

Regulating Greenhouse Gases Under the Clean Air Act: Is the Bubble About to Burst?

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The debate on greenhouse gas (“GHG”) regulation in the United States is now about to enter a decisive phase. For more than two decades, from about 1988 to 2010, the effort to regulate GHGs focused on enacting comprehensive cap-and-trade legislation in the U.S. Congress.¹ This effort effectively ended for the foreseeable future when Congress refused to adopt that legislation in the second year of the Barack Obama Administration, despite strong Democratic Party majorities in both Houses.

While Congress engaged in the cap-and-trade debate, proponents of GHG regulation pursued an alternative path in case cap-and-trade legislation failed. This effort focused on convincing the courts that the U.S. Environmental Protection Agency (“EPA”), even without new legislation, already had the authority to regulate GHGs under the Clean Air Act (“CAA”).² This effort began in the last years of the Clinton Administration, scored a significant victory with the 2007 U.S. Supreme Court decision in *Massachusetts v. EPA*,³ and, with cap-and-trade legislation now dead or dormant, has become the central strategy in the Obama Administration’s push to significantly reduce GHG emissions.

Yet, regulating GHGs under the CAA was always seen by proponents as a second-best strategy behind cap-and-trade legislation.⁴ From the time the idea of regulating GHGs under the CAA was first floated publicly, through when the Obama Administration proposed its first GHG regulations under the CAA, promoters primarily saw the threat of reg-

ulation as a lever to convince cap-and-trade opponents to agree to legislation.⁵ It is only because cap-and-trade did not succeed in Congress that the CAA has become the central mechanism for achieving the current Administration’s goal of dramatically reducing GHG emissions.

The proponents of GHG regulations had good reason for preferring cap-and-trade to the CAA. Although the Supreme Court in *Massachusetts v. EPA* ruled that GHGs are CAA “air pollutants,” at least for purposes of the Title II motor vehicle program,⁶ the fact remains that the CAA was not written with GHGs in mind. It was intended instead to regulate traditional air pollutants whose effects occur only locally or regionally rather than globally.⁷ As the Obama Administration has ventured beyond Title II in order to regulate GHG emissions from other sectors of the economy under other CAA programs, it has become increasingly clear that those programs are not structured to accommodate GHG regulation, at least not on the scale the Administration has proposed.

The unsuitability of the CAA for large-scale GHG regulation became evident when EPA was forced to adopt the so-called “Tailoring Rule” to avoid what even the Agency conceded would be the patently absurd result of regulating GHGs under the literal statutory text of two CAA permit programs—the Prevention of Significant Deterioration (“PSD”) preconstruction permit program and the Title V operating permit program.⁸ Congress designed those programs for traditional pollutants; to create a workable path for permitting GHG-emitting facilities, EPA essentially

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1. See PETER GLASER & JOHN CLINE, FEDERAL REGULATION OF GREENHOUSE GASES: WHERE WE’VE BEEN AND WHERE WE’RE GOING (2009), available at <http://www.troutmansandersnews.com/marcom/announcements/GlaserClineChapter.pdf>.
2. Clean Air Act, Pub. L. No. 88-206, 77 Stat. 392 (1963) (codified as amended at 42 U.S.C. §§ 7401–7671q (2012)).
3. See *Massachusetts v. EPA*, 549 U.S. 497 (2007).
4. See, e.g., Editorial, *The Endangerment Finding*, N.Y. TIMES (Dec. 7, 2009), http://www.nytimes.com/2009/12/08/opinion/08tue2.html?_r=1&.

5. See, e.g., *id.*
6. *Massachusetts v. EPA*, 549 U.S. at 506–11; see also 42 U.S.C. § 7521.
7. Although Title VI of the CAA does authorize regulation of refrigerants to address a global air pollution problem, namely depletion of the stratospheric ozone layer, Congress had to adopt new statutory provisions in 1990 to provide EPA that authority. No such similar enactment has ever been adopted by Congress for greenhouse gases; quite the contrary, the numerous attempts to do so have all failed.
8. Prevention of Significant Deterioration and Title V Greenhouse Gas Tailoring Rule, 75 Fed. Reg. 31,514 (June 3, 2010) (to be codified at 40 C.F.R. pts. 51, 52, 70, 71) [hereinafter Tailoring Rule].

had to rewrite the plain language of the statute.⁹ When the case reached the Supreme Court in *Utility Air Regulatory Group v. EPA* (“UARG”),¹⁰ the 5-4 majority that had supported regulating GHGs under the CAA in *Massachusetts v. EPA* switched to a 5-4 majority that sternly admonished EPA for overreaching.¹¹

Now EPA has adopted its Clean Power Plan that uses a previously little-known CAA provision to dramatically restructure the electric power sector by forcing electric utilities to shutter coal-fired generating units and to build new lower- or zero-emitting generating facilities on an unprecedented scale.¹² To accomplish this result, EPA has reinterpreted section 111(d) of the Act¹³ in a way that could scarcely have been imagined by the Congress that enacted it. The Agency has done so because applying section 111(d) according to its literal terms and consistently with the Agency’s past practice would not produce nearly the amount of emission reductions that the Administration wishes to achieve. However, based on *UARG*, the courts are likely to take a dim view of EPA’s attempt to reimagine section 111(d) as authority to transform whole industries. The rule is now before the U.S. Court of Appeals for the District of Columbia Circuit in *West Virginia v. EPA*.¹⁴

The effort to use the CAA to significantly reduce GHG emissions therefore stands on a precipice. EPA’s fanciful reinterpretation of section 111(d) represents the Agency’s best hope for using the CAA to drive steep GHG reductions from the power sector and, as a precedent, from other types of industrial and manufacturing facilities as well. Because the Clean Power Plan is also the central element of the Obama Administration’s international GHG strategy—under which the Administration has declared its intent to reduce GHG emissions by twenty-six to twenty-eight percent below 2005 levels by 2025¹⁵—that strategy also depends on the Clean Power Plan surviving judicial review.

If, however, the courts overturn the Clean Power Plan and reject EPA’s effort to the convert section 111(d) into something it is not, the CAA will prove to be a vehicle under which only relatively modest GHG emission reductions can be achieved. Future presidential administrations, assuming they have the same GHG goals as the current Administration, will need to seek other ways of achieving their goals

and implementing the international commitments that the Obama Administration has made. Those who favor sharp GHG cuts will have to return to Congress.

I. Historical Context: Cap-and-Trade Failure Yields to CAA Regulation

As has been recounted elsewhere,¹⁶ the national GHG debate effectively began with hearings held in 1988 before then-Senator Al Gore’s U.S. Senate Committee on Energy and Natural Resources, with U.S. National Aeronautics and Space Administration (“NASA”) scientist James Hansen testifying to a potentially runaway greenhouse effect.¹⁷ In every Congress since then, lawmakers have considered, but ultimately failed to adopt, comprehensive legislation addressing GHGs, most of which centered on a cap-and-trade program.¹⁸

Cap-and-trade bills varied over the years. Some were economy-wide.¹⁹ Some were limited to the electric utility industry.²⁰ The targets and timetables varied from bill to bill, with some providing for steeper reductions than others.²¹ All had one thing in common, however: over time, they would have put the United States on the road to significantly reducing GHG emissions by capping emissions and allowing large emitters to trade emission allowances.²²

Any reasonable prospect of adopting a GHG cap-and-trade program ended for the foreseeable future with Congress’ failure to enact cap-and-trade legislation in the first two years of the Obama Administration, when the Democratic Party had decisive control over the U.S. House of Representatives and a filibuster-proof sixty-vote majority in the Senate. The Waxman-Markey cap-and-trade bill was only narrowly adopted by the House²³; efforts to craft a Senate version that could attract the necessary votes for passage collapsed.²⁴

9. Johnathan Alder, *Supreme Court Rejects EPA’s Rewrite of the Clean Air Act, But Greenhouse Gas Regulation Will Go Forward*, VOLOKH CONSPIRACY (June 23, 2014), <http://www.washingtonpost.com/news/volokh-conspiracy/wp/2014/06/23/scotus-rejects-epas-rewrite-of-the-clean-air-act-but-ghg-regulation-will-go-forward>.

10. *Util. Air Regulatory Grp. v. EPA*, 134 S. Ct. 2427 (2014).

11. *Compare id.* at 2434, with *Massachusetts v. EPA*, 549 U.S. at 504.

12. Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, 80 Fed. Reg. 64,661 (Oct. 23, 2015) [hereinafter Clean Power Plan] (to be codified at 40 C.F.R. pt. 60).

13. 42 U.S.C. § 7411(d) (2012).

14. Petition for Review, *West Virginia v. EPA*, No. 15-1363 (D.C. Cir. Oct. 23, 2015).

15. See United States, *U.S. Cover Note INDC & Accompanying Info*, UNITED NATIONS FRAMEWORK CONVENTION CLIMATE CHANGE 1 (Mar. 31, 2015), <http://www4.unfccc.int/submissions/INDC/Published%20Documents/United%20States%20of%20America/1/U.S.%20Cover%20Note%20INDC%20and%20Accompanying%20Information.pdf>.

16. See, e.g., GLASER & CLINE, *supra* note 1; Daniel Sarewitz & Roger Pielke, Jr., *Breaking the Global Warming Gridlock (Part One)*, ATLANTIC ONLINE (July 2000), <http://www.theatlantic.com/past/issues/2000/07/sarewitz.htm>.

17. *Greenhouse Effect and Global Climate Change: Hearing Before the S. Comm. on Energy & Natural Res.*, 100th Cong. 39 (1988) (statement of Dr. James Hansen, Director, NASA Goddard Inst. for Space Studies).

18. Ilan W. Gutherz, *Cap and Trade Meets the Interstate Commerce Clause: Are Greenhouse Gas Regulations Constitutional After Lopez and Morrison?*, 29 PACE ENVTL. L. REV. 289, 291 (2011).

