



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

August 8, 2023

THE ADMINISTRATOR

Re: August 10, 2023, E15 Reid Vapor Pressure Fuel Waiver

Dear Governors:

By this letter the U.S. Environmental Protection Agency is issuing a temporary waiver under Clean Air Act (CAA) Section 211(c)(4)(C)(ii)(I), 42 U.S.C. § 7545(c)(4)(C)(ii)(I), to address extreme and unusual fuel supply circumstances caused by the ongoing war in Ukraine that are affecting all regions of the Nation.

The CAA and the implementing regulations at 40 C.F.R. Part 1090 require the use of low volatility gasoline during the summer months in order to limit the formation of ozone pollution. These regulations are found at 40 C.F.R. § 1090.215. *See also* <https://www.epa.gov/gasoline-standards/gasoline-reid-vapor-pressure>. These gasoline volatility regulations apply to retailers and wholesale purchaser-consumers beginning on June 1, 2023, and to all other persons beginning May 1. Specifically, the regulations require parties upstream of retailers and wholesale purchaser-consumers to turn over their storage tanks to low volatility summer gasoline and stop selling higher volatility winter gasoline by May 1 so that retailers and wholesale purchaser-consumers can meet the applicable low volatility gasoline standards by June 1.

Russia's unjustified, unprovoked, and unconscionable war against Ukraine, and its ongoing destructive military campaign, has had a profound impact on global and domestic energy markets over the past year. As a result of Russian actions, public pressure on international economic engagement with Russian businesses, and the international community's imposition of sanctions on Russia's financial system and energy sector, the global supply of crude oil has been disrupted and remains volatile.

Domestic and international sanctions and public pressure on Russia have significantly disrupted the supply and distribution of purchasable barrels of crude oil and petroleum products in the global market for the U.S. and likeminded countries. Additionally, on April 2, 2023, OPEC+ announced an unexpected reduction in crude oil output by OPEC+ member countries of 1.16 million barrels per day, further constraining the market. This follows previous reductions in crude oil output announced by OPEC+ members in November 2022, for a total reduction of 3.66 million barrels per day, which represents about 3.7% of global crude oil demand.¹ While the

¹ <https://www.reuters.com/business/energy/sarabia-other-opec-producers-announce-voluntary-oil-output-cuts-2023-04-02/>

Short Term Energy Outlook (STEO) from the Energy Information Administration (EIA) notes that “global oil markets will be in relative balance over the coming year” and that “global liquids fuel production will increase because of strong growth from non-OPEC countries,” the STEO also notes that “global liquid fuels consumption will rise in 2023.”² In general, even small, sudden reductions in supply can have an outsized impact on global markets and lead to an imbalance of supply and demand.

Refining capacity in the U.S. is also lower due to refinery closures across the country. Since 2020, U.S. refining capacity has been reduced by nearly 1 million barrels per day due to permanent closures of refineries stemming from low demand during the COVID-19 pandemic and damage from hurricanes and accidents. Even while demand has accelerated in the United States, exports of U.S. gasoline are at the highest levels of the last five years. The STEO forecasts reduced refinery throughput because of “higher crude oil prices, in response to OPEC production cuts, which reduce refinery margins and lower runs, along with a reduced outlook for net exports.”

Additionally, U.S. gasoline demand is relatively strong compared to the five-year seasonal average. The four-week rolling average of “U.S. product supplied of finished motor gasoline,” which represents gasoline demand, was above the five-year seasonal average and above demand at the same time last year.³ The summer driving season is under way with traditionally higher demand for gasoline through September.

In contrast to higher gasoline demand this year, total U.S. motor gasoline stocks were below the five-year average. Additionally, gasoline stocks in several regions, as well as total U.S. gasoline stocks, have been at or below the bottom of the five-year range since early 2022.⁴ The Midwest region—the region that has the most ability to increase supply with blending an increased percentage of ethanol—has gasoline stocks below the five-year seasonal average for this time of year. The low gasoline stocks limit the cushion available for the U.S. to absorb temporary disruptions to the fuel supply chain, increasing the possibility of supply shortages.

