



Flint Water Crisis Response 4/11/2016

Summary

The Michigan Lifestage Environmental Exposures and Disease (M-LEEd) Center, which improves our understanding of the contribution of environmental exposures toward the etiology of chronic diseases and conditions, has mobilized in response to the public health emergency currently unfolding in Flint, Michigan. The Community Outreach and Engagement Core (COEC) is coordinating efforts between scientists and community partners to inform the creation of materials and messaging targeted toward Flint residents which will improve understanding of the short and long term health effects of the water crisis. Efforts to date include:

1. **Supported Translation** of existing materials into Spanish by working with a Detroit based partner organization to put the state in touch with additional translators, helping to address a delay in getting materials translated and out to the Spanish speaking Flint community.
2. **Disseminated** newly translated materials through coordinating efforts between Detroit Hispanic Development Corporation (DHDC) representatives and UM-SPH students to go door to door and speak with Flint residents in a predominantly Spanish-speaking community.
3. **Collaborated** with Center scientists to revise existing materials with up-to-date scientific information based on UM-SPH research and informed Chief Medical Executive of the Michigan, Department of Health and Human Services and M-LEEd Center scientist, Dr. Eden Wells, of suggested revisions.
4. **Coordinated** with multiple academic, community, and government entities to build off existing community connections to coordinate on dissemination of materials and resource distribution.
5. **Provided Expertise** to multiple entities in the interest of improving understanding of health impacts of the crisis.

Currently, M-LEEd Center leadership is in conversation about the best use of resources as we move forward, recognizing the emergent nature of the situation, and will continue to add activities to this as they are completed.

Selected Center Efforts

1. Translation

Angela G. Reyes, Founder and Executive Director of the Detroit Hispanic Development Corporation (DHDC) and M-LEEd Center Stakeholder Advisory Board member, reached out to UM-SPH faculty and staff for a scientific response to the water crisis, having heard from her Flint partners that materials had not previously been translated into Spanish and that members of the non-English speaking Flint community were continuing to use water in a way that was unsafe. UM-SPH faculty responded and provided a number of both English and Spanish resources that Ms. Reyes and her team compiled and translated, including the Flint Water Response Team document put together by the State of Michigan. This continues to be a developing situation and the COEC is currently in conversation with multiple groups to address this critical issue.

2. Dissemination

DHDC representatives called for volunteers to disseminate the newly translated materials, and UM-SPH M-LEEd faculty responded by sending out a message to MPH students, several of whom were then able to join students from La Salud (UM-SPH Latino student group) and community partners in going door-to-door. This effort was supplemented by multiple statewide coalitions (Black and Brown Coalition, Michigan Latino Group) and religious organizations (St. Mary's Church), which has been serving as the "home base" for weekend dissemination efforts.

Most recently, Latino student groups on the UM campus have begun to coordinate amongst themselves in order to better coordinate efforts.

3. Collaboration

Meanwhile, at the request of both community and academic partners, UM-SPH faculty and M-LEEA Center scientist Dr. Stuart Batterman reviewed the Flint Water Response Team document put together by the State of Michigan, and provided suggested edits that would better communicate the potential routes of exposure as well as details regarding filters and other strategies for reducing exposure. This newly revised document has been sent to Dr. Eden Wells, Chief Medical Executive, Michigan Department of Health and Human Services and M-LEEA Center scientist, who forwarded to her communications team.

COEC team members have also been working with Crossing Water, a social worker-led effort to bring relief to families in crisis in Flint, to develop a set of instructional videos related to filter usage and short- and long-term effects of lead exposure.

4. Coordination

COEC team members have been in conversation with multiple academic, community and government entities to coordinate efforts in Flint. We continue to coordinate with faculty at the M-LEEA Core Center, the UM SPH's Task Force on Flint (which is working closely with Flint community residents), and the UM SPH Prevention Research Center (PRC) at UM-SPH, which has longstanding relationships in the Flint community. PRC staff have offered to be a part of dissemination efforts through their existing networks as it is helpful. We are also in communication with community groups in Flint in both the English and Spanish speaking communities to assist with coordination of efforts.

The COEC has also been responsive to national calls for coordination from NIEHS, CDC, and EPA, and has supported efforts to coordinate action among student groups at UM-SPH to organize among themselves.

5. Expertise

M-LEEA members have provided expertise through multiple venues. The COEC has worked to share information about nutrition and lead, and helped to circulate fact sheets providing information on dietary sources. For more information, see the "Selected Additional Resources" section.

One recent example of this is M-LEEA and Children's Center P30 investigators Karen Peterson and Dana Dolinoy, along with Barbara Felt, MD at U of M Mott Hospital, provided Mr. Ryan Burtka, Legislative Director to Michigan State Senator Jim Marleau information and advice on nutritional supplementation and food-based strategies for the children's population of Flint, Michigan.