19. Bruce W. McClain & Heidi H. Meier, *The US Cap and Trade Initiative: Current Status and Potential Impact on Business*, 28 AM. J. BUS. 1, 7–9 (2013), available at <http://www.emeraldinsight.com/doi/abs/10.1108/19355181311314743>.

20. *Id.*

21. *Id.*

22. GLASER & CLINE, *supra* note 1; ELEANOR REVELLE, LEAGUE OF WOMEN VOTERS CLIMATE CHANGE TASK FORCE, CAP-AND-TRADE VERSUS CARBON TAX: TWO APPROACHES TO CURBING GREENHOUSE GAS EMISSIONS 7–8 (2009), available at <http://lwv.org/content/cap-and-trade-versus-carbon-tax-two-approaches-curbng-greenhouse-gas-emissions>.

23. American Clean Energy and Security Act of 2009, H.R. 2454, 111th Cong. (2009). The final vote was 219–212, with eight Republicans voting for the bill and 44 Democrats voting against. *House Vote 477—H.R. 2454: On Passage*, N.Y. TIMES, <http://politics.nytimes.com/congress/votes/111/house/1/477> (last visited Sept. 7, 2015).

24. Peter Glaser, *Is Cap-and-Trade Kaput?*, PUB. UTIL. FORT., July 2010, at 1–2, 11, available at http://www.troutmansanders.com/files/Uploads/Documents/TS%20Glaser%20-%20July10_SPARK.pdf; Gail Russell Chaddock & Tarini Parti, *Harry Reid: Senate Will Abandon Cap-and-Trade Energy Reform*,

During the late 1990s, opponents of GHG regulation became concerned that the Clinton Administration would try to implement the Kyoto Protocol to the United Nations Framework Convention on Climate Change—a treaty President Clinton ultimately signed but never submitted to the Senate for ratification—“through the back door,” using alternative measures that did not require congressional action.²⁵ In this context, on March 11, 1998, during hearings on EPA’s Fiscal Year 1999 appropriations, Representative Tom DeLay asked EPA Administrator Carol Browner whether she believed that EPA had authority, even without ratification of the Protocol by the Senate, to regulate GHG emissions.²⁶ Browner replied that the CAA provides such authority²⁷ and followed up with an April 10, 1998 legal opinion authored by EPA General Counsel Jonathan Z. Cannon asserting that GHGs are “air pollutants” EPA could regulate under the CAA if the Agency found that the gases endanger the public health or welfare.²⁸

The Clinton Administration, however, did not attempt to exercise this asserted regulatory power. In an October 20, 1999 petition, a group called the International Center for Technology Assessment (“ICTA”) requested that EPA regulate GHG emissions from motor vehicles under section 202(a) of the CAA.²⁹ The Clinton Administration ignored the ICTA petition and the Bush Administration initially did so as well, but when several state attorneys general sought to force EPA to act on the petition through a mandamus action in federal district court, EPA issued an order denying the petition.³⁰ Reversing its previous position, EPA asserted that it did not have the authority to regulate GHGs under the CAA and further asserted that, even if it did have that authority, it would decline to exercise it on both policy and scientific grounds.³¹

The Agency’s denial of the ICTA petition ultimately led to the 2007 Supreme Court decision in *Massachusetts v. EPA*, in which the Court held that EPA wrongfully denied the petition because the Agency did in fact have authority to regulate GHG emissions under section 202(a) and must do so if it finds that motor vehicle GHG emissions endanger the public

health or welfare.³² Although the decision did not lead to regulation during the remainder of the Bush Administration, it paved the way for regulating GHGs under the CAA by a more sympathetic administration.

Proponents of GHG regulation, however, were always of the view that cap-and-trade legislation was a better vehicle for significantly reducing GHG emissions than the CAA. Summarizing the Obama Administration’s position in an editorial supporting EPA’s December 7, 2009 determination that motor vehicle GHG emissions cause or contribute to air pollution endangering the public health or welfare—which has become known as the “endangerment finding”—the *New York Times* stated that “Mr. Obama and the [EPA] administrator, Lisa Jackson, have said repeatedly that they would much prefer a comprehensive legislative approach.”³³ On the other hand, the *New York Times* also noted “the move empowers the [A]gency to regulate these emissions and gives President Obama an important tool if Congress fails to pass legislation to reduce global warming emissions.”³⁴ As the paper stated, “The threat of regulation gives Congress extra incentive to act; regulation would provide a strong backstop if it does not.”³⁵

The threat of CAA regulation, however, did not have the hoped-for effect in Congress. Even with its strong majorities in both Houses, the Administration could not get cap-and-trade enacted. With the Republican Party then taking control of first the House and later the Senate, cap-and-trade legislation died for the foreseeable future. For better or worse, the second-choice strategy of regulating GHGs under the CAA became the only vehicle proponents have for driving large-scale, economy-wide GHG emission reductions.

II. *Massachusetts v. EPA* and EPA’s First GHG Regulations

A. *Massachusetts v. EPA*

In retrospect, the limitations on regulating GHGs under the CAA were apparent in the *Massachusetts v. EPA* decision. Briefing before the Supreme Court on the issue of EPA’s authority to regulate GHGs under the CAA focused on a pure question of statutory construction: are GHGs “air pollutants” under the CAA? The petitioners argued for a literal reading of the statute.³⁶ They cited section 202(a), which authorizes EPA to regulate “air pollutants” emitted by motor vehicles if it makes an endangerment finding.³⁷ Pointing to the section 302(g) definition of “air pollutant” as “any physical, chemical, biological, [or] radioactive . . . substance or

CHRISTIAN SCI. MONITOR (July 22, 2010), <http://www.csmonitor.com/USA/Politics/2010/0722/Harry-Reid-Senate-will-abandon-cap-and-trade-energy-reform>.

25. See, e.g., *Will the Administration Implement the Kyoto Protocol Through the Backdoor? Disclosures Act: Hearing Before the Subcomm. on Nat’l Economic Growth, Natural Res., & Regulatory Affairs of the H. Comm. on Gov’t Reform & Oversight*, 105th Cong. (1998).

26. See Memorandum of EPA Gen. Counsel Jonathan Z. Cannon to EPA Adm’r Carol M. Browner (Apr. 10, 1998), available at <http://www.google.com/url?sa=t&rcct=j&dq=&esrc=s&frm=1&source=web&cd=2&ved=0CCIQFjAB&curl=http%3A%2F%2Fwww.law.umaryland.edu%2Ffaculty%2Fbpercival%2Fasebook%2Fdocuments%2Fepaco2memo1.pdf&ei=ECYsVbPeAofZsAXRzYHIAw&usq=AFQjCNHbSzC2yOOBQOPiKY8ouFSRYqXx9Q&cbvm=bv.90491159,d.b2w>.

27. *Id.*

28. *Id.*

29. Control of Emissions From New Highway Vehicles and Engines, 68 Fed. Reg. 52,922 (Sept. 8, 2003).

30. *Id.*

31. *Id.*

32. *Massachusetts v. EPA*, 549 U.S. 497, 528–32 (2007). The Court also left room for the EPA to refuse to regulate GHGs under the CAA for reasons that “conform to the authorizing statute.” *Id.* at 533.

33. Editorial, *supra* note 4.

34. *Id.*

35. *Id.*

36. See Brief for the Petitioners at 11–20, *Massachusetts v. EPA*, 549 U.S. 497 (2007) (No. 05-1120), available at <http://findlawimages.com/efile/supreme/briefs/05-1120/05-1120.mer.pet.pdf>.

37. *Id.* at 2 (citing 42 U.S.C. § 7521(a)(1)).

matter which is emitted into or otherwise enters the ambient air,”³⁸ the petitioners argued that GHGs undeniably fit that description.³⁹ They further pointed to section 302(h),⁴⁰ which provides that references in the statute to “welfare” include impacts on “climate.”⁴¹

In defending its decision not to regulate GHGs under the CAA, EPA argued for a more nuanced approach to statutory interpretation based largely on the Court’s decision in *FDA v. Brown & Williamson Tobacco Corp.*⁴² In *Brown & Williamson*, the Court ruled that the U.S. Food and Drug Administration (“FDA”) did not have jurisdiction over cigarettes even though nicotine fits the literal definition of a “drug” under the Food, Drug, and Cosmetic Act (“FDCA”) and even though cigarettes fit the FDCA’s definition of a “drug delivery device.”⁴³ Based on the long history of congressional consideration and rejection of legislation authorizing the FDA to regulate tobacco products and Congress’ underlying intent in the FDCA, the Court held that, despite the literal language of the statute, Congress did not intend to empower the FDA to regulate cigarettes.⁴⁴ EPA made similar arguments in *Massachusetts v. EPA*, and further contended that the structure of the CAA was not designed to regulate globally-circulating GHGs.⁴⁵ Focusing specifically, but not exclusively, on the impracticality of regulating GHGs under the CAA’s National Ambient Air Quality Standards (“NAAQS”) program, EPA argued that “key provisions of the CAA cannot coherently be applied to greenhouse gas emissions.”⁴⁶

The Supreme Court sided with Petitioners. Highlighting the “sweeping,” “unambiguous” and “capacious” section 302(g) definition of “air pollutant,” the Court ruled that GHGs come within that definition.⁴⁷ Importantly, however, the Court did not address what its decision might mean for GHG regulation under other CAA provisions that, as EPA pointed out, were structurally unsuited for regulating GHGs. Instead, the Court carefully limited its decision to “hold[ing] that EPA has the statutory authority to regulate the emission of [GHGs] from new motor vehicles.”⁴⁸ Thus, having made a tactical decision to test whether GHGs can be regulated under the CAA through a petition to regulate motor vehicle emissions, proponents did not obtain the kind of sweeping endorsement of using the CAA to regulate GHGs throughout the economy that they might have hoped for. Instead, the proponents were left with a decision that was facially limited to the CAA motor vehicle program and that could poten-

tially be distinguished in future decisions as to EPA GHG regulation under other CAA programs.

