⁹⁴ EPA is proposing to use a 1st percentile value for new facilities (versus a 25th percentile value used for such facilities in 2016) and a 43rd percentile value for "consistent producers" (versus a 50th percentile value for such producers in 2016). While these percentile values are lower than those used previously, historically *actual* production of liquid biofuel has never reached more than 2.1% of total industry capacity.⁹⁵

AFPM and API believe the lower percentile values proposed by EPA are a step in the right direction considering both the very large error rate EPA experienced in 2016 for liquid cellulosic biofuel projections, as well as EPA's historic overestimation of production from both new and existing or "consistent" producers. EPA should consider, however, whether further downward adjustment is appropriate given that EPA's 2018 projection of liquid cellulosic biofuel

^{94 82} Fed. Reg. at 34,215.

⁹⁵ 2.1% is based on EPA projections and capacity data used in previous rulemakings. *See* 75 Fed. Reg. 76,797; 77 Fed. Reg. at 1,330-31; 78 Fed. Reg. at 49,797, 49,808-09; 78 Fed. Reg. 71,779-80, 71,736. Where EPA included a facility in its projection table for a given year, but determined that production would not begin that year, the facility was excluded from the analysis for purpose of calculating utilization percentage.

production (17 million gallons) represents approximately a 450% increase in production over the most recent full year (2016) for which production data exists. Available production data from 2017 further reinforces this point. Approximately five million liquid cellulosic (D3 and D7) RINs have been produced between January 2017 and July 2017 - a production rate that implies an annual 2017 total of 8.7 million RINs if the same rate of production occurs for the rest of the year.⁹⁶ Even that level of production will likely be reduced to account for RIN generation errors, spills and other adjustments, resulting in a final net RIN total equal to less than *half* of EPA's forecasted 17 million RIN forecast for 2018. EPA has not shown that the market conditions exist for such dramatic year-over-year increases in liquid cellulosic biofuel production.

AFPM and API urge EPA to abandon its prior methodologies that have historically overpredicted cellulosic biofuels. While EPA continues to tweak these methodologies, all suffer from the same fatal flaw - reliance upon the predictions of the very cellulosic producers that face financial pressure from their investors to provide optimistic production projections. For these reasons, AFPM and API continue to urge EPA to adopt a methodology that is based upon recent *actual* cellulosic production rather than the necessarily biased predictions provided by the cellulosic producers.

Specifically, EPA could annualize actual RIN generation data that will be available for August, September, and October 2017 to derive cellulosic biofuel volumes for both liquid cellulosic and CNG/LNG for 2018. This methodology has the benefit of being based on the most up-to-date data on actual proven production, which is a better indicator of future performance than the methods that EPA has used in the past to project production in accordance with statutory requirements.

EPA could also ensure that its projections of cellulosic liquid fuel production are realistic by calculating what percentage of industry-wide capacity is being projected by the methodology it employs to calculate projected production. If the forecasted utilization rate resulting from EPA's methodology materially exceeds the highest achieved historical levels of capacity utilization – e.g., currently 2.1% – EPA could then make further downward adjustment in the final volume requirement based on the level that represents the highest historical percentage of capacity used for liquid cellulosic biofuel production. Such a procedure could serve as an additional check on overly optimistic predictions and as a further means of taking neutral aim at accuracy.

Using actual historic production as the methodology to project future production does not inhibit the growth of the cellulosic biofuel volumes. To the extent that actual production of cellulosic biofuel increases from year-to-year, a new "baseline" is established which EPA will be required to use in implementing the cellulosic biofuel mandate. All market participants will have this knowledge and, therefore, adequate incentive to increase production in order to establish the minimum EPA cellulosic biofuel requirement in an ensuing compliance year.

⁹⁶ See EPA, 2017 Renewable Fuel Standard Data, https://www.epa.gov/fuels-registration-reporting-andcompliance-help/2017-renewable-fuel-standard-data (Accessed Aug. 30, 2017). AFPM and API hereby incorporate by reference the 2010-2017 production data provided in EPA's RFS Program website, https://www.epa.gov/fuelsregistration-reporting-and-compliance-help/public-data-renewable-fuel-standard. *See also* EMTS data in an appendix to these comments.

Finally, API and AFPM urge EPA to provide greater transparency with respect to liquid cellulosic and CNG/LNG biogas production data. In prior years, EPA's final rules have masked the net (as opposed to gross) number of liquid cellulosic and CNG/LNG RINs produced, and have made it difficult or impossible to determine net RIN production on a monthly and annual basis. Because net RINs (rather than gross RINs) are the basis for compliance, EPA should make this data easily accessible to regulated parties and make such data part of the administrative record for purposes of judicial review.

B. EPA Should Further Reduce Advanced Biofuel Volume Requirements

EPA appropriately proposed to reduce the statutory volume target for advanced biofuel in 2018 by the same amount as the proposed reduction in the 2018 cellulosic biofuel volume. EPA also properly proposed to not "backfill" advanced biofuel volumes with non-cellulosic biofuel volumes (primarily advanced biodiesel and renewable diesel) given that statutory volumes of advanced biofuel after 2015 are "driven primarily by increases in cellulosic biofuel."⁹⁷

EPA's approach to advanced biofuel volumes rests on the straightforward observation that Congress provided for dramatically increasing statutory volumes for cellulosic biofuel "nested" within the advanced biofuel statutory volumes. Over the period from 2015 to 2022, cellulosic biofuel becomes an increasingly substantial part of the overall advanced biofuel and total renewable fuel volumes. Thus, imposing RFS requirements that are inconsistent with this congressional expectation should be avoided. To the extent that this rationale in the 2018 proposal departs from EPA's previous practice concerning determining the appropriate volume of advanced biofuel, EPA has authority to change its policy judgments and methodology where such an action is "permissible" and the Agency provides a "reasoned explanation" for this change.⁹⁸

EPA provides several rationales for its approach. For instance, imposing a higher advanced biofuel volume would redirect advanced feedstocks away from competing uses, which would cause market disruptions.⁹⁹ In particular, EPA projects that increasing volumes for advanced biofuels would shift supplies of advanced biodiesel and renewable diesel from other countries to the United States, thereby causing a shift to conventional renewable- or petroleum-based feedstocks in those other countries. In addition, this shift would result in additional emissions from transportation of the additional feedstocks to U.S. shores.

