Lead in Schools

Why is lead in schools a concern?

Young children are particularly vulnerable to the toxic effects of lead and can suffer profound and permanent adverse health effects, particularly affecting the development of the brain and nervous system. Lead poisoning can cause learning disorders, a decrease in IQ, and slowed development and growth.

Lead was used in paint to make the colors brighter and to make the paint last longer. Many older schools used lead paint to cover walls, doors and especially windows.

Intact lead paint generally does not pose a health risk. However, when lead paint is allowed to deteriorate or is damaged, it can chip and peel, releasing lead into the environment. Lead paint chips and lead dust pose an increased health risk to children.

What was done to address lead in schools?

In order to protect children from the health risks posed by lead paint, the U.S. Environmental Protection Agency (EPA) was mandated by congress in 1998 to develop regulations to manage the abatement of lead paint in buildings that children inhabit, including schools.

In 2010, the EPA introduced the Renovation, Repair and Painting Rule (RRP) to regulate all renovation activities that may disturb lead paint in pre-1978 buildings that children under the age of six inhabit, including schools.

To comply with EPA, schools with children under the age of six must hire EPA certified lead renovation firms to conduct any renovation activities that may disturb lead paint. More information on this can be found at:

http://www.commerce.wa.gov/building-infrastructure/housing/lead-based-paint/renovation-repair-painting/

Are there other items that could contain lead in schools?

There may be other sources of lead in some schools. Lead is sometimes found in art supplies, photography supplies, pottery glazes, science lab materials, and also in some vinyl mini-blinds.

Lead in water can also be a concern, since many older schools have lead water pipes in them or used lead solder on copper water pipes. Another concern with lead in water is older fixtures

such as faucets and drinking fountain spigots. The brass in these older fixtures can contain high amounts of lead. These pipes and fixtures are a concern because children will get drinks from these spigots or use the faucets to fill water bottles and can ingest lead.

Lead may also be present in soil around the school as a result of leaded gasoline emissions, industry emissions, or former pesticide use.

Lead was a gasoline additive used to prevent engine knocking prior to the mid-1970s. Leaded gasoline has since been banned. Prior to the ban, an estimated 200,000 tons of lead were emitted in vehicle exhaust in the U.S. each year. From the air, it settled into soil throughout the country. As a result, in some urban areas, lead levels in soil are high enough to poison children. Industrial air emissions are another source of lead in soil.

Over the years, lead from air emissions generated by industry has settled into the soil, particularly near lead smelters, battery plants, oil refineries, power plants, and waste facilities.

Until the 1950s, Northwest apple growers sprayed their orchards with lead arsenate pesticides against the codling moths. That spraying contaminated thousands of acres of former orchard land, much of it now home sites. Exposure from soil can happen through either direct or incidental ingestion or through inhalation of soil turned to dust.

For more information:

www.doh.wa.gov/lead