The Court also indicated that it might, in fact, view GHG regulation under other CAA programs in a different light depending on the circumstances.⁴⁹ In distinguishing *Brown & Williamson*, the Court noted that the FDA’s assertion of authority under the FDCA to regulate tobacco products amounted to an assertion of authority to ban those products, since, according to the Court, the FDA would have no other choice given that tobacco is inherently unsafe.⁵⁰ Under the CAA, in contrast, the Court found that EPA “would only regulate emissions, and even then, it would have to delay any action ‘to permit the development and application of the requisite technology, giving appropriate consideration to the cost of compliance.’”⁵¹ In other words, the Court signaled it was prepared to weigh an EPA assertion of authority to regulate GHGs under a particular CAA program in light of whether that program could be implemented in a reasonable manner and without creating overly burdensome effects. The Court’s expectation of relatively limited regulation, which enabled it to distinguish *Brown & Williamson*, took on added importance in the Court’s next GHG case.

B. EPA’s First Round of GHG Regulation

The difficulty of regulating GHGs under the CAA became immediately apparent when, following *Massachusetts v. EPA*, the Agency actually began adopting GHG regulations under the section 202 motor vehicle program. Determined to move quickly on GHG regulation under the CAA in sequence with congressional consideration of cap-and-trade legislation, the Obama Administration initiated regulatory action shortly after taking office in January 2009. By March 2009, EPA proposed, and, by December 2009, finalized its endangerment finding.⁵² By September 2009, EPA proposed GHG standards for new automobiles and light-duty trucks for model years 2012–2016 and finalized those standards in May 2010.⁵³

Regulating GHGs from new motor vehicles was relatively straightforward and did not materially advance the Administration’s GHG-reduction goals. The only meaningful way to reduce automotive GHG emissions is by improving fuel economy,⁵⁴ yet the Administration already had preexisting

38. 42 U.S.C. § 7602(g) (2012).

39. Brief for the Petitioners, *supra* note 36, at 12–20.

40. 42 U.S.C. § 7602(h).

41. Brief for the Petitioners, *supra* note 36, at 15.

42. *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120 (2000).

43. *Id.* at 131; see Food, Drug, and Cosmetic Act, Pub. L. No. 105-115, 111 Stat. 2320 (1998).

44. *Brown & Williamson*, 529 U.S. at 1300–16.

45. See Brief for the Federal Respondent at 20–23, *Massachusetts v. EPA*, 549 U.S. 497 (2007) (No. 05-1120), available at <http://findlawimages.com/efile/supreme/briefs/05-1120/05-1120.mer.resp.fed.pdf>.

46. *Id.* at 23.

47. *Massachusetts v. EPA*, 549 U.S. at 528–30.

48. *Id.* at 532 (emphasis added).

49. *Id.* at 531.

50. *Id.*; *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120, 144 (2000).

51. *Massachusetts v. EPA*, 549 U.S. at 531 (quoting 42 U.S.C. § 7521(a)(2) (2000)).

52. Endangerment and Cause or Contribute Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act, 74 Fed. Reg. 66,496 (Dec. 15, 2009) (to be codified at 40 C.F.R. ch. 1).

53. Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards, 75 Fed. Reg. 25,324 (May 7, 2010) (to be codified at 40 C.F.R. pts. 85, 86, 600; 49 C.F.R. pts. 531, 533, 536–538).

54. The National Highway Transportation Safety Administration (“NHTSA”) estimated that EPA’s standard for model year 2015 was the equivalent of a Corporate Average Fuel Economy standard of 35.5 miles per gallon. NHTSA issued a parallel standard of 34.1 miles per gallon. The difference results from a small reduction that EPA believed to be possible through changes to motor vehicle air conditioners. See *NHTSA and EPA Establish New National Program*

authority to improve fuel economy through the Corporate Average Fuel Economy (“CAFE”) program.⁵⁵ Indeed, EPA’s motor vehicle GHG rules were adopted jointly and in sync with regulations adopted by the National Highway Transportation Safety Administration (“NHTSA”), making the preexisting CAFE standards more stringent.⁵⁶ Both sets of regulations essentially provide for the same thing: an improvement in vehicle fuel efficiency.⁵⁷ Thus, the authority to regulate motor vehicle GHG emissions under the CAA was not a game changer for the Administration; it could have achieved virtually the same reductions through CAFE standards alone.

Regulating automobile GHG emissions under the CAA, however, revealed the structural difficulty of applying that statute to GHG emissions. EPA has always interpreted the statutory PSD and Title V programs as applying to any pollutant that EPA regulates for any purpose under the CAA. Hence, EPA was aware when it adopted the motor vehicle GHG regulations that GHG emissions would become regulated air pollutants for purposes of the PSD and Title V programs as soon as the section 202(a) motor vehicle regulations took effect.

The implication of that result was highly concerning. Under Title V, any stationary source that potentially emits at least 100 tons per year of “any air pollutant” must obtain a Title V operating permit.⁵⁸ Under the PSD section of the Act, any new stationary source that potentially emits at least 100 or 250 tons per year (depending on the type of facility) of “any air pollutant”—and any existing stationary source that potentially emits at least that amount of an air pollutant which undertakes a modification that increases emissions of that pollutant—must obtain a preconstruction permit.⁵⁹ As a result, EPA recognized that, once it regulated motor vehicle GHG emissions, all new or modified stationary sources whose GHG emissions met the 100/250 ton threshold must obtain a PSD permit, and any stationary sources whose emissions met the 100 ton threshold must obtain a Title V permit.⁶⁰

According to EPA figures, about six million stationary facilities in the United States—including office, apartment and hotel buildings, schools, churches, restaurants, and a host of other buildings—emit at least 100 tons per year of carbon dioxide (“CO₂”), mainly because they combust oil or natural gas for heating.⁶¹ Applying the statutory thresholds would mean that the number of facilities submitting PSD

permit applications would grow from about 800 to about 82,000 per year,⁶² and the number of facilities requiring Title V permits would grow from less than 15,000 to about 6.1 million.⁶³

EPA regulation of motor vehicle GHGs thus threatened to expand these two permitting programs far beyond what those programs were intended. Permitting agencies would not be able to handle the overload, and public reaction was likely to be intense. Moreover, in order to obtain a PSD permit, a facility must adopt best available control technology (“BACT”) to control regulated pollutants.⁶⁴ As a result, numerous facilities that were previously deemed too small to regulate would now be required to obtain a permit and incur potentially significant costs for new technology to control GHG emissions.⁶⁵

EPA, therefore, was forced to engage in its first exercise of creative statutory interpretation to make the CAA workable for GHG regulation. At roughly the same time that EPA issued its motor vehicle GHG regulations, it issued its Tailoring Rule, unilaterally increasing the statutory thresholds by about three orders of magnitude in order to significantly shrink the number and types of facilities required to obtain permits.⁶⁶

C. UARG

EPA’s decision to rewrite numerical statutory thresholds raised more than one legal eyebrow. The D.C. Circuit, however, let EPA off the hook by finding that industry lacked standing to challenge the Tailoring Rule.⁶⁷ The court sided with EPA’s view that the Title V and PSD programs automatically applied to GHG emissions when EPA regulated motor vehicle emissions.⁶⁸ The court then ruled that industry was not injured by EPA reducing the universe of facilities that would require permits.⁶⁹

The Supreme Court, however, granted petitions for certiorari, thereby deciding to review, in *UARG*, the Agency’s first significant exercise of GHG regulatory authority following *Massachusetts v. EPA*.⁷⁰ The Court made three important holdings of relevance for future EPA GHG regulatory efforts under the CAA. First, the Court unequivocally condemned EPA’s attempt to rewrite the statutory thresholds, even for the purpose of avoiding the absurd result of subjecting a multitude of sources that emit insignificant amounts of GHGs

to Improve Fuel Economy and Reduce Greenhouse Gas Emissions for Passenger Cars and Light Trucks, NAT’L HIGHWAY TRANSP. SAFETY ADMIN. (n.d.), http://www.nhtsa.gov/staticfiles/rulemaking/pdf/cafe/CAFE-GHG_Fact_Sheet.pdf.

55. See the Energy Policy and Conservation Act of 1975, Pub. L. No. 94-163, 89 Stat. 424, as amended by the Energy Independence and Security Act of 2007, Pub. L. No. 110-140, 121 Stat. 1492.

56. JAMES E. MCCARTHY & BRENT D. YACOBUCCI, CONG. RESEARCH SERV., R40506, CARS, TRUCKS, AND CLIMATE: EPA REGULATION OF GREENHOUSE GASES FROM MOBILE SOURCES 4–5 (2014).

57. *Id.*

58. 42 U.S.C. § 7479(1) (2012).

59. 42 U.S.C. § 7475 (2012).

60. See Tailoring Rule, *supra* note 8, at 31,516.

61. *Id.*

62. *Id.* at 31,557.

63. *Id.* at 31,540.

64. 42 U.S.C. § 7475(a)(4).

65. See Tailoring Rule, *supra* note 8, at 31,516–17.

66. *Id.* at 31,516.

