

ORAL ARGUMENT NOT YET SCHEDULED

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**No. 21-1019**  
**(consolidated with Nos. 21-1020 and 21-1076)**

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IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT

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NEWBURGH CLEAN WATER PROJECT, *et al.*,  
Petitioners,

v.

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY, *et al.*,  
Respondents.

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On Petition for Review of a Final Rule of the  
United States Environmental Protection Agency  
86 Fed. Reg. 4198 (Jan. 15, 2021)

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**Brief Supporting Petitioners by Amici Curiae Alaska  
Community Action on Toxics, Alliance of Nurses for Healthy  
Environments, Healthy Babies Bright Futures, Physicians for  
Social Responsibility, SF Bay Physicians for Social  
Responsibility, and Women for a Healthy Environment**

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August 15, 2022

**CERTIFICATE AS TO PARTIES, RULINGS, RELATED CASES,  
FILING OF A SEPARATE BRIEF, AND RULE 26.1 DISCLOSURE**

As required by Circuit Rules 26.1, 28(a)(1), and 29(d), and Federal Rule of Appellate Procedure 26.1, counsel for amici curiae hereby certify as follows:

**1. Parties and Amici**

All parties and intervenors appearing in this Court are listed in the certificates to the Opening Brief of Petitioners Newburgh Clean Water Project, *et al.*, and the Opening Brief for Petitioners State of New York, *et al.*

In addition, the following amici curiae, appearing with the consent of the parties, join this brief:

Alaska Community Action on Toxics (ACAT) is a nonprofit organization that has not issued shares or debt securities to the public and has no parent companies. No publicly held company has any form of ownership interest in ACAT. ACAT's mission is to work with individuals and communities in Alaska to address toxic contamination, protect health, and achieve justice.

Alliance of Nurses for Healthy Environments (ANHE) is a nonprofit organization that has not issued shares or debt securities to the public

and has no parent companies. No publicly held company has any form of ownership interest in ANHE. ANHE's mission is to promote healthy people and healthy environments by educating and leading the nursing profession, advancing research, incorporating evidence-based practice, and influencing policy.

Healthy Babies Bright Futures (HBBF) is a fiscal project of Virginia Organizing, a nonprofit organization that has not issued shares or debt securities to the public and has no parent companies. No publicly held company has any form of ownership interest in Virginia Organizing or Healthy Babies Bright Futures. The general purpose of HBBF is to create and support initiatives that measurably reduce exposures to neurotoxic chemicals in the first thousand days of development.

Physicians for Social Responsibility (PSR) is a nonprofit education and advocacy organization that has not issued shares or debt securities to the public and has no parent companies. No publicly held company has any form of ownership interest in PSR. The general purpose of PSR is to protect human life from the gravest threats to health and survival.

San Francisco Bay Physicians for Social Responsibility (SF Bay PSR), a chapter of Physicians for Social Responsibility, is a nonprofit

education and advocacy organization that has not issued shares or debt securities to the public and has no parent companies. No publicly held company has any form of ownership interest in SF Bay PSR or PSR. The general purpose of SF Bay PSR is to protect human life from the gravest threats to health and survival.

Women for a Healthy Environment (WHE) is a nonprofit organization that has not issued shares or debt securities to the public and has no parent companies. No publicly held company has any form of ownership interest in WHE. The general purpose of WHE is to educate and empower community members about environmental risks, so they can make healthy choices for themselves and their families, and advocate for change for a better tomorrow for all.

## **2. Rulings Under Review**

References to the agency decision under review appear in the certificates to the Opening Brief of Petitioners Newburgh Clean Water Project, *et al.*, and the Opening Brief for Petitioners State of New York, *et al.*

### **3. Related Cases**

A description of related cases appears in the certificate to the Opening Brief of Petitioners Newburgh Clean Water Project, *et al.*, and the Opening Brief for Petitioners State of New York, *et al.*

### **4. Separate Brief**

To amici's knowledge, this brief is the only amicus brief being filed in support of petitioners.

