

Lead is a bluish-gray metal that is found in natural ore deposits in the earth. Once mined, it is used in many different consumer and industrial products.

Lead is found in old paint, jewelry, fishing gear, bullets, batteries and pottery glaze, to name a few products. A more thorough list can be found <a href="here">here</a>.

In fall 2019, Oregon health officials became concerned about dangerous lead levels found in some traditional cosmetics used in Hindu religious practices and worn by people in Middle Eastern, South Asian and East African cultures, as well as some turmeric spice purchased abroad.

# **Products of concern**

# Sindoor, Kumkum, Tikka, and Roli

These bright red-orange powders are commonly used for hindu religious purposes and among communities from and around South Asia. Lead is sometimes used to brighten the color or to increase the weight of the product. People can be exposed to lead when powders that may contain lead enter the body through the eyes or mouth.

Health officials have discovered high lead content in samples of sindoor purchased locally under the brands:

- Ancient Veda
- Divine Supplies





#### Kohl

Also known as kajal, surma or sormeh, this black ore is applied to the eyes for spiritual, medicinal or cosmetic purposes. It is traditionally used on babies and young children for religious purposes. The FDA has banned the import of Kohl because one way of making the product is by grinding a mineral called galena—also known as lead ore—into a powder and then mixing it with other ingredients.

Multnomah County has found lead in products purchased locally and abroad, including in the brands:

- Hashmi Surma Special
- Al-Asmad Alharmain Zam Zam & Rose Water

#### **Turmeric**

This root is often covered with a bright orange powder, and is used daily in South Asian cuisine, medicine and traditional practices. It has become widely used around the world. Lead powder is sometimes added to turmeric root or powder to make the product more vibrant and to cover insect damage. People are then exposed to the lead when that spice is eaten. Health officials are primarily concerned about the spice brought in from India or Bangladesh, rather than products sold in major U.S. supermarkets.



# **Health risks**

## How does lead enter the body?

Lead enters the body in two main ways—swallowing or breathing in fine particles or dust. Swallowing particles is more common for children because they often put their hands or objects in their mouths. A less common exposure is absorption through the eyes or tears. The body slowly gets rid of lead over time.

## What is lead poisoning?

An elevated blood lead level—or lead poisoning—is a blood lead concentration of 5 or more micrograms of lead per deciliter of blood. When a child has lead poisoning, public health agencies begin working with the family to find the likely source of lead, provide resources to minimize the impact on the child's health, and work with health care providers to perform follow-up blood tests to make sure lead levels go down.

## What are the symptoms?

Symptoms of lead poisoning are not always easy to see unless a person's blood lead level is very high. Patients with very high blood lead levels may have stomach pain, or weakness in fingers, wrists and ankles. Extremely high levels of lead can cause seizures, organ damage, coma and death.

Exposure in adults can cause high blood pressure, joint and muscle pain, or mood disorders. Some adults experience memory loss, difficulty concentrating or problems related to fertility.

Children and babies exposed while their mothers are pregnant are especially at risk. Even a little lead can make children slower learners. Children who are exposed to lead may not show any obvious health or behavior changes, so blood lead testing is the only way to know if a person has lead poisoning. Symptoms may include irritability, constipation, loss of appetite and weight loss, low energy or fatigue.

Lead exposure in children can lead to:

- Behavior and learning problems.
- Problems with hearing and speech.
- Slowed growth and development.

# Safe use and disposal

# What should I do if I use these products?

If you use or have used a product that may be contaminated with lead, talk to your health care provider about getting a blood lead test. This is the only way to know if you or a child has been exposed to lead.

## How do I safely dispose of a product containing lead?

If you have any product that you think may have unsafe levels of lead, keep it away from children and throw it away with other household garbage. If you have a large amount of the product (for example, a full bag of sindoor), double-bag the material before throwing it away so it does not expose someone who will handle the garbage.

Do not flush these products down a sink or toilet, as this may contaminate surface water or drinking water sources.

# I feel the need to use this specific product. How can I do so safely?

If a product like sindoor or kohl does contain lead, health officials recommend keeping it away from children and not using it if you are pregnant. Otherwise, adults may be able to continue using a product containing lead if they are careful to keep that product away from their eyes and mouth, and wash their hands after touching the product.

For products normally used around the eyes, look for ones made in the United States, Canada, or Europe or carry the label "lead free." Not all cosmetics are routinely tested for lead, but products with these labels may be safer.

# **Testing**

## Who should get tested if we use these products?

Pregnant women and children of any age who use these products should get a blood lead test.

In general, the best time to screen for lead exposure is at age 1 year and age 2 years. Children younger than 6 years old are most at risk from lead exposure, so any child of this age without a blood lead test should be tested.

If family members are worried about lead, ask a health care provider for a blood lead test. You can also bring your child to a <u>free lead</u> <u>screening clinic</u>.



# How can I test a product in my home?

Families can buy an inexpensive lead test from a local hardware store. But this test works best on products with smooth surfaces like toys, pottery and paint chips. It can be more difficult to test powders, especially ones that are red or black.

The best way to test a cosmetic product is to send it to a laboratory on the list of the <u>National Lead Laboratory Accreditation Program</u>. The results should be reviewed carefully. Some labs may have reporting limits of 20 ppm or greater, which is not low enough to determine if the cosmetic contains less than the federal Food and Drug Administration (FDA) recommended limit of 10 ppm.

Any food or spice that may have lead should be sent to a food laboratory. Before sending the sample, contact the lab to make sure it can test the product for lead.

For questions about testing spices or powders for lead contact the <u>Multnomah County Leadline</u> at 503-988-4000.

# **Take Action**

What is the government doing to prevent more lead exposures from these products? At this time, the state and local governments don't know how many of these products are sold in Oregon.

The FDA has authority to investigate and stop the import of these products. The Oregon Health Authority and local health departments have been working with the FDA to investigate unsafe products found in local stores. Health officials also work with families and communities who have been affected by these products.

The FDA sets a maximum lead content in products such as sindoor and kohl of 10 parts per million. There is no FDA set regulatory limit or recommendation for lead in spice; but the FDA launches an <u>investigation</u> and may ban the import of any product intended for consumption by children at .1 parts per million.

Even though the FDA sets acceptable levels for products, there is no "safe" level of lead exposure for young children or pregnant women.

To better inform the county's work around culturally specific lead products, Multnomah County is continuing culturally-specific outreach and holding community conversations in early 2020. Those interested in attending can contact Judy Tan at <a href="mailto:judy.tan@multco.us">judy.tan@multco.us</a> or call 503-988-9416.

#### **Learn More**

Washington County Health Care Resource Line: 503-846-8851

Multnomah County Leadline: education, advice, and resources 503-988-4000

Oregon Health Authority: lead poisoning education and regulations

New York City: lead education and outreach in multiple languages

Minnesota Dept. of Health: Lead Fact Sheets and Brochures in multiple languages

Centers for Disease Control and Prevention: Childhood Lead Poisoning Prevention

Food and Drug Administration: foods, foodwares, dietary supplements, and cosmetics





