



October 5, 2023

The Honorable Brad Little  
Governor of Idaho  
P.O. Box 83720  
Boise, Idaho 83720-00345

RE: Triennial Drinking Water Capacity Development Report

Dear Governor Little:

The Safe Drinking Water Act amendments of 1996 directed states to develop a capacity development strategy for assisting public water systems in improving their technical, financial, and managerial capacity. The 1996 amendments also require the Idaho Department of Environmental Quality (DEQ) to provide a capacity development report to the Governor every three years. Enclosed is a report summarizing many of the activities and work accomplished toward improving the technical, financial, and managerial capacities of Idaho public drinking water systems for fiscal years 2021 through 2023.

Since 1996, DEQ's Drinking Water Bureau, in partnership with other service providers, has worked closely with public water system owners and operators across the state to maximize training opportunities and increase awareness regarding information critical to successfully operating their water systems. The ultimate goal of the capacity development program is to ensure that public water systems have adequate capacity to reliably deliver safe drinking water to meet current and future needs.

DEQ's efforts continue to produce successful and measurable outcomes throughout Idaho. Implementing the capacity development strategy provides Idahoans with the following benefits:

- On-line tools to assist water system operators in building their capacity.
- One-on-one training during sanitary surveys.
- Training events throughout the state at locations convenient to water system operators.
- Opportunities for partnerships between water system operators.
- Improved compliance by providing auto-dialer notifications for important reminders.
- Standardized inspections by qualified inspectors with timely feedback to system operators.

- Planning grant assistance for facility planning projects designed to ensure safe and adequate supplies of drinking water.

Continuing these efforts and expanding partnerships will ensure that public water systems across Idaho reliably provide safe drinking water.

Sincerely,

A handwritten signature in blue ink that reads "Jess Byrne". The signature is fluid and cursive, with the first name "Jess" being more prominent than the last name "Byrne".

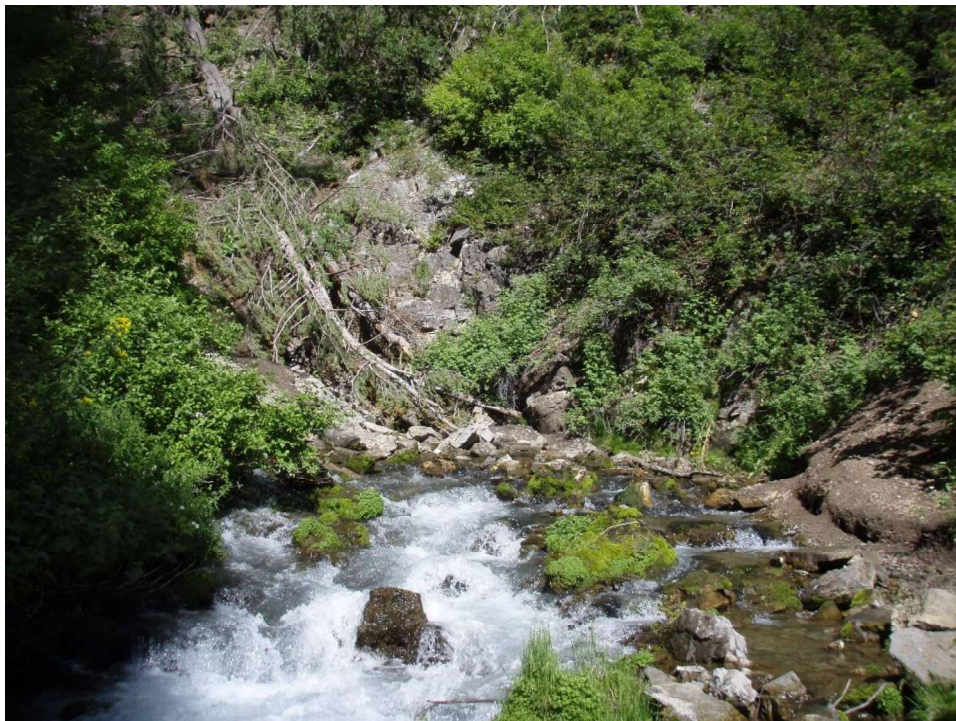
Jess Byrne  
Director

Attachment(s): 1

EDMS number 2023ABI55

# Triennial Drinking Water Capacity Development Report to the Governor

**State Fiscal Years 2021–2023**



**State of Idaho**  
**Department of Environmental Quality**



September 2023

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DEQ, September 2023, Costs associated with this publication are available from the State of Idaho Department of Environmental Quality in accordance with Idaho Code § 60-202.