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## GLOSSARY

### Acronyms

CDC	Centers for Disease Control and Prevention
EPA	United States Environmental Protection Agency
HHS	United States Department of Health and Human Services
ISA	Integrated Science Assessment for Lead

### Units of measurement

$\mu\text{g/dL}$	micrograms per deciliter
$\mu\text{g/L}$	micrograms per liter
$\text{mg/L}$	milligrams per liter



## INTEREST OF AMICI CURIAE<sup>1</sup>

Amici curiae, listed in the appendix to this brief, are organizations dedicated to the promotion and improvement of public health. Amici submit this brief to support petitioners' challenge to the revisions made by the Environmental Protection Agency (EPA) to its Lead and Copper Rule. Amici are concerned that the revisions do not adequately address the continuing problem of lead in the nation's public water system. By declining to take action designed to meet the EPA's own goal of eliminating lead from drinking water, the EPA failed to protect users of public water systems—including hundreds of thousands of children, many of whom belong to disadvantaged communities—from the risk of adverse and irreversible health effects from lead exposure.

## STATUTES AND REGULATIONS

All applicable statutes and regulations are contained in the Opening Brief of Petitioners Newburgh Clean Water Project, *et al.*, and the Opening Brief for Petitioners State of New York, *et al.*

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<sup>1</sup> All parties have consented to the filing of this brief. The brief was not authored in whole or part by counsel for a party. No party or counsel for a party, and no person other than the amicus curiae or its counsel, contributed money intended to fund the brief's preparation or submission.

## SUMMARY OF ARGUMENT

The EPA’s 2021 revisions to the Lead and Copper Rule represent a missed opportunity to eliminate the scourge of lead contamination in the nation’s public water systems. In 1991, the EPA concluded that water delivered through public water systems should contain *no* lead. In the terminology of the Safe Drinking Water Act, the EPA established a “maximum contaminant level goal”—“the level at which no known or anticipated adverse effects on the health of persons occur,” 42 U.S.C. § 300g-1(b)(4)(A)—of zero for lead. *See* Maximum Contaminant Level Goals and National Primary Drinking Water Regulations for Lead and Copper, 56 Fed. Reg. 26,460, 26,467 (June 7, 1991) (1991 Rule) (JA\_\_). Nonetheless, the EPA removed the hard cap—the “maximum contaminant level”—that it had previously imposed on the amount of lead that could be present in tap water. *Id.* at 26,477 (JA\_\_). Instead, the EPA imposed a set of “treatment techniques” that water systems would have to implement if lead levels exceeded an “action level.” *Id.* at 26,478 (JA\_\_). One such technique, if other steps did not reduce lead levels, required water systems to replace seven percent of their lead service lines

each year until levels of lead fell below the action level threshold of 15 parts per billion. *Id.* at 26,508 (JA\_\_).

That approach has not worked when measured against the goal of eliminating lead from drinking water. Despite some progress, there remain “an estimated 6.3 to 9.3 million homes served by lead service lines ... in thousands of communities nationwide.” National Primary Drinking Water Regulations: Lead and Copper Rule Revisions, 86 Fed. Reg. 4198, 4199 (Jan. 15, 2021) (Final Rule) (JA\_\_).

Petitioners’ briefs explain that the EPA failed to engage in reasoned decisionmaking in the face of substantial record evidence of the need for more aggressive action. This brief focuses on the “changes in factual and legal circumstances,” *Bechtel v. FCC*, 957 F.2d 873, 881 (D.C. Cir. 1992), that should have prompted the EPA to revise its 30-year-old framework for implementing the Safe Drinking Water Act. Over the last three decades, and particularly in the last 15 years, the research community has learned a great deal about how even very low levels of lead in blood (*i.e.*, less than 10 µg/dL) can cause adverse and irreversible harm,

especially to young children.<sup>2</sup> The EPA's modest rule changes do not give sufficient weight to these developments. For that reason, and those set forth in petitioners' briefs, the Court should vacate and remand the EPA's action.