EPA also cites continuing economic uncertainty due to the expiration of a tax credit for blending biodiesel, as well as pending proposals to alter any renewed credit. Following the expiration of the blenders' tax credit for biodiesel at the end of 2016, EPA does not believe it is reasonable to

⁹⁷ 82 Fed. Reg. at 34,220.

⁹⁸ EPA cites to *FCC v. Fox TV Stations*, 556 U.S. 502, 514-515 (2009) for its ability to adopt a new "permissible" approach to its use of cellulosic waiver authority. EPA may also clearly change course where it supplies a "reasoned analysis" for the change. *Motor Vehicle Mfrs. Ass 'n v. State Farm Mutual Auto Ins. Co.*, 463 U.S. 29, 42 (1983). Where EPA engages in appropriate balancing of RFS provisions and provides a rationale for adjusting its implementation of the statute as it does here, it is able to satisfy the requirements for altering its approach to setting advanced biofuel volumes.

⁹⁹ 82 Fed. Reg. at 34,221.

project increasing volumes of imported biodiesel and renewable diesel in 2018.¹⁰⁰ This situation may be further complicated by congressional consideration of changing the tax credit from a blenders' credit to a producers' credit, which would effectively disallow foreign renewable fuel producers to benefit from the credit. And pending Department of Commerce action on trade matters referenced in these comments will likely further reduce available supply.

EPA proposes that 2.5 billion gallons of advanced biodiesel and renewable diesel is "reasonably attainable" in 2018, an increase of 100 million gallons over 2017. EPA also believes that 60 million gallons of "other advanced biofuel" will be available in 2018, consisting of heating oil, naphtha, "D5" renewable diesel, and domestic ethanol.¹⁰¹ Combining these amounts with EPA's 2018 projected volume of cellulosic biofuel (238 million) and 100 million gallons of projected imported sugarcane ethanol, EPA proposes to determine that 4.24 billion gallons of advanced biofuel is "reasonably attainable in 2018."¹⁰²

EPA's estimate of the volume of advanced biofuel that is "reasonably attainable in 2018" however is overly optimistic. Rather than treating imported biofuels, including the effect of the expired biodiesel tax credit on projected imports as EPA has in the proposal, EPA should take a more straightforward approach to imports. As discussed in the following section, EPA should focus on the domestic supply of these renewable fuels when determining advanced biofuel volumes for 2018. Exclusion of these imported fuels combined with other the analysis provided above would yield the following volumes for advanced biofuel in 2018:

Volume (million gallons)

Cellulosic	216^{103}
Advanced Biodiesel/Renewable Diesel	$2,360^{104}$
Other Advanced Biofuel	30^{105}
Total 2018 Advanced Biofuel	2,606

¹⁰⁰ *Id.* at 34,225.

¹⁰¹ *Id.* at 34,227. In the category of "other advanced biofuel," 60 million gallons represents total supply of advanced biofuel other than sugarcane ethanol.

¹⁰² *Id.* at 34,228.

¹⁰³ Per the discussion in Section V *infra*, EPA could consider setting cellulosic biofuel volumes on the basis of actual production in 2017, yielding a different amount. The cellulosic biofuel volume of 216 million gallons is an estimate based on the assumption that the three months of production used to set the 2018 standard average 18 million gallons per month.

¹⁰⁴ Expressed in gallon-RINs. The advanced biodiesel/renewable diesel volume is calculated by using only the domestic portion of the current 2.1 billion requirement for 2018. Specifically, in 2016, domestic D4 RINs that were generated were 2,900 million, while there were 1,200 million RINs generated based on D4 imports. Therefore, domestic production of D4 RINs in 2016 was 72.5% of the total 2016 volume for biomass-based diesel. If this same percentage is applied to the 2018 volume for biomass-based diesel, a total volume of 1,522.5 million gallons/2,360 million RINs can be calculated, *i.e.*, 2,100 million gallons * 72.5% = 1,522.5 million gallons (2,360 million RINs at 1.55 equivalence value).

¹⁰⁵ EPA has considered that the total supply of advanced biofuel (other than imported sugarcane) has been relatively constant during 2014 and thus proposes to find that 60 million gallons would be reasonably attainable in 2018. 82 Fed. Reg. at 34,227. EPA indicates, however, that it may modify its projection as information becomes available during the year. In 2016, EMTS shows 26.3 million D5 naphtha RINs and 1.5 million D5 heating oil RINs. This historical production is the basis of the 30-million gallon recommendation. EPA should therefore utilize its waiver authorities to the extent permissible to address imported biofuels. EPA may rely on both prongs of its general waiver authority to revise advance biofuel requirements downward for 2018. As described in more detail in Section V.C. *infra*, EPA may exclude foreign-produced renewable fuel from its calculation of supply for purposes of exercising a waiver based on "inadequate *domestic* supply." In addition, EPA may determine that severe economic harm would occur due to the imposition of statutory RFS volumes and waive requirements for the four renewable fuels "in whole or in part" on that basis. EPA's authority to exercise this waiver authority is explained in more detail in Section VI.A.