67. See *Coal. for Responsible Regulation, Inc. v. EPA*, 684 F.3d 102, 146 (D.C. Cir. 2012).

68. *Id.*

69. *Id.*

70. The EPA Tailoring Rule and Timing Rule were part of a package of rules that the D.C. Circuit reviewed together in *Coalition for Responsible Regulation, Id.* The Supreme Court accepted certiorari only on the issue of whether issuance of the motor vehicle rule triggered permitting requirements for stationary sources. See *Util. Air Regulatory Grp. v. EPA*, 134 S. Ct. 2427, 2438 (2014).

to regulation.⁷¹ As the Court said: “An agency has no power to ‘tailor’ legislation to bureaucratic policy goals by rewriting unambiguous statutory terms.”⁷²

Second, the Court made clear that the holding in *Massachusetts v. EPA*—that GHGs are “air pollutants” for purposes of the section 202 motor vehicle program—does not necessarily mean that GHGs are “air pollutants” under *all* CAA programs.⁷³ In determining whether GHGs are “air pollutants” for the purpose of triggering PSD and Title V permit requirements, the Court departed from its literalist approach in *Massachusetts v. EPA* and instead looked beyond the facial section 302(g) definition of “air pollutant” to the specific regulatory structure of the two permit programs at issue in the case.⁷⁴ Concerned that defining the term “air pollutant” under the PSD and Title V provisions as including GHGs would expand the reach of those programs far beyond the bounds that Congress intended,⁷⁵ the Court employed a context-driven interpretation of that term that excluded GHGs. As a result, the Court ruled that, although GHGs are “air pollutants” under section 202(a), they are not “air pollutants” for the purpose of triggering an obligation to obtain a Title V or PSD permit.⁷⁶

Third, the Court ruled that sources that potentially emit traditional pollutants above the statutory thresholds, and which would therefore be required to obtain permits regardless of their GHG emissions, could be required to adopt BACT to reduce their GHG emissions.⁷⁷ The BACT provision of the statute requires PSD permits to include BACT measures for “each pollutant subject to regulation under this chapter.”⁷⁸ The Court held that, for purposes of this section, Congress did intend a literal meaning for the term “pollutant” so as to include GHGs.⁷⁹ But the Court made clear that requiring these facilities to undertake GHG BACT accorded with congressional intent only because the Court believed that requirement was limited and would not be especially burdensome.⁸⁰ According to the Court, “applying BACT to greenhouse gases is not so disastrously unworkable, and need not result in such a dramatic expansion of agency authority, as to convince [it] that EPA’s interpretation is unreasonable.”⁸¹ The Court, however, “acknowledge[d] the potential for greenhouse-gas BACT to lead to an unreasonable and unanticipated degree of regulation,” and insisted its “decision should not be taken as an endorsement of all aspects of EPA’s current approach, nor as a free rein for any regulatory application of BACT in this distinct context.”⁸²

Taken together, these checks in *UARG* on EPA authority under the CAA confirmed the narrowness of the Court’s holding in *Massachusetts v. EPA* and clarified the constraints on EPA authority to regulate GHGs under the CAA. The unifying principal behind each of the three holdings in *UARG* was the concern that EPA was trying to use the CAA to seize enormous power that the statute does not provide. Thus, the Court refused to sanction what it saw as EPA’s usurpation of legislative authority to rewrite the statutory thresholds to accommodate GHG regulation under the two permitting programs. And, in contrast to its holding in *Massachusetts v. EPA*, which dealt only with the more easily implemented motor vehicle program, the Court defined the term “air pollutant” to exclude GHGs for purposes of triggering an obligation to obtain a PSD or Title V permit so as to restrict those permitting programs to the confines that Congress intended. Finally, the Court sanctioned EPA authority to require GHG BACT for facilities that already require PSD permits because of their non-GHG emissions, but only because it did not see that authority as materially different from the authority EPA has long exercised.

To emphasize its concern that the EPA might overreach in regulating GHGs under the CAA, the Court, returning to *Brown & Williamson*, wrote that, “When an agency claims to discover in a long-extant statute an unheralded power to regulate a significant portion of the American economy, we typically greet its announcement with a measure of skepticism.”⁸³ The Court went on to say, “We expect Congress to speak clearly if it wishes to assign to an agency decisions of vast economic and political significance.”⁸⁴ In short, the Court made clear that, although the EPA can regulate GHGs, it must pay close attention to the limits that the CAA establishes so that the Act is not transformed into something that Congress never meant it to be.

III. The Clean Power Plan

EPA, however, has chosen to ignore this warning from the Court. Claiming that *UARG* was a victory,⁸⁵ the EPA has

71. See *Util. Air Regulatory Grp.*, 134 S. Ct. at 2445.

72. *Id.*

73. *Id.* at 2440–41.

74. See *id.* at 2441–42.

75. *Id.* at 2442–43.

76. *Id.* at 2449.

77. *Id.*

78. 42 U.S.C. § 7475(a)(4) (2012).

79. *Util. Air Regulatory Grp.*, 134 S. Ct. at 2448.

80. See *id.*

81. *Id.*

82. *Id.* at 2449.

83. *Id.* at 2444 (quoting *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120, 159 (2000)) (internal quotation marks and citation omitted).

84. *Id.* (quoting *Brown & Williamson*, 529 U.S. at 160) (internal quotation marks omitted).

85. Avi Garbow, *Another Favorable Opinion From the Supreme Court*, EPA BLOG (June 23, 2014, 4:08 PM), <http://blog.epa.gov/epaconnect/2014/06/another-favorable-opinion-from-the-supreme-court/>. EPA maintains that it never wanted to regulate the multitude of small emitters that have never been subject to PSD or Title V regulation in the past and merely wanted to require the major emitters—the ones that must obtain PSD permits because of their non-GHG emissions—to undertake GHG BACT. *Id.* EPA said it achieved this result in the case. *Id.* Opponents of EPA regulation claimed victory in preventing the PSD and Title V programs from expanding to facilities that are not already subject to regulation and, as important, in the Court’s limiting language as to how far permitting agencies can go both in imposing GHG BACT conditions and, more broadly, in asserting GHG regulatory power under the CAA. Robert Barnes, *Supreme Court: EPA Can Regulate Greenhouse Gas Emissions, With Some Limits*, WASH. POST (June 23, 2014), http://www.washingtonpost.com/politics/supreme-court-limits-epas-ability-to-regulate-greenhouse-gas-emissions/2014/06/23/c56fc194-f1b1-11e3-914c-1fbd0614e2d4_story.html (providing industry reaction).

plowed forward with a far more ambitious interpretation of its CAA authority, this time to reorganize the electric utility industry into EPA's version of a "clean, efficient, and completely modern power sector."⁸⁶ Its chosen vehicle for doing so is the little known and even lesser used section 111(d).

A. Section 111(d)

Section 111 sets forth the CAA's New Source Performance Standards ("NSPS") program. In the past, EPA has primarily regulated under section 111(b), which provides for EPA promulgation of "standards of performance for *new* sources" within categories of facilities that emit pollutants which cause or significantly contribute to an endangerment of the public health or welfare.⁸⁷ Enacted in 1970, section 111 has been used by EPA to establish performance standards for new sources (including modified and reconstructed sources) in more than sixty categories.⁸⁸

But section 111 also contains a subsection (d) that authorizes the EPA to regulate *existing* sources within categories of facilities for which EPA has established standards applicable to new sources. EPA, however, has rarely used its authority to regulate existing sources. Its limited use of section 111(d) is likely due to the fact that EPA may invoke the provision only to regulate pollutants that are neither "criteria" pollutants (those regulated under the NAAQS program) nor (at least in EPA's view) "hazardous" air pollutants (those regulated under section 112,⁸⁹ known as "HAPs"), which together cover the vast majority of pollutants regulated under the Act.⁹⁰ Indeed, in the more than forty-year history of section 111, EPA has used section 111(d) only five times to regulate three air pollutants.⁹¹ EPA claims author-

ity to regulate GHGs under section 111(d) because GHGs are neither criteria pollutants nor HAPs.⁹²

The section 111(d) existing-source program is both similar to and different from the section 111(b) new-source program. Under section 111(b), EPA first lists various categories of facilities for regulation and then establishes performance standards for each category.⁹³ These standards apply to new facilities, defined to include new and modified sources.⁹⁴ Section 111(a)(1) defines a "standard of performance" as:

[A] standard for emissions of air pollutants which reflects the degree of emission limitation achievable through the application of *the best system of emission reduction* which (taking into account the cost of achieving such reduction and any nonair quality health and environmental impact and energy requirements) the Administrator determines has been adequately demonstrated.⁹⁵

Once the EPA Administrator establishes standards of performance under section 111(b) for new sources for a particular pollutant, she can promulgate regulations under section 111(d) for existing sources of that pollutant, provided again that the pollutant is neither a criteria pollutant nor a HAP.⁹⁶ In contrast to section 111(b), EPA cannot, in the first instance, itself establish performance standards under section 111(d). Instead, EPA's role is to "establish a procedure similar to that provided by" the NAAQS sections of the CAA in

86. Federal Implementation Plans to Reduce Interstate Transport of Fine Particulate Matter and Ozone, 75 Fed. Reg. 45,210, 45,227 (Aug. 2, 2010) (to be codified at 40 C.F.R. pts. 51–52, 72, 78, 97).

87. 42 U.S.C. § 7411(b) (2012) (emphasis added).

88. See generally 40 C.F.R. pt. 60 (2015).

89. 42 U.S.C. § 7412 (2012).

90. The opponents of EPA's effort to use section 111(d) to regulate power-sector GHG emissions dispute whether that section may apply to GHG emissions from utility units at all. Opponents believe that amendments to section 111(d) in 1990 provide that that provision cannot be used to regulate *source categories* that are regulated under section 112. See, e.g., Opening Brief of Petitioner at 16, 18, In re Murray Energy Corp., 788 F.3d 330 (D.C. Cir. 2015) (No. 14-1112). Thus, they maintain that, because electric generators are regulated under section 112, through EPA's Mercury and Air Toxics Standards program, see National Emission Standards for Hazardous Air Pollutants From Coal- and Oil-Fired Electric Utility Steam Generating Units and Standards of Performance for Fossil-Fuel-Fired Electric Utility, Industrial-Commercial-Institutional, and Small Industrial-Commercial-Institutional Steam Generating Units, 77 Fed. Reg. 9304 (Feb. 16, 2012), EPA cannot regulate electric generators under section 111(d). Opening Brief of Petitioner, *supra*. In response, EPA maintains that the 1990 CAA Amendments continue to bar EPA from regulating HAPs under section 111(d), but does not bar EPA from using section 111(d) to regulate source categories that are regulated under section 112. See, e.g., Respondent Brief, In re Murray Energy Corp., 788 F.3d 330 (D.C. Cir. 2015) (No. 14-1112). This Article assumes, for the sake of argument, that EPA has authority to regulate electric generator GHG emissions under section 111(d).

