

# **PLANNING FOR ENHANCED DISEASE SURVEILLANCE AND ENVIRONMENTAL MONITORING IN FLINT, MICHIGAN**

## **Scope of Work**

The overall goal of this research led by Wayne State University (WSU), in collaboration with academic and other institutions, is to scientifically evaluate the distribution of environmental and other exposures associated with human illness in the City of Flint and Genesee County. This project will require a multi-phase and multi-disciplinary approach. The first phase (**PHASE I**) will be focused on assembling a full team of experts to properly evaluate this hypothesis and develop a detailed plan for enhanced disease and environmental surveillance that is anticipated to start on March 1, 2016.

**PHASE I** will consist of the following elements, with community engagement and outreach occurring throughout:

1. Engage with Flint residents, community leaders, government officials and technical experts
2. Review and fully execute data use and data sharing agreements with the Michigan DHHS, DEQ and other appropriate agencies
3. Review reports and data collected by the City of Flint, Genesee County and State of Michigan agencies including Michigan DHHS, DEQ, and other agencies as needed
4. Analyze existing data and laboratory specimens to further characterize what is known about the previous legionella cases.
5. Seek input and support from community leaders including cultural agents to maximize collaboration and partnerships with community members and identify sources of additional information in community.
6. Identify potential sources of human and environmental data for collection.
7. Develop plan for PHASE II investigation that will include human and environmental assessment.
8. Draft standard operating procedures (SOPs) for enhanced surveillance (PHASE II)
9. Complete application for institutional review (IRB) board approval for PHASE II study
10. Finalize resource and data sharing agreement with state and local governments required to complete PHASE II study
11. Finalize full team for PHASE II. This team will include additional collaborators outside the core-group of experts assembled for PHASE I. Collaborators will include others from MSU, UM and elsewhere, and may include experts from the city, county, state and federal government.

### **Deliverables:**

- April 15, 2016 – Full plan for 2016 enhanced surveillance program. Detailed scope of work for PHASE II.
- April 29, 2016 – SOPs for enhanced surveillance

**PHASE I Project Team:**

- Shawn McElmurry (PI), PhD, PE. WSU. Environmental engineer specializing in urban infrastructure and human health. Dr. McElmurry will lead the project
- Paul Kilgore (co-PI), MD, MPH. Co-PI, WSU. Expertise in public health, design and conduct of epidemiologic outbreak field investigations of bacterial and viral infectious agents.
- Mark Zervos, MD (co-PI). Head, Division Infectious Diseases, Henry Ford Health System. Expertise in clinical infectious diseases, hospital epidemiology, infectious disease research.
- Laura Sullivan, PhD (co-I). Kettering. Expertise in mechanical engineering. Dr. Sullivan will lead community outreach and engagement efforts in Flint.
- Matt Seeger, PhD (Co-PI). WSU. Extensive experience with the CDC developing risk and crisis communication systems. He will assist in community engagement and dissemination.