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## Acronyms

ARPA	American Rescue Plan Act
CCR	Consumer Confidence Report
CEUs	Continuing Education Units
DEQ	Idaho Department of Environmental Quality
DWSRF	Drinking Water State Revolving Fund
EPA	US Environmental Protection Agency
ETT	Enforcement Targeting Tool
IDOPL	Idaho Division of Occupational and Professional Licenses
IRWA	Idaho Rural Water Association
IdWARN	Idaho Water and Wastewater Agency Response Network
O & M	Operation and Maintenance
PIFF	Preliminary Inspection Findings Form
PFAS	Per-and Polyfluoroalkyl Substances
PWS	Public Water System
RCAC	Rural Community Assistance Corporation
RTCR	Revised Total Coliform Rule
SDWA	Safe Drinking Water Act
SDWIS	Safe Drinking Water Information System
SMART	Smart Management Financial Tool
TFM	Technical, Financial, and Managerial

## Executive Summary

Maintaining overall public drinking water system capabilities is essential to operating a safe and reliable public drinking water supply. Idaho Department of Environmental Quality’s (DEQ’s) capacity development program focuses resources on the areas of highest public health benefits and promotes voluntary compliance with drinking water standards. The program emphasizes prevention of drinking water contamination by ensuring system owners and operators are equipped with the necessary technical, financial, and managerial (TFM) capabilities to succeed. The program also provides technical assistance to public water systems (PWS) owners and operators and promotes water system operator training and licensing.

The capacity development program, along with other state resources, has continued to help PWS owners acquire or maintain the TFM abilities needed to properly design, operate, finance, and manage their systems. DEQ’s goal is to continue to improve the ability of Idaho’s PWS owners to provide safe and reliable drinking water.

Fiscal years 2021 – 2023 achievements of the DEQ Capacity Development Program:

1. Updated Capacity Development Strategy:
  - DEQ revised Idaho's Capacity Development Strategy. This update provides a structured framework to help Public Water Systems (PWSs) acquire and maintain the necessary Technical, Financial, and Managerial (TFM) capacity.
  - The strategy also emphasizes the importance of developing asset management plans, which contributes to long-term success, improved service quality, and reliability for the public they serve.
2. Revised Guidance: Demonstrating Technical, Managerial, and Financial Capacity in New PWSs:
  - The program updated the guidance document designed to assist new or significantly modified public water systems. This document clarifies the requirements for demonstrating adequate TFM capacity, benefiting owners, operators, and consultants in understanding the necessary steps to meet these requirements.
3. Enhanced Public Water System Switchboard:
  - Improvements were made to the public water system switchboard. It now offers more valuable information to PWSs, including insights on cybersecurity, water loss reduction, asset management practices, water system resiliency, and emergency response. The information covers a broad spectrum of information including preparedness for flooding, drought, wildfires, earthquakes, and power outages.
4. Developed Drinking Water Operation and Maintenance Manual Outline:
  - The operation and maintenance (O & M) manual outline is designed to assist PWSs in the development of an O & M manual. This outline aligns with the drinking water state revolving fund (DWSRF) operation and maintenance checklist and the O & M checklist from the TFM guidance document.
5. Enhanced Financial/Managerial Checklist in Sanitary Surveys:



- DEQ revised the Financial/Managerial checklist within the electronic sanitary survey. These improvements are aimed at providing a more accurate assessment of water system capacity, ensuring that PWSs are meeting the necessary criteria.

These accomplishments reflect the DEQ Capacity Development Program's commitment to supporting and improving Public Water Systems in Idaho over the past three fiscal years.

# 1 Introduction

As the state’s primacy agency for implementing the Safe Drinking Water Act (SDWA), the Idaho Department of Environmental Quality (DEQ) is required to develop a capacity development strategy that addresses the technical, financial, and managerial (TFM) needs of Idaho’s public water systems (PWSs). The primary goal of the capacity development program is to protect public health by improving the TFM capacity of water systems.

Every three years, the United States Environmental Protection Agency (EPA) requires the state to submit a capacity development report to the governor, as required by Section 1420(c)(3) of the SDWA. This document fulfills the reporting requirement for state fiscal years 2021-2023.

This report provides an overview of the capacity development program and the efforts the State is making to ensure public water systems can sustainably provide safe drinking water.

## 2 Capacity Development Program

Idaho’s capacity development program helps PWS owners strengthen their ability to consistently supply safe drinking water to their customers. The program achieves this goal by helping PWS owners and operators (with an emphasis on small systems) improve their *technical abilities*, *financial capabilities*, and *managerial skills* to comply with SDWA requirements.

- *Technical abilities* refer to the adequacy, operation, and maintenance of a drinking water system’s infrastructure (e.g., water source, water treatment, storage, and distribution network).
- *Financial capabilities* refer to the monetary resources available to a public drinking water system owner to support the cost of operating, maintaining, and improving the system.
- *Managerial skills* refer to the expertise required of owners and operators who oversee the drinking water system operations.

The capacity development program is federally funded through funds set aside from the EPA Capitalization Grant of the Drinking Water State Revolving Fund (DWSRF), which was authorized under the 1996 SDWA amendments.

Infrastructure assets, reliability in operation, management, and fiscal long-term sustainability require a sustained and collaborative technical assistance effort. An effective capacity development program combines a variety of resources to enhance public health protection, provide accountability, and assist PWSs to have the capability to consistently provide safe drinking water.

