



MEMORANDUM

February 13, 2024

TO: Members of the Subcommittee on Environment, Manufacturing, and Critical Materials

FROM: Committee Majority Staff

RE: Hearing entitled “Safeguarding American Prosperity and People’s Livelihoods: Legislation to Modernize Air Quality Standards”

I. INTRODUCTION

On Thursday, February 15, 2024, at 10:30 a.m. (ET) in 2322 Rayburn House Office Building, the Subcommittee on Environment, Manufacturing, and Critical Materials will hold a legislative hearing entitled “Safeguarding American Prosperity and People’s Livelihoods: Legislation to Modernize Air Quality Standards.” The hearing will examine a discussion draft, H.R. ___, Air Quality Standards Implementation Act of 2024, which concerns the U.S. Environmental Protection Agency (EPA)’s implementation of national air quality standards.

II. WITNESSES

- **Christopher Netram**, Managing Vice President, Policy, National Association of Manufacturers;
- **John Eunice**, Deputy Director, Georgia Environmental Protection Division;
- **Paul Noe**, Vice President of Public Policy, American Forestry and Paper Association; and,
- **Seth Johnson**, Senior Attorney, Earthjustice.

III. BACKGROUND

The Clean Air Act (CAA) requires the EPA to establish national ambient air quality standards (NAAQS) for six common pollutants, so-called criteria pollutants.¹ The CAA requires the primary standards for these pollutants to be set at a level that, in the judgment of the EPA Administrator, is “requisite to protect public health,” allowing for an “adequate margin of safety.” The CAA also requires that the EPA “complete a thorough review” of these standards every five years and make revisions as may be appropriate to maintain the requisite level of protection. The Administrator may review and revise criteria or promulgate new standards earlier or more frequently than every five years.

¹ These pollutants include ground-level ozone, carbon monoxide, sulfur dioxide, lead, nitrogen dioxide, and coarse and fine particulate matter. See Sec. 109 and <https://www.epa.gov/criteria-air-pollutants>.

To help inform the Administrator, CAA Section 109 requires the Administrator to appoint an independent scientific review committee, known as the Clean Air Science Advisory Committee (CASAC). At five-year intervals, the CASAC must complete a review of the criteria used by the Administrator and the air quality standard. CASAC must also recommend any new national ambient air quality standards and revisions of existing criteria or standards as may be appropriate. The CASAC is also required to advise the Administrator of any adverse public health, welfare, social, economic, or energy effects that may result from various strategies for implementing a standard. However, historically, CASAC has not performed this function, in part because the EPA Administrator has not directed CASAC to do so.²

Establishing a new standard does not directly limit emissions or compel specific emissions controls. Rather, promulgation of NAAQS sets in motion a CAA prescribed process under which the states and tribes must implement monitoring, regulatory, and permitting programs to attain or maintain the standards, subject to EPA approval. A key step involves using air monitoring data to determine whether areas are in attainment or nonattainment of the standards, which EPA ultimately designates.³

States with nonattainment areas develop and submit State Implementation Plans (SIPs) to EPA, which identify specific state and federal regulations, emission control and enforcement requirements that are to bring areas into compliance. Once designated nonattainment, an area remains subject to stricter levels of EPA regulatory oversight, pursuant to the CAA, even for many years after it attains the standard to assure the area's attainment is maintained. For areas that initially meet the standards, states must establish modeling and permitting programs that assure new and expanded economically significant projects—industrial activity, manufacturing, energy generation—do not cause or contribute to violations of the standards in the future.⁴ If the Administrator finds that a State failed to make a required submission, a SIP does not satisfy the minimum criteria, or the Administrator disapproves a SIP in whole or in part, the EPA is required to promulgate a Federal Implementation Plan (FIP) for the State within two years.

A. Particulate Matter Standards

Particulate matter (PM) is a complex mixture of extremely small particles that can be directly emitted from sources such as forest fires, or form when gases react in the air. EPA initially established PM NAAQS standards in 1971, and subsequently reviewed and revised per statutory requirements these standards in 1987, 1997, 2006, 2012, and 2020. These NAAQS include standards for “fine” particulate matter, which includes particles 2.5 micrometers in diameter or smaller, known as “PM2.5.”

EPA has established health-based “primary” PM2.5 standards for both annual and 24-hour averaging times to protect the public health with an adequate margin of safety. The primary

² See Government Accountability Office Report entitled “EPA Science Advisory Panels, Preliminary Observations on the Processes for Providing Scientific Advice,” [GAO-15-636T](#), May 20 2015. No such review has been conducted by CASAC since this report.

³ “Air Quality: EPA’s 2023 Proposed Changes to the Particulate Matter (PM) Standard,” Congressional Research Service, August 16, 2023. [R47652](#).

