Water Security Division Products and Services List

The U.S. Environmental Protection Agency’s (USEPA) Water Security Division (WSD) has developed a robust suite of products and services to improve the resilience of the water sector to all types of hazards. WSD resources can be found at epa.gov/waterresilience. Direct links to specific tools and resources are provided below.

Products are organized by topic: Assess Risks, Emergency Preparedness, Risk Communication, Laboratory Support, Mutual Aid and Assistance, Training and Exercises, Emergency Response and Recovery. The following product, Route to Resilience, incorporates the critical stages of resiliency and can assist water and wastewater utilities locate the appropriate services to fulfill their needs.

**Route to Resilience (RtoR)**

RtoR assists small and medium sized drinking water and wastewater utilities learn more about becoming resilient to all-hazards. The interactive desktop application guides utilities through five stops along the Route to Resilience – Assess, Plan, Train, Respond and Recover – and provides users with a custom report that highlights specific products and tools.

---

**Assess Risks**

Risk assessment tools can assist water and wastewater utilities in identifying potential threats and vulnerabilities.

- **Vulnerability Self-Assessment Tool (VSAT)** – VSAT assists utilities in assessing the potential impacts from both man-made and natural disasters and provides actions to enhance security and resilience.
- **Water Health and Economic Analysis Tool (WHEAT)** – WHEAT helps utility owners and operators to better understand the human health and economic consequences of potential disasters.
- **Water Quality Surveillance and Response System (SRS)** – SRS helps drinking water utilities detect and respond to water quality problems – including contamination – in their distribution system or source water.
- **Online Source Water Quality Monitoring for SRSs** – This document provides guidance for designing a real-time source water quality monitoring system to inform treatment process optimization, detect source water contamination and monitor long-term threats to source water quality.

---

**Emergency Preparedness**

Water and wastewater utilities can build resilience by planning for emergencies before they occur. WSD has developed both hazard-specific and generalized products to help utilities prepare for disasters.

- **Emergency Response Plan Guidance for Small and Medium Community Water Systems** – Small and medium utilities can use this guidance to assist in developing or revising their Emergency Response Plans (ERPs).
- **Flood Resilience Guide** – This easy-to-navigate guide helps drinking water and wastewater utilities understand local flooding threats and identify practical solutions to protect critical assets.
- **Drought Response and Recovery Guide** – This user-friendly guide and accompanying case studies help drinking water and wastewater utilities identify key
drought preparedness and response actions to address both short-term drought impacts and long-term drought resilience.

- **Power Resilience Guide** – This interactive guide assists water and wastewater utilities in identifying and implementing key actions to improve resilience to power outages.

- **Containment and Disposal of Large Amounts of Contaminated Water** – A guidance document that assists utilities in treating and handling contaminated water within their systems resulting from a contamination event.

## Risk Communication

Communicating with the public prior to and during an emergency can help to mitigate public health and economic impacts.

- **Water Utility Public Awareness Kit** – This kit includes customizable print, web, and video materials that drinking water and wastewater utilities can use to inform customers about the value of water services, threats to water systems and actions that households can take to prepare for service disruptions.

- **Developing Risk Communication Plans for Drinking Water Contamination Incidents** – This document helps utilities develop and implement an effective Risk Communication Plan (RCP) to respond to drinking water contamination incidents.

- **Community-Based Water Resiliency (CBWR) Tool** – This downloadable tool allows utilities and community members to assess the community's resilience to water service disruptions and describes tools and resources that can be used to enhance resilience.

## Laboratory Support

Laboratories provide vital emergency response services during a contamination incident.

- **Water Laboratory Alliance (WLA)** – WLA is a nationwide network of laboratories that serves the water sector. WSD has developed resources that help laboratories and utilities respond to water contamination events involving chemical, biological and radiochemical contaminants. Specific WSD products for laboratory support include:
  - **WLA Toolkit** – This document serves as an introduction to EPA resources – such as fact sheets, guidance documents and other tools – that may be beneficial to your laboratory or organization.
  - **WLA Response Plan** – This document outlines processes and procedures that can help individuals lead a coordinated laboratory response during water contamination incidents.
  - **Water Laboratory Continuity of Operations Plan (COOP)** – Laboratories can prepare for continued service during an emergency by developing a Continuity of Operations Plan, using available templates and instructions.
  - **Accessing Laboratory Support Tool** – An interactive guide that shows users how to obtain support at the local, state, regional and federal levels. It provides tips, references and a one-page summary resource.
- **Sampling Guidance for Unknown Contaminants in Drinking Water** – This document provides recommended procedures for the collection, storage, preservation and transportation of potentially contaminated water, as well as monitoring, detection and identification recommendations.

