## Comments of Environmental Defense Fund at EPA's Public Hearing on National Emission Standards for Hazardous Air Pollutants: Coal- and Oil-Fired Electric Utility Steam Generating Units Proposed Rule Docket ID No. EPA-HQ-OAR-2018-0794

Richard Yates Clean Power Attorney Environmental Defense Fund July 10, 2025

My name is Richard Yates, and I am a Clean Power Attorney at the Environmental Defense Fund (EDF). I am testifying today to address the serious health impacts from the pollutants regulated under the MATS program to emphasize the importance of retaining EPA's 2024 Rule strengthening the limits for coal plant hazardous air pollution. EDF strongly opposes EPA's proposal to repeal the strengthened standards, given that the technology is widely available and cost effective, and since many plants are demonstrating the feasibility of the standards by meeting them on a regular basis. Evidence since 2011 on the health effects of hazardous emissions strongly reinforces EPA's 2024 Rule strengthening the standards and protecting communities from toxic pollution.

In the Clean Air Act, Congress required EPA to set standards reflecting the maximum achievable emissions reductions for hazardous air pollution, "including a prohibition on such emissions, where achievable," because Congress understood the importance of protecting the public from this especially dangerous class of pollutants.<sup>1</sup> Congress also required that special attention be given to reducing harm to "sensitive populations."<sup>2</sup>

EDF strongly supports the strengthened standards in the 2024 Rule, which will protect the health of all Americans, but especially the sensitive populations impacted by coal plant hazardous pollution who are disproportionately communities of color, Indigenous communities, and low-income communities.<sup>3</sup>

Mercury emissions from power plants have many harmful health impacts, including cardiovascular effects such as deadly heart attacks and hypertension, as well as neurological effects for children, such as lost IQ points, and delayed development of memory, language, and motor skills.<sup>4</sup>

<sup>&</sup>lt;sup>1</sup> 42 U.S.C. § 7412(d). The design of section 112 shows Congress's interest in ensuring reductions in coal- and oilfired EGU HAP primarily to protect human health and safety. *See, e.g.,* § 7412(n)(1)(A) (requiring EPA to conduct a study on the public health hazards of HAP as a threshold requirement to determining whether to regulate EGU HAP under section 112).

<sup>&</sup>lt;sup>2</sup> § 7412(n)(1)(C).

<sup>&</sup>lt;sup>3</sup> See 89 Fed. Reg. 38,508, 38,515, 38,563 (May 7, 2024); EPA, Regulatory Impact Analysis for the Final National Emission Standards for Hazardous Air Pollutants: Coal- and Oil-Fired Electric Utility Steam Generating Units Review of the Residual Risk and Technology Review, at ES-18 (Apr. 2024).

<sup>&</sup>lt;sup>4</sup> See, e.g., Elsie Sunderland et al., *A Template for a State-of-the-Science Assessment of the Public Health Benefits Associated with Mercury Emissions Reductions for Coal-Fired Electricity Generating Units*, at 3, 10-11 (Apr. 2022); Emmett Envtl. Law & Policy Clinic, Reconsideration of Supplemental Finding comments at 3-7 (Feb. 7, 2019), https://www.regulations.gov/comment/EPA-HQ-OAR-2018-0794-1665.

We also know more than when MATS was first promulgated over a decade ago about the significant health impacts of non-mercury metal emissions.<sup>5</sup> Toxic metal emissions include carcinogens like nickel, arsenic, and hexavalent chromium.<sup>6</sup> The risks from lead, for example, include mortality from cardiovascular disease, reduced fertility, and cognitive impairment in children.<sup>7</sup> In addition to its cancer risk, arsenic has been found to impact respiratory system development and function, and has been linked to liver and kidney damage.<sup>8</sup> Research on metal toxicity for individuals exposed to mixtures of these metals shows potential risks including immune dysfunction and preterm birth.<sup>9</sup>

Importantly, strengthening limits on emissions of mercury and non-mercury metal emissions would reduce the pollution exposures felt disproportionately by communities of color and Indigenous communities living near these facilities.<sup>10</sup>

Stronger standards to alleviate these compelling health risks are highly feasible, given the significant advances in control technologies over the last decade. In the 2024 Rule, EPA found that 93% of coal plants were already meeting the strengthened limit for non-mercury metal emissions, showing that a protective standard is eminently achievable.<sup>11</sup>

EPA's technical record also strongly supported its decision to close the lignite loophole, which allowed lignite coal-burning plants to emit mercury pollution in quantities far greater than other plants. EPA indicated that plant owners could meet the more stringent standard by increasing the amount of activated carbon sorbent they inject to control mercury in existing pollution control systems, without the need for significant additional capital investment.<sup>12</sup>

3, 26 (Nat'l Bureau of Econ. Res., Working Paper No. 28250, 2021).