91. Emission Guidelines and Compliance Times for Municipal Solid Waste Landfills, 40 C.F.R. pt. 60, subpt. Cc (2015); Emission Guidelines and Compli-

ance Times for Sulfuric Acid Production Units, 40 C.F.R. pt. 60, subpt. Cd (2015); U.S. ENVTL. PROT. AGENCY, EPA-450/2-77-005, FINAL GUIDELINE DOCUMENT: CONTROL OF FLUORIDE EMISSIONS FROM EXISTING PHOSPHATE FERTILIZER PLANTS (1977) [hereinafter EPA-450/2-77-005], available at <http://nepis.epa.gov/Exe/ZyPDF.cgi/2000UNFK.PDF?Dockey=2000UNFK.PDF>; U.S. ENVTL. PROT. AGENCY, EPA-450/2-78-003b, KRAFT PULPING: CONTROL OF TRS EMISSIONS FROM EXISTING MILLS (1979) [hereinafter EPA-450/2-78-003b], available at <http://nepis.epa.gov/Exe/ZyPDF.cgi/2000ZF3I.PDF?Dockey=2000ZF3I.PDF>; U.S. ENVTL. PROT. AGENCY, EPA-450/2-78-049a, PRIMARY ALUMINUM DRAFT GUIDELINES FOR CONTROL OF FLUORIDE EMISSIONS FROM EXISTING PRIMARY ALUMINUM PLANTS (1979) [hereinafter EPA-450/2-78-049a], available at <http://nepis.epa.gov/Exe/ZyPDF.cgi/9100SG1P.PDF?Dockey=9100SG1P.PDF>. Three of the five emission guidelines were never codified in the *Code of Federal Regulations*; instead, they were only published in EPA "guideline documents" because they only addressed environmental risks, not human health risks. See generally EPA-450/2-77-005, *supra*; EPA-450/2-78-003b, *supra*; EPA-450/2-78-049a, *supra*. EPA has also promulgated five other emission guidelines under the joint authority of section 111(d) and section 129, which applies solely to waste incinerators. Because EPA has not attempted to justify its Clean Power Plan under section 129, and the Clean Power Plan is not intended to regulate waste incinerators (although theoretically some might be given the unprecedented breadth of the program), those section 129-based standards are not analogous. However, even if relevant, those standards are similar in structure and effect to those that EPA has established under the authority of section 111(d) alone.

92. Clean Power Plan, *supra* note 12, at 64,702–03.

93. 42 U.S.C. § 7411(b) (2012).

94. *Id.* § 7411(a)(2).

95. *Id.* § 7411(a)(1) (emphasis added).

96. As noted, opponents of the Clean Power Plan argue that section 111(d) bars EPA from issuing existing-source regulations that apply to source categories that are regulated under section 112, whereas EPA argues that it can regulate source categories that are regulated under section 112 so long as its section 111(d) regulations do not apply to HAPs. This Article does not express an opinion on the merits of that question, but rather assumes, for the sake of argument, that the regulation of the power sector under section 112 does not bar EPA from regulating that sector under section 111(d).

which the Agency calls on states to submit plans that contain state-established performance standards.⁹⁷ EPA then has authority to judge whether the state plans are “satisfactory” and, if not, to promulgate a federal plan containing standards of performance for facilities in the offending state.⁹⁸

Given the more than forty-year history of the section 111 program, the terms “standard of performance” and “best system of emission reduction” (“BSER”) are well understood. Without exception, the BSER for a particular category of facilities has always been a system, such as a pollution-control device or operating practice, which can be used at the regulated facility for cost-effectively reducing emissions.⁹⁹ Typically, the performance standard is established as a rate of emissions per unit of output, allowing the facility to maintain operations while reducing emissions.¹⁰⁰ At no time in the history of the program has EPA ever required the regulated facility to reduce or cease operation as a means of reducing emissions.¹⁰¹ As a leading CAA textbook relates, section 111 provides for “Best Demonstrated Technology” standards which are technology-based emission standards for industrial source categories.¹⁰² EPA’s own website states, “Section 111 of the Clean Air Act authorizes EPA to develop *technology based standards* which apply to specific categories of stationary sources.”¹⁰³ In a rulemaking for a different source category after EPA proposed the Clean Power Plan, the Agency stated that “[t]he standard that the EPA develops, *based on the BSER achievable at that source*, is commonly a numerical emission limit, expressed as a performance level (i.e., a rate-based standard).”¹⁰⁴

Prior use of section 111(d) by EPA reflects this understanding. In each case, EPA identified specific emissions control technology or work practice options that could be applied to the type of stationary sources under review.¹⁰⁵

B. The Structure of EPA’s Clean Power Plan

The Clean Power Plan is an extraordinary document. It consumes more than three hundred pages of Federal Register text and is supported by thousands of pages of technical support documents. It also represents a radical reimagining of EPA’s section 111 authority. EPA was forced to do so because technology or other measures to directly control emissions at coal-fueled electric generators would not achieve the dramatic GHG emission reductions that the Obama Administration has targeted.¹⁰⁶ The Agency concedes that capturing and storing GHG emissions from existing coal-fueled generators is not feasible.¹⁰⁷ The only other technology or operating practice that can be undertaken at a coal-fueled generator to reduce its GHG emissions is to improve the unit’s operational efficiency so that the amount of fuel input, and therefore CO₂ output, per unit of electric production will be reduced.¹⁰⁸ But even EPA does not believe that operational efficiency improvements can reduce coal-generator CO₂ emissions by more than a few percent on average.¹⁰⁹

As a result, EPA repurposed section 111(d) so that the “best system” for reducing emissions from coal-fueled electric generators would no longer be the “best system” that could be implemented at the regulated facility. Instead, it would be EPA’s conception of the “best system” for reducing GHG emissions from the entire electric utility industry.¹¹⁰ To determine this “best system,” EPA examined the nation’s mix of electric generating resources in 2012 and reorganized them through the use of what it calls three “building blocks.”¹¹¹ For building block one, EPA assumed coal-fired generators on average could improve their efficiency levels by a few percent.¹¹² For building block two, EPA assumed that all natural gas combined cycle units could run seventy-five percent of their annual capacity to reduce the need for coal-fired plants.¹¹³ For building block three, EPA assumed significantly increased use of renewable generation in order to reduce coal generation further.¹¹⁴

97. 42 U.S.C. § 7411(d)(1).

98. *Id.* § 7411(d)(2).

99. E-mail from Terry L. O’Clair, Dir., Div. of Air Quality, N.D. Dep’t of Health, to Gina McCarthy, Adm’r, U.S. Env’tl. Prot. Agency (Dec. 1, 2014) (on file with author).

100. *Id.*

101. *Id.*

102. Robert J. Martineau Jr. & Michael K. Stagg, *New Source Performance Standards*, in *THE CLEAN AIR HANDBOOK* 321, 328, 332 (Julie R. Domike & Alec C. Zaccaroli eds., 3d ed. 2011); *see also* ROY S. BELDEN, *CLEAN AIR ACT: BASIC PRACTICE SERIES* 61 (2d ed. 2001) (“Congress intended that the best demonstrated technology should be one that balances the potential impacts and does not do more damage to a particular environmental medium than actual benefit to the air quality.”).

103. *Demonstrating Compliance With New Source Performance Standards and State Implementation Plans*, U.S. ENVTL. PROTECTION AGENCY, <http://www2.epa.gov/compliance/demonstrating-compliance-new-source-performance-standards-and-state-implementation-plans> (last visited June 14, 2015) (emphasis added).

104. Petroleum Refinery Sector Risk and Technology Review and New Source Performance Standards, 79 Fed. Reg. 36,880, 36,885 (proposed June 30, 2014) (to be codified at 40 C.F.R. pts. 60, 63) (emphasis added).

105. *See, e.g.*, Emission Guidelines and Compliance Times for Municipal Solid Waste Landfills, 40 C.F.R. §§ 60.30c–60.36c (2015); Emission Guidelines and Compliance Times for Sulfuric Acid Production Units, 40 C.F.R. §§ 60.30d–60.32d (2015); EPA-450/2-77-005, *supra* note 91; EPA-450/2-78-003b, *supra* note 91; EPA-450/2-78-049a, *supra* note 91. EPA did attempt to use section 111(d) a little more creatively in its Clean Air Mercury Rule (“CAMR”), which would have regulated mercury emissions from existing power plants. *See Stan-*

dards of Performance for New and Existing Stationary Sources: Electric Utility Steam Generating Units, 70 Fed. Reg. 28,606 (May 18, 2005). In that rule, EPA proposed to allow emissions trading to determine compliance with the required emission reductions based on an emission budget assigned to each state. *Id.* at 28,623. However, the level of emission reduction that EPA sought to achieve with CAMR was still based on an analysis of what each individual facility could achieve using the best control technology available. *Id.* at 28,619. The novel legal questions raised by the creative approach EPA proposed in CAMR remain untested because the D.C. Circuit vacated CAMR on other grounds. *See New Jersey v. EPA*, 517 F.3d 574 (D.C. Cir. 2008) (vacating CAMR because EPA improperly removed electric utility generating units from the list of regulated industries under section 112 of the CAA).

106. *See* Clean Power Plan, *supra* note 12, at 64,663–64.

107. *Id.* at 64,756.

108. *See id.* at 64,787.

109. *See id.*

110. *Id.* at 64,717–18.

111. *Id.*

112. *Id.* at 64,787.

113. *Id.* at 64,795.

114. *Id.* at 64,803.

