

## TESTIMONY REGARDING WARNING LABELS ON GAS STOVES BEFORE THE JOINT COMMITTEE ON CONSUMER PROTECTION & PROFESSIONAL LICENSURE April 29, 2025

The Massachusetts Medical Society (MMS) is a professional association of over 24,000 physicians, residents, and medical students across all clinical disciplines, organizations, and practice settings. The MMS is committed to advocating on behalf of patients for a better health care system, and on behalf of physicians, to help them to provide the best care possible. The MMS recognizes the association between the use of gas stoves, indoor nitrogen dioxide levels, and asthma. For these reasons, the **MMS supports S.199**, *An Act warning consumers of the health risks of gas stoves*.

Gas stoves can pose health risks, as they release a variety of health harming chemicals, from the known carcinogens benzene and formaldehyde to particulate matter, which can lead to stroke, heart attack, and asthma exacerbation. Children are especially at risk, as gas stove use can be a trigger of pediatric asthma. A 2017 <u>study</u> by the Massachusetts Department of Public notes gas stoves as the number one trigger of pediatric asthma in Massachusetts. The nitrogen dioxides that burning gas in stoves create are both a cause of and can exacerbate childhood asthma: Massachusetts children who live in homes that use gas to cook have a 15.4% increased risk of developing asthma. While pediatric asthma from gas stoves has been shown to improve with external ventilation, more public awareness is needed of the risks.

S.199 proposes to mandate that all gas stoves manufactured after January 1, 2026, must include a warning label about potential indoor air pollutants, such as nitrogen dioxide and carbon monoxide. Additionally, physical and online retailers are required to present a conspicuous warning sign near the product display in stores or on the webpage listing for online sales, ensuring significant visibility.

Warning labels would raise consumer awareness of the hazards presented by gas stoves and encourage safer practices, representing an important step in decreasing the estimated **19,000** deaths annually in the United States due to NO<sub>2</sub> exposure from gas and propane stoves.

We therefore ask the Committee to report Senate bill 199 out favorably. Thank you very much for your consideration of these important issues. We appreciate the opportunity to offer these comments.



## References

https://hsph.harvard.edu/news/no-safe-amount-of-exposure-to-gas-stove-pollution/

https://www.science.org/doi/10.1126/sciadv.adm8680

https://gbpsr.org/climate-change/gas-stoves/

Rodgers GB, Garland S. The impact of immersion protection requirements on hair dryer electrocutions in the USA. Inj Prev. 2012 Dec;18(6):371-6. –<a href="https://pubmed.ncbi.nlm.nih.gov/22589363/">https://pubmed.ncbi.nlm.nih.gov/22589363/</a>

https://www.science.org/doi/10.1126/sciadv.adm8680

## Important excerpts:

Elevated levels of toxic nitrogen dioxide found in bedrooms: "Bedroom  $NO_2$  concentrations tested during oven use, with interior doors open and the range hood off exceeded the U.S. EPA's 1-hour ambient benchmark (39) and the WHO's 1-hour exposure guideline (40) within 25 min in half the homes we tested (three of six homes). In two test cases, bedroom  $NO_2$  levels remained above health-based guidelines for 2 to 3 hours after the oven was turned off (houses 1 and 2; Fig. 3A"

- **–Inequity:** "People in households with American Indian/Alaska Native respondents experience the highest stove-attributable long-term NO<sub>2</sub> exposure (6.8 [95% CI: 4.0, 10.0] ppbv), followed by Hispanic/Latino and Black households (5.0 [95% CI: 2.9, 7.3] and 4.9 [95% CI: 2.9, 7.2] ppbv, respectively). These exposure levels represent 60, 20, and 20% more than the average U.S. stove-attributable exposure,
- **–Mortality cost:** Assuming that meta-analyses of outdoor NO<sub>2</sub> and all-cause adult mortality may be applied to long-term exposure to indoor NO<sub>2</sub>, our analysis suggests that long-term NO<sub>2</sub> exposure from gas and propane stoves in the United States may be **responsible for up to 19,000** [95% CI: 8500, 34,000] deaths annually—0.67 (0.29, 1.2)% of total U.S. adult deaths—or roughly 40% the number of deaths attributable to secondhand smoke (*54*). Applying the U.S. EPA's VSL (*55*) to each death yields an annual societal cost of gas and propane stoves of \$250 (75, 480) billion (data S2), or approximately \$4500 per year per U.S. household with a gas or propane stove, based on 2020 RECS data (*1*). These estimates likely overestimate the health and cost burdens attributable to NO<sub>2</sub> because of additional pollutants found in traffic-related air pollution. However, they also underestimate health and cost burdens