Comments to EPA/Clean Air Scientific Advisory Committee on the Draft CASAC ISA Supplement Report and the Draft CASAC PA Report to Reconsider the National Ambient Air Quality Standards for Particulate Matter

From:
Albert Rizzo, MD, Chief Medical Officer, American Lung Association

February 25, 2022

Thank you for this opportunity to provide comments from the American Lung Association. I am Dr. Albert Rizzo, Chief Medical Officer for the American Lung Association. I will share a summary of our comments today which we will also submit in detail in writing.

The American Lung Association has a long-standing commitment to the principles of the Clean Air Act, including the requirement of setting National Ambient Air Quality Standards for criteria pollutants at levels that protect the health of ALL communities and sensitive groups based on current science. These standards must also include a margin of safety to account for scientific uncertainties, technological short-comings, as yet unidentified health hazards, and the cumulative impacts of other risks such as those from climate change.

We strongly agree with the majority of the CASAC members in their draft recommendations to strengthen both the long-term and short-term standards. Science has clearly shown that particles of all sizes are harmful to health when inhaled. They cause or exacerbate a wide range of pulmonary, cardiovascular, and neurological illnesses. Recent large studies show that long-term exposure to particle pollution even at low levels can be deadly. Based on the overwhelming scientific evidence, we support setting an annual standard of 8 μg/m³ and a 24-hour standard of 25 μg/m³ for the primary standard to best safeguard human health and wellbeing. Both values are at the lower end of the ranges recommended by the majority of the CASAC PM panel and also better align with the guidance of the World Health Organization. Since the EPA uses the 24-hour standard to inform its Air Quality Index, a protective standard will better inform the public about unhealthy levels of pollution in their communities.

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.

In conclusion, we urge EPA to seize this opportunity to strengthen PM₂.₅ standards to the most stringent levels recommended by the majority in CASAC. Scientific research to date is unequivocal and unambiguous about the connection between exposure to physically and chemically diverse fine particle pollution and various morbidities and mortality. Therefore, revision of PM₂.₅ standards are necessary and urgent to alleviate disease and suffering, and prevent avoidable deaths. Such standards are effective only if they are set at levels that afford equal protection to all demographics of the US population. Strengthening PM₂.₅ standards

---

1 Health Risks of Particle Pollution (lung.org)
2 WHO recommended standards for PM2.₅: 1 year - 5 μg/m³; 24 hours - 15 μg/m³
would also offer additional benefits from reduction in multiple PM precursor pollutants. We therefore urge the agency to expeditiously adopt an annual standard of 8 \( \mu g/m^3 \) and a 24-hour standard of 25 \( \mu g/m^3 \) set at the 99\textsuperscript{th} percentile averaged over 3 years, in accordance with the current scientific evidence, to protect human health.

Thank you for your serious consideration of these comments.