## ARGUMENT

### **I. The EPA adopted its current regulatory approach before the effects of low levels of lead on health were well established.**

Under the Safe Drinking Water Act, the EPA must establish a “maximum contaminant level goal” and a “national primary drinking water regulation” for harmful contaminants in public water systems. 42 U.S.C. § 300g-1(b)(1). Setting a goal does not “impose any obligations on public water systems.” 1991 Rule, 56 Fed. Reg. at 26,462 (JA\_\_). Rather, the goal is “aspirational,” which “the enforceable requirements” of the EPA's regulation “seek to attain to the extent feasible.” *Id.*

To achieve the goal, the Act authorizes the EPA to regulate public water system in two ways. First, if feasible, the EPA must set a

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<sup>2</sup> Lead levels in blood are measured in micrograms per deciliter ( $\mu\text{g}/\text{dL}$ ). Lead levels in public water systems are measured in parts per billion, micrograms per liter ( $\mu\text{g}/\text{L}$ ), or milligrams per liter ( $\text{mg}/\text{L}$ ). One part per billion is equal to one  $\mu\text{g}/\text{L}$  or .001  $\text{mg}/\text{L}$ .

“maximum contaminant level,” *i.e.*, a cap on the level of a contaminant that may be “delivered to any user of a public water system.” 42 U.S.C. § 300f(1)(C)(i), (3). The maximum contaminant level must be “as close to” the goal set for the contaminant (here, zero) “as is feasible.” *Id.* § 300g-1(b)(4)(B). Second, if it is not “economically and technologically feasible to ascertain the level of such contaminant,” the EPA must establish a “treatment technique ... which leads to a reduction in the level of such contaminant,” *id.* § 300f(1)(C)(i), (ii), and that “would prevent known or anticipated adverse effects on the health of persons to the extent feasible,” *id.* § 300g-1(b)(7)(A).

In the 1991 rule, the EPA concluded that “it is currently difficult to identify clear threshold exposure levels below which there are no risks of adverse health effects.” 56 Fed. Reg. at 26,467 (JA\_\_). With respect to children, the EPA noted “adverse effects worthy of avoidance” at blood lead levels above 15 µg/dL, and “lead-induced interference with a diverse set of physiological functions and processes” in the 10–15 µg/dL range. *Id.* at 26,468 (JA\_\_). Below 10 µg/dL, however, the EPA considered the “health effects of lead ... less well substantiated.” *Id.* Because of that

uncertainty, the EPA set a goal of zero levels of lead in public water systems. 56 Fed. Reg. at 26,467.

Despite setting the goal at zero, the EPA did not set a maximum contaminant level at zero. Prior to 1991, the EPA had used a maximum contaminant level of 50 parts per billion. *Id.* at 26,463 (JA\_\_). But rather than reduce that number, the EPA imposed a set of treatment techniques on water systems. *Id.* at 26,477 (JA\_\_). For instance, water systems were required “to replace each year at least 7% of the lead service lines it controls that when tested exceed a designated action level.” *Am. Water Works Ass’n v. EPA*, 40 F.3d 1266, 1270 (D.C. Cir. 1994). This Court upheld the EPA’s choice, crediting the agency’s assessment that its treatment techniques would “deal[] adequately with lead.” *Id.* at 1271.

## **II. Recent medical research confirms that low levels of lead have adverse and irreversible health effects.**

**A.** In the three decades since the EPA adopted the 1991 rule, a wealth of new research has established that blood lead levels below 10 µg/dL have significant adverse health effects. A decade ago, the federal government synthesized much of this research in “two comprehensive” reports “summarizing the recent literature on lead exposure and its health impacts.” Economic Analysis Appendices for the Final Lead and

Copper Rule Revisions (Dec. 2020), App. D, at D-1 (JA \_\_) (summarizing both reports).

1. In June 2012, the National Toxicology Program of the U.S. Department of Health and Human Services (HHS) issued the “NTP Monograph on Health Effects of Low-Level Lead,” available at [https://ntp.niehs.nih.gov/ntp/ohat/lead/final/monographhealtheffectslowlevellead\\_newissn\\_508.pdf](https://ntp.niehs.nih.gov/ntp/ohat/lead/final/monographhealtheffectslowlevellead_newissn_508.pdf). The NTP Monograph focused on health effects “associated with low-level [lead] exposure” of less than 10 µg/dL of blood, *id.* at xiii (JA\_\_), and categorized the association as “sufficient,” “limited,” “inadequate,” or nonexistent, *id.* § 1.2.2, at xv–xvi (JA\_\_). It “concludes that there is *sufficient* evidence for adverse health effects in children and adults at blood [lead] levels <10 µg/dL, and <5 µg/dL as well.” *Id.* § 1.4.1, at xviii (JA\_\_).