There are reasons to believe that the current circumstances affecting global supply of crude oil and petroleum products will continue in the near term, including sanctions limiting the purchase of Russian crude oil and petroleum products by the U.S. and likeminded countries, as well as crude oil production reductions by OPEC+ members. The restricted use of Russian crude oil and petroleum products, accompanied by lower-than-expected Chinese exports, will sustain demand for the export of U.S. product, including gasoline. At the same time, pressure on U.S. markets, including production and distribution of gasoline and other petroleum products due to decreased refining capacity and increased domestic demand, will continue for the foreseeable future. EPA has concluded, with DOE’s concurrence, that it is in the public interest to take action to address

² https://www.eia.gov/outlooks/steo/pdf/steo_full.pdf

³ <https://www.eia.gov/outlooks/steo/>

⁴ See Aug 2, 2023, WPSR.

the supply circumstances that prevent distribution of an adequate supply of gasoline to consumers.

The Clean Air Act provides EPA with the authority to temporarily waive a control or prohibition if the Administrator makes certain determinations. CAA § 211(c)(4)(C)(ii)(I-III), 42 U.S.C. § 7545(c)(4)(C)(ii)(I-III). In particular, the statute authorizes EPA to determine there are “extreme and unusual fuel [] supply circumstances” that prevent the distribution of an adequate supply of gasoline to consumers. CAA § 211(c)(4)(C)(ii)(I), 42 U.S.C. § 7545(c)(4)(C)(ii)(I). Here, EPA is exercising its statutory discretion to identify a lack of an “adequate fuel supply” under these unique circumstances where there has been a particularly unexpected and extreme form of disruption. This extreme and unusual fuel circumstance is the result of Russia’s ongoing war in Ukraine, and related global supply issues, events that could not reasonably have been foreseen and are not attributable to a lack of prudent planning on the part of suppliers of the fuel to these areas. CAA § 211(c)(4)(C)(ii)(II), 42 U.S.C. § 7545(c)(4)(C)(ii)(II).

Furthermore, I have determined that it is in the public interest to grant this waiver. CAA § 211(c)(4)(C)(ii)(III), 42 U.S.C. § 7545(c)(4)(C)(ii)(III). The Agency in taking this action is seeking to address the extreme and unusual fuel supply circumstances in the market by allowing the continued sale of E15 during the summer driving season. Absent this action, retailers that currently sell E15 (gasoline with 85% petroleum gasoline content) would need to stop selling the fuel and instead only sell E10 (gasoline with 90% petroleum gasoline content). This switch, from E15 to E10, would increase the demand for petroleum-based gasoline at the very time that the Agency has concluded that a fuel supply issue persists due to the ongoing war in Ukraine. The Agency’s waiver action here will eliminate the need for retailers to shift to E10 and in the process will prevent the increased demand for petroleum gasoline that would otherwise occur. Since E15, allowed under this waiver, is required to meet the same volatility standard as E10, no overall change in evaporative emissions impacts are projected to occur as a result of this action. This is because it is the volatility of the gasoline blend that drives evaporative emissions, not the ethanol content. EPA has similarly found in comparing exhaust emissions between E10 and E15 that some criteria pollutants would have relatively small increases (NO_x) and others have similar decreases (VOC and CO) while still others are less certain (PM). In the E15 CAA Section 211(f)(4) partial waivers, we determined that effects of this magnitude were too small to cause or contribute to model year 2001 and newer light duty motor vehicles to exceed the vehicles’ certified exhaust emissions standards.⁵ After weighing the societal benefits of an incrementally higher volume of gasoline being made available to the public, and considering that no significant change in air pollution is projected to occur as a result of this action, EPA concludes that this action is in the public interest.

In addition, I have determined that this waiver applies to the smallest geographic area necessary to address the fuel supply circumstances described in this action. CAA § 211(c)(4)(C)(iii)(I), 42 U.S.C. § 7545(c)(4)(C)(iii)(I). In determining the geographic scope of this action to include all

⁵ Modifications to Fuel Regulations to Provide Flexibility for E15; Modifications to RFS RIN Market Regulations 84 Fed. Reg. 26,980 (June 10, 2019).

states and regions within states which currently have the 1 psi waiver for E10 (about two-thirds of US gasoline), EPA has sought to maximize the increase in fuel volumes by maintaining the availability of E15. In areas of the country where the 1 psi increase for E10 is not allowed through state or EPA regulations (e.g., in reformulated gasoline areas), E15 can already be sold in the summer and no action is needed to continue to allow the sale. Hence, the geographic extent of the waiver represents the smallest geographic area necessary to continue to allow E15 sales and through that ensure the largest increase in gasoline volume possible without extending the waiver into regions of the country where it is not necessary.

