

Anonymous Anonymous

TO: WA DOE

FROM: Nancy Beaudet MS, CIH
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RE: COMMENT - PacWest Silicon Smelter EIS Scoping

Strong evidence has accumulated linking early life exposure to environmental toxicants in air, water, and soil to significant and potentially lifelong health consequences. Pregnant women and children are especially at risk because exposures may perturb their rapid organ system physical and functional development. In addition, children are at increased risk for certain exposures due to their behaviors, such as crawling on the ground, putting their hands and other objects in their mouths, or eating paint chips or other non-food items. Children also breathe more air, drink more water, and eat more food per pound of body weight than adults, increasing their potential level of exposure.

We urge WA DOE to consider the health impacts to pregnant women and children within the scope of the EIS for the PacWest Silicon Smelter. Exposures or conditions of concern that should be considered as part of the EIS are listed below.

1. Emissions from the proposed silicon smelter and the effectiveness of the proposed capture methods to reduce emissions.
 - a. Also consider downwind exposures where children may live, play, attend school or be exposed.
2. Health impacts to children related to transport of the raw materials to and the final products away from the smelter.
 - a. Increased exposure to exhaust from diesel and gasoline vehicles or railcars transporting goods.
 - b. Exposures from uncontained emissions from containers of raw materials during transport.
 - c. Increased exposure to noise.
 - d. Consider traffic routes and rail lines in proximity to residential neighborhoods, health care sites, schools, playgrounds, and other locations where kids spend time.
3. Child health impacts from management of any hazardous and/or other waste from the smelter.
 - a. Consider local storage and/or transport to landfills or hazardous waste sites.
 - b. Consider potential degradation of local/regional drinking water supplies.
 - c. Consider where any hazardous or other waste is stored offsite.
4. Health impacts to kids where production of the raw materials will increase due to the PacWest Smelter.
 - a. Consider the increased mining and processing of silica sand, coal and other raw materials within and outside WA State.
5. Consider climate change impacts to the health of children. The American Academy of Pediatrics and the World Health Organization have outlined how the burden of climate change will disproportionately harm children more than adults, given their unique vulnerabilities to air

pollution, asthmatic and allergic diseases, heat stress, food and water insecurity and natural disasters.^{1,2}

The NW Pediatric Environmental Health Specialty Unit (PEHSU) seeks to reduce environmental health risks to children by providing training for health professionals, communities and families through consultation, education activities and referrals. NW PEHSU is based at the UW Department of Environmental and Occupational Health Sciences, is part of a national network of experts and is federally funded by US CDC and EPA. For more information about PEHSU see our website. <https://deohs.washington.edu/pehsu>

¹Zhang Y, Bi P, Hiller JE. Climate change and disability-adjusted life years. *J Environ Health*. 2007;70(3):32-36.

²AAP Council On Environmental Health. Global Climate Change and Children's Health. *Pediatrics*. 2015;136(5):992-997.