*Neurological effects.* The NTP Monograph found sufficient evidence that children with blood lead level less than 5 µg/dL are at risk for neurological effects, and limited evidence of such risk in adults with levels less than 10 µg/dL. *Id.* § 1.4.2, at xviii (JA\_\_). In children, these effects include “decreased cognitive function,” *id.* § 4.3.1, at 22 (JA\_\_); “decreases in various measures of academic achievement in children 6–

18 [years] of age,” *id.*; “decreases in [full-scale IQ]” in children 4 to 13 years of age, *id.* at 24 (JA\_\_); “decreases in various general and specific measures of cognitive function in children from 3 months to 16 years of age,” *id.* at 27 (JA\_\_); “attention-related behavioral problems in children 3–18 years of age,” *id.* § 4.3.2, at 31 (JA\_\_); and “antisocial behavioral problems or actual criminal behavior in children from 6 to 15 years of age,” *id.* at 34 (JA\_\_). The NTP Monograph also found sufficient evidence that blood lead levels of less than 10 µg/dL “are associated with decreased hearing” in children, *id.* § 4.3.4, at 40 (JA\_\_), and limited evidence of an association between prenatal exposure to low blood lead levels and decreases in cognitive function and IQ, attention disorders and behavioral problems, and decreased hearing, *see id.*, Table 1.2, at xx (JA\_\_); *see also, e.g., id.* §§ 4.3.1, at 24, 31 (JA\_\_, \_\_); 4.3.2, at 32, 34 (JA\_\_, \_\_).

Adults also suffer from neurological conditions associated with low blood lead levels. The NTP Monograph found an “increased risk of diagnosis of essential tremor” in adults, *id.* § 4.3.3, at 39 (JA\_\_), and limited evidence of increased risks of “[p]sychiatric effects, decreased hearing, decreased cognitive function,” and amyotrophic lateral sclerosis



(ALS). *See id.*, Table 1.2, at xx (JA\_\_); *see also, e.g., id.* §§ 4.3.2, at 37 (JA\_\_); 4.3.3, at 38 (JA\_\_).

*Reproductive and developmental effects.* The NTP Monograph found sufficient evidence “that blood [lead] levels <10 µg/dL are associated with adverse health effects on development in children” and levels of less than 5 µg/dL “on reproduction in adult women.” *Id.* § 1.4.6, at xxiii (JA\_\_). For instance, the report found that blood lead levels “<10 µg/dL are associated with delayed puberty in both boys and girls,” § 8.1, at 89 (JA\_\_), and with “decreased postnatal growth,” *id.* § 8.3.2, at 94 (JA\_\_). In addition, “maternal blood [lead] levels <5 µg/dL are associated with reduced fetal growth and lower birth weight,” *id.* § 8.3.7, at 109 (JA\_\_), and there is limited evidence that levels <10 µg/dL “are associated with preterm birth and spontaneous abortion,” § 1.4.6, at xxiv (JA\_\_); *see also id.* § 8.1, at 89 (JA\_\_).

*Cardiovascular and renal effects.* The NTP Monograph found that low blood lead levels are associated with cardiovascular and renal effects in adults. Specifically, the monograph found sufficient evidence that blood lead levels of <10 µg/dL in adults cause an “increase in the risk of hypertension and increases in blood pressure in adults,” and limited

evidence of a connection between such blood lead levels and “cardiovascular mortality,” “electrocardiography (ECG) abnormalities and clinical cardiovascular disease.” *Id.* § 1.4.4, at xxii (JA\_\_). It also found sufficient evidence that blood lead levels “<5 µg/dL are associated with adverse effects on kidney function” in adults, and limited evidence of a similar effect on children over the age of twelve. *Id.* § 1.4.5, at xxiii (JA\_\_).