## 2.1 Factors that Encourage Capacity

### *Regulatory*

- **SDWA and the “Idaho Rules for Public Drinking Water Systems” (IDAPA 58.01.08)**—Water systems that meet these regulatory requirements demonstrate capacity.
- **Sanitary Survey Inspections**—These inspections assess the TFM capacity of a water system and identify areas in need of improvement.
- **Operator Certification**—Certified or licensed operators are a critical part of ensuring that PWSs are managed in a manner that provides an adequate, reliable, and safe supply of water. Water systems operated by properly licensed operators demonstrate a higher level of capacity compared to systems without licensed operators.

### *Institutional*

- **Third-Party Technical Assistance**—Assistance is available to water systems for a variety of capacity-related issues. Third-party assistance providers include the Idaho Rural Water Association (IRWA) and Rural Community Assistance Corporation (RCAC). These providers help PWSs implement changes to address significant deficiencies and assist operators with managing their systems.
- **Source Water Protection Plans**—Systems that adopt source water protection strategies will protect their capital investment in system infrastructure and minimize source water quality problems, which may lead to reduced monitoring and treatment costs.
- **Public Water System Switchboard and Guidance Documents**—The switchboard provides resources to assist water systems with assessing and maintaining capacity.
- **Training**—Properly trained water system staff are critical for delivering safe and reliable drinking water and protecting public health. DEQ maintains an online training calendar for PWS operators to easily access and identify upcoming operator training resources.

### *Financial*

- **Drinking Water State Revolving Fund (DWSRF)**—The DWSRF is an important resource for TFM capacity. Financial assistance, including below-market rate loans, planning grants, longer loan terms, and, for qualifying systems, principal forgiveness, aid PWSs with construction of cost-effective drinking water facilities and development of multiyear planning assessments. The DWSRF, DWSRF set asides, and continued funding for state public drinking water programs improve the capacity of PWSs.
- **SMART Management Financial Tool**—This tool, which is located on DEQ’s PWS Switchboard is designed to assist water systems with assessing overall financial health, this tool guides a water system through a series of questions about operating revenues, expenses, assets, liabilities, debts, reserves, and user fees. Based on these entries, the tool provides an indication of poor, fair, or excellent financial health.

## 2.2 Prioritizing Capacity Development Assistance

DEQ’s capacity development program focuses on owners of small PWSs efforts (i.e., those serving 3,300 or fewer customers), which are more likely to have difficulty complying with federal and state drinking water standards. Small PWSs face the greatest difficulty in managing the multiple aspects of their system. Communities with small customer bases often lack the revenues needed to hire experienced managers and operators or to maintain and upgrade their drinking water facilities. Interruptions in water service and violations of drinking water standards are often problems for small drinking water systems that lack adequate TFM capacity.

Assistance is available to all PWSs in need and willing to work with DEQ or its partners in achieving compliance. Capacity development efforts are directed towards providing the necessary tools to assist PWSs in maintaining compliance and protecting public health.

To identify systems in greatest need of assistance, the following information is utilized:

- **Compliance Data**—The observation of compliance trends on a statewide basis are indicators of water systems needing TFM assistance. Data entered in the Safe Drinking Water Information System (SDWIS) is queried daily through an automated system. If an exceedance of a maximum contaminant level or trigger level is detected, an automated “Exceedance Notification” email is sent to DEQ staff to ensure appropriate follow-up actions are taken. The maximum contaminant level is the highest level of a contaminant that is allowed in drinking water. The trigger level is a value when achieved or exceeded, requires a specific action be taken by the PWS.
- **Enforcement Targeting Tool (ETT)**—This EPA tool helps states identify PWSs with violations that rise to a level of significant noncompliance by focusing on systems with health-based violations and those that show a history of violations across multiple rules. Health-based violations are reviewed by DEQ staff monthly to proactively address these violations and assist PWSs in their goal to serve water that meets all health-based standards. Proactive work on health-based violations may also prevent water systems from being placed on the ETT list. Through proactive review of health-based violations, resources can be targeted to address those PWSs determined to have the most significant problems.
- **Sanitary Surveys**—Every three to five years, all PWSs have an on-site inspection and evaluation of their water sources, treatment, storage, distribution system, facilities, operation and maintenance, and overall management and financial capacity to provide safe water. Comprehensive sanitary surveys continue to be a fundamental public health protection tool for assessing, evaluating, and documenting the TFM capacity of PWSs throughout the state. The surveys assist owners and operators in both short and long-term planning activities associated with their systems.

- **System Operations**—PWSs need a licensed operator that understands the system’s technical and operational features, knows the national primary drinking water regulations, and implements the system’s operation and maintenance plan.
  - Systems lacking a qualified licensed operator often need capacity development assistance.
  - On a quarterly basis, compliance with operator licensing requirements is evaluated, and water systems are notified of any operator licensing issues.
- **Tracking facility plans, water system improvements, and DWSRF loan applications**—Data tracked through these submittals reflect capacity needs and help measure improvements.

