

EPA Actions on the RFS Are Destroying Demand for Ethanol and Corn

Recent actions by EPA have effectively reduced the RFS conventional renewable volume obligation (RVO) for 2016 by more than 1 billion gallons. Further, the Agency appears poised to take similar actions to effectively reduce the 2017 and 2018 conventional RVOs by comparable amounts. While EPA did not attempt to misuse its statutory waiver authority to reduce the RFS requirements in 2017 and 2018, the effect on demand has been the same. Administrative cuts to the RFS have resulted in significantly lower RIN prices, reduced corn and ethanol demand, avoided legal obligations for highly profitable businesses, and windfall profits for certain small oil refiners.

EPA Actions Have Reduced the 2016 RFS Requirement from 15 BG to Just 13.8 BG

In November 2015, EPA finalized a 2016 RFS requirement of 14.5 for conventional renewable fuel, despite the fact that Congress specified a requirement of 15 BG for 2016. In July 2017, the D.C. Circuit Court of Appeals ruled that EPA erred in reducing the 2016 requirement from its statutory level and directed EPA to enforce the statutory requirement of 15 BG for 2016.

In November 2017, EPA disclosed that it had exempted 14 small refiners from the 2016 RFS requirements and was considering exempting two additional refineries. The exempted volume for the 14 refineries amounted to 515 million RINs being removed from the total 2016 obligation, effectively reducing the RVO from 15 BG to 14.485 BG. Because these exemptions were granted *after* the 2016 RVO was finalized, the lost volume was not recovered by reallocating it to remaining obligated parties.

In January 2018, EPA announced that it would not immediately enforce the full 2016 RVO of 15 BG as remanded by the court. This had the effect of further reducing the 2016 RVO by another 500 million gallons to 13.985 BG.

Then in March 2018, as part of a consent decree and settlement agreement with Philadelphia Energy Solutions (PES), EPA announced it would excuse PES from a large portion (329 million RINs) of its 2016 and 2017 RFS obligations. If that de facto exemption is equally spread across both 2016 and 2017, then the 2016 RVO was further reduced by 165 million RINs.

Together, these actions resulted in the 2016 RFS requirement being lowered from 15 BG to just 13.82 BG—an 8% reduction. **See Figure 1**.

EPA is Poised to Also Reduce the 2017 RFS Requirement from 15 BG to Just 13.8 BG

In November 2016, EPA finalized the 2017 RVO for conventional renewable fuels at the statutory level of 15 BG. However, it was reported in January 2018 that EPA was reviewing RFS compliance exemption requests from 27 small refineries.

If all 27 of those requests are granted by EPA, and if the exempted volume per small refinery is equal to the average per exempted refinery in 2016, then total exempted volume could be on the order 993 million gallons. This would effectively lower the 2017 RVO from 15 BG to 14.007 BG. Because these exemptions would be granted after the 2017 RVO was finalized, the lost volume would not be recovered by reallocating it to remaining obligated parties.

Further, if the PES exemption (329 million RINs) is equally spread across both 2016 and 2017, then the 2017 RVO would be further reduced by 165 million RINs to just 13.842 BG. **See Figure 2.**

EPA Will Likely Use Small Refiner Exemptions to Also Lower the 2018 RVO

The number of small refineries applying for exemptions virtually doubled from 2016 to 2017 because refiners saw that EPA granted an unprecedented number of exemptions in 2016. Thus, these small refiners will continue seeking exemptions from RFS requirements beyond 2017, and in fact may already be doing so (it was reported by Reuters that exemption requests under EPA review in January 2018 covered "multiple years").

Given the precedent set by the large number of exemptions granted for 2016 compliance, and the increasing number of small refiners seeking exemptions from 2017 requirements, it seems likely that EPA would continue this practice for the 2018 compliance year. Because these exemptions would be granted after the 2018 RVO was finalized, the lost volume would not be recovered by reallocating it to remaining obligated parties.

What Has Happened to RIN Prices as a Result of these Actions?

Prices for D6 (ethanol) RINs have crashed by 60% since November, as EPA has taken actions to administratively reduce the RFS requirements (see Figure 3). RIN prices were as high as 97 cents in early November 2017, but had fallen to just 38 cents by late March. If the refiners' goal in recent "RIN reform" talks was to secure lower RIN prices, they have already succeeded and clearly no additional administrative actions are needed to "contain" RIN prices.

What Does This Mean for Ethanol and Corn Demand?