C. EPA Should Focus on the Domestic Supplies of Renewable Fuels When Setting RFS Volumetric Requirements

EPA has requested comment concerning biofuel imports, including any "inherent authority or other basis consistent with general construction of authority in the statute to reduce the required volume of advanced biofuel (with a corresponding reduction to the total renewable fuel requirements) below the level proposed for 2018."¹⁰⁶ As EPA notes, the goals of the RFS include promoting "greater energy independence and security," and statutory provisions concerning BBD require an assessment of the impact of renewable fuels on the energy security of the United States.

EPA may properly interpret its statutory authority to *exclude* imported biofuel from its calculation of annual volumes of renewable fuel. At the same time, EPA may allow RINs generated from imported renewable fuel to be utilized for compliance. The basis for this treatment is outlined in more detail below and in Section VI.B. *infra*, but rests on the RFS goal of increasing the energy independence of the United States and on the statutory structure of the RFS, which calculates annual compliance obligations on the basis of annual gasoline and diesel production and imports. In enacting the RFS, Congress did not intend to create mandates that subsidize foreign fuel providers at the expense of the American consumer.

As a threshold matter, no provision in CAA §211(o) prevents EPA from making distinctions between domestic- and foreign-produced renewable fuels. The fact that EPA allows imported fuel to be imported for purposes of compliance does not mean that EPA should not make reasonable distinctions between domestic and foreign-produced renewable fuel for purposes of establishing RFS mandates.

EPA has consistently described one of the goals of the RFS as reducing the use of "imported oil *and fuel.*"¹⁰⁷ The Energy Independence and Security Act of 2007, which formed the basis of the current RFS program, also includes the goal of "promoting energy independence."¹⁰⁸ Given those goals, including foreign production of renewable fuels in the calculation of the amount of renewable fuel that is "reasonably attainable" is illogical, because foreign production and imports are an obstacle to energy independence, not a promoter of such independence.

¹⁰⁶ 82 Fed. Reg. at 34,212.

¹⁰⁷ *Id.* at 23,906 (emphasis added).

¹⁰⁸ See, e.g., 75 Fed. Reg. at 14,670, 14,705.

Indeed, to the extent that substantial reductions in the use of imported oil and fuel¹⁰⁹ have been achieved in recent years, these goals have been achieved for reasons other than implementation of the RFS. Thanks to technological advancements in oil production and refining, U.S. dependence on foreign sources of oil and fuel products has dropped from 58% in 2007, to 24% today.¹¹⁰

When projecting available supplies of renewable fuel for future compliance years, EPA typically reviews renewable fuel production in previous years.¹¹¹ Thus, inclusion of foreign supplies in the volumetric requirements for any one year tends to increase the volume of renewable fuel that EPA projects is available in the future. This risks improperly "locking in" such production, increasing future dependence on that foreign production. Including foreign-produced renewable fuel within the domestic supply of such fuel also provides an incentive for additional foreign production in the future. This can only serve to undermine the statute's purpose of promoting American energy independence. This situation is exacerbated where there may be instances of product dumping and unfair subsidization of imports, as reflected in the pending Department of Commerce investigation of imports of biodiesel from Argentina and Indonesia.¹¹²

The Department of Commerce¹¹³ announced an affirmative preliminary determination in the countervailing duty ("CVD") case on biodiesel imported from Argentina and Indonesia. This action will impact a significant source of imported¹¹⁴ biodiesel and potentially cause market disruptions. To the extent that biodiesel provides marginal volumes of renewable fuel for meeting annual standards, trade sanctions on imported biodiesel could further increase the costs for obligated parties and consumers. Historically, biodiesel¹¹⁵ has been a renewable fuel that is significantly more costly than petroleum diesel and more costly than ethanol.

AFPM and API recognize that, because the statute provides that importers may be obligated parties, some might argue that imports of renewable fuel are part of the supply of renewable fuel and should be used to calculate annual RFS volume requirements. But CAA 211(o) does not dictate this result. Instead, EPA has authority to determine the applicable volume of renewable fuel pursuant to CAA 211(o)(2)(B) and to calculate annual renewable fuel obligations under CAA 211(o)(3)(ii) that shall be applicable to importers, as well as to other parties, as *appropriate*. The statute does not specify that foreign-produced renewable fuel is part of the "applicable volume" of renewable fuel or that it is to be included within the volume percentages that apply to obligated parties.

Moreover, RFS obligations are imposed on importers on the basis of their importation of gasoline and diesel into the United States, not on their imports of renewable fuel. RFS obligations are required to "ensure that transportation fuel sold or introduced into commerce in

¹⁰⁹ 72 Fed. Reg. at 23,906 (emphasis added).

¹¹⁰ https://www.eia.gov/tools/faqs/faq.php?id=727&t=6.

¹¹¹ See, e.g., Table IV.B.3-1-- Historical Supply of Other Advanced Biofuels, 82 Fed. Reg. 34,227.

¹¹² Initiation of the Department of Commerce investigation began on April 13, 2017. See

http://www.trade.gov/press/press-releases/.

¹¹³ https://www.commerce.gov/news/press-releases/2017/08/us-department-commerce-issues-affirmative-preliminary-countervailing-1.

¹¹⁴ https://www.eia.gov/dnav/pet/pet_move_impcus_a2_nus_EPOORDB_im0_mbbl_m.htm.