### 2.3 Additional Ways to Prioritize Assistance

- **Source Water Protection Plans**—Source water protection plans outline steps to prevent contamination of the source water that supplies a PWS. Source water protection is a voluntary effort to minimize problems that can occur from contaminants in the water supply. The Source Water Protection Planning Tool helps PWSs develop source water protection and emergency response plans to assist water systems with TFM capacity requirements.
- **Monitoring Schedules and Results**—Monitoring schedules assist PWS owners and operators in maintaining compliance with drinking water requirements. Monitoring results often reflect trends that indicate capacity issues and the need for oversight and assistance.
- **Sample Site Plans**—Sample site plans specify where in the water system samples will be collected to ensure they are representative of water quality throughout the water system. Sample site plans help determine if a water system is operating properly and the water meets drinking water standards.
- **Level 2 Site Assessments**—Water systems must conduct assessments following sample results showing coliform bacteria, in accordance with the Idaho Rules for Public Drinking Water Systems. DEQ staff conduct Level 2 Site Assessments following an *E. coli* maximum contaminant level (MCL) violation. These assessments are used to identify sanitary defects or issues that led to the violation and recommend corrective actions to resolve the issue.

### 3 New and Existing Public Water Systems

The capacity development program focuses on helping new and existing PWSs accomplish the following:

- Ensure new and existing community water systems<sup>1</sup> and non-transient, non-community water systems<sup>2</sup> are viable by providing guidance and technical review.
- Provide safe drinking water by maintaining compliance with rules and regulations through provision of timely information and technical assistance to owners and operators.
- Ensure public water systems are operated by qualified personnel by requiring properly licensed operators.

#### 3.1 Ensure new and existing community water systems and non-transient non-community water systems are viable by providing guidance and technical review

##### *New Water Systems*

Before owners of new PWSs can begin construction and operation, a comprehensive review of requirements in the “Idaho Rules for Public Drinking Water Systems” (IDAPA 58.01.08.500) is made to ensure the water system owner/operator/developer demonstrates that ongoing TFM capabilities are achievable.

The rules state that “No person shall proceed, or cause to proceed, with construction of a new or substantially modified community or non-transient, non-community drinking water system until it has been demonstrated to the Department that the water system will have adequate technical, financial, and managerial capacity, as defined in Section 003 of these rules...” Demonstration of these capacities must be submitted to DEQ prior to, or concurrent with, submittal of system engineering plans and specifications. The documentation is then reviewed by DEQ’s licensed professional engineers.

Owners proposing material modifications of existing systems, as defined in IDAPA 58.01.08.003.72, must also submit engineering plans and specifications for review and approval. At times, even a change in ownership may result in a system not having adequate TFM capacity. In those instances, DEQ works closely with the new PWS owner to clearly outline the steps necessary to achieve requirements, along with establishing a reasonable timeline.

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<sup>1</sup> **Community water system:** A public water system that serves at least 15 service connections used by year-round residents or regularly serves at least 25 year-round residents (IDAPA 58.01.08.003.15). Examples include municipally owned public drinking water supplies (e.g., cities, towns) or privately owned drinking water suppliers such as homeowner associations, apartment complexes, and mobile home parks.

<sup>2</sup> **Nontransient, noncommunity water system:** A public drinking water system that is not a community water system and that regularly serves at least 25 of the same persons over 6 months per year (IDAPA 58.01.08.003.89). Examples include schools, day care centers, hospitals, offices, industrial parks, and major shopping centers.

To assist water systems with this process, DEQ recommends water systems contact the Regional Office in the area which their project will occur. Checklists to assist with these processes are provided for engineers and developers and can be found on DEQ’s Public Water System Switchboard.

In 2023, DEQ updated the guidance document, *How to Demonstrate Financial, Technical, and Managerial Capacity in New Public Water Systems*. The document aligns asset management information with DEQ’s capacity development strategy and makes information more understandable and easier for public water system operators, owners, and consultants.

## ***Existing Water Systems***

### ***Drinking Water State Revolving Fund (DWSRF)***

The SDWA, as amended, allowed states to establish a DWSRF program to assist public drinking water system owners with financing infrastructure upgrades needed to protect public health and achieve and maintain compliance with SDWA requirements. The DWSRF authorizes grants to states to capitalize revolving loan funds. A revolving loan fund is a self-replenishing pool of money using annual federal capitalization grants, investment earnings, and interest and principal payments on old loans to issue new ones.

DEQ uses DWSRF loans to assist eligible PWS owners with infrastructure improvements. Interested system owners apply to DEQ for assistance, and loans are made to system owners with the managerial and technical capabilities (or who will achieve these capabilities through the loan project) and can demonstrate need through a competitive ranking process.

Information and solicitation for letters of interest are sent annually to PWSs and consulting engineers for planning grants or DWSRF loans with DEQ. Systems that submit letters of interest get on a priority list for the upcoming fiscal year.

DEQs Planning Grant Program assists eligible public drinking water systems with facility planning projects designed to ensure safe and adequate supplies of drinking water. Grants awarded under this program are used to develop engineering reports identifying the most cost effective, environmentally sound method of upgrading a public drinking water system to achieve and maintain compliance with state and federal standards. Grants cover up to 50% of eligible planning costs, with a matching share funded by local sources. Table 1 below represents the number of planning grants DEQ awarded during fiscal years 2021 -2023.