<sup>10</sup> See, e.g., S. Envtl. Law Ctr., Affirmation of the Appropriate and Necessary Supplemental Finding comments at 7-9, https://www.regulations.gov/comment/EPA-HQ-OAR-2018-0794-4943 (Apr. 11, 2022) (describing disproportionate threat of mercury and hazardous metal emissions to recreational and subsistence African American fishers in the Southeast region); Mona Dai et al., *Sociodemographic Disparities in Mercury Exposure from U.S. Coal-Fired Power Plants*, at 11 (2023), https://pubs.acs.org/doi/full/10.1021/acs.estlett.3c00216 (finding heightened threat of mercury emissions to Native American populations who tend to consume fish more frequently); Christopher W. Tessum et al., *PM2.5 Polluters Disproportionately and Systemically Affect People of Color in the United States*, 7 Sci. Advances, at 1-2 (2021) (finding coal-plant PM 2.5 emissions, which include hazardous metals, disproportionately burden African American populations); Pub. Health & Envtl. Orgs., Affirmation of the Appropriate and Necessary Supplemental Finding comments at 47-49 (Apr. 11, 2022),

<sup>11</sup> 89 Fed. Reg. at 38,530.

 <sup>&</sup>lt;sup>5</sup> See, e.g., Mona Dai et al., Annotated Bibliography: Health Impacts of Exposure to Non-Mercury Hazardous Metals (2023), https://www.regulations.gov/document/EPA-HQ-OAR-2018-0794-5996 (vol. 1, attach. 4, at 178 of PDF) (submitted as attachment to Public Health and Environmental NGO comments on 2023 proposed rule).
<sup>6</sup> 89 Fed. Reg. at 38,515.

<sup>&</sup>lt;sup>7</sup> See Bruce P. Lanphear et al., *Low-Level Lead Exposure and Mortality in US Adults: A Population-Based Cohort Study*, 3 Lancet Pub. Health e177, e183 (2018); Sunil Kumar, *Occupational and Environmental Exposure to Lead and Reproductive Health Impairment: An Overview*, Indian J. Occup. & Envtl. Med. 128 (2018); Alex Hollingsworth et al., *Lead Exposure Reduces Academic Performance: Intensity, Duration, and Nutrition Matter*, at

<sup>&</sup>lt;sup>8</sup> See Raina M. Maier et al., Nt'l Inst. of Envtl. Health Scis. Superfund Research Ctrs. at the Univ. of Arizona & Univ. of New Mexico, *Toxicity Review of Metals Emissions from Coal-Fired Power Plants*, at 29 (Mar. 2022). <sup>9</sup> *Id.* at 34-35.

https://www.regulations.gov/comment/EPA-HQ-OAR-2018-0794-4962 (explaining likely combination of power plant hazardous metal emissions with metals from other sources in multiple exposure pathways, posing particular harm to Indigenous communities in the Southwest).

<sup>&</sup>lt;sup>12</sup> 89 Fed. Reg. at 38,549. Communities living near lignite-burning facilities in North Dakota and Texas are potentially experiencing unsafe mercury exposures due to the loophole. Mona Dai et al., *Sociodemographic Disparities in Mercury Exposure from U.S. Coal-Fired Power Plants*, at 2 (2023), https://pubs.acs.org/doi/full/10.1021/acs.estlett.3c00216.

Aligning the standard for lignite facilities with that for other facilities will protect communities from mercury's many health risks.

Finally, EPA's continuous emissions monitoring requirement for particulate matter is important for providing the public with more transparency about real-time hazardous emissions. Repealing this requirement would mean that owners may only need to report emissions during stack tests conducted merely four times per year, instead of ensuring that plants are meeting health-protective standards 365 days a year.

We thank EPA for convening this important public hearing on the proposed rule and for considering our views. We also ask EPA to hold additional public hearing sessions, as the Clean Air Act requires, to ensure all those who would like to provide oral testimony can do so.