Recommendations included judicious use of multi-vitamins (MVI), recommended in the context of the medical home where a primary care provider can take into consideration other medical problems, advise appropriately and provide guidance to help avoid over use of MVI. Note: vitamin supplements should only be taken under a doctor's supervision. A medical home would help to optimize nutrition education, immunization status, and developmental assessment, intervention and follow up. References and text describing how nutrients influences lead absorption were provided, showing in general deficiencies in calcium, iron and zinc enhance lead absorption, while vitamin D may enhance absorption and bone storage. Studies in adults have shown higher lead absorption rates when fasting.

Mr. Burtka followed up, describing preliminary conversation with DHHS regarding health assessment strategies. Specifically, Medicaid will reimburse fully for vitamins that are recommended in a medical setting. For those individuals not covered by Medicaid, Senator Marleau may want to ensure that coordinating agencies can direct people to either free or

reduced cost supplements at the direction of a physician. A main goal is to pivot folks away from the need for bottled water and onto addressing long term health concerns for the Flint Population.

Partner Efforts

A number of the COEC Stakeholder Advisory Board member organizations have been undertaking efforts of their own to respond to the developing situation.

Henry Ford Health System

For the past several weeks, Henry Ford and Health Alliance Plan (HAP) have been teaming up to coordinate a system-wide bottled water collection to assist Flint residents impacted by the water emergency. We have since been informed by emergency responders that water donations are no longer needed at this time. However, Henry Ford has been approached for nursing support and a team of nurses is being assembled to assist with health care related services. As an organization with a history of helping those in need in our community and beyond, we want to thank everyone for their spirit of collaboration to participate in this emergency. Henry Ford continues to monitor the situation in Flint, and will direct additional resources if called upon by emergency responders.

Media Outreach

- **Dana Dolinoy**
 - Interview with UCSC Science Communication Program regarding molecular epigenetics and environmental justice: <http://scicom.ucsc.edu/publications/QandA/2016/dolinoy.html>
 - Interview with Cody Kozacek, which will be featured on Chinadialogue.net, a bilingual news site that focuses on environmental issues in China and globally.
 - Fox2 Detroit TV Interview, "Effects of Flint water on pregnant mothers a concern" January 22, 2016
 - "Best of Health," KVMR-FM Radio, Nevada City CA, January 22, 2016
 - Capital City Live, WILS Radio, Lansing, MI, January 26, 2016
 - Mom'sRising.org Twitter chat, January 27, 2016
- **Rita Loch-Caruso**
 - [Medpage Today: Public Health & Policy "Friday Feedback: Lead Poisoning and Other Silent Public Health Threats," Friday, February 19, 2016](#)
 - China CCTV Interview, January 20, 2016

Other Core Activity

- Our Integrated Health Sciences Core, represented by Sung Kyun Park, has invited Dr. Mona Hanna-Attisha to UM to give a talk and meet with M-LEEd scientists and COEC representatives, with a date set for February 3, 2016. The talk was very well-attended and resulted in at least one new collaboration involving coordinating blood lead testing efforts.
- Jerome Nriagu, M-LEEd Center Scientist, has added his name to a list of experts compiled by the American Public Health Association of people who are willing to assist with the response in Flint.
- Center Co-Leader Dana Dolinoy has been in conversation with the Children's Environmental Health Network to share resources and information from the M-LEEd Center.
- We continue to work on ways our M-LEEd scientists can engage, collaborate, and support the Flint community and regulatory stakeholders in this crisis.

Selected Additional Resources

INFORMATIONAL LINKS

- [APHA: Lead](#)
 - [Participate in “The Flint Water Crisis & Beyond: A Three-Part Webinar Series on Lead and Public Health”](#)
- [Bridge Michigan: Flint Water Disaster Timeline](#)
- [Crossing Water](#)
- [Detroit News: Michigan Senators Reach \\$220M Proposal Affecting Flint](#)
- [Huffington Post: 5 Ways You Can Help Flint, Michigan Amid the Water Crisis](#)
- [Michigan Radio: Racial demographics play a part in pollution levels, expert says](#) (featuring COEC SAB Member Guy Williams)

FACT SHEETS

- [California Department of Public Health: Well Fed = Less Lead \(English\)](#)
- [California Department of Public Health: Buena Alimentacion = Menos Plomo \(Español\)](#)
- [EPA: Fight Lead Poisoning With a Healthy Diet \(English\)](#)
- [EPA: Fight Lead Poisoning With a Healthy Diet \(Español\)](#)
- [MDHHS Flint Water Response Team: Lead in Flint Water \(English\)](#)
- [MDHHS Flint Water Response Team: Lead in Flint Water \(Español\)](#)
- [MDHHS Additional Resources \(Multiple Languages\)](#)
- [Michigan State University Extension: Fight Lead With Nutrition \(English\)](#)

This document was prepared by Amy Schulz and Barbara Israel, Co-Investigators, and Carol Gray, Project Coordinator, of the Community Outreach & Engagement Core

The COEC promotes multi-directional communication among UM environmental health researchers, public health decision makers, and communities. Researchers work together to advance knowledge of environmental health issues that affect community members in Detroit and Southeast Michigan. More information can be found at www.ehsc.umich.edu, or by contacting Carol Gray, Project Coordinator, at (734) 764-8632 or ccbgray@umich.edu.