

Working with Lead

Lead is a highly toxic metal that has commonly been used in many households and industrial products like paint, solder, batteries, brass, car radiators, bullets, pottery, etc. Too much lead in the body can damage the brain, kidneys, nervous system and red blood cells.

People who work in jobs that involve lead (such as power sanding old paint or manufacturing lead-acid batteries, for example) are at risk for lead poisoning. Workers can also bring lead home on shoes and work clothes.

The Department of Health recommends that adults who work with lead get a blood lead test. This measures how much lead is in your bloodstream.

What are the types of jobs where lead can be found?

Some examples of job settings where there is likely to be exposure to lead:

- brass, copper or lead foundries
- demolition or welding of old structures
- dry scraping, sanding, or using a heat gun on old paint
- welding of old, painted metal
- paint manufacturing
- spray finishing
- machining and grinding lead alloys
- battery manufacturing
- radiator repair
- scrap metal handling or wire reclamation
- lead soldering
- indoor firing ranges
- ceramic glaze mixing
- stained glass manufacture or repair

How does lead enter the body?

Lead can enter your body when you breathe lead fumes or dust, or when you swallow lead dust. Lead dust can get into your food, drinks, chewing gum or cigarettes if you eat or smoke in your work area. Your family can get lead poisoning if you bring lead dust home on your clothes and shoes.

What are the signs and symptoms of lead poisoning?

There are many signs or symptoms that suggest a problem with lead, but they can also be symptoms of other illnesses. It is also possible to have lead poisoning without noticing any symptoms. Even if you feel fine, lead can start building up in your body and may damage your kidneys, brain, digestive, reproductive and blood systems. If you work around lead, you should see your doctor regularly, whether or not you have any of the symptoms that follow on the back of this page.

Early signs and symptoms of lead poisoning: fatigue, uneasy stomach, irritability or nervousness, poor appetite, headache, sleeplessness, metallic taste in mouth, reproductive problems.

Later signs and symptoms of lead poisoning: aches or pains in stomach, constipation, nausea, weight loss, memory problems, muscle and joint pains, weak wrists or ankles, kidney problems.

How can exposure to lead be reduced?

- Use ventilation systems provided for you. Be aware of how they work, and if they are working right.
- Use the correct respirator. Your employer must provide the right respirator for the job, and must have a regular system for cleaning respirators and making sure they are in good working order.
- Keep your work area clean. Do not dry sweep or shake lead dust off clothes or surfaces. If a vacuum is used to clean up, it should have a High Efficiency Particulate Filter (HEPA). If it does not, use wet cleaning methods instead.
- Do not eat, drink or smoke in work areas.
- Always wash your hands and face before eating, drinking or smoking.
- Eat a well-balanced diet. Good nutrition may lessen the amount of lead absorbed by your body.
- Store work clothes in a separate locker from your street clothes.
- Shower, wash your hair, and change into clean clothes—including shoes—before leaving work. Lead dust on your clothes can be brought home and may harm your children.

Are there industry regulations for lead?

The **OSHA General Industry Lead Standard (1910.1025)** written by the federal Occupational Safety and Health Administration (OSHA) covers most industries in the private and public sectors. It requires employers to do a number of things to make sure that the workplace is safe. (The OSHA Lead Standard does not include construction or agriculture.)

The **new OSHA Lead in Construction Standard (1926.62)** applies to all construction work where an employee may be exposed to lead on the job. All work related to construction, alteration or repair—including painting and decorating—is included. (Until 1993, the amount of lead a construction worker could be exposed to was much higher than the level set in the OSHA General Industry Lead Standard.)