⁴ See EPA’s Prevention of Significant Deterioration Basic Information at <https://www.epa.gov/nsr/prevention-significant-deterioration-basic-information>

24-hour PM_{2.5} standard was last revised in 2006, from a level of 65 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$) to 35 $\mu\text{g}/\text{m}^3$. The primary annual standard has, since 2012, been set at a level of 12 $\mu\text{g}/\text{m}^3$. Following the last statutory review of PM completed in December 2020, the EPA decided to retain the existing standards.⁵

EPA has also established welfare-based “secondary” PM_{2.5} standards to protect the public welfare from any known or anticipated adverse effects associated with the presence of the pollutant in the ambient air.⁶ The EPA has in all previous reviews revised the PM_{2.5} secondary standards by making them identical in all respects to the primary standards.

B. Improving Air Quality

Under the Clean Air Act, with the combination of standards, effective state implementation, and manufacturing and industrial innovation, the nation’s air quality has improved dramatically. As EPA’s own Air Trends report⁷ shows, PM₁₀ concentrations have dropped some 60 percent nationally between 2000 and 2021; Annual PM_{2.5} levels fell 29 percent and the 24-hour levels fell 34 percent over the same period.

Direct emissions of PM_{2.5} have dropped 40 percent and emissions of most PM precursors have also dropped: sulfur dioxide by 92 percent, nitrogen oxides by 70 percent, and volatile organic compounds (VOCs) by 49 percent.^{8,9} Continued declines in these emissions can be expected to continue with under existing federal, state, and local programs, on ongoing technology and efficiency improvements.

C. PM Reconsideration Proposal

A thorough statutory review was completed and EPA reached a final decision to retain the PM standards in December 2020. However, in June 2021, the EPA Administrator announced that the agency would reconsider the December decisions for retaining the PM_{2.5} standards by developing a “supplement” to the previous scientific review.¹⁰ On February 7, 2024, EPA [completed its reconsideration](#) and released its final rule tightening the annual PM_{2.5} primary

⁵ See [85 Federal Register 82684 December 18, 2020](#)

⁶ Welfare effects include effects on soils, water, crops, vegetation, man-made materials, animals, wildlife, weather, visibility and climate, damage to and deterioration of property, and hazards to transportation, as well as effects on economic values and on personal comfort and well-being.

⁷ See EPA, Our Nation’s Air, Trends through 2021 at <https://gispub.epa.gov/air/trendsreport/2022/#home>

⁸ Id.

⁹ For additional air trends data, see, also: “State Air Trends & Successes: the StATS Report,” 2023 edition, Association of Air Pollution Control Agencies at <https://gispub.epa.gov/air/trendsreport/2022/#home>

¹⁰ The Administrator also sought to reconsider by a similar process the December 2020 decision to retain existing ozone standards, following a thorough review for those standards. In August 2023, the Administrator decided to cease the ozone review and fold it into the regular statutory review process. The Administrator has withdrawn the PM_{2.5} proposal rulemaking to undertake the more thorough statutory process, although he has the discretion to do so.

standard from 12.0 ug/m³ to 9.0 ug/m³.¹¹ The rule retained the current primary and secondary 24-hour PM_{2.5} standard at 35 ug/m³. Implementation of the standard will be a challenge.

On September 19, 2023, the Subcommittee held a hearing to examine issues surrounding EPA's reconsideration of the PM_{2.5} standards. The hearing focused on potential implementation challenges and impacts on economic development from the then-proposed PM_{2.5} standard.¹² Concerns were raised about the sweeping impact of the potential standards. Specifically, the lack of available controls to achieve compliance, in part because existing emissions sources are well controlled and represent a relatively small contribution to PM levels. In addition, depending on the final standard, hundreds of additional counties, covering large regions of the nation, could be so close to the standard, that any meaningful manufacturing expansion would threaten nonattainment. This may limit permits for new and expanded manufacturing¹³—an issue particularly pertinent to federal efforts to incentivize new manufacturing in the nation.

Compliance challenges are exacerbated as NAAQS levels approach background levels. In the case of particulate matter, EPA reports that point-sources of PM_{2.5} emissions—from the power sector and industrial sources—account for only 16 percent of emissions; the remaining 84 percent of emissions are from so-called non-point sources, including fires (43 percent), road dust (16 percent), agriculture dust (14 percent), cars and trucks (5 percent).¹⁴ The paths to compliance therefore also involve transportation, construction, housing, and the agricultural economy. Additionally, as areas move closer to background levels, states and regulators will face increasing challenges that involve background emissions, exceptional events, and emissions outside of their control, including wildfire events. Efforts to mitigate wildfire events and enable mitigation of wildfire risks that will in turn reduce these emissions are a particular focus of the draft legislation.

IV. DISCUSSION DRAFT

The “Air Quality Standards Implementation Act of 2024” Discussion Draft includes the following provisions:

- Sec. 2(a) of the discussion draft would extend the current NAAQS review cycle from five years to ten years.
- Sec. 2 (b) provides that the Administrator, when establishing or revising a NAAQS, may consider, as a secondary consideration, likely attainability.
- Sec. 2(c) requires membership of CASAC to include 3 people representing State air pollution control agencies.