2. In 2013, the EPA released its Integrated Science Assessment for Lead (ISA), which updated “the literature published since its 2006 review of health outcomes associated with all levels of lead exposure.” Appendix D, at D-1 (JA\_\_). The ISA categorized the research based on the strength of the causal relationship between lead and adverse health effects. *See id.*; *see also* ISA, Table II, at lxii (JA\_\_), available at <https://cfpub.epa.gov/ncea/isa/recordisplay.cfm?deid=255721>.

Although the ISA did not focus specifically on the health impacts of low blood lead levels, its findings include such impacts and support the conclusions drawn by the NTP Monograph. For example, the ISA noted that “[m]ultiple epidemiologic studies conducted in diverse populations of children consistently demonstrate the harmful effects of [lead]

exposure on cognitive function (as measured by IQ decrements, decreased academic performance and poorer performance on tests of executive function),” and that “there is no evidence of a threshold below which there are no harmful effects on cognition from [lead] exposure.” *Id.* at lxxxvii–lxxxviii (JA\_\_–\_\_). The ISA specifically found a causal relationship between blood lead levels and decreases in cognition and attention in children, as well as increases in impulsivity and hyperactivity. *Id.*, Table ES-1, at lxxxiii (JA\_\_). It reported that the evidence was “[c]lear” that blood lead levels “between 2 and 8  $\mu\text{g}/\text{dL}$ ” are associated with cognitive decrements in young children, and that blood lead level between 7 and 14  $\mu\text{g}/\text{dL}$  in children and young adults were associated with “attention decrements, impulsivity and hyperactivity.” *Id.* The ISA also found a likely causal connection between blood lead levels of 7–14  $\mu\text{g}/\text{dL}$  and “criminal offenses” and other “conduct disorders.” *Id.* Moreover, “[e]vidence suggests that some [lead]-related cognitive effects may be irreversible and that the neurodevelopmental effects of [lead] exposure may persist into adulthood.” *Id.* at lxxxvii (JA\_\_).

The ISA also drew connections between low blood lead levels and other health effects, noting that many “cross-sectional epidemiological

studies” show a casual relationship between “delayed pubertal onset” and blood lead levels of 1.2–9.5  $\mu\text{g}/\text{dL}$ . *Id.*, Table ES-1, at lxxxvi (JA\_\_). And the ISA found a causal relationship between increases in blood lead level above 1  $\mu\text{g}/\text{dL}$  and “increase[s] in blood pressure and hypertension” in adults. *Id.* at lxxxiv (JA\_\_).

**B.** During the period in which HHS and the EPA were preparing these reports, the CDC began the process of updating and modernizing its guidance on blood lead levels in children. At the time of the 1991 rule and until 2012, CDC guidance stated that children had “a blood lead ‘level of concern’” if they had 10  $\mu\text{g}/\text{dL}$  of lead in their blood. *See Federal Action Plan to Reduce Childhood Lead Exposure and Associated Health Impacts 5* (Dec. 2018) (Federal Action Plan) (JA \_\_). The CDC had declined to update its guidance in 2005, but seven years later, a CDC advisory committee recommended that the CDC reconsider that position in light of “additional compelling studies in the scientific literature, reporting associations between [blood lead levels of concern] <10  $\mu\text{g}/\text{dL}$  and adverse effects on children.” *Low Level Lead Exposure Harms Children: A Renewed Call for Primary Prevention*, Report of the Advisory Committee on Childhood Lead Poisoning Prevention of the Centers for

Disease Control and Prevention 7 (Jan. 4, 2012), [https://www.cdc.gov/nceh/lead/ACCLPP/Final\\_Document\\_030712.pdf](https://www.cdc.gov/nceh/lead/ACCLPP/Final_Document_030712.pdf).

