

▶ **DIRECT FROM CDC** ENVIRONMENTAL PUBLIC HEALTH TRACKING NETWORK

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## The Future of Environmental Public Health Tracking: 2020 and Beyond

**Editor's Note:** As part of our continuing effort to highlight innovative approaches and tools to improve the health and environment of communities, the *Journal* is pleased to publish a bimonthly column from the Centers for Disease Control and Prevention's (CDC's) Environmental Public Health Tracking Network (Tracking Network). The Tracking Network is a system of integrated health, exposure, and hazard information and data from a variety of national, state, and city sources. The Tracking Network brings together data concerning health and environmental problems with the goal of providing information to help improve where we live, work, and play.

Environmental causes of chronic diseases are hard to identify. Measuring amounts of hazardous substances in our environment in a standard way, tracing the spread of these over time and area, seeing how they show up in human tissues, and understanding how they may cause illness is critical. The Tracking Network is a tool that can help connect these efforts. Through these columns, readers will learn about the program and the resources, tools, and information available from CDC's Tracking Network.

The conclusions of this article are those of the author(s) and do not necessarily represent the views of CDC.

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In 2017, the National Environmental Public Health Tracking Program (Tracking Program) will mark its 15th anniversary. A lot has changed over the years—from the ways we do tracking to the people working in the program. I am relatively new to the Tracking Program, having started in March 2016. Even during my tenure, I have seen the program change and grow. It's ex-

citing to think about where the program will be in the next few months, and almost unimaginable to think about what it will be like in the next few years. The Tracking Program recently completed a strategic planning process to map out the goals, objectives, and strategies we want to accomplish by 2020. Before we get into that, let's look back at where we've been.

### A Brief History of Tracking

Data have been captured from federal, state, and local programs that track health, exposures, environmental hazards, and other risk factors. There has been huge progress in the amount and types of data collected, with great effort to validate and integrate these data to be used meaningfully by a diversity of users. The Tracking Program has grown and adapted to the changing public health landscape in response to this audience, including public health practitioners, researchers, consumers, and community members.

### Taking Environmental Public Health Tracking to 2020

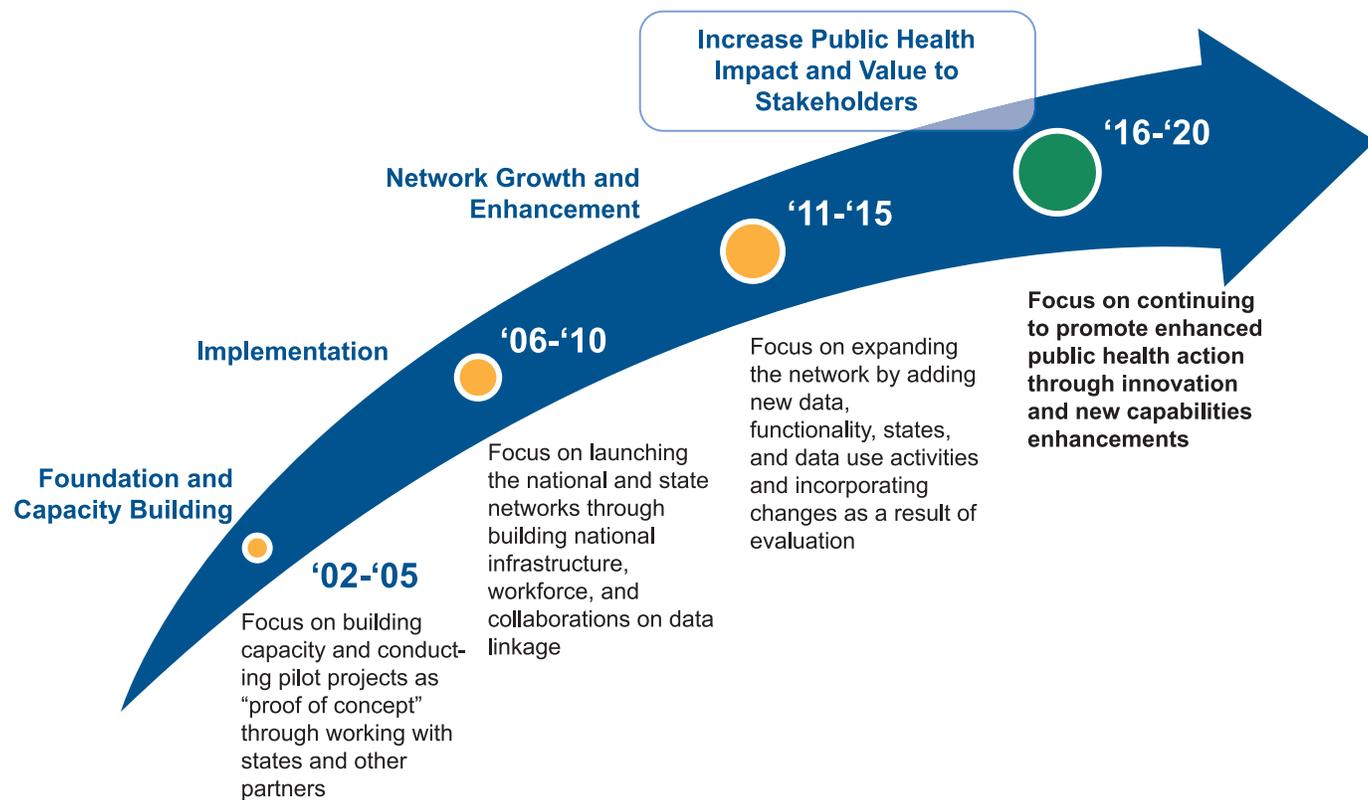
The Tracking Program is now well poised to advance the availability of the data, develop new analytic tools and methods, and improve dissemination of information. Accordingly, we are evolving technically and operationally to identify ways to better interact with our current stakeholders, as well as more nontraditional data users. For example, we are looking at how we can deliver data and information to this diverse audience to help enable public health action. We are figuring out how these data can be used to help advance the public health science agenda to support and inform not only national questions and policies, but also support the needs of independent investigators who bring innovative analyses and perspectives.