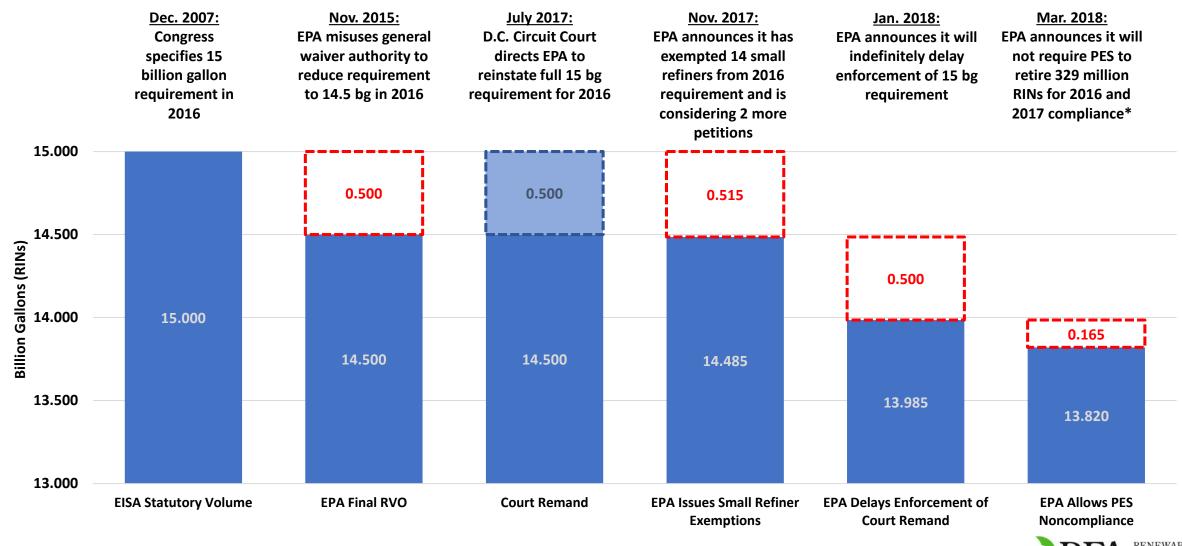
EPA actions led to the reduction of the 2016 RVO by nearly 1.2 billion gallons and the Agency appears poised to lower the 2017 RVO by a similar amount. Thus, nearly 2.4 billion gallons of ethanol demand and **860 million bushels of corn demand** have potentially been lost over the past two compliance years due to recent EPA actions. Iowa State University recently estimated that losing 700 million gallons of ethanol demand (250 million bushels of corn) within a crop year could cause corn prices to fall \$0.25/bushel. Based on simple models that predict corn price based on stocks-to-use ratios, losing 1.2 billion gallons of demand (430 million bushels) in the current marketing year could cause current corn prices to fall by **as much as \$0.50-0.70/bushel**.

How About Those Small Refiners?

Lost in all of the buzz about "RIN reform" is the fact that many small refiners who are advocating for lower RIN prices have been given small refiner exemptions and therefore are not obligated to obtain RINs for compliance. In fact, refiners who received exemptions are now selling the RINs they had accumulated prior to receiving the exemption. So, not only do those refiners no longer have an obligation to purchase RINs, but they are also profiting from selling the RINs they had previously acquired. And, far from experiencing "economic hardship," many small refiners who have received exemptions from their 2016 obligations—including HollyFrontier, Sinclair, Delek, and Calumet Refining—are recording healthy financial performance and strong profits.

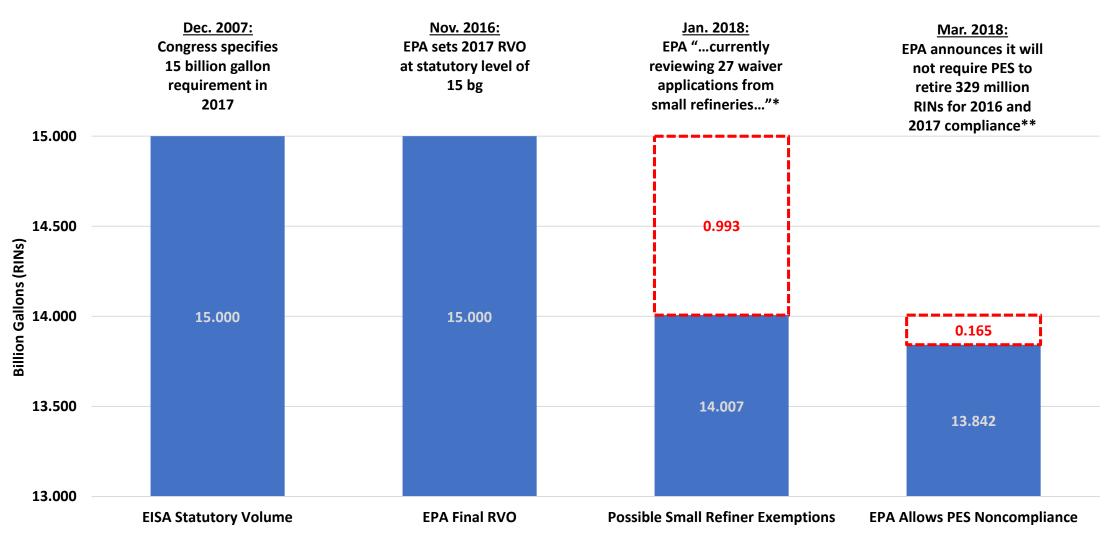
Figure 1.

How EPA systematically destroyed demand for at least 1.2 billion gallons of ethanol by slashing the 2016 RVO



^{*}Assumes half of the 329 million gallon exemption for PES is applied to 2016 compliance

Figure 2. EPA appears poised to destroy *another ~1.2 billion gallons* of demand via cuts to the **2017 RVO**



^{*}Reuters (Jan. 25, 2018). Assumes 2017 small refiner exemptions will be 37 million RINs per exempted refinery (based on 515 million RIN exemption for 14 small refineries in 2016)

^{**}Assumes half of the 329 million gallon exemption for PES is applied to 2017 compliance

Figure 3.

RIN prices have crashed by 60% since November due largely to EPA actions that effectively cut RFS requirements

D6 (Ethanol) Daily Prices