¹¹ See EPA Final Reconsideration of the National Ambient Air Quality Standards for Particulate Matter (PM) linked [here](#).

¹² See Subcommittee hearing “Protecting American Manufacturing: Examining EPA’s Proposed PM_{2.5} Rule,” September 19, 2023, linked [here](#).

¹³ *Id.* Beginning at page 37.

¹⁴ Policy Assessment for Reconsideration of the National Ambient Air Quality Standards for Particulate Matter, EPA, May 2022, linked [here](#).

- Sec. 2(d) requires the EPA Administrator to request, and the CASAC to provide, advice regarding adverse public health, welfare, social, economic, or energy effects which may result from various strategies for attainment and maintenance of NAAQS.
- Sec. 2(e) provides that the Administrator concurrently publish regulations and guidance for implementing a revised NAAQS and that the new or revised standards shall not apply to preconstruction permit applications until the Administrator has published such final regulations and guidance. The subsection also clarifies that nothing in the subsection eliminates the obligation of a preconstruction permit applicant to install the best available control technology and lowest achievable emission rate technology and clarifies that nothing in the subsection limits the authority of a State, local, or Tribal permitting authority to impose more stringent emissions requirements pursuant to a State, local, or Tribal law that NAAQS.
- Sec. 2(f) amends Sec. 172(c)(9) of the CAA by adding at the end an exception from SIP contingency measures for those areas the furthest into nonattainment.
- Sec. 2(g) ensures that economic feasibility, in addition to technological achievability, will be taken into consideration in certain requirements for plans for Moderate, Serious, and Extreme ozone nonattainment areas. The subsection eliminates certain demonstration requirements in approving provisions of an implementation plan for an Extreme ozone nonattainment area. Specifically, it removes demonstration requirements and allows for States to include the anticipated development of new control techniques or improvement of existing control technologies in SIPs.
- Sec. 2(h) provides that, for particulate matter nonattainment areas, the milestones that must be included in SIPs to show reasonable further progress must take into account technological achievability and economic feasibility.
- Sec. 2 (i) amends Sec. 319(b) of the CAA to include actions to mitigate wildfire risk (prescribed burns) along with exceptional events in the process for excluding air monitoring data that is directly due to such actions or events. It would also remove the current exclusion for high temperature or drought to be considered exceptional events. The provision requires the EPA, after consultation with federal land managers and State air pollution control agencies, to propose revisions to existing regulations governing the review and handling of air quality monitoring data influenced by exceptional events and actions to mitigate wildfire risk. The subsection requires EPA to conduct regional modeling and analysis upon request by one or more states when one or more state notifies the EPA of their intent to submit an exceptional event petition. It also requires EPA to establish, and provide monthly updates to, a public website noting the status of submitted petitions for exceptional events.
- Sec. 2 (j) requires a report within 2 years of enactment from the EPA on the extent to which foreign sources of air pollution impact the designation of areas as nonattainment, attainment, or unclassifiable, and attainment and maintenance of NAAQS. The report also requires information on the EPA's procedures and timelines for disposing of

petitions from States that a State would have attained the NAAQS for ozone by the applicable attainment date, but for emissions emanating from outside of the United States. The number of such petitions from States that have been submitted to EPA, including the date of reception and final disposition from the Agency. Lastly, whether the Administrator recommends any statutory changes to facilitate a more efficient review and disposition process.

- Sec. 2 (k) provides that the Administrator shall, in consultation with the National Oceanic and Atmospheric Administration, (i) conduct a study on the atmospheric formation of ozone and effective control strategies, including with regard to the relative contribution of manmade and naturally occurring nitrogen oxides, volatile organic compounds, and other pollutants in ozone formation in urban and rural areas, and with regard to wintertime ozone; (ii) that the study be peer reviewed in accordance with the requirements applicable to highly influential scientific assessments; (iii) that the Administrator submit a report to Congress describing the results of the study; and (iv) that the Administrator incorporate the results of the study into any Federal rules and guidance implementing the 2015 ozone standards
- Section 3 amends the CAA with a new section 179C that provides that, with respect to any nonattainment area classified as severe or extreme for ozone or as serious for particulate matter, sanctions for implementation plan deficiencies under section 179 or fees for failure to attain the air quality standard under section 185 will not apply if the State demonstrates it would have avoided the deficiencies or attained the standard but for (i) emissions emanating from outside the nonattainment area, (ii) emissions from an exceptional event, or (iii) emissions from mobile sources that are beyond the control of the State to reduce or eliminate. The inapplicability of sanctions and fees under this section does not affect any obligations under the Act to implement measures to attain national ambient air quality standards.

V. ISSUES

- The provisions of H.R. _____ “Air Quality Standards Implementation Act of 2024”
- Practical challenges to implementing the PM2.5 standards;
- Potential improvements to the NAAQS process;

VI. STAFF CONTACTS

If you have any questions regarding this hearing, please contact Mary Martin, Peter Spencer, or Drew Lingle of the Committee staff at (202) 225-3641.