**Table 1. Drinking Water Planning Grants Awarded During Fiscal Years 2021-2023.**

Fiscal Year	Number of Grants	Funding Source		
		CAPDEV	ARPA <sup>1</sup>	Total
2021	13	\$337,828	\$0	\$337,828
2022	20	\$117,250	\$674,227	\$791,477
2023	66	\$10,000	\$2,511,134	\$2,521,134
Total DW Planning Grant Funding FY21 - FY23				\$3,650,439

1 – American Rescue Plan Act (ARPA) funding has been used in lieu of Capacity Development funding for the majority of the facility planning grants during fiscal years 2022 and 2023.

**Source Water Protection Planning Grants**

DEQ’s source water protection grants provide funding for projects to protect sources of public drinking water. Eligible activities include those that reduce the risk of contamination of a drinking water source. Projects must contribute to improved protection of one or more public water supply sources.

Grants are available for projects that protect sources of public drinking water, including:

- Contaminant source identification (e.g., research)
- Contaminant pathway removal (e.g., closure of abandoned wells)
- Contaminant removal (e.g., hazardous waste collection, pollution prevention, and waste reduction)
- Contaminant management (e.g., implementation of best management practices and implementation of a source water protection plan)
- Education and information sharing (e.g., brochures, workshops, and media campaigns)

DEQ awarded 41 source water protection grants between 2021 and 2023, and six additional grants were extended for an additional year.

**SMART Management Financial Tool**

This tool is designed to assist water systems with assessing their overall financial health. The tool allows the water system to enter information on revenues, expenses, assets, liabilities, debt, and reserves, which is then displayed on a dashboard that reflects the “financial health” of the water system. This application can be used to satisfy the financial capacity question asked during the sanitary survey, demonstrate TFM revenue sufficiency, and assist with SRF loan underwriting.



## ***Asset Management***

DEQ promotes the development of asset management plans to ensure the long-term success of PWSs and to improve service and reliability to the public they serve. Asset management plans ensure that PWSs are getting the most value from their assets, including planning maintenance needs and ensuring funds are available to repair, replace, or upgrade capital assets.

Section 2012 in America’s Water Infrastructure Act of 2018 requires state drinking water programs to include, as appropriate, asset management into their capacity development strategy. Idaho’s updated capacity development strategy was approved by EPA in 2022. It provides the basis to ensure that PWSs acquire and maintain the TFM capacity to achieve the health objectives of the SDWA.

There are five core components of asset management:

1. Current state of assets
2. Level of service
3. Critical assets
4. Minimum life cycle costs
5. Long-term funding

## **Assistance Available for Asset Management**

- DEQ’s PWS Switchboard has a Capacity Development category with asset management resources including a Frequently Asked Questions document, links to the Environmental Finance Switchboard, and an EPA Reference Guide for Asset Management Tools.
- The SMART Management Financial Tool, located on the PWS Switchboard, assists water systems with assessing their overall financial health, including evaluation of assets.
- Water system inspections (i.e., sanitary surveys) collect comprehensive information regarding the financial and managerial capacity of the PWS.
- Water systems that have implemented or will implement, as part of a proposed project, a formal asset management plan can receive priority points in the DWSRF loan rating process.

## **3.2 Provide safe drinking water by maintaining compliance with rules and regulations through provision of timely information and technical assistance to owners and operators**

### ***Public Drinking Water System Assistance***

DEQ strives to improve the capacity of PWSs by offering direct assistance and online tools to help with reporting requirements. DEQ develops and publishes regulatory guidance for PWS owners and operators to help interpret and implement rules and regulations. DEQ’s Public Water System Switchboard provides water system owners and operators with links to rules and checklists to assist with the preparation of plans and specifications, public notification

templates, sanitary survey forms, drinking water classification requirements, operator licensing, and more.

**DEQ Technical Assistance**—DEQ provides a variety of direct technical assistance over the telephone, through correspondence, and in person (both one-on-one and in training workshops) to system owners. This assistance includes providing information on submitting updated facility plans for review, complying with microbiological and chemical sampling requirements, conducting sanitary surveys, reviewing operation and maintenance plans, reviewing cross-connection control programs, handling water quality complaints, and issuing public notification regarding drinking water emergencies, such as contamination events and boil water advisories.

**District Health Department Technical Assistance**—DEQ contracts with six district health departments to provide technical assistance to Idaho’s small PWS owners. The district health departments provide the same one-on-one assistance that DEQ provides to larger system owners and performs a service that is essential to the success of DEQ’s Drinking Water Program.

**Auto Dialer**—DEQ provides automated telephone and email reminders to PWS owners and operators to help inform them of upcoming sampling deadlines. This low-cost, high-impact activity has resulted in a reduction in failure-to-monitor violations. These calls include reminders for public notifications, sanitary survey significant deficiencies, Revised Total Coliform Rule seasonal system start up procedures, and lead consumer notification at homeowner’s taps.

**Third-Party Service Providers**—Water systems can request free technical assistance from third-party providers using a Preliminary Inspection Findings Form (PIFF) available during the sanitary survey. DEQ provides the PIFF to both IRWA and RCAC after the sanitary survey site visit is complete. The third-party providers then reach out to PWS to offer their assistance. During SFY 2021–2023, DEQ provided 134 referrals for assistance to third party providers.