### Tracking Program Strategic Framework

Our new five-year strategic plan will help us transition into this next phase and help

FIGURE 1

**Evolution of the National Environmental Public Health Tracking Program and Focus for 2016–2020**



guide the program’s efforts throughout. Over the next five years, we will apply a strategic framework to help align, integrate, and prioritize Tracking Program activities, encourage innovation and promote greater operational efficiency, and increase collaboration within and across the tracking community. We developed three pillars—science and content, technology and informatics, and awareness and impact—to help define the Tracking Program’s plans to address these activities.

**Science and Content**

The focus of this pillar is to deliver relevant and actionable scientific content that addresses key environmental public health priorities and needs. Given the breadth and progress in environmental health science and public health practice, the program

must be thoughtful in both identifying key environmental health issues and anticipating emerging threats to ensure that the translation of science into health action is timely and relevant. Thus, the program will work with key stakeholders to establish a science to action agenda that provides clear direction and prioritizes key environmental health issues and surveillance questions that should be addressed. Development of this agenda and establishing supporting processes will help the program to maximize its limited resources on priority surveillance questions.

**Technology and Informatics**

We work to identify opportunities to modernize technologies and data analytics tools used by the Tracking Network and improve processes to efficiently generate and deliver

data and information to stakeholders. With the rapid changes in information technology, tools, and data analyses methodology, and as the size of the Tracking Network expands, opportunity abounds to analyze increasingly complex and granular datasets. Furthermore, the resulting insights and information gleaned from the data must be presented and delivered to a broad range of end users in ways that are meaningful, timely, and relevant. Identifying new software tools and enhancing functionality will help make the data more accessible to a wider audience and promote its usage.

**Awareness and Impact**

Key objectives of the Tracking Program on public health are to improve our understanding of the link between health and the environment, drive changes in public health

practice, guide community-level interventions, and support policy and decision making. As there are a diverse set of stakeholders, a broad range of topics covered, and various methods for delivering content, identifying innovative approaches to communicate information and data that are of value to individual stakeholders are important to increase awareness, expand usage, and enhance utility of the Network.

Foundational to these three pillars is the program capacity that supports the network of environmental health practitioners at federal, state, and local levels. The infrastructure also supports the creation of an effective workforce as the future success and impact of the Tracking Program depends on a strong foundation of talented and dedicated people. Over the next five years, in addition to attracting new talent, the Tracking Program will focus on opportunities to enhance the technical capabilities of the existing workforce and promote development and growth of the next generation of leaders in environmental public health.

Evaluating program impact and performance is a critical need so that ways can be found to better capture the value and impact of the Tracking Program's scientific pursuits, data products, and methods of delivery on effectively responding to stakeholder needs. This information will enable the Tracking Program to monitor the effectiveness of key activities, assess the degree of impact on public health outcomes, and adjust efforts as needed.

**Beyond 2020**

With the new strategic plan in place, we are working closely with the tracking community of funded state and local health departments to position the Tracking Program to be the leader in environmental public health surveillance for the U.S. As we expand our capacity and promote evidence-based practice, we aim to increase our contribution to the health of our nation.

What does the future hold for tracking? No one knows for certain. If past performance and implementation of strategic plans make

good indicators, however, I predict a bright and successful road ahead. 🐘

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# Thank You!

The *Journal* would like to thank the Centers for Disease Control and Prevention's Environmental Public Health Tracking Program and all the authors that have contributed to the tracking columns published in the *Journal* since 2014. The information shared through these columns has been invaluable. The column will be going on sabbatical in 2017, but we hope to bring it back in 2018.