¹¹⁵ https://www.eia.gov/pressroom/testimonies/howard_06222016.pdf.

the United States . . . contains at least the applicable volume of renewable fuel."¹¹⁶ This requirement prevents a possible "loophole" whereby imported gasoline or diesel might be able to avoid incurring RFS obligations. However, the fact that RFS obligations may be incurred through the importation of gasoline and diesel is entirely separate from the issue of whether EPA should base RFS volume requirements on foreign-produced renewable fuel or should base such requirements solely on domestic production of renewable fuel that will be used in transportation fuel in this country. Since EPA has authority to *not* impose renewable fuel obligations on importers if *appropriate*, it likewise has authority to tailor this obligation to better serve the purposes of the RFS with regard to energy independence. Similarly, where EPA relies on the second prong of its general waiver authority to lower required applicable volumes of renewable fuel, it is required under CAA

AFPM and API recognize that current RFS regulations impose obligations on importers to surrender RINs in accordance with the amount of gasoline and diesel they import into the United States.¹¹⁷ And EPA in the past has cited to other requirements, such as the non-discrimination principles under the World Trade Organization, as a "concern" if the U.S. were to discriminate against foreign-produced renewable fuels.¹¹⁸ But these regulatory requirements and concerns do not dictate that EPA *must* consider foreign-produced renewable fuel for purposes of calculating "reasonably attainable" renewable fuel mandates. Instead, these factors go solely to domestic *compliance* with the RFS.

Excluding foreign-produced renewable fuel in determining annual RFS volumes of renewable fuel would not require a broad rewrite of current regulatory provisions. EPA can and should retain the current RIN compliance structure, along with requirements that renewable fuels produced outside the United States comply with applicable regulatory definitions. Were EPA to take this approach, foreign-produced renewable fuels would remain available for compliance purposes, and there would be no discrimination against such suppliers. But since foreign-produced renewable fuels do not promote U.S. energy independence, they would not serve as a basis for increasing the mandates on obligated parties located in this country.

Several other policy considerations support this approach. As noted in API's comments on the proposed 2017 RFS:

A direct implication of setting renewable fuel volume standards that exceed the ethanol blendwall is that it encourages imported biodiesel that is produced from palm oil. EPA's own analysis finds that biodiesel produced from palm oil fails to meet GHG emission reduction requirements of the RFS, except it is allowed if it meets grandfathering provisions of EISA. Biodiesel imports into the U.S. from Indonesia, a leading palm oil producing country, have increased from zero in 2012 to 73 million gallons in 2015. This outcome of increased palm oil biodiesel consumption in the U.S. is another inconsistency with EISA's stated purpose to "...to increase the production of clean renewable fuels..."

¹¹⁶ CAA §211(0)(2)(A)(i); *see also* 40 C.F.R. §80.1407.

¹¹⁷ 40 C.F.R. §80.1406(a)(1).

¹¹⁸ Response to Comments for 2017 RFS at 186.

In the 2017 RFS proposal, EPA set the conventional volume at 14.8 billion RINs or 10.42% of the gasoline pool if all conventional biofuel were ethanol, hence breaching the E10 blendwall. In Table IID.1 of the proposal, EPA assumes 400 million gallons of conventional biodiesel/renewable diesel are included in the conventional D6 pool. This continued practice of EPA to encourage imports from grandfathered facilities, including palm based biodiesel/renewable diesel results in significant increases in GHGs, contrary to the stated intents of the Agency to lower GHGs.¹¹⁹

Given EPA's express solicitation of comment in this area, we encourage the Agency in the final rule to consider whether there is "inadequate domestic supply" that supports use of its general waiver authority and to recalculate both advanced biofuel and total renewable fuel volumes without consideration of foreign production.

VI. Recommendation on 2018 Renewable Fuel Volumes/Use of "Severe Economic Harm" and "Inadequate Domestic Supply" General Waiver Authorities

On the basis of our comments above concerning total ethanol, cellulosic biofuel, and advanced biofuel volumes for 2018, we recommend that EPA determine "reasonably attainable" volumes of renewable fuel utilizing its available waiver authority as follows:

	Million RINs
Ethanol	13 , 960 ¹²⁰
Non-Ethanol Cellulosic	200^{121}
Biomass-Based Diesel	$2,360^{122}$
Other Advanced Biofuel	30
D6 Biodiesel/Renewable Diesel	<u>500</u> ¹²³
Total Renewable Fuel Volume 2018	17,050

This level of total renewable fuel and other renewable fuel volumes in 2018 is necessary to avoid severe economic harm, and thus it is lawful for EPA to reduce the volumes to these levels pursuant to the "severe economic harm" prong of its general waiver authority.

Before explaining why the present circumstances justify exercise of EPA's "severe economic harm" authority, we note that EPA may exercise its general waiver authority *concurrently* with

¹¹⁹ Comment submitted by Frank J. Macchiarola, Group Director, Downstream and Industry Operations, American Petroleum Institute at 23. EPA-HQ-OAR-2016-0004-3512.

¹²⁰ Liquid cellulosic biofuel is included within the ethanol total.

¹²¹ Estimated; final total to be based on actual production during 2017.

¹²² The 2018 volume for BBD was promulgated in the 2017 RFS. Per the calculation above for domestic production, the 2018 volume may be calculated as 1,522.5 million gallons, or 2,360 million RINs on an ethanol-equivalent basis.

¹²³ In 2016, EMTS shows 169.3 million biodiesel D6 RINs and 281.6 million renewable diesel D6 RINs. This is the basis for the 500 million RIN recommendation for 2018.

its cellulosic biofuel waiver authority. The D.C. Circuit has noted that EPA has "'broad discretion' to determine 'when and under what circumstances' to use its cellulosic waiver authority."¹²⁴ And in *Americans for Clean Energy*, the D.C. Circuit rejected arguments that use of cellulosic waiver authority was conditioned on use of general waiver authority, noting that "even though the cellulosic waiver provision cross-references two other statutory provisions, it does not cross-reference or otherwise incorporate by reference any limitations on EPA's waiver authority."¹²⁵ Use of general waiver authority is not incidental or incremental to EPA's use of cellulosic waiver authority. "Congress chose to grant EPA two textually distinct waiver authorities that operate in different scenarios pursuant to different limitations."¹²⁶

In addition, when exercising its general waiver authorities, EPA has statutory ability to waive "the *requirements* of paragraph (2)." Thus, EPA may reduce the national requirement for any of the four renewable fuels specified in CAA \$211(0)(2)(B) since such are requirements of CAA \$211(0)(2). In the context of the proposed rule, this means that EPA may waive either the national quantity for total renewable fuel, advanced biofuel, or cellulosic biofuel, or any two or more of these requirements in the same determination.