In response, the CDC revamped its guidance later that year. The CDC jettisoned the concept of a blood lead “level of concern” because “no safe blood level in children has been identified.” CDC Response to Advisory Committee on Childhood Lead Poisoning Prevention Recommendations in “*Low Level Lead Exposure Harms Children: A Renewed Call of Primary Prevention*” 5 (rev. June 7, 2012), [https://www.cdc.gov/nceh/lead/acclpp/cdc\\_response\\_lead\\_exposure\\_recs.pdf](https://www.cdc.gov/nceh/lead/acclpp/cdc_response_lead_exposure_recs.pdf). The CDC stated that it would thenceforth “emphasize that the best way to end childhood lead poisoning is to prevent, control or eliminate lead exposures.” *Id.*

In place of a “level of concern,” the CDC now uses a blood lead reference value as a “policy tool” to “target prevention efforts” for children most at risk. Federal Action Plan 5 (JA\_\_). “Children with blood lead levels at or above the [reference value] represent those at the top 2.5% with the highest blood lead levels.” CDC, Blood Lead Reference Value, <https://www.cdc.gov/nceh/lead/data/blood-lead-reference-value.htm>. The

reference value was calculated to be 5 µg/dL in 2012 and is currently 3.5 µg/dL. *Id.*

C. Along with greater awareness of the health effects of low lead levels, recent studies have documented that the risks associated with elevated blood lead levels disproportionately impact certain communities. As the NTP Monograph found, “[n]on-Hispanic blacks have higher blood [lead] levels than do non-Hispanic whites across all ages, and being non-Hispanic black is a major risk factor for higher [lead] levels in children.” § 3.2, at 9 (JA\_\_). The ISA likewise observed that “[c]ompared to whites, non-white populations were observed to be more at risk of [lead]-related health effects.” § 1.9.6, at 1-80 (JA\_\_).

More recent research backs up those findings. In December 2018, a task force comprised of 17 federal departments and agencies released the Federal Action Plan, a report that “identified actions to further reduce exposures to lead and associated health impacts, especially for those localities at greatest risk.” Federal Action Plan 7 (JA\_\_). Citing various studies released between 2013 and 2017, the Plan concluded that the “risk for lead exposure is not the same for all children,” with “disparities in exposure” linked to “sociodemographic characteristics and geographic

location.” *Id.* at 6 (JA\_\_). Similarly, a 2017 report from the Health Impact Project found that “[r]ace and ethnicity are particularly strongly associated with children’s risk.” Health Impact Project, *10 Policies to Prevent and Respond to Childhood Lead Exposure* 9 (Aug. 2017) (JA\_\_) (emphasis added), available at [https://www.pewtrusts.org/-/media/assets/2017/08/hip\\_childhood\\_lead\\_poisoning\\_report.pdf](https://www.pewtrusts.org/-/media/assets/2017/08/hip_childhood_lead_poisoning_report.pdf).

Although sources of lead other than drinking water pose health risks to children, the research shows that lead pipes contribute to the sociodemographic disparities. As the EPA observed in a 2016 report, “[l]ow income and minority children tend to live in areas which still face tremendous risk to lead exposure,” including from “aging plumbing infrastructure that could contaminate their drinking water.” EPA, *EJ 2020 Action Agenda: The U.S. EPA’s Environmental Justice Strategic Plan for 2016–2020*, at 47 (2016), [https://www.epa.gov/sites/default/files/2016-05/documents/052216\\_ej\\_2020\\_strategic\\_plan\\_final\\_0.pdf](https://www.epa.gov/sites/default/files/2016-05/documents/052216_ej_2020_strategic_plan_final_0.pdf). Likewise, an analysis submitted in the current rulemaking found that “[h]igher proportion of low-income children in older housing [are] likely to have lead service lines.” *Environmental Justice Analysis for the Proposed Lead and Copper Rule Revisions iv* (Oct. 22, 2019) (JA\_\_). The analysis

observed that the infamous failures in Flint, Michigan, “demonstrate that increases in drinking water lead levels can have a disproportionate impact on environmental justice populations.” *Id.* at 7 (JA\_\_). And as the EPA acknowledged in the Final Rule, “the possibility of a disproportionately high and adverse human health risk among minority populations and low-income populations exist[s]” because “[h]igher than expected proportions of children in minority households and/or low-income households live in housing built during decades of higher [lead service line] usage.” 86 Fed. Reg. at 4276 (JA\_\_).

