



School Lead Appliance Replacement Program Single Sample Rationale

DDAGW Sampling Language
August 12, 2016

In June 2016, amended substitute House Bill 390 of the 131st Ohio General Assembly authorized the creation of the Lead Plumbing Fixture Replacement Assistance Grants Program, and created an appropriation of \$12,000,000 in state funds to be used for this purpose. The grants are to be used to reimburse public and chartered nonpublic schools to sample their drinking water and replace drinking fountains, water coolers, plumbing fixtures, and limited connected piping found to be a cause of lead above the federal action level of 15 parts per billion (ppb) in drinking water.

Public schools which were constructed prior to 1990 without plumbing renovations since 1990 are the target facilities for this sampling initiative. Buildings constructed before 1990 are the ones most likely to have solder, pipes, drinking faucets and water coolers containing lead.

Water entering the school is generally not a concern because it comes either from a municipal Public Water System (PWS) or the school itself is the PWS. In either case, that water is sampled and evaluated routinely.

Based on Ohio EPA's past experience, the highest risk of lead exposure in schools is directly related to the water fountains or coolers and their associated plumbing connection. U.S. EPA further identifies these fixtures as "[high priority](#)" for sampling locations. This grant program was created to quickly address the highest risk and most likely sources of contamination in the most cost-effective manner. That's why the sampling protocol for this specific program has been adjusted to take only one 250 mL sample per fixture (about a cup of water). Again, the highest risk of lead exposure in schools is from the water fountains and coolers. While the "single sample" methodology does not diagnose if there are other potential contributors of lead contamination, it is used to evaluate the fixture, which is the most likely source.

This is not intended to be a whole school diagnosis as described in USEPA's 3Ts Technical Guidance. Any monitoring or assessment outside of the fixture sample is beyond the scope of this grant and is an ineligible cost.