A. EPA May Waive Applicable Volumes to Prevent Severe Economic Harm

EPA's use of its general waiver authority is proper based on a determination that imposition of the statutory volumes would cause severe economic harm affecting a state, region, or the United States. Specifically, to use its general waiver authority, EPA need only determine that severe harm *would occur* through implementation of a requirement or requirements contained in CAA §211(o)(2). In other words, if imposition of 26.0 billion gallons of total renewable fuel or 11.0 billion gallons of advanced biofuel in 2018 or 7.0 billion gallons of cellulosic biofuel would result in severe economic harm in any part of the United States, then per the express language of the statute, EPA is empowered to waive such requirements "in whole or in part."

Such conditions certainly exist here. EPA has already determined that only 4.273 billion gallons of advanced biofuel is reasonably attainable in 2018 – not the statutory "requirement" of 11.0 billion gallons.¹²⁷ Similarly, EPA has determined that there will be an adequate supply to meet a 19.24 billion gallon volume of total renewable fuel in 2018, but not the 26 billion requirement contained in §211(o)(2). Additionally EPA is proposing to waive all but 238 million gallons of the 7.0 billion gallon requirement for cellulosic biofuel.

While EPA did not propose to use its general waiver authorities to lower 2018 proposed requirements, EPA only declined to do so because it felt it could rely on its cellulosic biofuel waiver authority to implement all necessary volume reductions for the year. At no point did EPA suggest that its general waiver authority was not available for such purpose; instead the

¹²⁴ Americans for Clean Energy, Slip. Op. at 73, citing the 2014-2016 final RFS rule and Monroe Energy, LLC v. EPA, 750 F.3d 909, 915 (D.C. Cir. 2014).

¹²⁵ *Id.* at 77.

¹²⁶ Americans for Clean Energy, Slip. Op. at 77-78, nt.12.

¹²⁷ 82 Fed. Reg. at 34,227.

Agency indicated that it retained authority to use its general waiver authority¹²⁸ and solicited comment on whether it should use that authority to reduce volumes further.¹²⁹

EPA has repeatedly recognized over the last seven years (and particularly within the last four years) that the statutory renewable fuel requirements are simply not attainable. EPA has waived cellulosic biofuel requirements in every year they have been required (from 2010 to 2017) and has waived total renewable fuel and advanced biofuel requirements in every year since 2014. Since the volumetric requirements first took effect, the Agency has cumulatively waived 15.65 billion gallons of cellulosic biofuel requirements through 2017. From 2014 to 2017, EPA also was compelled by the circumstances to cumulatively waive 14.30 billion gallons of the statutory requirements for total renewable fuel and 12.06 billion gallons of advanced biofuel. And in the context of the current proposed rule, EPA is proposing to waive an *additional 6.8 billion gallons* of the statutory requirements for total renewable fuel, advanced fuel and cellulosic biofuel.¹³⁰

Nothing in the record indicates that the conditions that have been present from 2014 on, which have led to successive waivers of billions of gallons of renewable fuel, have changed in 2017 or will change in 2018. Consequently, EPA has recognized in this proposed rule, that it cannot implement any of the three statutory renewable fuel requirements in 2018 or increase the level of 2018 BBD requirements in 2019 without causing severe harm to the economy. This provides a *prima facie* case for exercise of the agency's general waiver authority. Where, as here, severe economic harm would occur¹³¹ if EPA does not act to waive statutory requirements for renewable fuel, general waiver authority is available.¹³²

B. The "Inadequate Domestic Supply" Waiver is Available to Reduce Required Volumes of Renewable Fuel

In *Americans for Clean Energy*, the D.C. Circuit held that "the 'inadequate domestic supply' provision authorizes EPA to consider only *supply-side* factors affecting the volume of renewable fuel that is available to *refiners, blenders and importers* to meet the statutory volume requirements"¹³³ AFPM and API do not endorse or adopt this interpretation of the statute. However, it is important to note that in *Americans for Clean Energy*, the court did not directly address the meaning of "domestic" within this prong of the general waiver provision, nor was the meaning of that term briefed or argued.

 $^{^{128}}$ "We also have the authority to reduce any volume target pursuant to the general waiver authority in CAA section 211(o)(7)(A) under specific conditions described in Section II.A.2 [describing general waiver criteria]." *Id.* at 34,228.

¹²⁹ *Id.* at 34,213.

¹³⁰ Statutory requirements for cellulosic biofuel, advanced biofuel, and total renewable fuel are 7.0 billion gallons, 11.0 billion gallons, and 26.0 billion gallons, respectively. EPA is proposing to reduce these volumes to 238 million gallons for cellulosic biofuel, 4.24 billion gallons for advanced biofuel, and 26.0 billion gallons for total renewable fuel.

¹³¹ NERA ECONOMIC CONSULTING, ECONOMIC IMPACTS RESULTING FROM IMPLEMENTATION OF THE RFS2 PROGRAM (2012, 2015). See appendices to these comments.

¹³² EPA has not provided definitive guidance on what constitutes "severe" harm even as it has addressed general guidance for the submission of petitions requesting a waiver. *See* 73 Fed. Reg at 47,172, 47,183-184.