Therefore, to minimize or prevent disruptions of the supply of gasoline, I am waiving the condition in CAA Section 211(h)(4), 42 U.S.C. § 7545(h)(4) that allows “fuel blends containing gasoline and 10 percent denatured anhydrous ethanol” to exceed the applicable RVP standard by 1 psi for fuel blends containing gasoline and between 9 and 15 percent denatured anhydrous ethanol (E15) that is distributed and sold in areas within the contiguous United States where the 1 psi waiver applies to E10.⁶ Under this temporary waiver, regulated parties may produce, sell, and distribute summer gasoline that exceeds the applicable RVP standard at 40 C.F.R. § 1090.215(a)(1) and (2) by 1 psi if the fuel blend is E15. This waiver is effective on August 10, 2023, and will continue for 20 days. It is the Agency’s intention to issue new waivers effectively extending (renewing) this waiver until such time as the extreme and unusual fuel supply circumstances described in this action are no longer present.

Gasoline that does not meet the applicable RVP requirements may not be introduced into terminal storage tanks from which gasoline is dispensed into trucks for distribution to retail outlets in the designated states after August 29, 2023, unless EPA renews the waiver. Any gasoline meeting the conditions of this waiver that is stored in terminal storage tanks for distribution to retail outlets and wholesale purchaser-consumers may be distributed and sold in subject areas in the designated states until the supply is depleted. Likewise, retailers and wholesale purchaser-consumers in these areas may continue selling or dispensing gasoline that meets the conditions of this waiver after August 29, 2023, until supplies in their E15 storage tanks are depleted.

This waiver applies only to the applicable federal requirements cited above. Regulated parties who produce, sell, and distribute E15 must continue to comply with all applicable requirements and conditions that do not relate to RVP in 40 C.F.R. Part 1090 and in EPA’s decisions under CAA Section 211(f)(4), 42 U.S.C. § 7545(f)(4), to allow the introduction into commerce of E15 for use in model year 2001 and newer light-duty motor vehicles.⁷ Other state or local

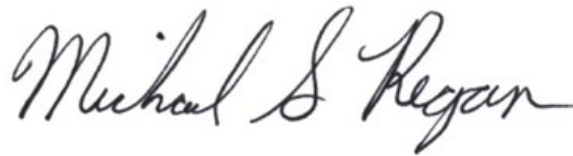
⁶ As described above, EPA is limiting this waiver to the areas where it anticipates the waiver will increase availability of E15 by allowing for use of existing blendstock. Thus, this waiver does not apply to reformulated gasoline (RFG) covered areas because the 1.0 psi allowance for RVP standards as specified in CAA Section 211(h)(4), 42 U.S.C. § 7545(h)(4), does not apply to RFG. This waiver also does not apply in areas where EPA has approved a regulation into a state implementation plan (SIP) that limits the applicability of the 1.0 psi allowance. For example, several states including New York, Vermont, and Maine do not allow the use of the 1.0 psi allowance statewide. Other states including Texas and Arizona limit the 1.0 psi allowance to specific portions of the state. Some states including Nevada (statewide), Indiana (portion) and Michigan (portion) only allow the 1.0 psi allowance for E10.

⁷ See 75 Fed. Reg. 68,094 and 76 Fed. Reg. 4662.

requirements or restrictions related to this matter may need to be addressed by the appropriate authorities.⁸ EPA recognizes that this is an evolving situation that is causing rapid changes to fuel supply dynamics. Should conditions warrant, this waiver may be modified, terminated, or renewed as appropriate. The effective date of this decision is August 10, 2023, and, pursuant to 40 C.F.R. § 23.3, on that date, it will be deemed issued for purposes of judicial review.

If you have questions, you are welcome to contact me, or your staff may contact John Lucey, Deputy Associate Administrator for Intergovernmental Relations, at lucey.john.d@epa.gov or 202-564-1820.

Sincerely yours,

A handwritten signature in black ink that reads "Michael S. Regan". The signature is written in a cursive, flowing style.

