



Health Department

February 9, 2018

House Committee on Health Care
900 Court St. NE- HR E
Salem, Oregon 97301

Re: HB 4003 - Relating to diesel engines

Chair Greenlick, Vice-Chairs Hayden and Nosse and members of the committee; my name is Paul Lewis, I am the Tri-County Health Officer for Multnomah, Clackamas and Washington Counties. I'm here today on behalf of Multnomah County to provide our support for HB 4003, which protects public health by taking meaningful, reasonable actions to reduce harmful diesel engine emissions and improve the quality of our air.

As a pediatrician, I am most passionate about preventing illness and suffering among children; as a county public health officer, I work to prevent illness in all ages groups across our communities. The common theme of this work is prevention and the common good.

The background on this topic is simple- diesel is dangerous. The World Health Organization listed diesel exhaust as a carcinogen in 2012 but cancer is just one of many preventable health problems caused by this dirty fuel. Preventing harm from diesel exhaust is not a technical problem, preventing harm from diesel is a policy problem- systems to dramatically decrease particulate pollution have been widely available for more than a decade. Some countries, Britain and France for example, will not be satisfied with existing technical tweaks and have announced plans to ban sales of new diesel engines by 2040; in the shorter-run, the cities of Madrid and Athens plan to prohibit diesel engines in their jurisdictions by 2025. The writing is on the wall for diesel powered engines, Oregon no longer needs to expose its residents to this unnecessary risk.

A growing body of scientific literature continues to document the association between exposure to pollutants found in diesel exhaust and a wide range of detrimental health outcomes. Long-term exposure to fine particulate matter contributes to heart disease and premature death and is associated with respiratory disease, low birth weight, and

cancer.¹ New research suggests a positive association between exposure to particulate matter and Alzheimer's disease among older women², and autism in children³.

Many areas of our state regularly experience unhealthy diesel pollution levels, with Multnomah County ranking highest in total and exposure concentrations among Oregon counties⁴. Children, older adults and those with existing cardiovascular or respiratory disease are more sensitive to these effects. Multnomah County Health Department reported in 2014 that census tracts containing higher proportions of people of color had an estimated 2 to 3 times greater concentration of diesel particulate matter as compared to predominantly White census tracts⁵. The research behind diesel pollution remains strong. Our resolve to reasonably reduce statewide emissions must be equally strong.

HB 4003 addresses diesel emissions through a range of strategies already proven in other states such as California. They include requiring a transition to clean diesel fleets over the next 10 years, creating a registration system to better understand and govern diesel powered construction equipment being used in the state, and creating a clean diesel procurement requirement for large public improvement contracts. The legislation also includes the creation of an indirect source permitting program, which would allow the state to evaluate, permit and develop emissions reduction strategies for operations such as port facilities where the queuing of diesel engines results in localized air quality impacts.

I want to emphasize that air quality is central to public health and environmental justice principles. We cannot choose the air we breathe, and the proximity to the exposure source influences the severity of the impact, which means that communities living near highways or other transportation corridors bear a disproportionate health burden.⁶ We have a responsibility to protect the most vulnerable members of our community, and we are far behind our neighboring states of Washington and California in facilitating the transition to cleaner engines. We must take action now. Please join us in supporting House Bill 4003.

¹ U.S. EPA. Integrated Science Assessment (ISA) for Particulate Matter (Final Report, Dec 2009). U.S. Environmental Protection Agency, Washington, DC, EPA/600/R-08/139F, 2009

² Cacciottolo, M. (2017). Particulate Air Pollutants, APOE Alleles and their Contributions to Cognitive Impairment in Older Women and to Amyloidogenesis in Experimental Models. *Translational Psychiatry*. (2017) 7, e1022. <http://www.nature.com/tp/journal/v7/n1/pdf/tp2016280a.pdf>

³ Volk, H. (2013). Traffic-Related Air Pollution, Particulate Matter, and Autism. *JAMA Psychiatry*. 2013;70(1):71-77. <http://jamanetwork.com/journals/jamapsychiatry/fullarticle/1393589>

⁴ 2011 NATA: Assessment Results. Accessed on 2/1/18 at <https://www.epa.gov/national-air-toxics-assessment/2011-nata-assessment-results>

⁵ 2014 Report Card on Racial and Ethnic Disparities. Multnomah County Health Department, December, 2014.

⁶ Brugge, D. (2007). Near-Highway Pollutants in Motor Vehicle Exhaust: A Review of Epidemiologic Evidence of Cardiac and Pulmonary Health Risks. *Environmental Health*. 2007 6:23. <https://ehjournal.biomedcentral.com/articles/10.1186/1476-069X-6-23>

Thank you for the opportunity to talk to you today.

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