Applying each of these assumptions, EPA developed emission standards for the existing fleet of coal and natural gas-fired electric generation facilities.¹¹⁵ EPA set the standard for coal units at 1305 pounds of CO₂ per megawatt hour of electric generation (“lbs/MWh”) and for natural gas units at 771 lbs/MWh.¹¹⁶ Unlike past EPA performance standards, however, EPA did not set these standards at a level that the affected facilities could meet by installing pollution control devices or implementing new operating practices. EPA recognizes that no technology or operating practices are available to reduce emissions to the standards EPA set.¹¹⁷ That is precisely the point. To meet these standards, the owner of the facility would have to reduce coal-fired generation and build new zero- or low-emitting facilities to replace the lost generation.¹¹⁸ In effect, the fossil fuel generating facility (now operating less) and the new lower- or zero-emitting facility would be considered a single source, and together they could meet the 1305 and 771 lbs/MWh standards.¹¹⁹

EPA then took this one step further. Based on the 1305 and 771 lbs/MWh standards, the EPA set what it calls “goals,” for each state, establishing a ceiling for the amount of CO₂ emissions the power sector in each state may emit.¹²⁰ EPA set alternative state-by-state “goals” in which the state’s fleet of fossil-fueled generators must meet either a combined emissions rate or stay below a cap on the total amount of CO₂ emissions per year.¹²¹ EPA gave states until September 6, 2016, either to submit a final plan showing how they would restructure their electric utilities to meet these “goals,” or to submit an interim plan with a request for an extension of time, up to two additional years, to develop a final plan.¹²² EPA estimates that meeting these goals would reduce U.S. power sector CO₂ emissions by thirty-two percent as compared with 2005 levels, making the rule nine percent more ambitious than the rule as originally proposed.¹²³

Given the stringency of the “goals,” EPA fully expects states to adopt interstate cap-and-trade programs of the type that Congress has consistently rejected. Along with its final Clean Power Plan rules, EPA issued a proposed federal plan that it said it would implement for any state that either does not submit a plan at all or submits an unsatisfactory plan.¹²⁴ The proposed federal plan consists of a set of cap-and-trade rules.¹²⁵ EPA invited states, in developing their plans, to use these cap-and-trade provisions as a model for state and interstate cap-and-trade plans.¹²⁶ Thus, in the end, EPA has returned to cap-and-trade—the very program Congress has consistently rejected—to achieve the dramatic emission reductions it wants. This time, however, rather than seek legislative authority it knows it cannot obtain, it is seeking to shoe-horn cap-and-trade into section 111(d).

IV. Has EPA Overreached?

It is hard to imagine that the Clean Power Plan can be judicially sustained by the Supreme Court given the Court’s “skepticism” about an agency’s claim that it has “discover[ed] in a long-extant statute an unheralded power to regulate ‘a significant portion of the American economy.’”¹²⁷ Certainly, section 111(d) is a “long-extant statute,” having been enacted in 1970, and certainly the power EPA seeks to exert is “unheralded,” since EPA has never interpreted section 111(d) in remotely the same fashion as it is doing now to justify the Clean Power Plan. And certainly, as discussed below, EPA is seeking to regulate a significant portion of the American economy.¹²⁸ The Clean Power Plan seeks nothing less than a comprehensive reordering of the electric power sector—for obvious reasons, perhaps the most important industry in the country.

Presumably, under *UARG*, EPA could exercise this “unheralded power” if Congress had “spoken clearly” to that effect. But Congress did not speak clearly in authorizing EPA’s approach; to the contrary, as also discussed below, section 111(d) clearly does not give EPA the enormous power it is asserting.¹²⁹

A. Breadth of the Regulation

The Clean Power Plan is a remarkable assertion of agency authority in two ways. First, even though it is an environmental regulator, EPA is seeking to act far outside its area of jurisdiction and expertise in seeking to reengineer the electric power grid. Second, it seeks to seize authority over the

115. *Id.* at 64,667.

116. *Id.* Note that the Clean Power Plan does not require compliance with these standards immediately, but instead requires states to develop a plan for achieving them over a nine-year compliance period between 2022 and 2030, with the standards gradually decreasing over time until reaching the final standards provided above. *See id.*

117. EPA’s emission rate standards are even lower than the level EPA thinks can be achieved by new coal and natural gas-fueled facilities using the best available technology for controlling emissions. *See* Standards of Performance for Greenhouse Gas Emissions From New, Modified, and Reconstructed Stationary Sources: Electric Utility Generating Units, 80 Fed. Reg. 64,509, 64,626–27 (Oct. 23, 2015) (setting standards at 1400 lbs/MWh for coal plants and 1000–1030 lbs/MWh for natural gas plants) (to be codified at 40 C.F.R. pts. 60, 70–71).

118. *See* Clean Power Plan, *supra* note 12, at 64,709.

119. *Id.* at 64,707.

120. *Id.*

121. *Id.* at 64,665–66. Like the standards, the “goals” become effective in 2022 and become progressively tighter until final “goals” become effective in 2030. *See id.*

122. *Id.* at 64,669.

123. *Id.* at 64,665; Press Release, Exec. Office of the President, Fact Sheet: President Obama to Announce Historic Carbon Pollution Standards for Power Plants (Aug. 3, 2015), available at <https://www.whitehouse.gov/the-press-office/2015/08/03/fact-sheet-president-obama-announce-historic-carbon-pollution-standards>.

124. Federal Plan Requirements for Greenhouse Gas Emissions From Electric Utility Generating Units Constructed on or Before January 8, 2014; Model Trading Rules; Amendments to Framework Regulations, 80 Fed. Reg. 64,965, 64,975 (Oct. 23, 2015) (to be codified at 40 C.F.R. pts. 60, 62, 78).

125. *Id.* at 64,975–76.

126. *Id.*

127. *Util. Air Regulatory Grp. v. EPA*, 134 S. Ct. 2427, 2444 (2014) (quoting *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120, 159 (2000)).

128. *See* discussion *infra* Part IV.A.

129. *See* discussion *infra* Part IV.B.

electric utility industry that the Constitution and Congress delegated to the states.

I. EPA Reengineers the Power Grid

It is inarguable that the Clean Power Plan would thoroughly change the way America produces and uses electricity. That is the whole point of the regulation. At EPA's direction, every state would have to completely alter how their portion of the electric grid operates by dramatically reducing the use of coal for electric generation. In the Agency's formulation of the "best" system for meeting its mandatory goals, states would "re-dispatch" power flow so that natural gas combined cycle generators would increase their capacity factors to seventy-five percent,¹³⁰ even though only ten percent of gas plants achieved that rate of production in 2012,¹³¹ a year of extremely low natural gas prices.¹³² EPA makes the similarly aggressive assumption that the use of renewable resources will increase to at least 540 terrawatt hours ("TWh") by 2030.¹³³ To put this in perspective, this increase is more than twice the total generation from all non-hydro renewable power sources in 2014 of 248 TWh.¹³⁴ Furthermore, EPA projects that its plan will cause electricity consumption to decline between 2020 and 2030, despite the fact that the United States is expected to add more than two million people per year,¹³⁵ and presumably the country will grow economically. In fact, electricity consumption has *never* declined on a decadal time scale since electricity first became widely available a century ago.¹³⁶

Grid operations would be transformed. As the North American Electric Reliability Corporation ("NERC"), the entity responsible for maintaining reliable grid operations across the continent, observed regarding EPA's less stringent proposal, EPA "proposes a very different mix of power resources than we have today."¹³⁷ NERC concluded that the Clean Power Plan will "transform grid-level reliability ser-

vices, diversity, and flexibility."¹³⁸ Federal Energy Regulatory Commission ("FERC") Commissioner Phillip D. Moeller testified before Congress that, "If it isn't already obvious, the title of the proposed rule, the Clean Power Plan, makes it clear that *EPA is creating national electricity policy*."¹³⁹

Coal has been the dominant source of electricity production for decades.¹⁴⁰ Under the Clean Power Plan, EPA's modeling shows that coal-generation would decline as a percentage of total generation to a level that is lower than at any time since the Energy Information Administration began keeping records in 1949, and other analysis shows that coal's share could be cut to half of its lowest-ever level.¹⁴¹ This is not an incidental effect of the rule; it is the central reason for EPA adopting it.

The changes to the power grid that the rule would effectuate are so far-reaching that entities responsible for operation of the grid have expressed concern, and even alarm. Commenting on the less stringent proposal, the Southwest Power Pool, which is responsible for grid operations in a region comprising some or all of eight states, found that the rule, as proposed, will "result[] in significant loss of load and violations of NERC reliability standards," with some "[p]ortions of the system . . . so severely overloaded that cascading outages and voltage collapse would occur."¹⁴² The Midcontinent Independent System Operator ("MISO"), which is responsible for grid operations across all or parts of fifteen U.S. states and the Canadian province of Manitoba, similarly observed that the rule, as proposed, is "likely to have a negative impact on electric system reliability."¹⁴³ The Electric Reliability Council of Texas ("ERCOT") stated that the rule, as proposed, would be "likely to lead to reduced grid reliability for certain periods and an increase in localized grid challenges."¹⁴⁴

The cost of reengineering the grid as EPA requires would be extraordinarily high. MISO estimated that the compliance cost of the proposed rule, *in just the MISO region*, on a 20-year discounted basis, would range from \$55 to \$83

130. See Clean Power Plan, *supra* note 12, at 64,732, 64,785 n.617.

131. U.S. ENVTL. PROT. AGENCY, EPA-HQ-OAR-2013-0602, GHG ABATEMENT MEASURES 3-9 (2014).

132. MICHAEL RATNER, CONG. RESEARCH SERV., R43636, U.S. SHALE GAS DEVELOPMENT: PRODUCTION, INFRASTRUCTURE, AND MARKET ISSUES 2 (2015); 2012 Brief: Average Wholesale Natural Gas Prices Fell 31% in 2012, U.S. ENERGY INFO. ADMIN. (Jan. 8, 2013), <http://www.eia.gov/todayinenergy/detail.cfm?id=9490>.

