

Greenhouse Gas Regulation under the Clean Air Act

Primer on GHG Regulation under the Clean Air Act: NSPS Rulemaking Process

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On December 23, 2010, the U.S. Environmental Protection Agency (EPA) entered into two settlement agreements requiring the Agency to incorporate greenhouse gas (GHG) emissions into the new source performance standards (NSPS) for natural gas, oil, and coal-fired electricity-generating units and petroleum refineries. The settlement agreements also require the EPA to provide the states with guidelines to develop emissions standards for existing sources within their borders. The EPA has considerable discretion in establishing the standards and guidelines, and it is not yet clear what these regulations will require. For more information on the Clean Air Act and efforts to regulate GHG emissions, see the Nicholas Institute's Primer on GHG Regulation under the Clean Air Act: PSD, Title V, and NSPS.

SETTLEMENT AGREEMENTS

The EPA's impending action is the result of a settlement agreement to resolve a lawsuit brought by eleven states, two local governments, and several environmental groups, asserting that the EPA was required to include standards of performance for GHG emissions in the NSPS for power plants and refineries published in 2006 and 2008, respectively, and had failed to do so. In addition to requiring the EPA to set performance standards for new and modified units and to issue guidelines for existing units, the settlement agreements establish a timeline for compliance. The EPA must propose performance standards and emissions guidelines for power plants by July 26, 2011, and for refineries by December 15, 2011, with final standards and implementation guidelines issued by May 26, 2012, and November 15, 2012, respectively. The timeline for refineries allows the EPA additional time to conduct a risk and technology review of current air toxic standards so that it can address several pollutants from refineries in a comprehensive man-

ner, which the EPA believes will result in greater emissions reductions.¹

NSPS RULEMAKING PROCESS

Since the issuance of the settlement agreements, the EPA has stressed the importance of public and stakeholder outreach in developing the standards² and held five listening sessions in February and March to seek feedback from electric power and petroleum refinery industry representatives, environmental and environmental justice organization representatives, state and tribal representatives, and coalition group representatives. The EPA accepted written comments on the planned rulemakings through March 18, 2011.

Performance standards set by the EPA require electricity-generating units to meet a specific performance level, but do not impose a specific method by which this level must be achieved. In crafting the performance standards and emissions guidelines, the EPA will take the cost and availability of control options into account. The EPA is required to set performance standards at a level that has been "adequately

¹ Settlement Agreement for Petroleum Refineries, retrieved from <http://www.epa.gov/airquality/pdfs/refineryghgsettlement.pdf>.

² Press Release, Environmental Protection Agency, EPA to Set Modest Pace for Greenhouse Gas Standards/Agency stresses flexibility and public input in developing cost-effective and protective GHG standards for largest emitters (December 23, 2010).

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demonstrated” by an existing technology.³ The EPA has the burden of proving that the standard is reasonable and that the industry is capable of meeting the standard.⁴

The EPA announced in December 2010 its intent to coordinate the NSPS rulemaking process for electricity-generating units with other Clean Air Act regulatory actions facing the power sector to help the industry meet the requirements as efficiently and cost-effectively as possible.⁵ At this stage, it is unclear what form a coordinated approach would take.

IMPLEMENTATION

The NSPS applies to *new facilities* (sources of pollution) and *existing facilities that undergo major modifications*. A modification can be a physical change or a change in operation if either increases the emissions of any air pollutant.⁶ The Clean Air Act also requires states to regulate *existing* sources when the EPA sets a NSPS for a pollutant, provided the pollutant is not a criteria pollutant or a hazardous pollutant (GHGs do not fall under either category).

New and Modified Facilities

New and modified sources are subject to NSPS if they commence construction after the EPA proposes the regulation. This is in contrast to the typical regulatory approach of requiring compliance once the rule is final, and is meant to prevent companies from rushing construction to avoid compliance with a proposed rule. The Clean Air Act allows the EPA to delegate implementation and enforcement of the NSPS to the states, provided the Agency determines that the state program is adequate.⁷ The EPA maintains the authority to enforce the performance standards at any time even when implementation and enforcement have been delegated to the states.⁸

Existing Facilities

For existing sources, the Clean Air Act provides the EPA and state permitting authorities with significant discretion regarding compliance timelines. States are required to submit their plans for regulating existing sources to the EPA within nine months after the emissions guide lines are published in the Federal Register.⁹ In the event the emissions standards prove to be technically impossible or cost-prohibitive, the states may adjust both the stringency of the standards and the schedule for implementation.¹⁰ States must conduct a public hearing prior to the adoption of the plans.¹¹

FOR FURTHER INFORMATION, SEE:

- EPA, Background on Establishing New Source Performance Standards (NSPS) Under the Clean Air Act, available at <http://www.epa.gov/airquality/pdfs/111background.pdf>
- EPA, Settlement Agreements to Address Greenhouse Gas Emissions from Electric Generating Units and Refineries: Fact Sheet, available at, <http://www.epa.gov/airquality/pdfs/settlementfactsheet.pdf>
- Richardson, Nathan, EPA Greenhouse Gas Performance Standards: What the Settlement Agreement Means, RFF Issue Brief, available at <http://www.rff.org/RFF/Documents/RFF-IB-11-02.pdf>

³42 U.S.C. § 7411(a)(1)

⁴ *National Lime Association v. EPA*, 627 F.2d 416 (D.C. Cir. 1980).

⁵ Settlement Agreements to Address Greenhouse Gas Emissions from Electric Generating Units and Refineries: Fact Sheet, retrieved from <http://www.epa.gov/airquality/pdfs/settlementfactsheet.pdf>.

⁶ 42 U.S.C. § 7411(a)(4).

⁷ 42 U.S.C. § 7411(c)(1).

⁸ 42 U.S.C. § 7411(c)(2).

⁹ 40 CFR 60.23(a)

¹⁰ 40 CFR 60.24(f)

¹¹ 40 CFR 60.23(c)(1)

TIMELINE

12/23/2010: The EPA enters into two proposed settlement agreements to issue rules that will address greenhouse gas emissions from natural-gas-, oil-, and coal-fired electricity-generating units and refineries.

1/2/2011: Phase One of the Prevention of Significant Deterioration (PSD) and Title V permitting requirements begins, affecting power plants and industrial facilities that (1) must obtain a permit anyway based on emissions of pollutants other than GHGs *and* (2) emit at least 75,000 tons per year (tpy) of GHGs.

2/4/2011 – 3/4/2011: The EPA conducts listening sessions with electric power industry representatives, environmental and environmental justice organization representatives, state and tribal representatives, coalition group representatives, and petroleum refinery industry representatives.

7/1/2011: Phase Two of the Prevention of Significant Deterioration (PSD) and Title V permitting requirements begins, affecting sources covered in Phase 1, plus facilities that emit GHGs in specified amounts—100,000 tpy for new facilities and an increase of at least 75,000 tpy for major modifications. Phase Two also requires a Title V operating permit for facilities that emit at least 100,000 tpy.

7/26/2011: Deadline for issuance of proposed regulations establishing NSPS for new and modified fossil fuel-fired power plants and emission guidelines for existing fossil fuel-fired power plants.

12/15/2011: Deadline for issuance of proposed regulations establishing NSPS for new and modified refineries and emission guidelines for existing refineries.

5/26/2012: Deadline for issuance of final regulations establishing NSPS for new and modified fossil fuel-fired power plants and emission guidelines for existing fossil fuel-fired power plants.

11/15/2012: Deadline for issuance of final regulations establishing NSPS for new and modified refineries and emission guidelines for existing refineries.

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Nicholas Institute for Environmental Policy Solutions

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