**Outreach and Assistance**—DEQ staff provide training sponsored by technical assistance providers regarding rule requirements, the Public Water System Switchboard, sanitary survey preparation, and other relevant issues. Staff presented to several organizations on the topics of emerging contaminants, funding opportunities, and rule requirements.

**Training Calendar**—The Public Water System Switchboard links to a comprehensive training calendar that is populated by trainers with class information as soon as it is available. This calendar provides timely information about training for PWS owners and operators.

**Data Management**—Data management through DEQ’s SDWIS database is critical to efficiently track water system compliance and ensure timely response to issues, which helps ensure drinking water standards are met and water is safe to drink.

**Source Water Protection**—Identifying potential sources of contamination in watersheds and recharge areas, and the conditions under which the risks increase, is the first step in a multiple

barrier approach to protecting drinking water. Source water protection strategies are a more cost-effective approach to protect source water from contamination than to remove contamination during treatment. Systems with a certified source water protection and emergency response plan are granted additional points when applying for DEQ administered drinking water grants and loans.

**Unregulated Contaminants**—EPA provided Idaho with \$126,000 in funding each fiscal year during the reporting period through the Public Water System Supervision grant for investigation of per- and polyfluoroalkyl substances (PFAS) contamination in Idaho’s public drinking water sources. DEQ received 335 PFAS sample results during the reporting period. Each sample is from an individual PWS source. As of September 29, 2023, approximately 10% of all active PWS sources in the state have been sampled. These results are obtained from 305 PWSs. Of the sample results received, 52 have identified the presence of PFAS in the source water sampled, which is approximately a 16% detection rate for the sampling project.

### ***Public Water System Switchboard***

DEQ’s Public Water System Switchboard has applications within it that use information from DEQ’s SDWIS database. The switchboard provides owners and operators with links to rules, monitoring schedules, plans and specifications, public notification templates, sanitary survey forms, drinking water system classification requirements, operator licensing, and more. Web-based resources and training materials are available to assist PWS owners and operators in maintaining compliance and building capacity. The PWS Switchboard layout can be seen in Figure 1.

Figure 1. Public Water System Switchboard.

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## Public Water System Switchboard

Visit our [COVID-19](#) and [Drinking Water](#) web page for information about the coronavirus.

Rules / Guidance	Tools / Data	Forms / Information	System Class / Licensing	Capacity Development
<a href="#">Drinking Water Rules (DAPA 58.01.08)</a>	<a href="#">CCR Report Tool</a>	<a href="#">Change Water System Information</a>	<a href="#">Operator Resources - Licensing Information</a>	<a href="#">Capacity Development</a>
<a href="#">40 CFR 141</a>	<a href="#">Certified Drinking Water Labs</a>	<a href="#">Emergency Preparedness (DWAR)</a>	<a href="#">Should Your Facility be a Regulated PWS?</a>	<a href="#">Grants and Loans</a>
<a href="#">Contaminants and Compliance Information</a>	<a href="#">How to Sample Videos</a>	<a href="#">Important Dates</a>	<a href="#">System Classification / Supervision Requirements</a>	<a href="#">Operation and Maintenance</a>
<a href="#">Cross Connection Control</a>	<a href="#">Lab Forms</a>	<a href="#">Plans and Specifications</a>		<a href="#">Pay Assessment Fee Online</a>
<a href="#">EPA Quick Reference</a>	<a href="#">Monitoring Schedule</a>	<a href="#">Public Notification Templates</a>		<a href="#">Training Calendar</a>
<a href="#">Guidance and Fact Sheets</a>	<a href="#">Source Water Assessment Reports</a>	<a href="#">Monitoring Waivers</a>		
<a href="#">Record Retention Schedule</a>	<a href="#">Source Water Planning Tool</a>	<a href="#">Sample Site Plan Templates</a>		
<a href="#">Revised Total Coliform Rule (RTC/R) (including E coli)</a>	<a href="#">Sample Results</a>	<a href="#">Sanitary Survey</a>		
	<a href="#">SMART Financial Tool</a>	<a href="#">Questions? Who to Contact</a>		

### Resources

- [Contaminants in Drinking Water](#)
- [Drinking Water Feedback Form](#)
- [Sample Results](#)
- [Seasonal Startup Checklist online form](#)
- [Pay Assessment Fee Online](#)
- [Rules for Public Drinking Water Systems](#)
- [Rules of the Board of Drinking Water and Wastewater Professionals](#)
- [Training Calendar](#)

### ***Switchboard Features to Increase Transparency***

**Consumer Confidence Reports**—DEQ and health departments assist community PWS owners and operators with meeting the requirements for consumer confidence reports (CCRs). CCRs are annual water quality reports to the customers of community water systems. The report summarizes system information regarding water sources used, any detected contaminants, the status of system compliance, and includes public educational information. The CCR reports are due to DEQ annually on July 1.

To make CCR reporting easier, DEQ provides online applications to help owners and operators complete their required CCR report. This report is completed by each community system with the sampling/monitoring and violation information from their files or that same information can be easily downloaded from an online DEQ application. These components help water system owners and operators communicate effectively with their customers. The entire CCR report can be prepared online and sent electronically (or by mail) to the local DEQ regional office.

