Beyond Toxics states for the record our concern with many of the amendments proposed to Smoke Management Rules under OAR 629-048and Operational Guidance for the Oregon Smoke Management Program.

While we support certain types of prescribed burning to help prevent forest fires, we object to these aspects of the proposed rule changes:

1. Failure to separate the need for prescribed burning as an ecological and fire prevention tool in the forest landscape versus increasing the amount of smoke allowed from slash burning on corporate timber plantations
2. Failure to justify the need to increase burning to remove timber waste on private industrial timber holdings;
3. Increasing levels of smoke pollution allowed to enter the airshed of rural and urban communities;
4. Failure to protect children and other vulnerable Oregonians, as well as introducing hardship and economic inequities onto rural and lower income communities;
5. Failure to align the air quality decisions within the Smoke Management Plan with the DEQ and OHA’s goals and rules for Cleaner Air Oregon.
6. Allowing more black plastic on timber plantation slash piles that will be burned along with the slash debris.

To be clear - Beyond Toxics does support prescribed burning when used appropriately to prevent wild fires and in ways that are culturally significant.

We don’t support changing the rules to promote industrial clear cutting. We all know that clear cutting in tree plantations creates excessive amounts slash. Industrial timber companies don’t re-use forest woody debris to rebuild healthy soils and resilient forests. Instead they scrape the soils with heavy equipment to create piles of left-over woody debris, cover the piles with black plastic to keep parts of the piles dry and set fire to the whole pile, including the plastic.

Smoke from both controlled fires and wild fires contain fine particles that can be inhaled into the deepest recesses of the lung and exchanged directly across cell membranes to enter the bloodstream. Thus, small particles can be respiratory irritants as well as posing dangers to the cardiovascular system in the form of strokes and heart attacks. It is well known that fine particles in the PM 2.5 spectrum or smaller represent a greater health concern than larger particles. According to the US EPA, smoke is a complex mixture of carbon dioxide, water vapor, carbon monoxide, particulate matter,
hydrocarbons and other organic chemicals, nitrogen oxides, and trace minerals. The individual compounds present in smoke number in the thousands. Small, fine particulate matter (PM 2.5) is the principal pollutant of concern from wildfire smoke for the relatively short-term exposures (hours to days to weeks) that presents risks of negative public health impacts. Air toxics and particulate matter contribute to poor air quality in general, which in turn impacts public health and livability.

In addition, burning plastic releases organochlorine-based substances into the air. When such plastics are burned, harmful quantities of dioxins, a group of highly toxic chemicals are emitted. Dioxins are the most toxic to the human organisms.

Resilient forestry practices re-purpose slash by chipping it and returning it back to the forest to serve as soil amendments or distributing small amounts of slash to be used by wildlife for nests, dens and other habitats.

The proposed amendments are inadequate to protect public health in the following ways:

1. **Inadequate Science and Rationale to Justify the Rule Change.** It is clear from the proposed language that the amended rules primarily benefit industrial timber land owners and do not promote ecosystem health. The rules are related to landing or right-of-way piles and burning of slash piles. Slash piles, the result of commercial logging, are not a natural build-up of woody fuels that could start a forest fire. Enabling more logging waste burning is not a compelling reason to place communities at risk for smoke inhalation.

2. **Fails to Protect Children's Health.** The proposed rule changes are particularly harmful to children living in rural areas. There is nothing in this plan to protect young children and school children from exposure to dangerous levels of fine particulate and general poor air quality from smoke intrusions. It is very troubling that the proposed rules seem to ignore the evidence of respiratory vulnerability of children, the elderly or infirmed, and pregnant women. Children, even those without any pre-existing or chronic conditions, are considered a sensitive population because their lungs are still developing, making them susceptible to air pollution. We object to the absence of regulatory language to protect the health of children and health-vulnerable adults.

3. **Community Response Plan and Exemption Request.** Communities should not have to go into emergency mode in response to polluting actions by private timber corporations or state agencies. The US EPA states that even sheltering at home is not a fully successful means of avoiding smoky air. “Staying indoors works best in a tightly closed, air-conditioned home in which the air conditioner re-circulates indoor air … newer homes are “tighter” and keep ambient air pollution out more effectively than older homes.” For communities with older
homes and without air conditioning, the US EPA states that indoor concentrations of fine particles can approach 70 to 100 percent of the outdoor levels.” In very leaky homes and buildings, outdoor particles can easily infiltrate indoors, so that staying inside may offer little protection. It follows that, in poorer rural communities with older homes, sheltering indoors is not helpful, which may constitute inequities and greater health impacts.

In summary, we are concerned that these rules increase air pollution but do not actually reduce wildfire risk.