¹³³ Slip Op. at 4 (emphasis in original).

EPA has provided a sufficient rationale for substantially lowering both renewable fuel volumes in 2018, and as described elsewhere in these comments, we believe that the Agency should make further reductions in 2018 volume requirements. In this regard, while EPA has proposed to rely on its cellulosic waiver authority to make volume reductions, EPA may concurrently use its general waiver authority to reduce such volumes; specifically by excluding imported renewable fuel from consideration in setting annual volumes individually for *each* of these renewable fuels.

i. A General Waiver Based on Inadequate Domestic Supply Permits EPA to Focus on Domestic Production

EPA may rely on its "inadequate domestic supply" waiver authority to lower the statutory volumes to an amount equivalent to the anticipated *domestic* production of renewable fuel.¹³⁴ This approach flows directly from a plain reading of the statutory language.

The definition of "domestic" compels an interpretation that solely focuses on renewable fuels production occurring in the United States. *Merriam-Webster Dictionary* defines "domestic," as pertinent in this context, as "of, relating to, or originating within a country and especially one's own country." ¹³⁵ The *Oxford English Dictionary* similarly defines "domestic" as "[o]f or pertaining to one's own country or nation; not foreign, internal, inland, 'home." ¹³⁶ The *American Heritage Dictionary* defines "domestic" as "[o]f or relating to a country's internal affairs: domestic issues such as tax rates and highway construction."¹³⁷ None of these definitions supports the interpretation that renewable fuels available for import from a foreign source are part of the "domestic supply" for purposes of determining whether the statutory volumes can be met.

The plain meaning of "domestic supply" is further supported by the criteria for setting BBD requirements starting in 2013 and for *all renewable fuel* starting in 2023. Specifically, CAA $\S211(o)(2)(B)(ii)$ provides that in setting requirements for these years EPA "shall" determine applicable volumes with reference to "the impact of renewable fuels on the energy security of the United States . . . the impact of renewable fuels on the infrastructure of the United States [and] the impact . . . on other factors, including job creation . . . [and] rural economic development."¹³⁸ All of these criteria are unequivocally domestic concerns; no factor that EPA must consider references the consideration of any factors which occur exclusively outside of the U.S..

While EPA should not include imported renewable fuels to increase the RFS mandates, Congress specifically contemplated that imported renewable fuels *can* be used for demonstrating compliance with the volumes EPA establishes (*i.e.*, for the generation of RINs). For example,

¹³⁴ In the proposal, EPA explicitly solicited comment "on what steps EPA might take to ensure energy independence and security . . . and to what degree [consideration of biofuel imports] could support the use of the general waiver authority, inherent authority or other basis consistent with the general construction of authority in the statute to reduce the required volume of advanced biofuel (with a corresponding reduction to the total renewable fuel requirement) below the level proposed for 2018." 82 Fed. Reg. at 34,212. Our comments regarding EPA's use of the "inadequate domestic supply" waiver authority to exclude consideration of foreign-sourced renewable fuels in setting the volume requirements for 2018 are responsive to this request.

¹³⁵ https://www.merriam-webster.com/dictionary/domestic.

¹³⁶ http://www.oed.com/view/Entry/56663?redirectedFrom=domestic#eid.

¹³⁷ https://ahdictionary.com/word/search.html?q=domestic.

¹³⁸ CAA §211(0)(2)(B)(ii)(I),(IV),(VI).

CAA §211(o)(5)(A)(i) provides "for the generation of an appropriate amount of credits by any person that refines, blends, or *imports gasoline that contains a quantity of renewable fuel* that is greater than the quantity" required of that obligated party for the year in question. (Emphasis added.) In a similar vein, CAA §211(o)(5)(E) expressly provides that EPA "*may* issue regulations providing: (i) for the generation of an appropriate amount of credits by any person that refines, blends, or imports additional renewable fuels specified by the Administrator; and (ii) for the use of such credits by the generator, or the transfer of all or a portion of such credits to another person, for the purpose of complying with" the volumetric requirements." (Emphasis added.) Thus, the statute explicitly provides that imports are able to generate RINs, but does not provide that EPA should use imported biofuels to increase RFS mandated volumes. This bifurcation of the treatment of imported fuels serves as an important consumer protection mechanism that allows competitors to lower the cost of complying with the mandate.

ii. Focusing on Domestically-Produced Renewable Fuels is Consistent with *Americans for Clean Energy*

Excluding imported renewable fuels from consideration when analyzing EPA's waiver authority is consistent with the recent D.C. Circuit opinion on EPA's 2014-2016 RFS standards. In *Americans for Clean Energy*, the D.C. Circuit held that "inadequate domestic supply" authorizes EPA "to consider supply-side factors affecting the volume of renewable fuel that is available to refiners, blenders, and importers to meet the statutory volume requirements."¹³⁹ In reaching this decision, the court spent considerable time interpreting which product's "supply" is referenced in the waiver provision and concluded (wrongly, we believe) that "the only reasonable interpretation is that the 'product' at issue is the only product referenced in the provision: 'renewable fuel."¹⁴⁰

While the court did state that "EPA may consider factors affecting the availability of renewable fuel available to refiners, blenders, and importers to meet the statutory volume requirements . . . [including] . . . the amount of renewable fuel available for import from foreign producers,"¹⁴¹ the question of whether the "*domestic* supply" of renewable fuel can permissibly include foreign renewable fuel that is available for import was not at issue in that case, nor was it briefed or argued by any party. The court's statement is therefore dictum.¹⁴² Moreover, including imported biofuels within the "inadequate domestic supply" waiver provision would serve to read "domestic" out of the statute.