### **III. The Final Rule does not adequately to protect adults and children from the continuing dangers of lead service pipes.**

In defending the 1991 rule before this Court, the EPA predicted that its rule would “deal adequately with lead.” *Am. Water Works*, 40 F.3d at 1271. That prediction did not come true. Now, as explained above, the continuing dangers of low levels of lead on the health of adults and children, particularly those in disadvantaged communities, are well established. Accordingly, a diverse array of interested parties called on the EPA to revamp the rule to fix the problem of lead pipes once and for all. *See Newburgh Br.* 11–12, 14–15, 33–34. These parties recommended



two alternative ways to achieve that goal. Declining to take either step, EPA acted arbitrarily and capriciously.

First, the EPA did not set a maximum containment level for lead that supersedes the current “action level” of 15 parts per billion, which has no rational relationship to preventing adverse health effects. As one amicus explained in its comments, because the current rule’s “lead action level ... is not a health-based standard and poses a health risk to the community,” the EPA should adopt a “Maximum Contaminant Level” set at one-third of the current action level. Comments of Women for a Health Environment 3 (Feb. 12, 2020) (JA\_\_). Establishing a hard cap on lead levels in tap water would have been consistent with the Federal Action Plan, which called on EPA to “[r]evise the [rule] based on ... the *best available peer reviewed science*, to ensure the rule reflects the *best ways* to improve public health protection and reduce levels of lead in drinking water.” Federal Action Plan 9 (JA\_\_) (emphasis added); *see also* Health Impact Report 3 (JA\_\_) (recommending that the EPA “create a science-based household water action level” at which “intervention” would be required).

Second, the EPA declined to establish a treatment technique to require water systems to remove all lead service lines from their systems, instead retaining non-health case triggers for removal. As amicus Healthy Babies Bright Futures explained, the EPA should have abandon[ed] agency’s current framework that would “allow drinking water in many cities to flow through lead lines in perpetuity” and “[r]equire[d] all lead service lines ... to be completely removed in 10 years or less at utility expense.” Comments of Healthy Babies Bright Futures 1–2 (Feb. 12, 2020) (formatting altered) (JA\_\_–\_\_); *see also, e.g.*, Comments of American Public Health Association 2 (Feb. 11, 2020) (JA\_\_) (explaining that “requir[ing] water systems to pay to achieve full [replacement of lead service lines]” is “essential to protecting the health of our public,” and such action should “be prioritized among our most vulnerable populations (eg, children, pregnant people, low-income communities and communities of color)”); Comments of Children’s Environmental Health Network 2 (Feb. 12, 2020) (JA\_\_) (urging the EPA both to require “a feasible yet aggressive schedule for *full* [lead service line] replacement” that “prioritizes child care facilities, schools, and underserved communities” and to “[s]et an action level and maximum

contaminant level ... of lead in drinking water that is based on health.”  
(formatting altered)).

As the Health Impact Report notes, the “increased public awareness and scientific evidence that lead poisoning is *completely preventable* make this a critical moment for action to protect the nation’s children, enhance their opportunities to succeed, and reduce costs to taxpayers.” Health Impact Report 3 (JA\_\_) (emphasis added). That report estimates that, for children born in 2018 alone, “[r]emoving leaded drinking water service lines ... would protect more than 350,000 children.” *Id.* at 2 (JA\_\_) (formatting altered).

The EPA, however, rejected these pleas—and by extension, their scientific underpinnings—instead making only minor adjustments to its outdated approach. Indeed, in some respects, the revisions make matters worse: By requiring water systems to replace only three percent of their lines when the action level is detected, rather than retaining the seven percent figure in the 1991 rule, the EPA more than doubled the time that it will take for affected water systems to completely replace their lead service pipes. *See* Newburgh Br. 41; States’ Br. 27–28. The purpose of requiring the EPA to set a maximum contaminant level goal is to give the

agency a target that it must “seek to attain to the extent feasible.” 1991 Rule, 56 Fed. Reg. at 26,462 (JA\_\_). Now that the science has confirmed that “there is no safe level of lead,” Final Rule, 86 Fed. Reg. at 4240 (JA\_\_), the EPA had no reasonable basis for failing to take action to reduce the level of lead in public water systems to zero.

### CONCLUSION

This Court should grant the petitions for review.