- The WLA also provides several free webinar trainings throughout the year covering these and many other resources. To learn what is currently available for registration, please visit this [WSD training page](#).

- **Guidance for Building Laboratory Capabilities to Respond to Drinking Water Contamination** – This document provides guidance for water utilities wishing to build laboratory capabilities for response to water contamination. It identifies contaminant classes of concern, lists analytical methods and provides information on the role of laboratory networks in responding to contamination.

- **Guidance for Building Field Capabilities to Respond to Drinking Water Contamination** – This document provides guidance to help water utilities plan for sample collection, water quality parameter testing and other field activities during the response to a contamination incident.

---

**Mutual Aid and Assistance**

During an emergency, “utilities helping utilities” can be an efficient way to access needed resources.

- **Water and Wastewater Agency Response Network (WARN) Resources** – WARNs provide water and wastewater utilities with the means to quickly obtain help – such as personnel, equipment, materials and associated services – from other utilities during an emergency. WSD has developed videos, guidance documents and model agreements to help water and wastewater utilities build or strengthen their mutual aid and assistance networks.

---

**Training and Exercises**

Training and exercises provide utilities with opportunities to learn more about resilience and practice response actions.

- **Water/Wastewater All Hazards Boot Camp Training: Emergency Planning, Response, and Recovery** – This interactive, computer-based training course provides users with the fundamentals of water sector resilience and resources for a comprehensive all-hazards program. The training is approved for operator continuing education credit in some states.

- **Tabletop Exercise (TTX) Tool for Water Systems** – This downloadable tool helps utilities plan and facilitate tabletop exercises using an all-hazards approach to emergency preparedness and response.

- **SRS Exercise Development Toolbox (EDT)** – This downloadable tool guides users through the steps of developing exercises with realistic contamination scenarios. Users enter information into the program, and the tool will generate documents for use in a discussion- or operation-based exercise.

- **WARN Tabletop Exercise Facilitator Guide** – This document provides instructions for planning, organizing and conducting a tabletop exercise to create or update a WARN operational plan or agreement.
- **Incident Command System (ICS) Refresher Trainings** – Designed specifically for water and wastewater utility personnel, these recorded training webinars provide viewers with an overview of the ICS.

- **Water Quality Surveillance and Response Training** – A series of webinars that provide practical recommendations for improving a drinking water utility’s ability to detect and respond to a water contamination incident.

---

**Emergency Response**

Water and wastewater utilities can use these tools to improve response to an emergency.

- **Water Utility Response On-The-Go (OTG) Mobile Website** – Utility personnel can access this mobile site from their smart phones. Response OTG enhances disaster response by providing easy access to severe weather information, key emergency contacts, emergency checklists, damage assessment forms and ICS resources.

- **Water Sector Incident Action Checklists** – These simple, concise checklists provide key actions to take before, during, and after a natural disaster, including drought, extreme heat and cold, tornadoes, wildfires, earthquakes, flooding, tsunami, hurricanes, volcanic activity, cybersecurity and harmful algal blooms.

- **Water Contaminant Information Tool (WCIT)** – WCIT is a secure (registration required) database with information on over 800 drinking water and wastewater contaminants including pathogens, pesticides and toxic industrial chemicals. During a contamination incident, WCIT can aid in decision-making by providing vital contaminant information.

---

**Recovery**

Following an emergency, drinking water and wastewater utilities can use these resources to assist in recovery.

- **Federal Funding for Utilities in National Disasters (Fed FUNDS)** – Fed FUNDS is a collection of resources and information for federal disaster funding programs intended for water and wastewater utilities.

- **Public Assistance for Water and Wastewater Utilities in Emergencies and Disasters**
  This short document provides information about water and wastewater utilities’ eligibility for disaster funds under the Federal Emergency Management Agency’s (FEMA’s) Public Assistance Grant Program.

- **Reimbursement Tips for Water Sector Emergency Response and Recovery** – This short document provides simple tips that drinking water and wastewater utilities can use to maximize reimbursement through local, state or federal level mechanisms.

- **Hazard Mitigation for Natural Disasters: A Starter guide for Water and Wastewater Utilities** – This user-friendly guide assists water and wastewater utilities on how to mitigate against the impacts of natural disasters and encourages collaboration with local mitigation planners to implement priority projects using FEMA or other funding sources.