Food Safety Program Successes in Providing the 10 Essential Environmental Public Health Services

Editor’s Note: NEHA strives to provide up-to-date and relevant information on environmental health and to build partnerships in the profession. In pursuit of these goals, we feature a column from the Environmental Health Services Branch (EHSB) of the Centers for Disease Control and Prevention (CDC) in every issue of the Journal.

In these columns, EHSB and guest authors share insights and information about environmental health programs, trends, issues, and resources. The conclusions in this column are those of the author(s) and do not necessarily represent the official position of CDC.

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Most state and local health departments in the U.S. have food safety programs that deliver important services such as food safety education, restaurant inspections, and investigations of foodborne illness outbreaks (Association of State and Territorial Health Officials, 2014; National Association of County and City Health Officials, 2016). In 2016, the Centers for Disease Control and Prevention’s (CDC) National Center for Environmental Health surveyed local and state food safety programs to learn how they use and apply the 10 Essential Environmental Public Health Services (Table 1) that programs should provide to protect and improve environmental health (CDC, 2014, 2017).

We surveyed every state department of health’s food safety program and a random sampling of food safety programs at local health departments. The survey asked program respondents to identify the

- 10 essential services their food safety program provided,
- three services they thought were most important for their program to provide, and
- resources that could help their food safety program provide better services to the public.

Almost 18% (87) of the surveyed programs responded to the survey. Although this response rate was low, the data provide some insight into the status of the 10 Essential Environmental Public Health Services provided by food safety programs and the resources needed for increasing capacity.

Essential Services Provided

Most survey respondents said their programs provided the following essential services (Figure 1):

- Essential Service 6: Enforce laws and regulations that protect environmental public health and ensure safety (98%); and
- Essential Service 3: Inform, educate, and empower people about environmental public health issues (90%); and
- Essential Service 8: Assure a competent environmental public health workforce (85%).

About only half of the programs, however, reported providing the following essential services (Figure 1):

- Essential Service 1: Monitor environmental and health status to identify and solve community environmental public health problems (55%); and
- Essential Service 9: Evaluate effectiveness, accessibility, and quality of personal and population-based environmental public health services (53%); and
- Essential Service 4: Mobilize community partnerships and actions to identify and solve environmental health problems (51%); and
- Essential Service 10: Research for new insights and innovative solutions to environmental public health problems (48%).

Most Important Essential Services to Provide

When asked which three essential services they rated as most important for their programs to provide to the public, respondents most frequently listed the following (Figure 1):

- Essential Service 6: Enforce laws and regulations that protect environmental public health and ensure safety (85%); and
- Essential Service 3: Inform, educate, and empower people about environmental public health issues (68%); and
- Essential Service 8: Assure a competent environmental public health workforce (68%).

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TABLE 1
10 Essential Environmental Public Health Services

<table>
<thead>
<tr>
<th>Essential Service</th>
<th>Description</th>
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<tbody>
<tr>
<td>1</td>
<td><strong>Monitor</strong> environmental and health status to identify and solve community environmental public health problems.</td>
</tr>
<tr>
<td>2</td>
<td><strong>Diagnose and investigate</strong> environmental public health problems and health hazards in the community.</td>
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<tr>
<td>3</td>
<td><strong>Inform, educate, and empower</strong> people about environmental public health issues.</td>
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<tr>
<td>4</td>
<td><strong>Mobilize</strong> community partnerships and actions to identify and solve environmental public health problems.</td>
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<tr>
<td>5</td>
<td><strong>Develop</strong> policies and plans that support individual and community environmental public health efforts.</td>
</tr>
<tr>
<td>6</td>
<td><strong>Enforce</strong> laws and regulations that protect environmental public health and ensure safety.</td>
</tr>
<tr>
<td>7</td>
<td><strong>Link</strong> people to needed environmental public health services and assure the provision of environmental public health services when otherwise unavailable.</td>
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<tr>
<td>8</td>
<td><strong>Assure</strong> a competent environmental public health workforce.</td>
</tr>
<tr>
<td>9</td>
<td><strong>Evaluate</strong> effectiveness, accessibility, and quality of personal and population-based environmental public health services.</td>
</tr>
<tr>
<td>10</td>
<td><strong>Research</strong> for new insights and innovative solutions to environmental public health problems.</td>
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- Essential Service 8: Assure a competent environmental public health workforce (49%).
- Essential Service 7: Link people to needed environmental public health services and assure the provision of environmental public health services when otherwise unavailable (8%);
- Essential Service 4: Mobilize community partnerships and actions to identify and solve environmental public health problems (6%);
- Essential Service 9: Evaluate effectiveness, accessibility, and quality of personal and population-based environmental public health services (6%); and
- Essential Service 10: Research for new insights and innovative solutions to environmental public health problems (5%).

**Provision of Better Services**

When asked which three resources could help their food safety program provide better services to the public, more than half of the respondents identified the following (Figure 2):
- receiving financial resources (70%),
- training of existing staff (69%),
- acquiring information technology (e.g., more computers) (53%), and
- recruiting new staff or staff with specialized skills (52%).

**Summary**

The majority of the programs we surveyed provided the same three essential services. The majority of programs also rated these same three services as most important to provide, indicating that food safety programs are deploying their resources where they think they are most needed. There were, however, four essential services that about only half of the surveyed food safety programs provided, suggesting that food safety programs might not have the ability to provide all 10 essential services.

Our data provide some insight into why food safety programs might not be able to provide all 10 essential services. Over half of program respondents said that additional resources in the areas of finances, training of existing staff, acquiring information technology, and recruiting new or skilled staff would be important in helping them provide better services to the public.
Individual food safety programs may wish to consider using the Environmental Public Health Performance Standards to conduct an in-depth self-assessment of their delivery of the 10 Essential Environmental Public Health Services (CDC, 2014). Safe drinking water and vector control programs have used this assessment framework to identify strengths and weaknesses associated with their provision of the essential services (Gerding et al., 2016; Lamers & Hubbard, 2017). The assessment results can provide valuable information for planning and implementing performance improvement projects to increase the effectiveness and efficiency of services.

Additionally, the 10 Essential Environmental Public Health Services are incorporated into the Public Health Accreditation Board’s standards (Public Health Accreditation Board, 2014). Food safety programs at health departments that are preparing for accreditation or are already accredited could realize benefits by improving their performance of the 10 essential services and contributing to their health department’s accreditation efforts. To learn more about the 10 Essential Environmental Public Health Services and performance improvement, please visit www.cdc.gov/nceh/ehs/activities/performance.html.

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References

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