August 15, 2022

Respectfully submitted,

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**APPENDIX  
LIST OF AMICI CURIAE**

**Alaska Community Action on Toxics (ACAT)** is a 501(c)(3) non-profit public interest environmental health and justice research and advocacy organization incorporated and headquartered in Anchorage, Alaska. ACAT is guided by the belief that everyone has the right to clean air, clean water, and toxic-free food and, to that end, works with individuals and communities in Alaska to address toxic contamination, protect health, and achieve justice. ACAT assists individuals, tribes, and communities to implement effective strategies to prevent or reduce their exposures to toxic substances, protect the ecosystems that sustain them, and hold accountable those responsible for the contamination of their communities. ACAT also works to achieve systemic policy change at the marketplace, local, state, national, and international levels, including by advocating for, and engaging in, rulemaking efforts by EPA. We have concern about lead in public water systems, particularly those in rural Alaska, and effects of lead exposure on children.

**Alliance of Nurses for Healthy Environments (ANHE)** promotes healthy people and healthy environments by educating and leading the nursing profession, advancing research, incorporating

evidence-based practice, and influencing policy. ANHE recognizes there is no safe level of lead and work with nurses around the country on lead exposure prevention. As part of that work, it provided testimony during the public comment period for the lead and copper rule and was one of four national nursing organizations who participated in stakeholder roundtable discussions organized by the EPA.

**Healthy Babies Bright Futures (HBBF)** creates and support initiatives that measurably reduce exposures to neurotoxic chemicals in the first thousand days of development. Its efforts are inspired and supported by science and data and designed to help restore the chance for a full life to children who would otherwise face brain-diminishing exposures to toxic chemicals beginning in utero. HBBF filed comments in the rulemaking supporting full replacement of lead service lines.

**Physicians for Social Responsibility (PSR)** works to protect human life from the gravest threats to health and survival. PSR's health advocates contribute a health voice to energy, environmental health and nuclear weapons policy at the local, federal and international level. Consistent with this mission and our central concerns for racial, social, and environmental justice, and cognizant that since 1991 there has been

an accumulating body of medical and scientific knowledge documenting numerous harms that low lead levels can cause, we believe that EPA has a duty to critically examine its current regulatory framework and consider taking more aggressive action to protect children and our most vulnerable communities from these manifold health harms.

**SF Bay Physicians for Social Responsibility (SF PSR)** works to protect human life from the gravest threats to health and survival. Consistent with this mission and our central concerns for racial, social, and environmental justice, and cognizant that since 1991 there has been an accumulating body of medical and scientific knowledge documenting numerous harms that low lead levels can cause, SF PSR believes that EPA has a duty to critically examine its current regulatory framework and consider taking more aggressive action to protect children and our most vulnerable communities from these manifold health harms.

**Women for a Healthy Environment (WHE)** is a nonprofit organization with offices in Pittsburgh and Philadelphia. Its mission is to educate and empower community members about environmental risks, so they can make healthy choices for themselves and their families, and advocate for change for a better tomorrow for all. WHE offers community

programming and technical assistance to teach people steps they can take to protect themselves, their community and the environment. WHE operates three main programs: Healthy Homes, Healthy Schools and Healthy Early Learning Centers. Each of WHE's three programs provides resources for addressing lead exposure in the built environment. Our goal is to reach those most vulnerable in the community, with a focus on supporting environmental justice neighborhoods. WHE filed comments in the rulemaking supporting the adoption of a maximum contaminant level for lead.



## CERTIFICATE OF COMPLIANCE

I hereby certify that the foregoing Brief for Amici Curiae in Support of Petitioners complies with the type-volume limitations of FRAP 32(a)(7)(B) and 29(d). The brief is composed in a 14-point proportional typeface, Century Schoolbook. As calculated by my word processing software (Microsoft Word 365), the brief (excluding those parts permitted to be excluded under the Federal Rules of Appellate Procedure and this Court's rules) contains 4475 words.

/s/ Nandan M. Joshi

Nandan M. Joshi

**CERTIFICATE OF SERVICE**

I hereby certify that, on August 15, 2022, this Brief for Amici Curiae in Support of Petitioners was served through the Court's ECF system on counsel for all parties.

/s/ Nandan M. Joshi

Nandan M. Joshi