### ***Public Notification Templates***

Public notifications inform customers of any potential adverse health effects related to their drinking water and what steps they can take to minimize the impact. Under the SDWA, public water systems are required to inform their customers of any violations of the state’s drinking water standards. Notification timelines range from 24 hours, 30 days, to one year. Examples of templates include boil advisories for such things as bacteria and loss of water pressure, as well as exceedance notifications for lead and copper, nitrate, and other contaminants. Links are available to templates for cyanotoxins in finished drinking water above the health advisory and manganese.

### ***Emergency Preparedness/IdWARN***

DEQ’s Drinking Water Bureau initiated IdWARN (Idaho Water and Wastewater Agency Response Network), a mutual aid organization of communities helping communities by allowing owners of water and wastewater utilities to assist each other during emergencies. IdWARN participants can access specialized resources, including staff, to assist water and wastewater systems until the system can return to normal operating conditions.

The program is administered by an IdWARN statewide committee through the Idaho Rural Water Association and is available to all public and private water and wastewater system owners in Idaho. Participation is voluntary.

This site links to resources on emergency response plans, resiliency, drought, earthquakes, flooding, wildfires, power outages and emergency generators.

### ***Sample Results***

Sampling results are available online through an application that utilizes information from DEQ’s SDWIS database. The application is available on the PWS switchboard via EPA’s Drinking

Water Watch tool. Results are available to view by anyone interested in information about a regulated public water system. Additional information that can be found within the Drinking Water Watch tool would include the list of a water system’s facilities, sample schedules, number of connections, points of contact, monitoring results, violations/enforcement actions, and past site visits.

### ***Monitoring Schedules***

This PWS switchboard application helps water system operators and owners easily review their current monitoring requirements. The report also identifies if the monitoring requirement has been satisfied once the sample has been entered into SDWIS.

### ***Source Water Protection Planning Tool***

DEQ’s source water protection planning tool assists water systems in developing a source water protection plan and emergency response plan. The tool prepopulates information into the report, including source locational data, contact information, potential contaminant inventory system, and county emergency contacts. The tool gathers information from existing databases and user information to create a planning document.

### ***Source Water Assessment Reports***

Source water assessments provide information on the potential contaminant threats to public drinking water sources. The delineated source water assessment area is the physical area contributing water to the source. A potential contaminant inventory describes facilities, land uses, and environmental conditions within the delineated source water assessment area. DEQ uses this information as part of the susceptibility scoring of each source. These assessments are available to the public on DEQ’s PWS switchboard.

### ***Sanitary Surveys***

A key component to evaluating and assessing water system capacity is the sanitary survey. DEQ makes periodic inspections of all PWSs to ensure they are properly built, operated, and maintained. Sanitary surveys provide a positive approach for evaluating and assisting PWS owners since the physical condition of a PWS often reflects its TFM capacities. For the fiscal years 2021–2023, DEQ completed 1,175 sanitary surveys.

DEQ has moved to an electronic sanitary survey format from a hard-copy format. This format maintains consistency of inspections across the state and results in a more efficient, time-saving report. The sanitary survey process is backed by the enforceability of the rule requirements. A standardized sanitary survey form is utilized to evaluate the status of a public water system and to ensure the protection of public health.

Highlights of the sanitary survey form include:

- A comprehensive review of a system’s technical, financial, and managerial capacity. The financial/managerial module in the electronic sanitary survey has been enhanced to collect information to be used to better assess water system capacity.

- Automatically identifies “significant deficiencies,” “deficiencies,” and “recommendations” based on the answer to a question. This helps the inspector to quickly identify issues that need to be corrected.
- A field checklist generated based on the information entered in SDWIS. All questions on the form are required to be answered. If a question is left unanswered, an error message is produced for the inspector to correct.
- Each question has an associated report statement that can be utilized and automatically placed into the report template for more efficient and consistent report generation.
- All significant deficiency report statements have a potential health risk statement for clarification as to why the significant deficiency constitutes a public health threat.
- Deficiencies have a purpose statement to further clarify the purpose of the deficiency.

### ***Online Sanitary Survey Inspection Form***

The State of Idaho Public Water System Sanitary Survey form helps PWS owners and operators prepare for their sanitary survey and is available on DEQ’s Public Water System Switchboard.

This form clarifies the inspection process and enables system owners or operators to collect data in advance that they might not otherwise have available in their daily operations. The sanitary survey form also standardizes the nature of the inspection, ensuring all systems are held to the same standard regardless of system location or inspector and decreases the time necessary to complete the inspection for both the inspector and the water system representative.

Inspectors encourage system operators to conduct self-inspections of their systems with these forms. Using this form has allowed operators to correct deficiencies in advance of the inspector’s arrival at the system. This demonstrates the educational value of the self-inspection process.

Continuing Education Units (CEUs) are offered to operators of systems classified as “Very Small,” “Distribution 1,” and “Distribution 2.” Water system owners and operators who complete limited pre-inspection activities, actively participate in the sanitary survey, and follow up on corrective actions of deficiencies are eligible to receive CEUs. The opportunity to receive CEUs helps operators maintain their licensure requirements. During the three-year reporting period, DEQ issued 154 Sanitary Survey CEU certificates.