VII. Biomass-Based Diesel in 2019

EPA has cited several factors that affect its assessment of BBD production and the amount of "reasonably available" BBD in 2019. First, biodiesel tax credits expired at the end of 2016, and

¹³⁹ *Slip Op.* at 4. As noted above, AFPM and API do not agree with the D.C. Circuit that use of the "inadequate domestic supply" general waiver is limited to supply-side factors affecting only the supply to obligated parties, but that the provision may also consider constraints on supply to consumers as articulated by EPA in its 2014-2016 RFS rule.

¹⁴⁰ *Id*. at 26.

¹⁴¹ *Id.* at 29 (emphasis added).

¹⁴² See, e.g., Webster v. Fall, 266 U.S. 507, 511 (1925) (stating that "[q]uestions which merely lurk in the record, neither brought to the attention of the court nor ruled upon, are not to be considered as having been so decided as to constitute precedents").

it appears unlikely that such credits will be reinstated by November 30, 2017, the statutory deadline for promulgating requirements for total renewable fuel, advanced biofuel, and cellulosic biofuel. As EPA has noted, "[t]he historic data indicates that biodiesel tax policy in the United States can have a significant impact on the supply of biodiesel and renewable diesel in any given year."¹⁴³ And, while EPA considers the impact of the expired tax credit on biodiesel imports to be "highly uncertain,"¹⁴⁴ it is clear that its expiration is a disincentive to the importation of BBD into the United States.

EPA also believes that the level of the 2018 standard for BBD affects the supply of qualifying fuel in 2019. EPA states that "it is reasonable to expect that the supply of biodiesel and renewable diesel could increase [by 100 million gallons] from 2017 to 2018 without the biodiesel tax credit, but with the 2018 RFS requirements in place to incentivize the necessary supply."¹⁴⁵ With the 2018 requirement in place, EPA projects that the biodiesel and renewable diesel market is capable of supplying 2.9 billion gallons in 2019.

At the same time, however, EPA believes that the level of the BBD standard does not "drive" actual use, but that volumes above the standard are driven by the requirements for advanced biofuel and total renewable fuel, the tax credit, and favorable blending economics.¹⁴⁶ And EPA believes that it should set a standard for BBD that "preserv[es] space under the advanced biofuel standard for non-BBD advanced biofuels, as well as BBD volumes in excess of the BBD standard "¹⁴⁷

Given EPA's interpretation of its authority to project BBD volumes and set standards with respect to what it perceives as an objective of the RFS program (*i.e.*, to allow for growth in advanced biofuels other than BBD), EPA would be well within its authority to focus on domestic production when setting the standard for BBD in 2019.

Imports of biodiesel and renewable diesel have been increasing since EPA began establishing volume requirements for BBD in 2013 in the absence of statutory volumes (other than the statutory "floor" of one billion gallons). Imported biodiesel and renewable diesel amounted to 156 million gallons and 145 million gallons respectively in 2013, for a total level of 301 million gallons of imported fuel. In 2016, imported biodiesel and renewable diesel amounted to 561 million gallons and 170 million gallons, respectively. Thus, total imports of biodiesel and renewable diesel have increased from 301 million gallons in 2013 to 731 million gallons in 2016.¹⁴⁸ This represents an increase of over 240% in four years. EPA may take this rapid growth in imports into account as contrary to the energy independence objectives of the RFS. Accordingly, as discussed above, EPA must focus on the domestic production of such renewable fuels when the Agency determines the appropriate renewable fuel volumes to be used.

¹⁴⁷ *Id.* at 34,240

¹⁴³ 82 Fed. Reg. at 34,255.

¹⁴⁴ Id. at 34,226.

¹⁴⁵ *Id.* at 34,233, nt. 96.

¹⁴⁶ *Id.* at 34,239.

¹⁴⁸ Source: Table IV.B.2-1 of proposed rule.

Given that there is no specified "applicable volume" of BBD after 2012, EPA also faces no statutory constraint in excluding amounts of imported BBD when it determines the appropriate renewable fuel volumes.¹⁴⁹ EPA's proposed volume of 2.1 billion gallons in 2019 is over twice the level of the statutory minimum of 1.0 billion gallons and is considerably below actual levels utilized for compliance with the RFS. Thus, lowering the 2019 requirement to exclude consideration of imported BBD (*e.g.*, 730 million gallons in 2016) would still leave the required volume in excess of statutory minimums while allowing even greater opportunity for obligated parties to utilize a full range of advanced biofuels to meet 2019 RFS standards, consistent with EPA's stated objective to create potential for competition between BBD and other advanced biofuels.¹⁵⁰ Such a result would also allow the market to better decide which renewable fuels to use given the large price differential between BBD and petroleum diesel.

Finally, when establishing the BBD requirement, EPA should account for the continuing enforcement actions and the large amount of BBD RINs that EPA has held to be "invalid". AFPM and API have previously supported changes in enforcement policies in this area that require the replacement of invalid RINs even where an obligated party had no knowledge of illicit activity regarding fraudulent RINs. We include previous statements on this matter in AFPM/API comments to EPA on the RFS RIN Quality Assurance Plan proposal in 2013 (an appendix to these comments).

VIII. Suggestions for Improving the RIN Market

EPA seeks comment with regard to the operation of the RIN market related to market manipulation and RIN trading. EPA also seeks comment on specific RIN data elements and posting frequency that stakeholders believe would increase market transparency and liquidity.

Regarding market manipulation, EPA should reexamine how the Agency treats "invalid RINs" for the purpose of enforcement. While the Agency has taken some steps to improve validation methods for RINs, it is clear that invalid RINs continue to make their way into the marketplace. Within the last ten months, EPA has issued four separate Notices of Violations involving over 160 million RINs.¹⁵¹ These enforcement actions have included both RINs that were verified as A-RINs under EPA's Quality Assurance Plan rule and unverified RINs. Given the breadth, variety, and indeed the ingenuity of past RIN fraud schemes, even the most diligent purchaser of RINs remains at risk of acquiring RINs that EPA will later determine are invalid and must be replaced.