Michael S. Regan

cc: Secretary of Energy Jennifer M. Granholm

⁸ Several states have adopted regulations for purposes other than motor vehicle emissions control that limit the applicability of the 1.0 psi allowance to E10.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

August 8, 2023

THE ADMINISTRATOR

The Honorable Muriel Bowser
Mayor of the District of Columbia
1350 Pennsylvania Avenue, N.W.
Washington, D.C. 20004

Re: August 10, 2023, E15 Reid Vapor Pressure Fuel Waiver

Dear Mayor Bowser:

By this letter the U.S. Environmental Protection Agency is issuing a temporary waiver under Clean Air Act (CAA) Section 211(c)(4)(C)(ii)(I), 42 U.S.C. § 7545(c)(4)(C)(ii)(I), to address extreme and unusual fuel supply circumstances caused by the ongoing war in Ukraine that are affecting all regions of the Nation.

The CAA and the implementing regulations at 40 C.F.R. Part 1090 require the use of low volatility gasoline during the summer months in order to limit the formation of ozone pollution. These regulations are found at 40 C.F.R. § 1090.215. *See also* <https://www.epa.gov/gasoline-standards/gasoline-reid-vapor-pressure>. These gasoline volatility regulations apply to retailers and wholesale purchaser-consumers beginning on June 1, 2023, and to all other persons beginning May 1. Specifically, the regulations require parties upstream of retailers and wholesale purchaser-consumers to turn over their storage tanks to low volatility summer gasoline and stop selling higher volatility winter gasoline by May 1 so that retailers and wholesale purchaser-consumers can meet the applicable low volatility gasoline standards by June 1.

Russia's unjustified, unprovoked, and unconscionable war against Ukraine, and its ongoing destructive military campaign, has had a profound impact on global and domestic energy markets over the past year. As a result of Russian actions, public pressure on international economic engagement with Russian businesses, and the international community's imposition of sanctions on Russia's financial system and energy sector, the global supply of crude oil has been disrupted and remains volatile.

Domestic and international sanctions and public pressure on Russia have significantly disrupted the supply and distribution of purchasable barrels of crude oil and petroleum products in the global market for the U.S. and likeminded countries. Additionally, on April 2, 2023, OPEC+ announced an unexpected reduction in crude oil output by OPEC+ member counties of 1.16 million barrels per day, further constraining the market. This follows previous reductions in crude oil output announced by OPEC+ members in November 2022, for a total reduction of 3.66

million barrels per day, which represents about 3.7% of global crude oil demand.¹ While the Short Term Energy Outlook (STEO) from the Energy Information Administration (EIA) notes that “global oil markets will be in relative balance over the coming year” and that “global liquids fuel production will increase because of strong growth from non-OPEC countries,” the STEO also notes that “global liquid fuels consumption will rise in 2023.”² In general, even small, sudden reductions in supply can have an outsized impact on global markets and lead to an imbalance of supply and demand.

Refining capacity in the U.S. is also lower due to refinery closures across the country. Since 2020, U.S. refining capacity has been reduced by nearly 1 million barrels per day due to permanent closures of refineries stemming from low demand during the COVID-19 pandemic and damage from hurricanes and accidents. Even while demand has accelerated in the United States, exports of U.S. gasoline are at the highest levels of the last five years. The STEO forecasts reduced refinery throughput because of “higher crude oil prices, in response to OPEC production cuts, which reduce refinery margins and lower runs, along with a reduced outlook for net exports.”

Additionally, U.S. gasoline demand is relatively strong compared to the five-year seasonal average. The four-week rolling average of “U.S. product supplied of finished motor gasoline,” which represents gasoline demand, was above the five-year seasonal average and above demand at the same time last year.³ The summer driving season is under way with traditionally higher demand for gasoline through September.

In contrast to higher gasoline demand this year, total U.S. motor gasoline stocks were below the five-year average. Additionally, gasoline stocks in several regions, as well as total U.S. gasoline stocks, have been at or below the bottom of the five-year range since early 2022.⁴ The Midwest region—the region that has the most ability to increase supply with blending an increased percentage of ethanol—has gasoline stocks below the five-year seasonal average for this time of year. The low gasoline stocks limit the cushion available for the U.S. to absorb temporary disruptions to the fuel supply chain, increasing the possibility of supply shortages.