### **3.3 Ensure public water systems are operated by qualified personnel by requiring properly licensed operators.**

Operators are responsible for the day-to-day management of a drinking water system’s operation. Some of the duties and responsibilities of a licensed operator include developing sampling plans and sampling, making process control decisions, flushing distribution system,

monitoring chemical applications, operating and maintaining system equipment, issuing public notices to users when systems are not in compliance, and recordkeeping.

### ***Statewide Operator Training***

Operator training events are conducted by private vendors throughout the state. Rural Community Assistance Corporation, the Environmental Finance Center, and Idaho Rural Water Association receive EPA training grant money and provide training to Idaho operators. DEQ provides an online calendar of training events that is populated by vendors as soon as information becomes available. The online calendar is available on DEQ's PWS Switchboard.

DEQ, in collaboration with the Idaho Rural Water Association, conducted trainings over the past three years and presented on a variety of subjects including, the public water system switchboard, emerging contaminants in drinking water including PFAS, risk and resilience assessments and emergency response plans, funding opportunities, and lead/copper rule changes. Available classes and schedules are displayed on the DEQ training calendar on the PWS Switchboard.

Additionally, DEQ provides training credit in the form of continuing education units for operators who participate in the sanitary survey process.

### ***Drinking Water Operator Licensing***

DEQ and the Idaho Board of Drinking Water and Wastewater Professionals oversee the licensing of drinking water operators. DEQ requires that the PWS owners (except for non-community transient ground water systems) place the supervision and operation of their systems under a properly licensed operator. DEQ determines the level or classification of operator needed for each PWS.

The Idaho Board of Drinking Water and Wastewater Professionals through the Division of Occupational and Professional Licenses (IDOPL) establishes requirements for operator licenses, sets fees, reviews applications, issues and renews licenses, and determines continuing education requirements.

### ***Online Operator Search Tool***

DEQ maintains a tool to help licensed operators and PWS owners connect. Online tools are available to become an operator for hire and for a PWS in need of an operator to search for a contract operator. Operators can access the online database and list themselves as available for hire. The tool cross-checks IDOPL records and provides operators' names only if they are properly licensed. If a listed operator's license lapses, the database tool automatically drops the operator from the list. DEQ also maintains a document titled Recommendations for Hiring a Contract Operator.



## **System Classification**

The “Idaho Rules for Public Drinking Water Systems” (IDAPA 58.01.08) require that DEQ classify all community, non-transient non-community, and surface water public drinking water systems with a treatment and/or distribution classification based on indicators of potential health risk. Criteria used to determine the potential health risks include the system's complexity, size, and source water for treatment facilities; complexity and size of distribution systems; and other criteria deemed appropriate. Systems are classified by type (treatment or distribution) and class. Classifications range from Very Small to Class I, II, III, or IV. The rules also require that public drinking water systems be staffed by licensed operators based on the system classification.

Public water system owners or operators are required to fill out and submit the classification worksheet to DEQ every five years (IDAPA 58.01.08.553). The Drinking Water Bureau built an application that produces real time system classifications based on DEQ’s drinking water database (SDWIS) information. Once a public water system’s information has been placed into the drinking water database, system classifications will automatically be generated through the System Classification Worksheet application.

## **4 Summary**

We assess the effectiveness of Idaho’s capacity development program by analyzing data from our SDWIS database, sanitary survey inspections and monitoring operator certification statistics. The SDWIS database gathers data related to water system compliance, monitoring and reporting requirements. The compliance tracking tools and queries enable us to gauge the technical and managerial capacity of water systems.

A sanitary survey allows staff to identify significant deficiencies, deficiencies and recommendations that have potential health impacts and may indicate problems with technical capacity. Water systems that are also operated by properly licensed operators are critical to ensuring water systems have managerial capacity and provide safe drinking water.

Water systems that achieve a high level of capacity benefit in many ways:

- Ensuring compliance with regulatory requirements necessary to protect public health.
- Extending the useful life of critical infrastructure, resulting in cost savings and good service.
- Efficiently addressing unforeseen challenges, thereby enhancing system safety and security.
- Understanding the operation and maintenance of the water system to protect public health.
- Delivering a consistent and dependable water supply.
- Securing the long-term viability of the PWS through ownership accountability and strategic planning.
- Achieving revenue sufficiency, including water system charges, revenues, and reserves.

In our ongoing commitment to further developing the Capacity Development program, we're in the process of creating a "Capacity Evaluation Application." This tool will utilize multiple data collection sources to create a matrix, helping us identify those PWSs most in need of assistance. This application will utilize compliance schedules, sample history, violation history, missing administrative/operational documents, etc. to help a system identify areas they can work on to improve their capacity evaluation score and maintain or improve their compliance with drinking water rule requirements.

## **5 Report Availability**

This report is available to the public on the Idaho DEQ website at:

<https://www.deq.idaho.gov/water-quality/drinking-water/public-water-system-switchboard/capacity-development>.