

June 27, 2022

The Honorable Michael S. Regan Administrator U.S. Environmental Protection Agency 1200 Pennsylvania Avenue, NW Washington, DC 20460

Dear Administrator Regan:

As national medical societies and public health and patient advocacy organizations, we write to urge the Environmental Protection Agency (EPA) to promulgate stronger National Ambient Air Quality Standards (NAAQS) for particulate matter (PM) pollution. The undersigned organizations support a final standard of 8 micrograms per cubic meter ( $\mu$ g/m<sup>3</sup>) for annual PM<sub>2.5</sub> and 25  $\mu$ g/m<sup>3</sup> for 24-hour PM<sub>2.5</sub>.

We further strongly urge that CASAC recommend revising the form of the short-term standard to 99th percentile to effectively capture acute short-term exposures. The current form at 98th percentile dates to 1997 and allows nearly 22 days in the three-year review period to exceed the standard limit, in addition to days exempted for exceptional events such wildfires.

The Clean Air Act requires that the NAAQS be set solely based on what the best available science says is necessary to protect public health with an adequate margin of safety. EPA was correct in reconsidering the  $PM_{2.5}$  standards following the 2020 review. Overwhelming scientific evidence shows that the current standards are inadequate, putting vulnerable populations at risk and further entrenching environmental injustices in exposure.

The Clean Air Scientific Advisory Committee recently recommended a range of 8-10  $\mu$ g/m<sup>3</sup> for annual PM<sub>2.5</sub> and 25-30  $\mu$ g/m<sup>3</sup> for 24-hour PM<sub>2.5</sub>. Importantly, CASAC noted that a strengthened annual standard alone may not be protective against short-term exposures, so they also recommended a stronger short-term standard. Our groups strongly recommend that EPA propose strengthening the standard to the lowest ends of those ranges. PM<sub>2.5</sub> can increase the risk of heart disease, lung cancer and asthma attacks and can interfere with lung development.

It can also cause psychological distress.<sup>1</sup> Overwhelming evidence shows that both acute and chronic PM<sub>2.5</sub> exposure is deadly. A 2016 study of individuals 65 and older in New England found that the risk for premature death occurred even in areas that meet the current level.<sup>2</sup> Clearly, a more health protective standard is needed.

Our groups advocate for the health of the patients and communities we represent and will engage throughout the comment process. We urge you to follow the science by proposing and finalizing standards of 8  $\mu$ g/m<sup>3</sup> for annual PM<sub>2.5</sub> and 25  $\mu$ g/m<sup>3</sup> for 24-hour PM<sub>2.5</sub>, and to consider recommending revising the form of the short-term standard to 99<sup>th</sup> percentile.

Sincerely,

Allergy & Asthma Network Alliance of Nurses for Healthy Environments American Academy of Pediatrics American Lung Association American Psychological Association American Public Health Association Asthma and Allergy Foundation of America Children's Environmental Health Network Health Care Without Harm Medical Society Consortium on Climate and Health Medical Students for a Sustainable Future National Association of Pediatric Nurse Practitioners National League for Nursing Physicians for Social Responsibility Public Health Institute

<sup>1</sup> Lowe SR, Wang C, Ma Y, Chen K. Particulate matter pollution and risk of outpatient visits for psychological diseases in Nanjing, China. Environ Res. 2021 Feb;193:110601. doi: 10.1016/j.apureo.2020.110601. Environ.

<sup>10.1016/</sup>j.envres.2020.110601. Epub 2020 Dec 8. PMID: 33307087.

<sup>&</sup>lt;sup>2</sup> Shi L, Zanobetti A, Kloog I, et. al. Low-concentration PM2.5 and mortality: estimating acute and chronic effects in a population-based study. Environ Health Perspect. 2016;124:46-52. http://dx.doi.org/10.1289/ehp.1409111.