There are reasons to believe that the current circumstances affecting global supply of crude oil and petroleum products will continue in the near term, including sanctions limiting the purchase of Russian crude oil and petroleum products by the U.S. and likeminded countries, as well as crude oil production reductions by OPEC+ members. The restricted use of Russian crude oil and petroleum products, accompanied by lower-than-expected Chinese exports, will sustain demand for the export of U.S. product, including gasoline. At the same time, pressure on U.S. markets, including production and distribution of gasoline and other petroleum products due to decreased refining capacity and increased domestic demand, will continue for the foreseeable future. EPA

¹ <https://www.reuters.com/business/energy/sarabia-other-opec-producers-announce-voluntary-oil-output-cuts-2023-04-02/>

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⁴ See Aug 2, 2023, WPSR.

has concluded, with DOE's concurrence, that it is in the public interest to take action to address the supply circumstances that prevent distribution of an adequate supply of gasoline to consumers.

The Clean Air Act provides EPA with the authority to temporarily waive a control or prohibition if the Administrator makes certain determinations. CAA § 211(c)(4)(C)(ii)(I-III), 42 U.S.C. § 7545(c)(4)(C)(ii)(I-III). In particular, the statute authorizes EPA to determine there are "extreme and unusual fuel [] supply circumstances" that prevent the distribution of an adequate supply of gasoline to consumers. CAA § 211(c)(4)(C)(ii)(I), 42 U.S.C. § 7545(c)(4)(C)(ii)(I). Here, EPA is exercising its statutory discretion to identify a lack of an "adequate fuel supply" under these unique circumstances where there has been a particularly unexpected and extreme form of disruption. This extreme and unusual fuel circumstance is the result of Russia's ongoing war in Ukraine, and related global supply issues, events that could not reasonably have been foreseen and are not attributable to a lack of prudent planning on the part of suppliers of the fuel to these areas. CAA § 211(c)(4)(C)(ii)(II), 42 U.S.C. § 7545(c)(4)(C)(ii)(II).

Furthermore, I have determined that it is in the public interest to grant this waiver. CAA § 211(c)(4)(C)(ii)(III), 42 U.S.C. § 7545(c)(4)(C)(ii)(III). The Agency in taking this action is seeking to address the extreme and unusual fuel supply circumstances in the market by allowing the continued sale of E15 during the summer driving season. Absent this action, retailers that currently sell E15 (gasoline with 85% petroleum gasoline content) would need to stop selling the fuel and instead only sell E10 (gasoline with 90% petroleum gasoline content). This switch, from E15 to E10, would increase the demand for petroleum-based gasoline at the very time that the Agency has concluded that a fuel supply issue persists due to the ongoing war in Ukraine. The Agency's waiver action here will eliminate the need for retailers to shift to E10 and in the process will prevent the increased demand for petroleum gasoline that would otherwise occur. Since E15, allowed under this waiver, is required to meet the same volatility standard as E10, no overall change in evaporative emissions impacts are projected to occur as a result of this action. This is because it is the volatility of the gasoline blend that drives evaporative emissions, not the ethanol content. EPA has similarly found in comparing exhaust emissions between E10 and E15 that some criteria pollutants would have relatively small increases (NO_x) and others have similar decreases (VOC and CO) while still others are less certain (PM). In the E15 CAA Section 211(f)(4) partial waivers, we determined that effects of this magnitude were too small to cause or contribute to model year 2001 and newer light duty motor vehicles to exceed the vehicles' certified exhaust emissions standards.⁵ After weighing the societal benefits of an incrementally higher volume of gasoline being made available to the public, and considering that no significant change in air pollution is projected to occur as a result of this action, EPA concludes that this action is in the public interest.

In addition, I have determined that this waiver applies to the smallest geographic area necessary to address the fuel supply circumstances described in this action. CAA § 211(c)(4)(C)(iii)(I), 42

⁵ Modifications to Fuel Regulations to Provide Flexibility for E15; Modifications to RFS RIN Market Regulations 84 Fed. Reg. 26,980 (June 10, 2019).