EPA should therefore consider making adjustments to its enforcement policies concerning "invalid RINs," as well as regulatory changes that protect good faith purchasers of invalid RINs. AFPM and API have previously submitted comments on these issues, specifically with regard to EPA's requirement that invalid RINs be replaced by obligated parties, even while such parties took prudent steps in the purchase of RINs for compliance. Specifically, AFPM and API have noted that:

 ¹⁴⁹ EPA need only comply with the minimum volume of 1 billion gallons as specified in §211(o)(3)(B)(v).
¹⁵⁰ Draft Statutory Factors Assessment for the 2019 Biomass Based Diesel (BBD) Applicable Volume,

Memorandum to docket, Office of Transportation and Air Quality at 5.

¹⁵¹ See: https://www.epa.gov/enforcement/civil-enforcement-renewable-fuel-standard-program.

EPA asserts that the requirement to replace RINs is needed to ensure the annual national RFS volumes are met. Yet, the fact remains that it is not possible to go back in time and induce additional biofuel production for a prior year. For this reason it is impossible to "keep the program whole" and EPA's insistence on RIN replacement would not achieve that goal . . . The liability stemming from RIN invalidity should be limited to the party or parties that caused the invalidity to occur. Requiring RIN replacement or civil penalties for a verified RIN should be limited to renewable fuel producers, RIN generators, auditors, and parties that otherwise caused RINs to become invalid. Requiring obligated parties to replace verified RINs undermines the value of the affirmative defense and may not solve the RIN liquidity problem. Obligated parties who have purchased verified RINs without actual knowledge of invalidity should not be required to re-purchase RINs to replace any verified RINs that EPA subsequently has determined to be invalid.¹⁵²

Some of the same considerations also apply to the case of unverified RINs. As with verified RINs, requiring RIN replacement does not impact renewable fuel production that occurred in the past. EPA should therefore impose the requirement to replace RINs *to the party or parties who caused the invalidity to occur*.

Requiring obligated parties to replace either verified or unverified RINs can also place substantial compliance pressures on an individual party. Where, as in the proposed rule, EPA has calculated renewable fuel obligations based on an assessment of the anticipated, massive shortfall in the production of cellulosic biofuel in 2018, an obligated party may need to acquire additional RINs in tight market conditions and in a timeframe which is unrelated to their current year compliance strategy. This can impose substantial costs given that individual RIN fraud cases have involved tens of millions of invalid RINs and, as noted above, there was a cumulative total of 160 million invalid RINs within the last year alone.¹⁵³

Regarding RIN market transparency, EPA already publishes a substantial amount of information concerning RIN generation by fuel type on its website. EPA has both expanded the amount of information available through EMTS and improved the timeliness of providing such data. This data provides valuable insight into compliance activities related to the RFS.

It bears emphasizing, however, that information provided to EMTS from obligated parties is not voluntary; it is compelled by regulations requiring the reporting of transactions and other compliance activities. Therefore, obligated parties retain valid claims to Confidential Business Information concerning some of the information required to be provided to EPA.

¹⁵² Comments of AFPM and API, Proposed RFS Renewable Identification Number (RIN) Quality Assurance Plans, April 13, 2013, EPA-HQ-OAR-2012-0621.

¹⁵³ https://www.epa.gov/enforcement/civil-enforcement-renewable-fuel-standard-program.

IX. Conclusion

EPA may further reduce renewable fuel volumes for all four renewable fuels in 2018 relying on concurrent application of its general and cellulosic waiver authorities. Specifically, EPA may use such authority to lower the total renewable fuel volume in 2018 to 17.050 billion gallons, the total advanced biofuel volume to 2.606 billion gallons, and cellulosic biofuel volume to 216 million. BBD should be limited in 2018 to 1.522 million gallons (2,360 RINs). Reducing renewable fuel volumes and volume percentages that apply to obligated parties would better align such requirements with the statutory structure and purpose of the RFS, particularly with respect to enhancing the energy independence of the United States and the protection of consumers. Requiring no more than 9.7% volume ethanol in gasoline recognizes legal and practical constraints to utilization of higher ethanol blends in motor vehicles and equipment. Reducing the advanced and cellulosic biofuel requirements would acknowledge the hard reality that such fuels have not made significant progress in their development and use, despite ten full years of statutory mandates for such fuels.

EPA has authority to refocus the RFS on the production of *domestic* renewable fuels. EPA also should endeavor to make improvements to the operation of the RFS program and discard policies like replacement of "invalid RINs," which do not support additional production and are fundamentally unfair.

To be clear, API and AFPM and their member companies believe that biofuels will continue to play a role in the U.S. fuel supply. Our membership both purchases and produces such fuels. But where we part company from EPA's implementation of the program is where the RFS is implemented to require the use of biofuels that do not exist or that the market cannot support. EPA now has the opportunity to change course and properly refocus the RFS program consistent with Congressional intent and the realities of the fuel marketplace. We urge the Agency to proceed in this direction.

APPENDICES

AFPM comments to EPA on the 2017 RFS proposal

API comments to EPA on the 2017 RFS proposal (cover letter and detailed comments)

EPA Moderated Transaction System Data

"Economic Impacts Resulting from Implementation of RFS2 Program," October 2012, prepared by NERA for API

"Economic Impacts Resulting from Implementation of the RFS2 Program," July 27, 2015, prepared by NERA for API

AFPM/API comments to EPA on the RFS RIN Quality Assurance Plan proposal, April 18, 2013