

Louisville Metro Department of Public Health and Wellness: Multi-Sector Success in Lead

A Collaboration Success Story

Lead exposure remains one of the greatest public health issues in the United States due to the detrimental health effects on children, including unborn children. Lead can be detected in pregnant women's plasma and breast milk and can cross the placental barrier. Children are particularly vulnerable to lead exposure due to the susceptibility of their developing organ systems. Children exposed to lead before birth or shortly after are at increased risk of neurodevelopmental challenges, including lower IQ, difficulty concentrating, and inability to control emotions.

Cross-Sector Collaboration Needed

In Louisville, lead poisoning predominantly affects the city's most vulnerable communities that live in substandard housing. Addressing housing issues and reaching the communities that live in them requires efforts from multiple sectors. The Louisville Metro Department of Public Health and Wellness (LMPHW) identified a need to collaborate with sectors outside of their department to address lead poisoning in these communities. To establish these collaborations, LMPHW utilized an innovative public health strategy called Health in All Policies (HiAP). HiAP is a collaborative approach to include health considerations in policy-making decisions across all sectors. This approach allows public health sectors to improve community health outcomes, including lead poisoning prevention.

To develop partnerships with other sectors and states, LMPHW engaged in conversations across sectors to discuss healthy housing as it relates to lead poisoning prevention. Other sectors that LMPHW engaged with included the United States Department of Housing and Urban Development, local housing authorities, organizations representing childcare facilities, healthcare providers, and nutritionists, among others.

Enhanced Data Systems & Partnership with Health Centers

Through these partnerships, LMPHW succeeded in a variety of outcomes that address lead poisoning prevention. Through its partnership with the Kentucky Resources Council, LMPHW advocated for housing policy changes that they could not have achieved independently. LMPHW also improved data systems in several ways. Through a partnership with United Way, they identified and addressed gaps in federal social work by assisting the state lead program in providing referrals to resources at the community level.

In addition, LMPHW enhanced its internal database management system to improve case management related to lead exposure. LMPHW had several successful outcomes at the community level, including developing a system in partnership with federally qualified health centers to screen pregnant women for elevated blood lead levels and educate gynecologists on how to support these screenings. In addition, LMPHW partnered with Refugee and Immigration Services to communicate the dangers of lead exposure to the public.



Despite the many successful outcomes achieved through its participation in the CoIIN, LMPHW encountered several challenges. The large number of projects and expanding scope of work addressed during the project may have affected the overall quality of work. In the future, it will be important for LMPHW to prevent the scope of work from continuing to expand outside of the project's requirements. Although LMPHW formed and facilitated many successful partnerships, they experienced challenges working with Kentucky's state health system, which limited their ability to use state-level environmental health data. Finally, LMPHW experienced challenges due to the COVID-19 pandemic, including project delays and competing priorities.

Future Plans: Increase Community Engagement

To expand on the successful partnerships and outcomes created through their project, LMPHW plans to increase community engagement and participation for feedback on program outcomes. LMPHW plans to partner with additional local nonprofit organizations to identify new ways to focus on healthy housing. LMPHW will continue to make strategic decisions about identifying partnership opportunities to incorporate health into policies. These steps will continue the progress LMPHW has made toward addressing lead poisoning prevention in the city's most vulnerable communities.

Meet the Team from Louisville

The local organizations that participated in Louisville's CoIIN initiative included the Louisville Metro Department of Health and Wellness, the Office of Housing's Lead-Safe Louisville, Louisville Water Company, LockUpLead, and Louisville Grows.

Learn More

The National Environmental Health Association (NEHA) and other partners are part of the leadership team for the AMCHP MCEH CoIIN, which is funded through a three-year grant from the United States Health Resources and Services Administration. By joining the collaborative, NEHA has an important platform to affect policy within the participating states. The objective of the CoIIN aligns with the Centers for Disease Control and Prevention and the United States Department of Health and Human Services' broad goal to protect children from the health risks of harmful exposures by developing innovative strategies to reduce and prevent emerging and re-emerging environmental health concerns. Learn more at the following websites:

- neha.org
- mchb.hrsa.gov
- amchp.org
- atsdr.cdc.gov
- www.MCHLeadToolkit.org