U.S.C. § 7545(c)(4)(C)(iii)(I). In determining the geographic scope of this action to include all states and regions within states which currently have the 1 psi waiver for E10 (about two-thirds of US gasoline), EPA has sought to maximize the increase in fuel volumes by maintaining the availability of E15. In areas of the country where the 1 psi increase for E10 is not allowed through state or EPA regulations (e.g., in reformulated gasoline areas), E15 can already be sold in the summer and no action is needed to continue to allow the sale. Hence, the geographic extent of the waiver represents the smallest geographic area necessary to continue to allow E15 sales and through that ensure the largest increase in gasoline volume possible without extending the waiver into regions of the country where it is not necessary.

Therefore, to minimize or prevent disruptions of the supply of gasoline, I am waiving the condition in CAA Section 211(h)(4), 42 U.S.C. § 7545(h)(4) that allows “fuel blends containing gasoline and 10 percent denatured anhydrous ethanol” to exceed the applicable RVP standard by 1 psi for fuel blends containing gasoline and between 9 and 15 percent denatured anhydrous ethanol (E15) that is distributed and sold in areas within the contiguous United States where the 1 psi waiver applies to E10.⁶ Under this temporary waiver, regulated parties may produce, sell, and distribute summer gasoline that exceeds the applicable RVP standard at 40 C.F.R. § 1090.215(a)(1) and (2) by 1 psi if the fuel blend is E15. This waiver is effective on August 10, 2023, and will continue for 20 days. It is the Agency’s intention to issue new waivers effectively extending (renewing) this waiver until such time as the extreme and unusual fuel supply circumstances described in this action are no longer present.

Gasoline that does not meet the applicable RVP requirements may not be introduced into terminal storage tanks from which gasoline is dispensed into trucks for distribution to retail outlets in the designated states after August 29, 2023, unless EPA renews the waiver. Any gasoline meeting the conditions of this waiver that is stored in terminal storage tanks for distribution to retail outlets and wholesale purchaser-consumers may be distributed and sold in subject areas in the designated states until the supply is depleted. Likewise, retailers and wholesale purchaser-consumers in these areas may continue selling or dispensing gasoline that meets the conditions of this waiver after August 29, 2023, until supplies in their E15 storage tanks are depleted.

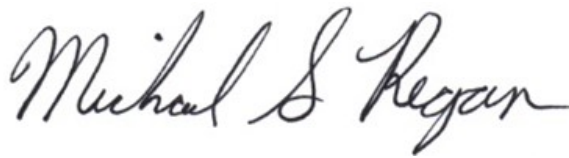
This waiver applies only to the applicable federal requirements cited above. Regulated parties who produce, sell, and distribute E15 must continue to comply with all applicable requirements and conditions that do not relate to RVP in 40 C.F.R. Part 1090 and in EPA’s decisions under CAA Section 211(f)(4), 42 U.S.C. § 7545(f)(4), to allow the introduction into commerce of E15

⁶ As described above, EPA is limiting this waiver to the areas where it anticipates the waiver will increase availability of E15 by allowing for use of existing blendstock. Thus, this waiver does not apply to reformulated gasoline (RFG) covered areas because the 1.0 psi allowance for RVP standards as specified in CAA Section 211(h)(4), 42 U.S.C. § 7545(h)(4), does not apply to RFG. This waiver also does not apply in areas where EPA has approved a regulation into a state implementation plan (SIP) that limits the applicability of the 1.0 psi allowance. For example, several states including New York, Vermont, and Maine do not allow the use of the 1.0 psi allowance statewide. Other states including Texas and Arizona limit the 1.0 psi allowance to specific portions of the state. Some states including Nevada (statewide), Indiana (portion) and Michigan (portion) only allow the 1.0 psi allowance for E10.

for use in model year 2001 and newer light-duty motor vehicles.⁷ Other state or local requirements or restrictions related to this matter may need to be addressed by the appropriate authorities.⁸ EPA recognizes that this is an evolving situation that is causing rapid changes to fuel supply dynamics. Should conditions warrant, this waiver may be modified, terminated, or renewed as appropriate. The effective date of this decision is August 10, 2023, and, pursuant to 40 C.F.R. § 23.3, on that date, it will be deemed issued for purposes of judicial review.

If you have questions, you are welcome to contact me, or your staff may contact John Lucey, Deputy Associate Administrator for Intergovernmental Relations, at lucey.john.d@epa.gov or 202-564-1820.

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cc: Secretary of Energy Jennifer M. Granholm

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