133. See U.S. ENVTL. PROT. AGENCY, EPA-HQ-OAR-2013-0602, GREENHOUSE GAS MITIGATION MEASURES 4-10, tbl. 4-10 (2015).

134. See U.S. ENERGY INFO. ADMIN., ELECTRIC POWER MONTHLY WITH DATA FOR DECEMBER 2014 17-18, tbls. 1.2-1.3 (2015), available at <http://www.eia.gov/electricity/monthly>.

135. U.S. ENVTL. PROT. AGENCY, EPA-452/R-14-002, REGULATORY IMPACT ANALYSIS FOR THE PROPOSED CARBON POLLUTION GUIDELINES FOR EXISTING POWER PLANTS AND EMISSION STANDARDS FOR MODIFIED AND RECONSTRUCTED POWER PLANTS 3-14 (2014).

136. See SETH SCHWARTZ, EVALUATION OF THE IMMEDIATE IMPACT OF THE CLEAN POWER PLAN RULE ON THE COAL INDUSTRY 10 (2015), available at <http://www.nma.org/pdf/EVA-Report-Final.pdf>.

137. Media Release, N. Am. Elec. Reliability Corp., Reliability Review of Proposed Clean Power Plan Identifies Areas for Further Study, Makes Recommendations for Stakeholders (Nov. 5, 2014) (quoting Gerry Cauley, NERC president and chief executive officer).

138. N. AM. ELEC. RELIABILITY CORP., POTENTIAL RELIABILITY IMPACTS OF EPA'S PROPOSED CLEAN POWER PLAN: PHASE I, at vii (2015).

139. *FERC Perspectives: Questions Concerning EPA's Proposed Clean Power Plan and Other Grid Reliability Challenges: Hearing Before the H. Subcomm. on Energy & Power*, 113th Cong. 1 (2013) (statement of FERC Commissioner Philip D. Moeller) (emphasis added).

140. See, e.g., *Energy Sources Have Changed Throughout the History of the United States*, U.S. ENERGY INFO. ADMIN. (July 3, 2013), <http://www.eia.gov/todayinenergy/detail.cfm?id=11951>; U.S. ENERGY INFO. ADMIN., ELECTRIC POWER MONTHLY WITH DATA FOR JUNE 2015, at tbl. 1.1 (2015).

141. SCHWARTZ, *supra* note 136, at 28.

142. Southwest Power Pool, Comment on Proposed Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, at 4-6, available at http://www.spp.org/documents/23338/2014-10-09_spp%20comments_epa-hq-oar-2013-0602.pdf (EPA-HQ-OAR-2013-0602-20757).

143. Midcontinent Independent System Operator, Inc., Comment on Proposed Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, at 2 (Nov. 25, 2014), available at <https://www.misoenergy.org/Library/Repository/Communication%20Material/EPA%20Regulations/MISO%20Comments%20to%20EPA%20on%20Proposed%20CPP%2011-25-14.pdf> (EPA-HQ-OAR-2013-0602-22547).

144. ELEC. RELIABILITY COUNCIL OF TEX., ERCOT ANALYSIS OF THE IMPACTS OF THE CLEAN POWER PLAN 1 (2014), available at <http://www.ercot.com/content/news/presentations/2014/ERCOTAnalysis-ImpactsCleanPowerPlan.pdf>.

billion, even without considering the significant amount of transmission and natural gas pipeline development that the rule will make necessary and the billions of dollars in stranded pollution-control investments that the rule will create.¹⁴⁵ Similarly, ERCOT has forecasted a twenty percent retail rate increase by 2020, also “without accounting for the costs of transmission upgrades, procurement of additional ancillary services, energy efficiency investments, capital costs of new capacity, and other costs associated with the retirement or decreased operation of coal-fired capacity in ERCOT.”¹⁴⁶ Private analysis firms analyzing the proposed rule found even higher costs.¹⁴⁷

Indeed, in its effort to transform the power grid in this fashion, EPA has transformed itself from an environmental regulator into an energy regulator. It is astonishing how many expert judgments EPA purports to make as to how the grid should be operated. EPA purports to know how much the country should rely on natural gas for electric generation, how much new renewable energy the country can be expected to produce, how much electricity consumers can be expected to save, and how the grid can be restructured and still run in a safe and reliable fashion.¹⁴⁸

But Congress did not even give FERC, the nation’s electric regulator, authority to refashion the grid in this manner, much less EPA. There is no reason to suppose that Congress would have delegated to EPA the authority to make these types of energy policy judgments given that EPA, as an environmental regulator, does not have the expertise to make them.¹⁴⁹ As the Supreme Court recently said in *King*

v. Burwell,¹⁵⁰ “[i]t is especially unlikely that Congress would have delegated” critical decision-making to an agency, “which has no expertise” in the matter.¹⁵¹ And as the Kansas Corporation Commission, a true electric regulator, has pointed out, the rule reflects EPA’s “understandable but serious lack of understanding of the electrical system, which is outside its area of expertise.”¹⁵²

2. The Clean Power Plan’s Intrusion Into State Authority

An equally troubling aspect of the Clean Power Plan is EPA’s seizure of authority that the Constitution and Congress vests in states. Under the Tenth Amendment, the federal government has only such powers as are enumerated in the Constitution; all other powers are reserved to the states.¹⁵³ As a result, states, not the federal government, are the repository of the general police power to protect the public.¹⁵⁴ Among the police powers of the state is the regulation of public utilities.¹⁵⁵

Of course, Congress has power under the Commerce Clause to regulate interstate commerce and did so regarding the interstate electric market first in the Federal Water Power Act of 1920¹⁵⁶ and then in the Federal Power Act of 1935, as amended.¹⁵⁷ But while Congress gave the then-Federal Power Commission, now FERC, authority over interstate electric transactions, under the Federal Power Act this power “extend[s] only to those matters . . . not subject to regulation by the States.”¹⁵⁸ Thus, FERC has jurisdiction over wholesale electric sales but lacks power to interfere with “state authority in such traditional areas as the authority over . . . administration of integrated resource planning and . . . utility generation and resource portfolios.”¹⁵⁹ As Congress divided state and federal power, “the States retain their traditional

145. MISO, ANALYSIS OF EPA’S PROPOSAL TO REDUCE CO₂ EMISSIONS FROM EXISTING ELECTRIC GENERATING UNITS 12 (2014), available at <https://www.misoenergy.org/Library/Repository/Communication%20Material/EPA%20Regulations/AnalysisofEPAsProposaltoReduceCO2EmissionsfromExisting-ElectricGeneratingUnits.pdf>.

146. ELEC. RELIABILITY COUNCIL OF TEX., *supra* note 144.

147. Energy Ventures Analysis, Inc., a leading energy consulting firm for the utility, power transmission, natural gas, coal, and renewable energy industries, estimated that, for the ten-year period of 2020–2030, wholesale electricity costs will increase by \$274 billion, non-power natural gas costs will increase by \$80 billion, and additional capital costs for replacement power will be \$53 billion, not including costs associated with natural gas pipeline and electric transmission infrastructure that the rule will require. ENERGY VENTURES ANALYSIS, INC., EPA CLEAN POWER PLAN: COSTS AND IMPACTS ON U.S. ENERGY MARKETS 3 (2014) (independent evaluation commissioned by the National Mining Association), available at <http://www.countoncoal.org/assets/Executive-Summary-EPA-Clean-Power-Plan-Costs-Impacts.pdf>. The economic consulting and analysis firm, NERA, projected that the total cost of the EPA proposal to be \$366 billion to \$479 billion over a fifteen-year period, and that the proposal would cause double-digit electricity rate increases in forty-three states, again without considering pipeline and transmission infrastructure costs. NERA ECONOMIC CONSULTING, POTENTIAL ENERGY IMPACTS OF THE EPA PROPOSED CLEAN POWER PLAN 21 (2014), available at http://www.americaspower.org/sites/default/files/NERA_CPP%20Report_Final_Oct%202014.pdf.

148. See, e.g., U.S. ENVTL. PROT. AGENCY, *supra* note 133; U.S. ENVTL. PROT. AGENCY, EPA-HQ-OAR-2013-0602, INCORPORATING RE AND DEMAND-SIDE EE IMPACTS INTO STATE PLAN DEMONSTRATIONS (2015); U.S. ENVTL. PROT. AGENCY, TECHNICAL SUPPORT DOCUMENT: RESOURCE ADEQUACY AND RELIABILITY ANALYSIS (2015), <http://www2.epa.gov/cleanpowerplan/clean-power-plan-final-rule-technical-documents>.

149. See *Adams Fruit Co., Inc. v. Barrett*, 494 U.S. 638, 650 (1990) (quoting *Fed. Mar. Comm’n v. Seatrain Lines, Inc.*, 411 U.S. 726, 745 (1973)) (“Although agency determinations within the scope of delegated authority are entitled to

deference, it is fundamental ‘that an agency may not bootstrap itself into an area in which it has no jurisdiction.’”); see also Office of Consumers’ Counsel v. FERC, 655 F.2d 1132, 1141–42 (D.C. Cir. 1980) (stating that because agency interpretation was “virtually unprecedented” and no agency expertise is involved, “court has the preeminent responsibility to independently scrutinize and decide all jurisdictional issues”).

150. *King v. Burwell*, 135 S. Ct. 2480 (2015).

151. *Id.* at 2483.

152. Kansas Corporation Commission, Comment on Proposed Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units, at 23 (Oct. 29, 2014), available at http://www.kcc.state.ks.us/pi/KCC_Comments_on_EPA_Clean_Power_Plan.pdf (EPA-HQ-OAR-2013-0602).

153. U.S. CONST. amend. X.

154. See, e.g., JOHN E. NOWACK & RONALD D. ROTUNDA, CONSTITUTIONAL LAW 138 (7th ed. 2004).

155. *Munn v. Illinois*, 94 U.S. 113, 124–25 (1877); see also RICHARD J. PIERCE, JR. & ERNEST GELLHORN, REGULATED INDUSTRIES IN A NUTSHELL 78–83 (1999).

