

Each issue, we ask members of the *On Tap* Editorial Advisory Board to answer a drinking water-related question. We then print as many responses as space permits. The opinions expressed are not necessarily those of NESCA.



Editor's Note: This issue, we're giving our regular panel of experts a well-deserved rest. Instead, we've posed a question to leaders of several organizations dealing with drinking water issues. We'll return with our regular panelists in the Winter *On Tap*.

The idea of resilience takes the notion of security beyond terrorist attacks on our infrastructure to incorporate anything that could disrupt vital public services such as those provided by drinking water and wastewater systems. A resilient community is better able to maintain continuity of operations in the face of human-made and natural disasters, energy crises, pandemics, climate change, and an unstable economy.

Q: *With the prospect of a new federal administration, what do we still need to do, as a nation, to attain community resilience, and what role do you see for your organization and others?*



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Planning, Education, Implementation

The Association of State Drinking Water Administrators (ASDWA) believes that there are three principal national needs in the area of resiliency: (1) undertake planning and training, (2) conduct education and outreach, and (3) integrate water security into our everyday public health protection activities.



At each level of government, we need to plan and train about effective, coordinated response and recovery so that we are collectively ready when we respond to the aftermath of a disaster. While community water systems must receive attention first, we should also encourage non-transient non-community and transient non-community systems to conduct vulnerability assessments and emergency response plans, especially for places like hospitals that could be a target for contamination.

Next, we need a public education and outreach program that explains the value of safe, potable water and the consequences of doing without. An educated public can both support the resiliency efforts of public officials as well as undertake individual measures that help, rather than hinder, our collective efforts.

Finally, we need to reinforce the connections with and benefits of integrating water security into implementation of the public health protection elements of the Safe Drinking Water Act (SDWA).

Three principal roles that organizations and state drinking water programs can play are:

1. Supporting water systems in their efforts to be resilient. The concepts that underlie resilience are synonymous with the SDWA goal of public health protection as well as with state primacy agency responsibilities to facilitate and support water utility security. One of the key ways that states can assist utilities is to support WARN [Water-Wastewater Agency Response Networks] systems within their states.
2. Sharing information with states and partner organizations that support resilience and a resilience culture. Rapid and effective communications are key in this effort. States should continue to build and exercise effective communication trees. Currently, ASDWA serves as a nexus for sharing information, tools, training, and strategies.
3. Sharpen the resilience saw. ASDWA is working to take full advantage of partnering opportunities in the water community to support identified needs for education, training, tools, outreach, and collaboration in the water security arena.



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Invest in Human Infrastructure

A community's resilience cannot be determined by its size, location, or the extent of its resources or wealth. It is more a reflection of the human capital within the community. Whether faced with an emergency, (such as a natural disaster) or a rapidly escalating environmental or economic condition (such as contamination of the water source), community awareness and cohesion, as well as a shared sense of purpose and direction, become a necessary foundation when responding to unforeseen circumstances. Working together effectively to address community needs during normal times provides the tools needed to respond to emergency situations or other unforeseen developments.

An awareness of a community's strengths, weaknesses, and future challenges is an important hallmark of resiliency. Care should be taken not to overly concentrate resources or expectations. As a nation, we are faced with the seemingly inexplicable belief that fossil fuels are limitless. This over-reliance reduces our resiliency when these energy sources become scarcer and therefore more expensive. The same holds true for water resources at the local level where for too long its availability and quality have been taken for granted.

Often, resiliency requires some cost-conscious redundancy. Communities are vulnerable when, for instance, there is only one person who can operate the water or wastewater systems. Critical repair parts and supplies should also be available within the utility or community or a plan must be in place about how to quickly access these items. To address these vulnerabilities, utilities should foster relationships with neighboring utilities to allow sharing of resources during critical times. Understand those areas where a community should strive for self-sufficiency versus those areas where interdependence with other entities or organizations is most effective.



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