156. Federal Water Power Act, ch. 285, 41 Stat. 1063 (1920) (codified as amended at 16 U.S.C. §§ 791–823d (2012)).

157. Federal Power Act, ch. 687, 49 Stat. 838 (1935) (codified as amended at 16 U.S.C. §§ 791a–828c (2012)).

158. 16 U.S.C. § 824(a); see also *New Eng. Power Generators Ass’n v. FERC*, 757 F.3d 283, 290 (D.C. Cir. 2014).

159. *New York v. FERC*, 535 U.S. 1, 24 (2002) (citing FERC Order No. 888, FERC STATS. & REGS., REGULATIONS PREAMBLES 1991–1996 ¶ 31,782, n.544; *Ameren Energy Mktg. Co.*, 96 FERC ¶ 61,306, at 62,189 (2002) (“[W]hether

responsibility in the field of regulating electrical utilities for determining questions of need, reliability, cost, and other related concerns.”¹⁶⁰

When Congress explicitly reserves jurisdiction over a matter, “[t]hat places the matter off-limits to the FERC,” which “has no business” attempting to regulate it.¹⁶¹ Thus, for instance, while FERC may establish policies to encourage the development of new electric capacity, it may not mandate the type of resources that states may develop in response.¹⁶² States thus have plenary authority to shape their electric generation portfolios, including “the right to forbid new entrants from providing new capacity, to require retirement of existing generators, to limit new construction to more expensive, environmentally-friendly units, or to take any other action in their role as regulators of generation facilities without direct interference from [FERC].”¹⁶³

Thus, the dividing line between state and federal authority in regulating electricity has always been considered a “bright” one,¹⁶⁴ with authority over electric generation planning and development falling comfortably on the state side of the line. States have traditionally exercised their plenary power in this area through public service commissions.¹⁶⁵ Most state commissions superintend electric utility generation resource planning by requiring utilities to file Integrated Resource Plans (“IRPs”).¹⁶⁶ The purpose of an IRP is to enable utilities, through a public process, to develop long-term plans for matching electric demand with a portfolio of supply and demand-side resources that the state commission determines are compatible with the public interest.¹⁶⁷ The IRP planning process can vary from state to state, as can the results of that process, depending on the specific circumstances of each state and the relative weight individual state commissions assign to the relevant public policy factors.¹⁶⁸

The Clean Power Plan, however, impinges on this well-established and longstanding state police power over electric generation planning and development. Indeed, EPA’s proposal seeks to displace state planning authority almost entirely by establishing mandatory state goals based on EPA’s own version of how a state IRP should look. As discussed above, EPA has developed what it considers to be the “best” electric utility system comprised of what EPA thinks is the best electric

resource mix for the states.¹⁶⁹ This is no different than an IRP. While EPA claims that states have “flexibility” to tailor individual state plans to individual state needs, EPA retains authority to reject the state plan if the Agency adjudges it insufficient to meet EPA’s requirements.¹⁷⁰ Hence, at the very least, EPA becomes the ultimate arbiter of each state’s resource mix. Again, however, not even FERC, much less EPA, has the authority to dictate resource outcomes to the states. As the Kansas Corporation Commission aptly put it:

Of particular concern is the extent of the EPA’s proposed regulatory reach into Kansas’ mix of energy resources. The KCC-regulated electric utilities in Kansas are vertically integrated investor-owned public utilities subject to traditional rate of return economic regulation under which the KCC carefully balances the interests of the public utility against those of the public the utility serves. In its proposed Clean Power Plan, the EPA has inserted itself into a regulatory field occupied by the states for decades in which the states have proven expertise in public utility ratemaking and in understanding the complexity of the electric grid and electric reliability. The proposed rule will disrupt the carefully balanced, cost-effective delivery of electricity in Kansas and will lead to detrimental economic effects, both within the Kansas economy and with the states with which Kansas does business.¹⁷¹

In sum, as FERC Commissioner Tony Clark stated:

More than any regulation I have seen during the time that I have been involved in the energy sector, *this EPA proposed rule has the potential to comprehensively reorder the jurisdictional relationship between the federal government and states as it relates to the regulation of public utilities and energy development.*¹⁷²

Or, as noted constitutional scholar Lawrence Tribe has written, “EPA’s proposal impermissibly trenches on state authority over intrastate energy regulation in a way that is unprecedented under the CAA and raises serious constitutional questions under the Tenth Amendment and long-settled principles of federalism.”¹⁷³

a purchaser has prudently chosen from among available supply options . . . is generally a question that the state commissions address.”).

160. *Pac. Gas & Elec. Co. v. State Energy Res. Conservation & Dev. Comm’n*, 461 U.S. 190, 205 (1983).

161. *Altamont Gas Transmission Co. v. FERC*, 92 F.3d 1239, 1248 (D.C. Cir. 1996).

162. *Me. Pub. Utils. Comm’n v. FERC*, 520 F.3d 464, 479 (D.C. Cir. 2008).

163. *Conn. Dep’t Pub. Util. Control v. FERC*, 569 F.3d 477, 481 (D.C. Cir. 2009).

164. *Fed. Power Comm’n v. S. Cal. Edison Co.*, 376 U.S. 205, 215–16 (1964).

165. See *Regulatory Commissions*, NAT’L ASS’N REG. COMMISSIONERS, <http://www.naruc.org/Commissions/CommissionsList.cfm> (last visited Oct. 24, 2015) (listing commissions for all fifty states).

166. See RACHEL WILSON & BRUCE BIEWALD, SYNAPSE ENERGY ECON. INC., *BEST PRACTICES IN ELECTRIC UTILITY INTEGRATED RESOURCE PLANNING: EXAMPLES OF STATE REGULATIONS AND RECENT UTILITY PLANS* (2013), available at <http://www.raponline.org/document/download/id/6608> (report created for the Regulatory Assistance Project).

167. *Id.*

168. *Id.*

169. See discussion *supra* Part III.B.

170. 42 U.S.C. § 7411(d)(2) (2012).

171. Kansas Corporation Commission, Letter Attached to Comment on Proposed Rule for Carbon Pollution Emission Guidelines for Existing Stationary Sources: Electric Utility Generating Units (Oct. 29, 2014), available at http://www.kcc.state.ks.us/pi/KCC_Comments_on_EPA_Clean_Power_Plan.pdf.

172. *FERC Perspectives: Questions Concerning EPA’s Proposed Clean Power Plan and Other Grid Reliability Challenges: Hearing Before the Subcomm. on Energy & Power of the H. Comm. on Energy & Commerce*, 113th Cong. (2014) (statement of FERC Commissioner Tony Clark) (emphasis added).

173. *EPA’s Proposed 111(d) Rule for Existing Power Plant: Legal and Cost Issues: Hearing Before the Subcomm. on Energy & Power of the H. Comm. on Energy & Commerce*, 114th Cong. (2015) (statement of Lawrence H. Tribe, Professor, Harvard Law School).

B. Does Section 111(d) Give EPA This Power?

Undoubtedly, then, the Clean Power Plan entails EPA making decisions of “vast ‘economic and political significance.’”¹⁷⁴ But did Congress, “speak[ing] clearly,” assign these decisions to EPA?¹⁷⁵ Section 111(d) has been in existence for more than forty years, and in all that time, EPA has not even remotely suggested that the provision empowers it to transform whole sectors of the economy. And no wonder. The few phrases of statutory text on which EPA relies cannot support the extraordinarily voluminous, complicated, and ambitious Clean Power Plan. Congress does not “hide elephants in mouseholes,” nor does it “alter the fundamental details of a regulatory scheme in . . . ancillary provisions” like section 111(d).¹⁷⁶

V. Conclusion

EPA success in defending the Clean Power Plan from legal challenge is absolutely critical to the ability of the Obama Administration and like-minded future administrations to use the CAA to compel steep GHG emission reductions. EPA has been clear from the beginning of the Obama Administration that its biggest targets for GHG regulation are the two sectors of the economy that emit the most GHGs—the transportation sector and the electric power generation sector.¹⁷⁷ EPA has already proceeded against the transportation sector, although NHTSA could have obtained the same

results through the CAFE program. At stake now is EPA’s ability to force extensive GHG emission reductions from the power sector, and then from other types of manufacturing and industrial facilities, where EPA’s path to regulation will also be section 111(d).

EPA faces a dilemma, however. Significantly reducing GHG emissions from the power sector will require a reengineering of the way the country produces and consumes electricity, yet Congress did not give EPA the power to bring about this enormous, transformative change. The same is true regarding the nation’s industrial and manufacturing base in general. EPA knows how it wants to undertake this reengineering; it wants to implement a cap-and-trade program and, as seen, it has designed the Clean Power Plan to achieve just that result. And so two decades of attempting to regulate GHGs have come full-circle: efforts to enact cap-and-trade legislation in Congress failed, leading to the second-best solution of regulating under the CAA, which has now led EPA to imaginatively reinterpret the long extant section 111(d) as authority for the cap-and-trade authority it has wanted all along.

But the Supreme Court, first in *Massachusetts v. EPA* and then in *UARG*, has made plain that EPA cannot substitute its policy goals for those that Congress legislated. If, as seems likely, EPA is not successful in the forthcoming section 111(d) litigation, nearly two decades of effort to use the CAA as a lever to force major GHG emission reductions will be at an end. It will be back to Congress.

174. *Util. Air Regulatory Grp. v. EPA*, 134 S. Ct. 2427, 2444 (2014) (quoting *FDA v. Brown & Williamson Tobacco Corp.*, 529 U.S. 120, 160 (2000)).

175. *Id.*

176. *Whitman v. Am. Trucking Ass’ns*, 531 U.S. 457, 468 (2001).

177. *See, e.g.*, EXEC. OFFICE OF THE PRESIDENT, THE PRESIDENT’S CLIMATE ACTION PLAN 6–8 (2013).